GROUP 6 – NORTHEASTERN PORTION OF AREA IV
RCRA FACILITY INVESTIGATION RISK ASSESSMENT REPORT
SANTA SUSANA FIELD LABORATORY
VENTURA COUNTY, CALIFORNIA

VOLUME IV – APPENDICES B THROUGH D

APPENDIX C

HUMAN HEALTH AND ECOLOGICAL RISK ASSESSMENTS

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LIST OF ACRONYMNS AND ABBREVIATIONS

B064 LF	Building 064 Leach Field
bgs	below ground surface
CMS	Corrective Measure Study
COPC	Chemical of Potential Concern
CPEC	Chemical of Potential Ecological Concern
CTE	Central Tendency Exposure
EPC	Exposure Point Concentration
ERA	ecological risk assessment
HRA	human health risk assessment
NCY	New Conservation Yard
OCY	Old Conservation Yard
QA/QC	quality assurance/quality control
RBSL	risk-based screening levels
RCRA	Resource Conservation and Recovery Act
RFI	RCRA Facility Investigation
RME	Reasonable Maximum Exposure
SRAM	Standardized Risk Assessment Methodology Work Plan
SRE	Sodium Reactor Experiment
SSFL	Santa Susana Field Laboratory
SVOC	Semi-Volatile Organic Compounds
TRV	Toxicity Reference Value
USEPA	United States Environmental Protection Agency
VOCs	Volatile Organic Compounds

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C-1.0 INTRODUCTION

This appendix to the Group 6 Resource Conservation Recovery Act (RCRA) Facility Investigation (RFI) Report presents the human health risk assessments (HRAs) and ecological risk assessments (ERAs) prepared by MWH Americas, Inc. (MWH). RFI site-specific risk assessment information presented includes:

- An overview of risk assessment methodologies that are common to all Group 6 RFI sites
- A description of supplemental procedures used to complete the risk assessments
- Findings of RFI site-specific risk assessment (see Attachments C1 through C4)
- Baseline toxicity reference values (TRVs) for the ERA (Attachment C5)
- Findings of a plant health survey and a vegetation map for Group 6 RFI sites (Attachments C6.1 and C6.2, respectively)
- Extrapolated data for the risk assessments (Attachment C7)
- Risk assessment calculation tables (Attachment C8)

All risk assessments were performed following the methods described in the Standardized Risk Assessment Methodology Work Plan, Revision 2 (SRAM) for the Santa Susana Field Laboratory (SSFL) (MWH 2005). Four RFI site HRAs/ERAs have been completed as part of the Group 6 RFI report. These are 1) New Conservation Yard (NCY), 2) Old Conservation Yard (OCY), 3) Sodium Reactor Experiment (SRE) Area and 4) Building 064 Leach Field (B064 LF).

Supporting background information and data for the risk assessment are presented in both the main text and in appendices to this report. Sections 1 through 5 of the main text and Sections 1 through 4 of Appendices A1 through A4 (the RFI site reports) provide the description of the characterization findings upon which these HRAs and ERAs are based. Laboratory data for soil and sediment samples are presented in Attachment 3 to each RFI site report. A description of groundwater characterization for the Group 6 RFI Reporting Area is provided in Appendix B.

Attachments to this risk assessment Appendix describe the HRAs and ERAs performed for each of the four Group 6 RFI sites. The HRAs present risks associated with total exposures to surficial media (soil and sediment), indirect groundwater (i.e., vapor migration), and direct groundwater (i.e., drinking water) as well as total risks from these media. The ERA risks are based on total exposures to surficial media (soil, sediment and vapor). These risks have been calculated for each of the four RFI sites in the Group 6 RFI report area separately. Key findings of the HRAs and ERAs are presented in Section 4 of the corresponding Appendix A attachments and in Section 6 of the main text. The risk assessment results are used as the basis for site action recommendations: either recommendation for further action in the Corrective Measures Study (CMS) or No Further Action. Site action recommendations are presented in Section 5 of Appendices A1 through A4 and in Section 7 of the main report text.

The four risk assessment attachments each contain the following sections:

Section 1	Introduction
Section 2	Data Usability Assessment
Section 3	Human Health Risk Assessment
Section 4	Ecological Risk Assessment
Section 5	References

Attachments C1 through C4 include risk assessment tables presenting key information for the site risk assessments. All risk calculations are provided as electronic copy printable tables in Attachment C8. Other supporting information for the risk assessments are also provided electronically in Attachments C5, C6, and C7. Note that Group 6 RFI site-specific sample locations are shown in figures in each of the four RFI site report appendices (Appendices A1 through A4).

C-2.0 OVERVIEW OF HUMAN HEALTH RISK ASSESSMENT

Methods for completing the HRA are described in detail in the SRAM (MWH 2005). The purpose of a HRA is to estimate potential health risks to humans in a manner purposely protective to ensure public safety. This is done by determining the chemicals present at a site, the toxicity of those chemicals, and the potential exposure to those chemicals. Information regarding the presence of chemicals is provided by environmental sampling and

analyses (i.e., characterization data). The risk assessment incorporates chemical toxicity and exposure estimates to arrive at an evaluation of health risks.

The HRA consists of the following tasks:

- Identification of Chemicals of Potential Concern (COPC)
- Exposure Assessment
- Toxicity Assessment
- Risk Characterization
- Uncertainty Analysis

The risk assessment methodology is based on guidance developed by the USEPA. The risk assessment will evaluate the potential health risks to human receptors associated with current site conditions and proposed future uses of the site.

C-2.1 HUMAN HEALTH RISK ASSESSMENT PROCESS

In Step 1, the data associated with a site are reviewed and the analytical results compiled. The data are screened according to data usability criteria established for risk assessment. Constituents with data meeting these quality criteria are carried forward in the risk assessment as the COPCs.

In Step 2, COPC-specific toxicity values are compiled for use in the quantitative risk analysis. Established regulatory toxicity criteria are used.

In Step 3, exposure scenarios are developed to (1) describe the potential exposures at the site and (2) provide a basis for quantifying those exposures. Each exposure scenario addresses the residual COPCs, the potential route or mechanism of exposure, and potentially-exposed human populations (known as “receptors”). As described in the SRAM (MWH 2005), note that both central tendency exposures (CTE) and reasonable maximum exposures (RME) are evaluated to provide risk managers with a range of results.

In Step 4, the toxicity and exposure assessments are summarized and integrated into quantitative expressions of risk. The exposure assessment parameters for the HRA are provided in Tables C-1 through C-5. The estimated risks include COPC-specific, multi-

pathway risks for each of the site's potential receptors. Both non-cancer health endpoints as well as cancer endpoints are evaluated in this HRA. As described in the SRAM (MWH 2005), note that risk estimates for the potential future recreational user (recreator) are used as surrogate risk estimates for the trespasser. Also note that where relevant to site conditions, risk estimates for polychlorinated biphenyl (PCB) congeners are presented separately for Group 6 RFI sites; however, as described in the SRAM (MWH 2005), risk estimates for PCB congeners are not included in cumulative risk estimates.

The risk values presented in a risk assessment are derived from a considerable number of conservative, health-protective assumptions about exposure and toxicity. Thus, to place the risk estimates in proper perspective, it is important to specify the assumptions and uncertainties inherent in the risk assessment. This process is conducted in Step 5. This step is useful in providing risk managers insight into the interpretation of the risk assessment results. In addition, to address potential uncertainties associated with vapor flux and Johnson and Ettinger (J&E) models, a vapor validation study is currently being conducted.

Step 6 involves the development and presentation of conclusions and recommendations that are based on the findings of the risk assessment. These site action recommendations are provided in Section 5 of Appendices A1 through A5 and in Section 7 of the main text.

C-3.0 OVERVIEW OF ECOLOGICAL RISK ASSESSMENT

Methods for completing the ERA are described in detail in the SRAM (MWH 2005).

C-3.1 PROBLEM FORMULATION

Problem formulation is the first step in the ecological risk assessment process and is intended to establish the scope of the ecological risk assessment and identify major factors to be considered. Key components of the problem formulation include:

- Identification of representative ecological receptors
- Selection of Chemicals of Potential Ecological Concern (CPECs)

- Identification of complete or potentially-complete exposure pathways and development of a conceptual site model
- Identification of assessment and measurement endpoints

As described in the SRAM (MWH 2005), the ERA was designed to assess exposures and potential risks to freshwater aquatic biota communities, terrestrial plant communities, soil invertebrate communities, and wildlife (i.e., birds and mammals) populations.

Key products of the problem formulation are the conceptual site model (CSM) and assessment endpoint statements. The ERA CSM is a diagrammatic representation of potential sources of CPECs, primary and secondary exposure pathways, and ecological receptors that may be exposed to CPECs via a particular exposure route. Assessment endpoints are formal expressions of the actual environmental values to be protected (DTSC 1996; USEPA 1992, 1998).

C-3.2 EXPOSURE ASSESSMENT

The exposure assessment provides the basis for estimating exposures to potential receptors at SSFL RFI sites. One key feature of the exposure assessment is the use of representative species. Given the number of species and the complexity of biological communities, all potential receptors at RFI sites could not be individually assessed. Representative species were identified to further focus the ERA analysis effort. Wildlife exposure factors used to calculate estimated environmental doses are provided in Table C-6. As with the HRA, exposure point concentrations (EPCs) were calculated using USEPA's ProUCL Version 3.0 (see also Section C-4.3). Results of risk analyses for these representative species are then used to infer the potential for adverse impacts to taxonomically and functionally-related receptors. The assumption is that potential risks to representative species are indicative of potential risks to other related species.

C-3.3 EFFECTS ASSESSMENT

The effects assessment provides the basis for establishing acceptable effects levels for receptors of concern at SSFL RFI sites. One key feature of the effects assessment is that

TRVs[1] were derived from toxicity studies conducted under laboratory conditions. Thus, dose-response relationships of test species under laboratory conditions are then used to infer the potential for adverse impacts to taxonomically and functionally related representative species under field conditions. To promote a protective assessment, chronic NOAEL[2]-equivalent TRVs were used to evaluate potential risks.

C-3.4 RISK CHARACTERIZATION

Risk characterization integrates information developed in the exposure assessment and effects assessment to estimate potential ecological risks. For wildlife, potential risks to representative species were used to infer potential risks to other similar species at SSFL RFI sites.

For the ERA, the key metric for estimating risk is the hazard quotient (HQ). HQs are calculated using the following equations:

$$HQ_{ij} = ADD_{ij} / TRV_{ij} \qquad \text{[dose-based HQ]}$$

$$HQ_{ij} = EPC_{ij} / RfC_{ij} \qquad \text{[concentration-based HQ]}$$

where:

HQ_{ij}	=	hazard quotient for the ith CPEC for the jth target receptor
ADD_{ij}	=	average daily dosage for the ith CPEC for the jth target receptor
TRV_{ij}	=	toxicity reference value for the ith CPEC for the jth target receptor
EPC_{ij}	=	exposure point concentration for the ith CPEC in abiotic media
RfCij	=	reference concentration value for the ith CPEC for the jth target receptor

Receptors with large home ranges (e.g., hawk, bobcat, mule deer) may be exposed to RFI sites within and between Reporting Areas. The estimated risks to the hawk, the bobcat, and the mule deer assume that these species spend all of their time at the RFI site. This assumption is unlikely to be true and it results in overestimates of potential risks to these species. The reported foraging ranges for these specifies are at least one order of magnitude larger than the true size of the RFI sites. A preliminary evaluation of the affect of the

[1] TRV is defined as the dose or the media concentration of a particular CPEC that is protective of a particular plant, invertebrate, or wildlife receptor.

[2] NOAEL = No-observable-adverse-effect-level

difference in home range sizes is included in each site ERA by adjusting the site-only risks by a factor reflecting the larger home range. Final risk estimates for large home range receptors will be evaluated and presented after all RFI site-specific risk assessments have been completed.

There is some degree of uncertainty associated with nearly all risk assessments. However, risk-based decision-making must be made even when faced with such uncertainties. To promote effective risk management decisions, conservative assumptions were used in the ERA to advance overestimates rather than underestimates of potential risks to these receptors. Sources of uncertainty that are common to ERAs for all RFI sites are summarized in Table 6-6 (in the main text) and should be considered when formulating risk management decisions for any RFI site. In addition to the quantitative risk estimates, a weight-of-evidence approach was used to determine the potential for and ecological significance of potential ecological risks.

C-4.0 SUPPLEMENTAL RISK ASSESSMENT PROCEDURES

C-4.1 TOXICITY EQUIVALENT FACTORS FOR DIOXIN AND PCB CONGENERS

The World Health Organization (WHO) conducted a re-evaluation of the toxic equivalency factors (TEFs) values, and as a result, a number of TEF values have been changed, notably for PCBs, octachlorinated congeners and pentachlorinated furans. Thus, the TEFs used to assess dioxin and coplanar PCB congeners listed in SRAM (MWH 2005) have been subsequently updated. The WHO 2005 TEFs for dioxin and coplanar PCB congeners (Van den Berg et al. 2006) used in the risk assessments are presented in Table C-7.

C-4.2 RISK-BASED SCREENING LEVELS

One of the underlying strategies of the entire RFI process is that if the characterization data forms the basis for the HRA and ERA, then that data must be collected consistent with that objective. Therefore, risk-based input has been included in several steps in the RFI process. Two specific steps were 1) in the determination of characterization completeness and 2) identifying chemical risk drivers for CMS recommendations. In both of these cases, Risk-Based Screening Levels (RBSLs) were used.

Although RBSLs are used in the RFI process, they are not used in either the HRA or ERA. The human and ecological risks presented are based only on the procedures outlined in the SRAM and are the only basis for CMS recommendations. The calculation of the RBSLs is presented in this section.

When using RBSLs in the process of the determination of characterization completeness, one of the criteria used in this weight-of-evidence evaluation was the comparison of individual soil sample analytical results to the RBSLs. This comparison, along with the other criteria (i.e., chemical gradient, soil volume estimates), was used to determine if additional characterization (i.e., more sampling) was needed. Additional sampling was more likely to be recommended if a chemical concentration in soil was above the RBSL. Further, if an area already had other chemicals at concentrations significantly above the RBSLs (i.e., pose a significant risk and would be recommended for CMS evaluation), then no further sampling was needed.

The RBSLs were used to identify CMS Areas in the following manner. The RFI site-specific HRAs and ERAs (provided in the four attachments to this appendix) provide site-specific risk estimates for chemicals at each RFI site. When a chemical is identified as contributing to an unacceptable risk level (e.g., hazard index [HI] greater than one), then the sample locations within that RFI site that are contributing to that risk are identified by comparing individual soil sample analytical results to the RBSLs. These contributing sample locations are included in the CMS recommendation for further evaluation and are identified in the main text of this report as CMS Areas.

RBSLs are based on the relationship between chemical concentration and estimated risk for each chemical. For non-carcinogens, a target HI of 1.0 was used as the acceptable level. For individual carcinogens, RBSLs are calculated using a target risk of 1×10^{-6} (USEPA 1993). For ecological receptors, a target HI of 1.0 was used as the acceptable level. Because the exposure and risk calculations and the fate and transport models used are linear, the following equation was used to establish RBSLs:

$$RBSL = \frac{C_{unit} \times RISK_{target}}{RISK_{unit}}$$

where:

RBSL	=	unit-specific chemical-specific RBSL (mg/kg or µg/L)
C_{unit}	=	concentration of chemical (either 1.0 mg/kg or 1.0 µg/L)
$RISK_{target}$	=	target risk level (1.0 non-carcinogens; 1×10^{-6} carcinogens)
$RISK_{unit}$	=	unit risk level (the calculated risk associated with the C_{unit})

RBSLs are estimated for the various receptors (residential, commercial, recreational and ecological) and for soil/sediment and soil vapor. Soil vapor RBSLs are based on indirect exposures to soil vapor though inhalation of indoor and/or outdoor air. Soil RBSLs are presented in Table C-8. Soil vapor RBSLs are presented in Table C-9.

C-4.3 BASELINE TOXICITY REFERENCE VALUES FOR THE ECOLOGICAL RISK ASSESSMENT

The effects assessment used in the ERA was a two-step process. In the first step, where available, BTAG TRV-Low values were used to calculate screening-level risk estimates. As described in the SRAM, if acceptable screening risk levels were exceeded, then the next step was to use baseline TRVs to calculate risk estimates. As stated in the SRAM, baseline risk assessment TRVs were derived on a case-by-case basis as required for investigational unit risk assessments. This process is fully consistent with DTSC's approach that

> "Alternate TRVs may be proposed and supported, however they must be evaluated in conjunction with the BTAG values."
>
> (DTSC, http://www.dtsc.ca.gov/AssessingRisk/eco.cfm)

Baseline TRVs are described in Attachment C5. Although not used to calculate risk estimates, BTAG TRV-High values (where available) are provided for comparison.

C-4.4 EXPOSURE POINT CONCENTRATION DATA

The data presented in each of the four RFI site report appendices (Attachment 3 of Appendices A1 through A4) are all the RFI site characterization data that have been used to determine if characterization is sufficient. These data are also presented in maps in Section 4 of Appendices A1 through A4. A subset of this data has been used as input into the risk assessment. Specifically, a subset of data had to meet several criteria in order for it to be

used in the calculation of EPCs in the risk assessment. This section describes the criteria used to select that subset of data and how the reader can determine which analytes/samples/locations have been included in the EPC calculations.

The decisions to include or exclude data from the EPC calculations were made on an analyte-by-analyte and sample-by-sample basis. The criteria for this selection are:

- Are the data within the boundaries or associated with a chemical use area within the RFI site area?
- Do the data meet Quality Assurance (QA) standards?
- Do the data describe conditions in the soil horizon of interest for the HRA and ERA (i.e., in the depth range of 0 to 10 feet below grade surface [bgs])?
- Is the analyte (i.e., chemical) one that can be evaluated in the HRA/ERA?

The final data set used in the risk assessment for the calculation of RFI Site-specific EPCs was selected based on these criteria.

A modular, flexible data management system was required given the diverse types and large amounts of data and the necessity to promptly respond to the data management and analysis needs of a multitude of users. Consequently, finding data used in the risk assessment requires the following multi-step process:.

- Step 1: All RFI soil data that were deemed to be sufficient for site characterization can be found in Attachment 3 in each of the RFI site report appendices (Appendices A1 through A4). All Group 6 Report area groundwater data can be found in Attachment 1 of Appendix B.
- Step 2: In the appropriate RFI site or groundwater table, find the data table entries for the chemical of interest to be evaluated. Each entry in the table (i.e., analyte and sample) has a sample identification (ID) number and EPA ID number. Note that sample locations are shown in figures in each of the four RFI site report appendices (Appendices A1 through A4).

If the data table has been provided electronically, the reader can sort the data by the chemical name to identify all the locations where the chemical of interest was analyzed. If the data are not available electronically, the reader will have to conduct a sample-by-sample search to find the chemical data of interest.

- Step 3: For each line entry (i.e., analyte and sample), the next-to-last column (on the right) in the table is marked with regard to whether that result was used in this risk assessment ('Y') or not used in the risk assessment ('N').

- Step 4: For those data marked 'N', the rationale for not using the result is provided in the last column of the table. In some cases, the notation "Replaced by extrapolated data" is provided in the last column to indicate whether that particular datum was extrapolated from other data (e.g., PAHs concentrations were extrapolated from TPH concentrations). In these cases, the reader will find the extrapolated data in Attachment C7.

- Step 5: RFI site-specific extrapolated data are found in the following data tables in Attachment C7:

  - Table C7-1 – NCY
  - Table C7-2 – OCY
  - Table C7-3 – SRE

  Specific extrapolated data of interest may be found using the fields 'Sample_ID' and 'Analyte'. No extrapolated data were generated for B064 LF. Note that all data in the extrapolated datasets were used in the risk assessments.

C-5.0 REFERENCES

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Table C-1
Exposure Assessment Parameters for Workers
(Page 1 of 3)

Parameter	Central Tendency Exposure (CTE)	Exposure Distribution	Reasonable Maximum Exposure (RME)
General Parameters:			
Body Weight (BW)	Value: 70 kg Rationale: Average body weight, USEPA 1997	Lognormal mean: 71 kg standard deviation: 14.2 Source: CalTOX 1994[1]	Value: 70 kg Rationale: Average body weight, USEPA 1997
Exposure Frequency (EF)	Value: 8 hrs/d, 219 d/yr Rationale: DTSC 1999	Constant	Value: 8 hrs/d, 250 d/yr Rationale: USEPA 1997
Exposure Duration (ED)	Value: 9 years Rationale: DTSC 1999	Continuous variable across age-specific occupational tenure reported by Carey (1988) as presented by USEPA (1997)	Value: 25 years Rationale: DTSC 1999
Averaging Time (AT)	Value: Carcinogenic Effects: 75 years (27,375 days) Noncarcinogenic Effects: AT = Exposure duration Rationale: USEPA 1997	Carcinogenic Effects: Constant at 75 years Noncarcinogenic Effects: Co-vary with exposure duration	Value: Carcinogenic Effects: 75 years (27,375 days) Noncarcinogenic Effects: AT = Exposure duration Rationale: USEPA 1997
Inhalation of Particulates and/or Vapors:			
Breathing Rate (BR)	Value: 1.3 m^3/hr Rationale: Hourly average for outdoor workers, USEPA 1997	Lognormal mean: 1.44 m^3/hr standard deviation: 0.66 m^3/hr Rationale: General construction workers and laborers reported by Linn et al. (1993) as presented by USEPA (1997)	Value: 2.0 m^3/hour Rationale: Midpoint between moderate and heavy activity values, USEPA 1997

Table C-1
Exposure Assessment Parameters for Workers
(Page 2 of 3)

Parameter	Central Tendency Exposure (CTE)	Exposure Distribution	Reasonable Maximum Exposure (RME)
Dermal Contact with Soil:			
Soil Adherence Factor (AF)	Value: Value from anticipated USEPA Guidance on Dermal Assessment or 0.02 mg/cm^2 Rationale: Weighted soil adherence for face, forearms, and hands for pooled groundskeepers data (USEPA 1997, Table 6-13); typical activity combined with 50th percentile body part-specific soil adherence factors	Empirical Distribution Rationale: Distribution from anticipated USEPA Dermal Guidance or fitted distribution of pooled data from sources cited in that Guidance	Value: Value from anticipated USEPA Guidance on Dermal Assessment or 0.2 mg/cm^2 Rationale: Weighted soil adherence for face, forearms, and hands for pooled utility workers data (USEPA 1997, Table 6-13); high-end activity combined with 50th percentile body part-specific soil adherence factors
Surface Area (SA)	Value: 2,500 cm^2 Rationale: DTSC 1999	Empirical Distribution Co-vary with body weight Rationale: Distribution developed from percentile values (USEPA 1997, Tables 6-2, 6-3), summed across relevent body parts, and fitted to Crystal Ball	Value: 2,500 cm^2 Rationale: DTSC 1999
Bioavailability (B)	Chemical-specific: 0.1 for VOCs; 0.001 for Cd; 0.03 for As; 0.01 for other metals DTSC 1994	Constant	Chemical-specific: 0.1 for VOCs; 0.001 for Cd; 0.03 for As; 0.01 for other metals DTSC 1994
Incidental Soil Ingestion:			
Ingestion Rate (IR_{soil})	Value: 50 mg/day Rationale: Based on range of plausible soil ingestion rates for adults, USEPA 1997	Lognormal mean: 9.94 mg/day standard deviation: 19.9 mg/day Source: CalTOX 1994[1]	Value: 200 mg/day Rationale: RME ingestion rate, DTSC, personal communication, T.R. Hathaway, 3/30/00

Table C-1
Exposure Assessment Parameters for Workers
(Page 3 of 3)

Parameter	Central Tendency Exposure (CTE)	Exposure Distribution	Reasonable Maximum Exposure (RME)
Bioavailability (B)	Value: Chemical-specific Rationale: Current peer-reviewed literature values for chemical in soil matrix; subject to DTSC approval	Constant	Value: Chemical-specific Rationale: Current peer-reviewed literature values for chemical in soil matrix; subject to DTSC approval

[1] CalTOX computer model version 1994.
Crystal Ball (Decisioneering, Inc., Denver, CO)

Table C-2
Exposure Assessment Parameters for a Residential Adult
(Page 1 of 4)

Parameter	Central Tendency Exposure (CTE)	Exposure Distribution	Reasonable Maximum Exposure (RME)
General Parameters:			
Body Weight (BW)	Value: 70 kg Rationale: Average body weight, USEPA 1997	Lognormal mean: 71 kg standard deviation: 14.2 Source: CalTOX 1994[1]	Value: 70 kg Rationale: Average body weight, USEPA 1997
Exposure Frequency (EF)	Value: Pathway-specific Rationale: USEPA 1997	Continuous variable between selected pathway specific average exposure duration and 350 days/year Rationale: professional judgment	Value: 350 days/year (unless otherwise specified in guidance) Rationale: USEPA 1997; DTSC 1992
Exposure Duration (ED)	Value: 9 years Rationale: Average residence time, USEPA 1997	Selected exposure duration from distribution given below, less 6 years for child exposure (truncated at 0 years) Lognormal mean: 9.37 years standard deviation: 2.52 years Source: CalTOX 1994[1]	Value: 24 years (30-year lifetime minus 6 years as child) Rationale: 95th percentile value for residence time, USEPA 1997
Averaging Time (AT)	Value: Carcinogenic Effects: 75 years (27,375 days) Noncarcinogenic Effects: AT = Exposure duration or 9 years (3,285 days) Rationale: USEPA 1997	Carcinogenic Effects: Constant at 75 years Noncarcinogenic Effects: Co-vary with exposure duration	Value: Carcinogenic Effects: 75 years (27,375 days) Noncarcinogenic Effects: AT = Exposure duration or 24 years (8,760 days) Rationale: USEPA 1997

Table C-2
Exposure Assessment Parameters for a Residential Adult
(Page 2 of 4)

Parameter	Central Tendency Exposure (CTE)	Exposure Distribution	Reasonable Maximum Exposure (RME)
Inhalation of Particulates and/or Vapors:			
Breathing Rate (BR)	Value: 0.43 m^3/hr Rationale: Mean value for resting inhalation rate; CalTOX 1994	Lognormal mean: 0.43 m^3/hr standard deviation: 0.09 m^3/hr Source: Resting inhalation rate; CalTOX 1994[1]	Value: 0.55 m^3/hour Rationale: Recommended value for RME (midpoint between male and female values), USEPA 1997
Hours of day spent in or near home	16.3 hours/day Rationale: CalTOX average	Lognormal mean: 16.3 hours/day standard deviation: 2.24 hours/day Source: CalTOX 1994[1]	24 hours./day Rationale: Maximum hours in a day
Dermal Contact with Soil:			
Soil Adherence Factor (AF)	Value: Value from anticipated USEPA Guidance on Dermal Assessment or 0.01 mg/cm^2 Rationale: Weighted soil adherence for face, forearms, hands, and lower legs for "groundskeepers" (USEPA 1997, Table 6-13); typical activity combined with 50th percentile body part-specific soil adherence factors	Empirical Distribution Rationale: Distribution from anticipated USEPA Dermal Guidance or fitted distribution of pooled data from sources cited in that Guidance	Value: Value from anticipated USEPA Guidance on Dermal Assessment or 0.07 mg/cm^2 Rationale: Weighted soil adherence for face, forearms, hands, and lower legs for "gardeners" (USEPA 1997, Table 6-13); typical activity combined with 50th percentile body part-specific soil adherence factors
Skin Surface Area (SA)	Value: 5,700 cm^2 Rationale: Exposed surface area for head, hands, lower legs, and forearms; USEPA 1997	Empirical Distribution Co-vary with body weight Rationale: Distribution developed from percentile values (USEPA 1997, Tables 6-2, 6-3), summed across relevant body parts, and fitted with Crystal Ball	Value: 5,700 cm^2 Rationale: Exposed surface area for head, hands, lower legs, and forearms; USEPA 1997

Table C-2
Exposure Assessment Parameters for a Residential Adult
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Parameter	Central Tendency Exposure (CTE)	Exposure Distribution	Reasonable Maximum Exposure (RME)
Bioavailability (B)	Chemical-specific: 0.1 for VOCs; 0.001 for Cd; 0.03 for As; 0.01 for other metals DTSC 1994	Constant	Chemical-specific: 0.1 for VOCs; 0.001 for Cd; 0.03 for As; 0.01 for other metals DTSC 1994
Incidental Soil Ingestion:			
Ingestion Rate (IR_{soil})	Value: 50 mg/day Rationale: Based on range of plausible soil ingestion rates for adults, USEPA 1997	Lognormal mean: 9.94 mg/day standard deviation: 19.9 mg/day Source: CalTOX 1994[1]	Value: 100 mg/day Rationale: Based on range of plausible soil ingestion rates for adults, USEPA 1997
Bioavailability (B)	Value: Chemical-specific Rationale: Current peer-reviewed literature values for chemical in soil matrix; subject to DTSC approval	Constant	Value: Chemical-specific Rationale: Current peer-reviewed literature values for chemical in soil matrix; subject to DTSC approval
Ingestion of Groundwater During Domestic Use			
Ingestion Rate (IR_{gw})	Value: 1.0 L/day (non-VOCs) Value: 2.0 L/day (VOCs) Rationale: Value for non-VOCs from DTSC (1994) accounts for ingestion pathway only. Value for VOCs accounts for chemical uptake via dermal contact with groundwater and inhalation of vapors during showering by assuming that the dosage associated with these pathways is equal to the dosage received via groundwater ingestion as described in Section 5.3.2.	Empirical Distribution Source: Distribution of water consumption rates as reported by Roseberry and Burmaster (1992)	Value: 1.5 L/day (non-VOCs) Value: 3.1 L/day (VOCs) Rationale: Value for non-VOCs from DTSC (1994) accounts for ingestion pathway only. Value for VOCs accounts for chemical uptake via dermal contact with groundwater and inhalation of vapors during showering by assuming that the dosage associated with these pathways is equal to the dosage received via groundwater ingestion as described in Section 5.3.2.
Bioavailability (B)	Value: Chemical-specific Rationale: Current peer-reviewed literature values for chemical in water matrix; subject to DTSC approval	Constant	Value: Chemical-specific Rationale: Current peer-reviewed literature values for chemical in water matrix; subject to DTSC approval

Table C-2
Exposure Assessment Parameters for a Residential Adult
(Page 4 of 4)

Parameter	Central Tendency Exposure (CTE)	Exposure Distribution	Reasonable Maximum Exposure (RME)
Ingestion of Homegrown Food/Fish:			
Ingestion Rate, Fruit	Value: 1.20 g/kg-day Rationale: 50th percentile value of homegrown fruit consumption in the western U.S., USEPA 1997	Lognormal mean: 4.2 g/kg-day standard deviation: 0.84 g/kg-day Source: Distribution for consumption of fruits and vegetables combined, CalTOX 1994[1]	Value: 5.39 g/kg-day Rationale: 90th percentile value of homegrown fruit consumption in the western U.S., USEPA 1997
Ingestion Rate, Vegetables	Value: 0.9 g/kg-day Rationale: 50th percentile value of homegrown vegetable consumption in the western U.S., USEPA 1997		Value: 4.64 g/kg/day Rationale: 90th percentile value of homegrown vegetable consumption in the western U.S., USEPA 1997
Fractions of fruit and vegetable local	Value: 1 Rationale: Deterministic value is for homegrown produce	Lognormal mean: 0.24 standard deviation: 0.17 Source: CalTOX 1994[1]	Value: 1 Rationale: Deterministic value is for homegrown produce

[1] CalTOX computer model version 1994.
Crystal Ball (Decisioneering, Inc., Denver, CO)

Table C-3
Exposure Assessment Parameters for a Residential Child
(Page 1 of 4)

Parameter	Central Tendency Exposure (CTE)	Exposure Distribution	Reasonable Maximum Exposure (RME)
General Parameters:			
Body Weight (BW)	Value: 15 kg Rationale: Average body weight, USEPA 1997; DTSC 1992	Normal mean: 15.6 kg standard deviation: 2 kg Rationale: Fit of reported percentiles of body weight for 3- to 4-year-olds (midpoint of 1- to 6-year-old receptor) as reported in Anderson et al. 1985	Value: 15 kg Rationale: Average body weight, USEPA 1997; DTSC 1992
Exposure Frequency (EF)	Value: Pathway-specific Rationale: USEPA 1997	Continuous variable between selected pathway specific average exposure duration and 350 days/year Rationale: Professional judgment	Value: 350 days/year Rationale: RME, USEPA 1997; DTSC 1992
Exposure Duration (ED)	Value: 6 years Rationale: RME, USEPA 1997; DTSC 1992	Constant	Value: 6 years Rationale: RME, USEPA 1997; DTSC 1992
Averaging Time (AT)	Value: Carcinogenic Effects: 75 years (27,375 days) Noncarcinogenic Effects: AT = Exposure duration or 6 years (2,190 days) Rationale: Average lifetime, USEPA 1997 Exposure duration, DTSC 1992	Carcinogenic Effects: Constant at 75 years Noncarcinogenic Effects: Co-vary with exposure duration	Value: Carcinogenic Effects: 75 years (27,375 days) Noncarcinogenic Effects: AT = Exposure duration or 6 years (2,190 days) Rationale: Average lifetime, USEPA 1997 Exposure duration; DTSC 1992

Table C-3
Exposure Assessment Parameters for a Residential Child
(Page 2 of 4)

Parameter	Central Tendency Exposure (CTE)	Exposure Distribution	Reasonable Maximum Exposure (RME)
Inhalation of Particulates and/or Vapors:			
Breathing Rate (BR)	Value: 0.35 m^3/hour Rationale: Mean rate for 3- to 5-year-old, USEPA 1997	Lognormal mean: 0.35 m^3/hour standard deviation: 0.07 m^3/hour Source: Adult resting inhalation rate times 0.75 (ratio of recommended mean rates in adults vs children per USEPA 1997); CalTOX 1994[1]	Value: 0.35 m^3/hour Rationale: Mean rate for 3- to 5-year-old, USEPA 1997
Hours of day spent in or near home	Value: 24 h/d Rationale: Small preschool child not anticipated to spend large amounts of time away from home	Constant	24 h/d Rationale: Small preschool child not anticipated to spend large amounts of time away from home
Dermal Contact with Soil:			
Soil Adherence Factor (AF)	Value: Value from anticipated USEPA Guidance on Dermal Assessment or 0.06 mg/cm^2 Rationale: Weighted soil adherence for hands, face, forearms, lower legs, and feet for "day care kids" (USEPA 1997, Table 6-13); typical activity combined with 50th percentile body part-specific soil adherence factors	Empirical Distribution Rationale: Distribution from anticipated USEPA Dermal Guidance or fitted distribution of pooled data from sources cited in that Guidance	Value: Value from anticipated USEPA Guidance on Dermal Assessment or 0.2 mg/cm^2 Rationale: Weighted soil adherence for hands, face, forearms, lower legs, and feet for "children playing in wet soil" (USEPA 1997, Table 6-13); high-end activity combined with 50th percentile body part-specific soil adherence factors
Skin Surface Area (SA)	Value: 2,800 cm^2 Rationale: Exposed skin surface area for hands, head, forearms, lower legs, and feet; USEPA 1997	Empirical Distribution Co-vary with body weight Rationale: Distribution developed from percentile values (USEPA 1997, Tables 6-6, 6-7), adjusted for fraction of skin exposed, and fitted with Crystal Ball	Value: 2,800 cm^2 Rationale: Exposed skin surface area for hands, head, forearms, lower legs, and feet; USEPA 1997

Table C-3
Exposure Assessment Parameters for a Residential Child
(Page 3 of 4)

Parameter	Central Tendency Exposure (CTE)	Exposure Distribution	Reasonable Maximum Exposure (RME)
Bioavailability (ABS)	Chemical-specific: 0.1 for VOCs; 0.001 for Cd; 0.03 for As; 0.01 for other metals DTSC 1994	Constant	Chemical-specific: 0.1 for VOCs; 0.001 for Cd; 0.03 for As; 0.01 for other metals DTSC 1994
Incidental Soil Ingestion:			
Ingestion Rate (IR_{soil})	Value: 100 mg/day Rationale: Average value, USEPA 1997	Lognormal arithmetic mean 86 mg/day standard deviation 191 mg/day Source: CalTOX 1994[1]	Value: 200 mg/day Rationale: RME, DTSC 1992
Bioavailability (B)	Value: Chemical-specific Rationale: Current peer-reviewed literature values for chemical in soil matrix; subject to DTSC approval	Constant	Value: Chemical-specific Rationale: Current peer-reviewed literature values for chemical in soil matrix; subject to DTSC approval
Ingestion of Groundwater During Domestic Use			
Ingestion Rate (IR_{gw})	Value: 0.75 L/day (non-VOCs) Value: 1.5 L/day (VOCs) Rationale: Value for non-VOCs from DTSC (1994) accounts for ingestion pathway only. Value for VOCs accounts for chemical uptake via dermal contact with groundwater and inhalation of vapors during showering by assuming that the dosage associated with these pathways is equal to the dosage received via groundwater ingestion as described in Section 5.3.2.	Empirical Distribution Source: Distribution of water consumption rates as reported by Roseberry and Burmaster (1992)	Value: 1.3 L/day (non-VOCs) Value: 2.5 L/day (VOCs) Rationale: Value for non-VOCs from DTSC (1994) accounts for ingestion pathway only. Value for VOCs accounts for chemical uptake via dermal contact with groundwater and inhalation of vapors during showering by assuming that the dosage associated with these pathways is equal to the dosage received via groundwater ingestion as described in Section 5.3.2.
Bioavailability (B)	Value: Chemical-specific Rationale: Current peer-reviewed literature values for chemical in water matrix; subject to DTSC approval	Constant	Value: Chemical-specific Rationale: Current peer-reviewed literature values for chemical in water matrix; subject to DTSC approval

Table C-3
Exposure Assessment Parameters for a Residential Child
(Page 4 of 4)

Parameter	Central Tendency Exposure (CTE)	Exposure Distribution	Reasonable Maximum Exposure (RME)
Ingestion of Homegrown Food/Fish:			
Ingestion Rate, Fruit	Value: 2.15g/kg-day Rationale: 50th percentile value for adult times 1.79 (ratio of adult to 3- to 5-year-old consumption for all U.S. regions combined), USEPA 1997	Lognormal mean: 7.5 g/kg-day standard deviation: 1.5 g/kg-day Source: Distribution for consumption of fruits and vegetables combined, by children, CalTOX 1994[1]	Value: 5.43 g/kg-day Rationale: 90th percentile value for adult, times 1.008 (ratio of adult to 3- to 5-year-old consumption for all U.S. regions combined), USEPA 1997
Ingestion Rate, Vegetables	Value: 1.01 g/kg-day Rationale: 50th percentile value for adult times 1.13 (ratio of adult to 3- to 5-year-old consumption for all U.S. regions combined), USEPA 1997		Value: 5.66 g/kg-day Rationale: 90th percentile value for adult times 1.22 (ratio of adult to 3- to 5-year-old consumption for all U.S. regions combined), USEPA 1997
Fractions of fruit and vegetable local	Value: 1 Rationale: Deterministic value is for homegrown produce	Lognormal mean: 0.24 standard deviation: 0.17 Source: CalTOX 1994[1]	Value: 1 Rationale: Deterministic value is for homegrown produce

[1] CalTOX computer model version 1994.
Crystal Ball (Decisioneering, Inc., Denver, CO)

Table C-4
Exposure Assessment Parameters for a Recreational Adult
(Page 1 of 3)

Parameter	Central Tendency Exposure (CTE)	Exposure Distribution	Reasonable Maximum Exposure (RME)
General Parameters:			
Body Weight (BW)	Value: 70 kg Rationale: Average body weight, USEPA 1997	Lognormal mean: 71 kg standard deviation: 14.2 Source: CalTOX 1994	Value: 70 kg Rationale: Average body weight, USEPA 1997
Exposure Frequency (EF)	Value: 4 hours/day, 1 day every other week, 50 weeks/year Rationale: Site-specific assumption	Constant weekly frequency, with uniform: minimum 4 hours/day maximum 8 hours/day Rationale: Site-specific assumption	Value: 8 hours/day, 1 days/week, 50 weeks/year Rationale: Site-specific assumption
Exposure Duration (ED)	Value: 9 years Rationale: Average residence time, USEPA 1997	Selected exposure duration from distribution given below, less 6 years for child exposure (truncated at 0 years) Lognormal mean: 9.37 years standard deviation: 2.52 years Source: CalTOX 1994[1]	Value: 24 years (30-year lifetime minus 6 years as child) Rationale: 95th percentile value for residence time, USEPA 1997
Averaging Time (AT)	Value: Carcinogenic Effects: 75 years (27,375 days) Noncarcinogenic Effects: AT = Exposure duration or 9 years (3,285 days) Rationale: USEPA 1997	Carcinogenic Effects: Constant at 75 years Noncarcinogenic Effects: Co-vary with exposure duration	Value: Carcinogenic Effects: 75 years (27,375 days) Noncarcinogenic Effects: AT = Exposure duration or 24 years (8,760 days) Rationale: USEPA 1997

Table C-4
Exposure Assessment Parameters for a Recreational Adult
(Page 2 of 3)

Parameter	Central Tendency Exposure (CTE)	Exposure Distribution	Reasonable Maximum Exposure (RME)
Inhalation of Particulates and/or Vapors:			
Breathing Rate (BR)	Value: 1.3 m^3/hour Rationale: Midpoint between recommended values for RME for light and moderate activity, USEPA 1997	Lognormal mean: 1.28 m^3/hour standard deviation: 0.38 m^3/hour Source: active inhalation rate; CalTOX 1994[1]	Value: 1.3 m^3/hour Rationale: Midpoint between recommended values for RME for light and moderate activity, USEPA 1997
Dermal Contact with Soil:			
Soil Adherence Factor (AF)	Value: Value from anticipated USEPA Guidance on Dermal Assessment or 0.01 mg/cm^2 Rationale: Weighted soil adherence for hands, face, and forearms for "Soccer Nos. 2&3" (USEPA 1997, Table 6-13); typical activity combined with 50th percentile body part-specific soil adherence factors	Empirical Distribution Rationale: Distribution from anticipated USEPA Dermal Guidance or fitted distribution of pooled data from sources cited in that Guidance	Value: Value from anticipated USEPA Guidance on Dermal Assessment or 0.9 mg/cm^2 Rationale: Weighted soil adherence for hands, face, and forearms for "archeologists" (USEPA 1997, Table 6-13); high-end activity combined with 50th percentile body part-specific soil adherence factors
Skin Surface Area (SA)	Value: 5,700 cm^2 Rationale: Exposed skin surface area for hands, head, lower legs, and forearms; USEPA 1997	Empirical Distribution Co-vary with body weight Rationale: Distribution developed from percentile values (USEPA 1997, Tables 6-2, 6-3), summed across relevent body parts, and fitted with Crystal Ball	Value: 5,700 cm^2 Rationale: Exposed skin surface area for hands, head, lower legs, and forearms; USEPA 1997
Bioavailability (B)	Value: 0.1 for VOCs; 0.001 for Cd; 0.03 for As; 0.01 for other metals Rationale: DTSC 1994	Constant	Value: 0.1 for VOCs; 0.001 for Cd; 0.03 for As; 0.01 for other metals Rationale: DTSC 1994
Dermal Contact with Surface Water:			
Event Frequency (EV)	Value: 0.5 Rationale: Site-specific assumption	Constant Rationale: Site-specific assumption	Value: 0.5 Rationale: Site-specific assumption

Table C-4
Exposure Assessment Parameters for a Recreational Adult
(Page 3 of 3)

Parameter	Central Tendency Exposure (CTE)	Exposure Distribution	Reasonable Maximum Exposure (RME)
Time of Event (t_{event})	Value: 1 hr Rationale: Site-specific assumption	Uniform Distribution: Minimum 1 hr Maximum 2 hrs Rationale: Site-specific assumption	Value: 2 hrs Rationale: Site-specific assumption
Skin Surface Area (SA)	Value: 18,150 cm^2 Rationale: Total skin surface area for adult (male and female averaged), based on the 50th percentile of the distribution from USEPA 1997, Tables 6-2 and 6-3	Empirical Distribution Co-vary with body weight Rationale: Distribution developed from percentile values (USEPA 1997, Tables 6-2 and 6-3), and fitted with Crystal Ball	Value: 18,150 cm^2 Rationale: Total skin surface area for adult (male and female averaged), based on the 50th percentile of the distribution from USEPA 1997, Tables 6-2 and 6-3
Bioavailability (ABS)	Value: Chemical-specific: 0.1 for VOCs; 0.001 for Cd; 0.03 for As; 0.01 for other metals Rationale: DTSC 1994[1]	Constant	Value: Chemical-specific: 0.1 for VOCs; 0.001 for Cd; 0.03 for As; 0.01 for other metals Rationale: DTSC 1994[1]
Incidental Soil Ingestion:			
Ingestion Rate (IR_{soil})	Value: 50 mg/day Rationale: Based on range of plausible soil ingestion rates for adults, USEPA 1997	Lognormal mean: 9.94 mg/day standard deviation: 19.9 mg/day Source: CalTOX 1994[1]	Value: 100 mg/day Rationale: Based on range of plausible soil ingestion rates for adults, USEPA 1997
Bioavailability (B)	Value: Chemical-specific Rationale: Current peer-reviewed literature values for chemical in soil matrix; subject to DTSC approval	Constant	Value: Chemical-specific Rationale: Current peer-reviewed literature values for chemical in soil matrix; subject to DTSC approval

[1] CalTOX computer model version 1994.
Crystal Ball (Decisioneering, Inc., Denver, CO)

Table C-5
Exposure Assessment Parameters for a Recreational Child
(Page 1 of 4)

Parameter	Central Tendency Exposure (CTE)	Exposure Distribution	Reasonable Maximum Exposure (RME)
General Parameters:			
Body Weight (BW)	Value: 15 kg Rationale: Average body weight (at midpoint of 1- to 6-year-olds), USEPA 1997; DTSC 1992	Normal mean: 15.6 kg standard deviation: 2 kg Rationale: Fit of reported percentiles of body weight for 3- to 4-year-olds (mid-point of 1- to 6-year-old receptor) as reported in Anderson et al. 1985	Value: 15 kg Rationale: Average body weight (at midpoint of 1- to 6-year-olds); USEPA 1997; DTSC 1992
Exposure Frequency (EF)	Value: 4 hours/day, 1 day/week, 50 weeks/year Rationale: Site-specific assumption	Uniform: minimum 4 hours/week maximum 8 hours/week Rationale: Site-specific assumption	Value: 8 hours/day, 2 days/week, 50 weeks/year Rationale: Site-specific assumption
Exposure Duration (ED)	Value: 6 years Rationale: RME, USEPA 1997; DTSC 1992	Constant	Value: 6 years Rationale: RME, USEPA 1997; DTSC 1992
Averaging Time (AT)	Value: Carcinogenic Effects: 75 years (27,375 days) Noncarcinogenic Effects: AT = Exposure duration or 6 years (2,190 days) Rationale: Average lifetime, USEPA 1997; Exposure duration, DTSC 1992	Carcinogenic Effects: Constant at 75 years Noncarcinogenic Effects: Co-vary with exposure duration	Value: Carcinogenic Effects: 75 years (27,375 days) Noncarcinogenic Effects: AT = Exposure duration or 6 years (2,190 days) Rationale: Average lifetime, USEPA 1997; Exposure duration, DTSC 1992

Table C-5
Exposure Assessment Parameters for a Recreational Child
(Page 2 of 4)

Parameter	Central Tendency Exposure (CTE)	Exposure Distribution	Reasonable Maximum Exposure (RME)
Inhalation of Particulates and/or Vapors:			
Breathing Rate (BR)	Value: 1.1 m^3/hour Rationale: Midpoint between recommended values for RME for light and moderate activity in children; USEPA 1997	Lognormal mean: 1.08 m^3/hour standard deviation: 0.32 m^3/hour Source: Active inhalation rate in adults times 0.86 (ratio of child to adult recommended rates in USEPA 1997); CalTOX 1994[1]	Value: 1.1 m^3/hour Rationale: Midpoint between recommended values for RME for light and moderate activity in children, USEPA 1997
Dermal Contact with Soil:			
Soil Adherence Factor (AF)	Value: Value from anticipated USEPA Guidance on Dermal Assessment or 0.06 mg/cm^2 Rationale: Weighted soil adherence for hands, face, forearms, lower legs, and feet for "day care kids" (USEPA 1997, Table 6-13); typical activity combined with 50th percentile body part-specific soil adherence factors	Empirical Distribution Rationale: Distribution from anticipated USEPA Dermal Guidance or fitted distribution of pooled data from sources cited in that Guidance	Value: Value from anticipated USEPA Guidance on Dermal Assessment or 0.2 mg/cm^2 Rationale: Weighted soil adherence for hands, face, forearms, lower legs, and feet for "children playing in wet soil" (USEPA 1997, Table 6-13); high-end activity combined with 50th percentile body part-specific soil adherence factors
Skin Surface Area (SA)	Value: 2,800 cm^2 Rationale: Exposed skin surface area for hands, head, forearms, lower legs, and feet; USEPA 1997	Empirical Distribution Co-vary with body weight Rationale: Distribution developed from percentile values (USEPA 1997, Tables 6-6, 6-7), adjusted for fraction of skin exposed, and fitted with Crystal Ball	Value: 2,800 cm^2 Rationale: Exposed skin surface area for hands, head, forearms, lower legs, and feet; USEPA 1997

Table C-5
Exposure Assessment Parameters for a Recreational Child
(Page 3 of 4)

Parameter	Central Tendency Exposure (CTE)	Exposure Distribution	Reasonable Maximum Exposure (RME)
Bioavailability (ABS)	Value: Chemical-specific: 0.1 for VOCs; 0.001 for Cd; 0.03 for As; 0.01 for other metals Rationale: DTSC 1994[1]	Constant	Value: Chemical-specific: 0.1 for VOCs; 0.001 for Cd; 0.03 for As; 0.01 for other metals Rationale: DTSC 1994[1]
Dermal Contact with Surface Water:			
Event Frequency (EV)	Value: 0.5 Rationale: Site-specific assumption	Constant Rationale: Site-specific assumption	Value: 0.5 Rationale: Site-specific assumption
Time of Event (t_{event})	Value: 1 hr Rationale: Site-specific assumption	Uniform Distribution: Minimum 1 hr Maximum 2 hrs Rationale: Site-specific assumption	Value: 2 hrs Rationale: Site-specific assumption
Skin Surface Area (SA)	Value: 6,560 cm^2 Rationale: Total skin surface area based on the 50th percentile of the distribution for 1- to 6-year-olds from USEPA 1997, Tables 6-6 and 6-7	Empirical Distribution Co-vary with body weight Rationale: Distribution developed from percentile values (USEPA 1997, Tables 6-6, 6-7), and fitted with Crystal Ball	Value: 6,560 cm^2 Rationale: Total skin surface area based on the 50th percentile of the distribution for 1- to 6-year-olds from USEPA 1997, Tables 6-6 and 6-7
Bioavailability (ABS)	Value: Chemical-specific: 0.1 for VOCs; 0.001 for Cd; 0.03 for As; 0.01 for other metals Rationale: DTSC 1994[1]	Constant	Value: Chemical-specific: 0.1 for VOCs; 0.001 for Cd; 0.03 for As; 0.01 for other metals Rationale: DTSC 1994[1]

Table C-5
Exposure Assessment Parameters for a Recreational Child
(Page 4 of 4)

Parameter	Central Tendency Exposure (CTE)	Exposure Distribution	Reasonable Maximum Exposure (RME)
Incidental Soil Ingestion:			
Ingestion Rate (IR_{soil})	Value: 100 mg/day Rationale: Average value, USEPA 1997	Lognormal arithmetic mean: 86 mg/day standard deviation: 191 mg/day Source: CalTOX 1993	Value: 200 mg/day Rationale: RME, DTSC 1992
Bioavailability (B)	Value: Chemical-specific Rationale: Current peer-reviewed literature values for chemical in soil matrix; subject to DTSC approval	Constant	Value: Chemical-specific Rationale: Current peer-reviewed literature values for chemical in soil matrix; subject to DTSC approval

[1] CalTOX computer model version 1994.
Crystal Ball (Decisioneering, Inc., Denver, CO)

Table C-6

Exposure Assessment Parameters for Ecological Receptors

(Page 1 of 2)

Reference Species	Great Blue Heron	Deer Mouse	Hermit Thrush
Body Weight (kg)	2.204 (USEPA 1993)	0.0179 (Nagy 2001)	0.029 (Dunning 1993)
Food Intake Rate[a] (kg/d)	0.141	0.0038	0.0063
Prey Items (F) (fraction of diet)[b]	Fish (0.70) Deer mouse (0.15) Invertebrates (0.10) Sediment (0.05) (Zeiner et al 1990)	Invertebrates (0.30) Vegetation (0.70) Soil (0.02) (Beyer et al 1994)	Invertebrates (0.61) Vegetation (0.39) Soil (0.04)
Area Use[c] (0)	Dependent on habitat and size of the site	1	1
Seasonability[d] (Ψ)	1	1	1
Lifespan		1.6 years (Brown and Zeng 1989) Assume 0.75 amount of time per day in burrow	
Soil Depth Interval	NA (sediment)	0-2, 0-4, or 0-6 feet bgs (determined on a site-by-site basis)	0-2 feet bgs

Table C-6

Exposure Assessment Parameters for Ecological Receptors

(Page 2 of 2)

Reference Species	Red-Tailed Hawk	Bobcat	Mule Deer
Body Weight (kg)	1.224 (USEPA 1993)	10.0 (Jameson and Peeters 1988)	39.1 (Nagy 2001)
Food Intake Rate[a] (kg/d)	0.094	0.332	1.565
Prey Items (F) (fraction of diet)[b]	Deer mice (1.0) (surrogate for rodents)	Deer mice (1.0) (surrogate for rodents)	Vegetation (1.0)
Area Use[c] (0)	Dependent on habitat and size of the site	Dependent on habitat and size of the site	At least 40 ha. Dependent on habitat and size of the site
Seasonability[d] (Ψ)	1	1	1
Lifespan	18 years (USEPA 1993)	10-14 years (Zeiner et al 1990)	Approximately 8 years (Chapman & Feldhamer 1992)
Soil Depth Interval	NA	NA	0-2 feet bgs

Notes:
(a) Based on Nagy (2001).
(b) The percentage of prey items in the diet is based on the appropriate references, where indicated and assumptions used for exposure models.
(c) Area use is the fraction of time the species at the SSFL spends at an investigational unit (see Appendix D).
(d) Seasonability is the fraction of the year the species spends at the SSFL.

kg = kilograms' bgs = below ground surface
NA = Not applicable – either (i) not exposed to soil (great blue heron is exposed to sediments) or (ii) dermal contact and incidental ingestion of soil are considered to be negligible exposure pathways compared to the ingestion of prey (see Section 10.2 for further discussion of soil depth intervals).

USEPA = United States Environmental Protection Agency

Table C-7
WHO 2005 Toxic Equivalency Factors
(Page 1 of 1)

Compound	WHO 2005 TEF
chlorinated dibenzo-p-dioxins	
1,2,3,7,8-PeCDD	1
1,2,3,4,7,8-HxCDD	0.1
1,2,3,6,7,8-HxCDD	0.1
1,2,3,7,8,9-HxCDD	0.1
1,2,3,4,6,7,8-HpCDD	0.01
OCDD	0.0003
chlorinated dibenzofurans	
2,3,7,8-TCDF	0.1
1,2,3,7,8-PeCDF	0.03
2,3,4,7,8-PeCDF	0.3
1,2,3,4,7,8-HxCDF	0.1
1,2,3,6,7,8-HxCDF	0.1
1,2,3,7,8,9-HxCDF	0.1
2,3,4,6,7,8-HxCDF	0.1
1,2,3,4,6,7,8-HpCDF	0.01
1,2,3,6,7,8,9-HpCDF	0.01
OCDF	0.0003
non-ortho substituted PCBs	
PCB 77	0.0001
PCB 81	0.0003
PCB 126	0.1
PCB 169	0.03
mono-ortho substituted PCBs	
105	0.00003
114	0.00003
118	0.00003
123	0.00003
156	0.00003
157	0.00003
167	0.00003
189	0.00003

Source: Van den Berg et al. 2006.

Table C-8
Soil Risk-Based Screening Levels
(Page 1 of 3)

	Human Health (RME)			Screening-Level ERA		Baseline ERA	
Analyte	Risk-Based Screening Level Worker mg/kg	Risk-Based Screening Level Recreator mg/kg	Risk-Based Screening Level Resident mg/kg	SLERA TRV-Based Risk-Based Screening Level mg/kg	Receptor	BERA TRV-Based Risk-Based Screening Level mg/kg	Receptor
Inorganic Compounds							
Aluminum	490,000	1,100,000	75,000	14	Deer Mouse		
Antimony	200	430	30	0.096	Deer Mouse	0.77	Deer Mouse
Barium	96,000	660,000	15,000	15	Deer Mouse		
Cadmium	4.0	36	2.6	0.0031	Mule Deer	0.052	Mule Deer
Copper	20,000	43,000	3,000	1.1	Thrush	8.2	Deer Mouse
Lead	3,500	NE	150	0.063	Thrush		
Mercury	150	320	23	0.89	Thrush		
Molybdenum	2,500	5,400	380	0.11	Deer Mouse		
Nickel	9,900	21,000	1,500	0.10	Deer Mouse	5.2	Deer Mouse
Selenium	2,500	5,400	380	0.18	Deer Mouse		
Silver	2,500	5,400	380	0.55	Deer Mouse	96	Deer Mouse
Thallium	40	86	6.1	3.2	Deer Mouse		
Vanadium	500	1,100	76	1.6	Deer Mouse	16	Deer Mouse
Zinc	150,000	320,000	23,000	22	Deer Mouse	26	Thrush
VOCs							
Benzene	0.00042	0.13	0.00013	4.6	Deer Mouse		
Methylene chloride	0.013	2.8	0.0040	27	Deer Mouse		
Trichloroethene	0.0073	2.5	0.0022	3.2	Deer Mouse		
SVOCs							
2,4-Dinitrophenol	770	400	110	0.59	Thrush		
Acenaphthene	23,000	12,000	3,400	2.5	Thrush		
Acenaphthylene	12,000	6,000	1,700	810	Deer Mouse		
Anthracene	120,000	60,000	17,000	2.4	Thrush		
Benzo(a)anthracene	0.96	1.7	0.60	1.7	Bobcat		
Benzo(a)pyrene	0.096	0.17	0.006	4.7	Bobcat		
Benzo(e)pyrene	NTV	NTV	NTV	NTV	-		
Benzo(b)fluoranthene	0.96	1.7	0.60	5.5	Bobcat		
Benzo(g,h,i)perylene	NTV	NTV	NTV	6.4	Bobcat		
Benzo(k)fluoranthene	0.96	1.7	0.60	3.7	Bobcat		
Chrysene	9.6	17	6.0	2.4	Deer Mouse		

Table C-8
Soil Risk-Based Screening Levels
(Page 2 of 3)

	Human Health (RME)			Screening-Level ERA		Baseline ERA	
Analyte	Risk-Based Screening Level Worker mg/kg	Risk-Based Screening Level Recreator mg/kg	Risk-Based Screening Level Resident mg/kg	SLERA TRV-Based Risk-Based Screening Level mg/kg	Receptor	BERA TRV-Based Risk-Based Screening Level mg/kg	Receptor
Dibenz(a,h)anthracene	0.28	0.51	0.17	1.7	Bobcat		
Fluoranthene	15,000	8,000	2,300	130	Deer Mouse		
Fluorene	15,000	8,000	2,300	1.6	Thrush		
Indeno(1,2,3-cd)pyrene	0.96	1.7	0.60	3.9	Bobcat		
Naphthalene	9.6	17	6.0	240	Deer Mouse		
Phenanthrene	12,000	6,000	1,700	1.3	Thrush		
Pyrene	12,000	6,000	1,700	79	Deer Mouse		
Total Petroleum Hydrocarbons							
C08-C11(Gasoline Range)	3.5	850	1.1	NTV	-		
C11-C30 [Sum of C11-C14(Kerosene Range), C14-C20(Diesel Range), and C20-C30(Lubricant Oil Range)]	2,200	4,000	1,400	NTV	-		
Dioxins							
2,3,7,8-TCDD	0.000011	0.000024	0.0000069	0.0000034	Mule Deer		
1,2,3,7,8-PeCDD	0.00022	0.00049	0.00014	0.0000034	Mule Deer		
1,2,3,4,7,8-HxCDD	0.00011	0.00024	0.000069	0.000034	Mule Deer		
1,2,3,6,7,8-HxCDD	0.00011	0.00024	0.000069	0.000034	Mule Deer		
1,2,3,7,8,9-HxCDD	0.00011	0.00024	0.000069	0.000035	Mule Deer		
1,2,3,4,6,7,8-HpCDD	0.0011	0.0024	0.00069	0.0010	Mule Deer		
OCDD	0.11	0.24	0.069	0.14	Mule Deer		
2,3,7,8-TCDF	0.00011	0.00024	0.000069	0.0000044	Thrush		
1,2,3,7,8-PeCDF	0.00022	0.00049	0.00014	0.000069	Mule Deer		
2,3,4,7,8-PeCDF	0.000022	0.000049	0.000014	0.0000069	Mule Deer		
1,2,3,4,7,8-HxCDF	0.00011	0.00024	0.000069	0.000034	Mule Deer		
1,2,3,6,7,8-HxCDF	0.00011	0.00024	0.000069	0.000034	Mule Deer		
2,3,4,6,7,8-HxCDF	0.00011	0.00024	0.000069	0.000034	Mule Deer		
1,2,3,7,8,9-HxCDF	0.00011	0.00024	0.000069	0.000034	Mule Deer		
1,2,3,4,6,7,8-HpCDF	0.0011	0.0024	0.00069	0.00034	Mule Deer		
1,2,3,4,7,8,9-HpCDF	0.0011	0.0024	0.00069	0.00034	Mule Deer		
OCDF	0.11	0.24	0.069	0.099	Mule Deer		
TEQ - Screening level based on 2,3,7,8-TCDD	0.000011	0.000024	0.0000069	0.0000034	Mule Deer		

Table C-8
Soil Risk-Based Screening Levels
(Page 3 of 3)

	Human Health (RME)			Screening-Level ERA		Baseline ERA	
Analyte	Risk-Based Screening Level Worker mg/kg	Risk-Based Screening Level Recreator mg/kg	Risk-Based Screening Level Resident mg/kg	SLERA TRV-Based Risk-Based Screening Level mg/kg	Receptor	BERA TRV-Based Risk-Based Screening Level mg/kg	Receptor
PCBs							
Aroclor-1016	16	14	3.9	1.6	Deer Mouse		
Aroclor-1221	0.57	0.98	0.35	1.6	Deer Mouse		
Aroclor-1232	0.57	0.98	0.35	0.079	Deer Mouse		
Aroclor-1242	0.57	0.98	0.35	0.080	Deer Mouse		
Aroclor-1248	0.57	0.98	0.35	0.012	Deer Mouse		
Aroclor-1254	0.57	0.98	0.35	0.079	Deer Mouse	0.38	Thrush
Aroclor-1260	0.57	0.98	0.35	0.079	Deer Mouse	0.38	Thrush
Aroclor-1262	0.57	0.98	0.35	0.079	Deer Mouse		

VOCs = volatile organic compounds
SVOCs = semi-volatile organic compounds
PCBs = polychlorinated biphenyls
NTV = No Toxicity Value
RME = reasonable maximum exposure
BERA = Baseline ecological risk assessment
SLERA = Screening-level ecological risk assessment
TRV = toxicity reference value

Table C-9
Soil Vapor Risk-Based Screening Levels
(Page 1 of 1)

Analyte	Human Health (RME) Risk-Based Screening Level Resident µg/L
Benzene	0.095
Methylene chloride	2.7
Trichloroethene	1.4

indoor air pathway only
RME = reasonable maximum exposure

GROUP 6 – NORTHEASTERN PORTION OF AREA IV
RCRA FACILITY INVESTIGATION RISK ASSESSMENT REPORT
SANTA SUSANA FIELD LABORATORY
VENTURA COUNTY, CALIFORNIA

VOLUME IV – APPENDICES B THROUGH D

APPENDIX C, ATTACHMENT C1

NEW CONSERVATION YARD (SWMU 7.8)

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* A standard list of risk tables, figures, and attachments is used for all the RFI site reports for ease of comparison. If a table, figure, or attachment is not included in this site report it was not necessary for the risk assessments.

LIST OF ACRONYMNS AND ABBREVIATIONS

ADD	average daily dosage or applied daily dosage
bgs	below ground surface
BAF	bioaccumulation factor
COPC	chemical of potential concern
CPEC	chemical of potential ecological concern
CSF	cancer slope factor
CSM	conceptual site model
CTE	central tendency exposure
DCA	dichloroethane
DCE	dichloroethene
Dioxins	polychlorinated dibenzo-p-dioxins/dibenzofurans
DTSC	Department of Toxic Substance Control
EPC	exposure point concentration
EPV	exposure point values
ERA	ecological risk assessment
ESL	ecological screening level
HI	hazard index
HQ	hazard quotient
HRA	human health risk assessment
HSDB	Hazardous Substances Data Bank
gpm	gallons per minute
IRIS	Integrated Risk Information System
LADD	lifetime average daily dosage
LOAEL	lowest observable adverse effect level
mg/kg	milligrams per kilogram
mg/kg-day	milligrams per kilogram per day
mg/L	milligrams per liter
NOAEL	no observable adverse effect level
NCY	New Conservation Yard
p	probability
PAH	polynuclear aromatic hydrocarbon
PCB	polychlorinated biphenyl
PCE	tetrachloroethene
PEF	particulate emission factor
RCRA	Resource Conservation and Recovery Act
RfD	reference dose
RFI	RCRA facility investigation
RME	reasonable maximum exposure
SQL	sample quantitation limit
SRAM	Standardized Risk Assessment Methodology
SSFL	Santa Susana Field Laboratory
SVOC	semivolatile organic compound

LIST OF ACRONYMNS AND ABBREVIATIONS (Continued)

SWMU	Solid Waste Management Unit
SWRCB	State Water Resources Control Board
TCA	trichloroethane
TCE	trichloroethene
TDS	total dissolved solids
TPH	total petroleum hydrocarbons
TRV	toxicity reference value
UCL	upper confidence limit
USEPA	United States Environmental Protection Agency
VOC	volatile organic compound
µg/L	micrograms per liter

C1.0 INTRODUCTION

This attachment to Appendix C of the Group 6 Resource Conservation Recovery Act (RCRA) Facility Investigation (RFI) Report presents the human health risk assessment (HRA) and ecological risk assessment (ERA) for the New Conservation Yard (NCY) RFI Site (Area IV Solid Waste Management Unit [SWMU] 7.8) at the Santa Susana Field Laboratory (SSFL). The RCRA Corrective Action Program at the SSFL is being conducted under the oversight of the California Environmental Protection Agency, Department of Toxic Substances Control (DTSC).

The risk assessments were performed following the methods described in the Standardized Risk Assessment Methodology, Revision 2 (SRAM) for the Santa Susana Field Laboratory (SSFL) (MWH 2005); any additional procedures or differences from the SRAM are described in the Appendix C text. Supporting background information and data for the risk assessment were presented in Sections 1 through 3 of Appendix A1. Laboratory data are presented in Attachment 3 of Appendix A1. The following sections describe the HRA and ERA performed for the NCY RFI site at the SSFL. Key findings of the HRA and ERA are presented in Appendix A1, Section 4.

This attachment contains the following sections:

Section 1	Introduction
Section 2	Data Usability Assessment
Section 3	Human Health Risk Assessment
Section 4	Ecological Risk Assessment
Section 5	References

Risk assessment Tables C1-1 through C1-22 are provided both in electronic and printed format. The printed tables follow the text of this appendix. The electronic copies of the tables, and associated calculation spreadsheets (S-C1-1 through S-C1-109) used to generate these tables, are included as electronic copies provided in Appendix C, Attachment C8.

Please note that a standard list of risk assessment tables, figures, spreadsheets, and attachments is used for all SSFL RFI site risk assessment reports for terrestrial sites[i]. Not all tables, figures, spreadsheets, or attachments are applicable to all site risk assessments. Therefore, some items may be missing or not in consecutive order in the following text.

C2.0 DATA USABILITY ASSESSMENT FOR RISK ASSESSMENT

Chemical data collected at the NCY RFI site were evaluated for their usability for risk assessment. Colocated duplicates, laboratory confirmation, or agency split sample soil data were used to evaluate data quality, but are not used quantitatively in the risk assessments.

All NCY RFI site soil, Chatsworth formation groundwater underlying NCY, and Group 6 RFI report area Chatsworth formation groundwater data were determined to be usable for risk assessment. These data are presented in Attachment 3 of Appendix A1 and Appendix B for soil and groundwater, respectively. Soil data for various chemical groups are presented in Figures A1.3-1 through A1.3-4 of Appendix A1. Section C-4.3 of Appendix C presents how site data were selected for risk assessment calculations.

Due to low yield (less than 200 gallons/day) the NCY near-surface groundwater was not considered for direct exposure via domestic use. Indirect exposure to VOCs via subsurface migration from near surface groundwater is not a potentially complete exposure pathway because near surface groundwater is only present during periods of high precipitation and only in the vicinity of the drainage areas at the NCY RFI site. PZ-115 at the NCY RFI site has been dry since it was installed in 2001 (MWH 2003). Therefore, exposures to near surface groundwater are not evaluated at the NCY RFI site.

Chatsworth formation groundwater monitoring wells and analytical data representative of the NCY RFI site as well as all of Group 6 reporting area were selected following the methods described in the SRAM (MWH 2005). The NCY data were selected to evaluate indirect exposures (i.e. vapor) and the Group 6 data to evaluate potential domestic use of groundwater. In summary, the most recent available 3 years of monitoring data are used for all wells determined to be representative of groundwater beneath the site. These data are further supplemented with previous years' data in cases where chemicals of potential concern

[i] See NCY-RiskBook00-README.xls file for a list of tables and spreadsheets used in the risk assessment for NCY.

(COPCs) identified in soil or soil vapor at the site were not sampled in the most recent 3 years.

C3.0 HUMAN HEALTH RISK ASSESSMENT

The following sections describe the HRA for the NCY RFI site.

C3.1 SELECTION OF CHEMICALS OF POTENTIAL CONCERN

The selection of Chemicals of Potential Concern (COPCs) is the process of identifying those media-specific chemicals that may pose a risk or hazard to human receptors. COPCs selected for the HRA at the NCY RFI site are presented in Table C1-1.

The COPC selection process is summarized in Spreadsheets C1-1 through C1-4 for soil at 0 to 2 feet below ground surface (bgs), soil at 0 to 10 feet bgs, and groundwater. Comparison of observed chemical concentrations to background chemical concentrations for soil at 0 to 2 feet bgs, and soil at 0 to 10 feet bgs are presented in Spreadsheets C1-5 and C1-6, respectively.

As described in Section 3.3 of the SRAM (MWH 2005), when conducting the statistical comparison to background, the Gehan adjustment was to be applied to non-detected values where greater than 40 percent of the site or background data are non-detect. For the NCY RFI site process the Gehan adjustment was conducted on all non-detected concentrations evaluated in the Wilcoxon Rank Sum Test. Also, the Gehan adjustment could not be performed on polychlorinated dibenzo-p-dioxins/dibenzofurans (dioxins) results due to the method of combining detect and non-detect results for dioxins when comparing site data with background. This does not affect the results.

Several chemicals were determined to be present at concentrations consistent with background by Wilcoxon Rank Sum Test and were selected as a COPC. This is because these chemicals either had maximum concentrations significantly above the maximum background concentrations and were in areas of known or suspected metals impacts or had elevated detection limits.

C3.2 CONCEPTUAL SITE MODEL FOR HUMAN HEALTH RISK ASSESSMENT

Following COPC selection, a RFI site-specific conceptual site model (CSM) was developed to identify potential human receptors, exposure scenarios, and possible exposure pathways. The human health CSM for the NCY RFI site is presented in Table C1-2.

C3.3 EXPOSURE ASSESSMENT

This section presents the risk assessment for the NCY RFI site. This entire site has been considered as one exposure area. Therefore, the HRA assumes that receptors are exposed to chemicals over the entire 2.0 acre site.

C3.3.1 Exposure Point Concentrations for Direct Contact Media

For COPCs in soil, Chatsworth formation groundwater underlying the NCY RFI site and Group 6 RFI report area summary statistical calculations, distribution testing and 95 percent upper confidence limit of the arithmetic mean concentration (95% UCL) calculations for the purposes of estimating exposure point concentrations [EPCs] were calculated utilizing the most current version of USEPA's ProUCL Version 3.0 software. Recommendations for appropriate distributions and 95% UCLs provided by the program were utilized. The 95% UCL concentration is used in the calculation of the reasonable maximum exposure (RME).

The chemical-specific exposure concentration for the most likely (average) exposure, also referred to as the central tendency exposure (CTE) concentration, was characterized as the arithmetic mean soil concentration. As recommended in DTSC guidance (1992), one-half of the analytical reporting limit concentration was used as a representative concentration for non-detect results for COPCs.

In cases where only one sample was available, the single measured sample result was used for both the CTE and RME EPCs. In cases where only two samples were available, the CTE EPC was estimated as the arithmetic mean of the two measured values, and the RME EPC was estimated as the maximum measured value.

For COPCs in Chatsworth formation groundwater underlying the NCY RFI site and the Group 6 report area, the maximum detected value was selected as the exposure point concentration. EPCs for soil at 0 to 2 feet bgs and soil at 0 to 10 feet bgs, at the NCY RFI site are presented in Table C1-3 and summarized in Spreadsheets C1-10 through C1-11. Dioxin congener group[ii] TEF summations for soil 0 to 2 feet bgs, and soil 0 to 10 feet bgs are presented in Spreadsheets C1-8 and C1-9, respectively Aroclor to polychlorinated biphenyl (PCB) congeners extrapolation calculations for soil at 0 to 2 feet bgs and soil at 0 to 10 feet bgs are presented in C1-14 and C1-16, respectively. Total petroleum hydrocarbon (TPH) were not detected in NCY soils, therefore, TPH to petroleum constituent extrapolation calculations were not conducted. EPCs for Group 6 Chatsworth formation groundwater are summarized in spreadsheet C1-13.

C3.3.2 Exposure Point Concentrations for Indirect Contact Media

EPCs for the following indirect contact media are discussed in this section: airborne fugitive dusts, ambient air, indoor air, and edible plants (i.e., homegrown consumption). Airborne particulate COPC concentrations were estimated for non-volatile COPCs. Derivation of the particulate emission factor (PEF) for soil is presented in Spreadsheet C1-18, and estimation of airborne particulate COPC concentrations for soil is presented in Spreadsheets C1-19.

Ambient air COPC concentrations were estimated for volatile COPCs by modeling migration from soil at 0 to 10 feet bgs to ambient air, and from groundwater water to ambient air. Parameter values used for soil to air migration and estimation of ambient air EPCs related to soils are presented in Spreadsheets C1-20 and C1-21, respectively. Parameter values used for groundwater to ambient air migration and estimation of ambient air EPCs related to groundwater are presented in Spreadsheets C1-22 and C1-23, respectively.

Indoor air COPC concentrations were estimated for volatile COPCs by modeling migration from soil at 0 to 10 feet bgs, and Chatsworth formation groundwater underlying the NCY RFI site to hypothetical residential and commercial buildings. Soil vapor data were not available for NCY. Therefore, soil data were used for indoor air modeling. Results for soil and NCY RFI Chatsworth formation groundwater COPC migration to indoor air for

[ii] Note: Toxic Equivalency Factors (TEFs) from Van den Berg et al. 2006 were used in this risk assessment.

commercial and residential buildings are presented in Spreadsheets C1-26, C1-27, C1-28 and C1-29, respectively.

Derivation of edible plant concentrations is calculated utilizing soil to plant uptake factors as described in the SRAM (MWH 2005). COPC concentrations in edible plant tissues from soil at 0 to 2 feet bgs is presented in Spreadsheets C1-30.

C3.3.3 Human Intake of COPCs

EPCs were applied to human intake equations, as presented in the SRAM, to calculate lifetime average daily dosages (LADDs) and average daily dosages (ADDs). A concentration-toxicity screen to determine the appropriate soil depth for assessing exposures for the worker and resident (i.e., 0 to 2 feet bgs or 0 to 10 feet bgs) is presented in Spreadsheet C1-31. The results indicated that the 0 to 2 feet bgs soil depth poses a greater potential for exposure and risk than does the 0 to 10 feet bgs soil depth. Therefore, potential exposure to the 0 to 2 feet bgs soil depth was evaluated for the worker and resident.

Pathway- and chemical-specific LADDs and ADDs are presented in Spreadsheets C1-32 through C1-36 for adult workers, adult recreators, child recreators, adult residents, and child residents. Pathway-specific spreadsheets used to calculate intakes for these receptors are presented in Spreadsheets C1-37 through C1-74.

C3.4 RISK CHARACTERIZATION

Potential human health cancer and non-cancer risks were estimated by application of DTSC-approved toxicity values to the LADDs and ADDs presented in Section 3.3.3 of this attachment. Human health toxicity values utilized in this risk assessment are presented in Table C1-4. Risk estimates are presented in Section 3.4.1, and an evaluation of the uncertainty associated with these risk estimates is presented in Section 3.4.2 of this appendix. Generally, estimated cancer risks within the range 10^{-6} to 10^{-4}, and HIs less than 1, are considered to be acceptable for the purpose of making remedial decisions (USEPA 1993).

C3.4.1 Estimates of Human Health Risks

Total pathway- and chemical-specific cancer risks and hazard quotients (HQs), as well as cumulative cancer risks, and hazard indices (HIs), and estimated blood lead levels, are presented in Tables C1-5 through C1-10 for the adult worker, adult recreator, child recreator, adult resident, and child resident.

Estimated cancer risks for all receptors for exposures to surficial media and indirect exposures to VOCs in groundwater range from 1×10^{-7} (CTE) to 7×10^{-5} (RME) and HIs range from <0.0001 (CTE) to 0.81 (RME). For the receptor with the greatest potential exposure and risk (child resident), total cancer risk ranged from 1×10^{-5} to 7×10^{-5} and total HI ranged from 0.11 to 0.81. The chemicals contributing to these potential risks are dioxins and cadmium in soil.

Blood lead levels associated with soil exposures are less than 10 µg/dl for all receptors. Estimated blood lead levels for the child resident range up to 4.8 µg/dl.

Risks based on direct use of Chatsworth formation groundwater as a drinking water source range from 8×10^{-7} (CTE) to 3×10^{-6} (RME) and HIs range from 1.4 (CTE) to 8.2 (RME). For the receptor with the greatest potential exposure and risk (child resident), risks range from 2×10^{-6} (CTE) to 3×10^{-6} (RME) and HIs range from 4.9 to 8.2. The chemical contributing most substantially to these potential risks is trichloroethylene (TCE) in groundwater.

The risks based on both exposure to all relevant surficial media plus both indirect and direct exposures to chemicals in groundwater for all receptors range from 1×10^{-7} to 7×10^{-5} and HIs range from < 0.0001 to 9.0. For the receptor with the greatest potential exposure and risk (child resident), risks range from 1×10^{-5} (CTE) to 7×10^{-5} (RME) and HIs range from 5.0 to 9.0. The chemicals contributing to these potential risks are dioxins and cadmium in soil and TCE in groundwater.

C3.4.2 Potential Sediment Migration

There is potential for the migration of chemicals from the NCY RFI site to a downgradient RFI site via sediment migration via drainages on the southern portion of the site which lead

away from the Group 6 RFI report area toward Silvernale Pond. The NCY risk estimates provide upper-bound risk estimates for any potential downgradient risks. Further, the presence and migration of the COPCs in the drainage will be considered in all downstream group RFI reports.

C3.4.3 Uncertainty Analysis

There is some degree of uncertainty associated with nearly all exposure parameter values, toxicity values, and exposure assumptions used in the risk assessment process. In nearly all cases, exposure and toxicity values are upper-bound estimates that result in a conservative estimate of risk. Thus, any uncertainty in the risk assessment is accounted for by use of data and assumptions that are protective of human health. Generally, quantitative risk estimates are considered to be overstated.

Four major uncertainty issues were identified for the HRA performed at the NCY RFI site. These uncertainties are described below, and a qualitative analysis of the uncertainty associated with other key exposure assumptions and toxicity values used to estimate human health cancer and non-cancer risk is presented in Table C1-11.

1. A number of inorganics (e.g., barium, copper, lead, mercury and nickel) that were demonstrated to be consistent with background concentrations through Wilcoxon Rank Sum test were included as COPCs because the maximum detected concentrations were substantially above the maximum detected background concentration and the samples were located in areas of suspected metals impacts.

2. While measured and non-detect polynuclear aromatic hydrocarbon (PAH) concentrations are available for samples in and around the ash pile, PAHs were not analyzed for in Ash Pile samples that contain the highest concentrations of dioxins. It is therefore likely that the highest PAH concentrations are not accounted for. Risks due to PAH exposure are likely underestimated. However, given the presence of elevated dioxins which results in cancer estimates greater than 1×10^{-5} in the Ash Pile, more information regarding the levels of PAHs would not likely alter CMS recommendations.

3. The maximum detected concentration of each COPC detected in groundwater was utilized as the EPC. This is likely to result in an overestimation of potential exposures.

4. Potential impacts of the Topanga fire on the selection of COPCs and risks have been evaluated. Although, as shown in Appendix D, soil concentrations of metals and

dioxins have been impacted by the fire and therefore risks have been increased, there were no identified risk assessment decisions based solely on post-Topanga fire data. However, the only elevated drainage result for lead was a post-fire sample.

C4.0 ECOLOGICAL RISK ASSESSMENT

The following sections describe the ERA performed for the NCY RFI site.

C4.1 SELECTION OF CHEMICALS OF POTENTIAL ECOLOGICAL CONCERN

The selection of chemicals of potential ecological concern (CPECs) is the process of identifying media-specific chemical contaminants that may pose a risk or hazard to ecological receptors. CPECs do not necessarily signify a risk—rather, they are merely chemicals that have been identified for further analyses. Criteria for selecting CPECs are specified in the SRAM and is the same as for selecting COPCs (see Section 3.1), except that CPEC selection requires an additional step. In this step SQLs are compared to ecological screening levels (ESLs) to assure that SQLs are sufficiently low to detect a concentration that may pose an ecological risk.

CPECs selected for risk assessment at the NCY RFI site are presented in Table C1-12.

The CPEC selection process is summarized in Spreadsheets C1-75 through C1-77 for soil at 0 to 2 feet bgs, soil at 0 to 4 feet bgs, and soil at 0 to 6 feet bgs, respectively.

The comparison of SQLs to ESLs for soil/sediment 0 to 2 feet bgs, 0 to 4 feet bgs, and soil/sediment 0 to 6 feet bgs is presented in Spreadsheets C1-79 though C1-81. The ESL screen was applied as follows:

- Chemicals were retained as CPECs if the compound was detected infrequently or not at all, the compound is potentially site-related, and there were an insufficient number of SQLs less than ESLs to conclude that the chemical was not present at concentrations greater than ESLs.
- For metals, if a sufficient number of SQLs were within the range of SSFL background concentrations to conclude that these chemicals were not likely present at concentrations exceeding background, then those chemicals were not selected as CPECs even if they exceeded their respective ESLs.

Comparison of observed chemical concentrations to background chemical concentrations for soils at 0 to 2 feet bgs, 0 to 4 feet bgs, and 0 to 6 feet bgs are presented Spreadsheets C1-82 through C1-84. Dioxin congener group summations used in background comparisons for soil 0 to 2 feet bgs, soil 0 to 4 feet bgs, and soil 0 to 6 feet bgs are presented in Spreadsheets C1-85 and C1-87, respectively.

Several chemicals determined to be present at concentrations consistent with background as determined by Wilcoxon Rank Sum Test, yet were selected as CPECs. This is because these chemicals were present with maximum concentrations significantly greater than maximum background concentrations and located in areas of potential metals impacts, or had elevated detection limits greater than SQLs.

C4.2 CONCEPTUAL SITE MODEL AND ENDPOINTS FOR THE ECOLOGICAL RISK ASSESSMENT

Following CPEC selection, a site-specific CSM was developed that identifies ecological receptors and potentially complete exposure pathways, and assessment and measurement endpoints were selected to focus the ERA.

C4.2.1 Conceptual Site Model

The NCY RFI site is approximately 2.0 acres and supports coastal scrub in the northern portion and non-native grassland in the southern portion of the site. A small area located at the confluence of drainages that drain the Old Conservation Yard (OCY) and NCY supports a coast live oak riparian forest. The types of habitats near the NCY RFI site and the representative ecological receptors of concern are summarized in Spreadsheet C1-88.

The ecological CSM for the NCY RFI site is presented in Table C1-13. As described in the SRAM, inhalation of volatile CPECs by surface-dwelling wildlife and dermal absorption of CPECs were considered insignificant exposure routes for identified wildlife receptors of concern—risk estimates for these exposure routes were not quantitatively evaluated in this ERA.

C4.2.2 Assessment and Measurement Endpoints

Assessment endpoints are "explicit expressions of the actual environmental value that is to be protected" (USEPA 1992d). Measurement endpoints are measurable biological responses to a stressor that can be related to the valued characteristic chosen as the assessment endpoint (USEPA 1992d). The assessment and measurement endpoints for the NCY ERA are presented in Spreadsheet C1-89. Representative receptors include the deer mouse, thrush, hawk, bobcat, and mule deer.

C4.3 EXPOSURE ASSESSMENT FOR ECOLOGICAL RECEPTORS

The exposure assessment quantifies the magnitude and type of potential exposure of an ecological receptor to a CPEC. As described in Appendix C1 Section 4.2.1, the NCY RFI site is small (approximately 2.0 acres), and therefore, the entire NCY RFI site is considered one exposure unit.

C4.3.1 Exposure Point Concentrations

An EPC is an estimate of the concentration of a chemical contacted by a target ecological receptor in a given exposure area. EPCs for soil at 0 to 2 feet bgs, 0 to 4 feet bgs, and 0 to 6 feet bgs were calculated as described in Appendix C1 Section 3.3.1 for COPCs. EPCs representing burrow air concentrations were estimated from measured soil data using the soil to soil vapor partitioning portion of the Johnson and Ettinger (1991) indoor air model.

EPCs for soils at 0 to 2 feet bgs, 0 to 4 feet bgs, and 0 to 6 feet bgs are presented in Table C1-3 and Spreadsheets C1-90 through C1-92. EPCs for burrow air from soils at 0 to 6 feet bgs are presented in Table C1-3 and Spreadsheet C1-104. Aroclor to PCB extrapolation calculations for soil from 0 to 2 feet bgs, 0 to 4 feet bgs, and 0 to 6 feet bgs are presented in Spreadsheets C1-94, C1-96, and C1-98. TPH were not detected in NCY soils, therefore, TPH to petroleum constituent extrapolation calculations were not conducted.

C4.4 EXPOSURE POINT VALUES AND APPLIED DAILY DOSES FOR BIOTIC MEDIA

Exposure point values (EPVs) and applied daily doses (ADDs) for direct and indirect exposure pathways are presented in this section.

A concentration-toxicity screen to determine the appropriate subsurface soil/sediment depth for assessing exposures to burrowing animals (i.e., 0 to 2 feet bgs, 0 to 4 feet bgs, or 0 to 6 feet bgs) is presented in Spreadsheet C1-100. The 0 to 2 feet bgs soil depth provided the highest toxicity-concentration screen value. Therefore, the 0 to 2 feet bgs soil depth was selected as the soil depth of interest for estimating exposure to the deer mouse.

Direct exposure pathways to CPECs include incidental ingestion of soil and inhalation of vapors. EPCs for direct exposure pathways consist of media-specific concentrations. Indirect exposure pathways include consumption of prey/food items. The EPVs for indirect exposure pathways are chemical-specific prey species concentrations and are based on chemical-specific bioaccumulation factors for a given medium and organism (e.g., soil and earthworm) as described in the SRAM. EPVs for earthworms and plants are presented in Spreadsheets C1-101 and C1-102, respectively.

ADDs were calculated for the deer mouse, hermit thrush, red-tailed hawk, bobcat, and mule deer and account for direct and/or indirect exposures that could contribute to an increase in risk. Direct exposures via the inhalation route are only expected to contribute significant exposures to the deer mouse (due to burrowing), therefore, inhalation exposure routes were not included in the ADD calculations for the hermit thrush, red-tailed hawk, bobcat, and mule deer. The chemical-specific ADDs for the deer mouse, hermit thrush, red-tailed hawk, bobcat, and mule deer are presented in Spreadsheets C1-103 through C1-108.

Methods and models used to estimate the EPVs and ADDs for the reference receptors are provided in the SRAM. Any parameter values used in model calculations that were either not specified in the SRAM or deviated from the SRAM are identified and referenced within the appropriate tables. The parameter values used for exposure models are also presented in Spreadsheet C1-109.

C4.5 ECOLOGICAL RISK CHARACTERIZATION

Potential hazards to representative ecological receptors were estimated by comparison of toxicity values to ADDs presented in Section 4.4 of this appendix. The toxicity reference values (TRVs) that are used to estimate HQs are shown in Table C1-14. As per Section 11.2 of the SRAM (MWH 2005), for the chemicals presenting the greatest risk ("drivers"), where sufficient data was available in the peer-reviewed scientific literature, baseline TRVs have also been developed and are utilized. Baseline TRVs utilized in this risk assessment are presented in Table C1-15. A toxicity profile that provides the basis for baseline TRVs is presented in Appendix C, Attachment C5.

C4.5.1 Estimates of Ecological Risks

Receptor- and chemical-specific hazard quotients (HQs) and cumulative hazard indices (HIs) are presented in Tables C1-16 through C1-21 for the deer mouse, hermit thrush, red-tailed hawk, bobcat, and mule deer.

The estimated HQs and HIs associated with soil media for all receptors for the NCY RFI site were greater than 1, ranging from 7.2 for the Bobcat CTE to > 1,000 for the Thrush RME. The primary risk drivers are antimony, barium, cadmium, copper, lead, molybdenum, nickel, selenium, silver, zinc, dioxins in soil.

Other factors to consider when interpreting the results are the relatively small size of the site and the relatively robust ability of annual grassland communities to recover given the surrounding biotic communities.

C4.5.2 Observational Assessment of Native Vegetation

As described in the SRAM (MWH 2005), an observational assessment of native vegetation at the NCY RFI site was performed. The results of the observational assessment are presented in Appendix C, Attachment C6. In a visual comparison of the reference sites to the assessment sites, none of the assessment sites showed significant differences in vegetative cover or species composition that could not be accounted for by mechanical or other historical disturbances. Thus, no adverse affects on health or productivity of native species were observed within areas potentially impacted by CPECs.

C4.5.3 Potential Sediment Migration

There is potential for the migration of chemicals from the NCY RFI site to a downgradient RFI site via sediment migration via drainages on the southern portion of the site which lead away from the Group 6 RFI report area toward Silvernale Pond. The NCY risk estimates provide upper-bound risk estimates for any potential downgradient risks. Further, the presence and migration of the COPCs in the drainage will be considered in all downstream group RFI reports.

C4.5.4 Uncertainty Analysis

As discussed in Section 3.4.3, there is some degree of uncertainty associated with nearly all exposure parameter values, toxicity values, and exposure assumptions used in the risk assessment process. In nearly all cases, exposure and toxicity values used in the risk assessment were selected to result in a conservative estimate of risk. Thus, for the most part, uncertainty in the risk assessment is accounted for by use of data and assumptions that are protective of ecological receptors.

Five site-specific uncertainties of note were identified for the ERA performed for the NCY RFI site. These uncertainties are described below, and a qualitative analysis of the uncertainty associated with other key exposure assumptions and toxicity values used estimate ecological risk is presented in Table C1-22.

1. Due to elevated detection limits above ESLs for antimony, molybdenum, and selenium, these metals were considered as CPECs even though they were not detected in any soil samples. In these cases, it was assumed that chemicals may be present at half the detection limit.

2. A number of inorganics (e.g., antimony, barium, copper) that were demonstrated to be consistent with background concentrations through Wilcoxon Rank Sum test were included as CPECs because the maximum detected concentrations were substantially greater than the maximum detected background concentration and were located in areas of suspected metals impacts or had elevated SQLs relative to ESLs.

3. While measured and non-detect PAH concentrations are available for samples in and around the ash pile, PAHs were not analyzed for in Ash Pile samples that contain the highest concentrations of dioxins. It is therefore likely that the highest PAH concentrations are not accounted for. Risks due to PAH exposure are likely

underestimated. However, given the presence of elevated dioxins which results in cancer estimates greater than 1×10^{-5} in the Ash Pile, more information regarding the levels of PAHs would not likely alter CMS recommendations.

4. The estimated risks to the hawk, the bobcat, and the mule deer assume that these species spend all of their time at the NCY RFI site. This assumption is unlikely to be true and it results in overestimates of potential risks to these species' due to chemicals present in soils at the site. The minimum reported foraging ranges for the red-tailed hawk, the bobcat, the mule deer are 195, 1,152, and 192 acres, respectively, as compared to 2.0 acres for the NCY RFI site. When the foraging ranges of the these species' is accounted for in the ERA, it indicates that RME HIs for the hawk, the bobcat, and the mule deer could be as low as 0.7, 0.3, and 47, respectively. Risk estimates for large home range receptors (hawk, bobcat, and mule deer) will be addressed for the entire SSFL facility after all RFI site risk assessments have been completed and potential site-specific risks are evaluated.

5. Potential impacts of the Topanga fire on the selection of CPECs and risks have been evaluated. Although, as shown in Appendix D, soil concentrations of metals and dioxins have been impacted by the fire and therefore risks have been increased, there were no identified risk assessment decisions based solely on post-Topanga fire data. However, the only elevated drainage result for lead was a post-fire sample.

C5.0 CONCLUSIONS

The human health risk assessments conducted for the NCY RFI site indicate that theoretical upper-bound incremental lifetime cancer risks for human receptors are between 1×10^{-7} and 7×10^{-5}). The human health and ecological risk assessments indicate that HIs are greater than 1 for both human (future hypothetical residential child receptors) and ecological receptors. HIs for all other human receptors were below 1.0. The qualitative assessment of potential impacts to vegetation at the NCY RFI site showed that vegetation is healthy and supporting both non-native and native species, relative to reference areas. The uncertainties associated with the risk assessments are, for the most part, unlikely to lead to significant underestimates of risk. In addition, the assumptions used in this risk assessment were designed to mitigate the effects of uncertainties that may result in underestimation of risks. Therefore, it can be concluded that:

- The theoretical upper-bound incremental lifetime cancer risks for all receptors are greater than 1×10^{-5};
- The HIs for the future hypothetical resident adult and child exceed acceptable levels;

- The theoretical upper-bound incremental lifetime cancer risks for residents assumed to drink Chatsworth formation groundwater within the Group 6 RFI report area are 3×10^{-6};
- The His for residents assumed to drink Chatsworth formation groundwater within the Group 6 RFI report are elevated;
- Ecological risks at the NCY RFI site exceed acceptable levels.

These HRA and ERA results are appropriate to use in making CMS recommendations.

C6.0 REFERENCES

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TABLES

Table C1-1 (1 of 2)

Chemicals of Potential Concern for Human Health
New Conservation Yard RFI Site

Chemical	Soil (0 to 2 feet bgs)	Soil (0 to 10 feet bgs)	RFI Site Chatsworth Groundwater (Indirect Pathway)[a]	RFI Site Chatsworth Groundwater (Direct Pathway)[a]
Inorganic Compounds				
Barium	X	X		
Cadmium	X	X		
Chromium	X	X		
Copper	X	X		X
Fluoride				X
Lead	X	X		
Mercury	X	X		
Molybdenum	X	X		
Nickel	X	X		
Nitrate				X
Selenium	X	X		
Silver	X	X		
Thallium				X
Zinc	X	X		
VOCs				
1,1-Dichloroethane				X
1,2-Dichloroethane				X
Acetone			X	X
Benzene				X
Carbon disulfide				X
Chloromethane				X
cis-1,2-Dichloroethene				X
Methylene chloride				X
Toluene	X	X	X	X
Trichloroethene			X	X
SVOCs				
Benzo(a)anthracene	X	X		
Benzo(a)pyrene	X	X		
Benzo(b)fluoranthene	X	X		
Benzo(g,h,i)perylene	X	X		
Benzo(k)fluoranthene	X	X		
Chrysene	X	X		
Dibenz(a,h)anthracene	X	X		
Fluoranthene	X	X		
Indeno(1,2,3-cd)pyrene	X	X		
Phenanthrene	X	X		
Pyrene	X	X		
Total Petroleum Hydrocarbons				
C14-C20(Diesel Range)				X
Dioxins				
2,3,7,8-TCDD	X	X		
1,2,3,7,8-PeCDD	X	X		
1,2,3,4,7,8-HxCDD	X	X		
1,2,3,6,7,8-HxCDD	X	X		
1,2,3,7,8,9-HxCDD	X	X		
1,2,3,4,6,7,8-HpCDD	X	X		
OCDD	X	X		
2,3,7,8-TCDF	X	X		
1,2,3,7,8-PeCDF	X	X		
2,3,4,7,8-PeCDF	X	X		
1,2,3,4,7,8-HxCDF	X	X		
1,2,3,6,7,8-HxCDF	X	X		
2,3,4,6,7,8-HxCDF	X	X		
1,2,3,7,8,9-HxCDF	X	X		

Table C1-1 (2 of 2)

Chemicals of Potential Concern for Human Health
New Conservation Yard RFI Site

Chemical	Soil (0 to 2 feet bgs)	Soil (0 to 10 feet bgs)	RFI Site Chatsworth Groundwater (Indirect Pathway)[a]	RFI Site Chatsworth Groundwater (Direct Pathway)[a]
1,2,3,4,6,7,8-HpCDF	X	X		
1,2,3,4,7,8,9-HpCDF	X	X		
OCDF	X	X		
Total Tetra	X	X		
Total Penta	X	X		
Total Hexa	X	X		
Total Hepta	X	X		
Total Octa	X	X		
PCDD/PCDF	X	X		
PCBs				
Aroclor-1254	X	X		
PCB-105	X	X		
PCB-114	X	X		
PCB-118	X	X		
PCB-123	X	X		
PCB-126	X	X		
PCB-156	X	X		
PCB-157	X	X		
PCB-167	X	X		
PCB-169	X	X		
PCB-189	X	X		
PCB-77	X	X		
PCB-81	X	X		

Notes:
X - selected as a chemical of potential concern
(a) Only Chatsworth formation groundwater is considered in the risk assessment since near-surface groundwater is localized (does not occur at the NCY RFI site) or does not meet State Water Resources Control Board yield requirements.
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCBs - polychlorinated biphenyls
bgs - below ground surface

Table C1-2 (1 of 1)

Human Health Risk Assessment Conceptual Site Model
New Conservation Yard RFI Site

NOTES:

As described in the SRAM (MWH 2005), note that risk estimates for the potential future recreational user (recreator) are used as surrogate risk estimates for the trespasser.

(*) Exposure limited to volatile compounds as defined in the text; residential and worker receptors include both indoor and outdoor air exposure to volatiles; non-residental and non-worker receptors include only outdoor air exposure. For workers, inhalation of volatiles from groundwater beneath the RFI site includes pathways associated with both migration to indoor air and ambient air (domestic groundwater use is an incomplete exposure pathway). For residents, exposures to reporting area Chatsworth formation groundwater includes pathways associated with both migration to indoor air and ambient air, as well as domestic use. Exposure to fugitive dust is limited to non-VOC compounds.

(**) Exposure limited to bioaccumulatable compounds as described in the text.

- complete and potentially complete exposure pathways evaluated in this risk assessment

- incomplete exposure pathways not evaluated in this risk assessment

Exposure Point Concentrations for COPCs and CPECs
New Conservation Yard RFI Site

Chemical	Soil/Sediment (0-2 feet bgs) EPCs		Soil/Sediment (0-4 feet bgs) EPCs		Soil/Sediment (0-6 feet bgs) EPCs		Soil/Sediment (0-10 feet bgs) EPCs		NCY Chatsworth Formation Groundwater EPCs[c]		Group 6 Chatsworth Formation Groundwater EPCs[c]	
	CTE[a] (mg/kg)	RME[b] (mg/kg)	CTE (mg/kg)	RME (mg/kg)	CTE (mg/kg)	RME (mg/kg)	CTE (mg/kg)	RME (mg/kg)	CTE (mg/L)	RME (mg/L)	CTE (mg/L)	RME (mg/L)
Inorganic Compounds												
Antimony	5.6E+00	6.0E+00	5.5E+00	6.0E+00	5.5E+00	6.0E+00	NC	NC	NC	NC	NC	NC
Barium	2.2E+02	9.6E+02	2.1E+02	5.2E+02	2.1E+02	5.2E+02	2.0E+02	4.7E+02	NC	NC	NC	NC
Cadmium	1.8E+00	1.3E+01	1.7E+00	1.3E+01	1.7E+00	1.3E+01	1.6E+00	1.1E+01	NC	NC	NC	NC
Chromium	2.3E+01	4.1E+01	2.3E+01	3.9E+01	2.3E+01	3.9E+01	2.2E+01	2.8E+01	NC	NC	NC	NC
Copper	2.9E+01	8.2E+01	2.8E+01	7.8E+01	2.8E+01	7.8E+01	2.5E+01	6.9E+01	NC	NC	1.8E-02	1.8E-02
Lead	2.6E+01	3.5E+01	2.4E+01	3.3E+01	2.4E+01	3.3E+01	2.3E+01	3.1E+01	NC	NC	NC	NC
Mercury	1.2E-01	6.4E-01	1.2E-01	6.2E-01	1.2E-01	6.2E-01	1.2E-01	5.4E-01	NC	NC	NC	NC
Molybdenum	3.4E+00	6.0E+00	3.5E+00	6.0E+00	3.5E+00	6.0E+00	3.7E+00	6.0E+00	NC	NC	NC	NC
Nickel	2.2E+01	5.7E+01	2.2E+01	5.4E+01	2.2E+01	5.4E+01	2.0E+01	4.8E+01	NC	NC	NC	NC
Selenium	1.7E+00	3.0E+00	1.7E+00	3.0E+00	1.7E+00	3.0E+00	1.9E+00	3.0E+00	NC	NC	NC	NC
Silver	1.5E+01	9.6E+01	1.5E+01	9.2E+01	1.5E+01	9.2E+01	1.3E+01	8.3E+01	NC	NC	NC	NC
Thallium	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	5.4E-04	5.4E-04
Zinc	5.4E+02	2.8E+03	5.0E+02	3.4E+03	5.0E+02	3.4E+03	4.5E+02	2.3E+03	NC	NC	NC	NC
VOCs												
1,1-Dichloroethane	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	2.6E-03	2.6E-03
1,2-Dichloroethane	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	9.0E-04	9.0E-04
Acetone	NC	NC	NC	NC	NC	NC	NC	NC	1.6E-02	1.6E-02	1.6E-02	1.6E-02
Benzene	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	5.8E-04	5.8E-04
Carbon disulfide	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	2.6E-03	2.6E-03
Chloromethane	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	3.2E-04	3.2E-04
cis-1,2-Dichloroethene	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	5.1E-02	5.1E-02
Methylene chloride	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	6.4E-04	6.4E-04
Toluene	5.3E-02	1.1E-01	3.9E-02	1.0E-01	3.9E-02	1.0E-01	3.9E-02	1.0E-01	1.8E-03	1.8E-03	1.8E-03	1.8E-03
Trichloroethene	NC	NC	NC	NC	NC	NC	NC	NC	5.3E-04	5.3E-04	1.0E-02	1.0E-02
SVOCs												
Benzo(a)anthracene	3.6E-02	1.2E-02	4.9E-02	1.2E-02	4.9E-02	1.2E-02	4.6E-02	1.2E-02	NC	NC	NC	NC
Benzo(a)pyrene	4.0E-02	4.3E-02	5.1E-02	4.3E-02	5.1E-02	4.3E-02	4.8E-02	4.3E-02	NC	NC	NC	NC
Benzo(b)fluoranthene	4.3E-02	6.5E-02	5.4E-02	6.5E-02	5.4E-02	6.5E-02	5.0E-02	6.5E-02	NC	NC	NC	NC
Benzo(g,h,i)perylene	3.9E-02	3.1E-02	5.0E-02	3.1E-02	5.0E-02	3.1E-02	4.7E-02	3.1E-02	NC	NC	NC	NC
Benzo(k)fluoranthene	3.6E-02	1.2E-02	4.9E-02	1.2E-02	4.9E-02	1.2E-02	4.6E-02	1.2E-02	NC	NC	NC	NC
Chrysene	4.0E-02	2.7E-02	5.1E-02	2.7E-02	5.1E-02	2.7E-02	4.8E-02	2.7E-02	NC	NC	NC	NC
Dibenz(a,h)anthracene	3.6E-02	8.0E-03	4.8E-02	8.0E-03	4.8E-02	8.0E-03	4.5E-02	8.0E-03	NC	NC	NC	NC
Fluoranthene	4.3E-02	3.6E-02	5.3E-02	3.6E-02	5.3E-02	3.6E-02	5.0E-02	3.6E-02	NC	NC	NC	NC

Exposure Point Concentrations for COPCs and CPECs
New Conservation Yard RFI Site

Chemical	Soil/Sediment (0-2 feet bgs) EPCs		Soil/Sediment (0-4 feet bgs) EPCs		Soil/Sediment (0-6 feet bgs) EPCs		Soil/Sediment (0-10 feet bgs) EPCs		NCY Chatsworth Formation Groundwater EPCs[c]		Group 6 Chatsworth Formation Groundwater EPCs[c]	
	CTE[a] (mg/kg)	RME[b] (mg/kg)	CTE (mg/kg)	RME (mg/kg)	CTE (mg/kg)	RME (mg/kg)	CTE (mg/kg)	RME (mg/kg)	CTE (mg/L)	RME (mg/L)	CTE (mg/L)	RME (mg/L)
Indeno(1,2,3-cd)pyrene	4.1E-02	5.3E-02	5.2E-02	5.3E-02	5.2E-02	5.3E-02	4.9E-02	5.3E-02	NC	NC	NC	NC
Phenanthrene	3.7E-02	1.4E-02	4.9E-02	1.4E-02	4.9E-02	1.4E-02	4.6E-02	1.4E-02	NC	NC	NC	NC
Pyrene	4.3E-02	4.3E-02	5.3E-02	4.3E-02	5.3E-02	4.3E-02	5.0E-02	4.3E-02	NC	NC	NC	NC
Total Petroleum Hydrocarbons												
C14-C20(Diesel Range)	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	5.0E-02	5.0E-02
Dioxins												
2,3,7,8-TCDD	5.6E-06	3.4E-05	5.3E-06	3.0E-05	5.3E-06	3.0E-05	5.0E-06	2.9E-05	NC	NC	NC	NC
1,2,3,7,8-PeCDD	1.6E-05	9.0E-05	1.5E-05	9.0E-05	1.5E-05	9.0E-05	1.5E-05	9.0E-05	NC	NC	NC	NC
1,2,3,4,7,8-HxCDD	4.1E-05	1.0E-04	3.9E-05	9.4E-05	3.9E-05	9.4E-05	3.6E-05	8.8E-05	NC	NC	NC	NC
1,2,3,6,7,8-HxCDD	2.0E-04	5.4E-04	1.9E-04	4.8E-04	1.9E-04	4.8E-04	1.8E-04	4.6E-04	NC	NC	NC	NC
1,2,3,7,8,9-HxCDD	7.1E-05	4.7E-04	6.8E-05	4.1E-04	6.8E-05	4.1E-04	6.4E-05	4.7E-04	NC	NC	NC	NC
1,2,3,4,6,7,8-HpCDD	4.7E-03	1.2E-02	4.5E-03	1.1E-02	4.5E-03	1.1E-02	4.4E-03	1.0E-02	NC	NC	NC	NC
OCDD	5.4E-02	1.4E-01	5.2E-02	1.2E-01	5.2E-02	1.2E-01	4.9E-02	1.2E-01	NC	NC	NC	NC
2,3,7,8-TCDF	3.1E-06	5.7E-06	2.9E-06	5.6E-06	2.9E-06	5.6E-06	2.8E-06	5.2E-06	NC	NC	NC	NC
1,2,3,7,8-PeCDF	3.6E-06	1.0E-05	3.4E-06	1.0E-05	3.4E-06	1.0E-05	3.2E-06	1.0E-05	NC	NC	NC	NC
2,3,4,7,8-PeCDF	8.8E-06	1.7E-05	8.3E-06	1.6E-05	8.3E-06	1.6E-05	7.8E-06	1.5E-05	NC	NC	NC	NC
1,2,3,4,7,8-HxCDF	2.7E-05	6.3E-05	2.6E-05	5.7E-05	2.6E-05	5.7E-05	2.4E-05	5.4E-05	NC	NC	NC	NC
1,2,3,6,7,8-HxCDF	2.1E-05	4.9E-05	2.0E-05	4.4E-05	2.0E-05	4.4E-05	1.9E-05	4.2E-05	NC	NC	NC	NC
2,3,4,6,7,8-HxCDF	4.3E-05	1.1E-04	4.1E-05	9.6E-05	4.1E-05	9.6E-05	3.9E-05	9.1E-05	NC	NC	NC	NC
1,2,3,7,8,9-HxCDF	6.9E-06	1.4E-05	6.5E-06	1.3E-05	6.5E-06	1.3E-05	6.2E-06	1.2E-05	NC	NC	NC	NC
1,2,3,4,6,7,8-HpCDF	7.7E-04	2.0E-03	7.3E-04	1.8E-03	7.3E-04	1.8E-03	8.0E-04	1.9E-03	NC	NC	NC	NC
1,2,3,4,7,8,9-HpCDF	7.2E-05	1.8E-04	6.9E-05	1.6E-04	6.9E-05	1.6E-04	1.8E-04	4.9E-04	NC	NC	NC	NC
OCDF	2.0E-03	5.1E-03	1.9E-03	4.6E-03	1.9E-03	4.6E-03	1.8E-03	4.4E-03	NC	NC	NC	NC
Total Tetra	NC	NC	-	1.6E-05	NC	NC	7.8E-06	1.5E-05	NC	NC	NC	NC
Total Penta	NC	NC	-	1.3E-04	NC	NC	2.6E-05	1.3E-04	NC	NC	NC	NC
Total Hexa	NC	NC	-	9.2E-04	NC	NC	3.7E-04	8.7E-04	NC	NC	NC	NC
Total Hepta	NC	NC	-	1.3E-02	NC	NC	5.0E-03	1.2E-02	NC	NC	NC	NC
Total Octa	NC	NC	-	1.3E-01	NC	NC	5.1E-02	1.2E-01	NC	NC	NC	NC
PCDD/PCDF	-	-	-	-	-	-	-	-	NC	NC	NC	NC
Aroclor-1254	7.1E-02	7.1E-02	7.1E-02	7.1E-02	7.1E-02	7.1E-02	7.1E-02	7.1E-02	NC	NC	NC	NC
PCB-105	1.5E-05	2.1E-05	1.5E-05	2.1E-05	1.5E-05	2.1E-05	1.5E-05	2.1E-05	NC	NC	NC	NC
PCB-114	5.7E-07	7.7E-07	5.7E-07	7.7E-07	5.7E-07	7.7E-07	5.7E-07	7.7E-07	NC	NC	NC	NC
PCB-118	3.4E-05	4.6E-05	3.4E-05	4.6E-05	3.4E-05	4.6E-05	3.4E-05	4.6E-05	NC	NC	NC	NC
PCB-123	3.7E-07	5.1E-07	3.7E-07	5.1E-07	3.7E-07	5.1E-07	3.7E-07	5.1E-07	NC	NC	NC	NC

Exposure Point Concentrations for COPCs and CPECs
New Conservation Yard RFI Site

Chemical	Soil/Sediment (0-2 feet bgs) EPCs		Soil/Sediment (0-4 feet bgs) EPCs		Soil/Sediment (0-6 feet bgs) EPCs		Soil/Sediment (0-10 feet bgs) EPCs		NCY Chatsworth Formation Groundwater EPCs[c]		Group 6 Chatsworth Formation Groundwater EPCs[c]	
	CTE[a] (mg/kg)	RME[b] (mg/kg)	CTE (mg/kg)	RME (mg/kg)	CTE (mg/kg)	RME (mg/kg)	CTE (mg/kg)	RME (mg/kg)	CTE (mg/L)	RME (mg/L)	CTE (mg/L)	RME (mg/L)
PCB-126	9.4E-07	1.3E-06	9.4E-07	1.3E-06	9.4E-07	1.3E-06	9.4E-07	1.3E-06	NC	NC	NC	NC
PCB-156	7.9E-06	1.1E-05	7.9E-06	1.1E-05	7.9E-06	1.1E-05	7.9E-06	1.1E-05	NC	NC	NC	NC
PCB-157	2.6E-06	2.7E-06	2.6E-06	2.7E-06	2.6E-06	2.7E-06	2.6E-06	2.7E-06	NC	NC	NC	NC
PCB-167	4.4E-06	4.7E-06	4.4E-06	4.7E-06	4.4E-06	4.7E-06	4.4E-06	4.7E-06	NC	NC	NC	NC
PCB-169	6.8E-08	7.5E-08	6.8E-08	7.5E-08	6.8E-08	7.5E-08	6.8E-08	7.5E-08	NC	NC	NC	NC
PCB-189	6.5E-07	7.0E-07	6.5E-07	7.0E-07	6.5E-07	7.0E-07	6.5E-07	7.0E-07	NC	NC	NC	NC
PCB-77	1.9E-06	2.6E-06	1.9E-06	2.6E-06	1.9E-06	2.6E-06	1.9E-06	2.6E-06	NC	NC	NC	NC
PCB-81	3.7E-07	5.1E-07	3.7E-07	5.1E-07	3.7E-07	5.1E-07	3.7E-07	5.1E-07	NC	NC	NC	NC

Notes:

a. Either the arithmetic mean concentration for two or more samples or the reported concentration for a single sample.

b. Either the 95% upper confidence limit (95% UCL) on the arithmetic mean for three or more samples, or the maximum concentration for less than three samples, or the maximum concentration in cases where the 95% UCL exceeds the maximum concentration.

c. For groundwater, all EPCs are based on the maximum detected value for each COPC for the identified investigational unit.

COPC - chemical of potential concern
NC - not selected as a COPC in the indicated media/depth
EPC - exposure point concentration
CTE - central tendency exposure
RME - reasonable maximum exposure
VOC - volatile organic compound
SVOC - semi-volatile organic compound
mg/kg - milligrams per kilogram
bgs - below ground surface

Table C1-4 (1 of 2)
Toxicity Criteria
New Conservation Yard RFI Site

	USEPA Carc.	Oral CSF [1/(mg/kg-day)]		Dermal CSF [1/(mg/kg-day)]		Inhalation CSF [1/(mg/kg-day)]		Oral Reference Dose (mg/kg-day)		Dermal Reference Dose (mg/kg-day)		Inhalation Reference Dose (mg/kg-day)	
Compound	Class	Value	Source	Value	Source	Value	Source	Value	Source	Value	Source	Value	Source
Inorganic Compounds													
Barium		NTV		NTV		NTV		0.2	USEPA 2006	0.2	USEPA 2006	0.00014	USEPA 1997 Table II
Cadmium		0.38	OEHHA 2006	0.38	OEHHA 2006	15	OEHHA 2006	0.001	USEPA 2006	0.001	USEPA 2006	5.714E-06	OEHHA 2006
Chromium		NTV		NTV		NTV		1.5	USEPA 2006	1.5	USEPA 2006	5.714E-05	OEHHA 2006 (Cr6)
Copper		NTV		NTV		NTV		0.04	USEPA 1997	0.04	USEPA 1997	0.000686	CAPCOA 1992
Lead		NTV		NTV		NTV		NTV		NTV		NTV	
Mercury		NTV		NTV		NTV		0.0003	CAPCOA 1992	0.0003	CAPCOA 1992	2.571E-05	OEHHA 2006
Molybdenum		NTV		NTV		NTV		0.005	USEPA 2006	0.005	USEPA 2006	NTV	
Nickel		NTV		NTV		0.91	OEHHA 2006	0.02	USEPA 2006	0.02	USEPA 2006	1.429E-05	OEHHA 2006
Nitrate		NTV		NTV									
Selenium		NTV		NTV		NTV		0.005	USEPA 2006	0.005	USEPA 2006	0.0057143	OEHHA 2006
Silver		NTV		NTV		NTV		0.005	USEPA 2006	0.005	USEPA 2006	NTV	
Thallium		NTV		NTV		NTV		0.00008	USEPA 2006	0.00008	USEPA 2006	NTV	
Zinc		NTV		NTV		NTV		0.3	USEPA 2006	0.3	USEPA 2006	0.01	CAPCOA 1992
VOCs													
1,1-Dichloroethane		0.0057	OEHHA 2006	0.0057	OEHHA 2006	0.0057	OEHHA 2006	0.1	USEPA 1997	0.1	USEPA 1997	0.14	USEPA 1997
1,2-Dichloroethane		0.047	OEHHA 2006	0.047	OEHHA 2006	0.072	OEHHA 2006	0.02	USEPA 2004	0.02	USEPA 2004	0.0014	USEPA 2004
Acetone		NTV		NTV		NTV		0.9	USEPA 2006	0.9	USEPA 2006	0.9	USEPA 2006
Benzene		0.1	OEHHA 2006	0.1	OEHHA 2006	0.1	OEHHA 2006	0.004	USEPA 2006	0.004	USEPA 2006	0.0085714	USEPA 2006
Chloromethane													
cis-1,2-Dichloroethene		NTV		NTV		NTV		0.01	USEPA 2004	0.01	USEPA 2004	0.01	USEPA 2004
Methylene chloride		0.014	OEHHA 2006	0.014	OEHHA 2006	0.0035	OEHHA 2006	0.06	USEPA 2006	0.06	USEPA 2006	0.1142857	OEHHA 2006
Toluene		NTV		NTV		NTV		0.08	USEPA 2006	0.08	USEPA 2006	1.4285714	USEPA 2006
Trichloroethene		0.013	OEHHA 2006	0.013	OEHHA 2006	0.007	OEHHA 2006	0.0003	USEPA 2004	0.0003	USEPA 2004	0.17	OEHHA 2006
SVOCs													
Benzo(a)anthracene		1.2	OEHHA 2006	1.2	OEHHA 2006	0.39	OEHHA 2006 TEF	NTV		NTV		NTV	
Benzo(a)pyrene		12	OEHHA 2006	12	OEHHA 2006	3.9	OEHHA 2006	NTV		NTV		NTV	
Benzo(b)fluoranthene		1.2	OEHHA 2006	1.2	OEHHA 2006	0.39	OEHHA 2006 TEF	NTV		NTV		NTV	
Benzo(g,h,i)perylene		NTV		NTV		NTV		NTV		NTV		NTV	
Benzo(k)fluoranthene		1.2	OEHHA 2006	1.2	OEHHA 2006	0.39	OEHHA 2006 TEF	NTV		NTV		NTV	
Chrysene		0.12	OEHHA 2006	0.12	OEHHA 2006	0.039	OEHHA 2006 TEF	NTV		NTV		NTV	
Dibenz(a,h)anthracene		4.1	OEHHA 2006	4.1	OEHHA 2006	4.1	OEHHA 2006	NTV		NTV		NTV	
Fluoranthene		NTV		NTV		NTV		0.04	USEPA 2006	0.04	USEPA 2006	0.04	USEPA 2006
Indeno(1,2,3-cd)pyrene		1.2	OEHHA 2006	1.2	OEHHA 2006	0.39	OEHHA 2006 TEF	NTV		NTV		NTV	
Phenanthrene		NTV		NTV		NTV		0.03	Value for pyrene	0.03	Value for pyrene	0.03	Value for pyrene
Pyrene		NTV		NTV		NTV		0.03	USEPA 2006	0.03	USEPA 2006	0.03	USEPA 2006
Total Petroleum Hydrocarbons													
C20-C30(Lubricant Oil Range)		NTV		NTV		NTV		NTV		NTV		NTV	
Dioxins													
2,3,7,8-TCDD		130000	OEHHA 2006	130000	OEHHA 2006	130000	OEHHA 2006	NTV		NTV		NTV	
1,2,3,7,8-PeCDD		130000	TCDD x WHO 2005 TEF (1.0)	130000	TCDD x WHO 2005 TEF (1.0)	130000	TCDD x WHO 2005 TEF (1.0)	NTV		NTV		NTV	
1,2,3,4,7,8-HxCDD		13000	TCDD x WHO 2005 TEF (0.1)	13000	TCDD x WHO 2005 TEF (0.1)	13000	TCDD x WHO 2005 TEF (0.1)	NTV		NTV		NTV	
1,2,3,6,7,8-HxCDD		13000	TCDD x WHO 2005 TEF (0.1)	13000	TCDD x WHO 2005 TEF (0.1)	13000	TCDD x WHO 2005 TEF (0.1)	NTV		NTV		NTV	
1,2,3,7,8,9-HxCDD		13000	TCDD x WHO 2005 TEF (0.1)	13000	TCDD x WHO 2005 TEF (0.1)	13000	TCDD x WHO 2005 TEF (0.1)	NTV		NTV		NTV	
1,2,3,4,6,7,8-HpCDD		1300	TCDD x WHO 2005 TEF (0.01)	1300	TCDD x WHO 2005 TEF (0.01)	1300	TCDD x WHO 2005 TEF (0.01)	NTV		NTV		NTV	
OCDD		39	TCDD x WHO 2005 TEF (0.0003)	39	TCDD x WHO 2005 TEF (0.0003)	39	TCDD x WHO 2005 TEF (0.0003)	NTV		NTV		NTV	
2,3,7,8-TCDF		13000	TCDD x WHO 2005 TEF (0.1)	13000	TCDD x WHO 2005 TEF (0.1)	13000	TCDD x WHO 2005 TEF (0.1)	NTV		NTV		NTV	
1,2,3,7,8-PeCDF		3900	TCDD x WHO 2005 TEF (0.03)	3900	TCDD x WHO 2005 TEF (0.03)	3900	TCDD x WHO 2005 TEF (0.03)	NTV		NTV		NTV	
2,3,4,7,8-PeCDF		39000	TCDD x WHO 2005 TEF (0.3)	39000	TCDD x WHO 2005 TEF (0.3)	39000	TCDD x WHO 2005 TEF (0.3)	NTV		NTV		NTV	

Table C1-4 (2 of 2)
Toxicity Criteria
New Conservation Yard RFI Site

	USEPA Carc.	Oral CSF [1/(mg/kg-day)]		Dermal CSF [1/(mg/kg-day)]		Inhalation CSF [1/(mg/kg-day)]		Oral Reference Dose (mg/kg-day)		Dermal Reference Dose (mg/kg-day)		Inhalation Reference Dose (mg/kg-day)	
Compound	Class	Value	Source	Value	Source	Value	Source	Value	Source	Value	Source	Value	Source
1,2,3,4,7,8-HxCDF		13000	TCDD x WHO 2005 TEF (0.1)	13000	TCDD x WHO 2005 TEF (0.1)	13000	TCDD x WHO 2005 TEF (0.1)	NTV		NTV		NTV	
1,2,3,6,7,8-HxCDF		13000	TCDD x WHO 2005 TEF (0.1)	13000	TCDD x WHO 2005 TEF (0.1)	13000	TCDD x WHO 2005 TEF (0.1)	NTV		NTV		NTV	
2,3,4,6,7,8-HxCDF		13000	TCDD x WHO 2005 TEF (0.1)	13000	TCDD x WHO 2005 TEF (0.1)	13000	TCDD x WHO 2005 TEF (0.1)	NTV		NTV		NTV	
1,2,3,7,8,9-HxCDF		13000	TCDD x WHO 2005 TEF (0.1)	13000	TCDD x WHO 2005 TEF (0.1)	13000	TCDD x WHO 2005 TEF (0.1)	NTV		NTV		NTV	
1,2,3,4,6,7,8-HpCDF		1300	TCDD x WHO 2005 TEF (0.01)	1300	TCDD x WHO 2005 TEF (0.01)	1300	TCDD x WHO 2005 TEF (0.01)	NTV		NTV		NTV	
1,2,3,4,7,8,9-HpCDF		1300	TCDD x WHO 2005 TEF (0.01)	1300	TCDD x WHO 2005 TEF (0.01)	1300	TCDD x WHO 2005 TEF (0.01)	NTV		NTV		NTV	
OCDF		39	TCDD x WHO 2005 TEF (0.0003)	39	TCDD x WHO 2005 TEF (0.0003)	39	TCDD x WHO 2005 TEF (0.0003)	NTV		NTV		NTV	
PCBs													
Aroclor-1254		2	USEPA 2006	2	USEPA 2006	2	USEPA 2006	0.00002	USEPA 2006	0.00002	USEPA 2006	0.00002	USEPA 2006
PCB-105		3.9	TCDD x WHO 2005 TEF (0.00003)	3.9	TCDD x WHO 2005 TEF (0.00003)	3.9	TCDD x WHO 2005 TEF (0.00003)	NTV		NTV		NTV	
PCB-114		3.9	TCDD x WHO 2005 TEF (0.00003)	3.9	TCDD x WHO 2005 TEF (0.00003)	3.9	TCDD x WHO 2005 TEF (0.00003)	NTV		NTV		NTV	
PCB-118		3.9	TCDD x WHO 2005 TEF (0.00003)	3.9	TCDD x WHO 2005 TEF (0.00003)	3.9	TCDD x WHO 2005 TEF (0.00003)	NTV		NTV		NTV	
PCB-123		3.9	TCDD x WHO 2005 TEF (0.00003)	3.9	TCDD x WHO 2005 TEF (0.00003)	3.9	TCDD x WHO 2005 TEF (0.00003)	NTV		NTV		NTV	
PCB-126		13000	TCDD x WHO 2005 TEF (0.1)	13000	TCDD x WHO 2005 TEF (0.1)	13000	TCDD x WHO 2005 TEF (0.1)	NTV		NTV		NTV	
PCB-156		3.9	TCDD x WHO 2005 TEF (0.00003)	3.9	TCDD x WHO 2005 TEF (0.00003)	3.9	TCDD x WHO 2005 TEF (0.00003)	NTV		NTV		NTV	
PCB-157		3.9	TCDD x WHO 2005 TEF (0.00003)	3.9	TCDD x WHO 2005 TEF (0.00003)	3.9	TCDD x WHO 2005 TEF (0.00003)	NTV		NTV		NTV	
PCB-167		3.9	TCDD x WHO 2005 TEF (0.00003)	3.9	TCDD x WHO 2005 TEF (0.00003)	3.9	TCDD x WHO 2005 TEF (0.00003)	NTV		NTV		NTV	
PCB-169		3900	TCDD x WHO 2005 TEF (0.03)	3900	TCDD x WHO 2005 TEF (0.03)	3900	TCDD x WHO 2005 TEF (0.03)	NTV		NTV		NTV	
PCB-189		3.9	TCDD x WHO 2005 TEF (0.00003)	3.9	TCDD x WHO 2005 TEF (0.00003)	3.9	TCDD x WHO 2005 TEF (0.00003)	NTV		NTV		NTV	
PCB-77		13	TCDD x WHO 2005 TEF (0.0001)	13	TCDD x WHO 2005 TEF (0.0001)	13	TCDD x WHO 2005 TEF (0.0001)	NTV		NTV		NTV	
PCB-81		39	TCDD x WHO 2005 TEF (0.0003)	39	TCDD x WHO 2005 TEF (0.0003)	39	TCDD x WHO 2005 TEF (0.0003)	NTV		NTV		NTV	

Notes:
NTV = No toxicity value\
PCB - polychlorinated biphenyls
VOC - volatile organic compound
SVOC - semi-volatile organic compound
RfD = reference dose
CSF = cancer slope factor
TEF = Toxicity equivalence

Table C1-5 (1 of 4)
Total Risk Estimates for the Adult Worker
New Conservation Yard RFI Site

Central Tendency Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation of Indoor Air_s		Inhalation Ambient Air_s		Inhalation of Indoor Air_{gw}		Inhalation Ambient Air_{gw}		Cumulative Risk		Soil Media Risk		Groundwater Risk	
	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)
Inorganic Compounds																				
Barium	4.6E-04	-	4.6E-06	-	2.9E-05	-	-	-	-	-	-	-	-	-	5.0E-04	-	5.0E-04	-	-	-
Cadmium	7.7E-04	3.5E-08	7.7E-07	3.5E-11	5.8E-06	6.0E-11	-	-	-	-	-	-	-	-	7.8E-04	4E-08	7.8E-04	4E-08	-	-
Chromium	6.6E-06	-	-	-	-	-	-	-	-	-	-	-	-	-	6.6E-06	-	6.6E-06	-	-	-
Copper	3.1E-04	-	3.1E-06	-	7.8E-07	-	-	-	-	-	-	-	-	-	3.1E-04	-	3.1E-04	-	-	-
Lead	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Mercury	1.7E-04	-	1.7E-06	-	8.8E-08	-	-	-	-	-	-	-	-	-	1.8E-04	-	1.8E-04	-	-	-
Molybdenum	2.9E-04	-	2.9E-06	-	-	-	-	-	-	-	-	-	-	-	2.9E-04	-	2.9E-04	-	-	-
Nickel	4.8E-04	-	4.8E-06	-	2.9E-05	4.5E-11	-	-	-	-	-	-	-	-	5.1E-04	5E-11	5.1E-04	5E-11	-	-
Nitrate	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Selenium	1.4E-04	-	1.4E-06	-	5.4E-09	-	-	-	-	-	-	-	-	-	1.4E-04	-	1.4E-04	-	-	-
Silver	1.3E-03	-	1.3E-05	-	-	-	-	-	-	-	-	-	-	-	1.3E-03	-	1.3E-03	-	-	-
Thallium	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Zinc	7.8E-04	-	7.8E-06	-	1.0E-06	-	-	-	-	-	-	-	-	-	7.9E-04	-	7.9E-04	-	-	-
VOCs																				
1,1-Dichloroethane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
1,2-Dichloroethane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Acetone	-	-	-	-	-	-	-	-	-	-	7.1E-09	-	3.6E-13	-	7.1E-09	-	-	-	7.1E-09	-
Benzene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Carbon disulfide	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Chloromethane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
cis-1,2-Dichloroethene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Methylene chloride	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Toluene	2.9E-07	-	2.9E-08	-	-	-	3.7E-04	-	2.1E-05	-	8.0E-08	-	8.2E-09	-	3.9E-04	-	3.9E-04	-	8.8E-08	-
Trichloroethene	-	-	-	-	-	-	-	-	-	-	3.1E-07	4.5E-11	2.9E-08	4.2E-12	3.4E-07	5E-11	-	-	3.4E-07	5E-11
SVOCs																				
Benzo(a)anthracene	-	2.2E-09	-	2.4E-09	-	3.2E-14	-	-	-	-	-	-	-	-	-	5E-09	-	5E-09	-	-
Benzo(a)pyrene	-	2.4E-08	-	2.7E-08	-	3.4E-13	-	-	-	-	-	-	-	-	-	5E-08	-	5E-08	-	-
Benzo(b)fluoranthene	-	2.7E-09	-	2.9E-09	-	3.8E-14	-	-	-	-	-	-	-	-	-	6E-09	-	6E-09	-	-
Benzo(g,h,i)perylene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Benzo(k)fluoranthene	-	2.2E-09	-	2.4E-09	-	3.2E-14	-	-	-	-	-	-	-	-	-	5E-09	-	5E-09	-	-
Chrysene	-	2.4E-10	-	2.6E-10	-	3.4E-15	-	-	-	-	-	-	-	-	-	5E-10	-	5E-10	-	-
Dibenz(a,h)anthracene	-	7.6E-09	-	8.2E-09	-	3.3E-13	-	-	-	-	-	-	-	-	-	2E-08	-	2E-08	-	-
Fluoranthene	4.6E-07	-	6.0E-08	-	2.0E-11	-	-	-	-	-	-	-	-	-	5.2E-07	-	5.2E-07	-	-	-
Indeno(1,2,3-cd)pyrene	-	2.5E-09	-	2.7E-09	-	3.6E-14	-	-	-	-	-	-	-	-	-	5E-09	-	5E-09	-	-
Phenanthrene	5.2E-07	-	6.8E-08	-	2.3E-11	-	-	-	-	-	-	-	-	-	5.9E-07	-	5.9E-07	-	-	-
Pyrene	6.1E-07	-	7.9E-08	-	2.6E-11	-	-	-	-	-	-	-	-	-	6.9E-07	-	6.9E-07	-	-	-
Total Petroleum Hydrocarbons																				
C20-C30(Lubricant Oil Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

Table C1-5 (2 of 4)

Total Risk Estimates for the Adult Worker

New Conservation Yard RFI Site

Central Tendency Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation of Indoor Air$_{s-gw}$		Inhalation Ambient Air$_{s-gw}$		Inhalation of Indoor Air$_{s-gw}$		Inhalation Ambient Air$_{s-gw}$		Cumulative Risk		Soil Media Risk		Groundwater Risk	
	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)
Dioxins																				
2,3,7,8-TCDD	-	3.8E-08	-	1.1E-09	-	1.6E-12	-	-	-	-	-	-	-	-	-	4E-08	-	4E-08	-	-
1,2,3,7,8-PeCDD	-	1.1E-07	-	3.3E-09	-	4.7E-12	-	-	-	-	-	-	-	-	-	1E-07	-	1E-07	-	-
1,2,3,4,7,8-HxCDD	-	2.7E-08	-	8.2E-10	-	1.2E-12	-	-	-	-	-	-	-	-	-	3E-08	-	3E-08	-	-
1,2,3,6,7,8-HxCDD	-	1.3E-07	-	4.0E-09	-	5.8E-12	-	-	-	-	-	-	-	-	-	1E-07	-	1E-07	-	-
1,2,3,7,8,9-HxCDD	-	4.8E-08	-	1.4E-09	-	2.1E-12	-	-	-	-	-	-	-	-	-	5E-08	-	5E-08	-	-
1,2,3,4,6,7,8-HpCDD	-	3.1E-07	-	9.4E-09	-	1.4E-11	-	-	-	-	-	-	-	-	-	3E-07	-	3E-07	-	-
OCDD	-	1.1E-07	-	3.3E-09	-	4.7E-12	-	-	-	-	-	-	-	-	-	1E-07	-	1E-07	-	-
2,3,7,8-TCDF	-	2.1E-09	-	6.2E-11	-	9.0E-14	-	-	-	-	-	-	-	-	-	2E-09	-	2E-09	-	-
1,2,3,7,8-PeCDF	-	7.2E-10	-	2.2E-11	-	3.1E-14	-	-	-	-	-	-	-	-	-	7E-10	-	7E-10	-	-
2,3,4,7,8-PeCDF	-	1.8E-08	-	5.3E-10	-	7.6E-13	-	-	-	-	-	-	-	-	-	2E-08	-	2E-08	-	-
1,2,3,4,7,8-HxCDF	-	1.8E-08	-	5.4E-10	-	7.8E-13	-	-	-	-	-	-	-	-	-	2E-08	-	2E-08	-	-
1,2,3,6,7,8-HxCDF	-	1.4E-08	-	4.2E-10	-	6.1E-13	-	-	-	-	-	-	-	-	-	1E-08	-	1E-08	-	-
2,3,4,6,7,8-HxCDF	-	2.9E-08	-	8.7E-10	-	1.3E-12	-	-	-	-	-	-	-	-	-	3E-08	-	3E-08	-	-
1,2,3,7,8,9-HxCDF	-	4.6E-09	-	1.4E-10	-	2.0E-13	-	-	-	-	-	-	-	-	-	5E-09	-	5E-09	-	-
1,2,3,4,6,7,8-HpCDF	-	5.2E-08	-	1.5E-09	-	2.2E-12	-	-	-	-	-	-	-	-	-	5E-08	-	5E-08	-	-
1,2,3,4,7,8,9-HpCDF	-	4.8E-09	-	1.5E-10	-	2.1E-13	-	-	-	-	-	-	-	-	-	5E-09	-	5E-09	-	-
OCDF	-	4.1E-09	-	1.2E-10	-	1.8E-13	-	-	-	-	-	-	-	-	-	4E-09	-	4E-09	-	-
PCBs																				
Aroclor-1254	1.5E-03	7.3E-09	2.1E-04	1.0E-09	6.6E-08	3.2E-13	-	-	-	-	-	-	-	-	1.7E-03	8E-09	1.7E-03	8E-09	-	-
PCB-105	-	3.1E-12	-	4.3E-13	-	1.3E-16	-	-	-	-	-	-	-	-	-	4E-12	-	4E-12	-	-
PCB-114	-	1.1E-13	-	1.6E-14	-	4.9E-18	-	-	-	-	-	-	-	-	-	1E-13	-	1E-13	-	-
PCB-118	-	6.7E-12	-	9.4E-13	-	2.9E-16	-	-	-	-	-	-	-	-	-	8E-12	-	8E-12	-	-
PCB-123	-	7.5E-14	-	1.0E-14	-	3.2E-18	-	-	-	-	-	-	-	-	-	9E-14	-	9E-14	-	-
PCB-126	-	6.3E-10	-	8.8E-11	-	2.7E-14	-	-	-	-	-	-	-	-	-	7E-10	-	7E-10	-	-
PCB-156	-	1.6E-12	-	2.2E-13	-	6.8E-17	-	-	-	-	-	-	-	-	-	2E-12	-	2E-12	-	-
PCB-157	-	5.1E-13	-	7.2E-14	-	2.2E-17	-	-	-	-	-	-	-	-	-	6E-13	-	6E-13	-	-
PCB-167	-	8.8E-13	-	1.2E-13	-	3.8E-17	-	-	-	-	-	-	-	-	-	1E-12	-	1E-12	-	-
PCB-169	-	1.4E-11	-	1.9E-12	-	5.9E-16	-	-	-	-	-	-	-	-	-	2E-11	-	2E-11	-	-
PCB-189	-	1.3E-13	-	1.8E-14	-	5.7E-18	-	-	-	-	-	-	-	-	-	1E-13	-	1E-13	-	-
PCB-77	-	1.3E-12	-	1.8E-13	-	5.6E-17	-	-	-	-	-	-	-	-	-	1E-12	-	1E-12	-	-
PCB-81	-	7.5E-13	-	1.0E-13	-	3.2E-17	-	-	-	-	-	-	-	-	-	9E-13	-	9E-13	-	-
Total PCB Congeners	-	6.6E-10	-	9.2E-11	-	2.9E-14	-	-	-	-	-	-	-	-	-	7E-10	-	7E-10	-	-
Cumulative Risk	6.3E-03	1.0E-06	2.5E-04	7.4E-08	6.5E-05	1.5E-10	3.7E-04	-	2.1E-05	-	4.0E-07	4.5E-11	3.8E-08	4.2E-12	7.0E-03	1E-06	7.0E-03	1E-06	4.4E-07	5E-11

Table C1-5 (3 of 4)
Total Risk Estimates for the Adult Worker
New Conservation Yard RFI Site

Reasonable Maximum Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation of Indoor Air_s		Inhalation Ambient Air_s		Inhalation of Indoor Air_{gw}		Inhalation Ambient Air_{gw}		Cumulative Risk		Soil Media Risk		Groundwater Risk	
	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)
Inorganic Compounds																				
Barium	9.4E-03	-	2.3E-04	-	3.3E-04	-	-	-	-	-	-	-	-	-	9.9E-03	-	9.9E-03	-	-	-
Cadmium	2.6E-02	3.3E-06	6.5E-05	8.3E-09	1.1E-04	3.3E-09	-	-	-	-	-	-	-	-	2.6E-02	3E-06	2.6E-02	3E-06	-	-
Chromium	5.3E-05	-	1.3E-06	-	3.5E-05	-	-	-	-	-	-	-	-	-	8.9E-05	-	8.9E-05	-	-	-
Copper	4.0E-03	-	1.0E-04	-	5.8E-06	-	-	-	-	-	-	-	-	-	4.1E-03	-	4.1E-03	-	-	-
Lead	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Mercury	4.2E-03	-	1.1E-04	-	1.2E-06	-	-	-	-	-	-	-	-	-	4.3E-03	-	4.3E-03	-	-	-
Molybdenum	2.3E-03	-	5.9E-05	-	-	-	-	-	-	-	-	-	-	-	2.4E-03	-	2.4E-03	-	-	-
Nickel	5.6E-03	-	1.4E-04	-	1.9E-04	8.4E-10	-	-	-	-	-	-	-	-	5.9E-03	8E-10	5.9E-03	8E-10	-	-
Nitrate	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Selenium	1.2E-03	-	2.9E-05	-	2.6E-08	-	-	-	-	-	-	-	-	-	1.2E-03	-	1.2E-03	-	-	-
Silver	3.8E-02	-	9.4E-04	-	-	-	-	-	-	-	-	-	-	-	3.9E-02	-	3.9E-02	-	-	-
Thallium	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Zinc	1.8E-02	-	4.5E-04	-	1.4E-05	-	-	-	-	-	-	-	-	-	1.9E-02	-	1.9E-02	-	-	-
VOCs																				
1,1-Dichloroethane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
1,2-Dichloroethane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Acetone	-	-	-	-	-	-	-	-	-	-	1.9E-08	-	9.5E-13	-	1.9E-08	-	-	-	1.9E-08	-
Benzene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Carbon disulfide	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Chloromethane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
cis-1,2-Dichloroethene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Methylene chloride	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Toluene	2.7E-06	-	6.7E-07	-	-	-	2.0E-03	-	5.7E-05	-	2.1E-07	-	2.2E-08	-	2.1E-03	-	2.1E-03	-	2.3E-07	-
Trichloroethene	-	-	-	-	-	-	-	-	-	-	8.3E-07	3.3E-10	7.7E-08	3.1E-11	9.0E-07	4E-10	-	-	9.0E-07	4E-10
SVOCs																				
Benzo(a)anthracene	-	9.4E-09	-	3.1E-09	-	7.6E-14	-	-	-	-	-	-	-	-	-	1E-08	-	1E-08	-	-
Benzo(a)pyrene	-	3.4E-07	-	1.1E-07	-	2.7E-12	-	-	-	-	-	-	-	-	-	4E-07	-	4E-07	-	-
Benzo(b)fluoranthene	-	5.1E-08	-	1.7E-08	-	4.1E-13	-	-	-	-	-	-	-	-	-	7E-08	-	7E-08	-	-
Benzo(g,h,i)perylene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Benzo(k)fluoranthene	-	9.4E-09	-	3.1E-09	-	7.6E-14	-	-	-	-	-	-	-	-	-	1E-08	-	1E-08	-	-
Chrysene	-	2.1E-09	-	6.9E-10	-	1.7E-14	-	-	-	-	-	-	-	-	-	3E-09	-	3E-09	-	-
Dibenz(a,h)anthracene	-	2.1E-08	-	7.0E-09	-	5.3E-13	-	-	-	-	-	-	-	-	-	3E-08	-	3E-08	-	-
Fluoranthene	1.8E-06	-	5.7E-07	-	4.4E-11	-	-	-	-	-	-	-	-	-	2.3E-06	-	2.3E-06	-	-	-
Indeno(1,2,3-cd)pyrene	-	4.1E-08	-	1.3E-08	-	3.4E-13	-	-	-	-	-	-	-	-	-	5E-08	-	5E-08	-	-
Phenanthrene	9.1E-07	-	3.0E-07	-	2.3E-11	-	-	-	-	-	-	-	-	-	1.2E-06	-	1.2E-06	-	-	-
Pyrene	2.8E-06	-	9.1E-07	-	7.0E-11	-	-	-	-	-	-	-	-	-	3.7E-06	-	3.7E-06	-	-	-
Total Petroleum Hydrocarbons																				
C20-C30(Lubricant Oil Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

Table C1-5 (4 of 4)

Total Risk Estimates for the Adult Worker

New Conservation Yard RFI Site

Reasonable Maximum Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation of Indoor Air$_{s-gw}$		Inhalation Ambient Air$_{s-gw}$		Inhalation of Indoor Air$_{s-gw}$		Inhalation Ambient Air$_{s-gw}$		Cumulative Risk		Soil Media Risk		Groundwater Risk	
	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)
Dioxins																				
2,3,7,8-TCDD	-	2.9E-06	-	2.2E-07	-	7.3E-11	-	-	-	-	-	-	-	-	-	3E-06	-	3E-06	-	-
1,2,3,7,8-PeCDD	-	7.6E-06	-	5.7E-07	-	1.9E-10	-	-	-	-	-	-	-	-	-	8E-06	-	8E-06	-	-
1,2,3,4,7,8-HxCDD	-	8.8E-07	-	6.6E-08	-	2.2E-11	-	-	-	-	-	-	-	-	-	9E-07	-	9E-07	-	-
1,2,3,6,7,8-HxCDD	-	4.5E-06	-	3.4E-07	-	1.1E-10	-	-	-	-	-	-	-	-	-	5E-06	-	5E-06	-	-
1,2,3,7,8,9-HxCDD	-	4.0E-06	-	3.0E-07	-	1.0E-10	-	-	-	-	-	-	-	-	-	4E-06	-	4E-06	-	-
1,2,3,4,6,7,8-HpCDD	-	1.0E-05	-	7.6E-07	-	2.5E-10	-	-	-	-	-	-	-	-	-	1E-05	-	1E-05	-	-
OCDD	-	3.5E-06	-	2.6E-07	-	8.7E-11	-	-	-	-	-	-	-	-	-	4E-06	-	4E-06	-	-
2,3,7,8-TCDF	-	4.8E-08	-	3.6E-09	-	1.2E-12	-	-	-	-	-	-	-	-	-	5E-08	-	5E-08	-	-
1,2,3,7,8-PeCDF	-	2.5E-08	-	1.9E-09	-	6.4E-13	-	-	-	-	-	-	-	-	-	3E-08	-	3E-08	-	-
2,3,4,7,8-PeCDF	-	4.4E-07	-	3.3E-08	-	1.1E-11	-	-	-	-	-	-	-	-	-	5E-07	-	5E-07	-	-
1,2,3,4,7,8-HxCDF	-	5.3E-07	-	4.0E-08	-	1.3E-11	-	-	-	-	-	-	-	-	-	6E-07	-	6E-07	-	-
1,2,3,6,7,8-HxCDF	-	4.1E-07	-	3.1E-08	-	1.0E-11	-	-	-	-	-	-	-	-	-	4E-07	-	4E-07	-	-
2,3,4,6,7,8-HxCDF	-	9.0E-07	-	6.8E-08	-	2.3E-11	-	-	-	-	-	-	-	-	-	1E-06	-	1E-06	-	-
1,2,3,7,8,9-HxCDF	-	1.2E-07	-	9.0E-09	-	3.0E-12	-	-	-	-	-	-	-	-	-	1E-07	-	1E-07	-	-
1,2,3,4,6,7,8-HpCDF	-	1.7E-06	-	1.3E-07	-	4.2E-11	-	-	-	-	-	-	-	-	-	2E-06	-	2E-06	-	-
1,2,3,4,7,8,9-HpCDF	-	1.5E-07	-	1.2E-08	-	3.9E-12	-	-	-	-	-	-	-	-	-	2E-07	-	2E-07	-	-
OCDF	-	1.3E-07	-	9.7E-09	-	3.2E-12	-	-	-	-	-	-	-	-	-	1E-07	-	1E-07	-	-
Total Tetra	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Total Penta	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Total Hexa	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Total Hepta	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Total Octa	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
PCDD/PCDF	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
PCBs																				
Aroclor-1254	6.9E-03	9.3E-08	2.4E-03	3.2E-08	1.7E-07	2.3E-12	-	-	-	-	-	-	-	-	9.4E-03	1E-07	9.4E-03	1E-07	-	-
PCB-105	-	5.4E-11	-	1.9E-11	-	1.3E-15	-	-	-	-	-	-	-	-	-	7E-11	-	7E-11	-	-
PCB-114	-	2.0E-12	-	6.9E-13	-	4.9E-17	-	-	-	-	-	-	-	-	-	3E-12	-	3E-12	-	-
PCB-118	-	1.2E-10	-	4.1E-11	-	2.9E-15	-	-	-	-	-	-	-	-	-	2E-10	-	2E-10	-	-
PCB-123	-	1.3E-12	-	4.5E-13	-	3.2E-17	-	-	-	-	-	-	-	-	-	2E-12	-	2E-12	-	-
PCB-126	-	1.1E-08	-	3.8E-09	-	2.7E-13	-	-	-	-	-	-	-	-	-	1E-08	-	1E-08	-	-
PCB-156	-	2.7E-11	-	9.6E-12	-	6.8E-16	-	-	-	-	-	-	-	-	-	4E-11	-	4E-11	-	-
PCB-157	-	6.9E-12	-	2.4E-12	-	1.7E-16	-	-	-	-	-	-	-	-	-	9E-12	-	9E-12	-	-
PCB-167	-	1.2E-11	-	4.2E-12	-	3.0E-16	-	-	-	-	-	-	-	-	-	2E-11	-	2E-11	-	-
PCB-169	-	1.9E-10	-	6.6E-11	-	4.7E-15	-	-	-	-	-	-	-	-	-	3E-10	-	3E-10	-	-
PCB-189	-	1.8E-12	-	6.2E-13	-	4.5E-17	-	-	-	-	-	-	-	-	-	2E-12	-	2E-12	-	-
PCB-77	-	2.2E-11	-	7.8E-12	-	5.6E-16	-	-	-	-	-	-	-	-	-	3E-11	-	3E-11	-	-
PCB-81	-	1.3E-11	-	4.5E-12	-	3.2E-16	-	-	-	-	-	-	-	-	-	2E-11	-	2E-11	-	-
Total PCB Congeners	-	1.1E-08	-	4.0E-09	-	2.8E-13	-	-	-	-	-	-	-	-	-	2E-08	-	2E-08	-	-
Cumulative Risk	1.2E-01	4.2E-05	4.6E-03	3.0E-06	7.0E-04	5.1E-09	2.0E-03	-	5.7E-05	-	1.1E-06	3.3E-10	9.9E-08	3.1E-11	1.2E-01	4E-05	1.2E-01	4E-05	1.2E-06	4E-10

Notes:

Inhalation Indoor Air $_{s}$ - Exposure associated with indoor air concentrations of COPCs modeled from soil.

Inhalation Ambient Air $_{s}$ - Exposure associated with ambient air concentrations of COPCs modeled from soil.

Inhalation Indoor Air $_{gw}$ - Exposure associated with indoor air concentrations of COPCs modeled from groundwater.

Inhalation Ambient Air $_{gw}$ - Exposure associated with ambient air concentrations of COPCs modeled from groundwater.

HQ - hazard quotient

HI - hazard index

Risk - incremental increased lifetime cancer risk

VOC - volatile organic compound

SVOC - semi-volatile organic compound

PCB - polychlorinated biphenyls

COPC - chemical of potential concern

"-" indicates that either adequate toxicity data were not available for a chemical or the exposure pathway was not applicable to that chemical.

HIs and cancer risks for PCB congeners. These results not included in cumulative risk estimates.

Table C1-6 (1 of 4)

Total Risk Estimates for the Adult Recreator
New Conservation Yard RFI Site

Central Tendency Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation Ambient Air_s		Inhalation Ambient Air_{gw}		Cumulative Risk		Soil Media Risk		Groundwater Risk	
	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)
Inorganic Compounds																
Barium	5.3E-05	-	6.0E-07	-	3.3E-06	-	-	-	-	-	5.7E-05	-	5.7E-05	-	-	-
Cadmium	8.8E-05	4.0E-09	1.0E-07	4.6E-12	6.7E-07	6.9E-12	-	-	-	-	8.9E-05	4E-09	8.9E-05	4E-09	-	-
Chromium	7.6E-07	-	8.6E-09	-	8.6E-07	-	-	-	-	-	1.6E-06	-	1.6E-06	-	-	-
Copper	3.5E-05	-	4.0E-07	-	8.9E-08	-	-	-	-	-	3.6E-05	-	3.6E-05	-	-	-
Lead	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Mercury	2.0E-05	-	2.3E-07	-	1.0E-08	-	-	-	-	-	2.0E-05	-	2.0E-05	-	-	-
Molybdenum	3.3E-05	-	3.8E-07	-	-	-	-	-	-	-	3.3E-05	-	3.3E-05	-	-	-
Nickel	5.4E-05	-	6.2E-07	-	3.3E-06	5.1E-12	-	-	-	-	5.8E-05	5E-12	5.8E-05	5E-12	-	-
Nitrate	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Selenium	1.6E-05	-	1.9E-07	-	6.2E-10	-	-	-	-	-	1.6E-05	-	1.6E-05	-	-	-
Silver	1.5E-04	-	1.7E-06	-	-	-	-	-	-	-	1.5E-04	-	1.5E-04	-	-	-
Thallium	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Zinc	8.9E-05	-	1.0E-06	-	-	-	-	-	-	-	9.0E-05	-	9.0E-05	-	-	-
VOCs																
1,1-Dichloroethane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
1,2-Dichloroethane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Acetone	-	-	-	-	-	-	-	-	4.1E-14	-	4.1E-14	-	-	-	4.1E-14	-
Benzene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Carbon disulfide	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Chloromethane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
cis-1,2-Dichloroethene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Methylene chloride	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Toluene	3.3E-08	-	3.7E-09	-	-	-	2.5E-06	-	9.4E-10	-	2.5E-06	-	2.5E-06	-	9.4E-10	-
Trichloroethene	-	-	-	-	-	-	-	-	3.4E-09	4.8E-13	3.4E-09	5E-13	-	-	3.4E-09	5E-13
SVOCs																
Benzo(a)anthracene	-	2.6E-10	-	3.8E-11	-	3.6E-15	-	-	-	-	-	3E-10	-	3E-10	-	-
Benzo(a)pyrene	-	2.8E-09	-	4.1E-10	-	3.9E-14	-	-	-	-	-	3E-09	-	3E-09	-	-
Benzo(b)fluoranthene	-	3.1E-10	-	4.5E-11	-	4.3E-15	-	-	-	-	-	4E-10	-	4E-10	-	-
Benzo(g,h,i)perylene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Benzo(k)fluoranthene	-	2.6E-10	-	3.8E-11	-	3.6E-15	-	-	-	-	-	3E-10	-	3E-10	-	-
Chrysene	-	2.8E-11	-	4.1E-12	-	3.9E-16	-	-	-	-	-	3E-11	-	3E-11	-	-
Dibenz(a,h)anthracene	-	8.7E-10	-	1.3E-10	-	3.8E-14	-	-	-	-	-	1E-09	-	1E-09	-	-
Fluoranthene	5.2E-08	-	7.7E-09	-	2.3E-12	-	-	-	-	-	6.0E-08	-	6.0E-08	-	-	-
Indeno(1,2,3-cd)pyrene	-	2.9E-10	-	4.3E-11	-	4.1E-15	-	-	-	-	-	3E-10	-	3E-10	-	-
Phenanthrene	6.0E-08	-	8.9E-09	-	2.6E-12	-	-	-	-	-	6.9E-08	-	6.9E-08	-	-	-
Pyrene	7.0E-08	-	1.0E-08	-	3.0E-12	-	-	-	-	-	8.0E-08	-	8.0E-08	-	-	-
Total Petroleum Hydrocarbons																
C20-C30(Lubricant Oil Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

Table C1-6 (2 of 4)

Total Risk Estimates for the Adult Recreator
New Conservation Yard RFI Site

Central Tendency Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation Ambient Air_s		Inhalation Ambient Air_{gw}		Cumulative Risk		Soil Media Risk		Groundwater Risk	
	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (mg/kg-day)	Risk (mg/kg-day)	HQ (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)
Dioxins																
2,3,7,8-TCDD	-	4.3E-09	-	1.5E-10	-	1.9E-13	-	-	-	-	-	4E-09	-	4E-09	-	-
1,2,3,7,8-PeCDD	-	1.2E-08	-	4.3E-10	-	5.4E-13	-	-	-	-	-	1E-08	-	1E-08	-	-
1,2,3,4,7,8-HxCDD	-	3.1E-09	-	1.1E-10	-	1.3E-13	-	-	-	-	-	3E-09	-	3E-09	-	-
1,2,3,6,7,8-HxCDD	-	1.5E-08	-	5.2E-10	-	6.6E-13	-	-	-	-	-	2E-08	-	2E-08	-	-
1,2,3,7,8,9-HxCDD	-	5.4E-09	-	1.9E-10	-	2.4E-13	-	-	-	-	-	6E-09	-	6E-09	-	-
1,2,3,4,6,7,8-HpCDD	-	3.6E-08	-	1.2E-09	-	1.6E-12	-	-	-	-	-	4E-08	-	4E-08	-	-
OCDD	-	1.2E-08	-	4.3E-10	-	5.4E-13	-	-	-	-	-	1E-08	-	1E-08	-	-
2,3,7,8-TCDF	-	2.4E-10	-	8.1E-12	-	1.0E-14	-	-	-	-	-	2E-10	-	2E-10	-	-
1,2,3,7,8-PeCDF	-	8.2E-11	-	2.8E-12	-	3.6E-15	-	-	-	-	-	8E-11	-	8E-11	-	-
2,3,4,7,8-PeCDF	-	2.0E-09	-	6.9E-11	-	8.7E-14	-	-	-	-	-	2E-09	-	2E-09	-	-
1,2,3,4,7,8-HxCDF	-	2.1E-09	-	7.1E-11	-	8.9E-14	-	-	-	-	-	2E-09	-	2E-09	-	-
1,2,3,6,7,8-HxCDF	-	1.6E-09	-	5.5E-11	-	6.9E-14	-	-	-	-	-	2E-09	-	2E-09	-	-
2,3,4,6,7,8-HxCDF	-	3.3E-09	-	1.1E-10	-	1.4E-13	-	-	-	-	-	3E-09	-	3E-09	-	-
1,2,3,7,8,9-HxCDF	-	5.3E-10	-	1.8E-11	-	2.3E-14	-	-	-	-	-	5E-10	-	5E-10	-	-
1,2,3,4,6,7,8-HpCDF	-	5.9E-09	-	2.0E-10	-	2.6E-13	-	-	-	-	-	6E-09	-	6E-09	-	-
1,2,3,4,7,8,9-HpCDF	-	5.5E-10	-	1.9E-11	-	2.4E-14	-	-	-	-	-	6E-10	-	6E-10	-	-
OCDF	-	4.6E-10	-	1.6E-11	-	2.0E-14	-	-	-	-	-	5E-10	-	5E-10	-	-
Total Tetra	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Total Penta	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Total Hexa	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Total Hepta	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Total Octa	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
PCDD/PCDF	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
PCBs																
Aroclor-1254	1.7E-04	8.3E-10	2.8E-05	1.3E-10	7.5E-09	3.6E-14	-	-	-	-	2.0E-04	1E-09	2.0E-04	1E-09	-	-
PCB-105	-	3.5E-13	-	5.7E-14	-	1.5E-17	-	-	-	-	-	4E-13	-	4E-13	-	-
PCB-114	-	1.3E-14	-	2.1E-15	-	5.6E-19	-	-	-	-	-	2E-14	-	2E-14	-	-
PCB-118	-	7.7E-13	-	1.2E-13	-	3.3E-17	-	-	-	-	-	9E-13	-	9E-13	-	-
PCB-123	-	8.6E-15	-	1.4E-15	-	3.7E-19	-	-	-	-	-	1E-14	-	1E-14	-	-
PCB-126	-	7.2E-11	-	1.1E-11	-	3.1E-15	-	-	-	-	-	8E-11	-	8E-11	-	-
PCB-156	-	1.8E-13	-	2.9E-14	-	7.8E-18	-	-	-	-	-	2E-13	-	2E-13	-	-
PCB-157	-	5.9E-14	-	9.3E-15	-	2.5E-18	-	-	-	-	-	7E-14	-	7E-14	-	-
PCB-167	-	1.0E-13	-	1.6E-14	-	4.4E-18	-	-	-	-	-	1E-13	-	1E-13	-	-
PCB-169	-	1.6E-12	-	2.5E-13	-	6.8E-17	-	-	-	-	-	2E-12	-	2E-12	-	-
PCB-189	-	1.5E-14	-	2.4E-15	-	6.5E-19	-	-	-	-	-	2E-14	-	2E-14	-	-
PCB-77	-	1.5E-13	-	2.4E-14	-	6.4E-18	-	-	-	-	-	2E-13	-	2E-13	-	-
PCB-81	-	8.6E-14	-	1.4E-14	-	3.7E-18	-	-	-	-	-	1E-13	-	1E-13	-	-
Total PCB Congeners	-	7.5E-11	-	1.2E-11	-	3.3E-15	-	-	-	-	-	9E-11	-	9E-11	-	-
Cumulative Risk	7.1E-04	1.2E-07	3.3E-05	4.5E-09	8.2E-06	1.7E-11	2.5E-06	-	4.3E-09	4.8E-13	7.6E-04	1E-07	7.6E-04	1E-07	4.3E-09	5E-13

Table C1-6 (3 of 4)

Total Risk Estimates for the Adult Recreator
New Conservation Yard RFI Site

Reasonable Maximum Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation Ambient Air_s		Inhalation Ambient Air_{gw}		Cumulative Risk		Soil Media Risk		Groundwater Risk	
	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (mg/kg-day)	Risk (mg/kg-day)	HQ (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)
Inorganic Compounds																
Barium	9.4E-04	-	4.8E-04	-	2.9E-05	-	-	-	-	-	1.4E-03	-	1.4E-03	-	-	-
Cadmium	2.6E-03	3.2E-07	1.3E-04	1.6E-08	9.9E-06	2.7E-10	-	-	-	-	2.7E-03	3E-07	2.7E-03	3E-07	-	-
Chromium	5.3E-06	-	2.7E-06	-	3.0E-06	-	-	-	-	-	1.1E-05	-	1.1E-05	-	-	-
Copper	4.0E-04	-	2.1E-04	-	5.1E-07	-	-	-	-	-	6.1E-04	-	6.1E-04	-	-	-
Lead	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Mercury	4.2E-04	-	2.2E-04	-	1.1E-07	-	-	-	-	-	6.4E-04	-	6.4E-04	-	-	-
Molybdenum	2.3E-04	-	1.2E-04	-	-	-	-	-	-	-	3.6E-04	-	3.6E-04	-	-	-
Nickel	5.6E-04	-	2.8E-04	-	1.7E-05	7.0E-11	-	-	-	-	8.6E-04	7E-11	8.6E-04	7E-11	-	-
Nitrate	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Selenium	1.2E-04	-	6.0E-05	-	2.2E-09	-	-	-	-	-	1.8E-04	-	1.8E-04	-	-	-
Silver	3.8E-03	-	1.9E-03	-	-	-	-	-	-	-	5.7E-03	-	5.7E-03	-	-	-
Thallium	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Zinc	1.8E-03	-	9.3E-04	-	-	-	-	-	-	-	2.8E-03	-	2.8E-03	-	-	-
VOCs																
1,1-Dichloroethane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
1,2-Dichloroethane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Acetone	-	-	-	-	-	-	-	-	8.3E-14	-	8.3E-14	-	-	-	8.3E-14	-
Benzene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Carbon disulfide	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Chloromethane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
cis-1,2-Dichloroethene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Methylene chloride	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Toluene	2.7E-07	-	1.4E-06	-	-	-	4.9E-06	-	1.9E-09	-	6.6E-06	-	6.6E-06	-	1.9E-09	-
Trichloroethene	-	-	-	-	-	-	-	-	6.7E-09	2.6E-12	6.7E-09	3E-12	-	-	6.7E-09	3E-12
SVOCs																
Benzo(a)anthracene	-	9.0E-10	-	6.0E-09	-	6.3E-15	-	-	-	-	-	7E-09	-	7E-09	-	-
Benzo(a)pyrene	-	3.2E-08	-	2.2E-07	-	2.3E-13	-	-	-	-	-	2E-07	-	2E-07	-	-
Benzo(b)fluoranthene	-	4.9E-09	-	3.3E-08	-	3.4E-14	-	-	-	-	-	4E-08	-	4E-08	-	-
Benzo(g,h,i)perylene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Benzo(k)fluoranthene	-	9.0E-10	-	6.0E-09	-	6.3E-15	-	-	-	-	-	7E-09	-	7E-09	-	-
Chrysene	-	2.0E-10	-	1.4E-09	-	1.4E-15	-	-	-	-	-	2E-09	-	2E-09	-	-
Dibenz(a,h)anthracene	-	2.1E-09	-	1.4E-08	-	4.5E-14	-	-	-	-	-	2E-08	-	2E-08	-	-
Fluoranthene	1.8E-07	-	1.2E-06	-	3.8E-12	-	-	-	-	-	1.4E-06	-	1.4E-06	-	-	-
Indeno(1,2,3-cd)pyrene	-	4.0E-09	-	2.7E-08	-	2.8E-14	-	-	-	-	-	3E-08	-	3E-08	-	-
Phenanthrene	9.1E-08	-	6.1E-07	-	2.0E-12	-	-	-	-	-	7.0E-07	-	7.0E-07	-	-	-
Pyrene	2.8E-07	-	1.9E-06	-	6.1E-12	-	-	-	-	-	2.2E-06	-	2.2E-06	-	-	-
Total Petroleum Hydrocarbons																
C20-C30(Lubricant Oil Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

Table C1-6 (4 of 4)

Total Risk Estimates for the Adult Recreator
New Conservation Yard RFI Site

Reasonable Maximum Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation Ambient Air_s		Inhalation Ambient Air_{gw}		Cumulative Risk		Soil Media Risk		Groundwater Risk	
	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (mg/kg-day)	Risk (mg/kg-day)	HQ (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)
Dioxins																
2,3,7,8-TCDD	-	2.8E-07	-	4.3E-07	-	6.1E-12	-	-	-	-	-	7E-07	-	7E-07	-	-
1,2,3,7,8-PeCDD	-	7.3E-07	-	1.1E-06	-	1.6E-11	-	-	-	-	-	2E-06	-	2E-06	-	-
1,2,3,4,7,8-HxCDD	-	8.5E-08	-	1.3E-07	-	1.8E-12	-	-	-	-	-	2E-07	-	2E-07	-	-
1,2,3,6,7,8-HxCDD	-	4.4E-07	-	6.7E-07	-	9.4E-12	-	-	-	-	-	1E-06	-	1E-06	-	-
1,2,3,7,8,9-HxCDD	-	3.8E-07	-	5.9E-07	-	8.3E-12	-	-	-	-	-	1E-06	-	1E-06	-	-
1,2,3,4,6,7,8-HpCDD	-	9.7E-07	-	1.5E-06	-	2.1E-11	-	-	-	-	-	2E-06	-	2E-06	-	-
OCDD	-	3.4E-07	-	5.2E-07	-	7.3E-12	-	-	-	-	-	9E-07	-	9E-07	-	-
2,3,7,8-TCDF	-	4.6E-09	-	7.1E-09	-	1.0E-13	-	-	-	-	-	1E-08	-	1E-08	-	-
1,2,3,7,8-PeCDF	-	2.4E-09	-	3.8E-09	-	5.3E-14	-	-	-	-	-	6E-09	-	6E-09	-	-
2,3,4,7,8-PeCDF	-	4.2E-08	-	6.5E-08	-	9.2E-13	-	-	-	-	-	1E-07	-	1E-07	-	-
1,2,3,4,7,8-HxCDF	-	5.1E-08	-	7.9E-08	-	1.1E-12	-	-	-	-	-	1E-07	-	1E-07	-	-
1,2,3,6,7,8-HxCDF	-	4.0E-08	-	6.1E-08	-	8.6E-13	-	-	-	-	-	1E-07	-	1E-07	-	-
2,3,4,6,7,8-HxCDF	-	8.7E-08	-	1.3E-07	-	1.9E-12	-	-	-	-	-	2E-07	-	2E-07	-	-
1,2,3,7,8,9-HxCDF	-	1.1E-08	-	1.8E-08	-	2.5E-13	-	-	-	-	-	3E-08	-	3E-08	-	-
1,2,3,4,6,7,8-HpCDF	-	1.6E-07	-	2.5E-07	-	3.5E-12	-	-	-	-	-	4E-07	-	4E-07	-	-
1,2,3,4,7,8,9-HpCDF	-	1.5E-08	-	2.3E-08	-	3.2E-13	-	-	-	-	-	4E-08	-	4E-08	-	-
OCDF	-	1.2E-08	-	1.9E-08	-	2.7E-13	-	-	-	-	-	3E-08	-	3E-08	-	-
Total Tetra	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Total Penta	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Total Hexa	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Total Hepta	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Total Octa	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
PCDD/PCDF	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
PCBs																
Aroclor-1254	6.9E-04	8.9E-09	5.0E-03	6.4E-08	1.5E-08	1.9E-13	-	-	-	-	5.7E-03	7E-08	5.7E-03	7E-08	-	-
PCB-105	-	5.2E-12	-	3.7E-11	-	1.1E-16	-	-	-	-	-	4E-11	-	4E-11	-	-
PCB-114	-	1.9E-13	-	1.4E-12	-	4.1E-18	-	-	-	-	-	2E-12	-	2E-12	-	-
PCB-118	-	1.1E-11	-	8.0E-11	-	2.4E-16	-	-	-	-	-	9E-11	-	9E-11	-	-
PCB-123	-	1.2E-13	-	9.0E-13	-	2.7E-18	-	-	-	-	-	1E-12	-	1E-12	-	-
PCB-126	-	1.0E-09	-	7.5E-09	-	2.3E-14	-	-	-	-	-	9E-09	-	9E-09	-	-
PCB-156	-	2.6E-12	-	1.9E-11	-	5.7E-17	-	-	-	-	-	2E-11	-	2E-11	-	-
PCB-157	-	6.7E-13	-	4.8E-12	-	1.4E-17	-	-	-	-	-	5E-12	-	5E-12	-	-
PCB-167	-	1.2E-12	-	8.3E-12	-	2.5E-17	-	-	-	-	-	9E-12	-	9E-12	-	-
PCB-169	-	1.8E-11	-	1.3E-10	-	3.9E-16	-	-	-	-	-	1E-10	-	1E-10	-	-
PCB-189	-	1.7E-13	-	1.2E-12	-	3.7E-18	-	-	-	-	-	1E-12	-	1E-12	-	-
PCB-77	-	2.2E-12	-	1.5E-11	-	4.7E-17	-	-	-	-	-	2E-11	-	2E-11	-	-
PCB-81	-	1.2E-12	-	9.0E-12	-	2.7E-17	-	-	-	-	-	1E-11	-	1E-11	-	-
Total PCB Congeners	-	1.1E-09	-	7.8E-09	-	2.4E-14	-	-	-	-	-	9E-09	-	9E-09	-	-
Cumulative Risk	1.2E-02	4.0E-06	9.4E-03	6.0E-06	5.9E-05	4.2E-10	4.9E-06	-	8.6E-09	2.6E-12	2.1E-02	1E-05	2.1E-02	1E-05	8.6E-09	3E-12

Notes:
Inhalation Ambient Air_s - Exposure associated with ambient air concentrations of COPCs modeled from soil.
Inhalation Ambient Air_{gw} - Exposure associated with ambient air concentrations of COPCs modeled from groundwater.
HQ - hazard quotient
HI - hazard index
Risk - incremental increased lifetime cancer risk
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyls
COPC - chemical of potential concern
"-" indicates that either adequate toxicity data were not available for a chemical or the exposure pathway was not applicable to that chemical.
mg/kg-day - milligrams per kilogram per day
HIs and cancer risks for PCB congeners. These results not included in cumulative risk estimates.

Table C1-7 (1 of 4)

Total Risk Estimates for the Child Recreator
New Conservation Yard RFI Site

Central Tendency Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation Ambient Air_s		Inhalation Ambient Air_{gw}		Cumulative Risk		Soil Media Risk		Groundwater Risk	
	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (mg/kg-day)	Risk (mg/kg-day)	HQ (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)
Inorganic Compounds																
Barium	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Cadmium	1.6E-03	5.0E-08	2.8E-06	8.4E-11	5.3E-06	3.6E-11	-	-	-	-	1.7E-03	5E-08	1.7E-03	5E-08	-	-
Chromium	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Copper	6.6E-04	-	1.1E-05	-	7.0E-07	-	-	-	-	-	6.7E-04	-	6.7E-04	-	-	-
Lead	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Mercury	3.7E-04	-	6.3E-06	-	8.0E-08	-	-	-	-	-	3.8E-04	-	3.8E-04	-	-	-
Molybdenum	6.1E-04	-	1.0E-05	-	-	-	-	-	-	-	6.2E-04	-	6.2E-04	-	-	-
Nickel	1.0E-03	-	1.7E-05	-	2.6E-05	2.7E-11	-	-	-	-	1.1E-03	3E-11	1.1E-03	3E-11	-	-
Nitrate	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Selenium	3.0E-04	-	5.1E-06	-	4.9E-09	-	-	-	-	-	3.1E-04	-	3.1E-04	-	-	-
Silver	2.8E-03	-	4.7E-05	-	-	-	-	-	-	-	2.9E-03	-	2.9E-03	-	-	-
Thallium	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Zinc	1.7E-03	-	2.8E-05	-	9.1E-07	-	-	-	-	-	1.7E-03	-	1.7E-03	-	-	-
VOCs																
1,1-Dichloroethane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
1,2-Dichloroethane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Acetone	-	-	-	-	-	-	-	-	3.3E-13	-	3.3E-13	-	-	-	3.3E-13	-
Benzene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Carbon disulfide	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Chloromethane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
cis-1,2-Dichloroethene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Methylene chloride	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Toluene	6.1E-07	-	1.0E-07	-	-	-	1.9E-05	-	7.4E-09	-	2.0E-05	-	2.0E-05	-	7.4E-09	-
Trichloroethene	-	-	-	-	-	-	-	-	2.6E-08	2.5E-12	2.6E-08	3E-12	-	-	2.6E-08	3E-12
SVOCs																
Benzo(a)anthracene	-	3.2E-09	-	7.0E-10	-	1.9E-14	-	-	-	-	-	4E-09	-	4E-09	-	-
Benzo(a)pyrene	-	3.5E-08	-	7.6E-09	-	2.1E-13	-	-	-	-	-	4E-08	-	4E-08	-	-
Benzo(b)fluoranthene	-	3.8E-09	-	8.3E-10	-	2.3E-14	-	-	-	-	-	5E-09	-	5E-09	-	-
Benzo(g,h,i)perylene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Benzo(k)fluoranthene	-	3.2E-09	-	7.0E-10	-	1.9E-14	-	-	-	-	-	4E-09	-	4E-09	-	-
Chrysene	-	3.5E-10	-	7.6E-11	-	2.1E-15	-	-	-	-	-	4E-10	-	4E-10	-	-
Dibenz(a,h)anthracene	-	1.1E-08	-	2.4E-09	-	2.0E-13	-	-	-	-	-	1E-08	-	1E-08	-	-
Fluoranthene	9.8E-07	-	2.1E-07	-	1.8E-11	-	-	-	-	-	1.2E-06	-	1.2E-06	-	-	-
Indeno(1,2,3-cd)pyrene	-	3.6E-09	-	7.9E-10	-	2.1E-14	-	-	-	-	-	4E-09	-	4E-09	-	-
Phenanthrene	1.1E-06	-	2.4E-07	-	2.0E-11	-	-	-	-	-	1.4E-06	-	1.4E-06	-	-	-
Pyrene	1.3E-06	-	2.8E-07	-	2.4E-11	-	-	-	-	-	1.6E-06	-	1.6E-06	-	-	-
Total Petroleum Hydrocarbons																
C20-C30(Lubricant Oil Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

Table C1-7 (2 of 4)

Total Risk Estimates for the Child Recreator
New Conservation Yard RFI Site

Central Tendency Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation Ambient Air_s		Inhalation Ambient Air_{gw}		Cumulative Risk		Soil Media Risk		Groundwater Risk	
	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (mg/kg-day)	Risk (mg/kg-day)	HQ (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)
Dioxins																
2,3,7,8-TCDD	-	5.3E-08	-	2.7E-09	-	9.8E-13	-	-	-	-	-	6E-08	-	6E-08	-	-
1,2,3,7,8-PeCDD	-	1.5E-07	-	7.8E-09	-	2.8E-12	-	-	-	-	-	2E-07	-	2E-07	-	-
1,2,3,4,7,8-HxCDD	-	3.9E-08	-	2.0E-09	-	7.1E-13	-	-	-	-	-	4E-08	-	4E-08	-	-
1,2,3,6,7,8-HxCDD	-	1.9E-07	-	9.6E-09	-	3.5E-12	-	-	-	-	-	2E-07	-	2E-07	-	-
1,2,3,7,8,9-HxCDD	-	6.8E-08	-	3.4E-09	-	1.2E-12	-	-	-	-	-	7E-08	-	7E-08	-	-
1,2,3,4,6,7,8-HpCDD	-	4.5E-07	-	2.3E-08	-	8.2E-12	-	-	-	-	-	5E-07	-	5E-07	-	-
OCDD	-	1.5E-07	-	7.8E-09	-	2.8E-12	-	-	-	-	-	2E-07	-	2E-07	-	-
2,3,7,8-TCDF	-	2.9E-09	-	1.5E-10	-	5.4E-14	-	-	-	-	-	3E-09	-	3E-09	-	-
1,2,3,7,8-PeCDF	-	1.0E-09	-	5.1E-11	-	1.9E-14	-	-	-	-	-	1E-09	-	1E-09	-	-
2,3,4,7,8-PeCDF	-	2.5E-08	-	1.3E-09	-	4.6E-13	-	-	-	-	-	3E-08	-	3E-08	-	-
1,2,3,4,7,8-HxCDF	-	2.6E-08	-	1.3E-09	-	4.7E-13	-	-	-	-	-	3E-08	-	3E-08	-	-
1,2,3,6,7,8-HxCDF	-	2.0E-08	-	1.0E-09	-	3.6E-13	-	-	-	-	-	2E-08	-	2E-08	-	-
2,3,4,6,7,8-HxCDF	-	4.1E-08	-	2.1E-09	-	7.5E-13	-	-	-	-	-	4E-08	-	4E-08	-	-
1,2,3,7,8,9-HxCDF	-	6.5E-09	-	3.3E-10	-	1.2E-13	-	-	-	-	-	7E-09	-	7E-09	-	-
1,2,3,4,6,7,8-HpCDF	-	7.3E-08	-	3.7E-09	-	1.3E-12	-	-	-	-	-	8E-08	-	8E-08	-	-
1,2,3,4,7,8,9-HpCDF	-	6.9E-09	-	3.5E-10	-	1.3E-13	-	-	-	-	-	7E-09	-	7E-09	-	-
OCDF	-	5.8E-09	-	2.9E-10	-	1.1E-13	-	-	-	-	-	6E-09	-	6E-09	-	-
Total Tetra	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Total Penta	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Total Hexa	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Total Hepta	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Total Octa	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
PCDD/PCDF	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
PCBs																
Aroclor-1254	3.2E-03	1.0E-08	7.6E-04	2.4E-09	5.9E-08	1.9E-13	-	-	-	-	4.0E-03	1E-08	4.0E-03	1E-08	-	-
PCB-105	-	4.4E-12	-	1.0E-12	-	8.1E-17	-	-	-	-	-	5E-12	-	5E-12	-	-
PCB-114	-	1.6E-13	-	3.8E-14	-	3.0E-18	-	-	-	-	-	2E-13	-	2E-13	-	-
PCB-118	-	9.5E-12	-	2.2E-12	-	1.8E-16	-	-	-	-	-	1E-11	-	1E-11	-	-
PCB-123	-	1.1E-13	-	2.5E-14	-	2.0E-18	-	-	-	-	-	1E-13	-	1E-13	-	-
PCB-126	-	8.9E-10	-	2.1E-10	-	1.6E-14	-	-	-	-	-	1E-09	-	1E-09	-	-
PCB-156	-	2.2E-12	-	5.3E-13	-	4.1E-17	-	-	-	-	-	3E-12	-	3E-12	-	-
PCB-157	-	7.3E-13	-	1.7E-13	-	1.3E-17	-	-	-	-	-	9E-13	-	9E-13	-	-
PCB-167	-	1.3E-12	-	3.0E-13	-	2.3E-17	-	-	-	-	-	2E-12	-	2E-12	-	-
PCB-169	-	1.9E-11	-	4.6E-12	-	3.6E-16	-	-	-	-	-	2E-11	-	2E-11	-	-
PCB-189	-	1.9E-13	-	4.4E-14	-	3.4E-18	-	-	-	-	-	2E-13	-	2E-13	-	-
PCB-77	-	1.8E-12	-	4.3E-13	-	3.4E-17	-	-	-	-	-	2E-12	-	2E-12	-	-
PCB-81	-	1.1E-12	-	2.5E-13	-	2.0E-17	-	-	-	-	-	1E-12	-	1E-12	-	-
Total PCB Congeners	-	9.3E-10	-	2.2E-10	-	1.7E-14	-	-	-	-	-	1E-09	-	1E-09	-	-
Cumulative Risk	1.2E-02	1.4E-06	8.9E-04	8.2E-08	3.3E-05	8.8E-11	1.9E-05	-	3.4E-08	2.5E-12	1.3E-02	2E-06	1.3E-02	2E-06	3.4E-08	3E-12

Table C1-7 (3 of 4)

Total Risk Estimates for the Child Recreator
New Conservation Yard RFI Site

Reasonable Maximum Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation Ambient Air_s		Inhalation Ambient Air_{gw}		Cumulative Risk		Soil Media Risk		Groundwater Risk	
	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (mg/kg-day)	Risk (mg/kg-day)	HQ (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)
Inorganic Compounds																
Barium	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Cadmium	1.6E-03	5.0E-08	2.8E-06	8.4E-11	5.3E-06	3.6E-11	-	-	-	-	1.7E-03	5E-08	1.7E-03	5E-08	-	-
Chromium	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Copper	6.6E-04	-	1.1E-05	-	7.0E-07	-	-	-	-	-	6.7E-04	-	6.7E-04	-	-	-
Lead	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Mercury	3.7E-04	-	6.3E-06	-	8.0E-08	-	-	-	-	-	3.8E-04	-	3.8E-04	-	-	-
Molybdenum	6.1E-04	-	1.0E-05	-	-	-	-	-	-	-	6.2E-04	-	6.2E-04	-	-	-
Nickel	1.0E-03	-	1.7E-05	-	2.6E-05	2.7E-11	-	-	-	-	1.1E-03	3E-11	1.1E-03	3E-11	-	-
Nitrate	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Selenium	3.0E-04	-	5.1E-06	-	4.9E-09	-	-	-	-	-	3.1E-04	-	3.1E-04	-	-	-
Silver	2.8E-03	-	4.7E-05	-	-	-	-	-	-	-	2.9E-03	-	2.9E-03	-	-	-
Thallium	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Zinc	1.7E-03	-	2.8E-05	-	9.1E-07	-	-	-	-	-	1.7E-03	-	1.7E-03	-	-	-
VOCs																
1,1-Dichloroethane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
1,2-Dichloroethane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Acetone	-	-	-	-	-	-	-	-	1.3E-12	-	1.3E-12	-	-	-	1.3E-12	-
Benzene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Carbon disulfide	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Chloromethane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
cis-1,2-Dichloroethene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Methylene chloride	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Toluene	5.0E-06	-	1.4E-06	-	-	-	7.7E-05	-	3.0E-08	-	8.4E-05	-	8.4E-05	-	3.0E-08	-
Trichloroethene	-	-	-	-	-	-	-	-	1.1E-07	1.0E-11	1.1E-07	1E-11	-	-	1.1E-07	1E-11
SVOCs																
Benzo(a)anthracene	-	4.2E-09	-	7.0E-10	-	2.5E-14	-	-	-	-	-	5E-09	-	5E-09	-	-
Benzo(a)pyrene	-	1.5E-07	-	7.6E-09	-	9.0E-13	-	-	-	-	-	2E-07	-	2E-07	-	-
Benzo(b)fluoranthene	-	2.3E-08	-	8.3E-10	-	1.4E-13	-	-	-	-	-	2E-08	-	2E-08	-	-
Benzo(g,h,i)perylene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Benzo(k)fluoranthene	-	4.2E-09	-	7.0E-10	-	2.5E-14	-	-	-	-	-	5E-09	-	5E-09	-	-
Chrysene	-	9.5E-10	-	7.6E-11	-	5.6E-15	-	-	-	-	-	1E-09	-	1E-09	-	-
Dibenz(a,h)anthracene	-	9.6E-09	-	2.4E-09	-	1.8E-13	-	-	-	-	-	1E-08	-	1E-08	-	-
Fluoranthene	3.3E-06	-	1.2E-06	-	6.0E-11	-	-	-	-	-	4.5E-06	-	4.5E-06	-	-	-
Indeno(1,2,3-cd)pyrene	-	1.9E-08	-	7.9E-10	-	1.1E-13	-	-	-	-	-	2E-08	-	2E-08	-	-
Phenanthrene	1.7E-06	-	6.2E-07	-	3.1E-11	-	-	-	-	-	2.3E-06	-	2.3E-06	-	-	-
Pyrene	5.2E-06	-	1.9E-06	-	9.6E-11	-	-	-	-	-	7.1E-06	-	7.1E-06	-	-	-
Total Petroleum Hydrocarbons																
C20-C30(Lubricant Oil Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

Table C1-7 (4 of 4)

Total Risk Estimates for the Child Recreator
New Conservation Yard RFI Site

Reasonable Maximum Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation Ambient Air_s		Inhalation Ambient Air_{gw}		Cumulative Risk		Soil Media Risk		Groundwater Risk	
	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (mg/kg-day)	Risk (mg/kg-day)	HQ (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)
Dioxins																
2,3,7,8-TCDD	-	1.3E-06	-	1.1E-07	-	2.4E-11	-	-	-	-	-	1E-06	-	1E-06	-	-
1,2,3,7,8-PeCDD	-	3.4E-06	-	2.9E-07	-	6.3E-11	-	-	-	-	-	4E-06	-	4E-06	-	-
1,2,3,4,7,8-HxCDD	-	3.9E-07	-	3.3E-08	-	7.2E-12	-	-	-	-	-	4E-07	-	4E-07	-	-
1,2,3,6,7,8-HxCDD	-	2.0E-06	-	1.7E-07	-	3.7E-11	-	-	-	-	-	2E-06	-	2E-06	-	-
1,2,3,7,8,9-HxCDD	-	1.8E-06	-	1.5E-07	-	3.3E-11	-	-	-	-	-	2E-06	-	2E-06	-	-
1,2,3,4,6,7,8-HpCDD	-	4.5E-06	-	3.8E-07	-	8.3E-11	-	-	-	-	-	5E-06	-	5E-06	-	-
OCDD	-	1.6E-06	-	1.3E-07	-	2.9E-11	-	-	-	-	-	2E-06	-	2E-06	-	-
2,3,7,8-TCDF	-	2.2E-08	-	1.8E-09	-	4.0E-13	-	-	-	-	-	2E-08	-	2E-08	-	-
1,2,3,7,8-PeCDF	-	1.1E-08	-	9.6E-10	-	2.1E-13	-	-	-	-	-	1E-08	-	1E-08	-	-
2,3,4,7,8-PeCDF	-	2.0E-07	-	1.7E-08	-	3.6E-12	-	-	-	-	-	2E-07	-	2E-07	-	-
1,2,3,4,7,8-HxCDF	-	2.4E-07	-	2.0E-08	-	4.4E-12	-	-	-	-	-	3E-07	-	3E-07	-	-
1,2,3,6,7,8-HxCDF	-	1.9E-07	-	1.6E-08	-	3.4E-12	-	-	-	-	-	2E-07	-	2E-07	-	-
2,3,4,6,7,8-HxCDF	-	4.0E-07	-	3.4E-08	-	7.4E-12	-	-	-	-	-	4E-07	-	4E-07	-	-
1,2,3,7,8,9-HxCDF	-	5.4E-08	-	4.5E-09	-	9.8E-13	-	-	-	-	-	6E-08	-	6E-08	-	-
1,2,3,4,6,7,8-HpCDF	-	7.6E-07	-	6.4E-08	-	1.4E-11	-	-	-	-	-	8E-07	-	8E-07	-	-
1,2,3,4,7,8,9-HpCDF	-	6.9E-08	-	5.8E-09	-	1.3E-12	-	-	-	-	-	8E-08	-	8E-08	-	-
OCDF	-	5.8E-08	-	4.9E-09	-	1.1E-12	-	-	-	-	-	6E-08	-	6E-08	-	-
Total Tetra	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Total Penta	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Total Hexa	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Total Hepta	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Total Octa	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
PCDD/PCDF	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
PCBs																
Aroclor-1254	1.3E-02	4.1E-08	5.1E-03	1.6E-08	2.4E-07	7.6E-13	-	-	-	-	1.8E-02	6E-08	1.8E-02	6E-08	-	-
PCB-105	-	2.4E-11	-	9.4E-12	-	4.4E-16	-	-	-	-	-	3E-11	-	3E-11	-	-
PCB-114	-	8.8E-13	-	3.5E-13	-	1.6E-17	-	-	-	-	-	1E-12	-	1E-12	-	-
PCB-118	-	5.2E-11	-	2.0E-11	-	9.6E-16	-	-	-	-	-	7E-11	-	7E-11	-	-
PCB-123	-	5.8E-13	-	2.3E-13	-	1.1E-17	-	-	-	-	-	8E-13	-	8E-13	-	-
PCB-126	-	4.9E-09	-	1.9E-09	-	9.0E-14	-	-	-	-	-	7E-09	-	7E-09	-	-
PCB-156	-	1.2E-11	-	4.8E-12	-	2.2E-16	-	-	-	-	-	2E-11	-	2E-11	-	-
PCB-157	-	3.1E-12	-	1.2E-12	-	5.7E-17	-	-	-	-	-	4E-12	-	4E-12	-	-
PCB-167	-	5.4E-12	-	2.1E-12	-	9.9E-17	-	-	-	-	-	7E-12	-	7E-12	-	-
PCB-169	-	8.5E-11	-	3.3E-11	-	1.6E-15	-	-	-	-	-	1E-10	-	1E-10	-	-
PCB-189	-	8.0E-13	-	3.1E-13	-	1.5E-17	-	-	-	-	-	1E-12	-	1E-12	-	-
PCB-77	-	1.0E-11	-	3.9E-12	-	1.8E-16	-	-	-	-	-	1E-11	-	1E-11	-	-
PCB-81	-	5.8E-12	-	2.3E-12	-	1.1E-16	-	-	-	-	-	8E-12	-	8E-12	-	-
Total PCB Congeners	-	5.1E-09	-	2.0E-09	-	9.3E-14	-	-	-	-	-	7E-09	-	7E-09	-	-
Cumulative Risk	2.2E-02	1.7E-05	5.2E-03	1.5E-06	3.3E-05	3.8E-10	7.7E-05	-	1.4E-07	1.0E-11	2.7E-02	2E-05	2.7E-02	2E-05	1.4E-07	1E-11

Notes:
Inhalation Ambient Air_s - Exposure associated with ambient air concentrations of COPCs modeled from soil.
Inhalation Ambient Air_{gw} - Exposure associated with ambient air concentrations of COPCs modeled from groundwater.
HQ - hazard quotient
HI - hazard index
Risk - incremental increased lifetime cancer risk
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyls
COPC - chemical of potential concern
"-" indicates that either adequate toxicity data were not available for a chemical or the exposure pathway was not applicable to that chemical.
mg/kg-day - milligrams per kilogram per day
HIs and cancer risks for PCB congeners. These results not included in cumulative risk estimates.

Table C1-8 (1 of 4)

Total Risk Estimates for the Adult Resident
New Conservation Yard RFI Site

Central Tendency Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation of Indoor Air_s		Inhalation Ambient Air_s		Inhalation of Indoor Air_{gw}		Inhalation Ambient Air_{gw}		Domestic Groundwater Use		Plant Consumption		Cumulative Risk		Soil Media Risk		Groundwater Risk	
	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)
Inorganic Compounds																								
Barium	7.4E-04	-	8.5E-06	-	3.1E-05	-	-	-	-	-	-	-	-	-	-	-	4.1E-02	-	7.8E-04	-	7.8E-04	-	-	-
Cadmium	1.2E-03	5.6E-08	1.4E-06	6.4E-11	6.3E-06	6.5E-11	-	-	-	-	-	-	-	-	-	-	4.5E-02	2E-06	1.2E-03	6E-08	1.2E-03	6E-08	-	-
Chromium	1.1E-05	-	1.2E-07	-	8.1E-06	-	-	-	-	-	-	-	-	-	-	-	7.3E-06	-	1.9E-05	-	1.9E-05	-	-	-
Copper	4.9E-04	-	5.6E-06	-	8.4E-07	-	-	-	-	-	-	-	-	-	6.2E-03	-	0.0E+00	-	6.7E-03	-	5.0E-04	-	6.2E-03	-
Fluoride	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1.3E-01	-	-	-	1.3E-01	-	-	-	1.3E-01	-
Lead	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Mercury	2.8E-04	-	3.2E-06	-	9.5E-08	-	-	-	-	-	-	-	-	-	-	-	1.6E-02	-	2.8E-04	-	2.8E-04	-	-	-
Molybdenum	4.6E-04	-	5.3E-06	-	-	-	-	-	-	-	-	-	-	-	-	-	7.3E-03	-	4.7E-04	-	4.7E-04	-	-	-
Nickel	7.6E-04	-	8.7E-06	-	3.1E-05	4.9E-11	-	-	-	-	-	-	-	-	-	-	5.6E-03	-	8.0E-04	5E-11	8.0E-04	5E-11	-	-
Nitrate	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1.2E-01	-	-	-	1.2E-01	-	-	-	1.2E-01	-
Selenium	2.3E-04	-	2.6E-06	-	5.8E-09	-	-	-	-	-	-	-	-	-	-	-	5.8E-03	-	2.3E-04	-	2.3E-04	-	-	-
Silver	2.1E-03	-	2.4E-05	-	-	-	-	-	-	-	-	-	-	-	-	-	4.1E-04	-	2.1E-03	-	2.1E-03	-	-	-
Thallium	-	-	-	-	-	-	-	-	-	-	-	-	-	-	9.2E-02	-	-	-	9.2E-02	-	-	-	9.2E-02	-
Zinc	1.2E-03	-	1.4E-05	-	1.1E-06	-	-	-	-	-	-	-	-	-	-	-	1.7E-01	-	1.3E-03	-	1.3E-03	-	-	-
VOCs																								
1,1-Dichloroethane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	7.1E-04	5E-08	-	-	7.1E-04	5E-08	-	-	7.1E-04	5E-08
1,2-Dichloroethane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1.2E-03	1E-07	-	-	1.2E-03	1E-07	-	-	1.2E-03	1E-07
Acetone	-	-	-	-	-	-	-	-	-	-	2.4E-08	-	3.9E-13	-	4.9E-04	-	-	-	4.9E-04	-	-	-	4.9E-04	-
Benzene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	4.0E-03	2E-07	-	-	4.0E-03	2E-07	-	-	4.0E-03	2E-07
Carbon disulfide	-	-	-	-	-	-	-	-	-	-	-	-	-	-	7.1E-04	-	-	-	7.1E-04	-	-	-	7.1E-04	-
Chloromethane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
cis-1,2-Dichloroethene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1.4E-01	-	-	-	1.4E-01	-	-	-	1.4E-01	-
Methylene chloride	-	-	-	-	-	-	-	-	-	-	-	-	-	-	2.9E-04	3E-08	-	-	2.9E-04	3E-08	-	-	2.9E-04	3E-08
Toluene	4.6E-07	-	5.2E-08	-	-	-	1.2E-03	-	2.3E-05	-	2.7E-07	-	8.8E-09	-	6.2E-04	-	1.2E-03	-	1.8E-03	-	1.2E-03	-	6.2E-04	-
Trichloroethene	-	-	-	-	-	-	-	-	-	-	1.1E-06	1.5E-10	3.2E-08	4.5E-12	9.1E-01	4E-07	-	-	9.1E-01	4E-07	-	-	9.1E-01	4E-07
																			-					
SVOCs																			-					
Benzo(a)anthracene	-	3.6E-09	-	5.3E-10	-	3.4E-14	-	-	-	-	-	-	-	-	-	-	-	2E-07	-	4E-09	-	4E-09	-	-
Benzo(a)pyrene	-	3.9E-08	-	5.8E-09	-	3.7E-13	-	-	-	-	-	-	-	-	-	-	-	8E-07	-	4E-08	-	4E-08	-	-
Benzo(b)fluoranthene	-	4.3E-09	-	6.3E-10	-	4.1E-14	-	-	-	-	-	-	-	-	-	-	-	1E-07	-	5E-09	-	5E-09	-	-
Benzo(g,h,i)perylene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Benzo(k)fluoranthene	-	3.6E-09	-	5.3E-10	-	3.4E-14	-	-	-	-	-	-	-	-	-	-	-	1E-07	-	4E-09	-	4E-09	-	-
Chrysene	-	3.9E-10	-	5.8E-11	-	3.7E-15	-	-	-	-	-	-	-	-	-	-	-	2E-08	-	4E-10	-	4E-10	-	-
Dibenz(a,h)anthracene	-	1.2E-08	-	1.8E-09	-	3.5E-13	-	-	-	-	-	-	-	-	-	-	-	1E-07	-	1E-08	-	1E-08	-	-
Fluoranthene	7.3E-07	-	1.1E-07	-	2.1E-11	-	-	-	-	-	-	-	-	-	-	-	7.8E-05	-	8.4E-07	-	8.4E-07	-	-	-
Indeno(1,2,3-cd)pyrene	-	4.0E-09	-	6.0E-10	-	3.8E-14	-	-	-	-	-	-	-	-	-	-	-	2E-08	-	5E-09	-	5E-09	-	-
Phenanthrene	8.4E-07	-	1.2E-07	-	2.4E-11	-	-	-	-	-	-	-	-	-	-	-	1.8E-04	-	9.6E-07	-	9.6E-07	-	-	-
Pyrene	9.8E-07	-	1.4E-07	-	2.8E-11	-	-	-	-	-	-	-	-	-	-	-	1.2E-04	-	1.1E-06	-	1.1E-06	-	-	-
Total Petroleum Hydrocarbons																								
C20-C30(Lubricant Oil Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

Table C1-8 (2 of 4)

Total Risk Estimates for the Adult Resident
New Conservation Yard RFI Site

Central Tendency Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation of Indoor Air_s		Inhalation Ambient Air_s		Inhalation of Indoor Air_{gw}		Inhalation Ambient Air_{gw}		Domestic Groundwater Use		Plant Consumption		Cumulative Risk		Soil Media Risk		Groundwater Risk	
	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)
Dioxins																								
2,3,7,8-TCDD	-	6.0E-08	-	2.1E-09	-	1.8E-12	-	-	-	-	-	-	-	-	-	-	-	-	-	6E-08	-	6E-08	-	-
1,2,3,7,8-PeCDD	-	1.7E-07	-	6.0E-09	-	5.1E-12	-	-	-	-	-	-	-	-	-	-	-	-	-	2E-07	-	2E-07	-	-
1,2,3,4,7,8-HxCDD	-	4.4E-08	-	1.5E-09	-	1.3E-12	-	-	-	-	-	-	-	-	-	-	-	-	-	5E-08	-	5E-08	-	-
1,2,3,6,7,8-HxCDD	-	2.1E-07	-	7.3E-09	-	6.3E-12	-	-	-	-	-	-	-	-	-	-	-	-	-	2E-07	-	2E-07	-	-
1,2,3,7,8,9-HxCDD	-	7.6E-08	-	2.6E-09	-	2.2E-12	-	-	-	-	-	-	-	-	-	-	-	-	-	8E-08	-	8E-08	-	-
1,2,3,4,6,7,8-HpCDD	-	5.0E-07	-	1.7E-08	-	1.5E-11	-	-	-	-	-	-	-	-	-	-	-	-	-	5E-07	-	5E-07	-	-
OCDD	-	1.7E-07	-	6.0E-09	-	5.1E-12	-	-	-	-	-	-	-	-	-	-	-	-	-	2E-07	-	2E-07	-	-
2,3,7,8-TCDF	-	3.3E-09	-	1.1E-10	-	9.7E-14	-	-	-	-	-	-	-	-	-	-	-	-	-	3E-09	-	3E-09	-	-
1,2,3,7,8-PeCDF	-	1.1E-09	-	3.9E-11	-	3.4E-14	-	-	-	-	-	-	-	-	-	-	-	-	-	1E-09	-	1E-09	-	-
2,3,4,7,8-PeCDF	-	2.8E-08	-	9.6E-10	-	8.2E-13	-	-	-	-	-	-	-	-	-	-	-	-	-	3E-08	-	3E-08	-	-
1,2,3,4,7,8-HxCDF	-	2.9E-08	-	9.9E-10	-	8.4E-13	-	-	-	-	-	-	-	-	-	-	-	-	-	3E-08	-	3E-08	-	-
1,2,3,6,7,8-HxCDF	-	2.2E-08	-	7.6E-10	-	6.5E-13	-	-	-	-	-	-	-	-	-	-	-	-	-	2E-08	-	2E-08	-	-
2,3,4,6,7,8-HxCDF	-	4.6E-08	-	1.6E-09	-	1.3E-12	-	-	-	-	-	-	-	-	-	-	-	-	-	5E-08	-	5E-08	-	-
1,2,3,7,8,9-HxCDF	-	7.4E-09	-	2.5E-10	-	2.1E-13	-	-	-	-	-	-	-	-	-	-	-	-	-	8E-09	-	8E-09	-	-
1,2,3,4,6,7,8-HpCDF	-	8.3E-08	-	2.8E-09	-	2.4E-12	-	-	-	-	-	-	-	-	-	-	-	-	-	9E-08	-	9E-08	-	-
1,2,3,4,7,8,9-HpCDF	-	7.7E-09	-	2.6E-10	-	2.3E-13	-	-	-	-	-	-	-	-	-	-	-	-	-	8E-09	-	8E-09	-	-
OCDF	-	6.5E-09	-	2.2E-10	-	1.9E-13	-	-	-	-	-	-	-	-	-	-	-	-	-	7E-09	-	7E-09	-	-
Total Tetra	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Total Penta	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Total Hexa	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Total Hepta	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Total Octa	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
PCDD/PCDF	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
PCBs																								
Aroclor-1254	2.4E-03	1.2E-08	3.9E-04	1.9E-09	7.1E-08	3.4E-13	-	-	-	-	-	-	-	-	-	-	5.3E-02	3E-07	2.8E-03	1E-08	2.8E-03	1E-08	-	-
PCB-105	-	5.0E-12	-	7.9E-13	-	1.4E-16	-	-	-	-	-	-	-	-	-	-	-	1E-10	-	6E-12	-	6E-12	-	-
PCB-114	-	1.8E-13	-	2.9E-14	-	5.3E-18	-	-	-	-	-	-	-	-	-	-	-	4E-12	-	2E-13	-	2E-13	-	-
PCB-118	-	1.1E-11	-	1.7E-12	-	3.1E-16	-	-	-	-	-	-	-	-	-	-	-	2E-10	-	1E-11	-	1E-11	-	-
PCB-123	-	1.2E-13	-	1.9E-14	-	3.5E-18	-	-	-	-	-	-	-	-	-	-	-	3E-12	-	1E-13	-	1E-13	-	-
PCB-126	-	1.0E-09	-	1.6E-10	-	2.9E-14	-	-	-	-	-	-	-	-	-	-	-	2E-08	-	1E-09	-	1E-09	-	-
PCB-156	-	2.5E-12	-	4.0E-13	-	7.4E-17	-	-	-	-	-	-	-	-	-	-	-	5E-11	-	3E-12	-	3E-12	-	-
PCB-157	-	8.2E-13	-	1.3E-13	-	2.4E-17	-	-	-	-	-	-	-	-	-	-	-	2E-11	-	1E-12	-	1E-12	-	-
PCB-167	-	1.4E-12	-	2.3E-13	-	4.1E-17	-	-	-	-	-	-	-	-	-	-	-	3E-11	-	2E-12	-	2E-12	-	-
PCB-169	-	2.2E-11	-	3.5E-12	-	6.4E-16	-	-	-	-	-	-	-	-	-	-	-	5E-10	-	3E-11	-	3E-11	-	-
PCB-189	-	2.1E-13	-	3.3E-14	-	6.1E-18	-	-	-	-	-	-	-	-	-	-	-	5E-12	-	2E-13	-	2E-13	-	-
PCB-77	-	2.1E-12	-	3.3E-13	-	6.0E-17	-	-	-	-	-	-	-	-	-	-	-	3E-11	-	2E-12	-	2E-12	-	-
PCB-81	-	1.2E-12	-	1.9E-13	-	3.5E-17	-	-	-	-	-	-	-	-	-	-	-	1E-11	-	1E-12	-	1E-12	-	-
Total PCB Congeners	-	1.1E-09	-	1.7E-10	-	3.1E-14	-	-	-	-	-	-	-	-	-	-	-	2E-08	-	1E-09	-	1E-09	-	-
Cumulative Risk	1.0E-02	1.6E-06	4.6E-04	6.2E-08	7.9E-05	1.6E-10	1.2E-03	-	2.3E-05	-	1.3E-06	1.5E-10	4.0E-08	4.5E-12	1.4E+00	8E-07	3.4E-01	4E-06	1.4E+00	3E-06	1.2E-02	2E-06	1.4E+00	8E-07
W/O Domestic Groundwater Use																			1.2E-02	2E-06			1.4E-06	2E-10

Table C1-8 (3 of 4)

Total Risk Estimates for the Adult Resident
New Conservation Yard RFI Site

Reasonable Maximum Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation of Indoor Air_s		Inhalation Ambient Air_s		Inhalation of Indoor Air_{gw}		Inhalation Ambient Air_{gw}		Domestic Groundwater Use		Plant Consumption		Cumulative Risk		Soil Media Risk		Groundwater Risk	
	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)
Inorganic Compounds																								
Barium	6.6E-03	-	2.6E-04	-	3.9E-04	-	-	-	-	-	-	-	-	-	-	-	1.8E-01	-	7.2E-03	-	7.2E-03	-	-	-
Cadmium	1.8E-02	2.2E-06	7.3E-05	8.9E-09	1.3E-04	3.6E-09	-	-	-	-	-	-	-	-	-	-	3.3E-01	8E-04	1.8E-02	2E-06	1.8E-02	2E-06	-	-
Chromium	3.7E-05	-	1.5E-06	-	4.0E-05	-	-	-	-	-	-	-	-	-	-	-	1.3E-05	-	7.9E-05	-	7.9E-05	-	-	-
Copper	2.8E-03	-	1.1E-04	-	6.8E-06	-	-	-	-	-	-	-	-	-	9.5E-03	-	0.0E+00	-	1.2E-02	-	2.9E-03	-	9.5E-03	-
Fluoride	-	-	-	-	-	-	-	-	-	-	-	-	-	-	2.0E-01	-	-	-	2.0E-01	-	-	-	2.0E-01	-
Lead	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Mercury	2.9E-03	-	1.2E-04	-	1.4E-06	-	-	-	-	-	-	-	-	-	-	-	8.2E-02	-	3.1E-03	-	3.1E-03	-	-	-
Molybdenum	1.6E-03	-	6.6E-05	-	-	-	-	-	-	-	-	-	-	-	-	-	1.3E-02	-	1.7E-03	-	1.7E-03	-	-	-
Nickel	3.9E-03	-	1.6E-04	-	2.2E-04	9.3E-10	-	-	-	-	-	-	-	-	-	-	1.4E-02	-	4.3E-03	9E-10	4.3E-03	9E-10	-	-
Nitrate	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1.9E-01	-	-	-	1.9E-01	-	-	-	1.9E-01	-
Selenium	8.2E-04	-	3.3E-05	-	3.0E-08	-	-	-	-	-	-	-	-	-	-	-	1.1E-02	-	8.5E-04	-	8.5E-04	-	-	-
Silver	2.6E-02	-	1.0E-03	-	-	-	-	-	-	-	-	-	-	-	-	-	2.5E-03	-	2.7E-02	-	2.7E-02	-	-	-
Thallium	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1.4E-01	-	-	-	1.4E-01	-	-	-	1.4E-01	-
Zinc	1.3E-02	-	5.1E-04	-	1.6E-05	-	-	-	-	-	-	-	-	-	-	-	8.7E-01	-	1.3E-02	-	1.3E-02	-	-	-
VOCs																								
1,1-Dichloroethane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1.1E-03	2E-07	-	-	1.1E-03	2E-07	-	-	1.1E-03	2E-07
1,2-Dichloroethane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1.9E-03	6E-07	-	-	1.9E-03	6E-07	-	-	1.9E-03	6E-07
Acetone	-	-	-	-	-	-	-	-	-	-	6.7E-08	-	1.1E-12	-	7.5E-04	-	-	-	7.5E-04	-	-	-	7.5E-04	-
Benzene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	6.1E-03	8E-07	-	-	6.1E-03	8E-07	-	-	6.1E-03	8E-07
Carbon disulfide	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1.1E-03	-	-	-	1.1E-03	-	-	-	1.1E-03	-
Chloromethane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
cis-1,2-Dichloroethene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	2.2E-01	-	-	-	2.2E-01	-	-	-	2.2E-01	-
Methylene chloride	-	-	-	-	-	-	-	-	-	-	-	-	-	-	4.5E-04	1E-07	-	-	4.5E-04	1E-07	-	-	4.5E-04	1E-07
Toluene	1.9E-06	-	7.5E-07	-	-	-	7.1E-03	-	6.5E-05	-	7.6E-07	-	2.5E-08	-	9.5E-04	-	2.4E-03	-	8.1E-03	-	7.1E-03	-	9.5E-04	-
Trichloroethene	-	-	-	-	-	-	-	-	-	-	3.0E-06	1.1E-09	8.9E-08	3.4E-11	1.4E+00	2E-06	-	-	1.4E+00	2E-06	-	-	1.4E+00	2E-06
SVOCs																								
Benzo(a)anthracene	-	6.3E-09	-	3.3E-09	-	8.5E-14	-	-	-	-	-	-	-	-	-	-	-	3E-06	-	1E-08	-	1E-08	-	-
Benzo(a)pyrene	-	2.3E-07	-	1.2E-07	-	3.0E-12	-	-	-	-	-	-	-	-	-	-	-	5E-05	-	3E-07	-	3E-07	-	-
Benzo(b)fluoranthene	-	3.4E-08	-	1.8E-08	-	4.6E-13	-	-	-	-	-	-	-	-	-	-	-	8E-06	-	5E-08	-	5E-08	-	-
Benzo(g,h,i)perylene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Benzo(k)fluoranthene	-	6.3E-09	-	3.3E-09	-	8.5E-14	-	-	-	-	-	-	-	-	-	-	-	2E-06	-	1E-08	-	1E-08	-	-
Chrysene	-	1.4E-09	-	7.4E-10	-	1.9E-14	-	-	-	-	-	-	-	-	-	-	-	6E-07	-	2E-09	-	2E-09	-	-
Dibenz(a,h)anthracene	-	1.4E-08	-	7.5E-09	-	5.9E-13	-	-	-	-	-	-	-	-	-	-	-	2E-06	-	2E-08	-	2E-08	-	-
Fluoranthene	1.2E-06	-	6.4E-07	-	5.1E-11	-	-	-	-	-	-	-	-	-	-	-	6.6E-05	-	1.9E-06	-	1.9E-06	-	-	-
Indeno(1,2,3-cd)pyrene	-	2.8E-08	-	1.4E-08	-	3.7E-13	-	-	-	-	-	-	-	-	-	-	-	2E-06	-	4E-08	-	4E-08	-	-
Phenanthrene	6.4E-07	-	3.3E-07	-	2.6E-11	-	-	-	-	-	-	-	-	-	-	-	7.0E-05	-	9.7E-07	-	9.7E-07	-	-	-
Pyrene	2.0E-06	-	1.0E-06	-	8.1E-11	-	-	-	-	-	-	-	-	-	-	-	1.2E-04	-	3.0E-06	-	3.0E-06	-	-	-
Total Petroleum Hydrocarbons																								
C20-C30(Lubricant Oil Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

Table C1-8 (4 of 4)

Total Risk Estimates for the Adult Resident
New Conservation Yard RFI Site

Reasonable Maximum Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation of Indoor Air_s		Inhalation Ambient Air_s		Inhalation of Indoor Air_{gw}		Inhalation Ambient Air_{gw}		Domestic Groundwater Use		Plant Consumption		Cumulative Risk		Soil Media Risk		Groundwater Risk	
	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)
Dioxins																								
2,3,7,8-TCDD	-	2.0E-06	-	2.3E-07	-	8.1E-11	-	-	-	-	-	-	-	-	-	-	-	-	-	2E-06	-	2E-06	-	-
1,2,3,7,8-PeCDD	-	5.1E-06	-	6.1E-07	-	2.1E-10	-	-	-	-	-	-	-	-	-	-	-	-	-	6E-06	-	6E-06	-	-
1,2,3,4,7,8-HxCDD	-	5.9E-07	-	7.1E-08	-	2.4E-11	-	-	-	-	-	-	-	-	-	-	-	-	-	7E-07	-	7E-07	-	-
1,2,3,6,7,8-HxCDD	-	3.1E-06	-	3.7E-07	-	1.3E-10	-	-	-	-	-	-	-	-	-	-	-	-	-	3E-06	-	3E-06	-	-
1,2,3,7,8,9-HxCDD	-	2.7E-06	-	3.2E-07	-	1.1E-10	-	-	-	-	-	-	-	-	-	-	-	-	-	3E-06	-	3E-06	-	-
1,2,3,4,6,7,8-HpCDD	-	6.8E-06	-	8.1E-07	-	2.8E-10	-	-	-	-	-	-	-	-	-	-	-	-	-	8E-06	-	8E-06	-	-
OCDD	-	2.3E-06	-	2.8E-07	-	9.7E-11	-	-	-	-	-	-	-	-	-	-	-	-	-	3E-06	-	3E-06	-	-
2,3,7,8-TCDF	-	3.2E-08	-	3.9E-09	-	1.3E-12	-	-	-	-	-	-	-	-	-	-	-	-	-	4E-08	-	4E-08	-	-
1,2,3,7,8-PeCDF	-	1.7E-08	-	2.0E-09	-	7.1E-13	-	-	-	-	-	-	-	-	-	-	-	-	-	2E-08	-	2E-08	-	-
2,3,4,7,8-PeCDF	-	3.0E-07	-	3.5E-08	-	1.2E-11	-	-	-	-	-	-	-	-	-	-	-	-	-	3E-07	-	3E-07	-	-
1,2,3,4,7,8-HxCDF	-	3.6E-07	-	4.3E-08	-	1.5E-11	-	-	-	-	-	-	-	-	-	-	-	-	-	4E-07	-	4E-07	-	-
1,2,3,6,7,8-HxCDF	-	2.8E-07	-	3.3E-08	-	1.1E-11	-	-	-	-	-	-	-	-	-	-	-	-	-	3E-07	-	3E-07	-	-
2,3,4,6,7,8-HxCDF	-	6.1E-07	-	7.3E-08	-	2.5E-11	-	-	-	-	-	-	-	-	-	-	-	-	-	7E-07	-	7E-07	-	-
1,2,3,7,8,9-HxCDF	-	8.0E-08	-	9.6E-09	-	3.3E-12	-	-	-	-	-	-	-	-	-	-	-	-	-	9E-08	-	9E-08	-	-
1,2,3,4,6,7,8-HpCDF	-	1.1E-06	-	1.4E-07	-	4.7E-11	-	-	-	-	-	-	-	-	-	-	-	-	-	1E-06	-	1E-06	-	-
1,2,3,4,7,8,9-HpCDF	-	1.0E-07	-	1.2E-08	-	4.3E-12	-	-	-	-	-	-	-	-	-	-	-	-	-	1E-07	-	1E-07	-	-
OCDF	-	8.7E-08	-	1.0E-08	-	3.6E-12	-	-	-	-	-	-	-	-	-	-	-	-	-	1E-07	-	1E-07	-	-
Total Tetra	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Total Penta	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Total Hexa	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Total Hepta	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Total Octa	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
PCDD/PCDF	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
PCBs																								
Aroclor-1254	4.9E-03	6.2E-08	2.7E-03	3.5E-08	2.0E-07	2.6E-12	-	-	-	-	-	-	-	-	-	-	5.3E-02	1E-05	7.6E-03	1E-07	7.6E-03	1E-07	-	-
PCB-105	-	3.6E-11	-	2.0E-11	-	1.5E-15	-	-	-	-	-	-	-	-	-	-	-	8E-09	-	6E-11	-	6E-11	-	-
PCB-114	-	1.3E-12	-	7.4E-13	-	5.5E-17	-	-	-	-	-	-	-	-	-	-	-	3E-10	-	2E-12	-	2E-12	-	-
PCB-118	-	7.8E-11	-	4.4E-11	-	3.2E-15	-	-	-	-	-	-	-	-	-	-	-	2E-08	-	1E-10	-	1E-10	-	-
PCB-123	-	8.7E-13	-	4.9E-13	-	3.6E-17	-	-	-	-	-	-	-	-	-	-	-	2E-10	-	1E-12	-	1E-12	-	-
PCB-126	-	7.3E-09	-	4.1E-09	-	3.0E-13	-	-	-	-	-	-	-	-	-	-	-	2E-06	-	1E-08	-	1E-08	-	-
PCB-156	-	1.8E-11	-	1.0E-11	-	7.6E-16	-	-	-	-	-	-	-	-	-	-	-	4E-09	-	3E-11	-	3E-11	-	-
PCB-157	-	4.7E-12	-	2.6E-12	-	1.9E-16	-	-	-	-	-	-	-	-	-	-	-	1E-09	-	7E-12	-	7E-12	-	-
PCB-167	-	8.1E-12	-	4.5E-12	-	3.3E-16	-	-	-	-	-	-	-	-	-	-	-	2E-09	-	1E-11	-	1E-11	-	-
PCB-169	-	1.3E-10	-	7.1E-11	-	5.3E-15	-	-	-	-	-	-	-	-	-	-	-	3E-08	-	2E-10	-	2E-10	-	-
PCB-189	-	1.2E-12	-	6.7E-13	-	4.9E-17	-	-	-	-	-	-	-	-	-	-	-	3E-10	-	2E-12	-	2E-12	-	-
PCB-77	-	1.5E-11	-	8.4E-12	-	6.2E-16	-	-	-	-	-	-	-	-	-	-	-	2E-09	-	2E-11	-	2E-11	-	-
PCB-81	-	8.7E-12	-	4.9E-12	-	3.6E-16	-	-	-	-	-	-	-	-	-	-	-	1E-09	-	1E-11	-	1E-11	-	-
Total PCB Congeners	-	7.6E-09	-	4.3E-09	-	3.1E-13	-	-	-	-	-	-	-	-	-	-	-	2E-06	-	1E-08	-	1E-08	-	-
Cumulative Risk	8.1E-02	2.8E-05	5.1E-03	3.3E-06	8.1E-04	5.6E-09	7.1E-03	-	6.5E-05	-	3.8E-06	1.1E-09	1.1E-07	3.4E-11	2.2E+00	3E-06	#N/A	#N/A	2.3E+00	3E-05	9.4E-02	3E-05	2.2E+00	3E-06
W/O Domestic Groundwater Use																			9.4E-02	3E-05			3.9E-06	1E-09

Notes:
Inhalation Indoor Air_s - Exposure associated with indoor air concentrations of COPCs modeled from soil.
Inhalation Ambient Air_s - Exposure associated with ambient air concentrations of COPCs modeled from soil.
Inhalation Indoor Air_{gw} - Exposure associated with indoor air concentrations of COPCs modeled from groundwater.
Inhalation Ambient Air_{gw} - Exposure associated with ambient air concentrations of COPCs modeled from groundwater.
HQ - hazard quotient
HI - hazard index
Risk - incremental increased lifetime cancer risk
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyls
COPC - chemical of potential concern
"-" indicates that either adequate toxicity data were not available for a chemical or the exposure pathway was not applicable to that chemical.
HIs and cancer risks for PCB congeners. These results not included in cumulative risk estimates.

Table C1-9 (1 of 4)

Total Risk Estimates for the Child Resident
New Conservation Yard RFI Site

Central Tendency Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation of Indoor Air_s		Inhalation Ambient Air_s		Inhalation of Indoor Air_{gw}		Inhalation Ambient Air_{gw}		Domestic Groundwater Use		Plant Consumption		Cumulative Risk		Soil Media Risk		Groundwater Risk	
	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)
Inorganic Compounds																								
Barium	6.9E-03	-	1.2E-04	-	1.7E-04	-	-	-	-	-	-	-	-	-	-	-	6.1E-02	-	7.2E-03	-	7.2E-03	-	-	-
Cadmium	1.1E-02	3.5E-07	1.9E-05	5.9E-10	3.5E-05	2.4E-10	-	-	-	-	-	-	-	-	-	-	6.7E-02	2E-06	1.2E-02	4E-07	1.2E-02	4E-07	-	-
Chromium	9.9E-05	-	1.7E-06	-	4.5E-05	-	-	-	-	-	-	-	-	-	-	-	1.1E-05	-	1.5E-04	-	1.5E-04	-	-	-
Copper	4.6E-03	-	7.7E-05	-	4.7E-06	-	-	-	-	-	-	-	-	-	2.2E-02	-	0.0E+00	-	2.6E-02	-	4.7E-03	-	2.2E-02	-
Fluoride	-	-	-	-	-	-	-	-	-	-	-	-	-	-	4.5E-01	-	-	-	4.5E-01	-	-	-	4.5E-01	-
Lead	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Mercury	2.6E-03	-	4.4E-05	-	5.3E-07	-	-	-	-	-	-	-	-	-	-	-	2.3E-02	-	2.7E-03	-	2.7E-03	-	-	-
Molybdenum	4.3E-03	-	7.2E-05	-	-	-	-	-	-	-	-	-	-	-	-	-	1.1E-02	-	4.4E-03	-	4.4E-03	-	-	-
Nickel	7.1E-03	-	1.2E-04	-	1.7E-04	1.8E-10	-	-	-	-	-	-	-	-	-	-	8.4E-03	-	7.4E-03	2E-10	7.4E-03	2E-10	-	-
Nitrate	-	-	-	-	-	-	-	-	-	-	-	-	-	-	4.3E-01	-	-	-	4.3E-01	-	-	-	4.3E-01	-
Selenium	2.1E-03	-	3.6E-05	-	3.3E-08	-	-	-	-	-	-	-	-	-	-	-	8.8E-03	-	2.2E-03	-	2.2E-03	-	-	-
Silver	2.0E-02	-	3.3E-04	-	-	-	-	-	-	-	-	-	-	-	-	-	6.2E-04	-	2.0E-02	-	2.0E-02	-	-	-
Thallium	-	-	-	-	-	-	-	-	-	-	-	-	-	-	3.2E-01	-	-	-	3.2E-01	-	-	-	3.2E-01	-
Zinc	1.2E-02	-	1.9E-04	-	6.1E-06	-	-	-	-	-	-	-	-	-	-	-	2.6E-01	-	1.2E-02	-	1.2E-02	-	-	-
VOCs																								
1,1-Dichloroethane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	2.5E-03	1E-07	-	-	2.5E-03	1E-07	-	-	2.5E-03	1E-07
1,2-Dichloroethane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	4.3E-03	3E-07	-	-	4.3E-03	3E-07	-	-	4.3E-03	3E-07
Acetone	-	-	-	-	-	-	-	-	-	-	1.3E-07	-	2.2E-12	-	1.7E-03	-	-	-	1.7E-03	-	-	-	1.7E-03	-
Benzene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1.4E-02	4E-07	-	-	1.4E-02	4E-07	-	-	1.4E-02	4E-07
Carbon disulfide	-	-	-	-	-	-	-	-	-	-	-	-	-	-	2.5E-03	-	-	-	2.5E-03	-	-	-	2.5E-03	-
Chloromethane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
cis-1,2-Dichloroethene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	4.9E-01	-	-	-	4.9E-01	-	-	-	4.9E-01	-
Methylene chloride	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1.0E-03	7E-08	-	-	1.0E-03	7E-08	-	-	1.0E-03	7E-08
Toluene	4.3E-06	-	7.2E-07	-	-	-	6.7E-03	-	1.3E-04	-	1.5E-06	-	4.9E-08	-	2.2E-03	-	1.8E-03	-	9.0E-03	-	6.9E-03	-	2.2E-03	-
Trichloroethene	-	-	-	-	-	-	-	-	-	-	5.9E-06	5.6E-10	1.8E-07	1.7E-11	3.2E+00	1E-06	-	-	3.2E+00	1E-06	-	-	3.2E+00	1E-06
SVOCs																								
Benzo(a)anthracene	-	2.2E-08	-	4.9E-09	-	1.3E-13	-	-	-	-	-	-	-	-	-	-	-	2E-07	-	3E-08	-	3E-08	-	-
Benzo(a)pyrene	-	2.4E-07	-	5.3E-08	-	1.4E-12	-	-	-	-	-	-	-	-	-	-	-	8E-07	-	3E-07	-	3E-07	-	-
Benzo(b)fluoranthene	-	2.7E-08	-	5.8E-09	-	1.5E-13	-	-	-	-	-	-	-	-	-	-	-	1E-07	-	3E-08	-	3E-08	-	-
Benzo(g,h,i)perylene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Benzo(k)fluoranthene	-	2.2E-08	-	4.9E-09	-	1.3E-13	-	-	-	-	-	-	-	-	-	-	-	1E-07	-	3E-08	-	3E-08	-	-
Chrysene	-	2.4E-09	-	5.3E-10	-	1.4E-14	-	-	-	-	-	-	-	-	-	-	-	2E-08	-	3E-09	-	3E-09	-	-
Dibenz(a,h)anthracene	-	7.5E-08	-	1.6E-08	-	1.3E-12	-	-	-	-	-	-	-	-	-	-	-	1E-07	-	9E-08	-	9E-08	-	-
Fluoranthene	6.8E-06	-	1.5E-06	-	1.2E-10	-	-	-	-	-	-	-	-	-	-	-	1.2E-04	-	8.3E-06	-	8.3E-06	-	-	-
Indeno(1,2,3-cd)pyrene	-	2.5E-08	-	5.5E-09	-	1.4E-13	-	-	-	-	-	-	-	-	-	-	-	2E-08	-	3E-08	-	3E-08	-	-
Phenanthrene	7.8E-06	-	1.7E-06	-	1.4E-10	-	-	-	-	-	-	-	-	-	-	-	2.8E-04	-	9.5E-06	-	9.5E-06	-	-	-
Pyrene	9.1E-06	-	2.0E-06	-	1.6E-10	-	-	-	-	-	-	-	-	-	-	-	1.8E-04	-	1.1E-05	-	1.1E-05	-	-	-
Total Petroleum Hydrocarbons																								
C20-C30(Lubricant Oil Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

Table C1-9 (2 of 4)

Total Risk Estimates for the Child Resident
New Conservation Yard RFI Site

Central Tendency Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation of Indoor Air_s		Inhalation Ambient Air_s		Inhalation of Indoor Air_{gw}		Inhalation Ambient Air_{gw}		Domestic Groundwater Use		Plant Consumption		Cumulative Risk		Soil Media Risk		Groundwater Risk	
	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)
Dioxins																								
2,3,7,8-TCDD	-	3.7E-07	-	1.9E-08	-	6.5E-12	-	-	-	-	-	-	-	-	-	-	-	-	-	4E-07	-	4E-07	-	-
1,2,3,7,8-PeCDD	-	1.1E-06	-	5.5E-08	-	1.9E-11	-	-	-	-	-	-	-	-	-	-	-	-	-	1E-06	-	1E-06	-	-
1,2,3,4,7,8-HxCDD	-	2.7E-07	-	1.4E-08	-	4.7E-12	-	-	-	-	-	-	-	-	-	-	-	-	-	3E-07	-	3E-07	-	-
1,2,3,6,7,8-HxCDD	-	1.3E-06	-	6.7E-08	-	2.3E-11	-	-	-	-	-	-	-	-	-	-	-	-	-	1E-06	-	1E-06	-	-
1,2,3,7,8,9-HxCDD	-	4.7E-07	-	2.4E-08	-	8.3E-12	-	-	-	-	-	-	-	-	-	-	-	-	-	5E-07	-	5E-07	-	-
1,2,3,4,6,7,8-HpCDD	-	3.1E-06	-	1.6E-07	-	5.5E-11	-	-	-	-	-	-	-	-	-	-	-	-	-	3E-06	-	3E-06	-	-
OCDD	-	1.1E-06	-	5.5E-08	-	1.9E-11	-	-	-	-	-	-	-	-	-	-	-	-	-	1E-06	-	1E-06	-	-
2,3,7,8-TCDF	-	2.1E-08	-	1.0E-09	-	3.6E-13	-	-	-	-	-	-	-	-	-	-	-	-	-	2E-08	-	2E-08	-	-
1,2,3,7,8-PeCDF	-	7.1E-09	-	3.6E-10	-	1.2E-13	-	-	-	-	-	-	-	-	-	-	-	-	-	7E-09	-	7E-09	-	-
2,3,4,7,8-PeCDF	-	1.7E-07	-	8.8E-09	-	3.1E-12	-	-	-	-	-	-	-	-	-	-	-	-	-	2E-07	-	2E-07	-	-
1,2,3,4,7,8-HxCDF	-	1.8E-07	-	9.1E-09	-	3.1E-12	-	-	-	-	-	-	-	-	-	-	-	-	-	2E-07	-	2E-07	-	-
1,2,3,6,7,8-HxCDF	-	1.4E-07	-	7.0E-09	-	2.4E-12	-	-	-	-	-	-	-	-	-	-	-	-	-	1E-07	-	1E-07	-	-
2,3,4,6,7,8-HxCDF	-	2.9E-07	-	1.4E-08	-	5.0E-12	-	-	-	-	-	-	-	-	-	-	-	-	-	3E-07	-	3E-07	-	-
1,2,3,7,8,9-HxCDF	-	4.6E-08	-	2.3E-09	-	8.0E-13	-	-	-	-	-	-	-	-	-	-	-	-	-	5E-08	-	5E-08	-	-
1,2,3,4,6,7,8-HpCDF	-	5.1E-07	-	2.6E-08	-	9.0E-12	-	-	-	-	-	-	-	-	-	-	-	-	-	5E-07	-	5E-07	-	-
1,2,3,4,7,8,9-HpCDF	-	4.8E-08	-	2.4E-09	-	8.4E-13	-	-	-	-	-	-	-	-	-	-	-	-	-	5E-08	-	5E-08	-	-
OCDF	-	4.0E-08	-	2.0E-09	-	7.1E-13	-	-	-	-	-	-	-	-	-	-	-	-	-	4E-08	-	4E-08	-	-
Total Tetra	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Total Penta	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Total Hexa	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Total Hepta	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Total Octa	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
PCDD/PCDF	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
PCBs																								
Aroclor-1254	2.3E-02	7.3E-08	5.3E-03	1.7E-08	4.0E-07	1.3E-12	-	-	-	-	-	-	-	-	-	-	7.9E-02	3E-07	2.8E-02	9E-08	2.8E-02	9E-08	-	-
PCB-105	-	3.1E-11	-	7.3E-12	-	5.4E-16	-	-	-	-	-	-	-	-	-	-	-	1E-10	-	4E-11	-	4E-11	-	-
PCB-114	-	1.1E-12	-	2.7E-13	-	2.0E-17	-	-	-	-	-	-	-	-	-	-	-	4E-12	-	1E-12	-	1E-12	-	-
PCB-118	-	6.7E-11	-	1.6E-11	-	1.2E-15	-	-	-	-	-	-	-	-	-	-	-	2E-10	-	8E-11	-	8E-11	-	-
PCB-123	-	7.5E-13	-	1.8E-13	-	1.3E-17	-	-	-	-	-	-	-	-	-	-	-	3E-12	-	9E-13	-	9E-13	-	-
PCB-126	-	6.3E-09	-	1.5E-09	-	1.1E-13	-	-	-	-	-	-	-	-	-	-	-	2E-08	-	8E-09	-	8E-09	-	-
PCB-156	-	1.6E-11	-	3.7E-12	-	2.7E-16	-	-	-	-	-	-	-	-	-	-	-	5E-11	-	2E-11	-	2E-11	-	-
PCB-157	-	5.1E-12	-	1.2E-12	-	8.9E-17	-	-	-	-	-	-	-	-	-	-	-	2E-11	-	6E-12	-	6E-12	-	-
PCB-167	-	8.8E-12	-	2.1E-12	-	1.5E-16	-	-	-	-	-	-	-	-	-	-	-	3E-11	-	1E-11	-	1E-11	-	-
PCB-169	-	1.4E-10	-	3.2E-11	-	2.4E-15	-	-	-	-	-	-	-	-	-	-	-	5E-10	-	2E-10	-	2E-10	-	-
PCB-189	-	1.3E-12	-	3.1E-13	-	2.3E-17	-	-	-	-	-	-	-	-	-	-	-	5E-12	-	2E-12	-	2E-12	-	-
PCB-77	-	1.3E-11	-	3.0E-12	-	2.2E-16	-	-	-	-	-	-	-	-	-	-	-	3E-11	-	2E-11	-	2E-11	-	-
PCB-81	-	7.5E-12	-	1.8E-12	-	1.3E-16	-	-	-	-	-	-	-	-	-	-	-	1E-11	-	9E-12	-	9E-12	-	-
Total PCB Congeners	-	6.5E-09	-	1.5E-09	-	1.1E-13	-	-	-	-	-	-	-	-	-	-	-	2E-08	-	8E-09	-	8E-09	-	-
Cumulative Risk	9.3E-02	1.0E-05	6.4E-03	5.7E-07	4.4E-04	5.9E-10	6.7E-03	-	1.3E-04	-	7.5E-06	5.6E-10	2.3E-07	1.7E-11	4.9E+00	2E-06	5.2E-01	4E-06	5.0E+00	1E-05	1.1E-01	1E-05	4.9E+00	2E-06
W/O Domestic Groundwater Use																			1.1E-01	1E-05			7.8E-06	6E-10

Table C1-9 (3 of 4)

Total Risk Estimates for the Child Resident
New Conservation Yard RFI Site

Reasonable Maximum Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation of Indoor Air_s		Inhalation Ambient Air_s		Inhalation of Indoor Air_{gw}		Inhalation Ambient Air_{gw}		Domestic Groundwater Use		Plant Consumption		Cumulative Risk		Soil Media Risk		Groundwater Risk	
	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)
Inorganic Compounds																								
Barium	6.1E-02	-	1.7E-03	-	1.1E-03	-	-	-	-	-	-	-	-	-	-	-	2.7E-01	-	6.4E-02	-	6.4E-02	-	-	-
Cadmium	1.7E-01	5.2E-06	4.8E-04	1.4E-08	3.9E-04	2.7E-09	-	-	-	-	-	-	-	-	-	-	5.0E-01	2E-04	1.7E-01	5E-06	1.7E-01	5E-06	-	-
Chromium	3.5E-04	-	9.7E-06	-	1.2E-04	-	-	-	-	-	-	-	-	-	-	-	1.9E-05	-	4.7E-04	-	4.7E-04	-	-	-
Copper	2.6E-02	-	7.3E-04	-	2.0E-05	-	-	-	-	-	-	-	-	-	3.6E-02	-	0.0E+00	-	6.3E-02	-	2.7E-02	-	3.6E-02	-
Fluoride	-	-	-	-	-	-	-	-	-	-	-	-	-	-	7.5E-01	-	-	-	7.5E-01	-	-	-	7.5E-01	-
Lead	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Mercury	2.7E-02	-	7.7E-04	-	4.2E-06	-	-	-	-	-	-	-	-	-	-	-	1.2E-01	-	2.8E-02	-	2.8E-02	-	-	-
Molybdenum	1.5E-02	-	4.3E-04	-	-	-	-	-	-	-	-	-	-	-	-	-	2.0E-02	-	1.6E-02	-	1.6E-02	-	-	-
Nickel	3.6E-02	-	1.0E-03	-	6.7E-04	6.9E-10	-	-	-	-	-	-	-	-	-	-	2.2E-02	-	3.8E-02	7E-10	3.8E-02	7E-10	-	-
Nitrate	-	-	-	-	-	-	-	-	-	-	-	-	-	-	7.1E-01	-	-	-	7.1E-01	-	-	-	7.1E-01	-
Selenium	7.7E-03	-	2.1E-04	-	8.8E-08	-	-	-	-	-	-	-	-	-	-	-	1.6E-02	-	7.9E-03	-	7.9E-03	-	-	-
Silver	2.5E-01	-	6.9E-03	-	-	-	-	-	-	-	-	-	-	-	-	-	3.8E-03	-	2.5E-01	-	2.5E-01	-	-	-
Thallium	-	-	-	-	-	-	-	-	-	-	-	-	-	-	5.4E-01	-	-	-	5.4E-01	-	-	-	5.4E-01	-
Zinc	1.2E-01	-	3.3E-03	-	4.7E-05	-	-	-	-	-	-	-	-	-	-	-	1.3E+00	-	1.2E-01	-	1.2E-01	-	-	-
VOCs																								
1,1-Dichloroethane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	4.2E-03	2E-07	-	-	4.2E-03	2E-07	-	-	4.2E-03	2E-07
1,2-Dichloroethane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	7.2E-03	5E-07	-	-	7.2E-03	5E-07	-	-	7.2E-03	5E-07
Acetone	-	-	-	-	-	-	-	-	-	-	2.0E-07	-	3.3E-12	-	2.8E-03	-	-	-	2.8E-03	-	-	-	2.8E-03	-
Benzene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	2.3E-02	7E-07	-	-	2.3E-02	7E-07	-	-	2.3E-02	7E-07
Carbon disulfide	-	-	-	-	-	-	-	-	-	-	-	-	-	-	4.2E-03	-	-	-	4.2E-03	-	-	-	4.2E-03	-
Chloromethane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
cis-1,2-Dichloroethene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	8.2E-01	-	-	-	8.2E-01	-	-	-	8.2E-01	-
Methylene chloride	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1.7E-03	1E-07	-	-	1.7E-03	1E-07	-	-	1.7E-03	1E-07
Toluene	1.8E-05	-	4.9E-06	-	-	-	2.1E-02	-	1.9E-04	-	2.3E-06	-	7.4E-08	-	3.6E-03	-	3.6E-03	-	2.5E-02	-	2.1E-02	-	3.6E-03	-
Trichloroethene	-	-	-	-	-	-	-	-	-	-	8.9E-06	8.4E-10	2.7E-07	2.5E-11	5.3E+00	2E-06	-	-	5.3E+00	2E-06	-	-	5.3E+00	2E-06
SVOCs																								
Benzo(a)anthracene	-	1.5E-08	-	5.4E-09	-	6.3E-14	-	-	-	-	-	-	-	-	-	-	-	8E-07	-	2E-08	-	2E-08	-	-
Benzo(a)pyrene	-	5.3E-07	-	1.9E-07	-	2.3E-12	-	-	-	-	-	-	-	-	-	-	-	1E-05	-	7E-07	-	7E-07	-	-
Benzo(b)fluoranthene	-	8.0E-08	-	2.9E-08	-	3.4E-13	-	-	-	-	-	-	-	-	-	-	-	2E-06	-	1E-07	-	1E-07	-	-
Benzo(g,h,i)perylene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Benzo(k)fluoranthene	-	1.5E-08	-	5.4E-09	-	6.3E-14	-	-	-	-	-	-	-	-	-	-	-	5E-07	-	2E-08	-	2E-08	-	-
Chrysene	-	3.3E-09	-	1.2E-09	-	1.4E-14	-	-	-	-	-	-	-	-	-	-	-	2E-07	-	5E-09	-	5E-09	-	-
Dibenz(a,h)anthracene	-	3.4E-08	-	1.2E-08	-	4.4E-13	-	-	-	-	-	-	-	-	-	-	-	4E-07	-	5E-08	-	5E-08	-	-
Fluoranthene	1.2E-05	-	4.2E-06	-	1.5E-10	-	-	-	-	-	-	-	-	-	-	-	9.9E-05	-	1.6E-05	-	1.6E-05	-	-	-
Indeno(1,2,3-cd)pyrene	-	6.5E-08	-	2.4E-08	-	2.8E-13	-	-	-	-	-	-	-	-	-	-	-	5E-07	-	9E-08	-	9E-08	-	-
Phenanthrene	6.0E-06	-	2.2E-06	-	7.8E-11	-	-	-	-	-	-	-	-	-	-	-	1.1E-04	-	8.1E-06	-	8.1E-06	-	-	-
Pyrene	1.8E-05	-	6.7E-06	-	2.4E-10	-	-	-	-	-	-	-	-	-	-	-	1.8E-04	-	2.5E-05	-	2.5E-05	-	-	-
Total Petroleum Hydrocarbons																								
C20-C30(Lubricant Oil Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

Table C1-9 (4 of 4)

Total Risk Estimates for the Child Resident
New Conservation Yard RFI Site

Reasonable Maximum Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation of Indoor Air_s		Inhalation Ambient Air_s		Inhalation of Indoor Air_{gw}		Inhalation Ambient Air_{gw}		Domestic Groundwater Use		Plant Consumption		Cumulative Risk		Soil Media Risk		Groundwater Risk	
	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)
Dioxins																								
2,3,7,8-TCDD	-	4.6E-06	-	3.8E-07	-	6.0E-11	-	-	-	-	-	-	-	-	-	-	-	-	-	5E-06	-	5E-06	-	-
1,2,3,7,8-PeCDD	-	1.2E-05	-	1.0E-06	-	1.6E-10	-	-	-	-	-	-	-	-	-	-	-	-	-	1E-05	-	1E-05	-	-
1,2,3,4,7,8-HxCDD	-	1.4E-06	-	1.2E-07	-	1.8E-11	-	-	-	-	-	-	-	-	-	-	-	-	-	1E-06	-	1E-06	-	-
1,2,3,6,7,8-HxCDD	-	7.1E-06	-	6.0E-07	-	9.3E-11	-	-	-	-	-	-	-	-	-	-	-	-	-	8E-06	-	8E-06	-	-
1,2,3,7,8,9-HxCDD	-	6.2E-06	-	5.2E-07	-	8.2E-11	-	-	-	-	-	-	-	-	-	-	-	-	-	7E-06	-	7E-06	-	-
1,2,3,4,6,7,8-HpCDD	-	1.6E-05	-	1.3E-06	-	2.1E-10	-	-	-	-	-	-	-	-	-	-	-	-	-	2E-05	-	2E-05	-	-
OCDD	-	5.5E-06	-	4.6E-07	-	7.2E-11	-	-	-	-	-	-	-	-	-	-	-	-	-	6E-06	-	6E-06	-	-
2,3,7,8-TCDF	-	7.6E-08	-	6.4E-09	-	9.9E-13	-	-	-	-	-	-	-	-	-	-	-	-	-	8E-08	-	8E-08	-	-
1,2,3,7,8-PeCDF	-	4.0E-08	-	3.4E-09	-	5.2E-13	-	-	-	-	-	-	-	-	-	-	-	-	-	4E-08	-	4E-08	-	-
2,3,4,7,8-PeCDF	-	6.9E-07	-	5.8E-08	-	9.1E-12	-	-	-	-	-	-	-	-	-	-	-	-	-	7E-07	-	7E-07	-	-
1,2,3,4,7,8-HxCDF	-	8.3E-07	-	7.0E-08	-	1.1E-11	-	-	-	-	-	-	-	-	-	-	-	-	-	9E-07	-	9E-07	-	-
1,2,3,6,7,8-HxCDF	-	6.5E-07	-	5.4E-08	-	8.5E-12	-	-	-	-	-	-	-	-	-	-	-	-	-	7E-07	-	7E-07	-	-
2,3,4,6,7,8-HxCDF	-	1.4E-06	-	1.2E-07	-	1.9E-11	-	-	-	-	-	-	-	-	-	-	-	-	-	2E-06	-	2E-06	-	-
1,2,3,7,8,9-HxCDF	-	1.9E-07	-	1.6E-08	-	2.5E-12	-	-	-	-	-	-	-	-	-	-	-	-	-	2E-07	-	2E-07	-	-
1,2,3,4,6,7,8-HpCDF	-	2.7E-06	-	2.2E-07	-	3.5E-11	-	-	-	-	-	-	-	-	-	-	-	-	-	3E-06	-	3E-06	-	-
1,2,3,4,7,8,9-HpCDF	-	2.4E-07	-	2.0E-08	-	3.2E-12	-	-	-	-	-	-	-	-	-	-	-	-	-	3E-07	-	3E-07	-	-
OCDF	-	2.0E-07	-	1.7E-08	-	2.7E-12	-	-	-	-	-	-	-	-	-	-	-	-	-	2E-07	-	2E-07	-	-
Total Tetra	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Total Penta	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Total Hexa	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Total Hepta	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Total Octa	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
PCDD/PCDF	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
PCBs																								
Aroclor-1254	4.5E-02	1.5E-07	1.8E-02	5.7E-08	6.0E-07	1.9E-12	-	-	-	-	-	-	-	-	-	-	7.9E-02	4E-06	6.3E-02	2E-07	6.3E-02	2E-07	-	-
PCB-105	-	8.4E-11	-	3.3E-11	-	1.1E-15	-	-	-	-	-	-	-	-	-	-	-	2E-09	-	1E-10	-	1E-10	-	-
PCB-114	-	3.1E-12	-	1.2E-12	-	4.1E-17	-	-	-	-	-	-	-	-	-	-	-	8E-11	-	4E-12	-	4E-12	-	-
PCB-118	-	1.8E-10	-	7.2E-11	-	2.4E-15	-	-	-	-	-	-	-	-	-	-	-	5E-09	-	3E-10	-	3E-10	-	-
PCB-123	-	2.0E-12	-	8.0E-13	-	2.7E-17	-	-	-	-	-	-	-	-	-	-	-	5E-11	-	3E-12	-	3E-12	-	-
PCB-126	-	1.7E-08	-	6.7E-09	-	2.2E-13	-	-	-	-	-	-	-	-	-	-	-	4E-07	-	2E-08	-	2E-08	-	-
PCB-156	-	4.3E-11	-	1.7E-11	-	5.6E-16	-	-	-	-	-	-	-	-	-	-	-	1E-09	-	6E-11	-	6E-11	-	-
PCB-157	-	1.1E-11	-	4.3E-12	-	1.4E-16	-	-	-	-	-	-	-	-	-	-	-	3E-10	-	2E-11	-	2E-11	-	-
PCB-167	-	1.9E-11	-	7.4E-12	-	2.5E-16	-	-	-	-	-	-	-	-	-	-	-	5E-10	-	3E-11	-	3E-11	-	-
PCB-169	-	3.0E-10	-	1.2E-10	-	3.9E-15	-	-	-	-	-	-	-	-	-	-	-	8E-09	-	4E-10	-	4E-10	-	-
PCB-189	-	2.8E-12	-	1.1E-12	-	3.7E-17	-	-	-	-	-	-	-	-	-	-	-	7E-11	-	4E-12	-	4E-12	-	-
PCB-77	-	3.5E-11	-	1.4E-11	-	4.6E-16	-	-	-	-	-	-	-	-	-	-	-	5E-10	-	5E-11	-	5E-11	-	-
PCB-81	-	2.0E-11	-	8.0E-12	-	2.7E-16	-	-	-	-	-	-	-	-	-	-	-	3E-10	-	3E-11	-	3E-11	-	-
Total PCB Congeners	-	1.8E-08	-	7.0E-09	-	2.3E-13	-	-	-	-	-	-	-	-	-	-	-	5E-07	-	2E-08	-	2E-08	-	-
Cumulative Risk	7.5E-01	6.6E-05	3.3E-02	5.3E-06	2.4E-03	4.2E-09	2.1E-02	-	1.9E-04	-	1.1E-05	8.4E-10	3.4E-07	2.5E-11	8.2E+00	3E-06	2.3E+00	2E-04	9.0E+00	7E-05	8.1E-01	7E-05	8.2E+00	3E-06
W/O Domestic Groundwater Use																			8.1E-01	7E-05			1.2E-05	9E-10

Notes:
Inhalation Indoor Air_s - Exposure associated with indoor air concentrations of COPCs modeled from soil.
Inhalation Ambient Air_s - Exposure associated with ambient air concentrations of COPCs modeled from soil.
Inhalation Indoor Air_{gw} - Exposure associated with indoor air concentrations of COPCs modeled from groundwater.
Inhalation Ambient Air_{gw} - Exposure associated with ambient air concentrations of COPCs modeled from groundwater.
HQ - hazard quotient
HI - hazard index
Risk - incremental increased lifetime cancer risk
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyls
COPC - chemical of potential concern
"-" indicates that either adequate toxicity data were not available for a chemical or the exposure pathway was not applicable to that chemical.

Table C1-10 (1 of 1)

Estimated Blood Lead Levels
New Conservation Yard RFI Site

Exposure Scenario	Percentile Estimate of Blood Lead Concentration (µg/dl)				
	50th	90th	95th	98th	99th
Central Tendency Exposure					
Adult Worker	0.87	1.6	1.9	2.3	2.6
Adult Recreator	0.85	1.5	1.8	2.2	2.5
Child Recreator	1.0	1.8	2.2	2.6	3.0
Adult Resident	0.88	1.6	1.9	2.3	2.6
Child Resident	1.2	2.2	2.6	3.1	3.6
Reasonable Maximum Exposure					
Adult Worker	1.0	1.9	2.3	2.7	3.1
Adult Recreator	0.96	1.76	2.1	2.5	2.9
Child Recreator	1.2	2.2	2.6	3.2	3.6
Adult Resident	1.04	1.9	2.3	2.7	3.1
Child Resident	1.6	2.9	3.5	4.2	4.8

Notes:

Blood lead concentrations estimated using the DTSC LeadSpread Model, Version 7, and incorporation of site-specific exposure parameters specified in the SRAM for skin surface area, soil adherence factor, soil ingestion rate, inhalation rate, drinking water consumption rate, and homegrown edible plant consumption rate.

µg/dl - micrograms per deciliter

Table C1-11 (1 of 1)

Human Health Risk Assessment Uncertainty Analysis
New Conservation Yard RFI Site

Assessment Element	Uncertainty	Magnitude of Impact	Direction of Impact
Exposure Pathways	Domestic use of near surface groundwater was determined to be an incomplete exposure pathway because the estimated production rate is below the minimum criteria of 200 gp specified in the SRAM.	Low	Realistic, reasonable determination
	Risks associated with drinking of groundwater are not realistic because the groundwater beneath the SSFL is not currently used as a drinking water source and the presence of the contamination will likely require a restriction on its future use as well.	High	Conservative
	Groundwater monitoring data and comparison concentrations (I.e., background), are filtered samples (I.e., dissolved concentrations) as per agency-approved groundwater monitoring work plan. Although dissolved concentrations represent the concentrations that may migrate, the total concentration in groundwater may be greater when there are significant amounts of dissolved solids present (i.e., total concentration.	Moderate	Realistic, reasonable determination
	Future land use of the site is currently undecided but may be commercial or recreational, which have lower risks than residential.	Moderate	Uncertain
COPC Selection	The results of the Wilcoxon Rank Sum test indicate that barium, copper, lead, mercury and nickel site soil concentrations are similar to background. However, these metals were selected as COPCs because of the spatial extent of the highest detections which exceeded the range of background concentrations.	Low	Conservative
EPC Calculations	Groundwater exposure point concentrations are based on maximum detected concentrations	Low	Conservative
	Vapor migration into indoor air has been estimated using a model which is being validated for the site. Migration estimates may be changed once the model validation is complete.	Moderate	Uncertain
	While measured and non-detect PAH concentrations are available for samples in and around the ash pile, PAHs were not analyzed for in Ash Pile samples that contain the highest concentrations of dioxins. It is therefore likely that the highest PAH concentrations are not accounted for. However, given the presence of elevated dioxins in the Ash Pile, more information regarding the levels of PAHs would not likely alter decision-making.	Moderate	Non-Conservative
Cancer Slope Factor	Extrapolation of dose-response data from laboratory animals to humans.	High	Conservative
	Assumes that all carcinogens do not have a threshold below which carcinogenic response occurs, and therefore, any dose, no matter how small, results in some potential risk.	Moderate	Conservative
	Cancer slope factors derived from animal studies are the upper-bound maximum likelihood estimates based on a linear dose-response curve, and therefore, overstate carcinogenic potency.	Moderate	Conservative
Reference Dose	High degree of uncertainty in extrapolation of dose-response data from laboratory animals to humans.	High	Conservative

Notes:
PAH - polycyclic aromatic hydrocarbon
COPC - Chemical of potential concern
EPC - exposure point concentration
UCL - upper confidence limit

Table C1-12 (1 of 2)

Summary of Chemicals of Potential Ecological Concern
New Conservation Yard RFI Site

Chemical	Soil/Sediment (0 to 2 feet bgs)	Soil/Sediment (0 to 4 feet bgs)	Soil/Sediment (0 to 6 feet bgs)
Inorganic Compounds			
Antimony	X	X	X
Barium	X	X	X
Cadmium	X	X	X
Chromium	X	X	X
Copper	X	X	X
Lead	X	X	X
Mercury	X	X	X
Molybdenum	X	X	X
Nickel	X	X	X
Selenium	X	X	X
Silver	X	X	X
Zinc	X	X	X
VOCs			
Toluene	X	X	X
SVOCs			
Benzo(a)anthracene	X	X	X
Benzo(a)pyrene	X	X	X
Benzo(b)fluoranthene	X	X	X
Benzo(g,h,i)perylene	X	X	X
Benzo(k)fluoranthene	X	X	X
Chrysene	X	X	X
Dibenz(a,h)anthracene	X	X	X
Fluoranthene	X	X	X
Indeno(1,2,3-cd)pyrene	X	X	X
Phenanthrene	X	X	X
Pyrene	X	X	X
Dioxins			
2,3,7,8-TCDD	X	X	X
1,2,3,7,8-PeCDD	X	X	X
1,2,3,4,7,8-HxCDD	X	X	X
1,2,3,6,7,8-HxCDD	X	X	X
1,2,3,7,8,9-HxCDD	X	X	X
1,2,3,4,6,7,8-HpCDD	X	X	X
OCDD	X	X	X
2,3,7,8-TCDF	X	X	X
1,2,3,7,8-PeCDF	X	X	X
2,3,4,7,8-PeCDF	X	X	X
1,2,3,4,7,8-HxCDF	X	X	X
1,2,3,6,7,8-HxCDF	X	X	X
2,3,4,6,7,8-HxCDF	X	X	X
1,2,3,7,8,9-HxCDF	X	X	X
1,2,3,4,6,7,8-HpCDF	X	X	X
1,2,3,4,7,8,9-HpCDF	X	X	X
OCDF	X	X	X
PCBs			
Aroclor-1254	X	X	X
PCB-105	X	X	X
PCB-114	X	X	X
PCB-118	X	X	X
PCB-123	X	X	X
PCB-126	X	X	X
PCB-156	X	X	X
PCB-157	X	X	X
PCB-167	X	X	X
PCB-169	X	X	X
PCB-189	X	X	X

Table C1-12 (2 of 2)

Summary of Chemicals of Potential Ecological Concern
New Conservation Yard RFI Site

Chemical	Soil/Sediment (0 to 2 feet bgs)	Soil/Sediment (0 to 4 feet bgs)	Soil/Sediment (0 to 6 feet bgs)
PCB-77	X	X	X
PCB-81	X	X	X

Notes:
X - selected as a chemical of potential ecological concern
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyl
bgs - below ground surface

Table C1-13 (1 of 1)

Ecological Risk Assessment Conceptual Site Model
New Conservation Yard RFI Site

NOTES:

(*) Trophic Level: P = primary producers (e.g., plants); D = detrivores (e.g., invertabrates); 1 = 1st consumer (e.g., mule deer); 2 = 2nd consumer (e.g. deer mouse); 3 = 3rd consumer (e.g., red-tailed hawk).

(**) Exposure limited to volatile compounds as defined in the text.

(***) Exposures limited to bioacummulative compounds as defined in the text.

- complete and potentially complete exposure pathways evaluated in this risk assessment

- incomplete exposure pathways not evaluated in this risk assessment

- minor exposure pathway not evaluated in this risk assessment

Baseline Toxicity Criteria for Ecological Risk Assessment
New Conservation Yard RFI Site

Chemical	Mammalian Scaling Factor[a]	Small Mammal TRV (mg/kg-day)	Small Mammal Scaling Used?[b]	Source	Small Mammal RfC (mg/m^3)	Source	Bobcat TRV[b] (mg/kg-day)	Bobcat Scaling Used?	Mule Deer TRV[b] (mg/kg-day)	Mule Deer Scaling Used?	Avian TRV (mg/kg-day)	Source
Inorganic Compounds												
Antimony	0.94	1	No	c	-	-	1	Yes	1	Yes	-	-
Barium	0.746	5	No	a	-	-	5	No	1	Yes	20.8	a
Cadmium	0.44	1.00	No	a	-	-	1	No	0	Yes	0.08	a
Chromium	0.94	1834	No	a	-	-	-	-	-	-	-	NA
Copper	0.94	10	No	a	-	-	10	No	7	Yes	2.3	a
Lead	0.94	1.0	No	d	-	-	1	No	0.7	Yes	0.014	e
Molybdenum	0.94	88.00	No	f	-	-	88.00	No	63.40	Yes	3.5	g
Nickel	0.94	60	No	a	-	-	60	No	43	Yes	1.38	a
Selenium	1.01	0.05	No	h	-	-	0.05	No	0.05	Yes	0.23	g
Zinc	0.85	120	No	k	-	-	120	No	53	Yes	14.5	g
VOCs												
Toluene	0.94	-	-	s	219	b	-	-	-	-	-	NA
SVOCs												
Benzo(a)anthracene	0.94	-	-	g	-	-	-	-	-	-	-	NA
Benzo(a)pyrene	0.94	-	-	g	-	-	-	-	-	-	-	NA
Benzo(b)fluoranthene	0.94	-	-	g	-	-	-	-	-	-	-	NA
Benzo(g,h,i)perylene	0.94	-	-	g	-	-	-	-	-	-	-	NA
Benzo(k)fluoranthene	0.94	-	-	g	-	-	-	-	-	-	-	NA
Chrysene	0.94	-	-	g	-	-	-	-	-	-	-	NA
Dibenz(a,h)anthracene	0.94	-	-	g	-	-	-	-	-	-	-	NA
Fluoranthene	0.94	-	-	g	-	-	-	-	-	-	-	NA
Indeno(1,2,3-cd)pyrene	0.94	-	-	g	-	-	-	-	-	-	-	NA
Phenanthrene	0.94	-	-	g	-	-	-	-	-	-	-	g
Pyrene	0.94	-	-	o	-	-	-	-	-	-	-	NA
Total Petroleum Hydrocarbons												
C08-C11(Gasoline Range)	0.94	-	-	NA	-	-	-	-	-	-	-	NA
C11-C14(Kerosene Range)	0.94	-	-	NA	-	-	-	-	-	-	-	NA
C14-C20(Diesel Range)	0.94	-	-	NA	-	-	-	-	-	-	-	NA
C20-C30(Lubricant Oil Range)	0.94	-	-	NA	-	-	-	-	-	-	-	NA
Dioxins												
2,3,7,8-TCDD	0.537	1.0 E-6	No	a	-	-	1.0 E-6	No	9.3 E-8	Yes	-	a
1,2,3,7,8-PeCDD	0.537	1.0 E-6	No	a	-	-	1.0 E-6	No	9.3 E-8	Yes	1.4 E-5	a

Baseline Toxicity Criteria for Ecological Risk Assessment
New Conservation Yard RFI Site

Chemical	Mammalian Scaling Factor[a]	Small Mammal TRV (mg/kg-day)	Small Mammal Scaling Used?[b]	Source	Small Mammal RfC (mg/m^3)	Source	Bobcat TRV[b] (mg/kg-day)	Bobcat Scaling Used?	Mule Deer TRV[b] (mg/kg-day)	Mule Deer Scaling Used?	Avian TRV (mg/kg-day)	Source
1,2,3,4,7,8-HxCDD	0.537	1.0 E-5	No	a	-	-	-	-	9.3 E-7	Yes	-	a
1,2,3,6,7,8-HxCDD	0.537	1.0 E-5	No	a	-	-	-	-	9.3 E-7	Yes	-	a
1,2,3,7,8,9-HxCDD	0.537	1.0 E-5	No	a	-	-	-	-	9.3 E-7	Yes	-	a
1,2,3,4,6,7,8-HpCDD	0.537	1.0 E-4	No	a	-	-	1.0 E-4	No	9.3 E-6	Yes	-	a
OCDD	0.537	-	-	a	-	-	-	-	9.3 E-4	Yes	-	a
2,3,7,8-TCDF	0.537	-	-	a	-	-	-	-	-	-	1.0 E-6	a
1,2,3,7,8-PeCDF	0.537	-	-	a	-	-	-	-	-	-	-	a
2,3,4,7,8-PeCDF	0.537	2.0 E-6	No	a	-	-	-	-	1.9 E-7	Yes	-	a
1,2,3,4,7,8-HxCDF	0.537	1.0 E-5	No	a	-	-	-	-	9.3 E-7	Yes	-	a
1,2,3,6,7,8-HxCDF	0.537	-	-	a	-	-	-	-	9.3 E-7	Yes	-	a
2,3,4,6,7,8-HxCDF	0.537	1.0 E-5	No	a	-	-	-	-	9.3 E-7	Yes	-	a
1,2,3,7,8,9-HxCDF	0.537	-	-	a	-	-	-	-	-	-	-	a
1,2,3,4,6,7,8-HpCDF	0.537	1.0 E-4	No	a	-	-	-	-	9.3 E-6	Yes	-	a
1,2,3,4,7,8,9-HpCDF	0.537	-	-	a	-	-	-	-	-	-	-	a
OCDF	0.537	-	-	a	-	-	-	-	-	-	-	a
PCBs												
Aroclor-1254	0.94	-	-	r	-	-	-	-	-	-	-	g
PCB-105	0.94	-	-	g	-	-	-	-	-	-	-	g
PCB-118	0.94	-	-	g	-	-	-	-	-	-	-	g
PCB-126	0.94	-	-	g	-	-	-	-	-	-	-	g
PCB-156	0.94	-	-	g	-	-	-	-	-	-	-	g
PCB-157	0.94	-	-	g	-	-	-	-	-	-	-	g
PCB-77	0.94	-	-	g	-	-	-	-	-	-	-	g
PCB-81	0.94	-	-	g	-	-	-	-	-	-	-	g

Table C1-14 (3 of 3)

Baseline Toxicity Criteria for Ecological Risk Assessment
New Conservation Yard RFI Site

Chemical	Mammalian Scaling Factor[a]	Small Mammal TRV (mg/kg-day)	Small Mammal Scaling Used?[b]	Source	Small Mammal RfC (mg/m^3)	Source	Bobcat TRV[b] (mg/kg-day)	Bobcat Scaling Used?	Mule Deer TRV[b] (mg/kg-day)	Mule Deer Scaling Used?	Avian TRV (mg/kg-day)	Source

Notes:

a. Based on Sample and Arenal (1999).

b. Bobcat and mule deer TRVs are based on small mammal TRVs. Allometric scaling was performed if there was body weight difference between the test species and the receptor species greater than 100-fold.

c. Antimony - small mammal TRV based on subchronic LOAEL in the rat (0.35 kg) of 1,879 mg/kg-day for growth, organ weight, histology, and blood chemistry (Hext et al. 1999), and application of uncertainty factor of 10 for a subchronic to chronic study.

d. Lead - small mammal TRV based on chronic NOAEL in the rat (0.35 kg) of 8 mg/kg-day for reproductive effects mg/kg-day (Sample et al. 1996).

e. Lead - avian TRV based on NOAEL in Japanese quail of 1.13 (Sample et al., 1996).

f. Molybdenum - small mammal TRV based on chronic NOAEL in the rat (0.35 kg) of 0.9 mg/kg-day for reproductive effects mg/kg-day (Fungwe et al. 1990).

g. Lowest available toxicity values for mammals as used to derive ecological screening levels (ESLs).

h. Selenium, small mammal TRV based on chronic LOAEL in the mouse (0.0246 kg) of 1.21 mg/kg-day for reproductive effects (EFA West 1998), and application of uncertainty factor of 5 for a LOAEL to a NOAEL.

j. Thallium - small mammal TRV based on a chronic LOAEL in the rat (0.35 kg) of 10 mg/kg-day Formigli et al, 1986) and application of an uncertainty. factor of 5 for extrapolation from a LOAEL to a NOAEL.

k. Zinc - small mammal TRV based on chronic LOAEL in the rat (0.175 kg) of 411.43 mg/kg-day for decreased decreased fetal weight (EFA West 1998), and application of uncertainty factor of 5 for extrapolation from a LOAEL to a NOAEL.

l. 1,1,1-Trichloroethane - small mammal inhalation RfC based on NOAEL in the rat and mouse of 1,500 ppm (Quast et al., 1978, 1988) and adjusted for exposure time.

m. 1,1,2-Trichloro-1,2,2-trifluoroethane - small mammal inhalation RfC based on NOAEL in the rat of 25,000 ppm for reproductive effects (EPA, 1994) and adjusted for exposure time.

n. 1,1-Dichloroethene - small mammal inhalation RfC based on NOAEL in the rat of 6,000 ppm for reproductive effects (Hurtt et al., 1993) and adjusted for exposure time.

o. cis-1,2-Dichloroethene - small mammal inhalation RfC based on NOAEL in the rat of 6,000 ppm for reproductive effects (Hurtt et al., 1993) and adjusted for exposure time.

p. Tetrachloroethene - small mammal inhalation RfC based on NOAEL in the rat of 100 ppm for reproductive effects (Nelson et al., 1980) and adjusted for exposure time.

q. Trichloroethene - small mammal inhalation RfC based on NOAEL in the rat of 1,800 ppm for reproductive effects (Doefmueller et al. 1979) and adjusted for exposure time.

r. Aroclor 1254 - small mammal TRV based on chronic NOAEL in the mink (1 kg) of 0.14 mg/kg-day for reproductive effects mg/kg-day (Aulerich and Ringer, 1977).

s. Toluene - small mammal TRV based on chronic NOAEL in the rat (0.25 kg) of 219 mg/m^3 for histopathological lesions (Gibson & Hardisty; NTP 1990)

- - Not Applicable

ESL Toxicity Criteria for Ecological Risk Assessment
New Conservation Yard RFI Site

Chemical	Mammalian Scaling Factor[a]	Small Mammal ESL TRV[b] (mg/kg-day)	Small Mammal Scaling Used?[c]	Bobcat ESL TRV[c] (mg/kg-day)	Bobcat Scaling Used?	Mule Deer ESL TRV[c] (mg/kg-day)	Mule Deer Scaling Used?	Avian ESL TRV (mg/kg-day)
Inorganic Compounds								
Antimony	0.94	0.13	No	0.088	Yes	0.081	Yes	NTV
Barium	0.75	5.10	No	5.1	No	5.1	No	21
Cadmium	0.44	0.06	No	0.0024	Yes	0.0011	Yes	0.08
Chromium	0.94	1468.00	No	1468.0	No	1106.2	Yes	NTV
Copper	0.94	2.67	No	1.9	Yes	1.7	Yes	2
Lead	0.94	1.00	No	1.0	No	0.75	Yes	0.0140
Molybdenum	0.94	0.26	No	0.18	Yes	0.17	Yes	3.5
Nickel	0.94	0.13	No	0.1	No	0.1	Yes	1
Selenium	1.01	0.05	No	0.050	No	0.053	Yes	0.23
Zinc	0.85	9.60	No	3.9	Yes	3.2	Yes	15
VOCs								
Toluene	0.94	0.58	No	0.4	Yes	0.4	Yes	NTV
SVOCs								
Benzo(a)anthracene	0.94	1.31	No	0.9	Yes	0.9	Yes	NTV
Benzo(a)pyrene	0.94	1.31	No	0.9	Yes	0.9	Yes	NTV
Benzo(b)fluoranthene	0.94	1.31	No	0.9	Yes	0.9	Yes	NTV
Benzo(g,h,i)perylene	0.94	1.31	No	0.9	Yes	0.9	Yes	NTV
Benzo(k)fluoranthene	0.94	1.31	No	0.9	Yes	0.9	Yes	NTV
Chrysene	0.94	1.31	No	0.9	Yes	0.9	Yes	NTV
Dibenz(a,h)anthracene	0.94	1.31	No	0.9	Yes	0.9	Yes	NTV
Fluoranthene	0.94	62.50	No	44.1	Yes	40.6	Yes	NTV
Indeno(1,2,3-cd)pyrene	0.94	1.31	No	0.9	Yes	0.9	Yes	NTV
Phenanthrene	0.94	75.00	No	52.9	Yes	48.8	Yes	1
Pyrene	0.94	37.50	No	26.5	Yes	24.4	Yes	NTV
Dioxins								
2,3,7,8-TCDD	0.54	0.0000010	No	0.0000010	No	0.00000011	Yes	0.000014
1,2,3,7,8-PeCDD	0.54	0.0000010	No	0.0000010	No	0.00000011	Yes	0.000014
1,2,3,4,7,8-HxCDD	0.54	0.000010	No	0.000010	No	0.00000113	Yes	0.00029
1,2,3,6,7,8-HxCDD	0.54	0.000010	No	0.000010	No	0.00000113	Yes	0.0014
1,2,3,7,8,9-HxCDD	0.54	0.000010	No	0.000010	No	0.0000011	Yes	0.0001
1,2,3,4,6,7,8-HpCDD	0.54	0.00010	No	0.00010	No	0.000011	Yes	0.014
OCDD	0.54	0.010	No	0.010	No	0.00113	Yes	0.143
2,3,7,8-TCDF	0.54	0.000010	No	0.000010	No	0.0000011	Yes	0.000001
1,2,3,7,8-PeCDF	0.54	0.000020	No	0.000020	No	0.0000023	Yes	0.00014

ESL Toxicity Criteria for Ecological Risk Assessment
New Conservation Yard RFI Site

Chemical	Mammalian Scaling Factor[a]	Small Mammal ESL TRV[b] (mg/kg-day)	Small Mammal Scaling Used?[c]	Bobcat ESL TRV[c] (mg/kg-day)	Bobcat Scaling Used?	Mule Deer ESL TRV[c] (mg/kg-day)	Mule Deer Scaling Used?	Avian ESL TRV (mg/kg-day)
2,3,4,7,8-PeCDF	0.54	0.000002	No	0.000002	No	0.0000002	Yes	0.000014
1,2,3,4,7,8-HxCDF	0.54	0.000010	No	0.000010	No	0.0000011	Yes	0.00014
1,2,3,6,7,8-HxCDF	0.54	0.000010	No	0.000010	No	0.0000011	Yes	0.00014
2,3,4,6,7,8-HxCDF	0.54	0.000010	No	0.000010	No	0.0000011	Yes	0.00014
1,2,3,7,8,9-HxCDF	0.54	0.000010	No	0.000010	No	0.0000011	Yes	0.00014
1,2,3,4,6,7,8-HpCDF	0.54	0.00010	No	0.00010	No	0.000011	Yes	0.00143
1,2,3,4,7,8,9-HpCDF	0.54	0.00010	No	0.00010	No	0.000011	Yes	0.00143
OCDF	0.54	0.010	No	0.010	No	0.00113	Yes	0.14
PCBs								
Aroclor-1254	0.94	0.068	No	0.046	Yes	0.042	Yes	0.41
PCB-105	0.94	0.010	No	0.010	No	0.0075	Yes	0.14
PCB-114	0.94	0.0020	No	0.0020	No	0.0015	Yes	0.14
PCB-118	0.94	0.010	No	0.010	No	0.0075	Yes	1.4
PCB-123	0.94	0.010	No	0.010	No	0.0075	Yes	1.4
PCB-126	0.94	0.000010	No	0.000010	No	0.0000075	Yes	0.00014
PCB-156	0.94	0.0020	No	0.0020	No	0.0015	Yes	0.14
PCB-157	0.94	0.0020	No	0.0020	No	0.0015	Yes	0.14
PCB-167	0.94	0.10	No	0.10	No	0.075	Yes	1.4
PCB-169	0.94	0.00010	No	0.00010	No	0.000075	Yes	0.014
PCB-189	0.94	0.010	No	0.010	No	0.0075	Yes	1.4
PCB-77	0.94	0.010	No	0.010	No	0.0075	Yes	0.00029
PCB-81	0.94	0.010	No	0.010	No	0.0075	Yes	0.00014

Table C1-15 (3 of 3)

ESL Toxicity Criteria for Ecological Risk Assessment
New Conservation Yard RFI Site

Chemical	Mammalian Scaling Factor[a]	Small Mammal ESL TRV[b] (mg/kg-day)	Small Mammal Scaling Used?[c]	Bobcat ESL TRV[c] (mg/kg-day)	Bobcat Scaling Used?	Mule Deer ESL TRV[c] (mg/kg-day)	Mule Deer Scaling Used?	Avian ESL TRV (mg/kg-day)

Notes:
a. Based on Sample and Arenal (1999).
b. Lowest available toxicity values for mammals as used to derive ecological screening levels (ESLs).
c. Bobcat and mule deer TRVs are based on small mammal TRVs. Allometric scaling was performed if there was body weight difference between the test species and the receptor species greater than 100-fold.
TRV - Toxicity Reference Value
RfC - Reference Concentration

Table C1-16 (1 of 3)

Risk Estimates for the Deer Mouse
New Conservation Yard RFI Site

	Applied Daily Dose		ESL	TRV	Hazard Quotient			
	CTE (mg/kg-day)	RME (mg/kg-day)	(mg/kg-day)	(mg/kg-day)	CTE_{ESL} (unitless)	RME_{ESL} (unitless)	CTE_{TRV} (unitless)	RME_{TRV} (unitless)
Ingestion Exposure Route								
Inorganic Compounds								
Antimony	7.2E+00	7.8E+00	1.3E-01	1.0E+00	**5.8E+01**	**6.2E+01**	**7.2E+00**	**7.8E+00**
Barium	7.2E+01	3.2E+02	5.1E+00	5.1E+00	**1.4E+01**	**6.2E+01**	**1.4E+01**	**6.2E+01**
Cadmium	5.2E+00	3.8E+01	6.0E-02	1.0E+00	**8.6E+01**	**6.4E+02**	**5.2E+00**	**3.8E+01**
Chromium	3.6E+01	6.4E+01	1.5E+03	1.8E+03	2.0E-02	3.5E-02		
Copper	3.5E+01	1.0E+02	2.7E+00	1.0E+01	**1.3E+01**	**3.8E+01**	**3.5E+00**	**1.0E+01**
Lead	8.7E+00	1.2E+01	1.0E+00	1.0E+00	**8.7E+00**	**1.2E+01**	**8.7E+00**	**1.2E+01**
Mercury	4.1E-02	2.2E-01	1.0E+00	1.2E+00	4.1E-02	2.1E-01	-	-
Molybdenum	8.1E+00	1.4E+01	2.6E-01	8.8E+01	**3.1E+01**	**5.6E+01**	9.2E-02	1.6E-01
Nickel	2.9E+01	7.3E+01	1.3E-01	6.0E+01	4.8E-01	**1.2E+00**	-	**1.2E+00**
Selenium	4.5E-01	8.1E-01	5.0E-02	5.0E-02	**9.0E+00**	**1.6E+01**	**9.0E+00**	**1.6E+01**
Silver	1.0E+01	6.5E+01	3.8E-01	6.5E+01	**2.8E+01**	**1.7E+02**	1.6E-01	**1.0E+00**
Zinc	2.4E+02	1.2E+03	9.6E+00	1.2E+02	**2.5E+01**	**1.3E+02**	**2.0E+00**	**1.0E+01**
VOCs								
Toluene	1.2E-02	2.4E-02	5.8E-01	7.8E+01	2.0E-02	4.1E-02	-	-
SVOCs								
Benzo(a)anthracene	3.3E-02	1.1E-02	1.3E+00	1.3E+00	2.5E-02	8.3E-03	-	-
Benzo(a)pyrene	8.6E-03	9.3E-03	1.3E+00	1.3E+00	6.6E-03	7.1E-03	-	-
Benzo(b)fluoranthene	1.2E-02	1.8E-02	1.3E+00	1.3E+00	9.4E-03	1.4E-02	-	-
Benzo(g,h,i)perylene	7.3E-03	5.8E-03	1.3E+00	1.3E+00	5.6E-03	4.4E-03	-	-
Benzo(k)fluoranthene	7.7E-03	2.5E-03	1.3E+00	1.3E+00	5.9E-03	1.9E-03	-	-
Chrysene	2.1E-02	1.5E-02	1.3E+00	1.3E+00	1.6E-02	1.1E-02	-	-
Dibenz(a,h)anthracene	7.8E-03	1.7E-03	1.3E+00	1.3E+00	6.0E-03	1.3E-03	-	-
Fluoranthene	2.1E-02	1.8E-02	6.3E+01	6.3E+01	3.3E-04	2.8E-04	-	-
Indeno(1,2,3-cd)pyrene	8.5E-03	1.1E-02	1.3E+00	1.3E+00	6.5E-03	8.4E-03	-	-
Phenanthrene	4.4E-02	1.7E-02	7.5E+01	1.1E+02	5.8E-04	2.2E-04	-	-
Pyrene	2.0E-02	2.0E-02	3.8E+01	8.3E+00	5.4E-04	5.4E-04	-	-
Dioxins								
2,3,7,8-TCDD	1.2E-06	7.5E-06	1.0E-06	1.0E-06	**1.2E+00**	**7.5E+00**	**1.2E+00**	**7.5E+00**
1,2,3,7,8-PeCDD	3.4E-06	1.9E-05	1.0E-06	1.0E-06	**3.4E+00**	**1.9E+01**	**3.4E+00**	**1.9E+01**
1,2,3,4,7,8-HxCDD	8.3E-06	2.1E-05	1.0E-05	1.0E-05	8.3E-01	**2.1E+00**	-	**2.1E+00**
1,2,3,6,7,8-HxCDD	1.6E-05	4.1E-05	1.0E-05	1.0E-05	**1.6E+00**	**4.1E+00**	**1.6E+00**	**4.1E+00**
1,2,3,7,8,9-HxCDD	1.5E-05	1.0E-04	1.0E-05	1.0E-05	**1.5E+00**	**1.0E+01**	**1.5E+00**	**1.0E+01**
1,2,3,4,6,7,8-HpCDD	4.1E-04	1.0E-03	1.0E-04	1.0E-04	**4.1E+00**	**1.0E+01**	**4.1E+00**	**1.0E+01**

Table C1-16 (2 of 3)

Risk Estimates for the Deer Mouse
New Conservation Yard RFI Site

	Applied Daily Dose		ESL	TRV	Hazard Quotient			
	CTE	RME			CTE_{ESL}	RME_{ESL}	CTE_{TRV}	RME_{TRV}
	(mg/kg-day)	(mg/kg-day)	(mg/kg-day)	(mg/kg-day)	(unitless)	(unitless)	(unitless)	(unitless)
OCDD	3.8E-03	9.5E-03	1.0E-02	1.0E-02	3.8E-01	9.5E-01	-	-
2,3,7,8-TCDF	6.8E-07	1.2E-06	1.0E-05	1.0E-05	6.8E-02	1.2E-01	-	-
1,2,3,7,8-PeCDF	6.5E-07	1.8E-06	2.0E-05	2.0E-05	3.2E-02	9.0E-02	-	-
2,3,4,7,8-PeCDF	1.6E-06	3.2E-06	2.0E-06	2.0E-06	8.1E-01	**1.6E+00**	-	**1.6E+00**
1,2,3,4,7,8-HxCDF	5.3E-06	1.2E-05	1.0E-05	1.0E-05	5.3E-01	**1.2E+00**	-	**1.2E+00**
1,2,3,6,7,8-HxCDF	3.6E-06	8.3E-06	1.0E-05	1.0E-05	3.6E-01	8.3E-01	-	-
2,3,4,6,7,8-HxCDF	8.2E-06	2.0E-05	1.0E-05	1.0E-05	8.2E-01	**2.0E+00**	-	**2.0E+00**
1,2,3,7,8,9-HxCDF	1.5E-06	3.1E-06	1.0E-05	1.0E-05	1.5E-01	3.1E-01	-	-
1,2,3,4,6,7,8-HpCDF	5.6E-05	1.4E-04	1.0E-04	1.0E-04	5.6E-01	**1.4E+00**	-	**1.4E+00**
1,2,3,4,7,8,9-HpCDF	1.6E-05	4.0E-05	1.0E-04	1.0E-04	1.6E-01	4.0E-01	-	-
OCDF	1.7E-04	4.4E-04	1.0E-02	1.0E-02	1.7E-02	4.4E-02	-	-
PCBs								
Aroclor-1254	1.5E-02	1.5E-02	6.8E-02	3.6E-01	2.3E-01	2.3E-01	-	-
PCB-105	1.8E-05	2.4E-05	1.0E-02	1.0E-02	1.8E-03	2.4E-03	-	-
PCB-114	1.3E-06	1.7E-06	2.0E-03	2.0E-03	6.4E-04	8.7E-04	-	-
PCB-118	4.0E-05	5.5E-05	1.0E-02	1.0E-02	4.0E-03	5.5E-03	-	-
PCB-123	4.9E-07	6.7E-07	1.0E-02	1.0E-02	4.9E-05	6.7E-05	-	-
PCB-126	6.3E-07	8.7E-07	1.0E-05	1.0E-05	6.3E-02	8.7E-02	-	-
PCB-156	5.9E-06	8.0E-06	2.0E-03	2.0E-03	2.9E-03	4.0E-03	-	-
PCB-157	2.0E-06	2.1E-06	2.0E-03	2.0E-03	9.8E-04	1.1E-03	-	-
PCB-167	3.5E-06	3.7E-06	1.0E-01	1.0E-01	3.5E-05	3.7E-05	-	-
PCB-169	1.5E-08	1.6E-08	1.0E-04	1.0E-04	1.5E-04	1.6E-04	-	-
PCB-189	3.1E-07	3.4E-07	1.0E-02	1.0E-02	3.1E-05	3.4E-05	-	-
PCB-77	1.5E-06	2.0E-06	1.0E-02	1.0E-02	1.5E-04	2.0E-04	-	-
PCB-81	3.1E-07	4.3E-07	1.0E-02	1.0E-02	3.1E-05	4.3E-05	-	-
Total PCB Congeners	-	-		-	7.4E-02	1.0E-01	0.0E+00	0.0E+00
Total Ingestion HI:					2.9E+02	1.2E+03	6.2E+01	2.2E+02

Table C1-16 (3 of 3)

Risk Estimates for the Deer Mouse
New Conservation Yard RFI Site

	Applied Daily Dose		ESL	TRV	Hazard Quotient			
	CTE (mg/kg-day)	RME (mg/kg-day)	(mg/kg-day)	(mg/kg-day)	CTE_{ESL} (unitless)	RME_{ESL} (unitless)	CTE_{TRV} (unitless)	RME_{TRV} (unitless)

	Burrow Air Concentration		RfC	Hazard Quotient	
	CTE (mg/m^3)	RME (mg/m^3)	(mg/m^3)	CTE (unitless)	RME (unitless)
Inhalation Exposure Route					
VOCs					
Toluene	2.2E+01	4.6E+01	2.2E+02	1.0E-01	2.1E-01
Total Inhalation HI:				1.0E-01	2.1E-01
Total Pathway HI:				6.2E+01	**2.2E+02**

Notes:
CTE - central tendancy exposure
RME - reasonable maximum exposure
CTE_{ESL} or RME_{ESL}- The hazard quotient based on the NOAEL equivalent TRV used to calculate the ESL.
CTE_{TRV} or RME_{TRV}- The hazard quotient based on the TRV is calculated only if the hazard quotient based on the ESL is greater than 1.
TRV - toxicity reference value
RfC - reference concentration
HI - Hazard Index
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyls
mg/kg-day - milligrams per kilogram per day
mg/m^3 - milligrams per cubic meter
"-" not applicable
= HIs for PCB congeners. Not included in Total estimates.

Table C1-17 (1 of 3)

Risk Estimates for the Thrush
New Conservation Yard RFI Site

	Applied Daily Dose		ESL	TRV	Hazard Quotient			
	CTE (mg/kg-day)	RME (mg/kg-day)	mg/kg soil	(mg/kg-day)	CTE_{ESL} (unitless)	RME_{ESL} (unitless)	CTE_{TRV} (unitless)	RME_{TRV} (unitless)
Ingestion Exposure Route								
Inorganic Compounds								
Antimony	8.3E+00	9.0E+00	NTV	NTV	-	-	-	-
Barium	1.0E+02	4.4E+02	2.1E+01	2.1E+01	**4.8E+00**	**2.1E+01**	**4.8E+00**	**2.1E+01**
Cadmium	6.3E+00	4.7E+01	8.0E-02	8.0E-02	**7.9E+01**	**5.9E+02**	**7.9E+01**	**5.9E+02**
Chromium	2.6E+01	4.6E+01	NTV	NTV	-	-	-	-
Copper	6.1E+01	1.7E+02	2.3E+00	2.3E+00	**2.6E+01**	**7.5E+01**	**2.6E+01**	**7.5E+01**
Lead	5.7E+00	7.7E+00	1.4E-02	1.4E-02	**4.1E+02**	**5.5E+02**	**4.1E+02**	**5.5E+02**
Mercury	6.3E-02	3.3E-01	4.5E-01	4.5E-01	1.4E-01	7.3E-01	-	-
Molybdenum	6.5E+00	1.2E+01	3.5E+00	3.5E+00	**1.9E+00**	**3.3E+00**	**1.9E+00**	**3.3E+00**
Nickel	2.1E+01	5.3E+01	1.4E+00	1.4E+00	**1.5E+01**	**3.9E+01**	**1.5E+01**	**3.9E+01**
Selenium	5.6E-01	1.0E+00	2.3E-01	2.3E-01	**2.4E+00**	**4.4E+00**	**2.4E+00**	**4.4E+00**
Silver	1.6E+01	9.9E+01	NTV	NTV	-	-	-	-
Zinc	3.0E+02	1.6E+03	1.5E+01	1.5E+01	**2.1E+01**	**1.1E+02**	**2.1E+01**	**1.1E+02**
VOCs								
Toluene	1.2E-02	2.5E-02	NTV	NTV	-	-	-	-
SVOCs								
Benzo(a)anthracene	2.6E-02	8.4E-03	NTV	NTV	-	-	-	-
Benzo(a)pyrene	8.9E-03	9.7E-03	NTV	NTV	-	-	-	-
Benzo(b)fluoranthene	1.6E-02	2.4E-02	NTV	NTV	-	-	-	-
Benzo(g,h,i)perylene	6.4E-03	5.1E-03	NTV	NTV	-	-	-	-
Benzo(k)fluoranthene	7.7E-03	2.5E-03	NTV	NTV	-	-	-	-
Chrysene	1.9E-02	1.3E-02	NTV	NTV	-	-	-	-
Dibenz(a,h)anthracene	8.1E-03	1.8E-03	NTV	NTV	-	-	-	-
Fluoranthene	1.6E-02	1.3E-02	NTV	NTV	-	-	-	-
Indeno(1,2,3-cd)pyrene	8.5E-03	1.1E-02	NTV	NTV	-	-	-	-
Phenanthrene	3.2E-02	1.2E-02	1.1E+00	1.1E+00	2.8E-02	1.1E-02	-	-
Pyrene	2.4E-02	2.4E-02	NTV	NTV	-	-	-	-
Dioxins								
2,3,7,8-TCDD	1.3E-06	7.8E-06	1.4E-05	1.4E-05	8.9E-02	5.4E-01	-	-
1,2,3,7,8-PeCDD	3.4E-06	1.9E-05	1.4E-05	1.4E-05	2.4E-01	**1.3E+00**	-	**1.3E+00**
1,2,3,4,7,8-HxCDD	8.0E-06	2.0E-05	2.9E-04	2.9E-04	2.8E-02	7.1E-02	-	-
1,2,3,6,7,8-HxCDD	2.5E-05	6.6E-05	1.4E-03	1.4E-03	1.7E-02	4.6E-02	-	-
1,2,3,7,8,9-HxCDD	1.5E-05	1.0E-04	1.4E-04	1.4E-04	1.1E-01	7.1E-01	-	-

Table C1-17 (2 of 3)

Risk Estimates for the Thrush
New Conservation Yard RFI Site

	Applied Daily Dose		ESL	TRV	Hazard Quotient			
	CTE (mg/kg-day)	RME (mg/kg-day)	mg/kg soil	(mg/kg-day)	CTE_{ESL} (unitless)	RME_{ESL} (unitless)	CTE_{TRV} (unitless)	RME_{TRV} (unitless)
1,2,3,4,6,7,8-HpCDD	5.1E-04	1.3E-03	1.4E-02	1.4E-02	3.5E-02	9.0E-02	-	-
OCDD	4.9E-03	1.2E-02	1.4E-01	1.4E-01	3.5E-02	8.7E-02	-	-
2,3,7,8-TCDF	7.1E-07	1.3E-06	1.0E-06	1.0E-06	7.1E-01	**1.3E+00**	-	**1.3E+00**
1,2,3,7,8-PeCDF	5.4E-07	1.5E-06	1.4E-04	1.4E-04	3.7E-03	1.0E-02	-	-
2,3,4,7,8-PeCDF	1.4E-06	2.8E-06	1.4E-05	1.4E-05	9.9E-02	2.0E-01	-	-
1,2,3,4,7,8-HxCDF	4.9E-06	1.1E-05	1.4E-04	1.4E-04	3.4E-02	7.9E-02	-	-
1,2,3,6,7,8-HxCDF	2.7E-06	6.2E-06	1.4E-04	1.4E-04	1.9E-02	4.3E-02	-	-
2,3,4,6,7,8-HxCDF	7.2E-06	1.8E-05	1.4E-04	1.4E-04	5.0E-02	1.2E-01	-	-
1,2,3,7,8,9-HxCDF	1.6E-06	3.2E-06	1.4E-04	1.4E-04	1.1E-02	2.2E-02	-	-
1,2,3,4,6,7,8-HpCDF	7.7E-05	2.0E-04	1.4E-03	1.4E-03	5.4E-02	1.4E-01	-	-
1,2,3,4,7,8,9-HpCDF	1.6E-05	4.1E-05	1.4E-03	1.4E-03	1.1E-02	2.9E-02	-	-
OCDF	2.1E-04	5.3E-04	1.4E-01	1.4E-01	1.5E-03	3.7E-03	-	-
PCBs								
Aroclor-1254	1.6E-02	1.6E-02	4.1E-01	4.2E-01	3.9E-02	3.9E-02	-	-
PCB-105	2.6E-05	3.5E-05	1.4E-01	1.4E-01	1.8E-04	2.4E-04	-	-
PCB-114	2.2E-06	3.0E-06	1.4E-01	1.4E-01	1.5E-05	2.1E-05	-	-
PCB-118	6.0E-05	8.2E-05	1.4E+00	1.4E+00	4.2E-05	5.7E-05	-	-
PCB-123	7.3E-07	1.0E-06	1.4E+00	1.4E+00	5.1E-07	7.0E-07	-	-
PCB-126	8.5E-07	1.2E-06	1.4E-04	1.4E-04	5.9E-03	8.1E-03	-	-
PCB-156	7.7E-06	1.1E-05	1.4E-01	1.4E-01	5.4E-05	7.4E-05	-	-
PCB-157	2.6E-06	2.8E-06	1.4E-01	1.4E-01	1.8E-05	1.9E-05	-	-
PCB-167	4.5E-06	4.8E-06	1.4E+00	1.4E+00	3.1E-06	3.4E-06	-	-
PCB-169	1.5E-08	1.7E-08	1.4E-02	1.4E-02	1.1E-06	1.2E-06	-	-
PCB-189	3.3E-07	3.6E-07	1.4E+00	1.4E+00	2.3E-07	2.5E-07	-	-
PCB-77	2.0E-06	2.7E-06	2.9E-04	2.9E-04	7.0E-03	9.6E-03	-	-
PCB-81	3.9E-07	5.4E-07	1.4E-04	1.4E-04	2.8E-03	3.8E-03	-	-
Total PCB Congeners	-	-		-	1.6E-02	2.2E-02	0.0E+00	0.0E+00
Total Ingestion HI:					**5.6E+02**	**1.4E+03**	**5.6E+02**	**1.4E+03**

Notes:
CTE - central tendancy exposure
RME - reasonable maximum exposure
CTE_{ESL} or RME_{ESL}- The hazard quotient based on the NOAEL equivalent TRV used to calculate the ESL.
CTE_{TRV} or RME_{TRV}- The hazard quotient based on the TRV is calculated only if the hazard quotient based on the ESL is greater than 1.
TRV - toxicity reference value
HI - Hazard Index
VOC - volatile organic compound

Table C1-17 (3 of 3)

Risk Estimates for the Thrush
New Conservation Yard RFI Site

	Applied Daily Dose		ESL	TRV	Hazard Quotient			
	CTE	RME			CTE_{ESL}	RME_{ESL}	CTE_{TRV}	RME_{TRV}
	(mg/kg-day)	(mg/kg-day)	mg/kg soil	(mg/kg-day)	(unitless)	(unitless)	(unitless)	(unitless)

SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyls
NTV - indicates that adequate toxicity data were not available for a chemical
mg/kg-day - milligram per kilogram per day
"-" not applicable
= HIs for PCB congeners. Not included in Total estimates.

Table C1-18 (1 of 3)

Risk Estimates for the Hawk
New Conservation Yard RFI Site

	Applied Daily Dose		Hazard Quotient			
	CTE (mg/kg-day)	RME (mg/kg-day)	CTE_{ESL} (unitless)	RME_{ESL} (unitless)	CTE_{TRV} (unitless)	RME_{TRV} (unitless)
Ingestion Exposure Route						
Inorganic Compounds						
Antimony	2.5E-01	2.7E-01	-	-	-	-
Barium	6.0E+00	2.6E+01	2.9E-01	**1.3E+00**	-	**1.3E+00**
Cadmium	1.4E-01	1.0E+00	**1.7E+00**	**1.3E+01**	**1.7E+00**	**1.3E+01**
Chromium	2.6E-01	4.6E-01	-	-	-	-
Copper	1.7E+00	4.8E+00	7.3E-01	**2.1E+00**	-	**2.1E+00**
Lead	2.0E+00	2.7E+00	**1.4E+02**	**1.9E+02**	**1.4E+02**	**1.9E+02**
Mercury	9.5E-03	5.0E-02	2.1E-02	1.1E-01	-	-
Molybdenum	7.6E-01	1.4E+00	2.2E-01	3.9E-01	-	-
Nickel	2.1E-01	5.4E-01	1.5E-01	3.9E-01	-	-
Selenium	7.5E-01	1.3E+00	**3.3E+00**	**5.9E+00**	**3.3E+00**	**5.9E+00**
Silver	1.2E+00	7.4E+00	-	-	-	-
Zinc	1.5E+02	7.5E+02	**1.0E+01**	**5.2E+01**	**1.0E+01**	**5.2E+01**
VOCs						
Toluene	4.1E-03	8.5E-03	-	-	-	-
SVOCs						
Benzo(a)anthracene	4.5E-02	1.5E-02	-	-	-	-
Benzo(a)pyrene	1.8E-02	2.0E-02	-	-	-	-
Benzo(b)fluoranthene	1.8E-02	2.6E-02	-	-	-	-
Benzo(g,h,i)perylene	1.4E-02	1.1E-02	-	-	-	-
Benzo(k)fluoranthene	2.2E-02	7.2E-03	-	-	-	-
Chrysene	1.9E-02	1.3E-02	-	-	-	-
Dibenz(a,h)anthracene	4.6E-02	1.0E-02	-	-	-	-
Fluoranthene	7.7E-03	6.5E-03	-	-	-	-
Indeno(1,2,3-cd)pyrene	2.3E-02	3.0E-02	-	-	-	-
Phenanthrene	9.5E-03	3.6E-03	8.4E-03	3.2E-03	-	-
Pyrene	1.2E-02	1.2E-02	-	-	-	-
Dioxins						
2,3,7,8-TCDD	4.3E-07	2.7E-06	3.0E-02	1.9E-01	-	-
1,2,3,7,8-PeCDD	1.3E-06	7.0E-06	8.8E-02	4.9E-01	-	-
1,2,3,4,7,8-HxCDD	7.5E-07	1.9E-06	2.6E-03	6.7E-03	-	-
1,2,3,6,7,8-HxCDD	3.3E-06	8.9E-06	2.3E-03	6.2E-03	-	-
1,2,3,7,8,9-HxCDD	9.8E-07	6.5E-06	6.9E-03	4.5E-02	-	-
1,2,3,4,6,7,8-HpCDD	1.0E-04	2.7E-04	7.3E-03	1.9E-02	-	-

Table C1-18 (2 of 3)

Risk Estimates for the Hawk
New Conservation Yard RFI Site

	Applied Daily Dose		Hazard Quotient			
	CTE (mg/kg-day)	RME (mg/kg-day)	CTE_{ESL} (unitless)	RME_{ESL} (unitless)	CTE_{TRV} (unitless)	RME_{TRV} (unitless)
OCDD	9.0E-04	2.3E-03	6.3E-03	1.6E-02	-	-
2,3,7,8-TCDF	4.5E-08	8.2E-08	4.5E-02	8.2E-02	-	-
1,2,3,7,8-PeCDF	2.8E-07	7.7E-07	1.9E-03	5.4E-03	-	-
2,3,4,7,8-PeCDF	3.0E-07	5.9E-07	2.1E-02	4.1E-02	-	-
1,2,3,4,7,8-HxCDF	1.7E-07	4.0E-07	1.2E-03	2.8E-03	-	-
1,2,3,6,7,8-HxCDF	1.1E-06	2.5E-06	7.4E-03	1.7E-02	-	-
2,3,4,6,7,8-HxCDF	1.8E-06	4.4E-06	1.3E-02	3.1E-02	-	-
1,2,3,7,8,9-HxCDF	5.3E-07	1.1E-06	3.7E-03	7.6E-03	-	-
1,2,3,4,6,7,8-HpCDF	2.6E-05	6.7E-05	1.8E-02	4.7E-02	-	-
1,2,3,4,7,8,9-HpCDF	5.6E-06	1.4E-05	3.9E-03	9.9E-03	-	-
OCDF	1.5E-04	3.7E-04	1.0E-03	2.6E-03	-	-
PCBs						
Aroclor-1254	5.5E-03	5.5E-03	1.3E-02	1.3E-02	-	-
PCB-105	3.2E-06	4.4E-06	2.3E-05	3.1E-05	-	-
PCB-114	2.9E-07	3.9E-07	2.0E-06	2.8E-06	-	-
PCB-118	7.3E-06	9.9E-06	5.1E-06	6.9E-06	-	-
PCB-123	9.8E-08	1.3E-07	6.8E-08	9.3E-08	-	-
PCB-126	1.3E-07	1.8E-07	9.4E-04	1.3E-03	-	-
PCB-156	2.4E-06	3.3E-06	1.7E-05	2.3E-05	-	-
PCB-157	5.3E-06	5.6E-06	3.7E-05	3.9E-05	-	-
PCB-167	1.7E-06	1.8E-06	1.2E-06	1.2E-06	-	-
PCB-169	5.3E-09	5.8E-09	3.7E-07	4.0E-07	-	-
PCB-189	3.6E-07	3.8E-07	2.5E-07	2.7E-07	-	-
PCB-77	1.1E-07	1.6E-07	4.0E-04	5.5E-04	-	-
PCB-81	2.9E-08	3.9E-08	2.0E-04	2.8E-04	-	-
Total PCB Congeners	-	-	1.6E-03	2.2E-03	-	-
Total Ingestion HI:			**1.6E+02**	**2.7E+02**	**1.6E+02**	**2.7E+02**
Total Ingestion HI Accounting for Home Range Factor[a]:			**1.6E+00**	**2.8E+00**	**1.6E+00**	**2.7E+00**

Notes:

a. Home range factor based on a minimum home range of 0.3 square miles (195 acres), as described in the SRAM, and NCY site area of 2 acres.

Home range factor = 0.010

CTE - central tendancy exposure

RME - reasonable maximum exposure

CTE_{ESL} or RME_{ESL}- The hazard quotient based on the NOAEL equivalent TRV used to calculate the ESL.

CTE_{TRV} or RME_{TRV}- The hazard quotient based on the TRV is calculated only if the hazard quotient based on the ESL is greater than 1.

TRV - toxicity reference value

Table C1-18 (3 of 3)

Risk Estimates for the Hawk
New Conservation Yard RFI Site

	Applied Daily Dose		Hazard Quotient			
	CTE (mg/kg-day)	RME (mg/kg-day)	CTE_{ESL} (unitless)	RME_{ESL} (unitless)	CTE_{TRV} (unitless)	RME_{TRV} (unitless)

HI - Hazard Index
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyls
NTV - indicates that adequate toxicity data were not available for a chemical
mg/kg-day - milligram per kilogram per day
"-" not applicable
= HIs for PCB congeners. Not included in Total estimates.

Table C1-19 (1 of 3)

Risk Estimates for the Bobcat
New Conservation Yard RFI Site

	Applied Daily Dose		ESL	TRV	Hazard Quotient			
	CTE (mg/kg-day)	RME (mg/kg-day)	(mg/kg-day)	(mg/kg-day)	CTE_{ESL} (unitless)	RME_{ESL} (unitless)	CTE_{TRV} (unitless)	RME_{TRV} (unitless)
Ingestion Exposure Route								
Inorganic Compounds								
Antimony	1.1E-01	1.2E-01	8.8E-02	7.0E-01	**1.2E+00**	**1.3E+00**	1.5E-01	1.7E-01
Barium	2.6E+00	1.1E+01	5.1E+00	5.1E+00	5.0E-01	**2.2E+00**	-	**2.2E+00**
Cadmium	6.0E-02	4.4E-01	2.4E-03	1.0E+00	**2.5E+01**	**1.8E+02**	6.0E-02	4.4E-01
Chromium	1.1E-01	2.0E-01	1.5E+03	1.8E+03	7.6E-05	1.3E-04	-	-
Copper	7.2E-01	2.1E+00	1.9E+00	1.0E+01	3.8E-01	**1.1E+00**	-	2.1E-01
Lead	8.5E-01	1.2E+00	1.0E+00	1.0E+00	8.5E-01	**1.2E+00**	-	**1.2E+00**
Mercury	4.1E-03	2.1E-02	1.0E+00	1.2E+00	4.0E-03	2.1E-02	-	-
Molybdenum	3.2E-01	5.8E-01	1.8E-01	8.8E+01	**1.8E+00**	**3.2E+00**	3.7E-03	6.6E-03
Nickel	9.0E-02	2.3E-01	1.3E-01	6.0E+01	6.8E-01	**1.7E+00**	-	3.8E-03
Selenium	3.2E-01	5.8E-01	5.0E-02	5.0E-02	**6.4E+00**	**1.2E+01**	**6.4E+00**	**1.2E+01**
Silver	5.1E-01	3.2E+00	2.6E-01	6.5E+01	**1.9E+00**	**1.2E+01**	7.9E-03	4.9E-02
Zinc	6.3E+01	3.2E+02	3.9E+00	1.2E+02	**1.6E+01**	**8.2E+01**	5.2E-01	**2.7E+00**
VOCs								
Toluene	1.8E-03	3.6E-03	4.1E-01	5.4E+01	4.4E-03	9.0E-03	-	-
SVOCs								
Benzo(a)anthracene	1.9E-02	6.4E-03	9.2E-01	9.2E-01	2.1E-02	6.9E-03	-	-
Benzo(a)pyrene	7.8E-03	8.5E-03	9.2E-01	9.2E-01	8.4E-03	9.2E-03	-	-
Benzo(b)fluoranthene	7.5E-03	1.1E-02	9.2E-01	9.2E-01	8.2E-03	1.2E-02	-	-
Benzo(g,h,i)perylene	5.8E-03	4.6E-03	9.2E-01	9.2E-01	6.3E-03	5.0E-03	-	-
Benzo(k)fluoranthene	9.4E-03	3.1E-03	9.2E-01	9.2E-01	1.0E-02	3.4E-03	-	-
Chrysene	8.4E-03	5.7E-03	9.2E-01	9.2E-01	9.0E-03	6.2E-03	-	-
Dibenz(a,h)anthracene	2.0E-02	4.4E-03	9.2E-01	9.2E-01	2.1E-02	4.7E-03	-	-
Fluoranthene	3.3E-03	2.8E-03	4.4E+01	4.4E+01	7.5E-05	6.3E-05	-	-
Indeno(1,2,3-cd)pyrene	9.8E-03	1.3E-02	9.2E-01	9.2E-01	1.1E-02	1.4E-02	-	-
Phenanthrene	4.1E-03	1.6E-03	5.3E+01	7.8E+01	7.7E-05	2.9E-05	-	-
Pyrene	5.1E-03	5.2E-03	2.6E+01	5.9E+00	1.9E-04	2.0E-04	-	-
Dioxins								
2,3,7,8-TCDD	1.9E-07	1.1E-06	1.0E-06	1.0E-06	1.9E-01	**1.1E+00**	-	**1.1E+00**
1,2,3,7,8-PeCDD	5.4E-07	3.0E-06	1.0E-06	1.0E-06	5.4E-01	**3.0E+00**	-	**3.0E+00**
1,2,3,4,7,8-HxCDD	3.2E-07	8.2E-07	1.0E-05	1.0E-05	3.2E-02	8.2E-02	-	-
1,2,3,6,7,8-HxCDD	1.4E-06	3.8E-06	1.0E-05	1.0E-05	1.4E-01	3.8E-01	-	-
1,2,3,7,8,9-HxCDD	4.2E-07	2.8E-06	1.0E-05	1.0E-05	4.2E-02	2.8E-01	-	-
1,2,3,4,6,7,8-HpCDD	4.5E-05	1.1E-04	1.0E-04	1.0E-04	4.5E-01	**1.1E+00**	-	**1.1E+00**

Table C1-19 (2 of 3)

Risk Estimates for the Bobcat
New Conservation Yard RFI Site

	Applied Daily Dose		ESL	TRV	Hazard Quotient			
	CTE (mg/kg-day)	RME (mg/kg-day)	(mg/kg-day)	(mg/kg-day)	CTE_{ESL} (unitless)	RME_{ESL} (unitless)	CTE_{TRV} (unitless)	RME_{TRV} (unitless)
OCDD	3.9E-04	9.7E-04	1.0E-02	1.0E-02	3.9E-02	9.7E-02	-	-
2,3,7,8-TCDF	1.9E-08	3.5E-08	1.0E-05	1.0E-05	1.9E-03	3.5E-03	-	-
1,2,3,7,8-PeCDF	1.2E-07	3.3E-07	2.0E-05	2.0E-05	5.9E-03	1.7E-02	-	-
2,3,4,7,8-PeCDF	1.3E-07	2.5E-07	2.0E-06	2.0E-06	6.4E-02	1.3E-01	-	-
1,2,3,4,7,8-HxCDF	7.3E-08	1.7E-07	1.0E-05	1.0E-05	7.3E-03	1.7E-02	-	-
1,2,3,6,7,8-HxCDF	4.5E-07	1.1E-06	1.0E-05	1.0E-05	4.5E-02	1.1E-01	-	-
2,3,4,6,7,8-HxCDF	7.7E-07	1.9E-06	1.0E-05	1.0E-05	7.7E-02	1.9E-01	-	-
1,2,3,7,8,9-HxCDF	2.3E-07	4.7E-07	1.0E-05	1.0E-05	2.3E-02	4.7E-02	-	-
1,2,3,4,6,7,8-HpCDF	1.1E-05	2.9E-05	1.0E-04	1.0E-04	1.1E-01	2.9E-01	-	-
1,2,3,4,7,8,9-HpCDF	2.4E-06	6.0E-06	1.0E-04	1.0E-04	2.4E-02	6.0E-02	-	-
OCDF	6.3E-05	1.6E-04	1.0E-02	1.0E-02	6.3E-03	1.6E-02	-	-
PCBs								
Aroclor-1254	2.4E-03	2.4E-03	4.6E-02	3.6E-01	5.1E-02	5.1E-02	-	-
PCB-105	1.4E-06	1.9E-06	1.0E-02	1.0E-02	1.4E-04	1.9E-04	-	-
PCB-114	1.2E-07	1.7E-07	2.0E-03	2.0E-03	6.2E-05	8.5E-05	-	-
PCB-118	3.1E-06	4.3E-06	1.0E-02	1.0E-02	3.1E-04	4.3E-04	-	-
PCB-123	4.2E-08	5.7E-08	1.0E-02	1.0E-02	4.2E-06	5.7E-06	-	-
PCB-126	5.8E-08	7.9E-08	1.0E-05	1.0E-05	5.8E-03	7.9E-03	-	-
PCB-156	1.0E-06	1.4E-06	2.0E-03	2.0E-03	5.1E-04	7.0E-04	-	-
PCB-157	2.3E-06	2.4E-06	2.0E-03	2.0E-03	1.1E-03	1.2E-03	-	-
PCB-167	7.1E-07	7.6E-07	1.0E-01	1.0E-01	7.1E-06	7.6E-06	-	-
PCB-169	2.3E-09	2.5E-09	1.0E-04	1.0E-04	2.3E-05	2.5E-05	-	-
PCB-189	1.5E-07	1.6E-07	1.0E-02	1.0E-02	1.5E-05	1.6E-05	-	-
PCB-77	4.9E-08	6.7E-08	1.0E-02	1.0E-02	4.9E-06	6.7E-06	-	-
PCB-81	1.2E-08	1.7E-08	1.0E-02	1.0E-02	1.2E-06	1.7E-06	-	-
Total PCB Congeners	-	-		-	8.0E-03	1.1E-02	0.0E+00	0.0E+00
Total Ingestion HI:					**5.6E+01**	**3.1E+02**	**7.2E+00**	**2.4E+01**
Total Ingestion HI Accounting for Home Range Factor[a]:					9.8E-02	5.3E-01	1.2E-02	4.1E-02

Notes:

a. Home range factor based on a minimum home range of 1.8 square miles (1,152 acres), as described in the SRAM, and NCY site area of 2 acres.

Home range factor = 0.002

CTE - central tendancy exposure

RME - reasonable maximum exposure

NOAEL - no observable adverse effect level

CTE_{ESL} or RME_{ESL}- The hazard quotient based on the NOAEL equivalent TRV used to calculate the ESL.

CTE_{TRV} or RME_{TRV}- The hazard quotient based on the TRV is calculated only if the hazard quotient based on the ESL is greater than 1.

Table C1-19 (3 of 3)

Risk Estimates for the Bobcat
New Conservation Yard RFI Site

	Applied Daily Dose		ESL	TRV	Hazard Quotient			
	CTE	RME			CTE_{ESL}	RME_{ESL}	CTE_{TRV}	RME_{TRV}
	(mg/kg-day)	(mg/kg-day)	(mg/kg-day)	(mg/kg-day)	(unitless)	(unitless)	(unitless)	(unitless)

TRV - toxicity reference value
HI - Hazard Index
VOC - volatile organic compund
SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyls
mg/kg-day - milligram per kilogram per day
"-" not applicable
= HIs for PCB congeners. Not included in Total estimates.

Table C1-20 (1 of 3)

Risk Estimates for the Mule Deer
New Conservation Yard RFI Site

	Applied Daily Dose		Hazard Quotient			
	CTE (mg/kg-day)	RME (mg/kg-day)	CTE_{ESL} (unitless)	RME_{ESL} (unitless)	CTE_{TRV} (unitless)	RME_{TRV} (unitless)
Ingestion Exposure Route						
Inorganic Compounds						
Antimony	1.2E+00	1.3E+00	**1.5E+01**	**1.6E+01**	**1.9E+00**	**2.1E+00**
Barium	8.9E+00	3.9E+01	**1.7E+00**	**7.7E+00**	**6.1E+00**	**2.7E+01**
Cadmium	7.8E-01	5.8E+00	**6.9E+02**	**5.1E+03**	**1.7E+01**	**1.2E+02**
Chromium	8.8E+00	1.5E+01	8.0E-03	1.4E-02	-	-
Copper	2.2E+00	6.2E+00	**1.3E+00**	**3.6E+00**	3.2E-01	9.0E-01
Lead	2.2E+00	3.0E+00	**2.9E+00**	**4.0E+00**	**3.0E+00**	**4.1E+00**
Mercury	4.1E-03	2.2E-02	4.1E-03	2.1E-02	-	-
Molybdenum	1.8E+00	3.3E+00	**1.1E+01**	**1.9E+01**	2.9E-02	5.2E-02
Nickel	6.9E+00	1.8E+01	**6.9E+01**	**1.8E+02**	1.6E-01	4.1E-01
Selenium	6.8E-02	1.2E-01	**1.3E+00**	**2.3E+00**	**1.3E+00**	**2.3E+00**
Silver	1.1E+00	6.6E+00	**4.3E+00**	**2.7E+01**	2.3E-02	1.4E-01
Zinc	3.6E+01	1.8E+02	**1.1E+01**	**5.7E+01**	6.7E-01	**3.5E+00**
VOCs						
Toluene	2.2E-03	4.5E-03	5.8E-03	1.2E-02	-	-
SVOCs						
Benzo(a)anthracene	7.7E-03	2.5E-03	9.0E-03	3.0E-03	-	-
Benzo(a)pyrene	1.6E-03	1.8E-03	1.9E-03	2.1E-03	-	-
Benzo(b)fluoranthene	1.8E-03	2.7E-03	2.1E-03	3.1E-03	-	-
Benzo(g,h,i)perylene	1.6E-03	1.3E-03	1.9E-03	1.5E-03	-	-
Benzo(k)fluoranthene	1.5E-03	4.9E-04	1.7E-03	5.8E-04	-	-
Chrysene	4.4E-03	3.0E-03	5.2E-03	3.6E-03	-	-
Dibenz(a,h)anthracene	1.5E-03	3.3E-04	1.7E-03	3.8E-04	-	-
Fluoranthene	4.9E-03	4.1E-03	1.2E-04	1.0E-04	-	-
Indeno(1,2,3-cd)pyrene	1.7E-03	2.2E-03	2.0E-03	2.5E-03	-	-
Phenanthrene	1.1E-02	4.0E-03	2.2E-04	8.3E-05	-	-
Pyrene	3.3E-03	3.3E-03	1.4E-04	1.4E-04	-	-
Dioxins						
2,3,7,8-TCDD	2.3E-07	1.4E-06	**2.0E+00**	**1.2E+01**	**2.5E+00**	**1.5E+01**
1,2,3,7,8-PeCDD	6.6E-07	3.7E-06	**5.9E+00**	**3.3E+01**	**7.1E+00**	**3.9E+01**
1,2,3,4,7,8-HxCDD	1.7E-06	4.2E-06	**1.5E+00**	**3.8E+00**	**1.8E+00**	**4.6E+00**
1,2,3,6,7,8-HxCDD	1.5E-06	3.9E-06	**1.3E+00**	**3.5E+00**	**1.6E+00**	**4.2E+00**
1,2,3,7,8,9-HxCDD	2.9E-06	1.9E-05	**2.6E+00**	**1.7E+01**	**3.1E+00**	**2.1E+01**
1,2,3,4,6,7,8-HpCDD	6.5E-05	1.6E-04	**5.8E+00**	**1.5E+01**	**7.0E+00**	**1.8E+01**

Table C1-20 (2 of 3)

Risk Estimates for the Mule Deer
New Conservation Yard RFI Site

	Applied Daily Dose		Hazard Quotient			
	CTE (mg/kg-day)	RME (mg/kg-day)	CTE_{ESL} (unitless)	RME_{ESL} (unitless)	CTE_{TRV} (unitless)	RME_{TRV} (unitless)
OCDD	5.5E-04	1.4E-03	4.9E-01	**1.2E+00**	-	**1.5E+00**
2,3,7,8-TCDF	1.3E-07	2.3E-07	1.1E-01	2.1E-01	-	-
1,2,3,7,8-PeCDF	1.5E-07	4.1E-07	6.5E-02	1.8E-01	-	-
2,3,4,7,8-PeCDF	3.6E-07	7.1E-07	**1.6E+00**	**3.1E+00**	**1.9E+00**	**3.8E+00**
1,2,3,4,7,8-HxCDF	1.1E-06	2.6E-06	9.8E-01	**2.3E+00**	-	**2.8E+00**
1,2,3,6,7,8-HxCDF	8.5E-07	2.0E-06	7.6E-01	**1.8E+00**	-	**2.1E+00**
2,3,4,6,7,8-HxCDF	1.8E-06	4.3E-06	**1.6E+00**	**3.9E+00**	**1.9E+00**	**4.7E+00**
1,2,3,7,8,9-HxCDF	2.8E-07	5.8E-07	2.5E-01	5.1E-01	-	-
1,2,3,4,6,7,8-HpCDF	7.6E-06	2.0E-05	6.7E-01	**1.7E+00**	-	**2.1E+00**
1,2,3,4,7,8,9-HpCDF	3.0E-06	7.4E-06	2.6E-01	6.6E-01	-	-
OCDF	2.9E-05	7.2E-05	2.5E-02	6.4E-02	-	-
PCBs						
Aroclor-1254	2.9E-03	2.9E-03	6.9E-02	6.9E-02	-	-
PCB-105	2.1E-06	2.8E-06	2.7E-04	3.7E-04	-	-
PCB-114	8.4E-08	1.1E-07	5.6E-05	7.6E-05	-	-
PCB-118	4.3E-06	5.8E-06	5.6E-04	7.7E-04	-	-
PCB-123	5.1E-08	7.0E-08	6.8E-06	9.3E-06	-	-
PCB-126	8.5E-08	1.2E-07	1.1E-02	1.5E-02	-	-
PCB-156	7.9E-07	1.1E-06	5.2E-04	7.2E-04	-	-
PCB-157	2.7E-07	2.9E-07	1.8E-04	1.9E-04	-	-
PCB-167	4.9E-07	5.3E-07	6.5E-06	7.0E-06	-	-
PCB-169	2.8E-09	3.0E-09	3.7E-05	4.0E-05	-	-
PCB-189	5.7E-08	6.1E-08	7.6E-06	8.1E-06	-	-
PCB-77	1.9E-07	2.6E-07	2.5E-05	3.4E-05	-	-
PCB-81	4.5E-08	6.2E-08	6.0E-06	8.2E-06	-	-
Total PCB Congeners	-	-	1.3E-02	1.8E-02	0.0E+00	0.0E+00
Total Ingestion HI:			**8.4E+02**	**5.5E+03**	**5.7E+01**	**2.8E+02**
Total Ingestion HI Accounting for Home Range Factor[a]:			**8.7E+00**	**5.8E+01**	5.9E-01	**2.9E+00**

Notes:

a. Home range factor based on minimum home range of 0.3 square miles (192 acres), as described in the SRAM, and NCY site area of 2 acres.

Home range factor = 0.010

CTE - central tendancy exposure

RME - reasonable maximum exposure

NOAEL - no observable adverse effect level

CTE_{ESL} or RME_{ESL}- The hazard quotient based on the NOAEL equivalent TRV used to calculate the ESL.

CTE_{TRV} or RME_{TRV}- The hazard quotient based on the TRV is calculated only if the hazard quotient based on the ESL is greater than 1.

Table C1-20 (3 of 3)

Risk Estimates for the Mule Deer
New Conservation Yard RFI Site

	Applied Daily Dose		Hazard Quotient			
	CTE (mg/kg-day)	RME (mg/kg-day)	CTE_{ESL} (unitless)	RME_{ESL} (unitless)	CTE_{TRV} (unitless)	RME_{TRV} (unitless)

TRV - toxicity reference value
HI - Hazard Index
VOC - volatile organic compund
SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyls
mg/kg-day - milligram per kilogram per day
"-" not applicable
= HIs for PCB congeners. Not included in Total estimates.

Table C1-21 (1 of 2)

Risk Estimates for Terrestrial Invertebrates
New Conservation Yard RFI Site

Chemical	Soil EPC		TRV	Hazard Quotient	
	CTE (mg/kg)	RME (mg/kg)	(mg/kg)	CTE (unitless)	RME (unitless)
Inorganic Compounds					
Antimony	5.6E+00	6.0E+00	78	7.1E-02	7.7E-02
Barium	2.2E+02	9.6E+02	330	6.6E-01	**2.9E+00**
Cadmium	1.8E+00	1.3E+01	140	1.3E-02	9.5E-02
Chromium	2.3E+01	4.1E+01	NA	-	-
Copper	2.9E+01	8.2E+01	32	9.0E-01	**2.6E+00**
Lead	2.6E+01	3.5E+01	1700	1.5E-02	2.1E-02
Mercury	1.2E-01	6.4E-01	0.10	**1.2E+00**	**6.4E+00**
Molybdenum	3.4E+00	6.0E+00	NA	-	-
Nickel	2.2E+01	5.7E+01	100	2.2E-01	5.7E-01
Selenium	1.7E+00	3.0E+00	8	2.2E-01	3.9E-01
Silver	1.5E+01	9.6E+01	NA	-	-
Zinc	5.4E+02	2.8E+03	199	**2.7E+00**	**1.4E+01**
VOCs					
Toluene	5.3E-02	1.1E-01	NA	-	-
SVOCs					
Benzo(a)anthracene	3.6E-02	1.2E-02	NA	-	-
Benzo(a)pyrene	4.0E-02	4.3E-02	25000	1.6E-06	1.7E-06
Benzo(b)fluoranthene	4.3E-02	6.5E-02	NA	-	-
Benzo(g,h,i)perylene	3.9E-02	3.1E-02	NA	-	-
Benzo(k)fluoranthene	3.6E-02	1.2E-02	NA	-	-
Chrysene	4.0E-02	2.7E-02	NA	-	-
Dibenz(a,h)anthracene	3.6E-02	8.0E-03	NA	-	-
Fluoranthene	4.3E-02	3.6E-02	38	1.1E-03	9.5E-04
Indeno(1,2,3-cd)pyrene	4.1E-02	5.3E-02	NA	-	-
Phenanthrene	3.7E-02	1.4E-02	34	1.1E-03	4.1E-04
Pyrene	4.3E-02	4.3E-02	18	2.4E-03	2.4E-03

Table C1-21 (2 of 2)

Risk Estimates for Terrestrial Invertebrates
New Conservation Yard RFI Site

Chemical	Soil EPC		TRV	Hazard Quotient	
	CTE (mg/kg)	RME (mg/kg)	(mg/kg)	CTE (unitless)	RME (unitless)
Inorganic Compounds					
Dioxins					
2,3,7,8-TCDD	5.6E-06	3.4E-05	500	1.1E-08	6.9E-08
1,2,3,7,8-PeCDD	1.6E-05	9.0E-05	NA	-	-
1,2,3,4,7,8-HxCDD	4.1E-05	1.0E-04	NA	-	-
1,2,3,6,7,8-HxCDD	2.0E-04	5.4E-04	NA	-	-
1,2,3,7,8,9-HxCDD	7.1E-05	4.7E-04	NA	-	-
1,2,3,4,6,7,8-HpCDD	4.7E-03	1.2E-02	NA	-	-
OCDD	5.4E-02	1.4E-01	NA	-	-
2,3,7,8-TCDF	3.1E-06	5.7E-06	NA	-	-
1,2,3,7,8-PeCDF	3.6E-06	1.0E-05	NA	-	-
2,3,4,7,8-PeCDF	8.8E-06	1.7E-05	NA	-	-
1,2,3,4,7,8-HxCDF	2.7E-05	6.3E-05	NA	-	-
1,2,3,6,7,8-HxCDF	2.1E-05	4.9E-05	NA	-	-
2,3,4,6,7,8-HxCDF	4.3E-05	1.1E-04	NA	-	-
1,2,3,7,8,9-HxCDF	6.9E-06	1.4E-05	NA	-	-
1,2,3,4,6,7,8-HpCDF	7.7E-04	2.0E-03	NA	-	-
1,2,3,4,7,8,9-HpCDF	7.2E-05	1.8E-04	NA	-	-
OCDF	2.0E-03	5.1E-03	NA	-	-
PCBs					
Aroclor-1254	7.1E-02	7.1E-02	50	1.4E-03	1.4E-03
PCB-105	1.5E-05	2.1E-05	NA	-	-
PCB-114	5.7E-07	7.7E-07	NA	-	-
PCB-118	3.4E-05	4.6E-05	NA	-	-
PCB-123	3.7E-07	5.1E-07	NA	-	-
PCB-126	9.4E-07	1.3E-06	NA	-	-
PCB-156	7.9E-06	1.1E-05	NA	-	-
PCB-157	2.6E-06	2.7E-06	NA	-	-
PCB-167	4.4E-06	4.7E-06	NA	-	-
PCB-169	6.8E-08	7.5E-08	NA	-	-
PCB-189	6.5E-07	7.0E-07	NA	-	-
PCB-77	1.9E-06	2.6E-06	NA	-	-
PCB-81	3.7E-07	5.1E-07	NA	-	-
Total HI:				**6.1E+00**	**2.7E+01**

Notes:
EPC - exposure point concentration (based on 0 to 2 feet bgs data) as presented in Spreadsheet D-90.
CTE - central tendancy exposure
RME - reasonable maximum exposure
NC - not selected as a CPEC in the indicated media, per the SRAM (Ogden 2000).
CPEC - chemical of potential ecological concern
TRV - toxicity reference value
HI - Hazard Index
VOC - volatile organic compound
SVOC - semi-volatile organic compounds
PCB - polychlorinated biphenyls
PCDD/PCDF - polychlorinated dibenzo-p-dioxins and dibenzofurans
mg/kg - milligram per kilogram
= HIs for PCB congeners. Not included in Total estimates.

Table C1-22 (1 of 1)

Ecological Risk Assessment Uncertainty Analysis
New Conservation Yard RFI Site

Assessment Element	Uncertainty	Magnitude of Impact	Direction of Impact
CPEC Selection	The results of the Wilcoxon Rank Sum test indicate that barium, copper, lead, mercury and nickel site soil concentrations are similar to background. However, these metals were selected as COPECs because of the spatial extent of the highest detections which exceeded the range of background concentrations.	Low	Conservative
	Due to elevated detection limits above ESLs for antimony, molybdenum, and selenium, these metals were considered as COPECs even though they were not detected in any soil samples. In these cases, it was assumed that chemicals may be present at half the detection limit. This is believed to be a conservative overestimation as the RME EPC.	Moderate	Conservative
EPC Calculations	While measured and non-detect PAH concentrations are available for samples in and around the ash pile, PAHs were not analyzed for in Ash Pile samples that contain the highest concentrations of dioxins. It is therefore likely that the highest PAH concentrations are not accounted for. However, given the presence of elevated dioxins in the Ash Pile, more information regarding the levels of PAHs would not likely alter decision-making.	Moderate	Non-Conservative
Toxicity Reference Value	High degree of uncertainty in extrapolation of dose-response data from laboratory animals to representative receptors.	High	Not Known
	Avian toxicity values are only available for a limited number of CPECs at the NCY RFI site.	Moderate	Not conservative
	Use of short-term (acute) toxicity data to estimate chronic toxicity values are uncertain. Most TRVs are based on chronic or subchronic studies. Uncertainty factors are used to obtain a chronic NOAEL-equivalent TRV.	Low	Conservative
Risk Characterization	The estimated risks to the hawk, the bobcat, and the mule deer assume that these species' spend all of their time at the NCY RFI site. There is a high degree of uncertainty in this assumption and it substantially overstates the risks to these species due to chemicals present in soils at the site. The minimum reported foraging ranges for the red-tailed hawk, the bobcat, the mule deer are 195, 1,152, and 192 acres, respectively, as compared to 2.0 acres for the NCY RFI site. When the foraging ranges of the these species' is accounted for in the ERA, it indicates that RME HIs for the hawk, the bobcat, and the mule deer could be as low as 0.7, 0.3, and 47, respectively. Estimates to large home range receptors (hawk, bobcat, and mule deer) will be addressed for the entire SSFL facility after all RFI site risk assessments have been completed and potential site risks evaluated.	High	Conservative

Notes:
CPEC - chemical of potential ecological concern

GROUP 6 – NORTHEASTERN PORTION OF AREA IV
RCRA FACILITY INVESTIGATION RISK ASSESSMENT REPORT
SANTA SUSANA FIELD LABORATORY
VENTURA COUNTY, CALIFORNIA

VOLUME IV – APPENDIXES B THROUGH D

APPENDIX C, ATTACHMENT C2

OLD CONSERVATION YARD (SWMU 7.4)

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* A standard list of risk tables, figures, and attachments is used for all the RFI site reports for ease of comparison. If a table, figure, or attachment is not included in this site report it was not necessary for the risk assessments.

LIST OF ACRONYMNS AND ABBREVIATIONS

ADD	average daily dosage or applied daily dosage
bgs	below ground surface
BAF	bioaccumulation factor
COPC	chemical of potential concern
CPEC	chemical of potential ecological concern
CSF	cancer slope factor
CSM	conceptual site model
CTE	central tendency exposure
DCA	dichloroethane
DCE	dichloroethene
Dioxins	polychlorinated dibenzo-p-dioxins/dibenzofurans
DTSC	Department of Toxic Substance Control
EPC	exposure point concentration
EPV	exposure point values
ERA	ecological risk assessment
ESL	ecological screening level
HI	hazard index
HQ	hazard quotient
HRA	human health risk assessment
HSDB	Hazardous Substances Data Bank
gpm	gallons per minute
IRIS	Integrated Risk Information System
LADD	lifetime average daily dosage
LOAEL	lowest observable adverse effect level
mg/kg	milligrams per kilogram
mg/kg-day	milligrams per kilogram per day
mg/L	milligrams per liter
NOAEL	no observable adverse effect level
OCY	Old Conservation Yard
p	probability
PAH	polynuclear aromatic hydrocarbon
PCB	polychlorinated biphenyl
PCE	tetrachloroethene
PEF	particulate emission factor
RCRA	Resource Conservation and Recovery Act
RfD	reference dose
RFI	RCRA facility investigation
RME	reasonable maximum exposure
SQL	sample quantitation limit
SRAM	Standardized Risk Assessment Methodology
SSFL	Santa Susana Field Laboratory
SVOC	semivolatile organic compound

LIST OF ACRONYMNS AND ABBREVIATIONS (Continued)

SWMU	Solid Waste Management Unit
SWRCB	State Water Resources Control Board
TCA	trichloroethane
TCE	trichloroethene
TDS	total dissolved solids
TPH	total petroleum hydrocarbons
TRV	toxicity reference value
UCL	upper confidence limit
USEPA	United States Environmental Protection Agency
VOC	volatile organic compound
µg/L	micrograms per liter

C1.0 INTRODUCTION

This attachment to Appendix C of the Group 6 Resource Conservation Recovery Act (RCRA) Facility Investigation (RFI) Report presents the human health risk assessment (HRA) and ecological risk assessment (ERA) for the Old Conservation Yard (OCY) RFI Site (Area IV Solid Waste Management Unit [SWMU] 7.4) at the Santa Susana Field Laboratory (SSFL). The RCRA Corrective Action Program at the SSFL is being conducted under the oversight of the California Environmental Protection Agency, Department of Toxic Substances Control (DTSC).

The risk assessments were performed following the methods described in the Standardized Risk Assessment Methodology, Revision 2 (SRAM) for the Santa Susana Field Laboratory (SSFL) (MWH 2005); any additional procedures or differences from the SRAM are described in the Appendix C text. Supporting background information and data for the risk assessment were presented in Sections 1 through 3 of Appendix A2. Laboratory data are presented in Attachment 3 of Appendix A2. The following sections describe the HRA and ERA performed for the OCY RFI site at the SSFL. Key findings of the HRA and ERA are presented in Appendix A2, Section 4.

This report contains the following sections:

Section 1	Introduction
Section 2	Data Usability Assessment
Section 3	Human Health Risk Assessment
Section 4	Ecological Risk Assessment
Section 5	References

Risk assessment Tables C2-1 through C2-22 are provided both in electronic and printed format. The printed tables follow the text of this appendix. The electronic copies of the tables, and associated calculation spreadsheets (S-C2-1 through S-C2-109) used to generate these tables, are included as electronic copies in Appendix C, Attachment C8.

Please note that a standard list of risk assessment tables, figures, spreadsheets, and attachments is used for all SSFL RFI site risk assessment reports for terrestrial sites[i]. Not all tables, figures, spreadsheets, or attachments are applicable to all site risk assessments. Therefore, some items may be missing or not in consecutive order in the following text.

C2.0 DATA USABILITY ASSESSMENT FOR RISK ASSESSMENT

Chemical data collected at the OCY RFI site were evaluated for their usability for risk assessment. Colocated duplicates, laboratory confirmation, or agency split sample soil data were used to evaluate data quality, but are not used quantitatively in the risk assessments.

All OCY RFI site soil, soil vapor, Chatsworth formation groundwater underlying OCY, and Group 6 RFI report area Chatsworth formation groundwater data were determined to be usable for risk assessment. The data are presented in Attachment 3 of Appendix A2 and Appendix B for soil and groundwater, respectively. Soil data for various chemical groups are presented in Figures A2.3-1 through A2.3-4 of Appendix A2. Section C-4.3 of Appendix C presents how site data were selected for risk assessment calculations.

Exposure to near surface groundwater is not a potentially complete exposure pathway because near surface groundwater is not present at the OCY RFI site. Therefore, exposures to near surface groundwater are not evaluated at the OCY RFI site.

Chatsworth formation groundwater monitoring wells and analytical data representative of the OCY RFI site as well as all Group 6 reporting areas were selected following the methods described in the SRAM (MWH 2005). The OCY data were selected to evaluate indirect exposures (i.e. vapor) and the Group 6 data to evaluate potential domestic groundwater use. In summary, the most recent available 3 years of monitoring data are used for all wells determined to be representative of groundwater beneath the site. These data are further supplemented with previous years' data in cases where chemicals of potential concern (COPCs) identified in soil or soil vapor at the site were not sampled in the most recent 3 years.

[i] See OCY-RiskBook00-README.xls file for a list of tables and spreadsheets used in the risk assessment for OCY.

C3.0 HUMAN HEALTH RISK ASSESSMENT

The following sections describe the HRA for the OCY RFI site.

C3.1 SELECTION OF CHEMICALS OF POTENTIAL CONCERN

The selection of Chemicals of Potential Concern (COPCs) is the process of identifying those media-specific chemicals that may pose a risk or hazard to human receptors. COPCs selected for the HRA at the OCY RFI site are presented in Table C2-1.

The COPC selection process is summarized in Spreadsheets C2-1 through C2-4 for soil at 0 to 2 feet below ground surface (bgs), soil at 0 to 10 feet bgs, soil vapor, Group 6 RFI report area and OCY Chatsworth formation groundwater. Comparison of observed chemical concentrations to background chemical concentrations for soil at 0 to 2 feet bgs, and soil at 0 to 10 feet bgs are presented in Spreadsheets C2-5 and C2-6, respectively.

As described in Section 3.3 of the SRAM (MWH 2005), when conducting the statistical comparison to background, the Gehan adjustment was to be applied to non-detected values where greater than 40 percent of the site or background data are non-detect. For the OCY RFI site process the Gehan adjustment was conducted on all non-detected concentrations in evaluated in the Wilcoxon Rank Sum Test. Also, the Gehan adjustment could not be performed on polychlorinated dibenzo-p-dioxins/dibenzofurans (dioxins) results due to the method of combining detect and non-detect results for dioxins when comparing site data with background. This does not affect the results.

Several chemicals were determined to be present at concentrations consistent with background by Wilcoxon Rank Sum Test and were selected as a COPC. This is because these chemicals either had maximum concentrations significantly above the maximum background concentrations and were in areas of known or suspected metals impacts or had elevated detection limits.

C3.2 CONCEPTUAL SITE MODEL FOR HUMAN HEALTH RISK ASSESSMENT

Following COPC selection, a RFI site-specific conceptual site model (CSM) was developed to identify potential human receptors, exposure scenarios, and possible exposure pathways. The human health CSM for the OCY RFI site is presented in Table C2-2.

C3.3 EXPOSURE ASSESSMENT

This section presents the risk assessment for the OCY RFI site. This entire site has been considered as one exposure area. Therefore, the HRA assumes that receptors are exposed to chemicals over the entire 9.7 acre site.

C3.3.1 Exposure Point Concentrations for Direct Contact Media

For COPCs in soil, soil vapor, Chatsworth formation groundwater underlying the OCY RFI site and the Group 6 RFI report area summary statistical calculations, distribution testing and 95 percent upper confidence limit of the arithmetic mean concentration (95% UCL) calculations for the purposes of estimating exposure point concentrations [EPCs] were calculated utilizing the most current version of USEPA's ProUCL Version 3.0 software. Recommendations for appropriate distributions and 95% UCLs provided by the program were utilized. The 95% UCL concentration is used in the calculation of the reasonable maximum exposure (RME).

The chemical-specific exposure concentration for the most likely (average) exposure, also referred to as the central tendency exposure (CTE) concentration, was characterized as the arithmetic mean soil concentration. As recommended in DTSC guidance (1992), one-half of the analytical reporting limit concentration was used as a representative concentration for non-detect results for COPCs.

In cases where only one sample was available, the single measured sample result was used for both the CTE and RME EPCs. In cases where only two samples were available, the CTE EPC was estimated as the arithmetic mean of the two measured values, and the RME EPC was estimated as the maximum measured value.

For COPCs in Chatsworth formation groundwater underlying the OCY RFI site and the Group 6 report area, the maximum detected value was selected as the exposure point concentration (EPC). EPCs for soil at 0 to 2 feet bgs and soil at 0 to 10 feet bgs, at the OCY RFI site are presented in Table C2-3 and summarized in Spreadsheets C2-10 through C2-11. Dioxin congener group[ii] TEF summations for soil 0 to 2 feet bgs, and soil 0 to 10 feet bgs are presented in Spreadsheets C2-8 and C2-9. Aroclor to polychlorinated biphenyl (PCB) congeners extrapolation calculations for soil at 0 to 2 feet bgs and soil at 0 to 10 feet bgs are presented in C2-14 and C2-16, respectively. Total petroleum hydrocarbon (TPH) to petroleum constituent extrapolation calculations for soil at 0 to 2 feet bgs and soil at 0 to 10 feet bgs soil are presented in Spreadsheets C2-15 and C2-17, respectively. EPCs for Group 6 Chatsworth formation groundwater are summarized in Spreadsheet C2-13.

For COPCs in soil vapor, EPCs were estimated either from measured soil vapor data using ProUCL or one-half the measured soil vapor detection limit. Estimating from soil data by using the soil to soil vapor partitioning portion of the Johnson and Ettinger (1991) indoor air model was not used because it achieved soil vapor EPCs greater than the measured detection limits.

C3.3.2 Exposure Point Concentrations for Indirect Contact Media

EPCs for the following indirect contact media are discussed in this section: airborne fugitive dusts, ambient air, indoor air, and edible plants (i.e., homegrown consumption). Airborne particulate COPC concentrations were estimated for non-volatile COPCs. Derivation of the particulate emission factor (PEF) for soil is presented in Spreadsheet C2-18, and estimation of airborne particulate COPC concentrations for soil is presented in Spreadsheets C2-19.

Ambient air COPC concentrations were estimated for volatile COPCs by modeling migration from soil vapor at 0 to 10 feet bgs to ambient air, and from groundwater water to ambient air. Parameter values used for soil to air migration and estimation of ambient air EPCs related to soils are presented in Spreadsheets C2-20 and C2-21, respectively. Parameter values used for groundwater to air migration and estimation of ambient air EPCs related to soils are presented in Spreadsheets C2-22 and C2-23, respectively.

[ii] Note: Toxic Equivalency Factors (TEFs) from Van den Berg et al. 2006 were used in this risk assessment.

Indoor air COPC concentrations were estimated for volatile COPCs by modeling migration from soil from 0 to 10 feet bgs, and Chatsworth formation groundwater underlying the OCY RFI site to hypothetical residential and commercial buildings. When soil vapor data were available, soil and soil vapor data were preferentially used for indoor air modeling. Results for soil vapor and OCY RFI Chatsworth formation groundwater COPC migration to indoor air for commercial and residential buildings are presented in Spreadsheets C2-24 and C2-25, C2-28 and C2-29 respectively.

Derivation of edible plant concentrations is calculated utilizing soil to plant uptake factors as described in the SRAM (MWH 2005). COPC concentrations in edible plant tissues from soil at 0 to 2 feet bgs is presented in Spreadsheets C2-30.

C3.3.3 Human Intake of COPCs

EPCs were applied to human intake equations, as presented in the SRAM, to calculate lifetime average daily dosages (LADDs) and average daily dosages (ADDs). A concentration-toxicity screen to determine the appropriate soil depth for assessing exposures for the worker and resident (i.e., 0 to 2 feet bgs or 0 to 10 feet bgs) is presented in Spreadsheet C2-31. The results indicated that the 0 to 2 feet bgs soil depth poses a greater potential for exposure and risk than does the 0 to 10 feet bgs soil depth. Therefore, potential exposure to the 0 to 2 feet bgs soil depth was evaluated for the worker and resident.

Pathway- and chemical-specific LADDs and ADDs are presented in Spreadsheets C2-32 through C2-36 for adult workers, adult recreators, child recreators, adult residents, and child residents. Pathway-specific spreadsheets used to calculate intakes for these receptors are presented in Spreadsheets C2-37 through C2-74.

C3.4 RISK CHARACTERIZATION

Potential human health cancer and non-cancer risks were estimated by application of DTSC-approved toxicity values to the LADDs and ADDs presented in Section 3.3.3. Human health toxicity values utilized in this risk assessment are presented in Table C2-4. Risk estimates are presented in Section 3.4.1, and an evaluation of the uncertainty associated with

these risk estimates is presented in Section 3.4.3. Generally, estimated cancer risks within the range 10^{-6} to 10^{-4}, and HIs less than 1, are considered to be acceptable for the purpose of making remedial decisions (USEPA 1993).

C3.4.1 Estimates of Human Health Risks

Total pathway- and chemical-specific cancer risks and hazard quotients (HQs), as well as cumulative cancer risks, and hazard indices (HIs), and estimated blood lead levels, are presented in Tables C2-5 through C2-10 for the adult worker, adult recreator, child recreator, adult resident, and child resident.

Estimated cancer risks for all receptors for exposures to surficial media and VOCs due to vapor migration range from 7×10^{-6} (CTE) to 2×10^{-2} (RME) and HIs range from 0.0042 (CTE) to 5.5 (RME). For the receptor with the greatest potential exposure and risk (child resident), total cancer risk ranged from 7×10^{-4} to 2×10^{-2} and total HI ranged from 0.62 to 5.5. The chemicals contributing to these potential risks are Aroclor 1248, Aroclor 1254, Aroclor 1260, dioxins, benzo(a)pyrene, trichloroethene (TCE), benzene and methylene chloride in soil and TCE in groundwater.

Blood lead levels associated with soil exposures are less than 10 µg/dl for all receptors. Estimated blood lead levels for the child resident range up to 4.2 µg/dl.

Risks based on direct use of Chatsworth formation groundwater as a drinking water source range from 8×10^{-7} (CTE) to 3×10^{-6} (RME) and HIs range from 1.4 (CTE) to 8.2 (RME). For the receptor with the greatest potential exposure and risk (child resident), risks range from 2×10^{-6} (CTE) to 3×10^{-6} (RME) and HIs range from 4.9 to 8.2. The chemical contributing most substantially to these potential risks is trichloroethylene (TCE) in groundwater.

The risks based on both exposure to all relevant surficial media plus both indirect and direct exposures to chemicals in groundwater for all receptors range from 7×10^{-6} to 2×10^{-2} and HIs range from 0.0042 to 13.7. For the receptor with the greatest potential exposure and risk (child resident), risks range from 7×10^{-4} (CTE) to 2×10^{-2} (RME) and HIs range from 5.5 to 13.7. The chemicals contributing to these potential risks are Aroclor 1248, Aroclor 1254,

Aroclor 1260, dioxins, benzo(a)pyrene, TCE, benzene and methylene chloride in soil and TCE in groundwater.

C3.4.2 Potential Sediment Migration

There is potential for the migration of chemicals from the OCY RFI site to a downgradient RFI site via sediment migration via drainages lead from the OCY RFI site to the New Conservation Yard (NCY) RFI site and toward Silvernale Pond. Chemical migration from OCY to NCY has been evaluated through the NCY RFI site characterization and risk assessments presented in Appendix C1.

C3.4.3 Uncertainty Analysis

There is some degree of uncertainty associated with nearly all exposure parameter values, toxicity values, and exposure assumptions used in the risk assessment process. In nearly all cases, exposure and toxicity values are upper-bound estimates that result in a conservative estimate of risk. Thus, any uncertainty in the risk assessment is accounted for by use of data and assumptions that are protective of human health. Generally, quantitative risk estimates are considered to be overstated.

Five major uncertainty issues were identified for the HRA performed at the OCY RFI site. These uncertainties are described below, and a qualitative analysis of the uncertainty associated with other key exposure assumptions and toxicity values used to estimate human health cancer and non-cancer risk is presented in Table C2-11.

1. Risks associated with polynuclear aromatic hydrocarbons (PAHs) and benzene, ethylbenzene, toluene, and xylenes (BTEX) are estimated based, in part, on extrapolation factors using site TPH data as described in the SRAM (MWH 2005). The estimation of PAH and BTEX concentrations from TPH concentrations is considered conservative since the extrapolation factors used to estimate PAH and BTEX concentrations are based on the maximum ratio of TPH concentration to petroleum constituent concentration in the dataset. Where available, site-specific (actual) chemical data are used in the risk assessment and supercedes data estimated using the extrapolation. For benzene, this procedure is expected to overestimate potential exposures because extrapolated vapor concentrations are driving estimated risks associated with this chemical.

2. Where VOCs are detected in one media, and analyzed for in media to which the VOC could migrate but were not detected, media-to-media extrapolation was conducted (e.g., soil vapor to soil). This procedure is expected to overestimate potential exposures.

3. A number of inorganics (e.g., antimony, barium, copper) that were demonstrated to be consistent with background concentrations through Wilcoxon Rank Sum test were included as COPCs because the maximum detected concentrations were substantially above the maximum detected background concentration and the samples were located in areas of suspected metals impacts.

4. The maximum detected concentration of each COPC detected in groundwater was utilized as the EPC. This is likely to result in an overestimation of potential exposures.

5. Potential impacts of the Topanga fire on the selection of COPCs and risks have been evaluated. Although, as shown in Appendix D, soil concentrations of metals and dioxins have been impacted by the fire and therefore risks have been increased, there were no identified risk assessment decisions based solely on post-Topanga fire data.

C4.0 ECOLOGICAL RISK ASSESSMENT

The following sections describe the ERA performed for the OCY RFI site.

C4.1 SELECTION OF CHEMICALS OF POTENTIAL ECOLOGICAL CONCERN

The selection of chemicals of potential ecological concern (CPECs) is the process of identifying media-specific chemical contaminants that may pose a risk or hazard to ecological receptors. CPECs do not necessarily signify a risk—rather, they are merely chemicals that have been identified for further analyses. Criteria for selecting CPECs are specified in the SRAM and is the same as for selecting COPCs (see Section 3.1), except that CPEC selection requires an additional step. In this step, SQLs are compared to ecological screening levels (ESLs) to assure that SQLs are sufficiently low to detect a concentration that may pose an ecological risk.

CPECs selected for risk assessment at the OCY RFI site are presented in Table C2-12.

The CPEC selection process is summarized in Spreadsheets C2-75 through C2-78 for soil at 0 to 2 feet bgs, soil at 0 to 4 feet bgs, soil at 0 to 6 feet bgs, and soil vapor from 0-6 feet bgs,

respectively. Because VOCs have the potential to migrate from soil to burrow air, any VOC identified as a soil CPEC was selected as a soil vapor CPEC.

The comparison of SQLs to ESLs for soil/sediment 0 to 2 feet bgs, 0 to 4 feet bgs, and soil/sediment 0 to 6 feet bgs is presented in Spreadsheets C2-79 though C2-81. The ESL screen was applied as follows:

- Chemicals were retained as CPECs if the compound was detected infrequently or not at all, the compound is potentially site-related, and there were an insufficient number of SQLs less than ESLs to conclude that the chemical was not present at concentrations greater than ESLs.
- For metals, if a sufficient number of SQLs were within the range of SSFL background concentrations to conclude that these chemicals were not likely present at concentrations exceeding background, then those chemicals were not selected as CPECs even if they exceeded their respective ESLs.

Comparison of observed chemical concentrations to background chemical concentrations for soils at 0 to 2 feet bgs, 0 to 4 feet bgs, and 0 to 6 feet bgs are presented Spreadsheets C2-82 through C2-84.

Several chemicals determined to be present at concentrations consistent with background as determined by Wilcoxon Rank Sum Test were selected as CPECs. This is because these chemicals were present with maximum concentrations significantly greater than maximum background concentrations and located in areas of potential metals impacts or had elevated detection limits greater than SQLs.

C4.2 CONCEPTUAL SITE MODEL AND ENDPOINTS FOR THE ECOLOGICAL RISK ASSESSMENT FOR ECOLOGICAL RISK ASSESSMENT

Following CPEC selection, a site-specific CSM was developed that identifies ecological receptors and potentially complete exposure pathways, and assessment and measurement endpoints were selected to focus the ERA.

C4.2.1 Conceptual Site Model

The OCY RFI site is approximately 9.7 acres and is characterized by thin soils with small areas of rock outcrops. The Site almost entirely supports ruderal habitat consisting of small patches of non-native grasses and coast live oak. Patches of a scrub variety are found extensively throughout the southwestern portion of the OCY RFI site as is the Santa Susana Tarplant (see Attachment C6). The types of habitats near the OCY RFI site and the representative ecological receptors of concern are summarized in Spreadsheet C2-88.

The ecological CSM for the OCY RFI site is presented in Table C2-13. As described in the SRAM, inhalation of volatile CPECs by surface-dwelling wildlife and dermal absorption of CPECs were considered insignificant exposure routes for identified wildlife receptors of concern—risk estimates for these exposure routes were not quantitatively evaluated in this ERA.

C4.2.2 Assessment and Measurement Endpoints

Assessment endpoints are "explicit expressions of the actual environmental value that is to be protected" (USEPA 1992d). Measurement endpoints are measurable biological responses to a stressor that can be related to the valued characteristic chosen as the assessment endpoint (USEPA 1992d). The assessment and measurement endpoints for the OCY ERA are presented in Spreadsheet C2-89. Representative receptors include the deer mouse, thrush, hawk, bobcat, and mule deer.

C4.3 EXPOSURE ASSESSMENT FOR ECOLOGICAL RECEPTORS

The exposure assessment quantifies the magnitude and type of potential exposure of an ecological receptor to a CPEC. As described in Section 4.2.1, the OCY RFI site is small (approximately 9.7 acres), and therefore, the entire OCY RFI site is considered one exposure unit.

C4.3.1 Exposure Point Concentrations

An EPC is an estimate of the concentration of a chemical contacted by a target ecological receptor in a given exposure area. EPCs for soil at 0 to 2 feet bgs, 0 to 4 feet bgs, and 0 to 6 feet bgs were calculated as described in Section 3.3.1 for COPCs. EPCs representing burrow air concentrations were estimated either from measured soil vapor data or from soil data using the soil to soil vapor partitioning portion of the Johnson and Ettinger (1991) indoor air model.

EPCs for soils at 0 to 2 feet bgs, 0 to 4 feet bgs, and 0 to 6 feet bgs are presented in Table C2-3 and Spreadsheets C2-90 through C2-92. EPCs for soil vapor at 0 to 6 feet bgs, used as burrow air concentrations, are presented in Table C2-3 and Spreadsheet C2-93. Aroclor to PCB extrapolation calculations for soil from 0 to 2 feet bgs, 0 to 4 feet bgs, and 0 to 6 feet bgs are presented in Spreadsheets C2-94, C2-96, and C2-98. TPH to petroleum constituent extrapolation calculations for soil at 0 to 2 feet bgs, soil at 0 to 4 feet bgs, and soil at 0 to 6 feet bgs are presented in Spreadsheets C2-95 and C2-97, and C2-99, respectively.

C4.4 EXPOSURE POINT VALUES AND APPLIED DAILY DOSES FOR BIOTIC MEDIA

Exposure point values (EPVs) and applied daily doses (ADDs) for direct and indirect exposure pathways are presented in this section.

A concentration-toxicity screen to determine the appropriate subsurface soil/sediment depth for assessing exposures to burrowing animals (i.e., 0 to 2 feet bgs, 0 to 4 feet bgs, or 0 to 6 feet bgs) is presented in Spreadsheet C2-100. The 0 to 2 feet bgs soil depth provided the highest toxicity-concentration screen value. Therefore, the 0 to 2 feet bgs soil depth was selected as the soil depth of interest for estimating exposure to the deer mouse.

Direct exposure pathways to CPECs include incidental ingestion of soil and inhalation of vapors. EPCs for direct exposure pathways consist of media-specific concentrations. Indirect exposure pathways include consumption of prey/food items. The EPVs for indirect exposure pathways are chemical-specific prey species concentrations and are based on chemical-specific bioaccumulation factors for a given medium and organism (e.g., soil and

earthworm) as described in the SRAM. EPVs for earthworms and plants are presented in Spreadsheets C2-101 and C2-102, respectively.

ADDs were calculated for the deer mouse, hermit thrush, red-tailed hawk, bobcat, and mule deer and account for direct and/or indirect exposures that could contribute to an increase in risk. Direct exposures via the inhalation route are only expected to contribute significant exposures to the deer mouse (due to burrowing), therefore, inhalation exposure routes were not included in the ADD calculations for the hermit thrush, red-tailed hawk, bobcat, and mule deer. The chemical-specific ADDs for the deer mouse, hermit thrush, red-tailed hawk, bobcat, and mule deer are presented in Spreadsheets C2-103 through C2-108.

Methods and models used to estimate the EPVs and ADDs for the reference receptors are provided in the SRAM. Any parameter values used in model calculations that were either not specified in the SRAM or deviated from the SRAM are identified and referenced within the appropriate tables. The parameter values used for exposure models are also presented in Spreadsheet C2-109.

C4.5 ECOLOGICAL RISK CHARACTERIZATION

Potential hazards to representative ecological receptors were estimated by comparison of toxicity values to ADDs presented in Section 4.4. As per Section 11.2 of the SRAM (MWH 2005), for the chemicals presenting the greatest risk ("drivers"), where sufficient data were available in the peer-reviewed scientific literature, baseline TRVs have also been developed and are utilized. Ecological toxicity values utilized in this risk assessment are presented in Table C2-14 and Table C2-15. A toxicity profile that provides the basis for baseline TRVs is presented in Appendix C, Attachment C5.

C4.5.1 Estimates of Ecological Risks

Receptor- and chemical-specific HQs and cumulative HIs are presented in Tables C2-16 through C2-21 for the deer mouse, hermit thrush, red-tailed hawk, bobcat, and mule deer.

The estimated HQs and HIs associated with soil media for all receptors for the OCY RFI site were greater than 1. For the receptor generally considered to be the most sensitive, the deer

mouse, the total HI were greater than 1,000 for both CTE and RME and was primarily due to Aroclor 1248, Aroclor 1260, Aroclor 1254, dioxins, antimony, lead, barium, and cadmium in soil. For the bobcat, HIs were also greater than 1,000 for both CTE and RME. Hazards for all other ecological receptors were significantly greater than 1.0, with the HIs generally attributable mostly to the presence of Aroclors, metals (cadmium, lead, mercury, zinc), dioxins and PAHs (phenanthrene) in soil.

Another factor to consider when interpreting the results is the relatively robust ability of annual grassland communities to recover given the surrounding biotic communities.

C4.5.2 Observational Assessment of Native Vegetation

As described in the SRAM (MWH 2005), an observational assessment of native vegetation at the OCY RFI site was performed. The results of the observational assessment are presented in Appendix C, Attachment C6. In a visual comparison of the reference sites to the assessment sites, none of the assessment sites showed significant differences in vegetative cover or species composition that could not be accounted for by mechanical or other historical disturbances. Thus, no adverse affects on health or productivity of native species were observed within areas potentially impacted by CPECs.

C4.5.3 Potential Sediment Migration

There is potential for the migration of chemicals from the OCY RFI site to a downgradient RFI site via sediment migration via drainages lead from the OCY RFI site to the New Conservation Yard (NCY) RFI site and toward Silvernale Pond. Chemical migration from OCY to NCY has been evaluated through the NCY RFI site characterization and risk assessments presented in Appendix C1.

C4.5.4 Uncertainty Analysis

As discussed in Section 3.4.3, there is some degree of uncertainty associated with nearly all exposure parameter values, toxicity values, and exposure assumptions used in the risk assessment process. In nearly all cases, exposure and toxicity values used in the risk assessment were selected to result in a conservative estimate of risk. Thus, for the most part,

uncertainty in the risk assessment is accounted for by use of data and assumptions that are protective of ecological receptors.

Six site-specific uncertainties of interest were identified for the ERA performed for the OCY RFI site. These uncertainties are described below, and a qualitative analysis of the uncertainty associated with other key exposure assumptions and toxicity values used estimate ecological risk is presented in Table C2-22.

1. Risks associated with PAHs and BTEX are estimated based, in part, on extrapolation factors using site TPH as described in the SRAM (MWH 2005). The estimation of PAH and BTEX concentrations from TPH concentrations is considered conservative since the extrapolation factors used to estimate PAH and BTEX concentrations are based on the maximum ratio of TPH concentration to petroleum constituent concentration in the dataset. Where available, site-specific (actual) chemical data are used in the risk assessment and supercedes data estimated using the extrapolation.

2. Where VOCs are detected in one media but were analyzed for and not detected in others to which the VOC could migrate, media to media extrapolation was conducted (e.g., soil to soil vapor). This procedure is expected to overestimate potential exposures.

3. Due to the elevated detection limits for some of the samples, maximum detected concentrations were less than the CTE EPCs. In such cases, it is assumed that chemicals may be present at half the detection limit.

4. A number of inorganics (e.g., antimony, barium, copper) that were demonstrated to be consistent with background concentrations through Wilcoxon Rank Sum test were included as CPECs because the maximum detected concentrations were substantially above the maximum detected background concentration and were located in areas of suspected metals impacts or had elevated SQLs relative to ESLs.

5. The estimated risks to the hawk, the bobcat, and the mule deer assume that these species' spend all of their time at the OCY RFI site. This assumption is unlikely to be true and it results in overestimates of potential risks to these species' due to chemicals present in soils at the site. The minimum reported foraging ranges for the red-tailed hawk, the bobcat, the mule deer are 195, 1152, and 192 acres, respectively, as compared to 9.7 acres for the OCY RFI site. When the foraging ranges of the these species' is accounted for in the ERA, it indicates that RME HIs for the hawk, the bobcat, and the mule deer could be 20, 119, and 20 times lower, respectively. Risk estimates for large home range receptors (hawk, bobcat, and mule deer) will be addressed for the entire SSFL facility after all RFI site risk assessments have been completed and potential site-specific risks are evaluated.

6. Potential impacts of the Topanga fire on the selection of COPCs and risks have been evaluated. Although, as shown in Appendix D, soil concentrations of metals and dioxins have been impacted by the fire and therefore risks have been increased, there were no identified risk assessment decisions based solely on post-Topanga fire data.

C5.0 CONCLUSIONS

The human health risk assessments conducted for the OCY RFI site indicate that theoretical upper-bound incremental lifetime cancer risks for human receptors are between 7×10^{-6} and 2×10^{-2}), with most falling above 10^{-4}. The human health and ecological risk assessments indicate that HIs are greater than 1 for both human (future hypothetical child recreator and residential child and adult receptors) and ecological receptors. HIs for all other human receptors were below 1.0. The qualitative assessment of potential impacts to vegetation at the OCY RFI site showed that even under conditions of highly compacted soil at the OCY RFI site, vegetation is healthy and supporting both non-native and native species, including the Santa Susana Tarplant. The uncertainties associated with the risk assessments are, for the most part, unlikely to lead to significant underestimates of risk. In addition, the assumptions used in this risk assessment were designed to mitigate the effects of uncertainties that may result in underestimation of risks. Therefore, it can be concluded that:

- The theoretical upper-bound incremental lifetime cancer risks for all receptors are greater than 10^{-4};
- The HIs for the future hypothetical resident child, resident adult, and recreator child exceed acceptable levels;
- The theoretical upper-bound incremental lifetime cancer risks for residents assumed to drink Chatsworth formation groundwater within the Group 6 RFI report area are 3×10^{-6};
- The His for residents assumed to drink Chatsworth formation groundwater within the Group 6 RFI report area are elevated;
- Ecological risks the OCY RFI site exceed acceptable levels.

These HRA and ERA results are appropriate to use in making CMS recommendations.

C6.0 REFERENCES

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TABLES

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Table C2-1 (1 of 2)

Chemicals of Potential Concern for Human Health
Old Conservation Yard RFI Site

Chemical	Soil (0 to 2 feet bgs)	Soil (0 to 10 feet bgs)	RFI Site Chatsworth Groundwater (Indirect Pathway)[a]	RFI Site Chatsworth Groundwater (Direct Pathway)[a]	Soil Vapor
Inorganic Compounds					
Antimony		X			
Barium		X			
Boron	X	X			
Cadmium	X	X			
Copper		X		X	
Fluoride				X	
Lead	X	X			
Mercury	X	X			
Nitrate				X	
Silver	X	X			
Thallium	X	X		X	
Zinc	X	X			
VOCs					
1,1,1-Trichloroethane	X	X			X
1,1,2-Trichloro-1,2,2-trifluoroethane	X	X			X
1,1-Dichloroethane				X	
1,1-Dichloroethene	X	X			X
1,2-Dichloroethane				X	
2-Butanone	X	X			
Acetone	X	X		X	
Benzene	X	X		X	X
Carbon disulfide				X	
Chloromethane			X	X	
cis-1,2-Dichloroethene			X	X	
Ethylbenzene	X	X			X
m,p-Xylene	X	X			X
Methylene chloride	X	X		X	X
o-Xylene	X	X			X
p-Isopropyltoluene	X	X			X
Toluene	X	X		X	X
Trichloroethene	X	X	X	X	X
Xylenes (total)	X	X			X
SVOCs					
1-Methylnaphthalene	X	X			
2-Methylnaphthalene	X	X			
Acenaphthene	X	X			
Acenaphthylene	X	X			
Anthracene	X	X			
Benzo(a)anthracene	X	X			
Benzo(a)pyrene	X	X			
Benzo(b)fluoranthene	X	X			
Benzo(e)pyrene	X	X			
Benzo(g,h,i)perylene	X	X			
Benzo(k)fluoranthene	X	X			
Chrysene	X	X			
Dibenz(a,h)anthracene	X	X			
Fluoranthene	X	X			
Fluorene	X	X			
Indeno(1,2,3-cd)pyrene	X	X			
Naphthalene	X	X			
Perylene	X	X			
Phenanthrene	X	X			
Pyrene	X	X			

Table C2-1 (2 of 2)

Chemicals of Potential Concern for Human Health
Old Conservation Yard RFI Site

Chemical	Soil (0 to 2 feet bgs)	Soil (0 to 10 feet bgs)	RFI Site Chatsworth Groundwater (Indirect Pathway)[a]	RFI Site Chatsworth Groundwater (Direct Pathway)[a]	Soil Vapor
Total Petroleum Hydrocarbons					
C08-C11(Gasoline Range)	X	X			
C11-C14(Kerosene Range)	X	X			
C14-C20(Diesel Range)	X	X	X	X	
C20-C30(Lubricant Oil Range)	X	X			
C22-C40 (Heavy Oil)	X	X			
Dioxins					
2,3,7,8-TCDD	X	X			
1,2,3,7,8-PeCDD	X	X			
1,2,3,4,7,8-HxCDD	X	X			
1,2,3,6,7,8-HxCDD	X	X			
1,2,3,7,8,9-HxCDD	X	X			
1,2,3,4,6,7,8-HpCDD	X	X			
OCDD	X	X			
2,3,7,8-TCDF	X	X			
1,2,3,7,8-PeCDF	X	X			
2,3,4,7,8-PeCDF	X	X			
1,2,3,4,7,8-HxCDF	X	X			
1,2,3,6,7,8-HxCDF	X	X			
2,3,4,6,7,8-HxCDF	X	X			
1,2,3,7,8,9-HxCDF	X	X			
1,2,3,4,6,7,8-HpCDF	X	X			
1,2,3,4,7,8,9-HpCDF	X	X			
OCDF	X	X			
PCBs					
Aroclor-1248	X	X			
Aroclor-1254	X	X			
Aroclor-1260	X	X			
PCB-105	X	X			
PCB-114	X	X			
PCB-118	X	X			
PCB-123	X	X			
PCB-126	X	X			
PCB-156	X	X			
PCB-157	X	X			
PCB-167	X	X			
PCB-169	X	X			
PCB-189	X	X			
PCB-77	X	X			
PCB-81	X	X			

Notes:
X - selected as a chemical of potential concern
(a) Only Chatsworth formation groundwater is considered in the risk assessment since near-surface groundwater is localized (does not occur at the OCY RFI site) or does not meet State Water Resources Control Board yield requirements.
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCBs - polychlorinated biphenyls
bgs - below ground surface

Table C2-2 (1 of 1)

Human Health Risk Assessment Conceptual Site Model
Old Conservation Yard RFI Site

NOTES:

As described in the SRAM (MWH 2005), note that risk estimates for the potential future recreational user (recreator) are used as surrogate risk estimates for the trespasser.

(*) Exposure limited to volatile compounds as defined in the text; residential and worker receptors include both indoor and outdoor air exposure to volatiles; non-residental and non-worker receptors include only outdoor air exposure. For workers, inhalation of volatiles from groundwater beneath the RFI site includes pathways associated with both migration to indoor air and ambient air (domestic groundwater use is an incomplete exposure pathway). For residents, exposures to reporting area Chatsworth formation groundwater includes pathways associated with both migration to indoor air and ambient air, as well as domestic use. Exposure to fugitive dust is limited to non-VOC compounds.

(**) Exposure limited to bioaccumulatable compounds as described in the text.

- complete and potentially complete exposure pathways evaluated in this risk assessment

- incomplete exposure pathways not evaluated in this risk assessment

Table C2-3 (1 of 3)

Exposure Point Concentrations for COPCs and CPECs
Old Conservation Yard RFI Site

Chemical	Soil/Sediment (0-2 feet bgs) EPCs		Soil/Sediment (0-4 feet bgs) EPCs		Soil/Sediment (0-6 feet bgs) EPCs		Soil/Sediment (0-10 feet bgs) EPCs		Soil Vapor (0-10 feet bgs) EPCs		OCY Chatsworth Formation Groundwater EPCs		Group 6 Chatsworth Formation Groundwater EPCs	
	CTEa (mg/kg)	RMEb (mg/kg)	CTE (mg/kg)	RME (mg/kg)	CTE (mg/kg)	RME (mg/kg)	CTE (mg/kg)	RME (mg/kg)	CTE (µg/L)	RME (µg/L)	CTEc (mg/L)	RMEc (mg/L)	CTEc (mg/L)	RMEc (mg/L)
Inorganic Compounds														
Antimony	1.7E+00	5.4E+00	1.7E+00	5.3E+00	2.4E+00	7.6E+00	2.3E+00	5.4E+00	NC	NC	NC	NC	NC	NC
Barium	7.8E+01	8.3E+01	8.2E+01	8.8E+01	8.3E+01	9.0E+01	8.3E+01	8.9E+01	NC	NC	NC	NC	NC	NC
Boron	4.3E+00	5.2E+00	4.5E+00	5.2E+00	4.5E+00	5.1E+00	4.4E+00	5.0E+00	NC	NC	NC	NC	NC	NC
Cadmium	5.2E-01	9.9E-01	5.1E-01	8.1E-01	5.5E-01	8.9E-01	5.2E-01	9.9E-01	NC	NC	NC	NC	NC	NC
Copper	NC	NC	NC	NC	1.3E+01	1.8E+01	1.3E+01	1.7E+01	NC	NC	NC	NC	1.8E-02	1.8E-02
Lead	1.7E+01	2.1E+01	1.6E+01	1.9E+01	1.8E+01	3.1E+01	1.7E+01	3.0E+01	NC	NC	NC	NC	NC	NC
Mercury	5.0E-01	3.3E+00	4.7E-01	3.0E+00	4.5E-01	2.8E+00	4.2E-01	2.7E+00	NC	NC	NC	NC	NC	NC
Silver	8.6E-01	1.8E+00	8.6E-01	1.7E+00	9.8E-01	2.1E+00	1.2E+00	2.5E+00	NC	NC	NC	NC	NC	NC
Thallium	8.6E-01	1.7E+00	8.8E-01	1.7E+00	9.3E-01	1.7E+00	9.8E-01	1.8E+00	NC	NC	NC	NC	5.4E-04	5.4E-04
Zinc	6.6E+01	7.4E+01	6.6E+01	7.3E+01	7.8E+01	1.3E+02	7.6E+01	1.2E+02	NC	NC	NC	NC	NC	NC
VOCs														
1,1,1-Trichloroethane	3.0E-03	5.5E-03	2.9E-03	5.5E-03	3.5E-03	1.4E-02	3.5E-03	3.5E-03	5.8E-01	7.3E-01	NC	NC	NC	NC
1,1,2-Trichloro-1,2,2-trifluoroethane	1.2E-02	2.1E-02	1.2E-02	2.1E-02	1.5E-02	5.4E-02	1.5E-02	1.5E-02	1.0E+00	1.9E+00	NC	NC	NC	NC
1,1-Dichloroethane	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	2.6E-03	2.6E-03
1,1-Dichloroethene	3.2E-03	5.5E-03	3.1E-03	5.5E-03	3.6E-03	1.4E-02	3.6E-03	3.6E-03	5.7E-01	7.0E-01	NC	NC	NC	NC
1,2-Dichloroethane	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	9.0E-04	9.0E-04
2-Butanone	2.2E-02	1.1E-02	2.2E-02	3.8E-02	2.8E-02	1.1E-02	2.8E-02	1.1E-02	NC	NC	NC	NC	NC	NC
Acetone	3.5E-01	3.5E+00	3.1E-01	3.1E+00	3.0E-01	2.7E+00	3.0E-01	2.7E+00	NC	NC	NC	NC	1.6E-02	1.6E-02
Benzene	1.1E-03	2.5E-03	1.1E-03	2.3E-03	1.0E-03	2.0E-03	9.5E-04	1.9E-03	5.0E-01	5.0E-01	NC	NC	5.8E-04	5.8E-04
Carbon disulfide	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	2.6E-03	2.6E-03
Chloromethane	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	3.2E-04	3.2E-04	3.2E-04	3.2E-04
cis-1,2-Dichloroethene	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	3.5E-04	3.5E-04	5.1E-02	5.1E-02
Ethylbenzene	1.1E-03	2.5E-03	1.1E-03	2.3E-03	1.0E-03	2.0E-03	9.5E-04	1.9E-03	2.2E-01	4.4E-01	NC	NC	NC	NC
m,p-Xylene	3.2E-03	7.2E-03	3.1E-03	6.6E-03	2.9E-03	6.0E-03	2.7E-03	5.6E-03	5.0E-01	1.0E+00	NC	NC	NC	NC
Methylene chloride	4.1E-02	2.4E-01	3.7E-02	2.2E-01	3.8E-02	1.9E-01	3.8E-02	1.9E-01	5.0E-01	2.5E+01	NC	NC	6.4E-04	6.4E-04
o-Xylene	7.8E-04	1.7E-03	7.3E-04	1.5E-03	6.9E-04	1.4E-03	6.5E-04	1.3E-03	1.0E-01	2.0E-01	NC	NC	NC	NC
p-Isopropyltoluene	NC	NC	NC	NC	1.9E-03	1.9E-03	1.9E-03	1.9E-03	3.8E-01	3.8E-01	NC	NC	NC	NC
Toluene	1.5E-03	3.6E-03	1.4E-03	3.2E-03	1.3E-03	2.9E-03	1.2E-03	2.7E-03	4.6E-01	5.0E-01	NC	NC	1.8E-03	1.8E-03
Trichloroethene	3.0E-03	5.5E-03	2.9E-03	5.5E-03	3.5E-03	1.4E-02	3.5E-03	3.5E-03	1.1E+00	3.6E+00	4.3E-03	4.3E-03	1.0E-02	1.0E-02
Xylenes (total)	4.7E-03	9.9E-03	4.4E-03	9.1E-03	4.2E-03	8.2E-03	3.9E-03	7.6E-03	5.0E-01	1.0E+00	NC	NC	NC	NC
SVOCs														
2,4-Dinitrophenol	NC	NC	2.0E+00	1.0E+01	2.0E+00	1.0E+01	NC	NC	NC	NC	NC	NC	NC	NC

Exposure Point Concentrations for COPCs and CPECs
Old Conservation Yard RFI Site

Chemical	Soil/Sediment (0-2 feet bgs) EPCs		Soil/Sediment (0-4 feet bgs) EPCs		Soil/Sediment (0-6 feet bgs) EPCs		Soil/Sediment (0-10 feet bgs) EPCs		Soil Vapor (0-10 feet bgs) EPCs		OCY Chatsworth Formation Groundwater EPCs		Group 6 Chatsworth Formation Groundwater EPCs	
	CTEa (mg/kg)	RMEb (mg/kg)	CTE (mg/kg)	RME (mg/kg)	CTE (mg/kg)	RME (mg/kg)	CTE (mg/kg)	RME (mg/kg)	CTE (µg/L)	RME (µg/L)	CTEc (mg/L)	RMEc (mg/L)	CTEc (mg/L)	RMEc (mg/L)
2-Methylnaphthalene	1.7E-01	5.6E-01	1.6E-01	3.8E-01	1.6E-01	3.5E-01	1.5E-01	3.2E-01	NC	NC	NC	NC	NC	NC
Acenaphthene	1.7E-01	7.0E-01	1.7E-01	6.5E-01	1.5E-01	5.8E-01	1.4E-01	5.2E-01	NC	NC	NC	NC	NC	NC
Acenaphthylene	4.0E-02	1.4E-01	3.9E-02	1.3E-01	3.8E-02	1.2E-01	3.5E-02	1.1E-01	NC	NC	NC	NC	NC	NC
Anthracene	1.2E-01	4.7E-01	1.2E-01	4.5E-01	1.1E-01	4.0E-01	1.0E-01	3.6E-01	NC	NC	NC	NC	NC	NC
Benzo(a)anthracene	3.4E-02	1.8E-01	3.2E-02	1.6E-01	3.1E-02	1.5E-01	2.8E-02	1.4E-01	NC	NC	NC	NC	NC	NC
Benzo(a)pyrene	3.4E-02	1.8E-01	3.1E-02	1.6E-01	3.1E-02	1.4E-01	2.8E-02	1.3E-01	NC	NC	NC	NC	NC	NC
Benzo(b)fluoranthene	4.0E-02	2.0E-01	3.8E-02	1.8E-01	3.7E-02	1.6E-01	3.4E-02	1.5E-01	NC	NC	NC	NC	NC	NC
Benzo(e)pyrene	7.1E-02	3.1E-01	7.5E-02	3.0E-01	6.8E-02	2.6E-01	6.3E-02	2.4E-01	NC	NC	NC	NC	NC	NC
Benzo(g,h,i)perylene	8.3E-02	3.0E-01	8.5E-02	2.9E-01	7.8E-02	2.6E-01	7.1E-02	2.3E-01	NC	NC	NC	NC	NC	NC
Benzo(k)fluoranthene	3.3E-02	1.8E-01	3.1E-02	1.6E-01	3.1E-02	1.4E-01	2.8E-02	1.3E-01	NC	NC	NC	NC	NC	NC
Chrysene	5.4E-02	2.4E-01	5.1E-02	2.2E-01	4.8E-02	2.0E-01	4.4E-02	1.8E-01	NC	NC	NC	NC	NC	NC
Dibenz(a,h)anthracene	2.5E-02	1.0E-01	2.3E-02	1.0E-01	2.4E-02	1.0E-01	2.2E-02	1.0E-01	NC	NC	NC	NC	NC	NC
Fluoranthene	8.2E-02	4.3E-01	7.7E-02	3.9E-01	7.1E-02	3.5E-01	6.4E-02	3.1E-01	NC	NC	NC	NC	NC	NC
Fluorene	1.7E-01	6.9E-01	1.7E-01	6.5E-01	1.5E-01	5.7E-01	1.4E-01	5.2E-01	NC	NC	NC	NC	NC	NC
Indeno(1,2,3-cd)pyrene	3.0E-02	1.7E-01	2.8E-02	1.5E-01	2.8E-02	1.4E-01	2.6E-02	1.2E-01	NC	NC	NC	NC	NC	NC
Naphthalene	6.3E-02	1.6E-01	5.9E-02	1.4E-01	5.8E-02	1.3E-01	5.4E-02	1.2E-01	NC	NC	NC	NC	NC	NC
Perylene	4.0E-02	1.8E-01	4.3E-02	1.7E-01	3.9E-02	1.5E-01	3.6E-02	1.4E-01	NC	NC	NC	NC	NC	NC
Phenanthrene	4.3E-01	1.9E+00	4.1E-01	1.7E+00	3.7E-01	1.5E+00	3.3E-01	1.3E+00	NC	NC	NC	NC	NC	NC
Pyrene	8.2E-02	3.7E-01	8.0E-02	3.4E-01	7.4E-02	3.1E-01	6.7E-02	2.0E-01	NC	NC	NC	NC	NC	NC
Total Petroleum Hydrocarbons														
C08-C11(Gasoline Range)	9.7E+00	2.2E+01	9.1E+00	2.0E+01	8.6E+00	1.8E+01	8.1E+00	1.6E+01	NC	NC	NC	NC	NC	NC
C11-C14(Kerosene Range)	1.1E+01	2.2E+01	1.0E+01	2.0E+01	9.7E+00	1.8E+01	9.1E+00	1.6E+01	NC	NC	NC	NC	NC	NC
C14-C20(Diesel Range)	6.5E+01	2.6E+02	5.8E+01	2.3E+02	5.3E+01	2.0E+02	4.9E+01	1.8E+02	NC	NC	NC	NC	5.0E-02	5.0E-02
C20-C30(Lubricant Oil Range)	2.9E+02	1.4E+03	2.6E+02	1.2E+03	2.3E+02	1.0E+03	2.1E+02	9.4E+02	NC	NC	NC	NC	NC	NC
Dioxins														
2,3,7,8-TCDD	1.0E-06	1.8E-06	1.0E-06	2.1E-06	1.1E-06	2.3E-06	9.9E-07	2.0E-06	NC	NC	NC	NC	NC	NC
1,2,3,7,8-PeCDD	6.6E-06	5.2E-05	6.8E-06	3.4E-05	6.7E-06	1.7E-05	5.7E-06	3.7E-05	NC	NC	NC	NC	NC	NC
1,2,3,4,7,8-HxCDD	1.4E-05	5.3E-05	1.6E-05	7.3E-05	1.5E-05	7.4E-05	1.3E-05	5.4E-05	NC	NC	NC	NC	NC	NC
1,2,3,6,7,8-HxCDD	2.0E-05	1.0E-04	2.1E-05	1.2E-04	2.2E-05	4.6E-05	1.9E-05	4.1E-05	NC	NC	NC	NC	NC	NC
1,2,3,7,8,9-HxCDD	1.8E-05	8.6E-05	1.9E-05	1.1E-04	1.9E-05	4.7E-05	1.6E-05	9.3E-05	NC	NC	NC	NC	NC	NC
1,2,3,4,6,7,8-HpCDD	4.9E-04	2.9E-03	4.9E-04	1.3E-03	4.9E-04	3.1E-03	4.2E-04	2.6E-03	NC	NC	NC	NC	NC	NC
OCDD	3.7E-03	8.2E-03	3.6E-03	7.5E-03	3.8E-03	7.4E-03	3.2E-03	6.7E-03	NC	NC	NC	NC	NC	NC
2,3,7,8-TCDF	2.2E-06	1.0E-05	2.1E-06	1.0E-05	2.6E-06	1.0E-05	2.2E-06	1.0E-05	NC	NC	NC	NC	NC	NC
1,2,3,7,8-PeCDF	1.8E-06	9.5E-06	1.8E-06	3.7E-06	2.3E-06	4.5E-06	2.0E-06	9.4E-06	NC	NC	NC	NC	NC	NC

Exposure Point Concentrations for COPCs and CPECs
Old Conservation Yard RFI Site

Chemical	Soil/Sediment (0-2 feet bgs) EPCs		Soil/Sediment (0-4 feet bgs) EPCs		Soil/Sediment (0-6 feet bgs) EPCs		Soil/Sediment (0-10 feet bgs) EPCs		Soil Vapor (0-10 feet bgs) EPCs		OCY Chatsworth Formation Groundwater EPCs		Group 6 Chatsworth Formation Groundwater EPCs	
	CTEa (mg/kg)	RMEb (mg/kg)	CTE (mg/kg)	RME (mg/kg)	CTE (mg/kg)	RME (mg/kg)	CTE (mg/kg)	RME (mg/kg)	CTE (µg/L)	RME (µg/L)	CTEc (mg/L)	RMEc (mg/L)	CTEc (mg/L)	RMEc (mg/L)
2,3,4,7,8-PeCDF	5.1E-06	3.0E-05	5.1E-06	1.1E-05	5.8E-06	1.2E-05	4.9E-06	3.0E-05	NC	NC	NC	NC	NC	NC
1,2,3,4,7,8-HxCDF	1.3E-05	6.2E-05	1.3E-05	3.7E-05	1.3E-05	1.2E-04	1.1E-05	6.0E-05	NC	NC	NC	NC	NC	NC
1,2,3,6,7,8-HxCDF	4.9E-06	1.0E-05	4.9E-06	1.0E-05	5.6E-06	1.1E-05	4.8E-06	2.0E-05	NC	NC	NC	NC	NC	NC
2,3,4,6,7,8-HxCDF	5.2E-06	2.9E-05	5.6E-06	3.0E-05	6.2E-06	3.0E-05	5.3E-06	3.0E-05	NC	NC	NC	NC	NC	NC
1,2,3,7,8,9-HxCDF	2.3E-06	1.0E-05	2.4E-06	6.2E-06	2.7E-06	1.5E-05	2.4E-06	1.0E-05	NC	NC	NC	NC	NC	NC
1,2,3,4,6,7,8-HpCDF	5.5E-05	1.2E-04	5.5E-05	1.1E-04	5.7E-05	1.1E-04	4.9E-05	9.2E-05	NC	NC	NC	NC	NC	NC
1,2,3,4,7,8,9-HpCDF	7.2E-06	3.0E-05	7.4E-06	3.4E-05	6.8E-06	3.0E-05	5.9E-06	1.2E-05	NC	NC	NC	NC	NC	NC
OCDF	1.8E-04	4.1E-04	1.8E-04	3.8E-04	1.7E-04	3.4E-04	1.5E-04	3.1E-04	NC	NC	NC	NC	NC	NC
Aroclor-1248	5.0E+02	5.5E+03	4.7E+02	5.2E+03	4.1E+02	4.5E+03	3.9E+02	4.3E+03	NC	NC	NC	NC	NC	NC
Aroclor-1254	1.2E+00	5.4E+00	1.2E+00	5.4E+00	1.0E+00	5.4E+00	9.9E-01	5.4E+00	NC	NC	NC	NC	NC	NC
Aroclor-1260	1.3E+01	1.4E+02	1.3E+01	9.0E+01	1.1E+01	7.7E+01	1.0E+01	7.5E+01	NC	NC	NC	NC	NC	NC
PCB-105	1.1E-03	1.2E-02	1.0E-03	7.4E-03	9.1E-04	6.4E-03	8.8E-04	6.2E-03	NC	NC	NC	NC	NC	NC
PCB-114	2.1E-05	2.1E-04	1.9E-05	1.3E-04	1.7E-05	1.1E-04	1.6E-05	1.1E-04	NC	NC	NC	NC	NC	NC
PCB-118	2.2E-03	2.4E-02	2.1E-03	1.5E-02	1.8E-03	1.3E-02	1.8E-03	1.2E-02	NC	NC	NC	NC	NC	NC
PCB-123	3.1E-05	3.3E-04	3.0E-05	2.1E-04	2.6E-05	1.8E-04	2.5E-05	1.7E-04	NC	NC	NC	NC	NC	NC
PCB-126	8.6E-05	9.2E-04	8.1E-05	5.7E-04	7.0E-05	4.9E-04	6.8E-05	4.8E-04	NC	NC	NC	NC	NC	NC
PCB-156	7.4E-04	7.9E-03	6.9E-04	4.9E-03	6.0E-04	4.2E-03	5.8E-04	4.1E-03	NC	NC	NC	NC	NC	NC
PCB-157	3.3E-04	3.5E-03	3.1E-04	2.2E-03	2.7E-04	1.9E-03	2.6E-04	1.8E-03	NC	NC	NC	NC	NC	NC
PCB-167	5.7E-04	6.1E-03	5.4E-04	3.8E-03	4.6E-04	3.3E-03	4.5E-04	3.2E-03	NC	NC	NC	NC	NC	NC
PCB-169	8.5E-06	9.2E-05	8.0E-06	5.7E-05	6.9E-06	4.9E-05	6.7E-06	4.8E-05	NC	NC	NC	NC	NC	NC
PCB-189	8.5E-05	9.2E-04	8.0E-05	5.7E-04	6.9E-05	4.9E-04	6.7E-05	4.8E-04	NC	NC	NC	NC	NC	NC
PCB-77	1.7E-04	1.8E-03	1.6E-04	1.1E-03	1.4E-04	9.9E-04	1.4E-04	9.6E-04	NC	NC	NC	NC	NC	NC
PCB-81	3.1E-05	3.2E-04	2.9E-05	2.0E-04	2.5E-05	1.7E-04	2.4E-05	1.7E-04	NC	NC	NC	NC	NC	NC

Notes:

a. Either the arithmetic mean concentration for two or more samples or the reported concentration for a single sample.

b. Either the 95% upper confidence limit (95% UCL) on the arithmetic mean for three or more samples, or the maximum concentration for less than three samples, or the maximum concentration in cases where the 95% UCL exceeds the maximum concentration.

c. For groundwater, all EPCs are based on the maximum detected value for each COPC in the identified investigational unit.

COPC - chemical of potential concern

CTE - central tendency exposure
RME - reasonable maximum exposure
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCBs - polychlorinated biphenyls
"-" not applicable
mg/kg - milligrams per kilogram
bgs - below ground surface
EPC - exposure point concentration
NC - not selected as a COPC in the indicated media/depth

Toxicity Criteria
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	Oral CSF [1/(mg/kg-day)]		Dermal CSF [1/(mg/kg-day)]		Inhalation CSF [1/(mg/kg-day)]		Oral Reference Dose (mg/kg-day)		Dermal Reference Dose (mg/kg-day)		Inhalation Reference Dose (mg/kg-day)	
Compound	Value	Source	Value	Source	Value	Source	Value	Source	Value	Source	Value	Source
Inorganic Compounds												
Antimony	NTV		NTV		NTV		4.0 E-4	USEPA 2006	4.0 E-4	USEPA 2006	NTV	
Barium	NTV		NTV		NTV		2.0 E-1	USEPA 2006	2.0 E-1	USEPA 2006	1.4 E-4	USEPA 1997 Table II
Boron	NTV		NTV		NTV		2.0 E-1	USEPA 2006	2.0 E-1	USEPA 2006	5.7 E-3	USEPA 1997
Cadmium	3.8 E-1	OEHHA 2006	3.8 E-1	OEHHA 2006	1.5 E+1	OEHHA 2006	1.0 E-3	USEPA 2006	1.0 E-3	USEPA 2006	5.7 E-6	OEHHA 2006
Copper	NTV		NTV		NTV		4.0 E-2	USEPA 1997	4.0 E-2	USEPA 1997	6.9 E-4	CAPCOA 1992
Fluoride	NTV		NTV		NTV		6.0 E-2	USEPA 2006	6.0 E-2	USEPA 2006	NTV	
Lead	NTV		NTV		NTV		NTV		NTV		NTV	
Mercury	NTV		NTV		NTV		3.0 E-4	CAPCOA 1992	3.0 E-4	CAPCOA 1992	2.6 E-5	OEHHA 2006
Nitrate	NTV		NTV									
Silver	NTV		NTV		NTV		5.0 E-3	USEPA 2006	5.0 E-3	USEPA 2006	NTV	
Thallium	NTV		NTV		NTV		8.0 E-5	USEPA 2006	8.0 E-5	USEPA 2006	NTV	
Zinc	NTV		NTV		NTV		3.0 E-1	USEPA 2006	3.0 E-1	USEPA 2006	1.0 E-2	CAPCOA 1992
VOCs												
1,1,1-Trichloroethane	NTV		NTV		NTV		2.8 E-1	USEPA 2004	2.8 E-1	USEPA 2004	6.3 E-1	USEPA 2004
1,1,2-Trichloro-1,2,2-trifluoroethane	NTV		NTV		NTV		3.0 E+1	USEPA 2006	3.0 E+1	USEPA 2006	8.6 E+0	USEPA 1997
1,1-Dichloroethane	5.7 E-3	OEHHA 2006	5.7 E-3	OEHHA 2006	5.7 E-3	OEHHA 2006	1.0 E-1	USEPA 1997	1.0 E-1	USEPA 1997	1.4 E-1	USEPA 1997
1,1-Dichloroethene	NTV		NTV		NTV		5.0 E-2	USEPA 2006	5.0 E-2	USEPA 2006	2.0 E-2	OEHHA 2006
2-Butanone	NTV		NTV		NTV		6.0 E-1	USEPA 2006	6.0 E-1	USEPA 2006	1.4 E+0	USEPA 2006
Acetone	NTV		NTV		NTV		9.0 E-1	USEPA 2006	9.0 E-1	USEPA 2006	9.0 E-1	USEPA 2006
Benzene	1.0 E-1	OEHHA 2006	1.0 E-1	OEHHA 2006	1.0 E-1	OEHHA 2006	4.0 E-3	USEPA 2006	4.0 E-3	USEPA 2006	8.6 E-3	USEPA 2006
Chloromethane	NTV		NTV		NTV		NTV		NTV		2.6 E-2	USEPA 2006
cis-1,2-Dichloroethene	NTV		NTV		NTV		1.0 E-2	USEPA 2004	1.0 E-2	USEPA 2004	1.0 E-2	USEPA 2004
Ethylbenzene	NTV		NTV		NTV		1.0 E-1	USEPA 2006	1.0 E-1	USEPA 2006	2.9 E-1	USEPA 2006
m,p-Xylene	NTV		NTV		NTV		2.0 E-1	USEPA 2006	2.0 E-1	USEPA 2006	2.9 E-2	USEPA 2006
Methylene chloride	1.4 E-2	OEHHA 2006	1.4 E-2	OEHHA 2006	3.5 E-3	OEHHA 2006	6.0 E-2	USEPA 2006	6.0 E-2	USEPA 2006	1.1 E-1	OEHHA 2006
o-Xylene	NTV		NTV		NTV		2.0 E-1	USEPA 2006	2.0 E-1	USEPA 2006	2.9 E-2	USEPA 2006
p-Isopropyltoluene	NTV		NTV		NTV		NTV		NTV		NTV	
Toluene	NTV		NTV		NTV		8.0 E-2	USEPA 2006	8.0 E-2	USEPA 2006	1.4 E+0	USEPA 2006
Trichloroethene	1.3 E-2	OEHHA 2006	1.3 E-2	OEHHA 2006	7.0 E-3	OEHHA 2006	3.0 E-4	USEPA 2004	3.0 E-4	USEPA 2004	1.7 E-1	OEHHA 2006
SVOCs												
1-Methylnaphthalene	NTV		NTV		NTV		4.0 E-3	value for 2-methylnaphthalene	4.0 E-3		4.0 E-3	
2-Methylnaphthalene	NTV		NTV		NTV		4.0 E-3	USEPA 2006	4.0 E-3		4.0 E-3	route-to-route
Acenaphthene	NTV		NTV		NTV		6.0 E-2	USEPA 2006	6.0 E-2	USEPA 2006	6.0 E-2	USEPA 2006
Acenaphthylene	NTV		NTV		NTV		3.0 E-2	Value for pyrene	3.0 E-2	Value for pyrene	3.0 E-2	Value for pyrene
Anthracene	NTV		NTV		NTV		3.0 E-1	USEPA 2006	3.0 E-1	USEPA 2006	3.0 E-1	USEPA 2006
Benzo(a)anthracene	1.2 E+0	OEHHA 2006	1.2 E+0	OEHHA 2006	3.9 E-1	OEHHA 2006 TEF	NTV		NTV		NTV	
Benzo(a)pyrene	1.2 E+1	OEHHA 2006	1.2 E+1	OEHHA 2006	3.9 E+0	OEHHA 2006	NTV		NTV		NTV	
Benzo(e)pyrene	NTV		NTV		NTV		NTV		NTV		NTV	
Benzo(b)fluoranthene	1.2 E+0	OEHHA 2006	1.2 E+0	OEHHA 2006	3.9 E-1	OEHHA 2006 TEF	NTV		NTV		NTV	
Benzo(g,h,i)perylene	NTV		NTV		NTV		NTV		NTV		NTV	
Benzo(k)fluoranthene	1.2 E+0	OEHHA 2006	1.2 E+0	OEHHA 2006	3.9 E-1	OEHHA 2006 TEF	NTV		NTV		NTV	
Chrysene	1.2 E-1	OEHHA 2006	1.2 E-1	OEHHA 2006	3.9 E-2	OEHHA 2006 TEF	NTV		NTV		NTV	
Dibenz(a,h)anthracene	4.1 E+0	OEHHA 2006	4.1 E+0	OEHHA 2006	4.1 E+0	OEHHA 2006	NTV		NTV		NTV	
Fluoranthene	NTV		NTV		NTV		4.0 E-2	USEPA 2006	4.0 E-2	USEPA 2006	4.0 E-2	USEPA 2006
Fluorene	NTV		NTV		NTV		4.0 E-2	USEPA 2006	4.0 E-2	USEPA 2006	4.0 E-2	USEPA 2006
Indeno(1,2,3-cd)pyrene	1.2 E+0	OEHHA 2006	1.2 E+0	OEHHA 2006	3.9 E-1	OEHHA 2006 TEF	NTV		NTV		NTV	
Naphthalene	NTV		NTV		1.2 E-1	OEHHA 2006	2.0 E-2	USEPA 2006	2.0 E-2	USEPA 2006	8.6 E-4	USEPA 2006
Perylene	NTV		NTV		NTV		NTV		NTV		NTV	
Phenanthrene	NTV		NTV		NTV		3.0 E-2	Value for pyrene	3.0 E-2	Value for pyrene	3.0 E-2	Value for pyrene
Pyrene	NTV		NTV		NTV		3.0 E-2	USEPA 2006	3.0 E-2	USEPA 2006	3.0 E-2	USEPA 2006

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	Oral CSF [1/(mg/kg-day)]		Dermal CSF [1/(mg/kg-day)]		Inhalation CSF [1/(mg/kg-day)]		Oral Reference Dose (mg/kg-day)		Dermal Reference Dose (mg/kg-day)		Inhalation Reference Dose (mg/kg-day)	
Compound	Value	Source	Value	Source	Value	Source	Value	Source	Value	Source	Value	Source
Total Petroleum Hydrocarbons												
C08-C11(Gasoline Range)	NTV		NTV		NTV		NTV		NTV		NTV	
C11-C14(Kerosene Range)	NTV		NTV		NTV		NTV		NTV		NTV	
C14-C20(Diesel Range)	NTV		NTV		NTV		NTV		NTV		NTV	
C20-C30(Lubricant Oil Range)	NTV		NTV		NTV		NTV		NTV		NTV	
Dioxins												
2,3,7,8-TCDD	1.3 E+5	OEHHA 2006	1.3 E+5	OEHHA 2006	1.3 E+5	OEHHA 2006	NTV		NTV		NTV	
1,2,3,7,8-PeCDD	1.3 E+5	TCDD x WHO 2005 TEF (1.0)	1.3 E+5	TCDD x WHO 2005 TEF (1.0)	1.3 E+5	TCDD x WHO 2005 TEF (1.0)	NTV		NTV		NTV	
1,2,3,4,7,8-HxCDD	1.3 E+4	TCDD x WHO 2005 TEF (0.1)	1.3 E+4	TCDD x WHO 2005 TEF (0.1)	1.3 E+4	TCDD x WHO 2005 TEF (0.1)	NTV		NTV		NTV	
1,2,3,6,7,8-HxCDD	1.3 E+4	TCDD x WHO 2005 TEF (0.1)	1.3 E+4	TCDD x WHO 2005 TEF (0.1)	1.3 E+4	TCDD x WHO 2005 TEF (0.1)	NTV		NTV		NTV	
1,2,3,7,8,9-HxCDD	1.3 E+4	TCDD x WHO 2005 TEF (0.1)	1.3 E+4	TCDD x WHO 2005 TEF (0.1)	1.3 E+4	TCDD x WHO 2005 TEF (0.1)	NTV		NTV		NTV	
1,2,3,4,6,7,8-HpCDD	1.3 E+3	TCDD x WHO 2005 TEF (0.01)	1.3 E+3	TCDD x WHO 2005 TEF (0.01)	1.3 E+3	TCDD x WHO 2005 TEF (0.01)	NTV		NTV		NTV	
OCDD	3.9 E+1	TCDD x WHO 2005 TEF (0.0003)	3.9 E+1	TCDD x WHO 2005 TEF (0.0003)	3.9 E+1	TCDD x WHO 2005 TEF (0.0003)	NTV		NTV		NTV	
2,3,7,8-TCDF	1.3 E+4	TCDD x WHO 2005 TEF (0.1)	1.3 E+4	TCDD x WHO 2005 TEF (0.1)	1.3 E+4	TCDD x WHO 2005 TEF (0.1)	NTV		NTV		NTV	
1,2,3,7,8-PeCDF	3.9 E+3	TCDD x WHO 2005 TEF (0.03)	3.9 E+3	TCDD x WHO 2005 TEF (0.03)	3.9 E+3	TCDD x WHO 2005 TEF (0.03)	NTV		NTV		NTV	
2,3,4,7,8-PeCDF	3.9 E+4	TCDD x WHO 2005 TEF (0.3)	3.9 E+4	TCDD x WHO 2005 TEF (0.3)	3.9 E+4	TCDD x WHO 2005 TEF (0.3)	NTV		NTV		NTV	
1,2,3,4,7,8-HxCDF	1.3 E+4	TCDD x WHO 2005 TEF (0.1)	1.3 E+4	TCDD x WHO 2005 TEF (0.1)	1.3 E+4	TCDD x WHO 2005 TEF (0.1)	NTV		NTV		NTV	
1,2,3,6,7,8-HxCDF	1.3 E+4	TCDD x WHO 2005 TEF (0.1)	1.3 E+4	TCDD x WHO 2005 TEF (0.1)	1.3 E+4	TCDD x WHO 2005 TEF (0.1)	NTV		NTV		NTV	
2,3,4,6,7,8-HxCDF	1.3 E+4	TCDD x WHO 2005 TEF (0.1)	1.3 E+4	TCDD x WHO 2005 TEF (0.1)	1.3 E+4	TCDD x WHO 2005 TEF (0.1)	NTV		NTV		NTV	
1,2,3,7,8,9-HxCDF	1.3 E+4	TCDD x WHO 2005 TEF (0.1)	1.3 E+4	TCDD x WHO 2005 TEF (0.1)	1.3 E+4	TCDD x WHO 2005 TEF (0.1)	NTV		NTV		NTV	
1,2,3,4,6,7,8-HpCDF	1.3 E+3	TCDD x WHO 2005 TEF (0.01)	1.3 E+3	TCDD x WHO 2005 TEF (0.01)	1.3 E+3	TCDD x WHO 2005 TEF (0.01)	NTV		NTV		NTV	
1,2,3,4,7,8,9-HpCDF	1.3 E+3	TCDD x WHO 2005 TEF (0.01)	1.3 E+3	TCDD x WHO 2005 TEF (0.01)	1.3 E+3	TCDD x WHO 2005 TEF (0.01)	NTV		NTV		NTV	
PCBs												
Aroclor-1016	7.0 E-2	USEPA 2006	7.0 E-2	USEPA 2006	7.0 E-2	USEPA 2006	7.0 E-5	USEPA 2006	7.0 E-5	USEPA 2006	7.0 E-5	route-to-route
Aroclor-1221	2.0 E+0	USEPA 2006	2.0 E+0	USEPA 2006	2.0 E+0	USEPA 2006	NTV		NTV		NTV	
Aroclor-1232	2.0 E+0	USEPA 2006	2.0 E+0	USEPA 2006	2.0 E+0	USEPA 2006	NTV		NTV		NTV	
Aroclor-1242	2.0 E+0	USEPA 2006	2.0 E+0	USEPA 2006	2.0 E+0	USEPA 2006	NTV		NTV		NTV	
Aroclor-1248	2.0 E+0	USEPA 2006	2.0 E+0	USEPA 2006	2.0 E+0	USEPA 2006	NTV		NTV		NTV	
Aroclor-1254	2.0 E+0	USEPA 2006	2.0 E+0	USEPA 2006	2.0 E+0	USEPA 2006	2.0 E-5	USEPA 2006	2.0 E-5	USEPA 2006	2.0 E-5	USEPA 2006
Aroclor-1260	2.0 E+0	USEPA 2006	2.0 E+0	USEPA 2006	2.0 E+0	USEPA 2006	NTV		NTV		NTV	
PCB-105	1.3 E+1	TCDD x WHO 2005 TEF (0.00003)	1.3 E+1	TCDD x WHO 2005 TEF (0.00003)	1.3 E+1	TCDD x WHO 2005 TEF (0.00003)	NTV		NTV		NTV	
PCB-114	6.5 E+1	TCDD x WHO 2005 TEF (0.00003)	6.5 E+1	TCDD x WHO 2005 TEF (0.00003)	6.5 E+1	TCDD x WHO 2005 TEF (0.00003)	NTV		NTV		NTV	
PCB-118	1.3 E+1	TCDD x WHO 2005 TEF (0.00003)	1.3 E+1	TCDD x WHO 2005 TEF (0.00003)	1.3 E+1	TCDD x WHO 2005 TEF (0.00003)	NTV		NTV		NTV	
PCB-123	1.3 E+1	TCDD x WHO 2005 TEF (0.00003)	1.3 E+1	TCDD x WHO 2005 TEF (0.00003)	1.3 E+1	TCDD x WHO 2005 TEF (0.00003)	NTV		NTV		NTV	
PCB-126	1.3 E+4	TCDD x WHO 2005 TEF (0.1)	1.3 E+4	TCDD x WHO 2005 TEF (0.1)	1.3 E+4	TCDD x WHO 2005 TEF (0.1)	NTV		NTV		NTV	
PCB-156	6.5 E+1	TCDD x WHO 2005 TEF (0.00003)	6.5 E+1	TCDD x WHO 2005 TEF (0.00003)	6.5 E+1	TCDD x WHO 2005 TEF (0.00003)	NTV		NTV		NTV	

Toxicity Criteria
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	Oral CSF [1/(mg/kg-day)]		Dermal CSF [1/(mg/kg-day)]		Inhalation CSF [1/(mg/kg-day)]		Oral Reference Dose (mg/kg-day)		Dermal Reference Dose (mg/kg-day)		Inhalation Reference Dose (mg/kg-day)	
Compound	Value	Source	Value	Source	Value	Source	Value	Source	Value	Source	Value	Source
PCB-157	6.5 E+1	TCDD x WHO 2005 TEF (0.00003)	6.5 E+1	TCDD x WHO 2005 TEF (0.00003)	6.5 E+1	TCDD x WHO 2005 TEF (0.00003)	NTV		NTV		NTV	
PCB-167	1.3 E+0	TCDD x WHO 2005 TEF (0.00003)	1.3 E+0	TCDD x WHO 2005 TEF (0.00003)	1.3 E+0	TCDD x WHO 2005 TEF (0.00003)	NTV		NTV		NTV	
PCB-169	1.3 E+3	TCDD x WHO 2005 TEF (0.03)	1.3 E+3	TCDD x WHO 2005 TEF (0.03)	1.3 E+3	TCDD x WHO 2005 TEF (0.03)	NTV		NTV		NTV	
PCB-189	1.3 E+1	TCDD x WHO 2005 TEF (0.00003)	1.3 E+1	TCDD x WHO 2005 TEF (0.00003)	1.3 E+1	TCDD x WHO 2005 TEF (0.00003)	NTV		NTV		NTV	
PCB-77	1.3 E+1	TCDD x WHO 2005 TEF (0.0001)	1.3 E+1	TCDD x WHO 2005 TEF (0.0001)	1.3 E+1	TCDD x WHO 2005 TEF (0.0001)	NTV		NTV		NTV	
PCB-81	1.3 E+1	TCDD x WHO 2005 TEF (0.0003)	1.3 E+1	TCDD x WHO 2005 TEF (0.0003)	1.3 E+1	TCDD x WHO 2005 TEF (0.0003)	NTV		NTV		NTV	

Notes:
NTV = No toxicity value
TEF = Toxic equivalency factor
PCB - polychlorinated biphenyls
VOC - volatile organic compound
SVOC - semi-volatile organic compound
RfD = reference dose
CSF = cancer slope factor

Table C2-5 (1 of 4)

Total Risk Estimates for the Adult Worker
Old Conservation Yard RFI Site

Central Tendency Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation of Indoor Air_s		Inhalation Ambient Air_s		Inhalation of Indoor Air_{gw}		Inhalation Ambient Air_{gw}		Cumulative Risk		Soil Media Risk		Groundwater Risk	
	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)
Inorganic Compounds																				
Antimony	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Barium	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Boron	9.2E-06	-	9.2E-08	-	1.4E-08	-	-	-	-	-	-	-	-	-	9.3E-06	-	9.3E-06	-	-	-
Cadmium	2.2E-04	1E-08	2.2E-07	1E-11	1.7E-06	2E-11	-	-	-	-	-	-	-	-	2.2E-04	1E-08	2.2E-04	1E-08	-	-
Copper	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Lead	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Mercury	7.2E-04	-	7.2E-06	-	3.6E-07	-	-	-	-	-	-	-	-	-	7.3E-04	-	7.3E-04	-	-	-
Nitrate	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Silver	7.4E-05	-	7.4E-07	-	-	-	-	-	-	-	-	-	-	-	7.4E-05	-	7.4E-05	-	-	-
Thallium	4.6E-03	-	4.6E-05	-	-	-	-	-	-	-	-	-	-	-	4.7E-03	-	4.7E-03	-	-	-
Zinc	9.5E-05	-	9.5E-07	-	1.2E-07	-	-	-	-	-	-	-	-	-	9.6E-05	-	9.6E-05	-	-	-
VOCs																				
1,1,1-Trichloroethane	4.6E-09	-	4.6E-10	-	-	-	1.7E-05	-	9.0E-07	-	-	-	-	-	5.1E-09	-	5.1E-09	-	-	-
1,1,2-Trichloro-1,2,2-trifluoroethane	1.8E-10	-	1.8E-11	-	-	-	2.2E-06	-	1.7E-07	-	-	-	-	-	1.9E-10	-	1.9E-10	-	-	-
1,1-Dichloroethane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
1,1-Dichloroethene	2.7E-08	-	2.7E-09	-	-	-	5.7E-04	-	3.1E-05	-	-	-	-	-	3.0E-08	-	3.0E-08	-	-	-
2-Butanone	1.6E-08	-	1.6E-09	-	-	-	-	-	-	-	-	-	-	-	1.8E-08	-	-	-	-	-
Acetone	1.7E-07	-	1.7E-08	-	-	-	-	-	-	-	-	-	-	-	1.8E-07	-	-	-	-	-
Benzene	1.2E-07	6E-12	1.2E-08	6E-13	-	-	1.1E-03	1E-07	5.1E-05	5E-09	-	-	-	-	1.3E-07	6E-12	-	-	-	-
Carbon disulfide	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Chloromethane	-	-	-	-	-	-	-	-	-	-	1.1E-06	-	2.3E-07	-	1.4E-06	-	-	-	-	-
cis-1,2-Dichloroethene	-	-	-	-	-	-	-	-	-	-	1.3E-06	-	1.4E-07	-	1.4E-06	-	1.4E-06	-	1.4E-06	-
Ethylbenzene	4.9E-09	-	4.9E-10	-	-	-	1.4E-05	-	1.2E-06	-	-	-	-	-	5.3E-09	-	-	-	-	-
m,p-Xylene	6.9E-09	-	6.9E-10	-	-	-	3.1E-04	-	2.7E-05	-	-	-	-	-	7.6E-09	-	-	-	-	-
Methylene chloride	2.9E-07	3E-11	2.9E-08	3E-12	-	-	9.2E-05	4E-09	2.2E-04	1E-08	-	-	-	-	3.2E-07	3E-11	-	-	-	-
o-Xylene	1.7E-09	-	1.7E-10	-	-	-	6.9E-05	-	6.1E-06	-	-	-	-	-	1.8E-09	-	-	-	-	-
p-Isopropyltoluene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Toluene	8.3E-09	-	8.3E-10	-	-	-	6.3E-06	-	3.0E-07	-	-	-	-	-	9.1E-09	-	9.1E-09	-	-	-
Trichloroethene	4.3E-06	2E-12	4.3E-07	2E-13	-	-	1.2E-04	2E-08	1.7E-05	2E-09	2.3E-06	3E-10	2.8E-07	4E-11	7.3E-06	4E-10	7.3E-06	4E-10	2.6E-06	4E-10
SVOCs																				
1-Methylnaphthalene	1.3E-06	-	1.7E-07	-	5.5E-11	-	-	-	-	-	-	-	-	-	1.4E-06	-	1.4E-06	-	-	-
2-Methylnaphthalene	1.8E-05	-	2.4E-06	-	7.9E-10	-	-	-	-	-	-	-	-	-	2.1E-05	-	2.1E-05	-	-	-
Acenaphthene	1.2E-06	-	1.6E-07	-	5.2E-11	-	-	-	-	-	-	-	-	-	1.4E-06	-	1.4E-06	-	-	-
Acenaphthylene	5.7E-07	-	7.5E-08	-	2.5E-11	-	-	-	-	-	-	-	-	-	6.5E-07	-	6.5E-07	-	-	-
Anthracene	1.7E-07	-	2.2E-08	-	7.3E-12	-	-	-	-	-	-	-	-	-	1.9E-07	-	1.9E-07	-	-	-
Benzo(a)anthracene	-	2E-09	-	3E-09	-	3E-14	-	-	-	-	-	-	-	-	-	5E-09	-	5E-09	-	-
Benzo(a)pyrene	-	2E-08	-	2E-08	-	3E-13	-	-	-	-	-	-	-	-	-	5E-08	-	5E-08	-	-
Benzo(e)pyrene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Benzo(b)fluoranthene	-	3E-09	-	3E-09	-	4E-14	-	-	-	-	-	-	-	-	-	6E-09	-	6E-09	-	-
Benzo(g,h,i)perylene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Benzo(k)fluoranthene	-	2E-09	-	2E-09	-	3E-14	-	-	-	-	-	-	-	-	-	5E-09	-	5E-09	-	-
Chrysene	-	4E-10	-	4E-10	-	5E-15	-	-	-	-	-	-	-	-	-	8E-10	-	8E-10	-	-
Dibenz(a,h)anthracene	-	5E-09	-	6E-09	-	2E-13	-	-	-	-	-	-	-	-	-	1E-08	-	1E-08	-	-
Fluoranthene	9.7E-07	-	1.3E-07	-	4.2E-11	-	-	-	-	-	-	-	-	-	1.1E-06	-	1.1E-06	-	-	-
Fluorene	1.8E-06	-	2.3E-07	-	7.8E-11	-	-	-	-	-	-	-	-	-	2.0E-06	-	2.0E-06	-	-	-
Indeno(1,2,3-cd)pyrene	-	2E-09	-	2E-09	-	3E-14	-	-	-	-	-	-	-	-	-	4E-09	-	4E-09	-	-
Naphthalene	1.3E-06	-	1.7E-07	-	1.4E-09	2E-14	-	-	-	-	-	-	-	-	1.5E-06	2E-14	1.5E-06	2E-14	-	-
Perylene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Phenanthrene	6.3E-06	-	8.2E-07	-	2.7E-10	-	-	-	-	-	-	-	-	-	7.1E-06	-	7.1E-06	-	-	-
Pyrene	1.3E-06	-	1.7E-07	-	5.5E-11	-	-	-	-	-	-	-	-	-	1.4E-06	-	1.4E-06	-	-	-
Total Petroleum Hydrocarbons																				
C08-C11(Gasoline Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
C11-C14(Kerosene Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
C14-C20(Diesel Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
C20-C30(Lubricant Oil Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

Table C2-5 (2 of 4)

Total Risk Estimates for the Adult Worker
Old Conservation Yard RFI Site

Central Tendency Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation of Indoor Air$_{s-gw}$		Inhalation Ambient Air$_{s-gw}$		Inhalation of Indoor Air$_{s-gw}$		Inhalation Ambient Air$_{s-gw}$		Cumulative Risk		Soil Media Risk		Groundwater Risk	
	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)
Dioxins																				
2,3,7,8-TCDD	-	7E-09	-	2E-10	-	3E-13	-	-	-	-	-	-	-	-	-	7E-09	-	7E-09	-	-
1,2,3,7,8-PeCDD	-	4E-08	-	1E-09	-	2E-12	-	-	-	-	-	-	-	-	-	5E-08	-	5E-08	-	-
1,2,3,4,7,8-HxCDD	-	1E-08	-	3E-10	-	4E-13	-	-	-	-	-	-	-	-	-	1E-08	-	1E-08	-	-
1,2,3,6,7,8-HxCDD	-	1E-08	-	4E-10	-	6E-13	-	-	-	-	-	-	-	-	-	1E-08	-	1E-08	-	-
1,2,3,7,8,9-HxCDD	-	1E-08	-	4E-10	-	5E-13	-	-	-	-	-	-	-	-	-	1E-08	-	1E-08	-	-
1,2,3,4,6,7,8-HpCDD	-	3E-08	-	1E-09	-	1E-12	-	-	-	-	-	-	-	-	-	3E-08	-	3E-08	-	-
OCDD	-	7E-09	-	2E-10	-	3E-13	-	-	-	-	-	-	-	-	-	8E-09	-	8E-09	-	-
2,3,7,8-TCDF	-	1E-09	-	4E-11	-	6E-14	-	-	-	-	-	-	-	-	-	2E-09	-	2E-09	-	-
1,2,3,7,8-PeCDF	-	4E-10	-	1E-11	-	2E-14	-	-	-	-	-	-	-	-	-	4E-10	-	4E-10	-	-
2,3,4,7,8-PeCDF	-	1E-08	-	3E-10	-	4E-13	-	-	-	-	-	-	-	-	-	1E-08	-	1E-08	-	-
1,2,3,4,7,8-HxCDF	-	9E-09	-	3E-10	-	4E-13	-	-	-	-	-	-	-	-	-	9E-09	-	9E-09	-	-
1,2,3,6,7,8-HxCDF	-	3E-09	-	1E-10	-	1E-13	-	-	-	-	-	-	-	-	-	3E-09	-	3E-09	-	-
2,3,4,6,7,8-HxCDF	-	3E-09	-	1E-10	-	2E-13	-	-	-	-	-	-	-	-	-	4E-09	-	4E-09	-	-
1,2,3,7,8,9-HxCDF	-	2E-09	-	5E-11	-	7E-14	-	-	-	-	-	-	-	-	-	2E-09	-	2E-09	-	-
1,2,3,4,6,7,8-HpCDF	-	4E-09	-	1E-10	-	2E-13	-	-	-	-	-	-	-	-	-	4E-09	-	4E-09	-	-
1,2,3,4,7,8,9-HpCDF	-	5E-10	-	1E-11	-	2E-14	-	-	-	-	-	-	-	-	-	5E-10	-	5E-10	-	-
OCDF	-	4E-10	-	1E-11	-	2E-14	-	-	-	-	-	-	-	-	-	4E-10	-	4E-10	-	-
PCBs																				
Aroclor-1248	-	5E-05	-	7E-06	-	2E-09	-	-	-	-	-	-	-	-	-	6E-05	-	6E-05	-	-
Aroclor-1254	2.6E-02	1E-07	3.7E-03	2E-08	1.1E-06	5E-12	-	-	-	-	-	-	-	-	3.0E-02	1E-07	3.0E-02	1E-07	-	-
Aroclor-1260	-	1E-06	-	2E-07	-	6E-11	-	-	-	-	-	-	-	-	-	2E-06	-	2E-06	-	-
PCB-105	-	2E-10	-	3E-11	-	1E-14	-	-	-	-	-	-	-	-	-	3E-10	-	3E-10	-	-
PCB-114	-	4E-12	-	6E-13	-	2E-16	-	-	-	-	-	-	-	-	-	5E-12	-	5E-12	-	-
PCB-118	-	4E-10	-	6E-11	-	2E-14	-	-	-	-	-	-	-	-	-	5E-10	-	5E-10	-	-
PCB-123	-	6E-12	-	9E-13	-	3E-16	-	-	-	-	-	-	-	-	-	7E-12	-	7E-12	-	-
PCB-126	-	6E-08	-	8E-09	-	2E-12	-	-	-	-	-	-	-	-	-	7E-08	-	7E-08	-	-
PCB-156	-	1E-10	-	2E-11	-	6E-15	-	-	-	-	-	-	-	-	-	2E-10	-	2E-10	-	-
PCB-157	-	7E-11	-	9E-12	-	3E-15	-	-	-	-	-	-	-	-	-	7E-11	-	7E-11	-	-
PCB-167	-	1E-10	-	2E-11	-	5E-15	-	-	-	-	-	-	-	-	-	1E-10	-	1E-10	-	-
PCB-169	-	2E-09	-	2E-10	-	7E-14	-	-	-	-	-	-	-	-	-	2E-09	-	2E-09	-	-
PCB-189	-	2E-11	-	2E-12	-	7E-16	-	-	-	-	-	-	-	-	-	2E-11	-	2E-11	-	-
PCB-77	-	1E-10	-	2E-11	-	5E-15	-	-	-	-	-	-	-	-	-	1E-10	-	1E-10	-	-
PCB-81	-	6E-11	-	9E-12	-	3E-15	-	-	-	-	-	-	-	-	-	7E-11	-	7E-11	-	-
Total PCB Congeners	-	6E-08	-	8E-09	-	3E-12	-	-	-	-	-	-	-	-	-	7E-08	-	7E-08	-	-
Cumulative Risk	3.2E-02	5E-05	3.7E-03	7E-06	3.3E-06	2E-09	2.3E-03	1E-07	3.5E-04	2E-08	4.7E-06	3E-10	6.6E-07	4E-11	3.6E-02	6E-05	3.6E-02	6E-05	4.0E-06	4E-10

Table C2-5 (3 of 4)

Total Risk Estimates for the Adult Worker
Old Conservation Yard RFI Site

Reasonable Maximum Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation of Indoor Air_s		Inhalation Ambient Air_s		Inhalation of Indoor Air_{gw}		Inhalation Ambient Air_{gw}		Cumulative Risk		Soil Media Risk		Near-Surface Groundwater Ri	
	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)
Inorganic Compounds																				
Antimony	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Barium	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Boron	5.1E-05	-	1.3E-06	-	4.5E-08	-	-	-	-	-	-	-	-	-	5.3E-05	-	5.3E-05	-	-	-
Cadmium	1.9E-03	2E-07	4.9E-06	6E-10	8.5E-06	2E-10	-	-	-	-	-	-	-	-	2.0E-03	2E-07	2.0E-03	2E-07	-	-
Copper	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Lead	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Mercury	2.1E-02	-	5.3E-04	-	6.2E-06	-	-	-	-	-	-	-	-	-	2.2E-02	-	2.2E-02	-	-	-
Nitrate	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Silver	7.0E-04	-	1.7E-05	-	-	-	-	-	-	-	-	-	-	-	7.1E-04	-	7.1E-04	-	-	-
Thallium	4.2E-02	-	1.0E-03	-	-	-	-	-	-	-	-	-	-	-	4.3E-02	-	4.3E-02	-	-	-
Zinc	4.8E-04	-	1.2E-05	-	3.6E-07	-	-	-	-	-	-	-	-	-	4.9E-04	-	4.9E-04	-	-	-
VOCs																				
1,1,1-Trichloroethane	3.8E-08	-	9.6E-09	-	-	-	5.7E-05	-	2.4E-06	-	-	-	-	-	4.8E-08	-	4.8E-08	-	-	-
1,1,2-Trichloro-1,2,2-trifluoroethane	1.3E-09	-	3.3E-10	-	-	-	1.1E-05	-	4.6E-07	-	-	-	-	-	1.7E-09	-	1.7E-09	-	-	-
1,1-Dichloroethane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
1,1-Dichloroethene	2.2E-07	-	5.4E-08	-	-	-	1.8E-03	-	8.2E-05	-	-	-	-	-	2.7E-07	-	2.7E-07	-	-	-
2-Butanone	3.6E-08	-	9.0E-09	-	-	-	-	-	-	-	-	-	-	-	4.5E-08	-	-	-	-	-
Acetone	7.6E-06	-	1.9E-06	-	-	-	-	-	-	-	-	-	-	-	9.6E-06	-	-	-	-	-
Benzene	1.2E-06	2E-10	3.0E-07	4E-11	-	-	3.0E-03	9E-07	1.3E-04	4E-08	-	-	-	-	1.5E-06	2E-10	-	-	-	-
Carbon disulfide	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Chloromethane	-	-	-	-	-	-	-	-	-	-	3.0E-06	-	6.0E-07	-	3.6E-06	-	-	-	-	-
cis-1,2-Dichloroethene	-	-	-	-	-	-	-	-	-	-	3.4E-06	-	3.8E-07	-	3.8E-06	-	3.8E-06	-	3.8E-06	-
Ethylbenzene	4.8E-08	-	1.2E-08	-	-	-	7.5E-05	-	3.0E-06	-	-	-	-	-	6.1E-08	-	-	-	-	-
m,p-Xylene	7.1E-08	-	1.8E-08	-	-	-	1.6E-03	-	7.0E-05	-	-	-	-	-	8.8E-08	-	-	-	-	-
Methylene chloride	8.0E-06	2E-09	2.0E-06	6E-10	-	-	1.2E-02	2E-06	5.7E-04	8E-08	-	-	-	-	1.0E-05	3E-09	-	-	-	-
o-Xylene	1.7E-08	-	4.2E-09	-	-	-	3.6E-04	-	1.6E-05	-	-	-	-	-	2.1E-08	-	-	-	-	-
p-Isopropyltoluene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Toluene	8.7E-08	-	2.2E-08	-	-	-	1.8E-05	-	8.0E-07	-	-	-	-	-	1.1E-07	-	1.1E-07	-	-	-
Trichloroethene	3.6E-05	5E-11	9.0E-06	1E-11	-	-	1.1E-03	4E-07	4.4E-05	2E-08	6.1E-06	2E-09	7.5E-07	3E-10	5.2E-05	3E-09	5.2E-05	3E-09	6.8E-06	3E-09
SVOCs																				
1-Methylnaphthalene	6.5E-06	-	2.1E-06	-	1.6E-10	-	-	-	-	-	-	-	-	-	8.6E-06	-	8.6E-06	-	-	-
2-Methylnaphthalene	2.7E-04	-	8.9E-05	-	6.8E-09	-	-	-	-	-	-	-	-	-	3.6E-04	-	3.6E-04	-	-	-
Acenaphthene	2.3E-05	-	7.4E-06	-	5.7E-10	-	-	-	-	-	-	-	-	-	3.0E-05	-	3.0E-05	-	-	-
Acenaphthylene	9.3E-06	-	3.0E-06	-	2.3E-10	-	-	-	-	-	-	-	-	-	1.2E-05	-	1.2E-05	-	-	-
Anthracene	3.1E-06	-	9.9E-07	-	7.6E-11	-	-	-	-	-	-	-	-	-	4.0E-06	-	4.0E-06	-	-	-
Benzo(a)anthracene	-	1E-07	-	5E-08	-	1E-12	-	-	-	-	-	-	-	-	-	2E-07	-	2E-07	-	-
Benzo(a)pyrene	-	1E-06	-	4E-07	-	1E-11	-	-	-	-	-	-	-	-	-	2E-06	-	2E-06	-	-
Benzo(e)pyrene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Benzo(b)fluoranthene	-	2E-07	-	5E-08	-	1E-12	-	-	-	-	-	-	-	-	-	2E-07	-	2E-07	-	-
Benzo(g,h,i)perylene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Benzo(k)fluoranthene	-	1E-07	-	4E-08	-	1E-12	-	-	-	-	-	-	-	-	-	2E-07	-	2E-07	-	-
Chrysene	-	2E-08	-	6E-09	-	2E-13	-	-	-	-	-	-	-	-	-	2E-08	-	2E-08	-	-
Dibenz(a,h)anthracene	-	3E-07	-	9E-08	-	7E-12	-	-	-	-	-	-	-	-	-	4E-07	-	4E-07	-	-
Fluoranthene	2.1E-05	-	6.9E-06	-	5.3E-10	-	-	-	-	-	-	-	-	-	2.8E-05	-	2.8E-05	-	-	-
Fluorene	3.4E-05	-	1.1E-05	-	8.5E-10	-	-	-	-	-	-	-	-	-	4.5E-05	-	4.5E-05	-	-	-
Indeno(1,2,3-cd)pyrene	-	1E-07	-	4E-08	-	1E-12	-	-	-	-	-	-	-	-	-	2E-07	-	2E-07	-	-
Naphthalene	1.5E-05	-	5.0E-06	-	8.9E-09	3E-13	-	-	-	-	-	-	-	-	2.0E-05	3E-13	2.0E-05	3E-13	-	-
Perylene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Phenanthrene	1.2E-04	-	3.9E-05	-	3.0E-09	-	-	-	-	-	-	-	-	-	1.6E-04	-	1.6E-04	-	-	-
Pyrene	2.4E-05	-	7.9E-06	-	6.0E-10	-	-	-	-	-	-	-	-	-	3.2E-05	-	3.2E-05	-	-	-
Total Petroleum Hydrocarbons																				
C08-C11(Gasoline Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
C11-C14(Kerosene Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
C14-C20(Diesel Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
C20-C30(Lubricant Oil Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

Table C2-5 (4 of 4)

Total Risk Estimates for the Adult Worker
Old Conservation Yard RFI Site

Reasonable Maximum Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation of Indoor Air$_{s-gw}$		Inhalation Ambient Air$_{s-gw}$		Inhalation of Indoor Air$_{s-gw}$		Inhalation Ambient Air$_{s-gw}$		Cumulative Risk		Soil Media Risk		Near-Surface Groundwater Ri	
	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)
Dioxins																				
2,3,7,8-TCDD	-	1E-07	-	1E-08	-	4E-12	-	-	-	-	-	-	-	-	-	2E-07	-	2E-07	-	-
1,2,3,7,8-PeCDD	-	4E-06	-	3E-07	-	1E-10	-	-	-	-	-	-	-	-	-	5E-06	-	5E-06	-	-
1,2,3,4,7,8-HxCDD	-	4E-07	-	3E-08	-	1E-11	-	-	-	-	-	-	-	-	-	5E-07	-	5E-07	-	-
1,2,3,6,7,8-HxCDD	-	9E-07	-	7E-08	-	2E-11	-	-	-	-	-	-	-	-	-	9E-07	-	9E-07	-	-
1,2,3,7,8,9-HxCDD	-	7E-07	-	5E-08	-	2E-11	-	-	-	-	-	-	-	-	-	8E-07	-	8E-07	-	-
1,2,3,4,6,7,8-HpCDD	-	2E-06	-	2E-07	-	6E-11	-	-	-	-	-	-	-	-	-	3E-06	-	3E-06	-	-
OCDD	-	2E-07	-	2E-08	-	5E-12	-	-	-	-	-	-	-	-	-	2E-07	-	2E-07	-	-
2,3,7,8-TCDF	-	8E-08	-	6E-09	-	2E-12	-	-	-	-	-	-	-	-	-	9E-08	-	9E-08	-	-
1,2,3,7,8-PeCDF	-	2E-08	-	2E-09	-	6E-13	-	-	-	-	-	-	-	-	-	3E-08	-	3E-08	-	-
2,3,4,7,8-PeCDF	-	8E-07	-	6E-08	-	2E-11	-	-	-	-	-	-	-	-	-	8E-07	-	8E-07	-	-
1,2,3,4,7,8-HxCDF	-	5E-07	-	4E-08	-	1E-11	-	-	-	-	-	-	-	-	-	6E-07	-	6E-07	-	-
1,2,3,6,7,8-HxCDF	-	8E-08	-	6E-09	-	2E-12	-	-	-	-	-	-	-	-	-	9E-08	-	9E-08	-	-
2,3,4,6,7,8-HxCDF	-	2E-07	-	2E-08	-	6E-12	-	-	-	-	-	-	-	-	-	3E-07	-	3E-07	-	-
1,2,3,7,8,9-HxCDF	-	9E-08	-	6E-09	-	2E-12	-	-	-	-	-	-	-	-	-	9E-08	-	9E-08	-	-
1,2,3,4,6,7,8-HpCDF	-	1E-07	-	7E-09	-	2E-12	-	-	-	-	-	-	-	-	-	1E-07	-	1E-07	-	-
1,2,3,4,7,8,9-HpCDF	-	3E-08	-	2E-09	-	6E-13	-	-	-	-	-	-	-	-	-	3E-08	-	3E-08	-	-
OCDF	-	1E-08	-	8E-10	-	3E-13	-	-	-	-	-	-	-	-	-	1E-08	-	1E-08	-	-
PCBs																				
Aroclor-1248	-	7E-03	-	3E-03	-	2E-07	-	-	-	-	-	-	-	-	-	1E-02	-	1E-02	-	-
Aroclor-1254	5.3E-01	7E-06	1.8E-01	2E-06	1.3E-05	2E-10	-	-	-	-	-	-	-	-	7.1E-01	1E-05	7.1E-01	1E-05	-	-
Aroclor-1260	-	2E-04	-	7E-05	-	5E-09	-	-	-	-	-	-	-	-	-	3E-04	-	3E-04	-	-
PCB-105	-	3E-08	-	1E-08	-	8E-13	-	-	-	-	-	-	-	-	-	4E-08	-	4E-08	-	-
PCB-114	-	5E-10	-	2E-10	-	1E-14	-	-	-	-	-	-	-	-	-	7E-10	-	7E-10	-	-
PCB-118	-	6E-08	-	2E-08	-	2E-12	-	-	-	-	-	-	-	-	-	8E-08	-	8E-08	-	-
PCB-123	-	8E-10	-	3E-10	-	2E-14	-	-	-	-	-	-	-	-	-	1E-09	-	1E-09	-	-
PCB-126	-	8E-06	-	3E-06	-	2E-10	-	-	-	-	-	-	-	-	-	1E-05	-	1E-05	-	-
PCB-156	-	2E-08	-	7E-09	-	5E-13	-	-	-	-	-	-	-	-	-	3E-08	-	3E-08	-	-
PCB-157	-	9E-09	-	3E-09	-	2E-13	-	-	-	-	-	-	-	-	-	1E-08	-	1E-08	-	-
PCB-167	-	2E-08	-	5E-09	-	4E-13	-	-	-	-	-	-	-	-	-	2E-08	-	2E-08	-	-
PCB-169	-	2E-07	-	8E-08	-	6E-12	-	-	-	-	-	-	-	-	-	3E-07	-	3E-07	-	-
PCB-189	-	2E-09	-	8E-10	-	6E-14	-	-	-	-	-	-	-	-	-	3E-09	-	3E-09	-	-
PCB-77	-	2E-08	-	5E-09	-	4E-13	-	-	-	-	-	-	-	-	-	2E-08	-	2E-08	-	-
PCB-81	-	8E-09	-	3E-09	-	2E-13	-	-	-	-	-	-	-	-	-	1E-08	-	1E-08	-	-
Total PCB Congeners	-	8E-06	-	3E-06	-	2E-10	-	-	-	-	-	-	-	-	-	1E-05	-	1E-05	-	-
Cumulative Risk	5.9E-01	7E-03	1.9E-01	3E-03	2.8E-05	2E-07	2.0E-02	3E-06	9.3E-04	1E-07	1.2E-05	2E-09	1.7E-06	3E-10	7.8E-01	1E-02	7.8E-01	1E-02	1.1E-05	3E-09

Notes:
Inhalation Indoor Air $_{s-gw}$ - Exposure associated with indoor air concentrations of COPCs modeled from soil vapor, soil, or groundwater.
Inhalation Ambient Air $_{s-gw}$ - Exposure associated with ambient air concentrations of COPCs modeled from soil or groundwater.
HQ - hazard quotient
HI - hazard index
Risk - incremental increased lifetime cancer risk
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyls
COPC - chemical of potential concern
"-" indicates that either adequate toxicity data were not available for a chemical or the exposure pathway was not applicable to that chemical.
HIs and cancer risks for PCB congeners. These results not included in cumulative risk estimates.

Table C2-6 (1 of 4)

Total Risk Estimates for the Adult Recreator
Old Conservation Yard RFI Site

Central Tendency Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation Ambient Air_s		Inhalation Ambient Air_{gw}		Cumulative Risk		Soil Media Risk		Groundwater Risk	
	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)
Inorganic Compounds																
Antimony	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Barium	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Boron	1.1E-06	-	1.2E-08	-	1.6E-09	-	-	-	-	-	1.1E-06	-	1.1E-06	-	-	-
Cadmium	2.5E-05	1E-09	2.9E-08	1E-12	1.9E-07	2E-12	-	-	-	-	2.6E-05	1E-09	2.6E-05	1E-09	-	-
Copper	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Lead	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Mercury	8.2E-05	-	9.3E-07	-	4.1E-08	-	-	-	-	-	8.3E-05	-	8.3E-05	-	-	-
Nitrate	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Silver	8.4E-06	-	9.6E-08	-	-	-	-	-	-	-	8.5E-06	-	8.5E-06	-	-	-
Thallium	5.3E-04	-	6.0E-06	-	-	-	-	-	-	-	5.3E-04	-	5.3E-04	-	-	-
Zinc	1.1E-05	-	1.2E-07	-	-	-	-	-	-	-	1.1E-05	-	1.1E-05	-	-	-
VOCs																
1,1,1-Trichloroethane	5.2E-10	-	6.0E-11	-	-	-	1.0E-07	-	-	-	1.0E-07	-	1.0E-07	-	-	-
1,1,2-Trichloro-1,2,2-trifluoroethane	2.0E-11	-	2.3E-12	-	-	-	2.0E-08	-	-	-	2.0E-08	-	2.0E-08	-	-	-
1,1-Dichloroethane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
1,1-Dichloroethene	3.1E-09	-	3.5E-10	-	-	-	3.6E-06	-	-	-	3.6E-06	-	3.6E-06	-	-	-
2-Butanone	1.8E-09	-	2.1E-10	-	-	-	-	-	-	-	2.0E-09	-	2.0E-09	-	-	-
Acetone	1.9E-08	-	2.2E-09	-	-	-	-	-	-	-	2.1E-08	-	2.1E-08	-	-	-
Benzene	1.4E-08	7E-13	1.6E-09	8E-14	-	-	5.8E-06	6E-10	-	-	5.8E-06	6E-10	5.8E-06	6E-10	-	-
Carbon disulfide	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Chloromethane	-	-	-	-	-	-	-	-	2.6E-08	-	2.6E-08	-	-	-	2.6E-08	-
cis-1,2-Dichloroethene	-	-	-	-	-	-	-	-	1.6E-08	-	1.6E-08	-	-	-	1.6E-08	-
Ethylbenzene	5.5E-10	-	6.3E-11	-	-	-	1.3E-07	-	-	-	1.3E-07	-	1.3E-07	-	-	-
m,p-Xylene	7.9E-10	-	9.0E-11	-	-	-	3.0E-06	-	-	-	3.0E-06	-	3.0E-06	-	-	-
Methylene chloride	3.3E-08	3E-12	3.8E-09	4E-13	-	-	2.5E-05	1E-09	-	-	2.5E-05	1E-09	2.5E-05	1E-09	-	-
o-Xylene	1.9E-10	-	2.2E-11	-	-	-	6.9E-07	-	-	-	6.9E-07	-	6.9E-07	-	-	-
p-Isopropyltoluene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Toluene	9.5E-10	-	1.1E-10	-	-	-	3.4E-08	-	-	-	3.6E-08	-	3.6E-08	-	-	-
Trichloroethene	4.9E-07	2E-13	5.6E-08	3E-14	-	-	1.9E-06	3E-10	3.2E-08	5E-12	2.5E-06	3E-10	2.5E-06	3E-10	3.2E-08	5E-12
SVOCs																
1-Methylnaphthalene	1.5E-07	-	2.2E-08	-	6.3E-12	-	-	-	-	-	1.7E-07	-	1.7E-07	-	-	-
2-Methylnaphthalene	2.1E-06	-	3.1E-07	-	9.0E-11	-	-	-	-	-	2.4E-06	-	2.4E-06	-	-	-
Acenaphthene	1.4E-07	-	2.0E-08	-	5.9E-12	-	-	-	-	-	1.6E-07	-	1.6E-07	-	-	-
Acenaphthylene	6.5E-08	-	9.7E-09	-	2.8E-12	-	-	-	-	-	7.5E-08	-	7.5E-08	-	-	-
Anthracene	1.9E-08	-	2.9E-09	-	8.4E-13	-	-	-	-	-	2.2E-08	-	2.2E-08	-	-	-
Benzo(a)anthracene	-	3E-10	-	4E-11	-	4E-15	-	-	-	-	-	3E-10	-	3E-10	-	-
Benzo(a)pyrene	-	3E-09	-	4E-10	-	4E-14	-	-	-	-	-	3E-09	-	3E-09	-	-
Benzo(b)fluoranthene	-	3E-10	-	5E-11	-	4E-15	-	-	-	-	-	4E-10	-	4E-10	-	-
Benzo(g,h,i)perylene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Benzo(k)fluoranthene	-	3E-10	-	4E-11	-	4E-15	-	-	-	-	-	3E-10	-	3E-10	-	-
Chrysene	-	4E-11	-	6E-12	-	6E-16	-	-	-	-	-	5E-11	-	5E-11	-	-
Dibenz(a,h)anthracene	-	6E-10	-	9E-11	-	3E-14	-	-	-	-	-	7E-10	-	7E-10	-	-
Fluoranthene	1.1E-07	-	1.6E-08	-	4.8E-12	-	-	-	-	-	1.3E-07	-	1.3E-07	-	-	-
Fluorene	2.0E-07	-	3.0E-08	-	8.9E-12	-	-	-	-	-	2.3E-07	-	2.3E-07	-	-	-
Indeno(1,2,3-cd)pyrene	-	2E-10	-	3E-11	-	3E-15	-	-	-	-	-	3E-10	-	3E-10	-	-
Naphthalene	1.5E-07	-	2.3E-08	-	1.5E-10	2E-15	-	-	-	-	1.8E-07	2E-15	1.8E-07	2E-15	-	-
Phenanthrene	7.2E-07	-	1.1E-07	-	3.1E-11	-	-	-	-	-	8.2E-07	-	8.2E-07	-	-	-
Perylene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Pyrene	1.5E-07	-	2.2E-08	-	6.3E-12	-	-	-	-	-	1.7E-07	-	1.7E-07	-	-	-
Total Petroleum Hydrocarbons																
C08-C11(Gasoline Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
C11-C14(Kerosene Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
C14-C20(Diesel Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
C20-C30(Lubricant Oil Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

Table C2-6 (2 of 4)

Total Risk Estimates for the Adult Recreator
Old Conservation Yard RFI Site

Central Tendency Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation Ambient Air_s		Inhalation Ambient Air_{gw}		Cumulative Risk		Soil Media Risk		Groundwater Risk	
	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (mg/kg-day)	Risk (mg/kg-day)	HQ (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)
Dioxins																
2,3,7,8-TCDD	-	8E-10	-	3E-11	-	3E-14	-	-	-	-	-	8E-10	-	8E-10	-	-
1,2,3,7,8-PeCDD	-	5E-09	-	2E-10	-	2E-13	-	-	-	-	-	5E-09	-	5E-09	-	-
1,2,3,4,7,8-HxCDD	-	1E-09	-	4E-11	-	5E-14	-	-	-	-	-	1E-09	-	1E-09	-	-
1,2,3,6,7,8-HxCDD	-	2E-09	-	5E-11	-	7E-14	-	-	-	-	-	2E-09	-	2E-09	-	-
1,2,3,7,8,9-HxCDD	-	1E-09	-	5E-11	-	6E-14	-	-	-	-	-	1E-09	-	1E-09	-	-
1,2,3,4,6,7,8-HpCDD	-	4E-09	-	1E-10	-	2E-13	-	-	-	-	-	4E-09	-	4E-09	-	-
OCDD	-	8E-10	-	3E-11	-	4E-14	-	-	-	-	-	9E-10	-	9E-10	-	-
2,3,7,8-TCDF	-	2E-10	-	6E-12	-	7E-15	-	-	-	-	-	2E-10	-	2E-10	-	-
1,2,3,7,8-PeCDF	-	4E-11	-	1E-12	-	2E-15	-	-	-	-	-	4E-11	-	4E-11	-	-
2,3,4,7,8-PeCDF	-	1E-09	-	4E-11	-	5E-14	-	-	-	-	-	1E-09	-	1E-09	-	-
1,2,3,4,7,8-HxCDF	-	1E-09	-	3E-11	-	4E-14	-	-	-	-	-	1E-09	-	1E-09	-	-
1,2,3,6,7,8-HxCDF	-	4E-10	-	1E-11	-	2E-14	-	-	-	-	-	4E-10	-	4E-10	-	-
2,3,4,6,7,8-HxCDF	-	4E-10	-	1E-11	-	2E-14	-	-	-	-	-	4E-10	-	4E-10	-	-
1,2,3,7,8,9-HxCDF	-	2E-10	-	6E-12	-	8E-15	-	-	-	-	-	2E-10	-	2E-10	-	-
1,2,3,4,6,7,8-HpCDF	-	4E-10	-	1E-11	-	2E-14	-	-	-	-	-	4E-10	-	4E-10	-	-
1,2,3,4,7,8,9-HpCDF	-	6E-11	-	2E-12	-	2E-15	-	-	-	-	-	6E-11	-	6E-11	-	-
OCDF	-	4E-11	-	1E-12	-	2E-15	-	-	-	-	-	4E-11	-	4E-11	-	-
PCBs																
Aroclor-1248	-	6E-06	-	9E-07	-	3E-10	-	-	-	-	-	7E-06	-	7E-06	-	-
Aroclor-1254	3.0E-03	1E-08	4.8E-04	2E-09	1.3E-07	6E-13	-	-	-	-	3.5E-03	2E-08	3.5E-03	2E-08	-	-
Aroclor-1260	-	2E-07	-	2E-08	-	7E-12	-	-	-	-	-	2E-07	-	2E-07	-	-
PCB-105	-	3E-11	-	4E-12	-	1E-15	-	-	-	-	-	3E-11	-	3E-11	-	-
PCB-114	-	5E-13	-	8E-14	-	2E-17	-	-	-	-	-	5E-13	-	5E-13	-	-
PCB-118	-	5E-11	-	8E-12	-	2E-15	-	-	-	-	-	6E-11	-	6E-11	-	-
PCB-123	-	7E-13	-	1E-13	-	3E-17	-	-	-	-	-	8E-13	-	8E-13	-	-
PCB-126	-	7E-09	-	1E-09	-	3E-13	-	-	-	-	-	8E-09	-	8E-09	-	-
PCB-156	-	2E-11	-	3E-12	-	7E-16	-	-	-	-	-	2E-11	-	2E-11	-	-
PCB-157	-	8E-12	-	1E-12	-	3E-16	-	-	-	-	-	9E-12	-	9E-12	-	-
PCB-167	-	1E-11	-	2E-12	-	6E-16	-	-	-	-	-	2E-11	-	2E-11	-	-
PCB-169	-	2E-10	-	3E-11	-	8E-15	-	-	-	-	-	2E-10	-	2E-10	-	-
PCB-189	-	2E-12	-	3E-13	-	8E-17	-	-	-	-	-	2E-12	-	2E-12	-	-
PCB-77	-	1E-11	-	2E-12	-	6E-16	-	-	-	-	-	2E-11	-	2E-11	-	-
PCB-81	-	7E-12	-	1E-12	-	3E-16	-	-	-	-	-	8E-12	-	8E-12	-	-
Total PCB Congeners	-	7E-09	-	1E-09	-	3E-13	-	-	-	-	-	8E-09	-	8E-09	-	-
Cumulative Risk	3.7E-03	6E-06	4.9E-04	1E-06	3.7E-07	3E-10	4.0E-05	2E-09	7.5E-08	5E-12	4.2E-03	7E-06	4.2E-03	7E-06	7.5E-08	5E-12

Table C2-6 (3 of 4)

Total Risk Estimates for the Adult Recreator
Old Conservation Yard RFI Site

Reasonable Maximum Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation Ambient Air_s		Inhalation Ambient Air_{gw}		Cumulative Risk		Soil Media Risk		Groundwater Risk	
	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (mg/kg-day)	Risk (mg/kg-day)	HQ (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)
Inorganic Compounds																
Antimony	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Barium	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Boron	5.1E-06	-	2.6E-06	-	3.9E-09	-	-	-	-	-	7.8E-06	-	7.8E-06	-	-	-
Cadmium	1.9E-04	2E-08	1.0E-05	1E-09	7.4E-07	2E-11	-	-	-	-	2.1E-04	2E-08	2.1E-04	2E-08	-	-
Copper	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Lead	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Mercury	2.1E-03	-	1.1E-03	-	5.4E-07	-	-	-	-	-	3.2E-03	-	3.2E-03	-	-	-
Nitrate	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Silver	7.0E-05	-	3.6E-05	-	-	-	-	-	-	-	1.1E-04	-	1.1E-04	-	-	-
Thallium	4.2E-03	-	2.1E-03	-	-	-	-	-	-	-	6.3E-03	-	6.3E-03	-	-	-
Zinc	4.8E-05	-	2.5E-05	-	-	-	-	-	-	-	7.3E-05	-	7.3E-05	-	-	-
VOCs																
1,1,1-Trichloroethane	3.8E-09	-	2.0E-08	-	-	-	2.0E-07	-	-	-	2.3E-07	-	2.3E-07	-	-	-
1,1,2-Trichloro-1,2,2-trifluoroethane	1.3E-10	-	6.9E-10	-	-	-	4.0E-08	-	-	-	4.0E-08	-	4.0E-08	-	-	-
1,1-Dichloroethane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
1,1-Dichloroethene	2.2E-08	-	1.1E-07	-	-	-	7.1E-06	-	-	-	7.3E-06	-	7.3E-06	-	-	-
2-Butanone	3.6E-09	-	1.8E-08	-	-	-	-	-	-	-	2.2E-08	-	2.2E-08	-	-	-
Acetone	7.6E-07	-	3.9E-06	-	-	-	-	-	-	-	4.7E-06	-	4.7E-06	-	-	-
Benzene	1.2E-07	2E-11	6.2E-07	8E-11	-	-	1.2E-05	3E-09	-	-	1.2E-05	3E-09	1.2E-05	3E-09	-	-
Carbon disulfide	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Chloromethane	-	-	-	-	-	-	-	-	5.2E-08	-	5.2E-08	-	-	-	5.2E-08	-
cis-1,2-Dichloroethene	-	-	-	-	-	-	-	-	3.3E-08	-	3.3E-08	-	-	-	3.3E-08	-
Ethylbenzene	4.8E-09	-	2.5E-08	-	-	-	2.6E-07	-	-	-	2.9E-07	-	2.9E-07	-	-	-
m,p-Xylene	7.1E-09	-	3.6E-08	-	-	-	6.1E-06	-	-	-	6.1E-06	-	6.1E-06	-	-	-
Methylene chloride	8.0E-07	2E-10	4.1E-06	1E-09	-	-	5.0E-05	6E-09	-	-	5.5E-05	8E-09	5.5E-05	8E-09	-	-
o-Xylene	1.7E-09	-	8.6E-09	-	-	-	1.4E-06	-	-	-	1.4E-06	-	1.4E-06	-	-	-
p-Isopropyltoluene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Toluene	8.7E-09	-	4.5E-08	-	-	-	6.9E-08	-	-	-	1.2E-07	-	1.2E-07	-	-	-
Trichloroethene	3.6E-06	4E-12	1.8E-05	2E-11	-	-	3.8E-06	1E-09	6.5E-08	2E-11	2.6E-05	1E-09	2.6E-05	1E-09	6.5E-08	2E-11
SVOCs																
1-Methylnaphthalene	6.5E-07	-	4.3E-06	-	1.4E-11	-	-	-	-	-	5.0E-06	-	5.0E-06	-	-	-
2-Methylnaphthalene	2.7E-05	-	1.8E-04	-	5.9E-10	-	-	-	-	-	2.1E-04	-	2.1E-04	-	-	-
Acenaphthene	2.3E-06	-	1.5E-05	-	4.9E-11	-	-	-	-	-	1.7E-05	-	1.7E-05	-	-	-
Acenaphthylene	9.3E-07	-	6.2E-06	-	2.0E-11	-	-	-	-	-	7.1E-06	-	7.1E-06	-	-	-
Anthracene	3.1E-07	-	2.0E-06	-	6.6E-12	-	-	-	-	-	2.3E-06	-	2.3E-06	-	-	-
Benzo(a)anthracene	-	1E-08	-	9E-08	-	1E-13	-	-	-	-	-	1E-07	-	1E-07	-	-
Benzo(a)pyrene	-	1E-07	-	9E-07	-	9E-13	-	-	-	-	-	1E-06	-	1E-06	-	-
Benzo(e)pyrene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Benzo(b)fluoranthene	-	1E-08	-	1E-07	-	1E-13	-	-	-	-	-	1E-07	-	1E-07	-	-
Benzo(g,h,i)perylene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Benzo(k)fluoranthene	-	1E-08	-	9E-08	-	9E-14	-	-	-	-	-	1E-07	-	1E-07	-	-
Chrysene	-	2E-09	-	1E-08	-	1E-14	-	-	-	-	-	1E-08	-	1E-08	-	-
Dibenz(a,h)anthracene	-	3E-08	-	2E-07	-	6E-13	-	-	-	-	-	2E-07	-	2E-07	-	-
Fluoranthene	2.1E-06	-	1.4E-05	-	4.6E-11	-	-	-	-	-	1.6E-05	-	1.6E-05	-	-	-
Fluorene	3.4E-06	-	2.3E-05	-	7.3E-11	-	-	-	-	-	2.6E-05	-	2.6E-05	-	-	-
Indeno(1,2,3-cd)pyrene	-	1E-08	-	8E-08	-	9E-14	-	-	-	-	-	1E-07	-	1E-07	-	-
Naphthalene	1.5E-06	-	1.0E-05	-	7.7E-10	3E-14	-	-	-	-	1.2E-05	3E-14	1.2E-05	3E-14	-	-
Perylene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Phenanthrene	1.2E-05	-	8.1E-05	-	2.6E-10	-	-	-	-	-	9.3E-05	-	9.3E-05	-	-	-
Pyrene	2.4E-06	-	1.6E-05	-	5.2E-11	-	-	-	-	-	1.9E-05	-	1.9E-05	-	-	-
Total Petroleum Hydrocarbons																
C08-C11(Gasoline Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
C11-C14(Kerosene Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
C14-C20(Diesel Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
C20-C30(Lubricant Oil Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

Table C2-6 (4 of 4)

Total Risk Estimates for the Adult Recreator
Old Conservation Yard RFI Site

Reasonable Maximum Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation Ambient Air_s		Inhalation Ambient Air_{gw}		Cumulative Risk		Soil Media Risk		Groundwater Risk	
	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (mg/kg-day)	Risk (mg/kg-day)	HQ (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)
Dioxins																
2,3,7,8-TCDD	-	1E-08	-	2E-08	-	3E-13	-	-	-	-	-	4E-08	-	4E-08	-	-
1,2,3,7,8-PeCDD	-	4E-07	-	7E-07	-	9E-12	-	-	-	-	-	1E-06	-	1E-06	-	-
1,2,3,4,7,8-HxCDD	-	4E-08	-	7E-08	-	9E-13	-	-	-	-	-	1E-07	-	1E-07	-	-
1,2,3,6,7,8-HxCDD	-	8E-08	-	1E-07	-	2E-12	-	-	-	-	-	2E-07	-	2E-07	-	-
1,2,3,7,8,9-HxCDD	-	7E-08	-	1E-07	-	2E-12	-	-	-	-	-	2E-07	-	2E-07	-	-
1,2,3,4,6,7,8-HpCDD	-	2E-07	-	4E-07	-	5E-12	-	-	-	-	-	6E-07	-	6E-07	-	-
OCDD	-	2E-08	-	3E-08	-	4E-13	-	-	-	-	-	5E-08	-	5E-08	-	-
2,3,7,8-TCDF	-	8E-09	-	1E-08	-	2E-13	-	-	-	-	-	2E-08	-	2E-08	-	-
1,2,3,7,8-PeCDF	-	2E-09	-	4E-09	-	5E-14	-	-	-	-	-	6E-09	-	6E-09	-	-
2,3,4,7,8-PeCDF	-	7E-08	-	1E-07	-	2E-12	-	-	-	-	-	2E-07	-	2E-07	-	-
1,2,3,4,7,8-HxCDF	-	5E-08	-	8E-08	-	1E-12	-	-	-	-	-	1E-07	-	1E-07	-	-
1,2,3,6,7,8-HxCDF	-	8E-09	-	1E-08	-	2E-13	-	-	-	-	-	2E-08	-	2E-08	-	-
2,3,4,6,7,8-HxCDF	-	2E-08	-	4E-08	-	5E-13	-	-	-	-	-	6E-08	-	6E-08	-	-
1,2,3,7,8,9-HxCDF	-	8E-09	-	1E-08	-	2E-13	-	-	-	-	-	2E-08	-	2E-08	-	-
1,2,3,4,6,7,8-HpCDF	-	1E-08	-	1E-08	-	2E-13	-	-	-	-	-	2E-08	-	2E-08	-	-
1,2,3,4,7,8,9-HpCDF	-	2E-09	-	4E-09	-	5E-14	-	-	-	-	-	6E-09	-	6E-09	-	-
OCDF	-	1E-09	-	2E-09	-	2E-14	-	-	-	-	-	3E-09	-	3E-09	-	-
PCBs																
Aroclor-1248	-	7E-04	-	5E-03	-	1E-08	-	-	-	-	-	6E-03	-	6E-03	-	-
Aroclor-1254	5.3E-02	7E-07	3.8E-01	5E-06	1.1E-06	1E-11	-	-	-	-	4.3E-01	6E-06	4.3E-01	6E-06	-	-
Aroclor-1260	-	2E-05	-	1E-04	-	4E-10	-	-	-	-	-	1E-04	-	1E-04	-	-
PCB-105	-	3E-09	-	2E-08	-	6E-14	-	-	-	-	-	2E-08	-	2E-08	-	-
PCB-114	-	5E-11	-	4E-10	-	1E-15	-	-	-	-	-	4E-10	-	4E-10	-	-
PCB-118	-	6E-09	-	4E-08	-	1E-13	-	-	-	-	-	5E-08	-	5E-08	-	-
PCB-123	-	8E-11	-	6E-10	-	2E-15	-	-	-	-	-	7E-10	-	7E-10	-	-
PCB-126	-	7E-07	-	5E-06	-	2E-11	-	-	-	-	-	6E-06	-	6E-06	-	-
PCB-156	-	2E-09	-	1E-08	-	4E-14	-	-	-	-	-	2E-08	-	2E-08	-	-
PCB-157	-	9E-10	-	6E-09	-	2E-14	-	-	-	-	-	7E-09	-	7E-09	-	-
PCB-167	-	2E-09	-	1E-08	-	3E-14	-	-	-	-	-	1E-08	-	1E-08	-	-
PCB-169	-	2E-08	-	2E-07	-	5E-13	-	-	-	-	-	2E-07	-	2E-07	-	-
PCB-189	-	2E-10	-	2E-09	-	5E-15	-	-	-	-	-	2E-09	-	2E-09	-	-
PCB-77	-	1E-09	-	1E-08	-	3E-14	-	-	-	-	-	1E-08	-	1E-08	-	-
PCB-81	-	8E-10	-	6E-09	-	2E-14	-	-	-	-	-	6E-09	-	6E-09	-	-
Total PCB Congeners	-	8E-07	-	6E-06	-	2E-11	-	-	-	-	-	6E-06	-	6E-06	-	-
Cumulative Risk	5.9E-02	7E-04	3.8E-01	5E-03	2.4E-06	2E-08	8.0E-05	1E-08	1.5E-07	2E-11	4.4E-01	6E-03	4.4E-01	6E-03	1.5E-07	2E-11

Notes:
Inhalation Ambient Air $_{s\text{-}gw}$ - Exposure associated with ambient air concentrations of COPCs modeled from soil or groundwater.
HQ - hazard quotient
HI - hazard index
Risk - incremental increased lifetime cancer risk
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyls
COPC - chemical of potential concern
"-" indicates that either adequate toxicity data were not available for a chemical or the exposure pathway was not applicable to that chemical.
mg/kg-day - milligrams per kilogram per day
HIs and cancer risks for PCB congeners. These results not included in cumulative risk estimates.

Table C2-7 (1 of 4)

Total Risk Estimates for the Child Recreator
Old Conservation Yard RFI Site

Central Tendency Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation Ambient Air_s		Inhalation Ambient Air_{gw}		Cumulative Risk		Soil Media Risk		Groundwater Risk	
	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (mg/kg-day)	Risk (mg/kg-day)	HQ (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)
Inorganic Compounds																
Antimony	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Barium	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Boron	2.0E-05	-	3.3E-07	-	1.3E-08	-	-	-	-	-	2.0E-05	-	2.0E-05	-	-	-
Cadmium	4.7E-04	1E-08	8.0E-07	2E-11	1.5E-06	1E-11	-	-	-	-	4.8E-04	1E-08	4.8E-04	1E-08	-	-
Copper	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Lead	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Mercury	1.5E-03	-	2.6E-05	-	3.3E-07	-	-	-	-	-	1.6E-03	-	1.6E-03	-	-	-
Nitrate	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Silver	1.6E-04	-	2.6E-06	-	-	-	-	-	-	-	1.6E-04	-	1.6E-04	-	-	-
Thallium	9.9E-03	-	1.7E-04	-	-	-	-	-	-	-	1.0E-02	-	1.0E-02	-	-	-
Zinc	2.0E-04	-	3.4E-06	-	1.1E-07	-	-	-	-	-	2.1E-04	-	2.1E-04	-	-	-
VOCs																
1,1,1-Trichloroethane	9.8E-09	-	1.6E-09	-	-	-	8.1E-07	-	-	-	8.2E-07	-	8.2E-07	-	-	-
1,1,2-Trichloro-1,2,2-trifluoroethane	3.7E-10	-	6.3E-11	-	-	-	1.6E-07	-	-	-	1.6E-07	-	1.6E-07	-	-	-
1,1-Dichloroethane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
1,1-Dichloroethene	5.8E-08	-	9.7E-09	-	-	-	2.8E-05	-	-	-	2.8E-05	-	2.8E-05	-	-	-
2-Butanone	3.4E-08	-	5.7E-09	-	-	-	-	-	-	-	4.0E-08	-	4.0E-08	-	-	-
Acetone	3.6E-07	-	6.0E-08	-	-	-	-	-	-	-	4.2E-07	-	4.2E-07	-	-	-
Benzene	2.6E-07	8E-12	4.3E-08	1E-12	-	-	4.6E-05	3E-09	-	-	4.6E-05	3E-09	4.6E-05	3E-09	-	-
Carbon disulfide	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Chloromethane	-	-	-	-	-	-	-	-	2.1E-07	-	2.1E-07	-	-	-	2.1E-07	-
cis-1,2-Dichloroethene	-	-	-	-	-	-	-	-	1.3E-07	-	1.3E-07	-	-	-	1.3E-07	-
Ethylbenzene	1.0E-08	-	1.7E-09	-	-	-	1.0E-06	-	-	-	1.1E-06	-	1.1E-06	-	-	-
m,p-Xylene	1.5E-08	-	2.5E-09	-	-	-	2.4E-05	-	-	-	2.4E-05	-	2.4E-05	-	-	-
Methylene chloride	6.2E-07	4E-11	1.0E-07	7E-12	-	-	2.0E-04	6E-09	-	-	2.0E-04	6E-09	2.0E-04	6E-09	-	-
o-Xylene	3.6E-09	-	6.0E-10	-	-	-	5.5E-06	-	-	-	5.5E-06	-	5.5E-06	-	-	-
p-Isopropyltoluene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Toluene	1.8E-08	-	3.0E-09	-	-	-	2.7E-07	-	-	-	2.9E-07	-	2.9E-07	-	-	-
Trichloroethene	9.1E-06	3E-12	1.5E-06	5E-13	-	-	1.5E-05	1E-09	2.6E-07	2E-11	2.6E-05	1E-09	2.6E-05	1E-09	2.6E-07	2E-11
SVOCs																
1-Methylnaphthalene	2.7E-06	-	5.9E-07	-	5.0E-11	-	-	-	-	-	3.3E-06	-	3.3E-06	-	-	-
2-Methylnaphthalene	3.9E-05	-	8.5E-06	-	7.1E-10	-	-	-	-	-	4.7E-05	-	4.7E-05	-	-	-
Acenaphthene	2.6E-06	-	5.6E-07	-	4.7E-11	-	-	-	-	-	3.1E-06	-	3.1E-06	-	-	-
Acenaphthylene	1.2E-06	-	2.7E-07	-	2.2E-11	-	-	-	-	-	1.5E-06	-	1.5E-06	-	-	-
Anthracene	3.6E-07	-	7.9E-08	-	6.6E-12	-	-	-	-	-	4.4E-07	-	4.4E-07	-	-	-
Benzo(a)anthracene	-	3E-09	-	7E-10	-	2E-14	-	-	-	-	-	4E-09	-	4E-09	-	-
Benzo(a)pyrene	-	3E-08	-	7E-09	-	2E-13	-	-	-	-	-	4E-08	-	4E-08	-	-
Benzo(e)pyrene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Benzo(b)fluoranthene	-	4E-09	-	8E-10	-	2E-14	-	-	-	-	-	5E-09	-	5E-09	-	-
Benzo(g,h,i)perylene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Benzo(k)fluoranthene	-	3E-09	-	7E-10	-	2E-14	-	-	-	-	-	4E-09	-	4E-09	-	-
Chrysene	-	5E-10	-	1E-10	-	3E-15	-	-	-	-	-	6E-10	-	6E-10	-	-
Dibenz(a,h)anthracene	-	8E-09	-	2E-09	-	1E-13	-	-	-	-	-	9E-09	-	9E-09	-	-
Fluoranthene	2.1E-06	-	4.5E-07	-	3.8E-11	-	-	-	-	-	2.5E-06	-	2.5E-06	-	-	-
Fluorene	3.8E-06	-	8.3E-07	-	7.0E-11	-	-	-	-	-	4.6E-06	-	4.6E-06	-	-	-
Indeno(1,2,3-cd)pyrene	-	3E-09	-	6E-10	-	2E-14	-	-	-	-	-	3E-09	-	3E-09	-	-
Naphthalene	2.9E-06	-	6.2E-07	-	1.2E-09	1E-14	-	-	-	-	3.5E-06	1E-14	3.5E-06	1E-14	-	-
Perylene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Phenanthrene	1.3E-05	-	2.9E-06	-	2.5E-10	-	-	-	-	-	1.6E-05	-	1.6E-05	-	-	-
Pyrene	2.7E-06	-	5.9E-07	-	5.0E-11	-	-	-	-	-	3.3E-06	-	3.3E-06	-	-	-
Total Petroleum Hydrocarbons																
C08-C11(Gasoline Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
C11-C14(Kerosene Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
C14-C20(Diesel Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
C20-C30(Lubricant Oil Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

Table C2-7 (2 of 4)

Total Risk Estimates for the Child Recreator
Old Conservation Yard RFI Site

Central Tendency Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation Ambient Air_s		Inhalation Ambient Air_{gw}		Cumulative Risk		Soil Media Risk		Groundwater Risk	
	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (mg/kg-day)	Risk (mg/kg-day)	HQ (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)
Dioxins																
2,3,7,8-TCDD	-	1E-08	-	5E-10	-	2E-13	-	-	-	-	-	1E-08	-	1E-08	-	-
1,2,3,7,8-PeCDD	-	6E-08	-	3E-09	-	1E-12	-	-	-	-	-	7E-08	-	7E-08	-	-
1,2,3,4,7,8-HxCDD	-	1E-08	-	7E-10	-	3E-13	-	-	-	-	-	1E-08	-	1E-08	-	-
1,2,3,6,7,8-HxCDD	-	2E-08	-	1E-09	-	3E-13	-	-	-	-	-	2E-08	-	2E-08	-	-
1,2,3,7,8,9-HxCDD	-	2E-08	-	9E-10	-	3E-13	-	-	-	-	-	2E-08	-	2E-08	-	-
1,2,3,4,6,7,8-HpCDD	-	5E-08	-	2E-09	-	9E-13	-	-	-	-	-	5E-08	-	5E-08	-	-
OCDD	-	1E-08	-	5E-10	-	2E-13	-	-	-	-	-	1E-08	-	1E-08	-	-
2,3,7,8-TCDF	-	2E-09	-	1E-10	-	4E-14	-	-	-	-	-	2E-09	-	2E-09	-	-
1,2,3,7,8-PeCDF	-	5E-10	-	3E-11	-	1E-14	-	-	-	-	-	5E-10	-	5E-10	-	-
2,3,4,7,8-PeCDF	-	1E-08	-	7E-10	-	3E-13	-	-	-	-	-	2E-08	-	2E-08	-	-
1,2,3,4,7,8-HxCDF	-	1E-08	-	6E-10	-	2E-13	-	-	-	-	-	1E-08	-	1E-08	-	-
1,2,3,6,7,8-HxCDF	-	5E-09	-	2E-10	-	9E-14	-	-	-	-	-	5E-09	-	5E-09	-	-
2,3,4,6,7,8-HxCDF	-	5E-09	-	3E-10	-	9E-14	-	-	-	-	-	5E-09	-	5E-09	-	-
1,2,3,7,8,9-HxCDF	-	2E-09	-	1E-10	-	4E-14	-	-	-	-	-	2E-09	-	2E-09	-	-
1,2,3,4,6,7,8-HpCDF	-	5E-09	-	3E-10	-	1E-13	-	-	-	-	-	6E-09	-	6E-09	-	-
1,2,3,4,7,8,9-HpCDF	-	7E-10	-	3E-11	-	1E-14	-	-	-	-	-	7E-10	-	7E-10	-	-
OCDF	-	5E-10	-	3E-11	-	9E-15	-	-	-	-	-	5E-10	-	5E-10	-	-
PCBs																
Aroclor-1248	-	7E-05	-	2E-05	-	1E-09	-	-	-	-	-	9E-05	-	9E-05	-	-
Aroclor-1254	5.6E-02	2E-07	1.3E-02	4E-08	1.0E-06	3E-12	-	-	-	-	6.9E-02	2E-07	6.9E-02	2E-07	-	-
Aroclor-1260	-	2E-06	-	5E-07	-	4E-11	-	-	-	-	-	2E-06	-	2E-06	-	-
PCB-105	-	3E-10	-	7E-11	-	6E-15	-	-	-	-	-	4E-10	-	4E-10	-	-
PCB-114	-	6E-12	-	1E-12	-	1E-16	-	-	-	-	-	7E-12	-	7E-12	-	-
PCB-118	-	6E-10	-	1E-10	-	1E-14	-	-	-	-	-	8E-10	-	8E-10	-	-
PCB-123	-	9E-12	-	2E-12	-	2E-16	-	-	-	-	-	1E-11	-	1E-11	-	-
PCB-126	-	8E-08	-	2E-08	-	1E-12	-	-	-	-	-	1E-07	-	1E-07	-	-
PCB-156	-	2E-10	-	5E-11	-	4E-15	-	-	-	-	-	3E-10	-	3E-10	-	-
PCB-157	-	9E-11	-	2E-11	-	2E-15	-	-	-	-	-	1E-10	-	1E-10	-	-
PCB-167	-	2E-10	-	4E-11	-	3E-15	-	-	-	-	-	2E-10	-	2E-10	-	-
PCB-169	-	2E-09	-	6E-10	-	4E-14	-	-	-	-	-	3E-09	-	3E-09	-	-
PCB-189	-	2E-11	-	6E-12	-	4E-16	-	-	-	-	-	3E-11	-	3E-11	-	-
PCB-77	-	2E-10	-	4E-11	-	3E-15	-	-	-	-	-	2E-10	-	2E-10	-	-
PCB-81	-	9E-11	-	2E-11	-	2E-15	-	-	-	-	-	1E-10	-	1E-10	-	-
Total PCB Congeners	-	9E-08	-	2E-08	-	2E-12	-	-	-	-	-	1E-07	-	1E-07	-	-
Cumulative Risk	6.8E-02	8E-05	1.3E-02	2E-05	3.0E-06	1E-09	3.2E-04	1E-08	5.9E-07	2E-11	8.2E-02	9E-05	8.2E-02	9E-05	5.9E-07	2E-11

Table C2-7 (3 of 4)

Total Risk Estimates for the Child Recreator
Old Conservation Yard RFI Site

Reasonable Maximum Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation Ambient Air_s		Inhalation Ambient Air_{gw}		Cumulative Risk		Soil Media Risk		Groundwater Risk	
	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (mg/kg-day)	Risk (mg/kg-day)	HQ (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)
Inorganic Compounds																
Antimony	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Barium	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Boron	2.0E-05	-	3.3E-07	-	1.3E-08	-	-	-	-	-	2.0E-05	-	2.0E-05	-	-	-
Cadmium	4.7E-04	1E-08	8.0E-07	2E-11	1.5E-06	1E-11	-	-	-	-	4.8E-04	1E-08	4.8E-04	1E-08	-	-
Copper	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Lead	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Mercury	1.5E-03	-	2.6E-05	-	3.3E-07	-	-	-	-	-	1.6E-03	-	1.6E-03	-	-	-
Nitrate	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Silver	1.6E-04	-	2.6E-06	-	-	-	-	-	-	-	1.6E-04	-	1.6E-04	-	-	-
Thallium	9.9E-03	-	1.7E-04	-	-	-	-	-	-	-	1.0E-02	-	1.0E-02	-	-	-
Zinc	2.0E-04	-	3.4E-06	-	1.1E-07	-	-	-	-	-	2.1E-04	-	2.1E-04	-	-	-
VOCs																
1,1,1-Trichloroethane	7.2E-08	-	2.0E-08	-	-	-	3.2E-06	-	-	-	3.3E-06	-	3.3E-06	-	-	-
1,1,2-Trichloro-1,2,2-trifluoroethane	2.5E-09	-	7.0E-10	-	-	-	6.2E-07	-	-	-	6.3E-07	-	6.3E-07	-	-	-
1,1-Dichloroethane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
1,1-Dichloroethene	4.0E-07	-	1.1E-07	-	-	-	1.1E-04	-	-	-	1.1E-04	-	1.1E-04	-	-	-
2-Butanone	6.7E-08	-	1.9E-08	-	-	-	-	-	-	-	8.6E-08	-	8.6E-08	-	-	-
Acetone	1.4E-05	-	4.0E-06	-	-	-	-	-	-	-	1.8E-05	-	1.8E-05	-	-	-
Benzene	2.3E-06	7E-11	6.3E-07	2E-11	-	-	1.8E-04	1E-08	-	-	1.9E-04	1E-08	1.9E-04	1E-08	-	-
Carbon disulfide	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Chloromethane	-	-	-	-	-	-	-	-	8.2E-07	-	8.2E-07	-	-	-	8.2E-07	-
cis-1,2-Dichloroethene	-	-	-	-	-	-	-	-	5.2E-07	-	5.2E-07	-	-	-	5.2E-07	-
Ethylbenzene	9.1E-08	-	2.5E-08	-	-	-	4.2E-06	-	-	-	4.3E-06	-	4.3E-06	-	-	-
m,p-Xylene	1.3E-07	-	3.7E-08	-	-	-	9.6E-05	-	-	-	9.6E-05	-	9.6E-05	-	-	-
Methylene chloride	1.5E-05	1E-09	4.2E-06	3E-10	-	-	7.9E-04	3E-08	-	-	8.1E-04	3E-08	8.1E-04	3E-08	-	-
o-Xylene	3.1E-08	-	8.7E-09	-	-	-	2.2E-05	-	-	-	2.2E-05	-	2.2E-05	-	-	-
p-Isopropyltoluene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Toluene	1.6E-07	-	4.5E-08	-	-	-	1.1E-06	-	-	-	1.3E-06	-	1.3E-06	-	-	-
Trichloroethene	6.7E-05	2E-11	1.9E-05	6E-12	-	-	6.0E-05	6E-09	1.0E-06	1E-10	1.5E-04	6E-09	1.5E-04	6E-09	1.0E-06	1E-10
SVOCs																
1-Methylnaphthalene	1.2E-05	-	4.4E-06	-	2.2E-10	-	-	-	-	-	1.7E-05	-	1.7E-05	-	-	-
2-Methylnaphthalene	5.1E-04	-	1.9E-04	-	9.4E-09	-	-	-	-	-	7.0E-04	-	7.0E-04	-	-	-
Acenaphthene	4.3E-05	-	1.5E-05	-	7.8E-10	-	-	-	-	-	5.8E-05	-	5.8E-05	-	-	-
Acenaphthylene	1.7E-05	-	6.3E-06	-	3.2E-10	-	-	-	-	-	2.4E-05	-	2.4E-05	-	-	-
Anthracene	5.7E-06	-	2.1E-06	-	1.0E-10	-	-	-	-	-	7.8E-06	-	7.8E-06	-	-	-
Benzo(a)anthracene	-	6E-08	-	7E-10	-	4E-13	-	-	-	-	-	6E-08	-	6E-08	-	-
Benzo(a)pyrene	-	6E-07	-	7E-09	-	4E-12	-	-	-	-	-	6E-07	-	6E-07	-	-
Benzo(e)pyrene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Benzo(b)fluoranthene	-	7E-08	-	8E-10	-	4E-13	-	-	-	-	-	7E-08	-	7E-08	-	-
Benzo(g,h,i)perylene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Benzo(k)fluoranthene	-	6E-08	-	7E-10	-	4E-13	-	-	-	-	-	6E-08	-	6E-08	-	-
Chrysene	-	8E-09	-	1E-10	-	5E-14	-	-	-	-	-	9E-09	-	9E-09	-	-
Dibenz(a,h)anthracene	-	1E-07	-	2E-09	-	2E-12	-	-	-	-	-	1E-07	-	1E-07	-	-
Fluoranthene	4.0E-05	-	1.4E-05	-	7.3E-10	-	-	-	-	-	5.4E-05	-	5.4E-05	-	-	-
Fluorene	6.3E-05	-	2.3E-05	-	1.2E-09	-	-	-	-	-	8.6E-05	-	8.6E-05	-	-	-
Indeno(1,2,3-cd)pyrene	-	6E-08	-	6E-10	-	3E-13	-	-	-	-	-	6E-08	-	6E-08	-	-
Naphthalene	2.9E-05	-	1.0E-05	-	1.2E-08	1E-13	-	-	-	-	3.9E-05	1E-13	3.9E-05	1E-13	-	-
Perylene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Phenanthrene	2.3E-04	-	8.2E-05	-	4.1E-09	-	-	-	-	-	3.1E-04	-	3.1E-04	-	-	-
Pyrene	4.5E-05	-	1.6E-05	-	8.3E-10	-	-	-	-	-	6.2E-05	-	6.2E-05	-	-	-
Total Petroleum Hydrocarbons																
C08-C11(Gasoline Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
C11-C14(Kerosene Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
C14-C20(Diesel Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
C20-C30(Lubricant Oil Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

Table C2-7 (4 of 4)

Total Risk Estimates for the Child Recreator
Old Conservation Yard RFI Site

Reasonable Maximum Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation Ambient Air_s		Inhalation Ambient Air_{gw}		Cumulative Risk		Soil Media Risk		Groundwater Risk	
	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (mg/kg-day)	Risk (mg/kg-day)	HQ (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)
Dioxins																
2,3,7,8-TCDD	-	7E-08	-	6E-09	-	1E-12	-	-	-	-	-	7E-08	-	7E-08	-	-
1,2,3,7,8-PeCDD	-	2E-06	-	2E-07	-	4E-11	-	-	-	-	-	2E-06	-	2E-06	-	-
1,2,3,4,7,8-HxCDD	-	2E-07	-	2E-08	-	4E-12	-	-	-	-	-	2E-07	-	2E-07	-	-
1,2,3,6,7,8-HxCDD	-	4E-07	-	3E-08	-	7E-12	-	-	-	-	-	4E-07	-	4E-07	-	-
1,2,3,7,8,9-HxCDD	-	3E-07	-	3E-08	-	6E-12	-	-	-	-	-	4E-07	-	4E-07	-	-
1,2,3,4,6,7,8-HpCDD	-	1E-06	-	9E-08	-	2E-11	-	-	-	-	-	1E-06	-	1E-06	-	-
OCDD	-	9E-08	-	8E-09	-	2E-12	-	-	-	-	-	1E-07	-	1E-07	-	-
2,3,7,8-TCDF	-	4E-08	-	3E-09	-	7E-13	-	-	-	-	-	4E-08	-	4E-08	-	-
1,2,3,7,8-PeCDF	-	1E-08	-	9E-10	-	2E-13	-	-	-	-	-	1E-08	-	1E-08	-	-
2,3,4,7,8-PeCDF	-	3E-07	-	3E-08	-	6E-12	-	-	-	-	-	4E-07	-	4E-07	-	-
1,2,3,4,7,8-HxCDF	-	2E-07	-	2E-08	-	4E-12	-	-	-	-	-	3E-07	-	3E-07	-	-
1,2,3,6,7,8-HxCDF	-	4E-08	-	3E-09	-	7E-13	-	-	-	-	-	4E-08	-	4E-08	-	-
2,3,4,6,7,8-HxCDF	-	1E-07	-	9E-09	-	2E-12	-	-	-	-	-	1E-07	-	1E-07	-	-
1,2,3,7,8,9-HxCDF	-	4E-08	-	3E-09	-	7E-13	-	-	-	-	-	4E-08	-	4E-08	-	-
1,2,3,4,6,7,8-HpCDF	-	4E-08	-	4E-09	-	8E-13	-	-	-	-	-	5E-08	-	5E-08	-	-
1,2,3,4,7,8,9-HpCDF	-	1E-08	-	1E-09	-	2E-13	-	-	-	-	-	1E-08	-	1E-08	-	-
OCDF	-	5E-09	-	4E-10	-	9E-14	-	-	-	-	-	5E-09	-	5E-09	-	-
PCBs																
Aroclor-1248	-	3E-03	-	1E-03	-	6E-08	-	-	-	-	-	4E-03	-	4E-03	-	-
Aroclor-1254	9.9E-01	3E-06	3.9E-01	1E-06	1.8E-05	6E-11	-	-	-	-	1.4E+00	4E-06	1.4E+00	4E-06	-	-
Aroclor-1260	-	8E-05	-	3E-05	-	2E-09	-	-	-	-	-	1E-04	-	1E-04	-	-
PCB-105	-	1E-08	-	5E-09	-	2E-13	-	-	-	-	-	2E-08	-	2E-08	-	-
PCB-114	-	2E-10	-	9E-11	-	4E-15	-	-	-	-	-	3E-10	-	3E-10	-	-
PCB-118	-	3E-08	-	1E-08	-	5E-13	-	-	-	-	-	4E-08	-	4E-08	-	-
PCB-123	-	4E-10	-	1E-10	-	7E-15	-	-	-	-	-	5E-10	-	5E-10	-	-
PCB-126	-	3E-06	-	1E-06	-	6E-11	-	-	-	-	-	5E-06	-	5E-06	-	-
PCB-156	-	9E-09	-	4E-09	-	2E-13	-	-	-	-	-	1E-08	-	1E-08	-	-
PCB-157	-	4E-09	-	2E-09	-	7E-14	-	-	-	-	-	6E-09	-	6E-09	-	-
PCB-167	-	7E-09	-	3E-09	-	1E-13	-	-	-	-	-	1E-08	-	1E-08	-	-
PCB-169	-	1E-07	-	4E-08	-	2E-12	-	-	-	-	-	1E-07	-	1E-07	-	-
PCB-189	-	1E-09	-	4E-10	-	2E-14	-	-	-	-	-	1E-09	-	1E-09	-	-
PCB-77	-	7E-09	-	3E-09	-	1E-13	-	-	-	-	-	1E-08	-	1E-08	-	-
PCB-81	-	4E-09	-	1E-09	-	7E-14	-	-	-	-	-	5E-09	-	5E-09	-	-
Total PCB Congeners	-	4E-06	-	1E-06	-	7E-11	-	-	-	-	-	5E-06	-	5E-06	-	-
Cumulative Risk	1.0E+00	3E-03	3.9E-01	1E-03	2.0E-05	6E-08	1.3E-03	4E-08	2.4E-06	1E-10	1.4E+00	5E-03	1.4E+00	5E-03	2.4E-06	1E-10

Notes:
Inhalation Ambient Air_{s-gw} - Exposure associated with ambient air concentrations of COPCs modeled from soil or groundwater.
HQ - hazard quotient
HI - hazard index
Risk - incremental increased lifetime cancer risk
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyls
COPC - chemical of potential concern
"-" indicates that either adequate toxicity data were not available for a chemical or the exposure pathway was not applicable to that chemical.
mg/kg-day - milligrams per kilogram per day
HIs and cancer risks for PCB congeners. These results not included in cumulative risk estimates.

Table C2-8 (1 of 4)

Total Risk Estimates for the Adult Resident
Old Conservation Yard RFI Site

Central Tendency Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation of Indoor Air$_{\xi}$		Inhalation Ambient Air$_{\xi}$		Inhalation of Indoor Air$_{gw}$		Inhalation Ambient Air$_{gw}$		Domestic Groundwater Use		Plant Consumption		Cumulative Risk		Soil Media Risk		Groundwater Risk	
	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)
Inorganic Compounds																								
Antimony	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Barium	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Boron	1.5E-05	-	1.7E-07	-	1.5E-08	-	-	-	-	-	-	-	-	-	-	-	4.9E-03	-	1.5E-05	-	1.5E-05	-	-	-
Cadmium	3.6E-04	2E-08	4.0E-07	2E-11	1.8E-06	2E-11	-	-	-	-	-	-	-	-	-	-	1.3E-02	6E-07	3.6E-04	2E-08	3.6E-04	2E-08	-	-
Copper	-	-	-	-	-	-	-	-	-	-	-	-	-	-	6.2E-03	-	-	-	6.2E-03	-	-	-	6.2E-03	-
Fluoride	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1.3E-01	-	-	-	1.3E-01	-	-	-	1.3E-01	-
Lead	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Mercury	1.1E-03	-	1.3E-05	-	3.9E-07	-	-	-	-	-	-	-	-	-	-	-	6.4E-02	-	1.2E-03	-	1.2E-03	-	-	-
Nitrate	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1.2E-01	-	-	-	1.2E-01	-	-	-	1.2E-01	-
Silver	1.2E-04	-	1.3E-06	-	-	-	-	-	-	-	-	-	-	-	-	-	2.3E-05	-	1.2E-04	-	1.2E-04	-	-	-
Thallium	7.4E-03	-	8.4E-05	-	-	-	-	-	-	-	-	-	-	-	9.2E-02	-	1.0E+00	-	1.0E-01	-	7.5E-03	-	9.2E-02	-
Zinc	1.5E-04	-	1.7E-06	-	1.3E-07	-	-	-	-	-	-	-	-	-	-	-	2.1E-02	-	1.5E-04	-	1.5E-04	-	-	-
VOCs																								
1,1,1-Trichloroethane	7.3E-09	-	8.4E-10	-	-	-	-	-	9.6E-07	-	-	-	-	-	-	-	2.6E-05	-	9.7E-07	-	9.7E-07	-	-	-
1,1,2-Trichloro-1,2,2-trifluoroethane	2.8E-10	-	3.2E-11	-	-	-	-	-	1.9E-07	-	-	-	-	-	-	-	4.0E-07	-	1.9E-07	-	1.9E-07	-	-	-
1,1-Dichloroethane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	7.1E-04	5E-08	-	-	7.1E-04	5E-08	-	-	7.1E-04	5E-08
1,1-Dichloroethene	4.3E-08	-	4.9E-09	-	-	-	-	-	3.4E-05	-	-	-	-	-	-	-	2.5E-04	-	3.4E-05	-	3.4E-05	-	-	-
2-Butanone	2.5E-08	-	2.9E-09	-	-	-	-	-	-	-	-	-	-	-	-	-	1.7E-03	-	2.8E-08	-	2.8E-08	-	-	-
Acetone	2.7E-07	-	3.1E-08	-	-	-	-	-	-	-	-	-	-	-	4.9E-04	-	3.5E-02	-	4.9E-04	-	3.0E-07	-	4.9E-04	-
Benzene	1.9E-07	9E-12	2.2E-08	1E-12	-	-	-	-	5.5E-05	6E-09	-	-	-	-	4.0E-03	2E-07	1.1E-03	5E-08	4.0E-03	2E-07	5.5E-05	6E-09	4.0E-03	2E-07
Carbon disulfide	-	-	-	-	-	-	-	-	-	-	-	-	-	-	7.1E-04	-	-	-	7.1E-04	-	-	-	7.1E-04	-
Chloromethane	-	-	-	-	-	-	-	-	-	-	3.8E-06	-	2.5E-07	-	-	-	-	-	4.1E-06	-	-	-	4.1E-06	-
cis-1,2-Dichloroethene	-	-	-	-	-	-	-	-	-	-	4.4E-06	-	1.5E-07	-	1.4E-01	-	-	-	1.4E-01	-	-	-	1.4E-01	-
Ethylbenzene	7.8E-09	-	8.8E-10	-	-	-	-	-	1.2E-06	-	-	-	-	-	-	-	1.2E-05	-	1.3E-06	-	1.3E-06	-	-	-
m,p-Xylene	1.1E-08	-	1.3E-09	-	-	-	-	-	2.9E-05	-	-	-	-	-	-	-	1.7E-05	-	2.9E-05	-	2.9E-05	-	-	-
Methylene chloride	4.7E-07	5E-11	5.3E-08	5E-12	-	-	-	-	2.4E-04	1E-08	-	-	-	-	2.9E-04	3E-08	1.4E-02	1E-06	5.3E-04	4E-08	2.4E-04	1E-08	2.9E-04	3E-08
o-Xylene	2.7E-09	-	3.0E-10	-	-	-	-	-	6.5E-06	-	-	-	-	-	-	-	4.1E-06	-	6.5E-06	-	6.5E-06	-	-	-
p-Isopropyltoluene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Toluene	1.3E-08	-	1.5E-09	-	-	-	-	-	3.3E-07	-	-	-	-	-	6.2E-04	-	3.4E-05	-	6.2E-04	-	3.4E-07	-	6.2E-04	-
Trichloroethene	6.8E-06	3E-12	7.8E-07	4E-13	-	-	-	-	1.8E-05	3E-09	7.7E-06	1E-09	3.1E-07	4E-11	9.1E-01	4E-07	2.3E-02	1E-08	9.1E-01	4E-07	2.6E-05	3E-09	9.1E-01	4E-07
																			-					
SVOCs																			-					
1-Methylnaphthalene	2.0E-06	-	3.0E-07	-	6.0E-11	-	-	-	-	-	-	-	-	-	-	-	-	-	2.3E-06	-	2.3E-06	-	-	-
2-Methylnaphthalene	2.9E-05	-	4.3E-06	-	8.5E-10	-	-	-	-	-	-	-	-	-	-	-	-	-	3.4E-05	-	3.4E-05	-	-	-
Acenaphthene	1.9E-06	-	2.8E-07	-	5.6E-11	-	-	-	-	-	-	-	-	-	-	-	9.2E-04	-	2.2E-06	-	2.2E-06	-	-	-
Acenaphthylene	9.2E-07	-	1.4E-07	-	2.7E-11	-	-	-	-	-	-	-	-	-	-	-	3.9E-04	-	1.1E-06	-	1.1E-06	-	-	-
Anthracene	2.7E-07	-	4.0E-08	-	7.9E-12	-	-	-	-	-	-	-	-	-	-	-	7.0E-05	-	3.1E-07	-	3.1E-07	-	-	-
Benzo(a)anthracene	-	4E-09	-	6E-10	-	4E-14	-	-	-	-	-	-	-	-	-	-	-	2E-07	-	4E-09	-	4E-09	-	-
Benzo(a)pyrene	-	4E-08	-	5E-09	-	3E-13	-	-	-	-	-	-	-	-	-	-	-	7E-07	-	4E-08	-	4E-08	-	-
Benzo(e)pyrene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Benzo(b)fluoranthene	-	4E-09	-	6E-10	-	4E-14	-	-	-	-	-	-	-	-	-	-	-	1E-07	-	5E-09	-	5E-09	-	-
Benzo(g,h,i)perylene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Benzo(k)fluoranthene	-	4E-09	-	5E-10	-	3E-14	-	-	-	-	-	-	-	-	-	-	-	1E-07	-	4E-09	-	4E-09	-	-
Chrysene	-	6E-10	-	9E-11	-	6E-15	-	-	-	-	-	-	-	-	-	-	-	3E-08	-	7E-10	-	7E-10	-	-
Dibenz(a,h)anthracene	-	9E-09	-	1E-09	-	3E-13	-	-	-	-	-	-	-	-	-	-	-	9E-08	-	1E-08	-	1E-08	-	-
Fluoranthene	1.5E-06	-	2.3E-07	-	4.5E-11	-	-	-	-	-	-	-	-	-	-	-	1.7E-04	-	1.8E-06	-	1.8E-06	-	-	-
Fluorene	2.9E-06	-	4.2E-07	-	8.4E-11	-	-	-	-	-	-	-	-	-	-	-	3.1E-04	-	3.3E-06	-	3.3E-06	-	-	-
Indeno(1,2,3-cd)pyrene	-	3E-09	-	5E-10	-	3E-14	-	-	-	-	-	-	-	-	-	-	-	2E-08	-	4E-09	-	4E-09	-	-
Naphthalene	2.1E-06	-	3.2E-07	-	1.5E-09	2E-14	-	-	-	-	-	-	-	-	-	-	-	-	2.5E-06	2E-14	2.5E-06	2E-14	-	-
Perylene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Phenanthrene	1.0E-05	-	1.5E-06	-	2.9E-10	-	-	-	-	-	-	-	-	-	-	-	2.2E-03	-	1.2E-05	-	1.2E-05	-	-	-
Pyrene	2.0E-06	-	3.0E-07	-	5.9E-11	-	-	-	-	-	-	-	-	-	-	-	2.4E-04	-	2.3E-06	-	2.3E-06	-	-	-
Total Petroleum Hydrocarbons																								
C08-C11(Gasoline Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
C11-C14(Kerosene Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
C14-C20(Diesel Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
C20-C30(Lubricant Oil Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

Table C2-8 (2 of 4)

Total Risk Estimates for the Adult Resident
Old Conservation Yard RFI Site

Central Tendency Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation of Indoor Air$_{\xi}$		Inhalation Ambient Air$_{\xi}$		Inhalation of Indoor Air$_{gw}$		Inhalation Ambient Air$_{gw}$		Domestic Groundwater Use		Plant Consumption		Cumulative Risk		Soil Media Risk		Groundwater Risk	
	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)
Dioxins																								
2,3,7,8-TCDD	-	1E-08	-	4E-10	-	3E-13	-	-	-	-	-	-	-	-	-	-	-	-	-	1E-08	-	1E-08	-	-
1,2,3,7,8-PeCDD	-	7E-08	-	2E-09	-	2E-12	-	-	-	-	-	-	-	-	-	-	-	-	-	7E-08	-	7E-08	-	-
1,2,3,4,7,8-HxCDD	-	2E-08	-	5E-10	-	5E-13	-	-	-	-	-	-	-	-	-	-	-	-	-	2E-08	-	2E-08	-	-
1,2,3,6,7,8-HxCDD	-	2E-08	-	7E-10	-	6E-13	-	-	-	-	-	-	-	-	-	-	-	-	-	2E-08	-	2E-08	-	-
1,2,3,7,8,9-HxCDD	-	2E-08	-	7E-10	-	6E-13	-	-	-	-	-	-	-	-	-	-	-	-	-	2E-08	-	2E-08	-	-
1,2,3,4,6,7,8-HpCDD	-	5E-08	-	2E-09	-	2E-12	-	-	-	-	-	-	-	-	-	-	-	-	-	5E-08	-	5E-08	-	-
OCDD	-	1E-08	-	4E-10	-	3E-13	-	-	-	-	-	-	-	-	-	-	-	-	-	1E-08	-	1E-08	-	-
2,3,7,8-TCDF	-	2E-09	-	8E-11	-	7E-14	-	-	-	-	-	-	-	-	-	-	-	-	-	2E-09	-	2E-09	-	-
1,2,3,7,8-PeCDF	-	6E-10	-	2E-11	-	2E-14	-	-	-	-	-	-	-	-	-	-	-	-	-	6E-10	-	6E-10	-	-
2,3,4,7,8-PeCDF	-	2E-08	-	6E-10	-	5E-13	-	-	-	-	-	-	-	-	-	-	-	-	-	2E-08	-	2E-08	-	-
1,2,3,4,7,8-HxCDF	-	1E-08	-	5E-10	-	4E-13	-	-	-	-	-	-	-	-	-	-	-	-	-	1E-08	-	1E-08	-	-
1,2,3,6,7,8-HxCDF	-	5E-09	-	2E-10	-	2E-13	-	-	-	-	-	-	-	-	-	-	-	-	-	5E-09	-	5E-09	-	-
2,3,4,6,7,8-HxCDF	-	6E-09	-	2E-10	-	2E-13	-	-	-	-	-	-	-	-	-	-	-	-	-	6E-09	-	6E-09	-	-
1,2,3,7,8,9-HxCDF	-	2E-09	-	8E-11	-	7E-14	-	-	-	-	-	-	-	-	-	-	-	-	-	3E-09	-	3E-09	-	-
1,2,3,4,6,7,8-HpCDF	-	6E-09	-	2E-10	-	2E-13	-	-	-	-	-	-	-	-	-	-	-	-	-	6E-09	-	6E-09	-	-
1,2,3,4,7,8,9-HpCDF	-	8E-10	-	3E-11	-	2E-14	-	-	-	-	-	-	-	-	-	-	-	-	-	8E-10	-	8E-10	-	-
OCDF	-	6E-10	-	2E-11	-	2E-14	-	-	-	-	-	-	-	-	-	-	-	-	-	6E-10	-	6E-10	-	-
PCBs																								
Aroclor-1248	-	8E-05	-	1E-05	-	2E-09	-	-	-	-	-	-	-	-	-	-	-	-	-	1E-04	-	1E-04	-	-
Aroclor-1254	4.2E-02	2E-07	6.7E-03	3E-08	1.2E-06	6E-12	-	-	-	-	-	-	-	-	-	-	9.1E-01	4E-06	4.9E-02	2E-07	4.9E-02	2E-07	-	-
Aroclor-1260	-	2E-06	-	3E-07	-	6E-11	-	-	-	-	-	-	-	-	-	-	-	2E-05	-	3E-06	-	3E-06	-	-
PCB-105	-	4E-10	-	6E-11	-	1E-14	-	-	-	-	-	-	-	-	-	-	-	8E-09	-	4E-10	-	4E-10	-	-
PCB-114	-	7E-12	-	1E-12	-	2E-16	-	-	-	-	-	-	-	-	-	-	-	1E-10	-	8E-12	-	8E-12	-	-
PCB-118	-	7E-10	-	1E-10	-	2E-14	-	-	-	-	-	-	-	-	-	-	-	2E-08	-	8E-10	-	8E-10	-	-
PCB-123	-	1E-11	-	2E-12	-	3E-16	-	-	-	-	-	-	-	-	-	-	-	2E-10	-	1E-11	-	1E-11	-	-
PCB-126	-	9E-08	-	1E-08	-	3E-12	-	-	-	-	-	-	-	-	-	-	-	2E-06	-	1E-07	-	1E-07	-	-
PCB-156	-	2E-10	-	4E-11	-	7E-15	-	-	-	-	-	-	-	-	-	-	-	5E-09	-	3E-10	-	3E-10	-	-
PCB-157	-	1E-10	-	2E-11	-	3E-15	-	-	-	-	-	-	-	-	-	-	-	2E-09	-	1E-10	-	1E-10	-	-
PCB-167	-	2E-10	-	3E-11	-	5E-15	-	-	-	-	-	-	-	-	-	-	-	4E-09	-	2E-10	-	2E-10	-	-
PCB-169	-	3E-09	-	4E-10	-	8E-14	-	-	-	-	-	-	-	-	-	-	-	6E-08	-	3E-09	-	3E-09	-	-
PCB-189	-	3E-11	-	4E-12	-	8E-16	-	-	-	-	-	-	-	-	-	-	-	6E-10	-	3E-11	-	3E-11	-	-
PCB-77	-	2E-10	-	3E-11	-	5E-15	-	-	-	-	-	-	-	-	-	-	-	2E-09	-	2E-10	-	2E-10	-	-
PCB-81	-	1E-10	-	2E-11	-	3E-15	-	-	-	-	-	-	-	-	-	-	-	1E-09	-	1E-10	-	1E-10	-	-
Total PCB Congeners	-	1E-07	-	2E-08	-	3E-12	-	-	-	-	-	-	-	-	-	-	-	2E-06	-	1E-07	-	1E-07	-	-
Cumulative Risk	5.1E-02	8E-05	6.8E-03	1E-05	3.6E-06	2E-09	-	-	3.8E-04	2E-08	1.6E-05	1E-09	7.1E-07	4E-11	1.4E+00	8E-07	2.1E+00	3E-05	1.5E+00	1E-04	5.8E-02	1E-04	1.4E+00	8E-07
W/O Domestic Groundwater Use																			5.8E-02	1E-04			1.7E-05	1E-09

Table C2-8 (3 of 4)

Total Risk Estimates for the Adult Resident
Old Conservation Yard RFI Site

Reasonable Maximum Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation of Indoor Air$_{\xi}$		Inhalation Ambient Air$_{\xi}$		Inhalation of Indoor Air$_{gw}$		Inhalation Ambient Air$_{gw}$		Domestic Groundwater Use		Plant Consumption		Cumulative Risk		Soil Media Risk		Near-Surface Groundwater F	
	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)
Inorganic Compounds																								
Antimony	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Barium	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Boron	3.6E-05	-	1.4E-06	-	5.2E-08	-	-	-	-	-	-	-	-	-	-	-	6.0E-03	-	3.7E-05	-	3.7E-05	-	-	-
Cadmium	1.4E-03	2E-07	5.4E-06	7E-10	9.8E-06	3E-10	-	-	-	-	-	-	-	-	-	-	2.5E-02	6E-05	1.4E-03	2E-07	1.4E-03	2E-07	-	-
Copper	-	-	-	-	-	-	-	-	-	-	-	-	-	-	9.5E-03	-	-	-	9.5E-03	-	-	-	9.5E-03	-
Fluoride	-	-	-	-	-	-	-	-	-	-	-	-	-	-	2.0E-01	-	-	-	2.0E-01	-	-	-	2.0E-01	-
Lead	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Mercury	1.5E-02	-	5.9E-04	-	7.2E-06	-	-	-	-	-	-	-	-	-	-	-	4.1E-01	-	1.5E-02	-	1.5E-02	-	-	-
Nitrate	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1.9E-01	-	-	-	1.9E-01	-	-	-	1.9E-01	-
Silver	4.9E-04	-	1.9E-05	-	-	-	-	-	-	-	-	-	-	-	-	-	4.7E-05	-	5.1E-04	-	5.1E-04	-	-	-
Thallium	2.9E-02	-	1.2E-03	-	-	-	-	-	-	-	-	-	-	-	1.4E-01	-	2.0E+00	-	1.7E-01	-	3.0E-02	-	1.4E-01	-
Zinc	3.4E-04	-	1.3E-05	-	4.2E-07	-	-	-	-	-	-	-	-	-	-	-	2.3E-02	-	3.5E-04	-	3.5E-04	-	-	-
VOCs																								
1,1,1-Trichloroethane	2.7E-08	-	1.1E-08	-	-	-	2.0E-04	-	2.7E-06	-	-	-	-	-	-	-	4.7E-05	-	2.0E-04	-	2.0E-04	-	-	-
1,1,2-Trichloro-1,2,2-trifluoroethane	9.4E-10	-	3.7E-10	-	-	-	3.8E-05	-	5.3E-07	-	-	-	-	-	-	-	6.7E-07	-	3.8E-05	-	3.8E-05	-	-	-
1,1-Dichloroethane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1.1E-03	2E-07	-	-	1.1E-03	2E-07	-	-	1.1E-03	2E-07
1,1-Dichloroethene	1.5E-07	-	6.0E-08	-	-	-	6.3E-03	-	9.5E-05	-	-	-	-	-	-	-	4.3E-04	-	6.4E-03	-	6.4E-03	-	-	-
2-Butanone	2.5E-08	-	1.0E-08	-	-	-	-	-	-	-	-	-	-	-	-	-	8.3E-04	-	3.5E-08	-	3.5E-08	-	-	-
Acetone	5.4E-06	-	2.1E-06	-	-	-	-	-	-	-	-	-	-	-	7.5E-04	-	3.5E-01	-	7.6E-04	-	7.5E-06	-	7.5E-04	-
Benzene	8.5E-07	1E-10	3.4E-07	4E-11	-	-	1.0E-02	3E-06	1.5E-04	4E-08	-	-	-	-	6.1E-03	8E-07	2.4E-03	6E-06	1.7E-02	4E-06	1.1E-02	3E-06	6.1E-03	8E-07
Carbon disulfide	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1.1E-03	-	-	-	1.1E-03	-	-	-	1.1E-03	-
Chloromethane	-	-	-	-	-	-	-	-	-	-	1.1E-05	-	6.9E-07	-	-	-	-	-	1.2E-05	-	-	-	1.2E-05	-
cis-1,2-Dichloroethene	-	-	-	-	-	-	-	-	-	-	1.2E-05	-	4.4E-07	-	2.2E-01	-	-	-	2.2E-01	-	-	-	2.2E-01	-
Ethylbenzene	3.4E-08	-	1.4E-08	-	-	-	2.6E-04	-	3.5E-06	-	-	-	-	-	-	-	2.6E-05	-	2.6E-04	-	2.6E-04	-	-	-
m,p-Xylene	5.0E-08	-	2.0E-08	-	-	-	5.6E-03	-	8.1E-05	-	-	-	-	-	-	-	3.8E-05	-	5.7E-03	-	5.7E-03	-	-	-
Methylene chloride	5.6E-06	2E-09	2.2E-06	6E-10	-	-	4.2E-02	5E-06	6.6E-04	8E-08	-	-	-	-	4.5E-04	1E-07	8.2E-02	4E-04	4.3E-02	6E-06	4.3E-02	5E-06	4.5E-04	1E-07
o-Xylene	1.2E-08	-	4.7E-09	-	-	-	1.3E-03	-	1.8E-05	-	-	-	-	-	-	-	8.8E-06	-	1.3E-03	-	1.3E-03	-	-	-
p-Isopropyltoluene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Toluene	6.1E-08	-	2.4E-08	-	-	-	6.3E-05	-	9.2E-07	-	-	-	-	-	9.5E-04	-	7.8E-05	-	1.0E-03	-	6.4E-05	-	9.5E-04	-
Trichloroethene	2.5E-05	3E-11	1.0E-05	1E-11	-	-	3.6E-03	1E-06	5.1E-05	2E-08	2.2E-05	8E-09	8.6E-07	3E-10	1.4E+00	2E-06	4.3E-02	1E-06	1.4E+00	3E-06	3.7E-03	1E-06	1.4E+00	2E-06
SVOCs																								
1-Methylnaphthalene	4.6E-06	-	2.4E-06	-	1.9E-10	-	-	-	-	-	-	-	-	-	-	-	-	-	6.9E-06	-	6.9E-06	-	-	-
2-Methylnaphthalene	1.9E-04	-	9.9E-05	-	7.9E-09	-	-	-	-	-	-	-	-	-	-	-	-	-	2.9E-04	-	2.9E-04	-	-	-
Acenaphthene	1.6E-05	-	8.3E-06	-	6.6E-10	-	-	-	-	-	-	-	-	-	-	-	3.8E-03	-	2.4E-05	-	2.4E-05	-	-	-
Acenaphthylene	6.5E-06	-	3.4E-06	-	2.7E-10	-	-	-	-	-	-	-	-	-	-	-	1.4E-03	-	9.8E-06	-	9.8E-06	-	-	-
Anthracene	2.1E-06	-	1.1E-06	-	8.8E-11	-	-	-	-	-	-	-	-	-	-	-	2.7E-04	-	3.2E-06	-	3.2E-06	-	-	-
Benzo(a)anthracene	-	1E-07	-	5E-08	-	1E-12	-	-	-	-	-	-	-	-	-	-	-	5E-05	-	1E-07	-	1E-07	-	-
Benzo(a)pyrene	-	9E-07	-	5E-07	-	1E-11	-	-	-	-	-	-	-	-	-	-	-	2E-04	-	1E-06	-	1E-06	-	-
Benzo(e)pyrene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Benzo(b)fluoranthene	-	1E-07	-	5E-08	-	1E-12	-	-	-	-	-	-	-	-	-	-	-	2E-05	-	2E-07	-	2E-07	-	-
Benzo(g,h,i)perylene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Benzo(k)fluoranthene	-	9E-08	-	5E-08	-	1E-12	-	-	-	-	-	-	-	-	-	-	-	3E-05	-	1E-07	-	1E-07	-	-
Chrysene	-	1E-08	-	7E-09	-	2E-13	-	-	-	-	-	-	-	-	-	-	-	6E-06	-	2E-08	-	2E-08	-	-
Dibenz(a,h)anthracene	-	2E-07	-	1E-07	-	8E-12	-	-	-	-	-	-	-	-	-	-	-	2E-05	-	3E-07	-	3E-07	-	-
Fluoranthene	1.5E-05	-	7.7E-06	-	6.1E-10	-	-	-	-	-	-	-	-	-	-	-	8.0E-04	-	2.3E-05	-	2.3E-05	-	-	-
Fluorene	2.4E-05	-	1.2E-05	-	9.8E-10	-	-	-	-	-	-	-	-	-	-	-	1.3E-03	-	3.6E-05	-	3.6E-05	-	-	-
Indeno(1,2,3-cd)pyrene	-	9E-08	-	5E-08	-	1E-12	-	-	-	-	-	-	-	-	-	-	-	5E-06	-	1E-07	-	1E-07	-	-
Naphthalene	1.1E-05	-	5.6E-06	-	1.0E-08	3E-13	-	-	-	-	-	-	-	-	-	-	-	-	1.6E-05	3E-13	1.6E-05	3E-13	-	-
Perylene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Phenanthrene	8.5E-05	-	4.4E-05	-	3.5E-09	-	-	-	-	-	-	-	-	-	-	-	9.2E-03	-	1.3E-04	-	1.3E-04	-	-	-
Pyrene	1.7E-05	-	8.8E-06	-	7.0E-10	-	-	-	-	-	-	-	-	-	-	-	1.0E-03	-	2.6E-05	-	2.6E-05	-	-	-
Total Petroleum Hydrocarbons																								
C08-C11(Gasoline Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
C11-C14(Kerosene Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
C14-C20(Diesel Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
C20-C30(Lubricant Oil Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

Table C2-8 (4 of 4)

Total Risk Estimates for the Adult Resident
Old Conservation Yard RFI Site

Reasonable Maximum Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation of Indoor Air$_{s}$		Inhalation Ambient Air$_{s}$		Inhalation of Indoor Air$_{gw}$		Inhalation Ambient Air$_{gw}$		Domestic Groundwater Use		Plant Consumption		Cumulative Risk		Soil Media Risk		Groundwater Risk	
	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)
Dioxins																								
2,3,7,8-TCDD	-	1E-07	-	1E-08	-	4E-12	-	-	-	-	-	-	-	-	-	-	-	-	-	1E-07	-	1E-07	-	-
1,2,3,7,8-PeCDD	-	3E-06	-	4E-07	-	1E-10	-	-	-	-	-	-	-	-	-	-	-	-	-	3E-06	-	3E-06	-	-
1,2,3,4,7,8-HxCDD	-	3E-07	-	4E-08	-	1E-11	-	-	-	-	-	-	-	-	-	-	-	-	-	3E-07	-	3E-07	-	-
1,2,3,6,7,8-HxCDD	-	6E-07	-	7E-08	-	2E-11	-	-	-	-	-	-	-	-	-	-	-	-	-	7E-07	-	7E-07	-	-
1,2,3,7,8,9-HxCDD	-	5E-07	-	6E-08	-	2E-11	-	-	-	-	-	-	-	-	-	-	-	-	-	6E-07	-	6E-07	-	-
1,2,3,4,6,7,8-HpCDD	-	2E-06	-	2E-07	-	7E-11	-	-	-	-	-	-	-	-	-	-	-	-	-	2E-06	-	2E-06	-	-
OCDD	-	1E-07	-	2E-08	-	6E-12	-	-	-	-	-	-	-	-	-	-	-	-	-	2E-07	-	2E-07	-	-
2,3,7,8-TCDF	-	6E-08	-	7E-09	-	2E-12	-	-	-	-	-	-	-	-	-	-	-	-	-	6E-08	-	6E-08	-	-
1,2,3,7,8-PeCDF	-	2E-08	-	2E-09	-	7E-13	-	-	-	-	-	-	-	-	-	-	-	-	-	2E-08	-	2E-08	-	-
2,3,4,7,8-PeCDF	-	5E-07	-	6E-08	-	2E-11	-	-	-	-	-	-	-	-	-	-	-	-	-	6E-07	-	6E-07	-	-
1,2,3,4,7,8-HxCDF	-	4E-07	-	4E-08	-	1E-11	-	-	-	-	-	-	-	-	-	-	-	-	-	4E-07	-	4E-07	-	-
1,2,3,6,7,8-HxCDF	-	6E-08	-	7E-09	-	2E-12	-	-	-	-	-	-	-	-	-	-	-	-	-	6E-08	-	6E-08	-	-
2,3,4,6,7,8-HxCDF	-	2E-07	-	2E-08	-	7E-12	-	-	-	-	-	-	-	-	-	-	-	-	-	2E-07	-	2E-07	-	-
1,2,3,7,8,9-HxCDF	-	6E-08	-	7E-09	-	2E-12	-	-	-	-	-	-	-	-	-	-	-	-	-	6E-08	-	6E-08	-	-
1,2,3,4,6,7,8-HpCDF	-	7E-08	-	8E-09	-	3E-12	-	-	-	-	-	-	-	-	-	-	-	-	-	7E-08	-	7E-08	-	-
1,2,3,4,7,8,9-HpCDF	-	2E-08	-	2E-09	-	7E-13	-	-	-	-	-	-	-	-	-	-	-	-	-	2E-08	-	2E-08	-	-
OCDF	-	7E-09	-	8E-10	-	3E-13	-	-	-	-	-	-	-	-	-	-	-	-	-	8E-09	-	8E-09	-	-
PCBs																								
Aroclor-1248	-	5E-03	-	3E-03	-	2E-07	-	-	-	-	-	-	-	-	-	-	-	-	-	7E-03	-	7E-03	-	-
Aroclor-1254	3.7E-01	5E-06	2.1E-01	3E-06	1.5E-05	2E-10	-	-	-	-	-	-	-	-	-	-	4.0E+00	1E-03	5.8E-01	7E-06	5.8E-01	7E-06	-	-
Aroclor-1260	-	1E-04	-	7E-05	-	5E-09	-	-	-	-	-	-	-	-	-	-	-	1E-02	-	2E-04	-	2E-04	-	-
PCB-105	-	2E-08	-	1E-08	-	8E-13	-	-	-	-	-	-	-	-	-	-	-	4E-06	-	3E-08	-	3E-08	-	-
PCB-114	-	4E-10	-	2E-10	-	1E-14	-	-	-	-	-	-	-	-	-	-	-	8E-08	-	6E-10	-	6E-10	-	-
PCB-118	-	4E-08	-	2E-08	-	2E-12	-	-	-	-	-	-	-	-	-	-	-	9E-06	-	6E-08	-	6E-08	-	-
PCB-123	-	6E-10	-	3E-10	-	2E-14	-	-	-	-	-	-	-	-	-	-	-	1E-07	-	9E-10	-	9E-10	-	-
PCB-126	-	5E-06	-	3E-06	-	2E-10	-	-	-	-	-	-	-	-	-	-	-	1E-03	-	8E-06	-	8E-06	-	-
PCB-156	-	1E-08	-	8E-09	-	6E-13	-	-	-	-	-	-	-	-	-	-	-	3E-06	-	2E-08	-	2E-08	-	-
PCB-157	-	6E-09	-	3E-09	-	2E-13	-	-	-	-	-	-	-	-	-	-	-	1E-06	-	9E-09	-	9E-09	-	-
PCB-167	-	1E-08	-	6E-09	-	4E-13	-	-	-	-	-	-	-	-	-	-	-	2E-06	-	2E-08	-	2E-08	-	-
PCB-169	-	2E-07	-	9E-08	-	6E-12	-	-	-	-	-	-	-	-	-	-	-	3E-05	-	2E-07	-	2E-07	-	-
PCB-189	-	2E-09	-	9E-10	-	6E-14	-	-	-	-	-	-	-	-	-	-	-	3E-07	-	2E-09	-	2E-09	-	-
PCB-77	-	1E-08	-	6E-09	-	4E-13	-	-	-	-	-	-	-	-	-	-	-	1E-06	-	2E-08	-	2E-08	-	-
PCB-81	-	6E-09	-	3E-09	-	2E-13	-	-	-	-	-	-	-	-	-	-	-	7E-07	-	9E-09	-	9E-09	-	-
Total PCB Congeners	-	5E-06	-	3E-06	-	2E-10	-	-	-	-	-	-	-	-	-	-	-	1E-03	-	9E-06	-	9E-06	-	-
Cumulative Risk	4.2E-01	5E-03	2.1E-01	3E-03	3.3E-05	2E-07	7.0E-02	1E-05	1.1E-03	1E-07	4.5E-05	8E-09	2.0E-06	3E-10	2.2E+00	3E-06	7.0E+00	2E-02	2.9E+00	8E-03	7.0E-01	8E-03	2.2E+00	3E-06
W/O Domestic Groundwater Use																			7.0E-01	8E-03			4.7E-05	9E-09

Notes:
Inhalation Indoor Air $_{s-gw}$ - Exposure associated with indoor air concentrations of COPCs modeled from soil vapor, soil, or groundwater.
Inhalation Ambient Air $_{s-gw}$ - Exposure associated with ambient air concentrations of COPCs modeled from soil or groundwater.
HQ - hazard quotient
HI - hazard index
Risk - incremental increased lifetime cancer risk
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyls
COPC - chemical of potential concern
"-" indicates that either adequate toxicity data were not available for a chemical or the exposure pathway was not applicable to that chemical.
HIs and cancer risks for PCB congeners. These results not included in cumulative risk estimates.

Table C2-9 (1 of 4)

Total Risk Estimates for the Child Resident
Old Conservation Yard RFI Site

Central Tendency Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation of Indoor Air$_s$		Inhalation Ambient Air$_s$		Inhalation of Indoor Air$_{gw}$		Inhalation Ambient Air$_{gw}$		Domestic Groundwater Use		Plant Consumption		Cumulative Risk		Soil Media Risk		Groundwater Risk	
	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)
Inorganic Compounds																								
Antimony	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Barium	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Boron	1.4E-04	-	2.3E-06	-	8.4E-08	-	-	-	-	-	-	-	-	-	-	-	7.4E-03	-	1.4E-04	-	1.4E-04	-	-	-
Cadmium	3.3E-03	1E-07	5.6E-06	2E-10	1.0E-05	7E-11	-	-	-	-	-	-	-	-	-	-	1.9E-02	6E-07	3.3E-03	1E-07	3.3E-03	1E-07	-	-
Copper	-	-	-	-	-	-	-	-	-	-	-	-	-	-	2.2E-02	-	-	-	2.2E-02	-	-	-	2.2E-02	-
Fluoride	-	-	-	-	-	-	-	-	-	-	-	-	-	-	4.5E-01	-	-	-	4.5E-01	-	-	-	4.5E-01	-
Lead	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Mercury	1.1E-02	-	1.8E-04	-	2.2E-06	-	-	-	-	-	-	-	-	-	-	-	9.6E-02	-	1.1E-02	-	1.1E-02	-	-	-
Nitrate	-	-	-	-	-	-	-	-	-	-	-	-	-	-	4.3E-01	-	-	-	4.3E-01	-	-	-	4.3E-01	-
Silver	1.1E-03	-	1.8E-05	-	-	-	-	-	-	-	-	-	-	-	-	-	3.4E-05	-	1.1E-03	-	1.1E-03	-	-	-
Thallium	6.9E-02	-	1.2E-03	-	-	-	-	-	-	-	-	-	-	-	3.2E-01	-	1.5E+00	-	3.9E-01	-	7.0E-02	-	3.2E-01	-
Zinc	1.4E-03	-	2.4E-05	-	7.4E-07	-	-	-	-	-	-	-	-	-	-	-	3.1E-02	-	1.4E-03	-	1.4E-03	-	-	-
VOCs																								
1,1,1-Trichloroethane	6.8E-08	-	1.2E-08	-	-	-	3.1E-04	-	5.4E-06	-	-	-	-	-	-	-	3.9E-05	-	3.2E-04	-	3.2E-04	-	-	-
1,1,2-Trichloro-1,2,2-trifluoroethane	2.6E-09	-	4.4E-10	-	-	-	4.0E-05	-	1.0E-06	-	-	-	-	-	-	-	6.1E-07	-	4.1E-05	-	4.1E-05	-	-	-
1,1-Dichloroethane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	2.5E-03	1E-07	-	-	2.5E-03	1E-07	-	-	2.5E-03	1E-07
1,1-Dichloroethene	4.0E-07	-	6.8E-08	-	-	-	1.0E-02	-	1.9E-04	-	-	-	-	-	-	-	3.7E-04	-	1.0E-02	-	1.0E-02	-	-	-
2-Butanone	2.4E-07	-	4.0E-08	-	-	-	-	-	-	-	-	-	-	-	-	-	2.5E-03	-	2.8E-07	-	2.8E-07	-	-	-
Acetone	2.5E-06	-	4.2E-07	-	-	-	-	-	-	-	-	-	-	-	1.7E-03	-	5.3E-02	-	1.7E-03	-	2.9E-06	-	1.7E-03	-
Benzene	1.8E-06	6E-11	3.0E-07	1E-11	-	-	2.1E-02	1E-06	3.1E-04	2E-08	-	-	-	-	1.4E-02	4E-07	1.7E-03	5E-08	3.5E-02	2E-06	2.1E-02	1E-06	1.4E-02	4E-07
Carbon disulfide	-	-	-	-	-	-	-	-	-	-	-	-	-	-	2.5E-03	-	-	-	2.5E-03	-	-	-	2.5E-03	-
Chloromethane	-	-	-	-	-	-	-	-	-	-	2.1E-05	-	1.4E-06	-	-	-	-	-	2.3E-05	-	-	-	2.3E-05	-
cis-1,2-Dichloroethene	-	-	-	-	-	-	-	-	-	-	2.4E-05	-	8.6E-07	-	4.9E-01	-	-	-	4.9E-01	-	-	-	4.9E-01	-
Ethylbenzene	7.2E-08	-	1.2E-08	-	-	-	2.6E-04	-	7.0E-06	-	-	-	-	-	-	-	1.8E-05	-	2.6E-04	-	2.6E-04	-	-	-
m,p-Xylene	1.0E-07	-	1.7E-08	-	-	-	5.6E-03	-	1.6E-04	-	-	-	-	-	-	-	2.6E-05	-	5.7E-03	-	5.7E-03	-	-	-
Methylene chloride	4.4E-06	3E-10	7.3E-07	5E-11	-	-	1.7E-03	5E-08	1.3E-03	4E-08	-	-	-	-	1.0E-03	7E-08	2.1E-02	1E-06	4.0E-03	2E-07	3.0E-03	1E-07	1.0E-03	7E-08
o-Xylene	2.5E-08	-	4.2E-09	-	-	-	1.2E-03	-	3.7E-05	-	-	-	-	-	-	-	6.1E-06	-	1.3E-03	-	1.3E-03	-	-	-
p-Isopropyltoluene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Toluene	1.2E-07	-	2.1E-08	-	-	-	1.1E-04	-	1.8E-06	-	-	-	-	-	2.2E-03	-	5.1E-05	-	2.3E-03	-	1.2E-04	-	2.2E-03	-
Trichloroethene	6.4E-05	2E-11	1.1E-05	3E-12	-	-	2.2E-03	2E-07	1.0E-04	1E-08	4.3E-05	4E-09	1.7E-06	2E-10	3.2E+00	1E-06	3.5E-02	1E-08	3.2E+00	1E-06	2.3E-03	2E-07	3.2E+00	1E-06
SVOCs																								
1-Methylnaphthalene	1.9E-05	-	4.2E-06	-	3.3E-10	-	-	-	-	-	-	-	-	-	-	-	1.7E-03	-	2.3E-05	-	2.3E-05	-	-	-
2-Methylnaphthalene	2.7E-04	-	5.9E-05	-	4.8E-09	-	-	-	-	-	-	-	-	-	-	-	2.5E-02	-	3.3E-04	-	3.3E-04	-	-	-
Acenaphthene	1.8E-05	-	3.9E-06	-	3.1E-10	-	-	-	-	-	-	-	-	-	-	-	1.4E-03	-	2.2E-05	-	2.2E-05	-	-	-
Acenaphthylene	8.6E-06	-	1.9E-06	-	1.5E-10	-	-	-	-	-	-	-	-	-	-	-	5.9E-04	-	1.0E-05	-	1.0E-05	-	-	-
Anthracene	2.5E-06	-	5.5E-07	-	4.4E-11	-	-	-	-	-	-	-	-	-	-	-	1.0E-04	-	3.1E-06	-	3.1E-06	-	-	-
Benzo(a)anthracene	-	2E-08	-	5E-09	-	1E-13	-	-	-	-	-	-	-	-	-	-	-	2E-07	-	3E-08	-	3E-08	-	-
Benzo(a)pyrene	-	2E-07	-	5E-08	-	1E-12	-	-	-	-	-	-	-	-	-	-	-	7E-07	-	3E-07	-	3E-07	-	-
Benzo(b)fluoranthene	-	3E-08	-	6E-09	-	2E-13	-	-	-	-	-	-	-	-	-	-	-	1E-07	-	3E-08	-	3E-08	-	-
Benzo(g,h,i)perylene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Benzo(k)fluoranthene	-	2E-08	-	5E-09	-	1E-13	-	-	-	-	-	-	-	-	-	-	-	1E-07	-	3E-08	-	3E-08	-	-
Chrysene	-	4E-09	-	8E-10	-	2E-14	-	-	-	-	-	-	-	-	-	-	-	3E-08	-	4E-09	-	4E-09	-	-
Dibenz(a,h)anthracene	-	5E-08	-	1E-08	-	1E-12	-	-	-	-	-	-	-	-	-	-	-	9E-08	-	7E-08	-	7E-08	-	-
Fluoranthene	1.4E-05	-	3.1E-06	-	2.5E-10	-	-	-	-	-	-	-	-	-	-	-	2.5E-04	-	1.8E-05	-	1.8E-05	-	-	-
Fluorene	2.7E-05	-	5.8E-06	-	4.7E-10	-	-	-	-	-	-	-	-	-	-	-	4.6E-04	-	3.3E-05	-	3.3E-05	-	-	-
Indeno(1,2,3-cd)pyrene	-	2E-08	-	4E-09	-	1E-13	-	-	-	-	-	-	-	-	-	-	-	2E-08	-	2E-08	-	2E-08	-	-
Naphthalene	2.0E-05	-	4.4E-06	-	8.1E-09	7E-14	-	-	-	-	-	-	-	-	-	-	3.8E-03	-	2.4E-05	7E-14	2.4E-05	7E-14	-	-
Perylene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Phenanthrene	9.4E-05	-	2.0E-05	-	1.6E-09	-	-	-	-	-	-	-	-	-	-	-	3.3E-03	-	1.1E-04	-	1.1E-04	-	-	-
Pyrene	1.9E-05	-	4.1E-06	-	3.3E-10	-	-	-	-	-	-	-	-	-	-	-	3.7E-04	-	2.3E-05	-	2.3E-05	-	-	-
Total Petroleum Hydrocarbons																								
C08-C11(Gasoline Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
C11-C14(Kerosene Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
C14-C20(Diesel Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
C20-C30(Lubricant Oil Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

Table C2-9 (2 of 4)

Total Risk Estimates for the Child Resident
Old Conservation Yard RFI Site

Central Tendency Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation of Indoor Air$_s$		Inhalation Ambient Air$_s$		Inhalation of Indoor Air$_{gw}$		Inhalation Ambient Air$_{gw}$		Domestic Groundwater Use		Plant Consumption		Cumulative Risk		Soil Media Risk		Groundwater Risk	
	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)
Dioxins																								
2,3,7,8-TCDD	-	7E-08	-	3E-09	-	1E-12	-	-	-	-	-	-	-	-	-	-	-	-	-	7E-08	-	7E-08	-	-
1,2,3,7,8-PeCDD	-	4E-07	-	2E-08	-	8E-12	-	-	-	-	-	-	-	-	-	-	-	-	-	5E-07	-	5E-07	-	-
1,2,3,4,7,8-HxCDD	-	1E-07	-	5E-09	-	2E-12	-	-	-	-	-	-	-	-	-	-	-	-	-	1E-07	-	1E-07	-	-
1,2,3,6,7,8-HxCDD	-	1E-07	-	7E-09	-	2E-12	-	-	-	-	-	-	-	-	-	-	-	-	-	1E-07	-	1E-07	-	-
1,2,3,7,8,9-HxCDD	-	1E-07	-	6E-09	-	2E-12	-	-	-	-	-	-	-	-	-	-	-	-	-	1E-07	-	1E-07	-	-
1,2,3,4,6,7,8-HpCDD	-	3E-07	-	2E-08	-	6E-12	-	-	-	-	-	-	-	-	-	-	-	-	-	3E-07	-	3E-07	-	-
OCDD	-	7E-08	-	4E-09	-	1E-12	-	-	-	-	-	-	-	-	-	-	-	-	-	8E-08	-	8E-08	-	-
2,3,7,8-TCDF	-	1E-08	-	7E-10	-	3E-13	-	-	-	-	-	-	-	-	-	-	-	-	-	2E-08	-	2E-08	-	-
1,2,3,7,8-PeCDF	-	4E-09	-	2E-10	-	6E-14	-	-	-	-	-	-	-	-	-	-	-	-	-	4E-09	-	4E-09	-	-
2,3,4,7,8-PeCDF	-	1E-07	-	5E-09	-	2E-12	-	-	-	-	-	-	-	-	-	-	-	-	-	1E-07	-	1E-07	-	-
1,2,3,4,7,8-HxCDF	-	9E-08	-	4E-09	-	2E-12	-	-	-	-	-	-	-	-	-	-	-	-	-	9E-08	-	9E-08	-	-
1,2,3,6,7,8-HxCDF	-	3E-08	-	2E-09	-	6E-13	-	-	-	-	-	-	-	-	-	-	-	-	-	3E-08	-	3E-08	-	-
2,3,4,6,7,8-HxCDF	-	3E-08	-	2E-09	-	6E-13	-	-	-	-	-	-	-	-	-	-	-	-	-	4E-08	-	4E-08	-	-
1,2,3,7,8,9-HxCDF	-	2E-08	-	8E-10	-	3E-13	-	-	-	-	-	-	-	-	-	-	-	-	-	2E-08	-	2E-08	-	-
1,2,3,4,6,7,8-HpCDF	-	4E-08	-	2E-09	-	6E-13	-	-	-	-	-	-	-	-	-	-	-	-	-	4E-08	-	4E-08	-	-
1,2,3,4,7,8,9-HpCDF	-	5E-09	-	2E-10	-	8E-14	-	-	-	-	-	-	-	-	-	-	-	-	-	5E-09	-	5E-09	-	-
OCDF	-	4E-09	-	2E-10	-	6E-14	-	-	-	-	-	-	-	-	-	-	-	-	-	4E-09	-	4E-09	-	-
PCBs																								
Aroclor-1248	-	5E-04	-	1E-04	-	9E-09	-	-	-	-	-	-	-	-	-	-	-	-	-	6E-04	-	6E-04	-	-
Aroclor-1254	3.9E-01	1E-06	9.2E-02	3E-07	6.9E-06	2E-11	-	-	-	-	-	-	-	-	-	-	1.4E+00	4E-06	4.8E-01	2E-06	4.8E-01	2E-06	-	-
Aroclor-1260	-	1E-05	-	3E-06	-	2E-10	-	-	-	-	-	-	-	-	-	-	-	2E-05	-	2E-05	-	2E-05	-	-
PCB-105	-	2E-09	-	5E-10	-	4E-14	-	-	-	-	-	-	-	-	-	-	-	8E-09	-	3E-09	-	3E-09	-	-
PCB-114	-	4E-11	-	1E-11	-	7E-16	-	-	-	-	-	-	-	-	-	-	-	1E-10	-	5E-11	-	5E-11	-	-
PCB-118	-	4E-09	-	1E-09	-	8E-14	-	-	-	-	-	-	-	-	-	-	-	2E-08	-	6E-09	-	6E-09	-	-
PCB-123	-	6E-11	-	1E-11	-	1E-15	-	-	-	-	-	-	-	-	-	-	-	2E-10	-	8E-11	-	8E-11	-	-
PCB-126	-	6E-07	-	1E-07	-	1E-11	-	-	-	-	-	-	-	-	-	-	-	2E-06	-	7E-07	-	7E-07	-	-
PCB-156	-	1E-09	-	3E-10	-	3E-14	-	-	-	-	-	-	-	-	-	-	-	5E-09	-	2E-09	-	2E-09	-	-
PCB-157	-	7E-10	-	2E-10	-	1E-14	-	-	-	-	-	-	-	-	-	-	-	2E-09	-	8E-10	-	8E-10	-	-
PCB-167	-	1E-09	-	3E-10	-	2E-14	-	-	-	-	-	-	-	-	-	-	-	4E-09	-	1E-09	-	1E-09	-	-
PCB-169	-	2E-08	-	4E-09	-	3E-13	-	-	-	-	-	-	-	-	-	-	-	6E-08	-	2E-08	-	2E-08	-	-
PCB-189	-	2E-10	-	4E-11	-	3E-15	-	-	-	-	-	-	-	-	-	-	-	6E-10	-	2E-10	-	2E-10	-	-
PCB-77	-	1E-09	-	3E-10	-	2E-14	-	-	-	-	-	-	-	-	-	-	-	2E-09	-	1E-09	-	1E-09	-	-
PCB-81	-	6E-10	-	1E-10	-	1E-14	-	-	-	-	-	-	-	-	-	-	-	1E-09	-	8E-10	-	8E-10	-	-
Total PCB Congeners	-	6E-07	-	1E-07	-	1E-11	-	-	-	-	-	-	-	-	-	-	-	2E-06	-	7E-07	-	7E-07	-	-
Cumulative Risk	4.8E-01	5E-04	9.4E-02	1E-04	2.0E-05	9E-09	4.2E-02	2E-06	2.1E-03	7E-08	8.9E-05	4E-09	4.0E-06	2E-10	4.9E+00	2E-06	3.2E+00	3E-05	5.5E+00	7E-04	6.2E-01	7E-04	4.9E+00	2E-06
W/O Domestic Groundwater Use																			6.2E-01	7E-04			9.3E-05	4E-09

Table C2-9 (3 of 4)

Total Risk Estimates for the Child Resident
Old Conservation Yard RFI Site

Reasonable Maximum Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation of Indoor Air$_s$		Inhalation Ambient Air$_s$		Inhalation of Indoor Air$_{gw}$		Inhalation Ambient Air$_{gw}$		Domestic Groundwater Use		Plant Consumption		Cumulative Risk		Soil Media Risk		Groundwater Risk	
	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)
Inorganic Compounds																								
Antimony	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Barium	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Boron	3.4E-04	-	9.4E-06	-	1.5E-07	-	-	-	-	-	-	-	-	-	-	-	9.0E-03	-	3.5E-04	-	3.5E-04	-	-	-
Cadmium	1.3E-02	4E-07	3.6E-05	1E-09	2.9E-05	2E-10	-	-	-	-	-	-	-	-	-	-	3.7E-02	2E-05	1.3E-02	4E-07	1.3E-02	4E-07	-	-
Copper	-	-	-	-	-	-	-	-	-	-	-	-	-	-	3.6E-02	-	-	-	3.6E-02	-	-	-	3.6E-02	-
Fluoride	-	-	-	-	-	-	-	-	-	-	-	-	-	-	7.5E-01	-	-	-	7.5E-01	-	-	-	7.5E-01	-
Lead	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Mercury	1.4E-01	-	3.9E-03	-	2.1E-05	-	-	-	-	-	-	-	-	-	-	-	6.2E-01	-	1.4E-01	-	1.4E-01	-	-	-
Nitrate	-	-	-	-	-	-	-	-	-	-	-	-	-	-	7.1E-01	-	-	-	7.1E-01	-	-	-	7.1E-01	-
Silver	4.6E-03	-	1.3E-04	-	-	-	-	-	-	-	-	-	-	-	-	-	7.1E-05	-	4.7E-03	-	4.7E-03	-	-	-
Thallium	2.7E-01	-	7.6E-03	-	-	-	-	-	-	-	-	-	-	-	5.4E-01	-	3.0E+00	-	8.2E-01	-	2.8E-01	-	5.4E-01	-
Zinc	3.1E-03	-	8.8E-05	-	1.2E-06	-	-	-	-	-	-	-	-	-	-	-	3.5E-02	-	3.2E-03	-	3.2E-03	-	-	-
VOCs																								
1,1,1-Trichloroethane	2.5E-07	-	7.0E-08	-	-	-	5.8E-04	-	8.1E-06	-	-	-	-	-	-	-	7.1E-05	-	5.9E-04	-	5.9E-04	-	-	-
1,1,2-Trichloro-1,2,2-trifluoroethane	8.7E-09	-	2.4E-09	-	-	-	1.1E-04	-	1.6E-06	-	-	-	-	-	-	-	1.0E-06	-	1.1E-04	-	1.1E-04	-	-	-
1,1-Dichloroethane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	4.2E-03	2E-07	-	-	4.2E-03	2E-07	-	-	4.2E-03	2E-07
1,1-Dichloroethene	1.4E-06	-	3.9E-07	-	-	-	1.9E-02	-	2.8E-04	-	-	-	-	-	-	-	6.4E-04	-	1.9E-02	-	1.9E-02	-	-	-
2-Butanone	2.3E-07	-	6.6E-08	-	-	-	-	-	-	-	-	-	-	-	-	-	1.3E-03	-	3.0E-07	-	3.0E-07	-	-	-
Acetone	5.0E-05	-	1.4E-05	-	-	-	-	-	-	-	-	-	-	-	2.8E-03	-	5.3E-01	-	2.9E-03	-	6.4E-05	-	2.8E-03	-
Benzene	7.9E-06	3E-10	2.2E-06	7E-11	-	-	3.1E-02	2E-06	4.6E-04	3E-08	-	-	-	-	2.3E-02	7E-07	3.6E-03	2E-06	5.5E-02	3E-06	3.2E-02	2E-06	2.3E-02	7E-07
Carbon disulfide	-	-	-	-	-	-	-	-	-	-	-	-	-	-	4.2E-03	-	-	-	4.2E-03	-	-	-	4.2E-03	-
Chloromethane	-	-	-	-	-	-	-	-	-	-	3.2E-05	-	2.1E-06	-	-	-	-	-	3.4E-05	-	-	-	3.4E-05	-
cis-1,2-Dichloroethene	-	-	-	-	-	-	-	-	-	-	3.7E-05	-	1.3E-06	-	8.2E-01	-	-	-	8.2E-01	-	-	-	8.2E-01	-
Ethylbenzene	3.2E-07	-	8.9E-08	-	-	-	7.7E-04	-	1.0E-05	-	-	-	-	-	-	-	3.9E-05	-	7.8E-04	-	7.8E-04	-	-	-
m,p-Xylene	4.6E-07	-	1.3E-07	-	-	-	1.7E-02	-	2.4E-04	-	-	-	-	-	-	-	5.7E-05	-	1.7E-02	-	1.7E-02	-	-	-
Methylene chloride	5.2E-05	4E-09	1.5E-05	1E-09	-	-	1.2E-01	4E-06	2.0E-03	6E-08	-	-	-	-	1.7E-03	1E-07	1.2E-01	1E-04	1.3E-01	4E-06	1.3E-01	4E-06	1.7E-03	1E-07
o-Xylene	1.1E-07	-	3.0E-08	-	-	-	3.7E-03	-	5.5E-05	-	-	-	-	-	-	-	1.3E-05	-	3.8E-03	-	3.8E-03	-	-	-
p-Isopropyltoluene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Toluene	5.7E-07	-	1.6E-07	-	-	-	1.9E-04	-	2.7E-06	-	-	-	-	-	3.6E-03	-	1.2E-04	-	3.8E-03	-	1.9E-04	-	3.6E-03	-
Trichloroethene	2.3E-04	7E-11	6.6E-05	2E-11	-	-	1.1E-02	1E-06	1.5E-04	1E-08	6.5E-05	6E-09	2.6E-06	2E-10	5.3E+00	2E-06	6.5E-02	3E-07	5.3E+00	3E-06	1.1E-02	1E-06	5.3E+00	2E-06
SVOCs																								
1-Methylnaphthalene	4.3E-05	-	1.6E-05	-	5.6E-10	-	-	-	-	-	-	-	-	-	-	-	1.9E-03	-	5.8E-05	-	5.8E-05	-	-	-
2-Methylnaphthalene	1.8E-03	-	6.5E-04	-	2.3E-08	-	-	-	-	-	-	-	-	-	-	-	8.1E-02	-	2.4E-03	-	2.4E-03	-	-	-
Acenaphthene	1.5E-04	-	5.4E-05	-	2.0E-09	-	-	-	-	-	-	-	-	-	-	-	5.8E-03	-	2.0E-04	-	2.0E-04	-	-	-
Acenaphthylene	6.1E-05	-	2.2E-05	-	7.9E-10	-	-	-	-	-	-	-	-	-	-	-	2.1E-03	-	8.3E-05	-	8.3E-05	-	-	-
Anthracene	2.0E-05	-	7.3E-06	-	2.6E-10	-	-	-	-	-	-	-	-	-	-	-	4.1E-04	-	2.7E-05	-	2.7E-05	-	-	-
Benzo(a)anthracene	-	2E-07	-	8E-08	-	1E-12	-	-	-	-	-	-	-	-	-	-	-	1E-05	-	3E-07	-	3E-07	-	-
Benzo(a)pyrene	-	2E-06	-	8E-07	-	9E-12	-	-	-	-	-	-	-	-	-	-	-	5E-05	-	3E-06	-	3E-06	-	-
Benzo(e)pyrene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Benzo(b)fluoranthene	-	2E-07	-	9E-08	-	1E-12	-	-	-	-	-	-	-	-	-	-	-	6E-06	-	3E-07	-	3E-07	-	-
Benzo(g,h,i)perylene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Benzo(k)fluoranthene	-	2E-07	-	8E-08	-	9E-13	-	-	-	-	-	-	-	-	-	-	-	8E-06	-	3E-07	-	3E-07	-	-
Chrysene	-	3E-08	-	1E-08	-	1E-13	-	-	-	-	-	-	-	-	-	-	-	2E-06	-	4E-08	-	4E-08	-	-
Dibenz(a,h)anthracene	-	4E-07	-	2E-07	-	6E-12	-	-	-	-	-	-	-	-	-	-	-	5E-06	-	6E-07	-	6E-07	-	-
Fluoranthene	1.4E-04	-	5.0E-05	-	1.8E-09	-	-	-	-	-	-	-	-	-	-	-	1.2E-03	-	1.9E-04	-	1.9E-04	-	-	-
Fluorene	2.2E-04	-	8.1E-05	-	2.9E-09	-	-	-	-	-	-	-	-	-	-	-	1.9E-03	-	3.0E-04	-	3.0E-04	-	-	-
Indeno(1,2,3-cd)pyrene	-	2E-07	-	7E-08	-	9E-13	-	-	-	-	-	-	-	-	-	-	-	1E-06	-	3E-07	-	3E-07	-	-
Naphthalene	1.0E-04	-	3.6E-05	-	3.1E-08	3E-13	-	-	-	-	-	-	-	-	-	-	9.6E-03	-	1.4E-04	3E-13	1.4E-04	3E-13	-	-
Phenanthrene	7.9E-04	-	2.9E-04	-	1.0E-08	-	-	-	-	-	-	-	-	-	-	-	1.4E-02	-	1.1E-03	-	1.1E-03	-	-	-
Perylene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Pyrene	1.6E-04	-	5.8E-05	-	2.1E-09	-	-	-	-	-	-	-	-	-	-	-	1.5E-03	-	2.2E-04	-	2.2E-04	-	-	-
Total Petroleum Hydrocarbons																								
C08-C11(Gasoline Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
C11-C14(Kerosene Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
C14-C20(Diesel Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
C20-C30(Lubricant Oil Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

Table C2-9 (4 of 4)

Total Risk Estimates for the Child Resident
Old Conservation Yard RFI Site

Reasonable Maximum Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation of Indoor Air$_s$		Inhalation Ambient Air$_s$		Inhalation of Indoor Air$_{gw}$		Inhalation Ambient Air$_{gw}$		Domestic Groundwater Use		Plant Consumption		Cumulative Risk		Soil Media Risk		Groundwater Risk	
	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)
Dioxins																								
2,3,7,8-TCDD	-	2E-07	-	2E-08	-	3E-12	-	-	-	-	-	-	-	-	-	-	-	-	-	3E-07	-	3E-07	-	-
1,2,3,7,8-PeCDD	-	7E-06	-	6E-07	-	9E-11	-	-	-	-	-	-	-	-	-	-	-	-	-	7E-06	-	7E-06	-	-
1,2,3,4,7,8-HxCDD	-	7E-07	-	6E-08	-	9E-12	-	-	-	-	-	-	-	-	-	-	-	-	-	8E-07	-	8E-07	-	-
1,2,3,6,7,8-HxCDD	-	1E-06	-	1E-07	-	2E-11	-	-	-	-	-	-	-	-	-	-	-	-	-	1E-06	-	1E-06	-	-
1,2,3,7,8,9-HxCDD	-	1E-06	-	1E-07	-	2E-11	-	-	-	-	-	-	-	-	-	-	-	-	-	1E-06	-	1E-06	-	-
1,2,3,4,6,7,8-HpCDD	-	4E-06	-	3E-07	-	5E-11	-	-	-	-	-	-	-	-	-	-	-	-	-	4E-06	-	4E-06	-	-
OCDD	-	3E-07	-	3E-08	-	4E-12	-	-	-	-	-	-	-	-	-	-	-	-	-	4E-07	-	4E-07	-	-
2,3,7,8-TCDF	-	1E-07	-	1E-08	-	2E-12	-	-	-	-	-	-	-	-	-	-	-	-	-	1E-07	-	1E-07	-	-
1,2,3,7,8-PeCDF	-	4E-08	-	3E-09	-	5E-13	-	-	-	-	-	-	-	-	-	-	-	-	-	4E-08	-	4E-08	-	-
2,3,4,7,8-PeCDF	-	1E-06	-	1E-07	-	2E-11	-	-	-	-	-	-	-	-	-	-	-	-	-	1E-06	-	1E-06	-	-
1,2,3,4,7,8-HxCDF	-	8E-07	-	7E-08	-	1E-11	-	-	-	-	-	-	-	-	-	-	-	-	-	9E-07	-	9E-07	-	-
1,2,3,6,7,8-HxCDF	-	1E-07	-	1E-08	-	2E-12	-	-	-	-	-	-	-	-	-	-	-	-	-	1E-07	-	1E-07	-	-
2,3,4,6,7,8-HxCDF	-	4E-07	-	3E-08	-	5E-12	-	-	-	-	-	-	-	-	-	-	-	-	-	4E-07	-	4E-07	-	-
1,2,3,7,8,9-HxCDF	-	1E-07	-	1E-08	-	2E-12	-	-	-	-	-	-	-	-	-	-	-	-	-	1E-07	-	1E-07	-	-
1,2,3,4,6,7,8-HpCDF	-	2E-07	-	1E-08	-	2E-12	-	-	-	-	-	-	-	-	-	-	-	-	-	2E-07	-	2E-07	-	-
1,2,3,4,7,8,9-HpCDF	-	4E-08	-	3E-09	-	5E-13	-	-	-	-	-	-	-	-	-	-	-	-	-	4E-08	-	4E-08	-	-
OCDF	-	2E-08	-	1E-09	-	2E-13	-	-	-	-	-	-	-	-	-	-	-	-	-	2E-08	-	2E-08	-	-
PCBs																								
Aroclor-1248	-	1E-02	-	4E-03	-	1E-07	-	-	-	-	-	-	-	-	-	-	-	-	-	2E-02	-	2E-02	-	-
Aroclor-1254	3.5E+00	1E-05	1.4E+00	4E-06	4.5E-05	1E-10	-	-	-	-	-	-	-	-	-	-	6.0E+00	3E-04	4.8E+00	2E-05	4.8E+00	2E-05	-	-
Aroclor-1260	-	3E-04	-	1E-04	-	4E-09	-	-	-	-	-	-	-	-	-	-	-	4E-03	-	4E-04	-	4E-04	-	-
PCB-105	-	5E-08	-	2E-08	-	6E-13	-	-	-	-	-	-	-	-	-	-	-	1E-06	-	7E-08	-	7E-08	-	-
PCB-114	-	8E-10	-	3E-10	-	1E-14	-	-	-	-	-	-	-	-	-	-	-	2E-08	-	1E-09	-	1E-09	-	-
PCB-118	-	9E-08	-	4E-08	-	1E-12	-	-	-	-	-	-	-	-	-	-	-	2E-06	-	1E-07	-	1E-07	-	-
PCB-123	-	1E-09	-	5E-10	-	2E-14	-	-	-	-	-	-	-	-	-	-	-	3E-08	-	2E-09	-	2E-09	-	-
PCB-126	-	1E-05	-	5E-06	-	2E-10	-	-	-	-	-	-	-	-	-	-	-	3E-04	-	2E-05	-	2E-05	-	-
PCB-156	-	3E-08	-	1E-08	-	4E-13	-	-	-	-	-	-	-	-	-	-	-	8E-07	-	4E-08	-	4E-08	-	-
PCB-157	-	1E-08	-	6E-09	-	2E-13	-	-	-	-	-	-	-	-	-	-	-	4E-07	-	2E-08	-	2E-08	-	-
PCB-167	-	2E-08	-	1E-08	-	3E-13	-	-	-	-	-	-	-	-	-	-	-	6E-07	-	3E-08	-	3E-08	-	-
PCB-169	-	4E-07	-	1E-07	-	5E-12	-	-	-	-	-	-	-	-	-	-	-	9E-06	-	5E-07	-	5E-07	-	-
PCB-189	-	4E-09	-	1E-09	-	5E-14	-	-	-	-	-	-	-	-	-	-	-	9E-08	-	5E-09	-	5E-09	-	-
PCB-77	-	2E-08	-	1E-08	-	3E-13	-	-	-	-	-	-	-	-	-	-	-	4E-07	-	3E-08	-	3E-08	-	-
PCB-81	-	1E-08	-	5E-09	-	2E-13	-	-	-	-	-	-	-	-	-	-	-	2E-07	-	2E-08	-	2E-08	-	-
Total PCB Congeners	-	1E-05	-	5E-06	-	2E-10	-	-	-	-	-	-	-	-	-	-	-	3E-04	-	2E-05	-	2E-05	-	-
Cumulative Risk	3.9E+00	1E-02	1.4E+00	5E-03	9.7E-05	2E-07	2.1E-01	7E-06	3.2E-03	1E-07	1.3E-04	6E-09	5.9E-06	2E-10	8.2E+00	3E-06	1.1E+01	4E-03	1.4E+01	2E-02	5.5E+00	2E-02	8.2E+00	3E-06
W/O Domestic Groundwater Use																			5.5E+00	2E-02			1.4E-04	6E-09

Notes:
Inhalation Indoor Air $_{s\text{-}gw}$ - Exposure associated with indoor air concentrations of COPCs modeled from soil vapor, soil, or groundwater.
Inhalation Ambient Air $_{s\text{-}gw}$ - Exposure associated with ambient air concentrations of COPCs modeled from soil or groundwater.
HQ - hazard quotient
HI - hazard index
Risk - incremental increased lifetime cancer risk
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyls
COPC - chemical of potential concern
"-" indicates that either adequate toxicity data were not available for a chemical or the exposure pathway was not applicable to that chemical.

Table C2-10 (1 of 1)

Estimated Blood Lead Levels
Old Conservation Yard RFI Site

Exposure Scenario	Percentile Estimate of Blood Lead Concentration (µg/dl)				
	50th	90th	95th	98th	99th
Central Tendency Exposure					
Adult Worker	0.87	1.6	1.9	2.3	2.6
Adult Recreator	0.85	1.5	1.8	2.2	2.5
Child Recreator	1.0	1.8	2.1	2.6	2.9
Adult Resident	0.88	1.6	1.9	2.3	2.6
Child Resident	1.1	2.1	2.4	3.0	3.4
Reasonable Maximum Exposure					
Adult Worker	1.0	1.8	2.2	2.6	3.0
Adult Recreator	0.95	1.73	2.0	2.5	2.8
Child Recreator	1.2	2.1	2.5	3.0	3.4
Adult Resident	1.01	1.8	2.2	2.6	3.0
Child Resident	1.4	2.5	3.0	3.7	4.2

Notes:

Blood lead concentrations estimated using the DTSC LeadSpread Model, Version 7, and incorporation of site-specific exposure parameters specified in the SRAM for skin surface area, soil adherence factor, soil ingestion rate, inhalation rate, drinking water consumption rate, and homegrown edible plant consumption rate.

µg/dl - micrograms per deciliter

Table C2-11 (1 of 1)

Human Health Risk Assessment Uncertainty Analysis
Old Conservation Yard RFI Site

Assessment Element	Uncertainty	Magnitude of Impact	Direction of Impact
COPC Selection	A number of inorganics (e.g., antimony, barium, copper) that were demonstrated to be consistent with background concentrations through Wilcoxon Rank Sum test were included as COPCs because the maximum detected concentrations were substantially above the maximum detected background concentration, and were located in areas of suspected metals impacts.	Moderate	Conservative
Exposure Pathways	Risks associated with drinking of groundwater are not realistic because the groundwater beneath the SSFL is not currently used as a drinking water source and the presence of the contamination will likely require a restriction on its future use as well.	High	Conservative
	Groundwater monitoring data and comparison concentrations (i.e., background) are filtered samples (i.e., dissolved concentrations) as per agency-approved groundwater monitoring work plan. Although dissolved concentrations represent the concentrations that may migrate, the total concentration in groundwater may be greater when there are significant amount of suspended solids present (i.e., total concentration).	Moderate	Realistic
	Future land use of the site is currently undecided but may be commercial or recreational, which have lower risks than residential.	Moderate	Uncertain
EPC Calculations	The extrapolation of soil TPH concentrations to individual petroleum constituent (i.e., PAHs) concentrations introduces some uncertainty into the EPC estimates for petroleum constituents.	Low	Conservative
	In cases where BTEX compounds (e.g., benzene) were not detected but were extrapolated, the estimated EPC is considered conservative.	Low	Conservative
	The extrapolation of soil TPH concentrations to individual petroleum constituent (i.e., BTEX), extrapolations were conducted on a dataset containing elevated detection limits. Therefore, the estimated EPCs are considered conservative.	Moderate	Conservative
	Soil matrix COPC methylene chloride, significant risks are estimated associated with vapor concentrations related to 1/2 the DL though the chemical was not detected in soil vapor.	Low	Conservative
	The 95% UCL concentration of some chemicals is greater than the maximum concentration, therefore the maximum was used as the EPC. This is considered to be a likely overestimation of the representative exposure point concentration because samples were collected in areas with the highest likelihood to detect the highest concentrations at the site.	Moderate	Conservative
	The maximum detected concentration of each COPC detected in groundwater was used as the EPC.	Moderate	Conservative
	Vapor migration into indoor air has been estimated using a model which is being validated for the site. Migration estimates may be changed once the model validation is complete.	Moderate	Uncertain
Cancer Slope Factor	Extrapolation of dose-response data from laboratory animals to humans.	High	Conservative
	Assumes that all carcinogens do not have a threshold below which carcinogenic response occurs, and therefore, any dose, no matter how small, results in some potential risk.	Moderate	Conservative
	Cancer slope factors derived from animal studies are the upper-bound maximum likelihood estimates based on a linear dose-response curve, and therefore, overstate carcinogenic potency.	Moderate	Conservative
Reference Dose	High degree of uncertainty in extrapolation of dose-response data from laboratory animals to humans.	High	Conservative

Notes:
COPC - chemical of potential concern
PAH - polycyclic aromatic hydrocarbon
TPH - total petroleum hydrocarbons
BTEX - benzene, toluene, ethylbenzene, and xylenes
EPC - exposure point concentration
UCL - upper confidence limit
HRA - human health risk assessment
DL - detection limit

Table C2-12 (1 of 2)

Summary of Chemicals of Potential Ecological Concern
Old Conservation Yard RFI Site

Chemical	Soil (0 to 2 feet bgs)	Soil (0 to 4 feet bgs)	Soil (0 to 6 feet bgs)	Soil Vapor (0 to 6 feet bgs)
Inorganic Compounds				
Antimony	X	X	X	
Barium	X	X	X	
Boron	X	X	X	
Cadmium	X	X	X	
Copper			X	
Lead	X	X	X	
Mercury	X	X	X	
Silver	X	X	X	
Thallium	X	X	X	
Zinc	X	X	X	
VOCs				
1,1,1-Trichloroethane	X	X	X	X
1,1,2-Trichloro-1,2,2-trifluoroethane	X	X	X	X
1,1-Dichloroethene	X	X	X	X
2-Butanone	X	X	X	
Acetone	X	X	X	
Benzene	X	X	X	X
Ethylbenzene	X	X	X	X
m,p-Xylene	X	X	X	X
Methylene chloride	X	X	X	X
o-Xylene	X	X	X	X
p-Isopropyltoluene	X	X	X	X
Toluene	X	X	X	X
Trichloroethene	X	X	X	X
Xylenes (total)	X	X	X	X
SVOCs				
1-Methylnaphthalene	X	X	X	
2,4-Dinitrophenol	X	X	X	
2-Methylnaphthalene	X	X	X	
Acenaphthene	X	X	X	
Acenaphthylene	X	X	X	
Anthracene	X	X	X	
Benzo(a)anthracene	X	X	X	
Benzo(a)pyrene	X	X	X	
Benzo(b)fluoranthene	X	X	X	
Benzo(e)pyrene	X	X	X	
Benzo(g,h,i)perylene	X	X	X	
Benzo(k)fluoranthene	X	X	X	
Chrysene	X	X	X	
Dibenz(a,h)anthracene	X	X	X	
Fluoranthene	X	X	X	
Fluorene	X	X	X	
Indeno(1,2,3-cd)pyrene	X	X	X	
Naphthalene	X	X	X	
Perylene	X	X	X	
Phenanthrene	X	X	X	
Pyrene	X	X	X	
Total Petroleum Hydrocarbons				
C08-C11(Gasoline Range)	X	X	X	
C11-C14(Kerosene Range)	X	X	X	

Table C2-12 (2 of 2)

Summary of Chemicals of Potential Ecological Concern
Old Conservation Yard RFI Site

Chemical	Soil (0 to 2 feet bgs)	Soil (0 to 4 feet bgs)	Soil (0 to 6 feet bgs)	Soil Vapor (0 to 6 feet bgs)
C14-C20(Diesel Range)	X	X	X	
C20-C30(Lubricant Oil Range)	X	X	X	
Dioxins				
2,3,7,8-TCDD	X	X	X	
1,2,3,7,8-PeCDD	X	X	X	
1,2,3,4,7,8-HxCDD	X	X	X	
1,2,3,6,7,8-HxCDD	X	X	X	
1,2,3,7,8,9-HxCDD	X	X	X	
1,2,3,4,6,7,8-HpCDD	X	X	X	
OCDD	X	X	X	
2,3,7,8-TCDF	X	X	X	
1,2,3,7,8-PeCDF	X	X	X	
2,3,4,7,8-PeCDF	X	X	X	
1,2,3,4,7,8-HxCDF	X	X	X	
1,2,3,6,7,8-HxCDF	X	X	X	
2,3,4,6,7,8-HxCDF	X	X	X	
1,2,3,7,8,9-HxCDF	X	X	X	
1,2,3,4,6,7,8-HpCDF	X	X	X	
1,2,3,4,7,8,9-HpCDF	X	X	X	
OCDF	X	X	X	
PCBs				
Aroclor-1248	X	X	X	
Aroclor-1254	X	X	X	
Aroclor-1260	X	X	X	
PCB-105	X	X	X	
PCB-114	X	X	X	
PCB-118	X	X	X	
PCB-123	X	X	X	
PCB-126	X	X	X	
PCB-156	X	X	X	
PCB-157	X	X	X	
PCB-167	X	X	X	
PCB-169	X	X	X	
PCB-189	X	X	X	
PCB-77	X	X	X	
PCB-81	X	X	X	

Notes:
X - selected as a chemical of potential ecological concern
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyl
CPEC - chemical of potential ecological concern
bgs - below ground surface

Table C2-13 (1 of 1)

Ecological Risk Assessment Conceptual Site Model
Old Conservation Yard RFI Site

NOTES:
(*) Trophic Level: P = primary producers (e.g., plants); D = detrivores (e.g., invertabrates); 1 = 1st consumer (e.g., mule deer); 2 = 2nd consumer (e.g. deer mouse); 3 = 3rd consumer (e.g., red-tailed hawk).
(**) Exposure limited to volatile compounds as defined in the text.
(***) Exposures limited to bioacummulative compounds as defined in the text.

- complete and potentially complete exposure pathways evaluated in this risk assessment

- incomplete exposure pathways not evaluated in this risk assessment

- minor exposure pathway not evaluated in this risk assessment

Table C2-14 (1 of 3)

Baseline Toxicity Criteria for Ecological Risk Assessment
Old Conservation Yard RFI Site

Chemical	Mammalian Scaling Factor[a]	Small Mammal TRV (mg/kg-day)	Small Mammal Scaling Used?[b]	Source	Small Mammal RfC (mg/m^3)	Source	Bobcat TRV[b] (mg/kg-day)	Bobcat Scaling Used?	Mule Deer TRV[b] (mg/kg-day)	Mule Deer Scaling Used?	Avian TRV (mg/kg-day)	Source
Inorganic Compounds												
Antimony	0.94	1	No	c	-	-	1	Yes	1	Yes	-	-
Barium	0.746	5	No	a	-	-	-	-	-	-	20.8	a
Boron	0.94	-	-	a	-	-	-	-	-	-	-	a
Cadmium	0.44	1.0	No	s	-	-	1.0	No	0.047	Yes	0.08	a
Copper	0.94	-	-	a	-	-	-	-	-	-	-	a
Lead	0.94	1.0	No	g	-	-	-	-	0.7	Yes	0.014	e
Thallium	0.81	-	-	j	-	-	-	-	-	-	-	-
Zinc	0.85	120	No	k	-	-	120	No	53	Yes	14.5	g
VOCs												
1,1,1-Trichloroethane	0.65	-	-	g	1111	g	-	-	-	-	-	-
1,1,2-Trichloro-1,2,2-trifluoroethane	0.94	-	-	g	55	g	-	-	-	-	-	-
1,1-Dichloroethene	1.54	-	-	g	0.077	n	-	-	-	-	-	-
2-Butanone	0.94	-	-	a	1968	b	-	-	-	-	-	NA
Acetone	1.128	-	-	a	11	b	-	-	-	-	-	a
Benzene	0.818	-	-	a	88	b	-	-	-	-	-	NA
Ethylbenzene	0.94	97	No	t	60	u	-	-	-	-	-	NA
m,p-Xylene	0.94	-	-	a	15	v	-	-	-	-	-	NA
Methylene chloride	0.813	-	-	a	6.5	g	-	-	-	-	-	NA
o-Xylene	0.94	-	-	a	15	v	-	-	-	-	-	NA
p-Isopropyltoluene	0.94	-	-	a	33	b	-	-	-	-	-	NA
Toluene	0.94	-	-	n	219	w	-	-	-	-	-	NA
Trichloroethene	1.11	-	-	g	1736	x	-	-	-	-	-	-
Xylenes (total)	0.94	-	-	a	15	u	-	-	-	-	-	NA
SVOCs												
1-Methylnaphthalene	0.94	-	-	a	-	-	-	-	-	-	-	NA
2,4-Dinitrophenol	0.94	-	-	p	-	-	-	-	-	-	0.133	a
2-Methylnaphthalene	0.94	-	-	a	-	-	-	-	-	-	-	NA
Acenaphthene	0.94	-	-	g	-	-	-	-	-	-	-	g
Acenaphthylene	0.94	-	-	g	-	-	-	-	-	-	-	NA
Anthracene	0.94	-	-	g	-	-	-	-	-	-	-	g
Benzo(a)anthracene	0.94	-	-	g	-	-	-	-	-	-	-	NA
Benzo(a)pyrene	0.94	-	-	g	-	-	-	-	-	-	-	NA
Benzo(b)fluoranthene	0.94	-	-	g	-	-	-	-	-	-	-	NA
Benzo(e)pyrene	NA	-	-	NA	-	-	-	-	-	-	-	NA
Benzo(g,h,i)perylene	0.94	-	-	g	-	-	-	-	-	-	-	NA
Benzo(k)fluoranthene	0.94	-	-	g	-	-	-	-	-	-	-	NA
Chrysene	0.94	-	-	g	-	-	-	-	-	-	-	NA

Table C2-14 (2 of 3)

Baseline Toxicity Criteria for Ecological Risk Assessment
Old Conservation Yard RFI Site

Chemical	Mammalian Scaling Factor[a]	Small Mammal TRV (mg/kg-day)	Small Mammal Scaling Used?[b]	Source	Small Mammal RfC (mg/m^3)	Source	Bobcat TRV[b] (mg/kg-day)	Bobcat Scaling Used?	Mule Deer TRV[b] (mg/kg-day)	Mule Deer Scaling Used?	Avian TRV (mg/kg-day)	Source
Dibenz(a,h)anthracene	0.94	-	-	g	-	-	-	-	-	-	-	NA
Fluoranthene	0.94	-	-	g	-	-	-	-	-	-	-	NA
Fluorene	0.94	-	-	g	-	-	-	-	-	-	-	g
Indeno(1,2,3-cd)pyrene	0.94	-	-	g	-	-	-	-	-	-	-	NA
Naphthalene	0.94	-	-	a	-	-	-	-	-	-	-	NA
Perylene	NA	-	-	NA	-	-	-	-	-	-	-	NA
Phenanthrene	0.94	-	-	g	-	-	-	-	-	-	1.13	g
Pyrene	0.94	-	-	o	-	-	-	-	-	-	-	NA
Total Petroleum Hydrocarbons												
C08-C11(Gasoline Range)	0.94	-	-	NA	-	-	-	-	-	-	-	NA
C11-C14(Kerosene Range)	0.94	-	-	NA	-	-	-	-	-	-	-	NA
C14-C20(Diesel Range)	0.94	-	-	NA	-	-	-	-	-	-	-	NA
C20-C30(Lubricant Oil Range)	0.94	-	-	NA	-	-	-	-	-	-	-	NA
Dioxins												
2,3,7,8-TCDD	0.537	-	-	a	-	-	-	-	-	-	-	a
1,2,3,7,8-PeCDD	0.537	1.0 E-6	No	a	-	-	1.0 E-6	No	9.3 E-8	Yes	-	a
1,2,3,4,7,8-HxCDD	0.537	1.0 E-5	No	a	-	-	-	-	9.3 E-7	Yes	-	a
1,2,3,6,7,8-HxCDD	0.537	-	-	a	-	-	-	-	-	-	-	a
1,2,3,7,8,9-HxCDD	0.537	1.0 E-5	No	a	-	-	-	-	9.3 E-7	Yes	-	a
1,2,3,4,6,7,8-HpCDD	0.537	1.0 E-4	No	a	-	-	-	-	9.3 E-6	Yes	-	a
OCDD	0.537	-	-	a	-	-	-	-	-	-	-	a
2,3,7,8-TCDF	0.537	-	-	a	-	-	-	-	-	-	1.0 E-6	a
1,2,3,7,8-PeCDF	0.537	-	-	a	-	-	-	-	-	-	-	a
2,3,4,7,8-PeCDF	0.537	2.0 E-6	No	a	-	-	-	-	1.9 E-7	Yes	-	a
1,2,3,4,7,8-HxCDF	0.537	1.0 E-5	No	a	-	-	-	-	9.3 E-7	Yes	-	a
1,2,3,6,7,8-HxCDF	0.537	-	-	a	-	-	-	-	-	-	-	a
2,3,4,6,7,8-HxCDF	0.537	-	-	a	-	-	-	-	9.3 E-7	Yes	-	a
1,2,3,7,8,9-HxCDF	0.537	-	-	a	-	-	-	-	-	-	-	a
1,2,3,4,6,7,8-HpCDF	0.537	-	-	a	-	-	-	-	-	-	-	a
1,2,3,4,7,8,9-HpCDF	0.537	-	-	a	-	-	-	-	-	-	-	a
OCDF	0.537	-	-	a	-	-	-	-	-	-	-	a
PCBs												
Aroclor-1248	0.94	0.014	Yes	a	-	-	0.010	No	0.010	No	-	NA
Aroclor-1254	0.94	0.36	No	r	-	-	0.36	No	0.259	Yes	0.42	g
Aroclor-1260	0.94	0.36	No	r	-	-	0.36	No	0.26	Yes	0.42	g
PCB-105	0.94	0.010	No	g	-	-	-	-	-	-	-	g
PCB-114	0.94	-	-	g	-	-	-	-	-	-	-	g
PCB-118	0.94	0.010	No	g	-	-	-	-	-	-	-	g

Table C2-14 (3 of 3)

Baseline Toxicity Criteria for Ecological Risk Assessment
Old Conservation Yard RFI Site

Chemical	Mammalian Scaling Factor[a]	Small Mammal TRV (mg/kg-day)	Small Mammal Scaling Used?[b]	Source	Small Mammal RfC (mg/m^3)	Source	Bobcat TRV[b] (mg/kg-day)	Bobcat Scaling Used?	Mule Deer TRV[b] (mg/kg-day)	Mule Deer Scaling Used?	Avian TRV (mg/kg-day)	Source
PCB-123	0.94	-	-	g	-	-	-	-	-	-	-	g
PCB-126	0.94	0.000010	No	g	-	-	0.000010	No	0.0000074	Yes	0.000143	g
PCB-156	0.94	0.0020	No	g	-	-	-	-	-	-	-	g
PCB-157	0.94	0.0020	No	g	-	-	0.0020	No	-	-	-	g
PCB-167	0.94	-	-	g	-	-	-	-	-	-	-	g
PCB-169	0.94	-	-	g	-	-	-	-	-	-	-	g
PCB-189	0.94	-	-	g	-	-	-	-	-	-	-	g
PCB-77	0.94	-	-	g	-	-	-	-	-	-	0.000286	g
PCB-81	0.94	-	-	g	-	-	-	-	-	-	0.000143	g

Notes:

a. Based on Sample and Arenal (1999).

b. Bobcat and mule deer TRVs are based on small mammal TRVs. Allometric scaling was performed if there was body weight difference between the test species and

c. Antimony - small mammal TRV based on chronic NOAEL in the mouse (0.025 kg) of 1 mg/kg-day for longevity, histopathology, and minor changes in growth at 540 days and median female life spans (Schroeder et al. 1968).

d. Lead - small mammal TRV based on chronic NOAEL in the rat (0.35 kg) of 8 mg/kg-day for reproductive effects mg/kg-day (Sample et al. 1996).

e. Lead - avian TRV based on NOAEL in Japanese quail of 1.13 (Sample et al., 1996).

g. Lowest available toxicity values for mammals as used to derive ecological screening levels (ESLs).

h. Selenium, small mammal TRV based on chronic LOAEL in the mouse (0.0246 kg) of 1.21 mg/kg-day for reproductive effects (EFA West 1998), and application of uncertainty factor of 5 for a LOAEL to a NOAEL.

j. Thallium - small mammal TRV based on a chronic LOAEL in the rat (0.35 kg) of 10 mg/kg-day Formigli et al, 1986) and application of an uncertainty.

k. Zinc - small mammal TRV based on chronic NOAEL in the rat (0.25 kg) of 120 mg/kg-day for no adverse effect on fetal development (Schlicker & Cox 1968).

l. 1,1,1-Trichloroethane - small mammal inhalation RfC based on NOAEL in the rat and mouse of 1,500 ppm (Quast et al., 1978, 1988) and adjusted for exposure time.

m. 1,1,2-Trichloro-1,2,2-trifluoroethane - small mammal inhalation RfC based on NOAEL in the rat of 25,000 ppm for reproductive effects (EPA, 1994) and adjusted for exposure time.

n. 1,1-Dichloroethene - small mammal inhalation RfC based on NOAEL in the rat of 6,000 ppm for reproductive effects (Hurtt et al., 1993) and adjusted for exposure time.

o. cis-1,2-Dichloroethene - small mammal inhalation RfC based on NOAEL in the rat of 6,000 ppm for reproductive effects (Hurtt et al., 1993) and adjusted for exposure time.

q. Trichloroethene - small mammal inhalation RfC based on NOAEL in the rat of 1,800 ppm for reproductive effects (Doefmueller et al. 1979) and adjusted for exposure time.

r. Aroclor 1254 - small mammal TRV based on chronic NOAEL in the mink (1 kg) of 0.14 mg/kg-day for reproductive effects mg/kg-day (Aulerich and Ringer, 1977).

s. Cadmium - small mammal TRV based on chronic NOAEL in the rat (0.25 kg) of 1 mg/kg-day for no adverse effects on number of copulating females, number of, pregnant females, total implants, live fetuses, average fetal weight, and male fertility (Sutou et al . 1980).

t. Ethylbenzene - small mammal TRV based on chronic NOAEL in the rat (0.25 kg) of 97 mg/kg-day for no adverse effects on kidney or liver histopathology; no effects on kidney or liver weight (Wolf et al. 1956).

u. Ethylbenzene - small mammal RfC based on chronic LOAEL in the rat (0.25 kg) of 600 mg/kg-day for reproductive effects with an adjusted exposure time and uncertainty factor of 10 to adjust from a LOAEL to a NOAEL (Ungvary and Tatrai 1985).

v. Xylenes - small mammal RfC based on chronic LOAEL in the rat (0.25 kg) of 150 mg/kg-day for reproductive effects with an adjusted exposure time and uncertainty factor of 10 to adjust from a LOAEL to a NOAEL (Ungvary et al 1980).

w. Toluene - small mammal RfC based on chronic NOAEL in the rat (0.25 kg) of 219 mg/kg-day with no reproductive effects with an adjusted exposure time (Gibson and Hardisty (NTP 1990)).

x. Trichloroethene - small mammal RfC based on chronic NOAEL in the rat (0.25 kg) of 1736 mg/kg-day with no reproductive or developmental effects with an adjusted exposure time (Dorfmueller et al 1979).

TRV - Toxicity Reference Value RfC - Reference Concentration - - Not Applicable

Table C2-15 (1 of 2)

ESL Toxicity Criteria for Ecological Risk Assessment
Old Conservation Yard RFI Site

Chemical	Mammalian Scaling Factor[a]	Small Mammal ESL TRV[b] (mg/kg-day)	Small Mammal Scaling Used?[c]	Bobcat ESL TRV[c] (mg/kg-day)	Bobcat Scaling Used?	Mule Deer ESL TRV[c] (mg/kg-day)	Mule Deer Scaling Used?	Avian ESL TRV (mg/kg-day)
Inorganic Compounds								
Antimony	0.94	0.13	No	0.088	Yes	0.081	Yes	NTV
Barium	0.75	5.10	No	5.1	No	5.1	No	21
Boron	0.94	13.05	Yes	8.8	No	8.8	No	29
Cadmium	0.44	0.06	No	0.0024	Yes	0.0011	Yes	0.08
Copper	0.94	2.67	No	1.9	Yes	1.7	Yes	2
Lead	0.94	1.0	No	1.0	No	0.75	Yes	0.0140
Mercury	0.98	1.01	No	1.0	No	1.0	No	0.5
Silver	0.94	0.38	No	0.3	Yes	0.2	Yes	NTV
Thallium	0.81	0.48	No	0.48	No	0.194	Yes	NTV
Zinc	0.85	9.60	No	3.9	Yes	3.2	Yes	15
VOCs								
1,1,1-Trichloroethane	0.65	1000	No	137	Yes	85	Yes	NTV
1,1,2-Trichloro-1,2,2-trifluoroethane	0.94	49	Yes	30	No	30	No	NTV
1,1-Dichloroethene	1.54	0.07	Yes	3	No	2.5	No	NTV
2-Butanone	0.94	1771	No	1771	No	1335	Yes	NTV
Acetone	1.13	10	No	10	No	18.3	Yes	5464
Benzene	0.82	1.0	No	1.0	No	0.4	Yes	NTV
Ethylbenzene	0.94	49	No	49	No	36.6	Yes	NTV
m,p-Xylene	0.94	30	No	30	No	23	Yes	NTV
Methylene chloride	0.81	6	No	5.9	No	2.4	Yes	NTV
o-Xylene	0.94	30	No	30	No	23	Yes	NTV
p-Isopropyltoluene	0.94	30	No	30	No	23	Yes	NTV
Toluene	0.94	0.58	No	0.4	Yes	0.4	Yes	NTV
Trichloroethene	1.11	0.70	No	1.3	Yes	1.6	Yes	NTV
Xylenes (total)	0.94	30	No	30	No	23	Yes	NTV
SVOCs								
1-Methylnaphthalene	0.94	50	No	35	Yes	33	Yes	NTV
2,4-Dinitrophenol	0.94	2.7	No	2.7	No	2.0	Yes	0.13
2-Methylnaphthalene	0.94	50	No	35	Yes	33	Yes	NTV
Acenaphthene	0.94	88	No	62	Yes	57	Yes	1
Acenaphthylene	0.94	175	No	123	Yes	114	Yes	NTV
Anthracene	0.94	500	No	353	Yes	325	Yes	1
Benzo(a)anthracene	0.94	1.31	No	0.9	Yes	0.9	Yes	NTV
Benzo(a)pyrene	0.94	1.31	No	0.9	Yes	0.9	Yes	NTV
Benzo(b)fluoranthene	0.94	1.31	No	0.9	Yes	0.9	Yes	NTV
Benzo(e)pyrene	NA	NTV	NA	NTV	NA	NTV	NA	NTV
Benzo(g,h,i)perylene	0.94	1.31	No	0.9	Yes	0.9	Yes	NTV
Benzo(k)fluoranthene	0.94	1.31	No	0.9	Yes	0.9	Yes	NTV
Chrysene	0.94	1.31	No	0.9	Yes	0.9	Yes	NTV
Dibenz(a,h)anthracene	0.94	1.31	No	0.9	Yes	0.9	Yes	NTV
Fluoranthene	0.94	63	No	44	Yes	41	Yes	NTV
Fluorene	0.94	63	No	44	Yes	41	Yes	1
Indeno(1,2,3-cd)pyrene	0.94	1.31	No	0.9	Yes	0.9	Yes	NTV
Naphthalene	0.94	50	No	50	No	37	Yes	NTV
Perylene	NA	NTV	NA	NTV	NA	NTV	NA	NTV
Phenanthrene	0.94	75	No	53	Yes	49	Yes	1
Pyrene	0.94	38	No	26	Yes	24	Yes	NTV
Total Petroleum Hydrocarbons								
C08-C11(Gasoline Range)	NA	NTV	NA	NTV	NA	NTV	NA	NTV
C11-C14(Kerosene Range)	NA	NTV	NA	NTV	NA	NTV	NA	NTV

Table C2-15 (2 of 2)

ESL Toxicity Criteria for Ecological Risk Assessment
Old Conservation Yard RFI Site

Chemical	Mammalian Scaling Factor[a]	Small Mammal ESL TRV[b] (mg/kg-day)	Small Mammal Scaling Used?[c]	Bobcat ESL TRV[c] (mg/kg-day)	Bobcat Scaling Used?	Mule Deer ESL TRV[c] (mg/kg-day)	Mule Deer Scaling Used?	Avian ESL TRV (mg/kg-day)
C14-C20(Diesel Range)	NA	NTV	NA	NTV	NA	NTV	NA	NTV
C20-C30(Lubricant Oil Range)	NA	NTV	NA	NTV	NA	NTV	NA	NTV
Dioxins								
2,3,7,8-TCDD	0.54	0.0000010	No	0.0000010	No	0.0000001	Yes	0.000014
1,2,3,7,8-PeCDD	0.54	0.0000010	No	0.0000010	No	0.00000011	Yes	0.000014
1,2,3,4,7,8-HxCDD	0.54	0.000010	No	0.000010	No	0.00000113	Yes	0.00029
1,2,3,6,7,8-HxCDD	0.54	0.000010	No	0.000010	No	0.00000113	Yes	0.0014
1,2,3,7,8,9-HxCDD	0.54	0.000010	No	0.000010	No	0.0000011	Yes	0.0001
1,2,3,4,6,7,8-HpCDD	0.54	0.00010	No	0.00010	No	0.000011	Yes	0.014
OCDD	0.54	0.010	No	0.010	No	0.00113	Yes	0.143
2,3,7,8-TCDF	0.54	0.000010	No	0.000010	No	0.000001	Yes	0.000001
1,2,3,7,8-PeCDF	0.54	0.000020	No	0.000020	No	0.0000023	Yes	0.00014
2,3,4,7,8-PeCDF	0.54	0.000002	No	0.000002	No	0.0000002	Yes	0.000014
1,2,3,4,7,8-HxCDF	0.54	0.000010	No	0.000010	No	0.0000011	Yes	0.00014
1,2,3,6,7,8-HxCDF	0.54	0.000010	No	0.000010	No	0.0000011	Yes	0.00014
2,3,4,6,7,8-HxCDF	0.54	0.000010	No	0.000010	No	0.0000011	Yes	0.00014
1,2,3,7,8,9-HxCDF	0.54	0.000010	No	0.000010	No	0.0000011	Yes	0.00014
1,2,3,4,6,7,8-HpCDF	0.54	0.00010	No	0.00010	No	0.000011	Yes	0.00143
1,2,3,4,7,8,9-HpCDF	0.54	0.00010	No	0.00010	No	0.000011	Yes	0.00143
OCDF	0.54	0.010	No	0.010	No	0.00113	Yes	0.14
PCBs								
Aroclor-1248	0.94	0.01	Yes	0.010	No	0.010	No	NTV
Aroclor-1254	0.94	0.068	No	0.046	Yes	0.042	Yes	0.41
Aroclor-1260	0.94	0.07	No	0.0	Yes	0.04	Yes	0.09
PCB-105	0.94	0.010	No	0.010	No	0.0075	Yes	0.14
PCB-114	0.94	0.0020	No	0.0020	No	0.0015	Yes	0.14
PCB-118	0.94	0.010	No	0.010	No	0.0075	Yes	1.4
PCB-123	0.94	0.010	No	0.010	No	0.0075	Yes	1.4
PCB-126	0.94	0.000010	No	0.000010	No	0.0000075	Yes	0.00014
PCB-156	0.94	0.0020	No	0.0020	No	0.0015	Yes	0.14
PCB-157	0.94	0.0020	No	0.0020	No	0.0015	Yes	0.14
PCB-167	0.94	0.10	No	0.10	No	0.075	Yes	1.4
PCB-169	0.94	0.00010	No	0.00010	No	0.000075	Yes	0.014
PCB-189	0.94	0.010	No	0.010	No	0.0075	Yes	1.4
PCB-77	0.94	0.010	No	0.010	No	0.0075	Yes	0.00029
PCB-81	0.94	0.010	No	0.010	No	0.0075	Yes	0.00014

Notes:
a. Based on Sample and Arenal (1999).
b. Lowest available toxicity values for mammals as used to derive ecological screening levels (ESLs).
c. Bobcat and mule deer TRVs are based on small mammal TRVs. Allometric scaling was performed if there was body weight difference between the test species and the receptor species greater than 100-fold.
TRV - Toxicity Reference Value
RfC - Reference Concentration
NTV - No Toxicity Value

Table C2-16 (1 of 3)

Risk Estimates for the Deer Mouse
Old Conservation Yard RFI Site

	Applied Daily Dose		Hazard Quotient			
	CTE (mg/kg-day)	RME (mg/kg-day)	CTE_{ESL} (unitless)	RME_{ESL} (unitless)	CTE_{TRV} (unitless)	RME_{TRV} (unitless)
Ingestion Exposure Route						
Inorganic Compounds						
Antimony	2.1E+00	7.0E+00	**1.7E+01**	**5.6E+01**	**2.1E+00**	**7.0E+00**
Barium	2.6E+01	2.8E+01	**5.1E+00**	**5.4E+00**	**5.1E+00**	**5.4E+00**
Boron	6.0E+00	7.4E+00	4.6E-01	5.6E-01	-	-
Cadmium	1.5E+00	2.9E+00	**2.5E+01**	**4.8E+01**	**1.49E+00**	**2.85E+00**
Copper	-	-	-	-	-	-
Lead	5.8E+00	7.0E+00	**5.8E+00**	**7.0E+00**	**5.8E+00**	**7.0E+00**
Mercury	1.7E-01	1.1E+00	1.7E-01	**1.1E+00**	-	9.1E-01
Silver	5.8E-01	1.2E+00	**1.6E+00**	**3.2E+00**	9.0E-03	1.9E-02
Thallium	1.3E-01	2.5E-01	2.7E-01	5.3E-01	-	-
Zinc	3.0E+01	3.3E+01	**3.1E+00**	**3.4E+00**	2.5E-01	2.7E-01
VOCs						
1,1,1-Trichloroethane	6.5E-04	1.2E-03	6.5E-07	1.2E-06	-	-
1,1,2-Trichloro-1,2,2-trifluoroethane	2.7E-03	4.5E-03	5.4E-05	9.0E-05	-	-
1,1-Dichloroethene	6.8E-04	1.2E-03	9.9E-03	1.7E-02	-	-
2-Butanone	4.8E-03	2.4E-03	2.7E-06	1.3E-06	-	-
Acetone	7.7E-02	7.6E-01	7.7E-03	7.6E-02	-	-
Benzene	2.5E-04	5.4E-04	2.5E-04	5.4E-04	-	-
Ethylbenzene	2.5E-04	5.4E-04	5.1E-06	1.1E-05		
m,p-Xylene	7.0E-04	1.6E-03	2.3E-05	5.2E-05	-	-
Methylene chloride	8.9E-03	5.3E-02	1.5E-03	9.1E-03	-	-
o-Xylene	1.7E-04	3.7E-04	5.6E-06	1.2E-05	-	-
p-Isopropyltoluene	4.1E-04	4.1E-04	1.4E-05	1.4E-05	-	-
Toluene	3.4E-04	7.7E-04	5.8E-04	1.3E-03	-	-
Trichloroethene	6.5E-04	1.2E-03	9.3E-04	1.7E-03	-	-
Xylenes (total)	1.0E-03	2.2E-03	3.4E-05	7.2E-05	-	-
SVOCs						
1-Methylnaphthalene	2.6E-03	2.9E-03	5.2E-05	5.8E-05	-	-
2,4-Dinitrophenol	1.4E-01	2.2E-01	5.4E-02	8.0E-02	-	-
2-Methylnaphthalene	3.7E-02	1.2E-01	7.4E-04	2.4E-03	-	-
Acenaphthene	5.2E-02	2.1E-01	5.9E-04	2.4E-03	-	-
Acenaphthylene	8.7E-03	3.1E-02	5.0E-05	1.8E-04	-	-
Anthracene	3.9E-02	1.6E-01	7.9E-05	3.1E-04	-	-
Benzo(a)anthracene	3.5E-02	1.7E-01	2.7E-02	1.3E-01	-	-
Benzo(a)pyrene	7.9E-03	3.8E-02	6.0E-03	2.9E-02	-	-
Benzo(b)fluoranthene	1.2E-02	5.6E-02	9.5E-03	4.3E-02	-	-
Benzo(e)pyrene	1.6E-02	6.9E-02	-	-	-	-
Benzo(g,h,i)perylene	1.6E-02	5.6E-02	1.2E-02	4.3E-02	-	-
Benzo(k)fluoranthene	7.6E-03	3.7E-02	5.8E-03	2.8E-02	-	-
Chrysene	3.2E-02	1.3E-01	2.4E-02	9.8E-02	-	-
Dibenz(a,h)anthracene	5.6E-03	2.3E-02	4.3E-03	1.7E-02	-	-
Fluoranthene	4.4E-02	2.1E-01	7.0E-04	3.4E-03	-	-
Fluorene	6.7E-02	2.8E-01	1.1E-03	4.5E-03	-	-
Indeno(1,2,3-cd)pyrene	6.6E-03	3.4E-02	5.0E-03	2.6E-02	-	-
Naphthalene	1.4E-02	3.4E-02	2.7E-04	6.8E-04	-	-
Perylene	8.8E-03	3.8E-02	-	-		
Phenanthrene	5.2E-01	2.2E+00	7.0E-03	3.0E-02	-	-
Pyrene	4.2E-02	1.8E-01	1.1E-03	4.7E-03	-	-
Total Petroleum Hydrocarbons						
C08-C11(Gasoline Range)	2.1E+00	4.7E+00	-	-		
C11-C14(Kerosene Range)	2.4E+00	4.7E+00	-	-		
C14-C20(Diesel Range)	1.4E+01	5.5E+01	-	-	-	-
C20-C30(Lubricant Oil Range)	6.4E+01	3.0E+02	-	-	-	-

Table C2-16 (2 of 3)

Risk Estimates for the Deer Mouse
Old Conservation Yard RFI Site

	Applied Daily Dose		Hazard Quotient			
	CTE (mg/kg-day)	RME (mg/kg-day)	CTE_{ESL} (unitless)	RME_{ESL} (unitless)	CTE_{TRV} (unitless)	RME_{TRV} (unitless)
Dioxins						
2,3,7,8-TCDD	2.2E-07	3.8E-07	2.2E-01	3.8E-01	-	-
1,2,3,7,8-PeCDD	1.4E-06	1.1E-05	**1.4E+00**	**1.1E+01**	**1.4E+00**	**1.1E+01**
1,2,3,4,7,8-HxCDD	2.9E-06	1.1E-05	2.9E-01	**1.1E+00**	-	**1.1E+00**
1,2,3,6,7,8-HxCDD	1.6E-06	7.9E-06	1.6E-01	7.9E-01	-	-
1,2,3,7,8,9-HxCDD	3.8E-06	1.8E-05	3.8E-01	**1.8E+00**	-	**1.8E+00**
1,2,3,4,6,7,8-HpCDD	4.3E-05	2.5E-04	4.3E-01	**2.5E+00**	-	**2.5E+00**
OCDD	2.6E-04	5.7E-04	2.6E-02	5.7E-02	-	-
2,3,7,8-TCDF	4.8E-07	2.2E-06	4.8E-02	2.2E-01	-	-
1,2,3,7,8-PeCDF	3.3E-07	1.7E-06	1.6E-02	8.6E-02	-	-
2,3,4,7,8-PeCDF	9.5E-07	5.6E-06	4.8E-01	**2.8E+00**	-	**2.8E+00**
1,2,3,4,7,8-HxCDF	2.5E-06	1.2E-05	2.5E-01	**1.2E+00**	-	**1.2E+00**
1,2,3,6,7,8-HxCDF	8.4E-07	1.7E-06	8.4E-02	1.7E-01	-	-
2,3,4,6,7,8-HxCDF	9.9E-07	5.5E-06	9.9E-02	5.5E-01	-	-
1,2,3,7,8,9-HxCDF	5.0E-07	2.2E-06	5.0E-02	2.2E-01	-	-
1,2,3,4,6,7,8-HpCDF	4.0E-06	8.5E-06	4.0E-02	8.5E-02	-	-
1,2,3,4,7,8,9-HpCDF	1.6E-06	6.6E-06	1.6E-02	6.6E-02	-	-
OCDF	1.6E-05	3.5E-05	1.6E-03	3.5E-03	-	-
PCBs						
Aroclor-1248	1.1E+02	1.2E+03	**7.7E+03**	**8.5E+04**	**7.7E+03**	**8.5E+04**
Aroclor-1254	2.7E-01	1.2E+00	**3.9E+00**	**1.7E+01**	7.4E-01	**3.3E+00**
Aroclor-1260	2.9E+00	3.1E+01	**4.2E+01**	**4.6E+02**	**8.0E+00**	**8.7E+01**
PCB-105	1.3E-03	1.4E-02	1.3E-01	**1.4E+00**	-	**1.4E+00**
PCB-114	4.6E-05	4.7E-04	2.3E-02	2.4E-01	-	-
PCB-118	2.7E-03	2.8E-02	2.7E-01	**2.8E+00**	-	**2.8E+00**
PCB-123	4.1E-05	4.4E-04	4.1E-03	4.4E-02	-	-
PCB-126	5.8E-05	6.2E-04	**5.8E+00**	**6.2E+01**	**5.8E+00**	**6.2E+01**
PCB-156	5.5E-04	5.9E-03	2.7E-01	**2.9E+00**	-	**2.9E+00**
PCB-157	2.5E-04	2.7E-03	1.3E-01	**1.4E+00**	-	**1.4E+00**
PCB-167	4.5E-04	4.9E-03	4.5E-03	4.9E-02	-	-
PCB-169	1.8E-06	2.0E-05	1.8E-02	2.0E-01	-	-
PCB-189	4.1E-05	4.4E-04	4.1E-03	4.4E-02	-	-
PCB-77	1.3E-04	1.4E-03	1.3E-02	1.4E-01	-	-
PCB-81	2.5E-05	2.7E-04	2.5E-03	2.7E-02	-	-
Total PCB Congeners	-	-	**6.7E+00**	**7.1E+01**	**5.8E+00**	**7.0E+01**
Total Ingestion HI:			7.9E+03	8.5E+04	7.8E+03	8.5E+04

Table C2-16 (3 of 3)

Risk Estimates for the Deer Mouse
Old Conservation Yard RFI Site

	Applied Daily Dose		Hazard Quotient			
	CTE (mg/kg-day)	RME (mg/kg-day)	CTE_{ESL} (unitless)	RME_{ESL} (unitless)	CTE_{TRV} (unitless)	RME_{TRV} (unitless)

	Burrow Air Concentration		Hazard Quotient	
	CTE (mg/m^3)	RME (mg/m^3)	CTE (unitless)	RME (unitless)
Inhalation Exposure Route				
VOCs				
1,1,1-Trichloroethane	6.1E-01	8.0E-01	5.5E-04	7.2E-04
1,1,2-Trichloro-1,2,2-trifluoroethane	8.9E-01	1.8E+00	1.6E-02	3.3E-02
1,1-Dichloroethene	5.9E-01	7.6E-01	**7.7E+00**	**9.9E+00**
Benzene	5.0E-01	5.0E-01	5.7E-03	5.7E-03
Ethylbenzene	2.4E-01	4.8E-01	3.9E-03	8.0E-03
m,p-Xylene	5.0E-01	1.0E+00	3.3E-02	6.7E-02
Methylene chloride	5.0E-01	1.0E+01	7.7E-02	**1.5E+00**
o-Xylene	1.1E-01	2.2E-01	7.1E-03	1.4E-02
p-Isopropyltoluene	3.8E-01	3.8E-01	1.1E-02	1.1E-02
Toluene	4.9E-01	5.0E-01	2.3E-03	2.3E-03
Trichloroethene	1.3E+00	4.5E+00	7.2E-04	2.6E-03
Total Inhalation HI:			7.9E+00	**1.2E+01**
Total Pathway HI:			7.8E+03	**8.5E+04**

Notes:
CTE - central tendancy exposure
RME - reasonable maximum exposure
CTE_{ESL} or RME_{ESL}- The hazard quotient based on the NOAEL equivalent TRV used to calculate the ESL.
CTE_{TRV} or RME_{TRV}- The hazard quotient based on the TRV is calculated only if the hazard quotient based on the ESL is greater than 1.
TRV - toxicity reference value
RfC - reference concentration
HI - Hazard Index
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyls
mg/kg-day - milligrams per kilogram per day
mg/m^3 - milligrams per cubic meter
"-" not applicable
= HIs for PCB congeners. Not included in Total estimates.

Table C2-17 (1 of 2)

Risk Estimates for the Thrush
Old Conservation Yard RFI Site

	Applied Daily Dose		Hazard Quotient			
	CTE (mg/kg-day)	RME (mg/kg-day)	CTE_{ESL} (unitless)	RME_{ESL} (unitless)	CTE_{TRV} (unitless)	RME_{TRV} (unitless)
Ingestion Exposure Route						
Inorganic Compounds						
Antimony	2.5E+00	8.0E+00	-	-	-	-
Barium	3.6E+01	3.9E+01	**1.7E+00**	**1.9E+00**	**1.74E+00**	**1.86E+00**
Boron	5.4E+00	6.5E+00	1.9E-01	2.3E-01	-	-
Cadmium	1.8E+00	3.5E+00	**2.3E+01**	**4.4E+01**	**2.28E+01**	**4.38E+01**
Copper	-	-	-	-	-	-
Lead	3.8E+00	4.6E+00	**2.7E+02**	**3.3E+02**	**2.7E+02**	**3.3E+02**
Mercury	2.6E-01	1.7E+00	5.7E-01	**3.7E+00**	-	**3.7E+00**
Silver	8.8E-01	1.8E+00	-	-	-	-
Thallium	1.7E-01	3.3E-01	-	-	-	-
Zinc	3.7E+01	4.1E+01	**2.6E+00**	**2.8E+00**	**2.6E+00**	**2.8E+00**
VOCs						
1,1,1-Trichloroethane	6.8E-04	1.2E-03	-	-	-	-
1,1,2-Trichloro-1,2,2-trifluoroethane	2.8E-03	4.6E-03	-	-	-	-
1,1-Dichloroethene	7.1E-04	1.2E-03	-	-	-	-
2-Butanone	5.0E-03	2.5E-03	-	-	-	-
Acetone	7.9E-02	7.9E-01	1.5E-05	1.5E-04	-	-
Benzene	2.6E-04	5.6E-04	-	-	-	-
Ethylbenzene	2.6E-04	5.6E-04	-	-	-	-
m,p-Xylene	7.3E-04	1.6E-03	-	-	-	-
Methylene chloride	9.2E-03	5.5E-02	-	-	-	-
o-Xylene	1.8E-04	3.8E-04	-	-	-	-
p-Isopropyltoluene	4.3E-04	4.3E-04	-	-	-	-
Toluene	3.5E-04	8.0E-04	-	-	-	-
Trichloroethene	6.8E-04	1.2E-03	-	-	-	-
Xylenes (total)	1.1E-03	2.2E-03	-	-	-	-
SVOCs						
1-Methylnaphthalene	2.7E-03	3.0E-03	-	-	-	-
2,4-Dinitrophenol	1.5E-01	2.3E-01	**1.1E+00**	**1.7E+00**	**1.13E+00**	**1.69E+00**
2-Methylnaphthalene	3.8E-02	1.3E-01	-	-	-	-
Acenaphthene	6.9E-02	2.9E-01	6.9E-02	2.8E-01	-	-
Acenaphthylene	9.0E-03	3.2E-02	-	-	-	-
Anthracene	5.5E-02	2.2E-01	5.0E-02	2.0E-01	-	-
Benzo(a)anthracene	2.7E-02	1.3E-01	-	-	-	-
Benzo(a)pyrene	8.2E-03	4.0E-02	-	-	-	-
Benzo(b)fluoranthene	1.6E-02	7.2E-02	-	-	-	-
Benzo(e)pyrene	1.7E-02	7.3E-02	-	-	-	-
Benzo(g,h,i)perylene	1.4E-02	4.9E-02	-	-	-	-
Benzo(k)fluoranthene	7.6E-03	3.7E-02	-	-	-	-
Chrysene	2.9E-02	1.2E-01	-	-	-	-
Dibenz(a,h)anthracene	5.8E-03	2.4E-02	-	-	-	-
Fluoranthene	3.3E-02	1.6E-01	-	-	-	-
Fluorene	1.0E-01	4.3E-01	1.0E-01	4.2E-01	-	-
Indeno(1,2,3-cd)pyrene	6.6E-03	3.4E-02	-	-	-	-
Naphthalene	1.4E-02	3.5E-02	-	-	-	-
Perylene	9.1E-03	4.0E-02	-	-	-	-
Phenanthrene	3.8E-01	1.6E+00	3.3E-01	**1.4E+00**	-	**1.4E+00**
Pyrene	4.9E-02	2.1E-01	-	-	-	-
Total Petroleum Hydrocarbons						
C08-C11(Gasoline Range)	2.2E+00	4.8E+00	-	-	-	-
C11-C14(Kerosene Range)	2.5E+00	4.9E+00	-	-	-	-
C14-C20(Diesel Range)	1.5E+01	5.8E+01	-	-	-	-

Table C2-17 (2 of 2)

Risk Estimates for the Thrush
Old Conservation Yard RFI Site

	Applied Daily Dose		Hazard Quotient			
	CTE (mg/kg-day)	RME (mg/kg-day)	CTE_{ESL} (unitless)	RME_{ESL} (unitless)	CTE_{TRV} (unitless)	RME_{TRV} (unitless)
C20-C30(Lubricant Oil Range)	6.6E+01	3.1E+02	-	-	-	-
Dioxins						
2,3,7,8-TCDD	2.3E-07	4.0E-07	1.6E-02	2.8E-02	-	-
1,2,3,7,8-PeCDD	1.4E-06	1.1E-05	9.6E-02	7.6E-01	-	-
1,2,3,4,7,8-HxCDD	2.8E-06	1.0E-05	9.9E-03	3.6E-02	-	-
1,2,3,6,7,8-HxCDD	2.5E-06	1.3E-05	1.7E-03	8.9E-03	-	-
1,2,3,7,8,9-HxCDD	3.9E-06	1.9E-05	2.7E-02	1.3E-01	-	-
1,2,3,4,6,7,8-HpCDD	5.3E-05	3.1E-04	3.7E-03	2.2E-02	-	-
OCDD	3.4E-04	7.5E-04	2.3E-03	5.2E-03	-	-
2,3,7,8-TCDF	5.0E-07	2.3E-06	5.0E-01	**2.3E+00**	-	**2.28E+00**
1,2,3,7,8-PeCDF	2.7E-07	1.4E-06	1.9E-03	9.9E-03	-	-
2,3,4,7,8-PeCDF	8.2E-07	4.8E-06	5.8E-02	3.4E-01	-	-
1,2,3,4,7,8-HxCDF	2.3E-06	1.1E-05	1.6E-02	7.8E-02	-	-
1,2,3,6,7,8-HxCDF	6.3E-07	1.3E-06	4.4E-03	8.9E-03	-	-
2,3,4,6,7,8-HxCDF	8.7E-07	4.8E-06	6.1E-03	3.4E-02	-	-
1,2,3,7,8,9-HxCDF	5.2E-07	2.3E-06	3.6E-03	1.6E-02	-	-
1,2,3,4,6,7,8-HpCDF	5.5E-06	1.2E-05	3.8E-03	8.1E-03	-	-
1,2,3,4,7,8,9-HpCDF	1.6E-06	6.8E-06	1.1E-03	4.8E-03	-	-
OCDF	1.9E-05	4.2E-05	1.3E-04	3.0E-04	-	-
PCBs						
Aroclor-1248	1.1E+02	1.2E+03	-	-	-	-
Aroclor-1254	2.8E-01	1.2E+00	6.7E-01	**3.0E+00**	-	**2.9E+00**
Aroclor-1260	3.0E+00	3.2E+01	**3.3E+01**	**3.6E+02**	**7.1E+00**	**7.7E+01**
PCB-105	1.8E-03	2.0E-02	1.3E-02	1.4E-01	-	-
PCB-114	7.9E-05	8.1E-04	5.5E-04	5.6E-03	-	-
PCB-118	4.0E-03	4.2E-02	2.8E-03	3.0E-02	-	-
PCB-123	6.2E-05	6.5E-04	4.3E-05	4.6E-04	-	-
PCB-126	7.7E-05	8.3E-04	5.4E-01	**5.8E+00**	-	**5.8E+00**
PCB-156	7.3E-04	7.7E-03	5.1E-03	5.4E-02	-	-
PCB-157	3.3E-04	3.6E-03	2.3E-03	2.5E-02	-	-
PCB-167	5.8E-04	6.3E-03	4.1E-04	4.4E-03	-	-
PCB-169	1.9E-06	2.1E-05	1.3E-04	1.4E-03	-	-
PCB-189	4.3E-05	4.6E-04	3.0E-05	3.2E-04	-	-
PCB-77	1.8E-04	1.9E-03	6.2E-01	**6.6E+00**	-	**6.6E+00**
PCB-81	3.2E-05	3.4E-04	2.2E-01	**2.4E+00**	-	**2.4E+00**
Total PCB Congeners	-	-	**1.4E+00**	**1.5E+01**	0.0E+00	**1.5E+01**
Total Ingestion HI:			**3.3E+02**	**7.5E+02**	**3.0E+02**	**4.7E+02**

Notes:
CTE - central tendancy exposure
RME - reasonable maximum exposure
CTE_{ESL} or RME_{ESL}- The hazard quotient based on the NOAEL equivalent TRV used to calculate the ESL.
CTE_{TRV} or RME_{TRV}- The hazard quotient based on the TRV is calculated only if the hazard quotient based on the ESL is greater than 1.
TRV - toxicity reference value
HI - Hazard Index
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyls
NTV - indicates that adequate toxicity data were not available for a chemical
mg/kg-day - milligram per kilogram per day
"-" not applicable
= HIs for PCB congeners. Not included in Total estimates.

Table C2-18 (1 of 2)

Risk Estimates for the Hawk
Old Conservation Yard RFI Site

	Applied Daily Dose		Hazard Quotient			
	CTE (mg/kg-day)	RME (mg/kg-day)	CTE_{ESL} (unitless)	RME_{ESL} (unitless)	CTE_{TRV} (unitless)	RME_{TRV} (unitless)
Ingestion Exposure Route						
Inorganic Compounds						
Antimony	7.5E-02	2.4E-01	-	-	-	-
Barium	2.2E+00	2.3E+00	1.0E-01	1.1E-01	-	-
Boron	3.8E+00	4.7E+00	1.3E-01	1.6E-01	-	-
Cadmium	4.0E-02	7.7E-02	5.0E-01	9.6E-01	-	-
Copper	-	-	-	-	-	-
Lead	1.3E+00	1.6E+00	**9.4E+01**	**1.1E+02**	**9.4E+01**	**1.1E+02**
Mercury	3.9E-02	2.5E-01	8.6E-02	5.6E-01	-	-
Silver	6.6E-02	1.4E-01	-	-	-	-
Thallium	6.7E-02	1.3E-01	-	-	-	-
Zinc	1.8E+01	2.0E+01	**1.2E+00**	**1.4E+00**	**1.2E+00**	**1.4E+00**
VOCs						
1,1,1-Trichloroethane	2.3E-04	4.3E-04	-	-	-	-
1,1,2-Trichloro-1,2,2-trifluoroethane	9.5E-04	1.6E-03	-	-	-	-
1,1-Dichloroethene	2.4E-04	4.3E-04	-	-	-	-
2-Butanone	1.7E-03	8.5E-04	-	-	-	-
Acetone	2.7E-02	2.7E-01	5.0E-06	5.0E-05	-	-
Benzene	8.8E-05	1.9E-04	-	-	-	-
Ethylbenzene	8.8E-05	1.9E-04	-	-	-	-
m,p-Xylene	2.5E-04	5.6E-04	-	-	-	-
Methylene chloride	3.2E-03	1.9E-02	-	-	-	-
o-Xylene	6.0E-05	1.3E-04	-	-	-	-
p-Isopropyltoluene	1.5E-04	1.5E-04	-	-	-	-
Toluene	1.2E-04	2.8E-04	-	-	-	-
Trichloroethene	2.3E-04	4.3E-04	-	-	-	-
Xylenes (total)	3.6E-04	7.7E-04	-	-	-	-
SVOCs						
1-Methylnaphthalene	9.2E-04	1.0E-03	-	-	-	-
2,4-Dinitrophenol	5.2E-02	7.7E-02	3.9E-01	5.8E-01	-	-
2-Methylnaphthalene	1.3E-02	4.3E-02	-	-	-	-
Acenaphthene	1.3E-02	5.4E-02	1.3E-02	5.3E-02	-	-
Acenaphthylene	3.1E-03	1.1E-02	-	-	-	-
Anthracene	9.2E-03	3.6E-02	8.3E-03	3.3E-02	-	-
Benzo(a)anthracene	4.8E-02	2.3E-01	-	-	-	-
Benzo(a)pyrene	1.7E-02	8.1E-02	-	-	-	-
Benzo(b)fluoranthene	1.8E-02	8.0E-02	-	-	-	-
Benzo(e)pyrene	5.5E-03	2.4E-02	-	-	-	-
Benzo(g,h,i)perylene	2.9E-02	1.0E-01	-	-	-	-
Benzo(k)fluoranthene	2.2E-02	1.1E-01	-	-	-	-
Chrysene	2.9E-02	1.2E-01	-	-	-	-
Dibenz(a,h)anthracene	3.3E-02	1.3E-01	-	-	-	-
Fluoranthene	1.6E-02	7.9E-02	-	-	-	-
Fluorene	1.3E-02	5.4E-02	1.3E-02	5.3E-02	-	-
Indeno(1,2,3-cd)pyrene	1.8E-02	9.2E-02	-	-	-	-
Naphthalene	4.8E-03	1.2E-02	-	-	-	-
Perylene	3.1E-03	1.4E-02	-	-	-	-
Phenanthrene	1.1E-01	4.8E-01	1.0E-01	4.3E-01	-	-
Pyrene	2.5E-02	1.0E-01	-	-	-	-
Total Petroleum Hydrocarbons						
C08-C11(Gasoline Range)	7.5E-01	1.7E+00	-	-	-	-
C11-C14(Kerosene Range)	8.6E-01	1.7E+00	-	-	-	-
C14-C20(Diesel Range)	5.0E+00	2.0E+01	-	-	-	-

Table C2-18 (2 of 2)

Risk Estimates for the Hawk
Old Conservation Yard RFI Site

	Applied Daily Dose		Hazard Quotient			
	CTE (mg/kg-day)	RME (mg/kg-day)	CTE_{ESL} (unitless)	RME_{ESL} (unitless)	CTE_{TRV} (unitless)	RME_{TRV} (unitless)
C20-C30(Lubricant Oil Range)	2.3E+01	1.1E+02	-	-	-	-
Dioxins						
2,3,7,8-TCDD	7.8E-08	1.4E-07	5.5E-03	9.6E-03	-	-
1,2,3,7,8-PeCDD	5.1E-07	4.0E-06	3.6E-02	2.8E-01	-	-
1,2,3,4,7,8-HxCDD	2.7E-07	9.7E-07	9.3E-04	3.4E-03	-	-
1,2,3,6,7,8-HxCDD	3.3E-07	1.7E-06	2.3E-04	1.2E-03	-	-
1,2,3,7,8,9-HxCDD	2.5E-07	1.2E-06	1.7E-03	8.3E-03	-	-
1,2,3,4,6,7,8-HpCDD	1.1E-05	6.5E-05	7.6E-04	4.5E-03	-	-
OCDD	6.1E-05	1.4E-04	4.3E-04	9.5E-04	-	-
2,3,7,8-TCDF	3.2E-08	1.4E-07	3.2E-02	1.4E-01	-	-
1,2,3,7,8-PeCDF	1.4E-07	7.3E-07	9.8E-04	5.1E-03	-	-
2,3,4,7,8-PeCDF	1.7E-07	1.0E-06	1.2E-02	7.1E-02	-	-
1,2,3,4,7,8-HxCDF	8.1E-08	3.9E-07	5.7E-04	2.7E-03	-	-
1,2,3,6,7,8-HxCDF	2.5E-07	5.1E-07	1.7E-03	3.5E-03	-	-
2,3,4,6,7,8-HxCDF	2.2E-07	1.2E-06	1.5E-03	8.4E-03	-	-
1,2,3,7,8,9-HxCDF	1.8E-07	7.8E-07	1.2E-03	5.5E-03	-	-
1,2,3,4,6,7,8-HpCDF	1.9E-06	3.9E-06	1.3E-03	2.7E-03	-	-
1,2,3,4,7,8,9-HpCDF	5.6E-07	2.3E-06	3.9E-04	1.6E-03	-	-
OCDF	1.3E-05	3.0E-05	9.2E-05	2.1E-04	-	-
PCBs						
Aroclor-1248	3.9E+01	4.2E+02	-	-	-	-
Aroclor-1254	9.5E-02	4.2E-01	2.3E-01	**1.0E+00**	-	9.9E-01
Aroclor-1260	1.0E+00	1.1E+01	**1.1E+01**	**1.2E+02**	**2.4E+00**	**2.6E+01**
PCB-105	2.3E-04	2.5E-03	1.6E-03	1.7E-02	-	-
PCB-114	1.0E-05	1.1E-04	7.3E-05	7.5E-04	-	-
PCB-118	4.8E-04	5.1E-03	3.4E-04	3.6E-03	-	-
PCB-123	8.2E-06	8.7E-05	5.7E-06	6.1E-05	-	-
PCB-126	1.2E-05	1.3E-04	8.6E-02	9.2E-01	-	-
PCB-156	2.2E-04	2.4E-03	1.6E-03	1.7E-02	-	-
PCB-157	6.7E-04	7.3E-03	4.7E-03	5.1E-02	-	-
PCB-167	2.2E-04	2.3E-03	1.5E-04	1.6E-03	-	-
PCB-169	6.6E-07	7.1E-06	4.6E-05	5.0E-04	-	-
PCB-189	4.6E-05	5.0E-04	3.2E-05	3.5E-04	-	-
PCB-77	1.0E-05	1.1E-04	3.6E-02	3.8E-01	-	-
PCB-81	2.4E-06	2.5E-05	1.7E-02	1.8E-01	-	-
Total PCB Congeners	-	-	1.5E-01	**1.6E+00**	-	-
Total Ingestion HI:			**1.1E+02**	**2.4E+02**	**9.8E+01**	**1.4E+02**
Total Ingestion HI Accounting for Home Range Factor[a]:			**5.4E+00**	**1.2E+01**	**4.9E+00**	**7.1E+00**

Notes:

a. Home range factor based on a minimum home range of 0.3 square miles (195 acres), as described in the SRAM, and OCY site area of 9.7 acres.

Home range factor = 0.050

CTE - central tendancy exposure
RME - reasonable maximum exposure
CTE_{ESL} or RME_{ESL}- The hazard quotient based on the NOAEL equivalent TRV used to calculate the ESL.
CTE_{TRV} or RME_{TRV}- The hazard quotient based on the TRV is calculated only if the hazard quotient based on the ESL is greater than 1.
TRV - toxicity reference value
HI - Hazard Index
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyls
NTV - indicates that adequate toxicity data were not available for a chemical
mg/kg-day - milligram per kilogram per day
"-" not applicable

= HIs for PCB congeners. Not included in Total estimates.

Table C2-19 (1 of 2)

Risk Estimates for the Bobcat
Old Conservation Yard RFI Site

	Applied Daily Dose		Hazard Quotient			
	CTE (mg/kg-day)	RME (mg/kg-day)	CTE_{ESL} (unitless)	RME_{ESL} (unitless)	CTE_{TRV} (unitless)	RME_{TRV} (unitless)
Ingestion Exposure Route						
Inorganic Compounds						
Antimony	3.2E-02	1.0E-01	3.6E-01	**1.2E+00**	-	1.5E-01
Barium	9.3E-01	9.9E-01	1.8E-01	1.9E-01	-	-
Boron	1.6E+00	2.0E+00	1.9E-01	2.3E-01	-	-
Cadmium	1.7E-02	3.3E-02	**7.1E+00**	**1.4E+01**	1.72E-02	3.30E-02
Copper	-	-	-	-	-	-
Lead	5.6E-01	6.9E-01	5.6E-01	6.9E-01	-	-
Mercury	1.7E-02	1.1E-01	1.7E-02	1.1E-01	-	-
Silver	2.8E-02	5.9E-02	1.1E-01	2.2E-01	-	-
Thallium	2.9E-02	5.6E-02	6.0E-02	1.2E-01	-	-
Zinc	7.7E+00	8.5E+00	**1.9E+00**	**2.2E+00**	6.4E-02	7.1E-02
VOCs						
1,1,1-Trichloroethane	9.9E-05	1.8E-04	7.3E-07	1.3E-06	-	-
1,1,2-Trichloro-1,2,2-trifluoroethane	4.1E-04	6.8E-04	1.4E-05	2.3E-05	-	-
1,1-Dichloroethene	1.0E-04	1.8E-04	4.2E-05	7.3E-05	-	-
2-Butanone	7.4E-04	3.6E-04	4.2E-07	2.1E-07	-	-
Acetone	1.2E-02	1.2E-01	1.2E-03	1.2E-02	-	-
Benzene	3.8E-05	8.2E-05	3.8E-05	8.2E-05	-	-
Ethylbenzene	3.8E-05	8.2E-05	7.7E-07	1.7E-06	-	-
m,p-Xylene	1.1E-04	2.4E-04	3.6E-06	8.0E-06	-	-
Methylene chloride	1.4E-03	8.1E-03	2.3E-04	1.4E-03	-	-
o-Xylene	2.6E-05	5.6E-05	8.6E-07	1.9E-06	-	-
p-Isopropyltoluene	6.3E-05	6.3E-05	2.1E-06	2.1E-06	-	-
Toluene	5.1E-05	1.2E-04	1.3E-04	2.9E-04	-	-
Trichloroethene	9.9E-05	1.8E-04	7.5E-05	1.4E-04	-	-
Xylenes (total)	1.5E-04	3.3E-04	5.2E-06	1.1E-05	-	-
SVOCs						
1-Methylnaphthalene	3.9E-04	4.4E-04	1.1E-05	1.3E-05	-	-
2,4-Dinitrophenol	2.2E-02	3.3E-02	8.2E-03	1.2E-02	-	-
2-Methylnaphthalene	5.7E-03	1.9E-02	1.6E-04	5.3E-04	-	-
Acenaphthene	5.6E-03	2.3E-02	9.0E-05	3.8E-04	-	-
Acenaphthylene	1.3E-03	4.7E-03	1.1E-05	3.8E-05	-	-
Anthracene	3.9E-03	1.6E-02	1.1E-05	4.4E-05	-	-
Benzo(a)anthracene	2.1E-02	9.7E-02	2.2E-02	1.1E-01	-	-
Benzo(a)pyrene	7.1E-03	3.5E-02	7.7E-03	3.7E-02	-	-
Benzo(b)fluoranthene	7.6E-03	3.5E-02	8.3E-03	3.7E-02	-	-
Benzo(e)pyrene	2.3E-03	1.0E-02	-	-	-	-
Benzo(g,h,i)perylene	1.3E-02	4.5E-02	1.4E-02	4.9E-02	-	-
Benzo(k)fluoranthene	9.4E-03	4.5E-02	1.0E-02	4.9E-02	-	-
Chrysene	1.3E-02	5.1E-02	1.4E-02	5.5E-02	-	-
Dibenz(a,h)anthracene	1.4E-02	5.7E-02	1.5E-02	6.2E-02	-	-
Fluoranthene	7.0E-03	3.4E-02	1.6E-04	7.6E-04	-	-
Fluorene	5.5E-03	2.3E-02	1.3E-04	5.2E-04	-	-
Indeno(1,2,3-cd)pyrene	7.6E-03	4.0E-02	8.2E-03	4.3E-02	-	-
Naphthalene	2.1E-03	5.2E-03	4.2E-05	1.0E-04	-	-
Perylene	1.3E-03	5.9E-03	-	-	-	-
Phenanthrene	4.9E-02	2.1E-01	9.2E-04	3.9E-03	-	-
Pyrene	1.1E-02	4.5E-02	4.0E-04	1.7E-03	-	-
Total Petroleum Hydrocarbons						
C08-C11(Gasoline Range)	3.2E-01	7.1E-01	-	-	-	-
C11-C14(Kerosene Range)	3.7E-01	7.2E-01	-	-	-	-
C14-C20(Diesel Range)	2.2E+00	8.5E+00	-	-	-	-

Table C2-19 (2 of 2)

Risk Estimates for the Bobcat
Old Conservation Yard RFI Site

	Applied Daily Dose		Hazard Quotient			
	CTE (mg/kg-day)	RME (mg/kg-day)	CTE_{ESL} (unitless)	RME_{ESL} (unitless)	CTE_{TRV} (unitless)	RME_{TRV} (unitless)
C20-C30(Lubricant Oil Range)	9.7E+00	4.5E+01	-	-	-	-
Dioxins						
2,3,7,8-TCDD	3.4E-08	5.9E-08	3.4E-02	5.9E-02	-	-
1,2,3,7,8-PeCDD	2.2E-07	1.7E-06	2.2E-01	**1.7E+00**	-	**1.72E+00**
1,2,3,4,7,8-HxCDD	1.1E-07	4.2E-07	1.1E-02	4.2E-02	-	-
1,2,3,6,7,8-HxCDD	1.4E-07	7.3E-07	1.4E-02	7.3E-02	-	-
1,2,3,7,8,9-HxCDD	1.1E-07	5.1E-07	1.1E-02	5.1E-02	-	-
1,2,3,4,6,7,8-HpCDD	4.7E-06	2.8E-05	4.7E-02	2.8E-01	-	-
OCDD	2.6E-05	5.8E-05	2.6E-03	5.8E-03	-	-
2,3,7,8-TCDF	1.4E-08	6.2E-08	1.4E-03	6.2E-03	-	-
1,2,3,7,8-PeCDF	6.0E-08	3.1E-07	3.0E-03	1.6E-02	-	-
2,3,4,7,8-PeCDF	7.5E-08	4.4E-07	3.7E-02	2.2E-01	-	-
1,2,3,4,7,8-HxCDF	3.5E-08	1.7E-07	3.5E-03	1.7E-02	-	-
1,2,3,6,7,8-HxCDF	1.1E-07	2.2E-07	1.1E-02	2.2E-02	-	-
2,3,4,6,7,8-HxCDF	9.3E-08	5.1E-07	9.3E-03	5.1E-02	-	-
1,2,3,7,8,9-HxCDF	7.6E-08	3.4E-07	7.6E-03	3.4E-02	-	-
1,2,3,4,6,7,8-HpCDF	7.9E-07	1.7E-06	7.9E-03	1.7E-02	-	-
1,2,3,4,7,8,9-HpCDF	2.4E-07	1.0E-06	2.4E-03	1.0E-02	-	-
OCDF	5.7E-06	1.3E-05	5.7E-04	1.3E-03	-	-
PCBs						
Aroclor-1248	1.7E+01	1.8E+02	**1.7E+03**	**1.8E+04**	**1.66E+03**	**1.82E+04**
Aroclor-1254	4.1E-02	1.8E-01	8.9E-01	**3.9E+00**	-	5.0E-01
Aroclor-1260	4.4E-01	4.8E+00	**9.6E+00**	**1.0E+02**	**1.2E+00**	**1.3E+01**
PCB-105	1.0E-04	1.1E-03	1.0E-02	1.1E-01	-	-
PCB-114	4.5E-06	4.6E-05	2.2E-03	2.3E-02	-	-
PCB-118	2.1E-04	2.2E-03	2.1E-02	2.2E-01	-	-
PCB-123	3.5E-06	3.7E-05	3.5E-04	3.7E-03	-	-
PCB-126	5.3E-06	5.6E-05	5.3E-01	**5.6E+00**	-	**5.6E+00**
PCB-156	9.6E-05	1.0E-03	4.8E-02	5.1E-01	-	-
PCB-157	2.9E-04	3.1E-03	1.4E-01	**1.6E+00**	-	**1.6E+00**
PCB-167	9.2E-05	1.0E-03	9.2E-04	1.0E-02	-	-
PCB-169	2.8E-07	3.0E-06	2.8E-03	3.0E-02	-	-
PCB-189	2.0E-05	2.1E-04	2.0E-03	2.1E-02	-	-
PCB-77	4.4E-06	4.7E-05	4.4E-04	4.7E-03	-	-
PCB-81	1.0E-06	1.1E-05	1.0E-04	1.1E-03	-	-
Total PCB Congeners	-	-	7.6E-01	**8.1E+00**	0.0E+00	**7.2E+00**
Total Ingestion HI:			**1.7E+03**	**1.8E+04**	**1.7E+03**	**1.8E+04**
Total Ingestion HI Accounting for Home Range Factor[a]:			**1.4E+01**	**1.5E+02**	**1.4E+01**	**1.5E+02**

Notes:

a. Home range factor based on a minimum home range of 1.8 square miles (1,152 acres), as described in the SRAM, and OCY site area of 9.7 acres.

Home range factor = 0.008

CTE - central tendancy exposure
RME - reasonable maximum exposure
NOAEL - no observable adverse effect level
CTE_{ESL} or RME_{ESL}- The hazard quotient based on the NOAEL equivalent TRV used to calculate the ESL.
CTE_{TRV} or RME_{TRV}- The hazard quotient based on the TRV is calculated only if the hazard quotient based on the ESL is greater than 1.
TRV - toxicity reference value
HI - Hazard Index
VOC - volatile organic compund
SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyls
mg/kg-day - milligram per kilogram per day
"-" not applicable

= HIs for PCB congeners. Not included in Total estimates.

Table C2-20 (1 of 2)

Risk Estimates for the Mule Deer
Old Conservation Yard RFI Site

	Applied Daily Dose		Hazard Quotient			
	CTE (mg/kg-day)	RME (mg/kg-day)	CTE_{ESL} (unitless)	RME_{ESL} (unitless)	CTE_{TRV} (unitless)	RME_{TRV} (unitless)
Ingestion Exposure Route						
Inorganic Compounds						
Antimony	3.6E-01	1.2E+00	**4.4E+00**	**1.4E+01**	5.7E-01	**1.8E+00**
Barium	3.2E+00	3.4E+00	6.3E-01	6.7E-01	-	-
Boron	1.3E+00	1.6E+00	1.4E-01	1.8E-01	-	-
Cadmium	2.2E-01	4.3E-01	**2.0E+02**	**3.8E+02**	**4.79E+00**	**9.18E+00**
Copper	-	-	-	-	-	-
Lead	1.5E+00	1.8E+00	**1.9E+00**	**2.4E+00**	**2.0E+00**	**2.4E+00**
Mercury	1.7E-02	1.1E-01	1.7E-02	1.1E-01	-	-
Silver	5.9E-02	1.2E-01	2.4E-01	5.0E-01	-	-
Thallium	1.8E-02	3.6E-02	9.5E-02	1.9E-01	-	-
Zinc	4.4E+00	4.9E+00	**1.4E+00**	**1.5E+00**	8.2E-02	9.1E-02
VOCs						
1,1,1-Trichloroethane	1.2E-04	2.2E-04	1.4E-06	2.7E-06	-	-
1,1,2-Trichloro-1,2,2-trifluoroethane	5.0E-04	8.4E-04	1.7E-05	2.8E-05	-	-
1,1-Dichloroethene	1.3E-04	2.2E-04	5.1E-05	9.0E-05	-	-
2-Butanone	9.1E-04	4.5E-04	6.8E-07	3.4E-07	-	-
Acetone	1.4E-02	1.4E-01	7.9E-04	7.9E-03	-	-
Benzene	4.6E-05	1.0E-04	1.1E-04	2.4E-04	-	-
Ethylbenzene	4.6E-05	1.0E-04	1.3E-06	2.8E-06	-	-
m,p-Xylene	1.3E-04	3.0E-04	5.9E-06	1.3E-05	-	-
Methylene chloride	1.7E-03	1.0E-02	6.9E-04	4.1E-03	-	-
o-Xylene	3.2E-05	7.0E-05	1.4E-06	3.1E-06	-	-
p-Isopropyltoluene	7.8E-05	7.8E-05	3.4E-06	3.4E-06	-	-
Toluene	6.3E-05	1.5E-04	1.7E-04	3.9E-04	-	-
Trichloroethene	1.2E-04	2.2E-04	7.9E-05	1.4E-04	-	-
Xylenes (total)	1.9E-04	4.1E-04	8.4E-06	1.8E-05	-	-
SVOCs						
1-Methylnaphthalene	4.9E-04	5.4E-04	1.5E-05	1.7E-05	-	-
2,4-Dinitrophenol	2.7E-02	4.1E-02	1.3E-02	2.0E-02	-	-
2-Methylnaphthalene	7.0E-03	2.3E-02	2.1E-04	7.0E-04	-	-
Acenaphthene	6.9E-03	2.9E-02	1.2E-04	5.0E-04	-	-
Acenaphthylene	1.6E-03	5.8E-03	1.4E-05	5.1E-05	-	-
Anthracene	4.8E-03	1.9E-02	1.5E-05	5.9E-05	-	-
Benzo(a)anthracene	8.1E-03	3.8E-02	9.5E-03	4.5E-02	-	-
Benzo(a)pyrene	1.5E-03	7.2E-03	1.7E-03	8.4E-03	-	-
Benzo(b)fluoranthene	1.8E-03	8.1E-03	2.1E-03	9.5E-03	-	-
Benzo(e)pyrene	2.9E-03	1.3E-02	-	-	-	-
Benzo(g,h,i)perylene	3.4E-03	1.2E-02	4.0E-03	1.4E-02	-	-
Benzo(k)fluoranthene	1.5E-03	7.2E-03	1.7E-03	8.4E-03	-	-
Chrysene	6.7E-03	2.7E-02	7.8E-03	3.2E-02	-	-
Dibenz(a,h)anthracene	1.1E-03	4.3E-03	1.2E-03	5.0E-03	-	-
Fluoranthene	1.0E-02	5.0E-02	2.5E-04	1.2E-03	-	-
Fluorene	6.8E-03	2.8E-02	1.7E-04	7.0E-04	-	-
Indeno(1,2,3-cd)pyrene	1.3E-03	6.8E-03	1.5E-03	7.9E-03	-	-
Naphthalene	2.6E-03	6.4E-03	6.9E-05	1.7E-04	-	-
Perylene	1.6E-03	7.2E-03	-	-	-	-
Phenanthrene	1.3E-01	5.3E-01	2.6E-03	1.1E-02	-	-
Pyrene	6.9E-03	2.9E-02	2.8E-04	1.2E-03	-	-
Total Petroleum Hydrocarbons						
C08-C11(Gasoline Range)	4.0E-01	8.8E-01	-	-	-	-
C11-C14(Kerosene Range)	4.5E-01	8.9E-01	-	-	-	-
C14-C20(Diesel Range)	2.7E+00	1.0E+01	-	-	-	-

Table C2-20 (2 of 2)

Risk Estimates for the Mule Deer
Old Conservation Yard RFI Site

	Applied Daily Dose		Hazard Quotient			
	CTE (mg/kg-day)	RME (mg/kg-day)	CTE_{ESL} (unitless)	RME_{ESL} (unitless)	CTE_{TRV} (unitless)	RME_{TRV} (unitless)
C20-C30(Lubricant Oil Range)	1.2E+01	5.6E+01	-	-	-	-
Dioxins						
2,3,7,8-TCDD	4.1E-08	7.2E-08	3.7E-01	6.4E-01	-	-
1,2,3,7,8-PeCDD	2.7E-07	2.1E-06	**2.4E+00**	**1.9E+01**	**2.88E+00**	**2.28E+01**
1,2,3,4,7,8-HxCDD	5.9E-07	2.2E-06	5.3E-01	**1.9E+00**	-	**2.31E+00**
1,2,3,6,7,8-HxCDD	1.5E-07	7.5E-07	1.3E-01	6.7E-01	-	-
1,2,3,7,8,9-HxCDD	7.3E-07	3.5E-06	6.5E-01	**3.1E+00**	-	**3.78E+00**
1,2,3,4,6,7,8-HpCDD	6.7E-06	4.0E-05	6.0E-01	**3.6E+00**	-	**4.30E+00**
OCDD	3.8E-05	8.4E-05	3.3E-02	7.4E-02	-	-
2,3,7,8-TCDF	9.0E-08	4.1E-07	8.0E-02	3.6E-01	-	-
1,2,3,7,8-PeCDF	7.4E-08	3.9E-07	3.3E-02	1.7E-01	-	-
2,3,4,7,8-PeCDF	2.1E-07	1.2E-06	9.3E-01	**5.4E+00**	-	**6.54E+00**
1,2,3,4,7,8-HxCDF	5.3E-07	2.5E-06	4.7E-01	**2.3E+00**	-	**2.72E+00**
1,2,3,6,7,8-HxCDF	2.0E-07	4.1E-07	1.8E-01	3.6E-01	-	-
2,3,4,6,7,8-HxCDF	2.1E-07	1.2E-06	1.9E-01	**1.0E+00**	-	**1.26E+00**
1,2,3,7,8,9-HxCDF	9.4E-08	4.1E-07	8.3E-02	3.7E-01	-	-
1,2,3,4,6,7,8-HpCDF	5.4E-07	1.2E-06	4.8E-02	1.0E-01	-	-
1,2,3,4,7,8,9-HpCDF	2.9E-07	1.2E-06	2.6E-02	1.1E-01	-	-
OCDF	2.6E-06	5.8E-06	2.3E-03	5.1E-03	-	-
PCBs						
Aroclor-1248	2.0E+01	2.2E+02	**2.0E+03**	**2.2E+04**	**2.04E+03**	**2.24E+04**
Aroclor-1254	5.0E-02	2.2E-01	**1.2E+00**	**5.2E+00**	1.9E-01	8.5E-01
Aroclor-1260	5.4E-01	5.9E+00	**1.3E+01**	**1.4E+02**	**2.1E+00**	**2.3E+01**
PCB-105	1.5E-04	1.6E-03	2.0E-02	2.1E-01	-	-
PCB-114	3.1E-06	3.1E-05	2.0E-03	2.1E-02	-	-
PCB-118	2.8E-04	3.0E-03	3.8E-02	4.0E-01	-	-
PCB-123	4.3E-06	4.6E-05	5.7E-04	6.1E-03	-	-
PCB-126	7.7E-06	8.2E-05	**1.0E+00**	**1.1E+01**	**1.1E+00**	**1.1E+01**
PCB-156	7.4E-05	7.9E-04	4.9E-02	5.2E-01	-	-
PCB-157	3.5E-05	3.7E-04	2.3E-02	2.5E-01	-	-
PCB-167	6.4E-05	6.9E-04	8.5E-04	9.1E-03	-	-
PCB-169	3.5E-07	3.7E-06	4.6E-03	5.0E-02	-	-
PCB-189	7.4E-06	8.0E-05	9.9E-04	1.1E-02	-	-
PCB-77	1.7E-05	1.8E-04	2.2E-03	2.4E-02	-	-
PCB-81	3.7E-06	3.9E-05	4.9E-04	5.2E-03	-	-
Total PCB Congeners	-	-	**1.2E+00**	**1.2E+01**	**1.1E+00**	**1.1E+01**
Total Ingestion HI:			**2.3E+03**	**2.3E+04**	**2.1E+03**	**2.2E+04**
Total Ingestion HI Accounting for Home Range Factor[a]:			**1.1E+02**	**1.2E+03**	**1.0E+02**	**1.1E+03**

Notes:

a. Home range factor based on minimum home range of 0.3 square miles (192 acres), as described in the SRAM, and OCY site area of 9.7 acres.

Home range factor = 0.051

CTE - central tendancy exposure
RME - reasonable maximum exposure
NOAEL - no observable adverse effect level
CTE_{ESL} or RME_{ESL}- The hazard quotient based on the NOAEL equivalent TRV used to calculate the ESL.
CTE_{TRV} or RME_{TRV}- The hazard quotient based on the TRV is calculated only if the hazard quotient based on the ESL is greater than 1.
TRV - toxicity reference value
HI - Hazard Index
VOC - volatile organic compund
SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyls
mg/kg-day - milligram per kilogram per day
"-" not applicable

= HIs for PCB congeners. Not included in Total estimates.

Risk Estimates for Terrestrial Invertebrates
Old Conservation Yard RFI Site

Chemical	EPCs		TRV	Hazard Quotient	
	CTE (mg/kg)	RME (mg/kg)	(mg/kg)	CTE (unitless)	RME (unitless)
Inorganic Compounds					
Antimony	1.7E+00	5.4E+00	7.8E+01	2.1E-02	6.9E-02
Barium	7.8E+01	8.3E+01	3.3E+02	2.4E-01	2.5E-01
Boron	4.3E+00	5.2E+00	NA	-	-
Cadmium	5.2E-01	9.9E-01	1.4E+02	3.7E-03	7.1E-03
Lead	1.7E+01	2.1E+01	1.7E+03	1.0E-02	1.2E-02
Mercury	5.0E-01	3.3E+00	1.0E-01	**5.0E+00**	**3.3E+01**
Silver	8.6E-01	1.8E+00	NA	-	-
Thallium	8.6E-01	1.7E+00	NA	-	-
Zinc	6.6E+01	7.4E+01	2.0E+02	3.3E-01	3.7E-01
VOCs					
1,1,1-Trichloroethane	3.0E-03	5.5E-03	NA	-	-
1,1,2-Trichloro-1,2,2-trifluoroethane	1.2E-02	2.1E-02	NA	-	-
1,1-Dichloroethene	3.2E-03	5.5E-03	NA	-	-
2-Butanone	2.2E-02	1.1E-02	NA	-	-
Acetone	3.5E-01	3.5E+00	NA	-	-
Benzene	1.1E-03	2.5E-03	NA	-	-
Ethylbenzene	1.1E-03	2.5E-03	NA	-	-
m,p-Xylene	3.2E-03	7.2E-03	NA	-	-
Methylene chloride	4.1E-02	2.4E-01	NA	-	-
o-Xylene	7.8E-04	1.7E-03	NA	-	-
p-Isopropyltoluene	1.9E-03	1.9E-03	NA	-	-
Toluene	1.5E-03	3.6E-03	NA	-	-
Trichloroethene	3.0E-03	5.5E-03	NA	-	-
Xylenes (total)	4.7E-03	9.9E-03	NA	-	-
SVOCs					
1-Methylnaphthalene	1.2E-02	1.3E-02	NA	-	-
2,4-Dinitrophenol	6.7E-01	1.0E+00	NA	-	-
2-Methylnaphthalene	1.7E-01	5.6E-01	NA	-	-
Acenaphthene	1.7E-01	7.0E-01	NA	-	-
Acenaphthylene	4.0E-02	1.4E-01	NA	-	-
Anthracene	1.2E-01	4.7E-01	NA	-	-
Benzo(a)anthracene	3.9E-02	1.8E-01	NA	-	-
Benzo(a)pyrene	3.6E-02	1.8E-01	2.5E+04	1.5E-06	7.0E-06
Benzo(b)fluoranthene	4.4E-02	2.0E-01	NA	-	-
Benzo(e)pyrene	7.1E-02	3.1E-01	NA	-	-
Benzo(g,h,i)perylene	8.4E-02	3.0E-01	NA	-	-
Benzo(k)fluoranthene	3.6E-02	1.8E-01	NA	-	-
Chrysene	5.9E-02	2.4E-01	NA	-	-
Dibenz(a,h)anthracene	2.6E-02	1.0E-01	NA	-	-

Risk Estimates for Terrestrial Invertebrates
Old Conservation Yard RFI Site

Chemical	EPCs		TRV	Hazard Quotient	
	CTE (mg/kg)	RME (mg/kg)	(mg/kg)	CTE (unitless)	RME (unitless)
Fluoranthene	9.0E-02	4.3E-01	3.8E+01	2.4E-03	1.1E-02
Fluorene	1.7E-01	6.9E-01	2.7E+01	6.2E-03	2.6E-02
Indeno(1,2,3-cd)pyrene	3.2E-02	1.7E-01	NA	-	-
Naphthalene	6.3E-02	1.6E-01	NA	-	-
Perylene	4.0E-02	1.8E-01	NA	-	-
Phenanthrene	4.4E-01	1.9E+00	3.4E+01	1.3E-02	5.4E-02
Pyrene	8.9E-02	3.7E-01	1.8E+01	4.9E-03	2.1E-02
Total Petroleum Hydrocarbons					
C08-C11(Gasoline Range)	9.7E+00	2.2E+01	NA	-	-
C11-C14(Kerosene Range)	1.1E+01	2.2E+01	NA	-	-
C14-C20(Diesel Range)	6.5E+01	2.6E+02	NA	-	-
C20-C30(Lubricant Oil Range)	2.9E+02	1.4E+03	NA	-	-
Dioxins					
2,3,7,8-TCDD	1.0E-06	1.8E-06	5.0E+02	2.0E-09	3.5E-09
1,2,3,7,8-PeCDD	6.6E-06	5.2E-05	NA	-	-
1,2,3,4,7,8-HxCDD	1.4E-05	5.3E-05	NA	-	-
1,2,3,6,7,8-HxCDD	2.0E-05	1.0E-04	NA	-	-
1,2,3,7,8,9-HxCDD	1.8E-05	8.6E-05	NA	-	-
1,2,3,4,6,7,8-HpCDD	4.9E-04	2.9E-03	NA	-	-
OCDD	3.7E-03	8.2E-03	NA	-	-
2,3,7,8-TCDF	2.2E-06	1.0E-05	NA	-	-
1,2,3,7,8-PeCDF	1.8E-06	9.5E-06	NA	-	-
2,3,4,7,8-PeCDF	5.1E-06	3.0E-05	NA	-	-
1,2,3,4,7,8-HxCDF	1.3E-05	6.2E-05	NA	-	-
1,2,3,6,7,8-HxCDF	4.9E-06	1.0E-05	NA	-	-
2,3,4,6,7,8-HxCDF	5.2E-06	2.9E-05	NA	-	-
1,2,3,7,8,9-HxCDF	2.3E-06	1.0E-05	NA	-	-
1,2,3,4,6,7,8-HpCDF	5.5E-05	1.2E-04	NA	-	-
1,2,3,4,7,8,9-HpCDF	7.2E-06	3.0E-05	NA	-	-
OCDF	1.8E-04	4.1E-04	NA	-	-
Aroclor-1248	5.0E+02	5.5E+03	NA	-	-
Aroclor-1254	1.2E+00	5.4E+00	5.0E+01	2.5E-02	1.1E-01
Aroclor-1260	1.3E+01	1.4E+02	NA	-	-
PCB-105	1.1E-03	1.2E-02	NA	-	-
PCB-114	2.1E-05	2.1E-04	NA	-	-
PCB-118	2.2E-03	2.4E-02	NA	-	-
PCB-123	3.1E-05	3.3E-04	NA	-	-
PCB-126	8.6E-05	9.2E-04	NA	-	-
PCB-156	7.4E-04	7.9E-03	NA	-	-

Risk Estimates for Terrestrial Invertebrates
Old Conservation Yard RFI Site

Chemical	EPCs		TRV	Hazard Quotient	
	CTE (mg/kg)	RME (mg/kg)	(mg/kg)	CTE (unitless)	RME (unitless)
PCB-157	3.3E-04	3.5E-03	NA	-	-
PCB-167	5.7E-04	6.1E-03	NA	-	-
PCB-169	8.5E-06	9.2E-05	NA	-	-
PCB-189	8.5E-05	9.2E-04	NA	-	-
PCB-77	1.7E-04	1.8E-03	NA	-	-
PCB-81	3.1E-05	3.2E-04	NA	-	-
Total HI:				**5.7E+00**	**3.4E+01**

Notes:

EPC - exposure point concentration (based on 0 to 2 feet bgs data) as presented in Spreadsheet C2-90.
CTE - central tendancy exposure
RME - reasonable maximum exposure
NC - not selected as a CPEC in the indicated media, per the SRAM (MWH, 2005).
CPEC - chemical of potential ecological concern
TRV - toxicity reference value
HI - Hazard Index
VOC - volatile organic compound
SVOC - semi-volatile organic compounds
PCB - polychlorinated biphenyls
PCDD/PCDF - polychlorinated dibenzo-p-dioxins and dibenzofurans

Ecological Risk Assessment Uncertainty Analysis
Old Conservation Yard RFI Site

Assessment Element	Uncertainty	Magnitude of Impact	Direction of Impact
CPEC Selection	A number of inorganics (e.g., antimony, barium, copper) that were demonstrated to be consistent with background concentrations through Wilcoxon Rank Sum test were included as CPECs because the maximum detected concentrations were substantially above the maximum detected background concentration, were located in suspected areas of metals impacts and in some cases SQLs were above ESLs.	Moderate	Conservative
EPC Calculations	The extrapolation of soil TPH concentrations to individual petroleum constituent (i.e., PAHs) concentrations introduces some uncertainty into the EPC estimates for petroleum constituents. Because several samples collected for SVOCs did not detect PAHs, the uncertainty associated with this procedure is low.	Low	Conservative
	The extrapolation of soil TPH concentrations to individual petroleum constituent (i.e., BTEX), extrapolations were conducted on a dataset containing elevated detection limits. Therefore, the estimated EPC is considered very conservative.	Moderate	Conservative
	The 95% UCL concentration of some chemicals is greater than the maximum concentration, therefore the maximum was used as the EPC. This is considered to be a likely overestimation of the representative exposure point concentration because samples were collected in areas with the highest likelihood to detect the highest concentrations at the site.	Moderate	Conservative
	Soil matrix CPEC methylene chloride, significant risks are estimated associated with vapor concentrations related to 1/2 the DL though the chemical was not detected in soil vapor.	Low	Conservative
	Estimation of soil vapor concentrations overstates actual burrow concentrations: 1. Model is conservative 2. Model does not account for attenuation between 13 feet bgs depth to groundwater and 0 to	Moderate	Conservative
	6 feet bgs interval for burrows 2. Air flow in burrows is not accounted for	Low	Conservative
Toxicity Reference Value	High degree of uncertainty in extrapolation of dose-response data from laboratory animals to representative receptors.	High	Conservative
	Avian toxicity values are only available for a limited number of chemicals. For the types of chemicals observed at the OCY RFI site, there is likely little difference in the degree of toxicity between mammals and avian species.	Low	Not conservative
	Use of short-term (acute) toxicity data to estimate chronic toxicity values are highly uncertain.	High	Conservative

Notes:
CPEC - chemical of potential ecological concern
UCL - upper confidence limit
PAH - polycyclic aromatic hydrocarbon
EPC - exposure point concentration
bgs - below ground surface
TPH - total petroleum hydrocarbons
SVOC - semivolatile organic chemicals
BTEX - benzene, toluene, ethylbenzene, and xylenes
SQL - sample quantitation limit
ESL - ecological screening level

GROUP 6 – NORTHEASTERN PORTION OF AREA IV
RCRA FACILITY INVESTIGATION RISK ASSESSMENT REPORT
SANTA SUSANA FIELD LABORATORY
VENTURA COUNTY, CALIFORNIA

VOLUME IV – APPENDICES B THROUGH D

APPENDIX C, ATTACHMENT C3

SODIUM REACTOR EXPERIMENT (SRE) AREA (AREA IV AOC)

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* A standard list of risk tables, figures, and attachments is used for all the RFI site reports for ease of comparison. If a table, figure, or attachment is not included in this site report it was not necessary for the risk assessments.

LIST OF ACRONYMNS AND ABBREVIATIONS

ADD	average daily dosage or applied daily dosage
AOC	Area of Concern
bgs	below ground surface
BAF	bioaccumulation factor
COPC	chemical of potential concern
CPEC	chemical of potential ecological concern
CSF	cancer slope factor
CSM	conceptual site model
CTE	central tendency exposure
DCA	dichloroethane
DCE	dichloroethene
Dioxins	polychlorinated dibenzo-p-dioxins/dibenzofurans
DTSC	Department of Toxic Substance Control
EPC	exposure point concentration
EPV	exposure point values
ERA	ecological risk assessment
ESL	ecological screening level
HI	hazard index
HQ	hazard quotient
HRA	human health risk assessment
HSDB	Hazardous Substances Data Bank
gpm	gallons per minute
IRIS	Integrated Risk Information System
LADD	lifetime average daily dosage
LOAEL	lowest observable adverse effect level
mg/kg	milligrams per kilogram
mg/kg-day	milligrams per kilogram per day
mg/L	milligrams per liter
NOAEL	no observable adverse effect level
p	probability
PAH	polynuclear aromatic hydrocarbon
PCB	polychlorinated biphenyl
PCE	tetrachloroethene
PEF	particulate emission factor
RCRA	Resource Conservation and Recovery Act
RfD	reference dose
RFI	RCRA facility investigation
RME	reasonable maximum exposure
SQL	sample quantitation limit
SRAM	Standardized Risk Assessment Methodology
SRE	Sodium Reactor Experiment Area
SSFL	Santa Susana Field Laboratory
SVOC	semivolatile organic compound

LIST OF ACRONYMNS AND ABBREVIATIONS (Continued)

SWRCB	State Water Resources Control Board
TCA	trichloroethane
TCE	trichloroethene
TDS	total dissolved solids
TPH	total petroleum hydrocarbons
TRV	toxicity reference value
UCL	upper confidence limit
USEPA	United States Environmental Protection Agency
VOC	volatile organic compound
µg/L	micrograms per liter

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C1.0 INTRODUCTION

This attachment to Appendix C of the Group 6 Resource Conservation Recovery Act (RCRA) Facility Investigation (RFI) Report presents the human health risk assessment (HRA) and ecological risk assessment (ERA) for the Sodium Reactor Experiment Area (SRE) RFI Site (Area IV Area of Concern [AOC]) at the Santa Susana Field Laboratory (SSFL). The RCRA Corrective Action Program at the SSFL is being conducted under the oversight of the California Environmental Protection Agency, Department of Toxic Substances Control (DTSC).

The risk assessments were performed following the methods described in the Standardized Risk Assessment Methodology, Revision 2 (SRAM) for the Santa Susana Field Laboratory (SSFL) (MWH 2005); any additional procedures or differences from the SRAM are described in the Appendix C text. Supporting background information and data for the risk assessment were presented in Sections 1 through 3 of Appendix A3. Laboratory data are presented in Attachment 3 of Appendix A3. The following sections describe the HRA and ERA performed for the SRE RFI site at the SSFL. Key findings of the HRA and ERA are presented in Appendix A3, Section 4.

This report contains the following sections:

Section 1	Introduction
Section 2	Data Usability Assessment
Section 3	Human Health Risk Assessment
Section 4	Ecological Risk Assessment
Section 5	References

Risk assessment Tables C3-1 through C3-28 are provided both in electronic and printed format. The printed tables follow the text of this appendix. The electronic copies of the tables, and associated calculation spreadsheets (S-C3-1 through S-C3-150) used to generate these tables, are included as electronic copies in Appendix C, Attachment C8.

Please note that a standard list of risk assessment tables, figures, spreadsheets, and attachments is used for all SSFL RFI site risk assessment reports for terrestrial sites[i]. Not all tables, figures, spreadsheets, or attachments are applicable to all site risk assessments. Therefore, some items may be missing or not in consecutive order in the following text.

C2.0 DATA USABILITY ASSESSMENT FOR RISK ASSESSMENT

Chemical data collected at the SRE RFI site were evaluated for their usability for risk assessment. Colocated duplicates, laboratory confirmation, or agency split sample soil data were used to evaluate data quality, but are not used quantitatively in the risk assessments.

All SRE RFI site soil, sediment, soil vapor, surface water, Chatsworth formation groundwater underlying SRE, and Group 6 RFI report area Chatsworth formation groundwater data were determined to be usable for risk assessment. These data are presented in Attachment 3 of Appendix A3 and Appendix B for soil and groundwater, respectively. Soil data for various chemical groups are presented in Figures A3.3-1 through A3.3-4 of Appendix A3. Section C-4.3 of Appendix C presents how site data were selected for risk assessment calculations.

Exposure to near surface groundwater is not a potentially complete exposure pathway because near surface groundwater is not present at the SRE RFI site. Therefore, exposures to near surface groundwater are not evaluated at the SRE RFI site.

Chatsworth formation groundwater monitoring wells and analytical data representative of the SRE RFI site as well as all of Group reporting areas were selected following the methods described in the SRAM (MWH 2005). The SRE data were selected to evaluate indirect exposures (i.e. vapor) and the Group 6 data to evaluate potential domestic groundwater use. In summary, the most recent available 3 years of monitoring data are used for all wells determined to be representative of groundwater beneath the site. These data are further supplemented with previous years' data in cases where chemicals of potential concern (COPCs) identified in soil or soil vapor at the site were not sampled in the most recent 3 years.

[i] See SRE-RiskBook00-README.xls file for a list of tables and spreadsheets used in the risk assessment for SRE.

C3.0 HUMAN HEALTH RISK ASSESSMENT

The following sections describe the HRA for the SRE RFI site.

C3.1 SELECTION OF CHEMICALS OF POTENTIAL CONCERN

The selection of Chemicals of Potential Concern (COPCs) is the process of identifying those media-specific chemicals that may pose a risk or hazard to human receptors. COPCs selected for the HRA at the SRE RFI site are presented in Table C3-1.

The COPC selection process is summarized in Spreadsheets C3-1 through C3-5 for soil/sediment at 0 to 2 feet below ground surface (bgs), soil/sediment at 0 to 10 feet bgs, soil vapor, surface water, and groundwater. No background datasets are available for sediments, therefore, comparison of observed chemical concentrations to background soil concentrations was conducted. This is considered to be a conservative COPC selection process, as sediments are generally comprised of much finer-grained material and have greater total organic carbon (TOC) concentrations than soils. Fine-grained materials can have much higher, but yet naturally occurring, levels of inorganics (i.e. metals) than those detected in background soils. This comparison of sediment concentrations to background soils concentrations is more likely to lead to false positives (i.e. selection of a chemical as a COPC). Comparison of observed chemical concentrations to background chemical concentrations for soil at 0 to 2 feet bgs and soil at 0 to 10 feet bgs are presented in Spreadsheets C3-6 through C3-7.

As described in Section 3.3 of the SRAM (MWH 2005), when conducting the statistical comparison to background, the Gehan adjustment was to be applied to non-detected values where greater than 40 percent of the site or background data are non-detect. For the SRE RFI site, the Gehan adjustment was conducted on all non-detected metal concentrations evaluated in the Wilcoxon Rank Sum Test. Also, the Gehan adjustment could not be performed on dioxins results due to the method of combining detect and non-detect results for polychlorinated dibenzo-p-dioxins/dibenzofurans (dioxins) when comparing site data with background, the Gehan adjustment could not be performed. These process changes do not affect the results.

Several chemicals were determined to be present at concentrations consistent with background by Wilcoxon Rank Sum Test, yet were selected as COPCs. This is because these chemicals either had maximum concentrations significantly above maximum background concentrations and were in areas of known or suspected metals impacts, or had elevated detection limits.

C3.2 CONCEPTUAL SITE MODEL FOR HUMAN HEALTH RISK ASSESSMENT

Following COPC selection, a RFI site-specific conceptual site model (CSM) was developed to identify potential human receptors, exposure scenarios, and possible exposure pathways. The human health CSM for the SRE RFI site is presented in Table C3-2.

There is an intermittent pond located at the SRE RFI site which is on occasion filled with water, i.e., there are areas of the site where soils or sediments are currently and routinely wet/unexposed. Therefore, two exposure scenarios were evaluated: when the pond is full (wet pond scenario) all year-round, and when the pond is dry/empty (dry pond scenario) all year-round. Each of these scenarios represent opposing ends of the current conditions spectrum. Thus, the wet and dry pond scenarios bound potential risk estimates as any condition intermediate to these two contrasting conditions will result in intermediate risk estimates. Risk estimates for both wet and dry pond scenarios are provided in this attachment; conservative risk estimates are presented in Appendix A. Exposure of potential receptors to dry sediments (hereafter referred to as soil/sediment) and surface water are both potential exposure routes. Assessment of both of these two exposure conditions bounds the range of potential exposures and risks that may arise from exposure to sediments at the site.

C3.3 EXPOSURE ASSESSMENT

This section presents the risk assessment for the SRE RFI site. This entire site has been considered as one exposure area. Therefore, the HRA assumes that receptors are exposed to chemical over the entire 9.2 acre site.

C3.3.1 Exposure Point Concentrations for Direct Contact Media

For COPCs in soil/sediment Chatsworth formation underlying the SRE RFI site and the Group 6 report, summary statistical calculations, distribution testing and 95 percent upper

confidence limit of the arithmetic mean concentration (95% UCL) calculations for the purposes of estimating EPCs were calculated utilizing the most current version of USEPA's ProUCL Version 3.0 software. Recommendations for appropriate distributions and 95% UCLs provided by the program were utilized. The 95% UCL concentration is used in the calculation of the reasonable maximum exposure (RME).

The chemical-specific exposure concentration for the most likely (average) exposure, also referred to as the central tendency exposure (CTE) concentration, was characterized as the arithmetic mean soil concentration. As recommended in DTSC guidance (1992), one-half of the analytical reporting limit concentration was used as a representative concentration for non- detect results for COPCs.

In cases where only one sample was available, the single measured sample result was used for both the CTE and RME EPCs. In cases where only two samples were available, the CTE EPC was estimated as the arithmetic mean of the two measured values, and the RME EPC was estimated as the maximum measured value.

For COPCs in Chatsworth formation groundwater underlying the SRE RFI site and Group 6 RFI report area Chatsworth formation groundwater the maximum detected value was selected as the exposure point concentration (EPC). Dioxin congener group[ii] summations for soil 0 to 2 feet bgs, and soil 0 to 10 feet bgs are presented in Spreadsheets C3-9 through C3-10. EPCs for soil at 0 to 2 feet bgs, soil at 0 to 10 feet bgs, soil vapor and groundwater at the SRE RFI site are presented in Table C3-3 and summarized in Spreadsheets C3-11 through C3-14. Aroclor to polychlorinated biphenyl (PCB) congeners extrapolation calculations for soil at 0 to 2 feet bgs and soil at 0 to 10 feet bgs are presented in C3-15 and C3-17, respectively. Total petroleum hydrocarbon (TPH) to petroleum constituent extrapolation calculations for soil at 0 to 2 feet bgs and soil at 0 to 10 feet bgs soil are presented in Spreadsheets C3-16 and C3-18, respectively.

For COPCs in soil vapor, EPCs were estimated either from measured soil vapor data using ProUCL or at one-half the measured soil vapor detection limit. Estimating from soil data by using the soil to soil vapor partitioning portion of the Johnson and Ettinger (1991) indoor air

[ii] Note: Toxic Equivalency Factors (TEFs) from Van den Berg et al. 2006 were used in this risk assessment.

model was not used because it achieved soil vapor EPCs greater than the measured detection limits.

C3.3.2 Exposure Point Concentrations for Indirect Contact Media

EPCs for the following indirect contact media are discussed in this section: airborne fugitive dusts, ambient air, indoor air, and edible plants (i.e., homegrown consumption). Airborne particulate COPC concentrations were estimated for non-volatile COPCs. Derivation of the particulate emission factor (PEF) for soil is presented in Spreadsheet C3-19, and estimation of airborne particulate COPC concentrations for soil is presented in Spreadsheets C3-20.

Ambient air COPC concentrations were estimated for volatile COPCs by modeling migration from soil vapor at 0 to 10 feet bgs to ambient air, and from groundwater to ambient air. Parameter values used for soil vapor to air migration and estimation of ambient air EPCs related to soils are presented in Spreadsheets C3-21 and C3-22, respectively. Parameter values used for estimation of ambient air EPCs related to groundwater are presented in Spreadsheets C3-23 and C3-24, respectively.

Indoor air COPC concentrations were estimated for volatile COPCs by modeling migration from soil vapor at 0 to 10 feet bgs soil, and Chatsworth formation groundwater underlying the SRE RFI site to hypothetical residential and commercial buildings. Soil vapor data where available, were preferentially used for indoor air modeling. Results for soil vapor and SRE RFI Chatsworth formation groundwater COPC migration to indoor air for commercial and residential buildings are presented in Spreadsheets C3-25 and C3-26, and C3-28 and C3-29 respectively.

Derivation of edible plant concentrations is calculated utilizing soil to plant uptake factors as described in the SRAM (MWH 2005). COPC concentrations in edible plant tissues from soil at 0 to 2 feet bgs is presented in Spreadsheets C3-30.

C3.3.3 Human Intake of COPCs

EPCs were applied to human intake equations, as presented in the SRAM, to calculate lifetime average daily dosages (LADDs) and average daily dosages (ADDs). A concentration-toxicity screen to determine the appropriate soil depth for assessing exposures

for the worker and resident (i.e., 0 to 2 feet bgs or 0 to 10 feet bgs) is presented in Spreadsheet C3-31. The results indicated that the 0 to 10 feet bgs soil/sediment depth poses a greater potential for exposure and risk than does the 0 to 2 feet bgs soil/sediment depth. Therefore, potential exposure to the 0 to 10 feet bgs soil depth was evaluated for the worker and resident.

Pathway- and chemical-specific LADDs and ADDs are presented in Spreadsheets C3-32 through C3-36 for adult workers, adult recreators, child recreators, adult residents, and child residents. Pathway-specific spreadsheets used to calculate intakes for these receptors are presented in Spreadsheets C3-37 through C3-74.

C3.4 RISK CHARACTERIZATION

Potential human health cancer and non-cancer risks were estimated by application of DTSC-approved toxicity values to the LADDs and ADDs presented in Section 3.3.3. Human health toxicity values utilized in this risk assessment are presented in Table C3-4. Risk estimates are presented in Section 3.4.1, and an evaluation of the uncertainty associated with these risk estimates is presented in Section 3.4.3. Generally, estimated cancer risks within the range 10^{-6} to 10^{-4}, and HIs less than 1, are considered to be acceptable for the purpose of making remedial decisions (USEPA 1993).

C3.4.1 Estimates of Human Health Risks

Total pathway- and chemical-specific cancer risks and hazard quotients (HQs), as well as cumulative cancer risks, and hazard indices (HIs), and estimated blood lead levels, are presented in Tables C3-5 through C3-11 for the adult worker, adult recreator, child recreator, adult resident, and child resident.

As discussed previously, both a dry pond and a wet pond scenario were evaluated. Since both the wet-pond and dry-pond scenarios potentially reflect current conditions, the higher risk estimates from both scenarios are discussed in this section. In addition, only the highest risks are summarized in Section 4 of Appendix A4 and Section 6 of the main text.

Estimated cancer risks for all receptors for exposures to surficial media and VOCs due to vapor migration range from 3×10^{-8} (CTE) to 4×10^{-4} (RME) and HIs range from 0.0011 (CTE) to 1.3 (RME). For the receptor with the greatest potential exposure and risk (child resident), total cancer risk ranged from 1×10^{-5} to 4×10^{-4} and total HI ranged from 0.26 to 1.3. The chemicals contributing to these potential risks are Aroclor 1254, Aroclor 1260, dioxins, PAHs, and methylene chloride in soil.

Blood lead levels associated with soil exposures are less than 10 µg/dl for all receptors. Estimated blood lead levels for the child resident range up to 4.3 µg/dl.

Risks based on direct contact with surface water range from 4×10^{-7} (CTE) to 5×10^{-5} (RME) and HIs range from 0.0017 (CTE) to 0.1 (RME). For the receptor with the greatest potential exposure and risk (adult and child recreators), risks range from 3×10^{-6} (CTE) to 6×10^{-5} (RME) and HIs range from 0.017 to 0.1. The chemical contributing most substantially to these potential risks are arsenic and dioxins in surface water.

Risks based on direct use of Chatsworth formation groundwater as a drinking water source range from 8×10^{-7} (CTE) to 3×10^{-6} (RME) and HIs range from 1.4 (CTE) to 8.2 (RME). For the receptor with the greatest potential exposure and risk (child resident), risks range from 2×10^{-6} (CTE) to 3×10^{-6} (RME) and HIs range from 4.9 to 8.2. The chemical contributing most substantially to these potential risks is TCE in groundwater.

The risks based on both exposure to all relevant surficial media plus both indirect and direct exposures to chemicals in groundwater for all receptors range from 3×10^{-8} to 4×10^{-4} and HIs range from 0.0011 to 9.5. For the receptor with the greatest potential exposure and risk (child resident), risks range from 2×10^{-5} (CTE) to 4×10^{-4} (RME) and HIs range from 5.2 to 9.5. The chemicals contributing to these potential risks are Aroclor 1254, Aroclor 1260, dioxins, PAHs, and methylene chloride in soil, TCE in groundwater, and thallium from a combined exposure to soil and groundwater.

C3.4.2 Potential Sediment Migration

There are two potential migration pathways for sediment at the SRE RFI site. This one is from the pond moving downgradient in channels to the North. This channel has been

samples for those chemicals detected in the pond sediments. The risk for this drainage has been evaluated in this HRA and ERA.

The second potential migration pathway for sediment from the SRE RFI site is the pipeline used when water was pumped from the pond and discharged at OCY. Both the end-of-pipe area and subsequent downslope drainage at OCY and NCY have been characterized with respect to the chemicals detected in the SRE pond. The HRAs and ERAs at OCY and NCY include the evaluation of the potential migration areas.

C3.4.3 Uncertainty Analysis

There is some degree of uncertainty associated with nearly all exposure parameter values, toxicity values, and exposure assumptions used in the risk assessment process. In nearly all cases, exposure and toxicity values are upper-bound estimates that result in a conservative estimate of risk. Thus, any uncertainty in the risk assessment is accounted for by use of data and assumptions that are protective of human health. Generally, quantitative risk estimates are considered to be overstated.

Six major uncertainty issues were identified for the HRA performed at the SRE RFI site. These uncertainties are described below, and a qualitative analysis of the uncertainty associated with other key exposure assumptions and toxicity values used to estimate human health cancer and non-cancer risk is presented in Table C3-12.

1. Risks associated with polynuclear aromatic hydrocarbons (PAHs\) are estimated based, in part, on extrapolation factors using site TPH data as described in the SRAM (MWH 2005). The estimation of PAH concentrations from TPH concentrations is considered conservative since the extrapolation factors used to estimate PAH concentrations are based on the maximum ratio of TPH concentration to petroleum constituent concentration in the dataset. Where available, site-specific (actual) chemical data are used in the risk assessment and supercedes data estimated using the extrapolation.

2. Where VOCs are detected in one media, and analyzed for in media to which the VOC could migrate but were not detected, media-to-media extrapolation was conducted (e.g., soil vapor to soil). This procedure is expected to overestimate potential exposures.

3. The SRE RFI site contains an intermittent pond. Based on the potential for both dry (e.g. fugitive dust) and wet (e.g. surface water) exposures in the same area; both scenarios were evaluated separately and the maximum risks presented

4. A number of inorganics (e.g., cadmium, copper, lead) that were demonstrated to be consistent with background concentrations through Wilcoxon Rank Sum test were included as COPCs because the maximum detected concentrations were substantially above the maximum detected background concentration and the samples were located in areas of suspected metals impacts.

5. The maximum detected concentration of each COPC detected in groundwater was utilized as the EPC. This is likely to result in an overestimation of potential exposures.

6. Potential impacts of the Topanga fire on the selection of COPCs and risks have been evaluated. Although, as shown in Appendix D, soil concentrations of metals and dioxins have been impacted by the fire and therefore risks have been increased, there were no identified risk assessment decisions based solely on post-Topanga fire data. However, the only elevated dioxin result updrainage from the pond was a post-fire sample.

C4.0 ECOLOGICAL RISK ASSESSMENT

The following sections describe the ERA performed for the SRE RFI site.

C4.1 SELECTION OF CHEMICALS OF POTENTIAL ECOLOGICAL CONCERN

The selection of chemicals of potential ecological concern (CPECs) is the process of identifying media-specific chemical contaminants that may pose a risk or hazard to ecological receptors. CPECs do not necessarily signify a risk—rather, they are merely chemicals that have been identified for further analyses. Criteria for selecting CPECs are specified in the SRAM and are the same as for selecting COPCs (see Section 3.1), except that CPEC selection requires an additional step. In this step SQLs are compared to ecological screening levels (ESLs) to assure that SQLs are sufficiently low to detect a concentration that may pose an ecological risk.

CPECs selected for risk assessment at the SRE RFI site are presented in Table C3-13.

The CPEC selection process is summarized in Spreadsheets C3-75 through C3-77 for soil at 0 to 2 feet bgs, soil at 0 to 4 feet bgs, soil at 0 to 6 feet bgs, and Spreadsheets C3-78 and

C3-79, for soil vapor at 0 to 6 feet bgs and surface water, respectively. Because VOCs have the potential to migrate from soil to burrow air, any VOC identified as a soil CPEC was selected as a soil vapor CPEC.

The comparison of SQLs to ESLs for soil/sediment 0 to 2 feet bgs, 0 to 4 feet bgs, and soil/sediment 0 to 6 feet bgs and for surface water is presented in Spreadsheets C3-80 though C3-82. The ESL screen was applied as follows:

- Chemicals were retained as CPECs if the compound was detected infrequently or not at all, the compound is potentially site-related, and there were an insufficient number of SQLs less than ESLs to conclude that the chemical was not present at concentrations greater than ESLs.
- For metals, if a sufficient number of SQLs were within the range of SSFL background concentrations to conclude that these chemicals were not likely present at concentrations exceeding background, then those chemicals were not selected as CPECs even if they exceeded their respective ESLs.

Comparison of observed chemical concentrations to background chemical concentrations for soils at 0 to 2 feet bgs, 0 to 4 feet bgs, and 0 to 6 feet bgs are presented Spreadsheets C3-83 through C3-85.

Although no background datasets are available for sediments, comparison of observed chemical concentrations to background soil concentrations was conducted. This is considered to be a conservative CEPC selection process, as sediments are generally comprised of much finer-grained material and have greater TOC concentrations than soils. Fine-grained materials can have much higher, but yet naturally occurring, levels of inorganics than those detected in soils.

Several chemicals determined to be present at concentrations consistent with background as determined by Wilcoxon Rank Sum Test were selected as CPECs. This is because these chemicals were present with maximum concentrations significantly greater than maximum background concentrations and located in areas of potential metals impacts, or had elevated detection limits greater than SQLs.

C4.2 CONCEPTUAL SITE MODEL AND ENDPOINTS FOR THE ECOLOGICAL RISK ASSESSMENT FOR ECOLOGICAL RISK ASSESSMENT

Following CPEC selection, a site-specific CSM was developed that identifies ecological receptors and potentially complete exposure pathways, and assessment and measurement endpoints were selected to focus the ERA.

C4.2.1 Conceptual Site Model

The SRE RFI site is approximately 9.2 acres and is characterized by thin soils with small areas of rock outcrops. The Site almost entirely supports ruderal habitat consisting of patches of non-native grasses and coast live oak. Patches of a scrub variety are found extensively throughout the SRE RFI site as is the Santa Susana Tarplant (see Attachment C6). The types of habitats near the SRE RFI site and the representative ecological receptors of concern are summarized in Spreadsheet C3-89.

An intermittent freshwater pond is also found at the SRE RFI site. This pond supports open water following the wet season and is completely dry during the dry season. Therefore, two exposure conditions are evaluated under the current conditions: the pond is full (wet pond scenario), and the pond is dry/empty (dry pond scenario). Accordingly, receptors at the site are potentially exposed to (a) sediment and surface water and (b) soils (dry sediments). Assessment of both of these two exposure conditions bounds the range of potential exposures and risks that may arise from future exposures at the site. Although risks for dry and wet scenarios are calculated for terrestrial receptors, only the maximum values are discussed in the text.

The ecological CSM for the SRE RFI site is presented in Table C3-14. As described in the SRAM, inhalation of volatile CPECs by surface-dwelling wildlife and dermal absorption of CPECs were considered insignificant exposure routes for identified wildlife receptors of concern—risk estimates for these exposure routes were not quantitatively evaluated in this ERA.

C4.2.2 Assessment and Measurement Endpoints

Assessment endpoints are "explicit expressions of the actual environmental value that is to be protected" (USEPA 1992d). Measurement endpoints are measurable biological responses to a stressor that can be related to the valued characteristic chosen as the assessment endpoint (USEPA 1992d). The assessment and measurement endpoints for the SRE ERA are presented in Spreadsheet C3-90. Representative receptors include the deer mouse, thrush, hawk, bobcat, mule deer, and great blue heron.

C4.3 EXPOSURE ASSESSMENT FOR ECOLOGICAL RECEPTORS

The exposure assessment quantifies the magnitude and type of potential exposure of an ecological receptor to a CPEC. As described in Section 4.2.1, the SRE RFI site is small (approximately 9.2 acres), and therefore, the entire SRE RFI site is considered one exposure unit.

C4.3.1 Exposure Point Concentrations

An EPC is an estimate of the concentration of a chemical contacted by a target ecological receptor in a given exposure area. EPCs for soil/sediment at 0 to 2 feet bgs, 0 to 4 feet bgs, and 0 to 6 feet bgs were calculated as described in Section 3.3.1 for COPCs. EPCs representing burrow air concentrations were estimated either from measured soil vapor data or at one-half the measured soil vapor detection limit. Estimating from soil data by using the soil to soil vapor partitioning portion of the Johnson and Ettinger (1991) indoor air model was not used because it achieved soil vapor EPCs greater than the measured detection limits.

EPCs for soils at 0 to 2 feet bgs, 0 to 4 feet bgs, and 0 to 6 feet bgs are presented in Table C3-3 and Spreadsheets C3-91 through C3-93. EPCs for soil vapor at 0 to 6 feet bgs, used as burrow air concentrations, are presented in Table C3-3 and Spreadsheet C3-94. EPCs for surface water are presented in Spreadsheet C3-95. Aroclor to PCB extrapolation calculations for soil/sediment from 0 to 2 feet bgs, 0 to 4 feet bgs, and 0 to 6 feet bgs are presented in Spreadsheets C3-96, C3-98, and C3-100. TPH to petroleum constituent extrapolation calculations for soil at 0 to 2 feet bgs, soil at 0 to 4 feet bgs, and soil at 0 to 6 feet bgs are presented in Spreadsheets C3-97 and C3-99, and C3-101, respectively.

C4.4 EXPOSURE POINT VALUES AND APPLIED DAILY DOSES FOR BIOTIC MEDIA

Exposure point values (EPVs) and applied daily doses (ADDs) for direct and indirect exposure pathways are presented in this section.

A concentration-toxicity screen to determine the appropriate subsurface soil/sediment depth for assessing exposures to burrowing animals (i.e., 0 to 2 feet bgs, 0 to 4 feet bgs, or 0 to 6 feet bgs) is presented in Spreadsheet C3-102. The 0 to 6 feet bgs soil depth provided the highest toxicity-concentration screen value. Therefore, the 0 to 6 feet bgs soil depth was selected as the soil depth of interest for estimating exposure to the deer mouse.

Direct exposure pathways to CPECs include incidental ingestion of soil and inhalation of vapors. EPCs for direct exposure pathways consist of media-specific concentrations. Indirect exposure pathways include consumption of prey/food items. The EPVs for indirect exposure pathways are chemical-specific prey species concentrations and are based on chemical-specific bioaccumulation factors for a given medium and organism (e.g., soil and earthworm) as described in the SRAM. EPVs for terrestrial invertebrates, plants, aquatic plants, deer mouse, and fish are presented in Spreadsheets C3-103, C3-104, C3-105, C3-106, C3-107, respectively.

ADDs were calculated for the deer mouse, hermit thrush, red-tailed hawk, bobcat, mule deer, and great blue heron and account for direct and/or indirect exposures that could contribute to an increase in risk. Direct exposures via the inhalation route are only expected to contribute significant exposures to the deer mouse (due to burrowing), therefore, inhalation exposure routes were not included in the ADD calculations for the hermit thrush, red-tailed hawk, bobcat, mule deer, and great blue heron. The chemical-specific ADDs for the deer mouse, hermit thrush, red-tailed hawk, bobcat, mule deer, and great blue heron are presented in Spreadsheets C3-108 through C3-114.

Methods and models used to estimate the EPVs and ADDs for the reference receptors are provided in the SRAM. Any parameter values used in model calculations that were either not specified in the SRAM or deviated from the SRAM are identified and referenced within the appropriate tables. The parameter values used for exposure models are also presented in Spreadsheet C3-115.

C4.5 ECOLOGICAL RISK CHARACTERIZATION

Potential hazards to representative ecological receptors were estimated by comparison of toxicity values to ADDs presented in Section 4.4. As per Section 11.2 of the SRAM (MWH 2005), for the chemicals presenting the greatest risk ("drivers"), where sufficient data were available in the peer-reviewed scientific literature, baseline TRVs have also been developed and are utilized. Ecological toxicity values utilized in this risk assessment are presented in Table C3-15 through Table C3-18. A toxicity profile that provides the basis for baseline TRVs is presented in Appendix C, Attachment C5.

C4.5.1 Estimates of Ecological Risks

Receptor- and chemical-specific HQs and cumulative HIs are presented in Tables C3-19 through C3-27 for the deer mouse, hermit thrush, red-tailed hawk, bobcat, mule deer, great blue heron, generic aquatic receptors for surface water and generic aquatic receptors for sediment.

The estimated HQs and HIs associated with soil/sediment media for all receptors for the SRE RFI site were greater than 1. For the receptor generally considered to be the most sensitive, the deer mouse, total HI ranged from 13 (CTE) to 31 (RME) and was primarily due to Aroclor 1260, lead, copper, cadmium, methylene chloride, zinc, mercury, and dioxins. Without inhalation of VOCs in burrow air, the HI for the deer mouse ranges from 11 to 29 for the dry pond scenario. For all other receptors, the thrush was found to be the most sensitive ecological receptor for exposure associated with SRE RFI site soil/sediment. For the thrush, HIs ranged from 305 (CTE) to 654 (RME). For all other ecological receptors, HIs were in the range of 0.20 to 212. The primary contributing chemicals were dioxins and methylene chloride (mammals) and in soil/sediment, Aroclor 1260, Aroclor 1254, lead, copper, cadmium, mercury, zinc.

For surface water, the great blue heron HIs ranged from 6.6 (CTE) to 7.3 (RME), and generic aquatic receptor HIs ranged from 76 (CTE) to 79 (RME). The primary contributing chemicals in surface water were di-n-butyl phthalate, lead, Aroclor-1254, hexachlorocyclopentadiene, antimony, toxaphene, beryllium, bis(2-ethyl-hexyl) phthalate, aluminum, silver, and diethylphthalate.

Another factor to consider when interpreting the results is the relatively robust ability of annual grassland communities to recover given the surrounding biotic communities.

C4.5.2 Observational Assessment of Native Vegetation

As described in the SRAM (MWH 2005), an observational assessment of native vegetation at the SRE RFI site was performed. The results of the observational assessment are presented in Appendix C, Attachment C6. In a visual comparison of the reference sites to the assessment sites, none of the assessment sites showed significant differences in vegetative cover or species composition that could not be accounted for by mechanical or other historical disturbances. Thus, no adverse affects on health or productivity of native species were observed within areas potentially impacted by CPECs.

C4.5.3 Potential Sediment Migration

There are two potential migration pathways for sediment at the SRE RFI site. This one is from the pond moving downgradient in channels to the North. This channel has been samples for those chemicals detected in the pond sediments. The risk for this drainage has been evaluated in this HRA and ERA.

The second potential migration pathway for sediment from the SRE RFI site is the pipeline used when water was pumped from the pond and discharged at OCY. Both the end-of-pipe area and subsequent downslope drainage at OCY and NCY have been characterized with respect to the chemicals detected in the SRE pond. The HRAs and ERAs at OCY and NCY include the evaluation of the potential migration areas.

C4.5.4 Uncertainty Analysis

As discussed in Section 3.4.3, there is some degree of uncertainty associated with nearly all exposure parameter values, toxicity values, and exposure assumptions used in the risk assessment process. In nearly all cases, exposure and toxicity values used in the risk assessment were selected to result in a conservative estimate of risk. Thus, for the most part, uncertainty in the risk assessment is accounted for by use of data and assumptions that are protective of ecological receptors.

Six site-specific uncertainties of interest were identified for the ERA performed at the SRE RFI site. These uncertainties are described below, and a qualitative analysis of the uncertainty associated with other key exposure assumptions and toxicity values used estimate ecological risk is presented in Table C3-28.

1. Risks associated with PAHs are estimated based, in part, on extrapolation factors using site TPH data for as described in the SRAM (MWH 2005). The estimation of PAH concentrations from TPH concentrations is considered conservative since the extrapolation factors used to estimate PAH concentrations are based on the maximum ratio of TPH concentration to petroleum constituent concentration in the dataset. Where available, site-specific (actual) chemical data are used in the risk assessment and supercedes data estimated using the extrapolation.

2. Where VOCs are detected in one media but were analyzed for and not detected in others to which the VOC could migrate, media-to-media extrapolation was conducted (e.g., soil to soil vapor). This procedure is expected to overestimate potential exposures.

3. Due to the elevated detection limits for some of the samples, maximum detected concentrations were less than the CTE EPCs. In such cases, it is assumed that chemicals may be present at half the detection limit.

4. The estimated risks to the hawk, the bobcat, and the mule deer assume that these species' spend all of their time at the SRE RFI site. This assumption is unlikely to be true and it results in overestimates of potential risks to these species' due to chemicals present in soils at the site. The minimum reported foraging ranges for the red-tailed hawk, the bobcat, the mule deer are 195, 1,152, and 192 acres, respectively, as compared to 9.2 acres for the SRE RFI site. When the foraging ranges of the these species' is accounted for in the ERA, it indicates that RME HIs for the hawk, the bobcat, and the mule deer could be as low as 7.1, 0.024, and 0.75, respectively. Risk estimates for large home range receptors (hawk, bobcat, and mule deer) will be addressed for the entire SSFL facility after all RFI site risk assessments have been completed and potential site-specific risks are evaluated.

5. The SRE RFI site contains an intermittent pond. Based on the potential for both dry (e.g. fugitive dust) and wet (e.g. surface water) exposures in the same area; both scenarios were evaluated separately and the maximum risks presented.

6. Potential impacts of the Topanga fire on the selection of CPECs and risks have been evaluated. Although, as shown in Appendix D, soil concentrations of metals and dioxins have been impacted by the fire and therefore risks have been increased, there were no identified risk assessment decisions based solely on post-Topanga fire data.

However, the only elevated dioxin result updrainage from the pond was a post-fire sample.

C5.0 CONCLUSIONS

The human health risk assessments conducted for the SRE RFI site indicate that theoretical upper-bound incremental lifetime cancer risks for human receptors are between 4×10^{-8} and 4×10^{-4}, with most falling in the low 10^{-4} range. The human health and ecological risk assessments indicate that HIs are greater than 1 for both human (future hypothetical residential child receptors) and ecological receptors. HIs for all other human receptors were below 1.0. The qualitative assessment of potential impacts to vegetation at the SRE RFI site showed that even under conditions of highly compacted soil at the SRE RFI site, vegetation is healthy and supporting both non-native and native species, including the Santa Susana Tarplant. The uncertainties associated with the risk assessments are, for the most part, unlikely to lead to significant underestimates of risk. In addition, the assumptions used in this risk assessment were designed to mitigate the effects of uncertainties that may result in underestimation of risks. Therefore, it can be concluded that:

- The theoretical upper-bound incremental lifetime cancer risks and HIs for the future adult recreator are acceptable;
- The HIs for the current adult worker, future child recreator, future hypothetical resident adult, and future hypothetical resident child exceed acceptable levels;
- The theoretical upper-bound incremental lifetime cancer risks for residents assumes to drink Chatsworth formation groundwater within the Group 6 RFI report area are 3×10^{-6};
- The HIs for residents assumed to drink Chatsworth formation groundwater within the Group 6 RFI report area are elevated;
- Ecological risks associated with all media at the SRE RFI site exceed acceptable levels;

These HRA and ERA results are appropriate to use in making CMS recommendations.

C6.0 REFERENCES

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TABLES

Table C3-1 (1 of 2)

Chemicals of Potential Concern for Human Health
Sodium Reactor Experiment (SRE) Area

Chemical	Soil (0 to 2 feet bgs)	Soil (0 to 10 feet bgs)	RFI Site Chatsworth Groundwater (Indirect Pathway)[a]	RFI Site Chatsworth Groundwater (Direct Pathway)[a]	Soil Vapor	Surface Water
Inorganic Compounds						
Aluminum						X
Antimony						X
Arsenic						X
Cadmium	X	X				X
Chromium						X
Copper	X	X		X		X
Fluoride				X		
Lead	X	X				X
Mercury	X	X				X
Methyl mercury	X	X				
Nickel						X
Nitrate				X		
Silver	X	X				
Thallium	X	X		X		X
Vanadium						X
Zinc	X	X				
VOCs						
1,1,1-Trichloroethane		X			X[c]	X
1,1,2-Trichloro-1,2,2-trifluoroethane	X[b]	X[b]			X	
1,1-Dichloroethane		X	X	X	X[c]	
1,2-Dichloroethane			X	X		
1,2-Dichloroethene (total)	X	X			X[c]	
1-Chlorohexane		X				
2-Butanone	X	X				
2-Hexanone		X				
Acetone	X	X	X	X		
Benzene			X	X		
Carbon disulfide			X	X		
Chloromethane			X	X		
cis-1,2-Dichloroethene			X	X		
Ethylbenzene		X			X[c]	
m,p-Xylene		X				
Methylene chloride	X	X	X	X	X[c]	
Tetrachloroethene	X	X			X[c]	
Toluene	X	X	X	X	X[c]	
Trichloroethene	X	X	X	X	X[c]	X
Xylenes (total)	X	X				
SVOCs						
2-Methylnaphthalene		X				
Acenaphthene	X	X				
Acenaphthylene	X	X				
Anthracene	X	X				
Benzo(a)anthracene	X	X				
Benzo(a)pyrene	X	X				
Benzo(b)fluoranthene	X	X				
Benzo(e)pyrene	X[d]	X[d]				
Benzo(g,h,i)perylene	X	X				
Benzo(k)fluoranthene	X	X				
Chrysene	X	X				
Dibenz(a,h)anthracene	X	X				
Dibenzofuran		X				
Fluoranthene	X	X				
Fluorene	X	X				
Indeno(1,2,3-cd)pyrene	X	X				
Naphthalene		X				
Perylene	X[d]	X[d]				
Phenanthrene	X	X				
Pyrene	X	X				

Table C3-1 (2 of 2)

Chemicals of Potential Concern for Human Health
Sodium Reactor Experiment (SRE) Area

Chemical	Soil (0 to 2 feet bgs)	Soil (0 to 10 feet bgs)	RFI Site Chatsworth Groundwater (Indirect Pathway)[a]	RFI Site Chatsworth Groundwater (Direct Pathway)[a]	Soil Vapor	Surface Water
Total Petroleum Hydrocarbons						
C11-C14(Kerosene Range)	X	X				
C14-C20(Diesel Range)	X	X		X		
C20-C30(Lubricant Oil Range)	X	X				
Hydrocarbons		X				
Dioxins						
2,3,7,8-TCDD	X	X				
1,2,3,7,8-PeCDD	X	X				X
1,2,3,4,7,8-HxCDD	X	X				X
1,2,3,6,7,8-HxCDD	X	X				X
1,2,3,7,8,9-HxCDD	X	X				X
1,2,3,4,6,7,8-HpCDD	X	X				X
OCDD	X	X				X
2,3,7,8-TCDF	X	X				X
1,2,3,7,8-PeCDF	X	X				X
2,3,4,7,8-PeCDF	X	X				X
1,2,3,4,7,8-HxCDF	X	X				X
1,2,3,6,7,8-HxCDF	X	X				X
2,3,4,6,7,8-HxCDF	X	X				X
1,2,3,7,8,9-HxCDF	X	X				X
1,2,3,4,6,7,8-HpCDF	X	X				X
1,2,3,4,7,8,9-HpCDF	X	X				X
OCDF	X	X				X
PCBs						
Aroclor-1254	X	X				
Aroclor-1260	X	X				
PCB-105	X	X				
PCB-114	X	X				
PCB-118	X	X				
PCB-123	X	X				
PCB-126	X	X				
PCB-156	X	X				
PCB-157	X	X				
PCB-167	X	X				
PCB-169	X	X				
PCB-189	X	X				
PCB-77	X	X				
PCB-81	X	X				

X - Selected as a COPC.
(a) Only Chatsworth formation groundwater is considered in the risk assessment since near-surface groundwater is localized (does not occur at the SRE RFI site) or does not meet State Water Resources Control Board yield requirements.
(b) Chemical selected as a COPC since it was selected as a COPC in soil vapor.
(c) Chemical selected as a COPC since it was selected as a COPC in soil at 0 to 10 feet bgs.
(d) Chemical selected as a COPC since total petroleum hydrcarbon fraction C11-C14, C14-20, or C20-C30 was selected as a COPC.

VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCBs - polychlorinated biphenyls
COPC - chemical of potential concern
bgs - below ground surface

Table C3-2 (1 of 1)

Human Health Risk Assessment Conceptual Site Model
Sodium Reactor Experiment (SRE) Area

NOTES:

(*) Exposure limited to volatile compounds as defined in the text; residential and worker receptors include both indoor and outdoor air exposure to volatiles; non-residental and non-worker receptors include only outdoor air exposure. For residents and workers, inhalation of volatiles from near-surface groundwater includes pathways associated with both migration to indoor air and ambient air (domestic groundwater use is an incomplete exposure pathway). For residents and workers, inhalation of volatiles from Chatsworth formation groundwater includes pathways associated with both migration to indoor air and ambient air. Exposure to fugitive dust is limited to non-VOC compounds.

(**) Exposure limited to bioaccumulatable compounds as described in the text.

- complete and potentially complete exposure pathways evaluated in this risk assessment

- incomplete exposure pathways not evaluated in this risk assessment

Exposure Point Concentrations for COPCs and CPECs - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Chemical	Soil/Sediment (0-2 feet bgs) EPCs		Soil/Sediment (0-4 feet bgs) EPCs		Soil/Sediment (0-6 feet bgs) EPCs		Soil/Sediment (0-10 feet bgs) EPCs		Soil Vapor (0-10 feet bgs) EPCs		SRE Surface Water EPCs		SRE Chatsworth Formation Groundwater EPCs		Group 6 Chatsworth Formation Groundwater EPCs	
	CTE[a] (mg/kg)	RME[b] (mg/kg)	CTE (mg/kg)	RME (mg/kg)	CTE (mg/kg)	RME (mg/kg)	CTE (mg/kg)	RME (mg/kg)	CTE (µg/L)	RME (µg/L)	CTE (mg/L)	RME (mg/L)	CTE (mg/L)	RME (mg/L)	CTE (mg/L)	RME (mg/L)
Inorganic Compounds																
Aluminum	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	1.0E+03	1.7E+03	NC	NC	NC	NC
Antimony	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	9.0E-01	1.5E+00	NC	NC	NC	NC
Arsenic	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	6.8E+00	1.1E+01	NC	NC	NC	NC
Beryllium	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	1.0E+00	1.0E+00	NC	NC	NC	NC
Cadmium	5.1E-01	1.1E+00	4.2E-01	1.7E+00	3.8E-01	1.6E+00	3.7E-01	1.5E+00	NC	NC	1.5E-01	2.8E-01	NC	NC	NC	NC
Chromium	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	2.3E+00	3.4E+00	NC	NC	NC	NC
Copper	2.1E+01	4.6E+01	1.9E+01	3.5E+01	1.7E+01	3.2E+01	1.7E+01	3.1E+01	NC	NC	4.4E+00	5.7E+00	1.8E-02	1.8E-02	1.8E-02	1.8E-02
Fluoride	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	5.6E-01	5.6E-01	5.6E-01	5.6E-01
Lead	1.6E+01	3.4E+01	1.4E+01	2.6E+01	1.3E+01	2.4E+01	1.2E+01	2.3E+01	NC	NC	8.1E-01	1.0E+00	NC	NC	NC	NC
Mercury	1.9E+00	4.4E+00	1.5E+00	4.8E+00	1.5E+00	4.6E+00	1.4E+00	4.5E+00	NC	NC	1.2E-01	1.4E-01	NC	NC	NC	NC
Methyl mercury	1.7E-03	3.6E-03	1.7E-03	3.6E-03	1.7E-03	3.6E-03	1.7E-03	3.6E-03	NC	NC	NC	NC	NC	NC	NC	NC
Nickel	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	4.6E+00	4.1E+00	NC	NC	NC	NC
Nitrate	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	1.4E+01	1.4E+01	1.4E+01	1.4E+01
Selenium	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	3.8E+00	3.8E+00	NC	NC	NC	NC
Silver	7.7E-01	2.9E+00	1.0E+00	4.1E+00	9.4E-01	3.8E+00	9.3E-01	3.7E+00	NC	NC	5.0E+00	5.0E+00	NC	NC	NC	NC
Thallium	3.3E-01	3.3E-01	9.4E-01	2.1E+00	9.8E-01	2.8E+00	1.0E+00	2.8E+00	NC	NC	2.1E-01	2.1E-01	5.4E-04	5.4E-04	5.4E-04	5.4E-04
Vanadium	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	4.0E+00	5.7E+00	NC	NC	NC	NC
Zinc	1.7E+02	4.4E+02	1.3E+02	3.1E+02	1.2E+02	4.9E+02	1.2E+02	4.7E+02	NC	NC	NC	NC	NC	NC	NC	NC
VOCs																
1,1,1-Trichloroethane	NC	NC	4.7E-02	2.7E-01	4.5E-02	2.6E-01	4.2E-02	2.4E-01	5.0E-01	5.0E-01	7.6E-01	7.6E-01	NC	NC	NC	NC
1,1,2-Trichloro-1,2,2-trifluoroethane	1.2E-02	1.2E-02	1.2E-02	1.2E-02	1.2E-02	1.2E-02	1.2E-02	1.2E-02	2.5E+00	2.9E+00	NC	NC	NC	NC	NC	NC
1,1-Dichloroethane	NC	NC	2.3E-02	8.3E-02	2.2E-02	8.0E-02	2.0E-02	7.5E-02	5.0E-01	5.0E-01	NC	NC	2.6E-03	2.6E-03	2.6E-03	2.6E-03
1,2-Dichloroethane	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	9.0E-04	9.0E-04	9.0E-04	9.0E-04
1,2-Dichloroethene (total)	2.8E-02	7.0E-02	2.9E-02	5.6E-02	2.7E-02	5.4E-02	2.5E-02	5.0E-02	NC	NC	NC	NC	NC	NC	NC	NC
1-Chlorohexane	NC	NC	NC	NC	NC	NC	1.0E-03	1.0E-03	NC	NC	NC	NC	NC	NC	NC	NC
2-Butanone	3.7E-02	3.7E-02	3.7E-02	3.7E-02	3.7E-02	3.7E-02	3.7E-02	3.7E-02	NC	NC	NC	NC	NC	NC	NC	NC
2-Hexanone	NC	NC	NC	NC	NC	NC	3.0E-03	3.0E-03	NC	NC	NC	NC	NC	NC	NC	NC
Acetone	6.8E-01	4.2E+00	5.2E-01	2.6E+00	5.0E-01	2.5E+00	4.7E-01	2.3E+00	NC	NC	NC	NC	1.6E-02	1.6E-02	1.6E-02	1.6E-02
Benzene	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	5.8E-04	5.8E-04	5.8E-04	5.8E-04
Carbon disulfide	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	2.6E-03	2.6E-03	2.6E-03	2.6E-03
Chloromethane	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	3.2E-04	3.2E-04	3.2E-04	3.2E-04
cis-1,2-Dichloroethene	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	5.1E-02	5.1E-02	5.1E-02	5.1E-02
Ethylbenzene	NC	NC	NC	NC	1.8E-02	5.9E-02	1.7E-02	5.5E-02	5.0E-01	5.0E-01	NC	NC	NC	NC	NC	NC
m,p-Xylene	NC	NC	NC	NC	6.0E-04	6.0E-04	3.2E-03	6.0E-04	1.0E+00	1.0E+00	NC	NC	NC	NC	NC	NC
Methylene chloride	1.3E-02	1.3E-02	4.1E-01	2.6E+00	3.9E-01	2.5E+00	3.6E-01	2.4E+00	1.3E+01	1.3E+01	NC	NC	6.4E-04	6.4E-04	6.4E-04	6.4E-04
Tetrachloroethene	2.1E-02	8.8E-02	4.1E-02	2.0E-01	3.9E-02	2.0E-01	3.7E-02	1.8E-01	5.0E-01	5.0E-01	NC	NC	NC	NC	NC	NC
Toluene	5.6E-02	3.4E-01	3.2E-01	2.2E+00	3.0E-01	2.1E+00	2.8E-01	2.0E+00	5.0E-01	5.0E-01	NC	NC	1.8E-03	1.8E-03	1.8E-03	1.8E-03
Trichloroethene	3.7E-02	2.0E-01	1.0E-01	6.2E-01	9.7E-02	5.9E-01	9.0E-02	5.5E-01	5.0E-01	5.0E-01	6.6E-01	6.6E-01	1.0E-02	1.0E-02	1.0E-02	1.0E-02

Exposure Point Concentrations for COPCs and CPECs - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Chemical	Soil/Sediment (0-2 feet bgs) EPCs		Soil/Sediment (0-4 feet bgs) EPCs		Soil/Sediment (0-6 feet bgs) EPCs		Soil/Sediment (0-10 feet bgs) EPCs		Soil Vapor (0-10 feet bgs) EPCs		SRE Surface Water EPCs		SRE Chatsworth Formation Groundwater EPCs		Group 6 Chatsworth Formation Groundwater EPCs	
	CTE[a] (mg/kg)	RME[b] (mg/kg)	CTE (mg/kg)	RME (mg/kg)	CTE (mg/kg)	RME (mg/kg)	CTE (mg/kg)	RME (mg/kg)	CTE (µg/L)	RME (µg/L)	CTE (mg/L)	RME (mg/L)	CTE (mg/L)	RME (mg/L)	CTE (mg/L)	RME (mg/L)
Xylenes (total)	2.5E-02	5.1E-02	7.5E-02	4.2E-01	7.1E-02	4.0E-01	6.4E-02	3.6E-01	NC	NC	NC	NC	NC	NC	NC	NC
SVOCs																
2-Methylnaphthalene	NC	NC	NC	NC	NC	NC	2.5E-02	2.5E-02	NC	NC	NC	NC	NC	NC	NC	NC
Acenaphthene	4.4E-02	1.0E-01	7.8E-02	1.9E-01	7.1E-02	1.7E-01	6.6E-02	1.6E-01	NC	NC	NC	NC	NC	NC	NC	NC
Acenaphthylene	3.1E-02	8.5E-02	3.8E-02	8.5E-02	3.4E-02	8.5E-02	3.2E-02	8.5E-02	NC	NC	NC	NC	NC	NC	NC	NC
Anthracene	3.9E-02	8.2E-02	1.6E-01	6.5E-01	1.4E-01	5.9E-01	1.3E-01	5.4E-01	NC	NC	NC	NC	NC	NC	NC	NC
Benzo(a)anthracene	3.6E-02	1.5E-01	5.5E-01	4.6E+00	5.0E-01	4.2E+00	4.6E-01	3.9E+00	NC	NC	NC	NC	NC	NC	NC	NC
Benzo(a)pyrene	3.6E-02	1.5E-01	5.9E-01	5.0E+00	5.3E-01	4.5E+00	4.9E-01	4.1E+00	NC	NC	NC	NC	NC	NC	NC	NC
Benzo(b)fluoranthene	4.9E-02	2.7E-01	5.4E-01	4.4E+00	4.8E-01	3.9E+00	4.5E-01	3.6E+00	NC	NC	NC	NC	NC	NC	NC	NC
Benzo(e)pyrene	1.9E-02	6.3E-02	2.2E-02	6.1E-02	1.9E-02	5.3E-02	1.7E-02	4.6E-02	NC	NC	NC	NC	NC	NC	NC	NC
Benzo(g,h,i)perylene	4.1E-02	9.0E-02	2.1E-01	1.5E+00	1.9E-01	1.4E+00	1.7E-01	1.3E+00	NC	NC	NC	NC	NC	NC	NC	NC
Benzo(k)fluoranthene	3.0E-02	8.5E-02	5.8E-01	4.9E+00	5.2E-01	4.4E+00	4.8E-01	4.1E+00	NC	NC	NC	NC	NC	NC	NC	NC
bis(2-Ethylhexyl)phthalate	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	2.5E+01	2.5E+01	NC	NC	NC	NC
Butyl benzyl phthalate	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	9.8E+00	9.8E+00	NC	NC	NC	NC
Chrysene	4.4E-02	2.2E-01	4.2E-01	4.1E+00	3.8E-01	3.7E+00	3.5E-01	3.4E+00	NC	NC	NC	NC	NC	NC	NC	NC
Dibenz(a,h)anthracene	2.9E-02	8.5E-02	1.1E-01	7.3E-01	9.7E-02	6.6E-01	9.0E-02	6.1E-01	NC	NC	NC	NC	NC	NC	NC	NC
Dibenzofuran	NC	NC	9.8E-02	1.2E-01	9.8E-02	1.2E-01	9.8E-02	1.2E-01	NC	NC	NC	NC	NC	NC	NC	NC
Diethylphthalate	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	4.9E+00	4.9E+00	NC	NC	NC	NC
Di-n-butylphthalate	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	9.8E+00	9.8E+00	NC	NC	NC	NC
Di-n-octyl phthalate	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	9.8E+00	9.8E+00	NC	NC	NC	NC
Fluoranthene	6.0E-02	3.8E-01	9.7E-01	8.3E+00	8.7E-01	7.4E+00	8.1E-01	6.9E+00	NC	NC	NC	NC	NC	NC	NC	NC
Fluorene	4.4E-02	1.0E-01	7.9E-02	2.0E-01	7.1E-02	1.8E-01	6.6E-02	1.7E-01	NC	NC	NC	NC	NC	NC	NC	NC
Hexachlorobutadiene	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	4.9E+00	4.9E+00	NC	NC	NC	NC
Hexachlorocyclopentadiene	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	9.8E+00	9.8E+00	NC	NC	NC	NC
Indeno(1,2,3-cd)pyrene	3.4E-02	1.4E-01	2.7E-01	2.1E+00	2.4E-01	1.9E+00	2.3E-01	1.8E+00	NC	NC	NC	NC	NC	NC	NC	NC
Naphthalene	NC	NC	NC	NC	5.4E-02	5.8E-02	4.9E-02	5.8E-02	NC	NC	NC	NC	NC	NC	NC	NC
Pentachlorophenol	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	9.8E+00	9.8E+00	NC	NC	NC	NC
Perylene	1.1E-02	3.6E-02	1.2E-02	3.5E-02	1.1E-02	3.0E-02	9.4E-03	2.6E-02	NC	NC	NC	NC	NC	NC	NC	NC
Phenanthrene	7.9E-02	2.0E-01	4.8E-01	1.9E+00	4.3E-01	1.7E+00	4.0E-01	1.6E+00	NC	NC	NC	NC	NC	NC	NC	NC
Pyrene	5.3E-02	1.6E-01	8.1E-01	6.9E+00	7.3E-01	6.2E+00	6.8E-01	5.8E+00	NC	NC	NC	NC	NC	NC	NC	NC
Pesticides																
4,4'-DDT	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	5.0E-02	5.0E-02	NC	NC	NC	NC
Chlordane	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	4.9E-01	4.9E-01	NC	NC	NC	NC
Dieldrin	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	5.0E-02	5.0E-02	NC	NC	NC	NC
Endosulfan I	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	5.0E-02	5.0E-02	NC	NC	NC	NC
Endosulfan II	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	5.0E-02	5.0E-02	NC	NC	NC	NC
Endrin	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	5.0E-02	5.0E-02	NC	NC	NC	NC
Heptachlor	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	5.0E-02	5.0E-02	NC	NC	NC	NC
Heptachlor epoxide	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	5.0E-02	5.0E-02	NC	NC	NC	NC

Exposure Point Concentrations for COPCs and CPECs - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Chemical	Soil/Sediment (0-2 feet bgs) EPCs		Soil/Sediment (0-4 feet bgs) EPCs		Soil/Sediment (0-6 feet bgs) EPCs		Soil/Sediment (0-10 feet bgs) EPCs		Soil Vapor (0-10 feet bgs) EPCs		SRE Surface Water EPCs		SRE Chatsworth Formation Groundwater EPCs		Group 6 Chatsworth Formation Groundwater EPCs	
	CTE[a] (mg/kg)	RME[b] (mg/kg)	CTE (mg/kg)	RME (mg/kg)	CTE (mg/kg)	RME (mg/kg)	CTE (mg/kg)	RME (mg/kg)	CTE (µg/L)	RME (µg/L)	CTE (mg/L)	RME (mg/L)	CTE (mg/L)	RME (mg/L)	CTE (mg/L)	RME (mg/L)
Toxaphene	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	2.5E+00	2.5E+00	NC	NC	NC	NC
Total Petroleum Hydrocarbons																
C11-C14(Kerosene Range)	9.7E+00	4.0E+01	8.9E+00	4.0E+01	7.8E+00	2.0E+01	7.1E+00	1.8E+01	NC	NC	NC	NC	NC	NC	NC	NC
C14-C20(Diesel Range)	7.5E+00	7.5E+00	8.3E+00	1.4E+01	7.4E+00	1.8E+01	6.7E+00	1.6E+01	NC	NC	NC	NC	5.0E-02	5.0E-02	5.0E-02	5.0E-02
C20-C30(Lubricant Oil Range)	7.3E+01	4.7E+02	8.8E+01	4.7E+02	7.5E+01	4.1E+02	6.6E+01	3.6E+02	NC	NC	NC	NC	NC	NC	NC	NC
Hydrocarbons	NC	NC	NC	NC	NC	NC	2.5E+00	2.5E+00	NC	NC	NC	NC	NC	NC	NC	NC
Dioxins																
2,3,7,8-TCDD	2.7E-07	5.3E-07	2.3E-07	4.4E-07	2.3E-07	4.4E-07	2.3E-07	4.4E-07	NC	NC	NC	NC	NC	NC	NC	NC
1,2,3,7,8-PeCDD	1.1E-06	2.2E-06	8.9E-07	1.8E-06	8.9E-07	1.8E-06	8.9E-07	1.8E-06	NC	NC	1.7E-06	1.7E-06	NC	NC	NC	NC
1,2,3,4,7,8-HxCDD	4.1E-06	9.0E-06	3.3E-06	7.2E-06	3.3E-06	7.2E-06	3.3E-06	7.2E-06	NC	NC	2.5E-06	2.5E-06	NC	NC	NC	NC
1,2,3,6,7,8-HxCDD	1.6E-05	3.0E-05	1.3E-05	2.4E-05	1.3E-05	2.4E-05	1.3E-05	2.4E-05	NC	NC	2.7E-05	6.6E-05	NC	NC	NC	NC
1,2,3,7,8,9-HxCDD	5.9E-06	1.0E-05	4.7E-06	9.4E-06	4.7E-06	9.4E-06	4.7E-06	9.4E-06	NC	NC	1.4E-05	1.4E-05	NC	NC	NC	NC
1,2,3,4,6,7,8-HpCDD	5.7E-04	1.2E-03	4.5E-04	9.5E-04	4.5E-04	9.5E-04	4.5E-04	9.5E-04	NC	NC	2.2E-04	1.9E-03	NC	NC	NC	NC
OCDD	8.4E-03	1.7E-02	6.7E-03	1.4E-02	6.7E-03	1.4E-02	6.7E-03	1.4E-02	NC	NC	1.8E-03	2.7E-03	NC	NC	NC	NC
2,3,7,8-TCDF	5.5E-07	7.9E-07	4.5E-07	7.9E-07	4.5E-07	7.9E-07	4.5E-07	7.9E-07	NC	NC	4.0E-06	4.5E-06	NC	NC	NC	NC
1,2,3,7,8-PeCDF	2.8E-07	5.7E-07	2.3E-07	4.6E-07	2.3E-07	4.6E-07	2.3E-07	4.6E-07	NC	NC	7.2E-06	7.2E-06	NC	NC	NC	NC
2,3,4,7,8-PeCDF	8.2E-07	1.6E-06	6.6E-07	1.3E-06	6.6E-07	1.3E-06	6.6E-07	1.3E-06	NC	NC	1.8E-05	2.0E-05	NC	NC	NC	NC
1,2,3,4,7,8-HxCDF	1.8E-06	3.3E-06	1.4E-06	2.8E-06	1.4E-06	2.8E-06	1.4E-06	2.8E-06	NC	NC	1.9E-05	2.1E-05	NC	NC	NC	NC
1,2,3,6,7,8-HxCDF	1.6E-06	3.2E-06	1.2E-06	2.5E-06	1.2E-06	2.5E-06	1.2E-06	2.5E-06	NC	NC	1.1E-05	1.1E-05	NC	NC	NC	NC
2,3,4,6,7,8-HxCDF	3.8E-06	8.8E-06	3.1E-06	6.9E-06	3.1E-06	6.9E-06	3.1E-06	6.9E-06	NC	NC	1.9E-05	2.1E-05	NC	NC	NC	NC
1,2,3,7,8,9-HxCDF	3.6E-07	9.7E-07	3.0E-07	9.7E-07	3.0E-07	9.7E-07	3.0E-07	9.7E-07	NC	NC	1.8E-05	2.3E-05	NC	NC	NC	NC
1,2,3,4,6,7,8-HpCDF	5.3E-05	9.6E-05	4.2E-05	8.0E-05	4.2E-05	8.0E-05	4.2E-05	8.0E-05	NC	NC	2.7E-05	5.1E-05	NC	NC	NC	NC
1,2,3,4,7,8,9-HpCDF	4.9E-06	9.2E-06	3.9E-06	7.6E-06	3.9E-06	7.6E-06	3.9E-06	7.6E-06	NC	NC	1.4E-05	1.4E-05	NC	NC	NC	NC
OCDF	1.4E-04	2.4E-04	1.1E-04	2.0E-04	1.1E-04	2.0E-04	1.1E-04	2.0E-04	NC	NC	7.2E-05	1.3E-04	NC	NC	NC	NC
PCBs																
Aroclor-1016	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	4.9E-01	4.9E-01	NC	NC	NC	NC
Aroclor-1221	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	4.9E-01	4.9E-01	NC	NC	NC	NC
Aroclor-1232	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	4.9E-01	4.9E-01	NC	NC	NC	NC
Aroclor-1242	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	4.9E-01	4.9E-01	NC	NC	NC	NC
Aroclor-1248	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	4.9E-01	4.9E-01	NC	NC	NC	NC
Aroclor-1254	1.6E-01	4.3E-01	1.6E-01	4.3E-01	1.6E-01	4.3E-01	1.6E-01	4.3E-01	NC	NC	4.9E-01	4.9E-01	NC	NC	NC	NC
Aroclor-1260	1.3E+00	7.3E+00	1.3E+00	7.0E+00	1.3E+00	7.0E+00	1.3E+00	7.0E+00	NC	NC	4.9E-01	4.9E-01	NC	NC	NC	NC
PCB-105	1.1E-04	5.6E-04	1.1E-04	5.6E-04	1.1E-04	5.6E-04	1.1E-04	5.7E-04	NC	NC	NC	NC	NC	NC	NC	NC
PCB-114	2.2E-06	1.0E-05	2.1E-06	1.0E-05	2.1E-06	1.0E-05	2.1E-06	1.0E-05	NC	NC	NC	NC	NC	NC	NC	NC
PCB-118	2.3E-04	1.1E-03	2.2E-04	1.1E-03	2.2E-04	1.1E-03	2.2E-04	1.1E-03	NC	NC	NC	NC	NC	NC	NC	NC
PCB-123	3.2E-06	1.6E-05	3.1E-06	1.6E-05	3.1E-06	1.6E-05	3.1E-06	1.6E-05	NC	NC	NC	NC	NC	NC	NC	NC
PCB-126	8.8E-06	4.4E-05	8.4E-06	4.4E-05	8.4E-06	4.4E-05	8.4E-06	4.4E-05	NC	NC	NC	NC	NC	NC	NC	NC
PCB-156	7.5E-05	3.8E-04	7.2E-05	3.8E-04	7.2E-05	3.8E-04	7.2E-05	3.8E-04	NC	NC	NC	NC	NC	NC	NC	NC
PCB-157	3.3E-05	1.7E-04	3.2E-05	1.7E-04	3.2E-05	1.7E-04	3.2E-05	1.7E-04	NC	NC	NC	NC	NC	NC	NC	NC

Exposure Point Concentrations for COPCs and CPECs - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Chemical	Soil/Sediment (0-2 feet bgs) EPCs		Soil/Sediment (0-4 feet bgs) EPCs		Soil/Sediment (0-6 feet bgs) EPCs		Soil/Sediment (0-10 feet bgs) EPCs		Soil Vapor (0-10 feet bgs) EPCs		SRE Surface Water EPCs		SRE Chatsworth Formation Groundwater EPCs		Group 6 Chatsworth Formation Groundwater EPCs	
	CTE[a] (mg/kg)	RME[b] (mg/kg)	CTE (mg/kg)	RME (mg/kg)	CTE (mg/kg)	RME (mg/kg)	CTE (mg/kg)	RME (mg/kg)	CTE (µg/L)	RME (µg/L)	CTE (mg/L)	RME (mg/L)	CTE (mg/L)	RME (mg/L)	CTE (mg/L)	RME (mg/L)
PCB-167	5.7E-05	2.9E-04	5.5E-05	2.9E-04	5.5E-05	2.9E-04	5.5E-05	3.0E-04	NC	NC	NC	NC	NC	NC	NC	NC
PCB-169	8.6E-07	4.4E-06	8.2E-07	4.4E-06	8.2E-07	4.4E-06	8.2E-07	4.4E-06	NC	NC	NC	NC	NC	NC	NC	NC
PCB-189	8.6E-06	4.4E-05	8.2E-06	4.4E-05	8.2E-06	4.4E-05	8.2E-06	4.4E-05	NC	NC	NC	NC	NC	NC	NC	NC
PCB-77	1.8E-05	8.8E-05	1.7E-05	8.8E-05	1.7E-05	8.8E-05	1.7E-05	8.9E-05	NC	NC	NC	NC	NC	NC	NC	NC
PCB-81	3.1E-06	1.6E-05	3.0E-06	1.6E-05	3.0E-06	1.6E-05	3.0E-06	1.6E-05	NC	NC	NC	NC	NC	NC	NC	NC

Notes:
a. Either the arithmetic mean concentration for two or more samples or the reported concentration for a single sample.
b. Either the 95% upper confidence limit (95% UCL) on the arithmetic mean for three or more samples, or the maximum concentration for less than three samples, or the maximum concentration in cases where the 95% UCL exceeds the maximum concentration.
COPC - chemical of potential concern
NC - not selected as a COPC in the indicated media/depth
EPC - exposure point concentration
CTE - central tendency exposure
RME - reasonable maximum exposure
VOC - volatile organic compound
SVOC - semi-volatile organic compound
mg/kg - milligrams per kilogram
bgs - below ground surface

Exposure Point Concentrations for COPCs and CPECs - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Chemical	Soil/Sediment (0-2 feet bgs) EPCs		Soil/Sediment (0-4 feet bgs) EPCs		Soil/Sediment (0-6 feet bgs) EPCs		Soil/Sediment (0-10 feet bgs) EPCs		Soil Vapor (0-10 feet bgs) EPCs		SRE Surface Water EPCs		SRE Chatsworth Formation Groundwater EPCs		Group 6 Chatsworth Formation Groundwater EPCs	
	CTE[a] (mg/kg)	RME[b] (mg/kg)	CTE (mg/kg)	RME (mg/kg)	CTE (mg/kg)	RME (mg/kg)	CTE (mg/kg)	RME (mg/kg)	CTE (µg/L)	RME (µg/L)	CTE (mg/L)	RME (mg/L)	CTE (mg/L)	RME (mg/L)	CTE (mg/L)	RME (mg/L)
Inorganic Compounds																
Aluminum	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	1.0E+03	1.7E+03	NC	NC	NC	NC
Antimony	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	9.0E-01	1.5E+00	NC	NC	NC	NC
Arsenic	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	6.8E+00	1.1E+01	NC	NC	NC	NC
Barium	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
Beryllium	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	1.0E+00	1.0E+00	NC	NC	NC	NC
Boron	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
Cadmium	2.4E-01	4.2E-01	2.2E-01	3.6E-01	2.0E-01	3.2E-01	1.9E-01	3.0E-01	NC	NC	1.5E-01	2.8E-01	NC	NC	NC	NC
Chromium	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	2.3E+00	3.4E+00	NC	NC	NC	NC
Hexavalent chromium	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
Cobalt	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
Copper	9.9E+00	2.0E+01	1.1E+01	2.0E+01	9.9E+00	1.8E+01	9.7E+00	1.8E+01	NC	NC	4.4E+00	5.7E+00	1.8E-02	1.8E-02	1.8E-02	1.8E-02
Fluoride	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	5.6E-01	5.6E-01	5.6E-01	5.6E-01
Lead	9.3E+00	1.3E+01	9.9E+00	1.3E+01	9.3E+00	1.5E+01	9.2E+00	1.5E+01	NC	NC	8.1E-01	1.0E+00	NC	NC	NC	NC
Manganese	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
Mercury	2.1E+00	5.5E+00	1.9E+00	4.1E+00	1.8E+00	3.8E+00	1.7E+00	3.8E+00	NC	NC	1.2E-01	1.4E-01	NC	NC	NC	NC
Methyl mercury	1.7E-03	3.6E-03	1.7E-03	3.6E-03	1.7E-03	3.6E-03	1.7E-03	3.6E-03	NC	NC	NC	NC	NC	NC	NC	NC
Molybdenum	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
Nickel	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	4.6E+00	4.1E+00	NC	NC	NC	NC
Nitrate	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	1.4E+01	1.4E+01	1.4E+01	1.4E+01
Perchlorate	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
Selenium	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	3.8E+00	3.8E+00	NC	NC	NC	NC
Silver	1.0E+00	2.7E+00	1.5E+00	3.5E+00	1.4E+00	2.8E+00	1.3E+00	2.7E+00	NC	NC	5.0E+00	5.0E+00	NC	NC	NC	NC
Strontium	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
Thallium	3.3E-01	3.3E-01	8.4E-01	2.1E+00	9.4E-01	3.6E+00	9.9E-01	3.6E+00	NC	NC	2.1E-01	2.1E-01	5.4E-04	5.4E-04	5.4E-04	5.4E-04
Tin	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
Vanadium	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	4.0E+00	5.7E+00	NC	NC	NC	NC
Zinc	8.4E+01	1.9E+02	7.5E+01	1.5E+02	6.9E+01	2.3E+02	6.8E+01	2.2E+02	NC	NC	NC	NC	NC	NC	NC	NC
VOCs																
1,1,1,2-Tetrachloroethane	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
1,1,1-Trichloroethane	NC	NC	NC	NC	NC	NC	NC	NC	5.0E-01	5.0E-01	7.6E-01	7.6E-01	NC	NC	NC	NC
1,1,2,2-Tetrachloroethane	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
1,1,2-Trichloro-1,2,2-trifluoroethane	1.2E-02	1.2E-02	1.2E-02	1.2E-02	1.2E-02	1.2E-02	1.2E-02	1.2E-02	2.5E+00	2.9E+00	NC	NC	NC	NC	NC	NC
1,1,2-Trichloroethane	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
1,1-Dichloroethane	NC	NC	NC	NC	NC	NC	NC	NC	5.0E-01	5.0E-01	NC	NC	2.6E-03	2.6E-03	2.6E-03	2.6E-03
1,1-Dichloroethene	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
1,1-Dichloropropene	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
1,2,3-Trichlorobenzene	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
1,2,3-Trichloropropane	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
1,2,4-Trichlorobenzene	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
1,2,4-Trimethylbenzene	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
1,2-Dibromo-3-chloropropane	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
1,2-Dibromoethane	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
1,2-Dichlorobenzene	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
1,2-Dichloroethane	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	9.0E-04	9.0E-04	9.0E-04	9.0E-04
1,2-Dichloroethene (total)	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
1,2-Dichloropropane	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
1,3,5-Trimethylbenzene	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
1,3-Dichlorobenzene	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
1,4-Dichlorobenzene	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
1-Chlorohexane	NC	NC	NC	NC	NC	NC	1.0E-03	1.0E-03	NC	NC	NC	NC	NC	NC	NC	NC
2-Butanone	2.1E-02	3.5E-02	1.8E-02	2.7E-02	1.8E-02	2.7E-02	1.9E-02	2.7E-02	NC	NC	NC	NC	NC	NC	NC	NC
2-Chloroethylvinylether	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
2-Chlorotoluene	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
2-Chloro-1,1,1-trifluoroethane	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
2-Hexanone	NC	NC	NC	NC	NC	NC	3.0E-03	3.0E-03	NC	NC	NC	NC	NC	NC	NC	NC

Exposure Point Concentrations for COPCs and CPECs - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Chemical	Soil/Sediment (0-2 feet bgs) EPCs		Soil/Sediment (0-4 feet bgs) EPCs		Soil/Sediment (0-6 feet bgs) EPCs		Soil/Sediment (0-10 feet bgs) EPCs		Soil Vapor (0-10 feet bgs) EPCs		SRE Surface Water EPCs		SRE Chatsworth Formation Groundwater EPCs		Group 6 Chatsworth Formation Groundwater EPCs	
	CTE[a] (mg/kg)	RME[b] (mg/kg)	CTE (mg/kg)	RME (mg/kg)	CTE (mg/kg)	RME (mg/kg)	CTE (mg/kg)	RME (mg/kg)	CTE (µg/L)	RME (µg/L)	CTE (mg/L)	RME (mg/L)	CTE (mg/L)	RME (mg/L)	CTE (mg/L)	RME (mg/L)
4-Bromofluorobenzene	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
4-Chlorotoluene	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
4-Methyl-2-pentanone	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
Acetone	1.1E+00	5.2E+00	6.9E-01	2.3E+00	6.9E-01	2.3E+00	6.2E-01	5.2E+00	NC	NC	NC	NC	1.6E-02	1.6E-02	1.6E-02	1.6E-02
Acrolein	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
Acrylonitrile	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
Benzene	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	5.8E-04	5.8E-04	5.8E-04	5.8E-04
Bromobenzene	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
Bromodichloromethane	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
Bromoform	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
Bromomethane	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
Carbon disulfide	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	2.6E-03	2.6E-03	2.6E-03	2.6E-03
Carbon tetrachloride	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
Chlorobenzene	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
Chloroethane	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
Chloroform	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
Chloromethane	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	3.2E-04	3.2E-04	3.2E-04	3.2E-04
Chlorotrifluoroethene	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
cis-1,2-Dichloroethene	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	5.1E-02	5.1E-02	5.1E-02	5.1E-02
cis-1,3-Dichloropropene	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
Dibromochloromethane	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
Dibromomethane	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
Dichlorodifluoromethane	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
Ethylbenzene	NC	NC	NC	NC	NC	NC	NC	NC	5.0E-01	5.0E-01	NC	NC	NC	NC	NC	NC
Formaldehyde	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
Isopropylbenzene	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
m,p-Xylene	NC	NC	NC	NC	NC	NC	3.4E-03	0.0E+00	1.0E+00	1.0E+00	NC	NC	NC	NC	NC	NC
Methyl tert-butyl ether	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
Methylene chloride	1.0E-02	1.3E-02	1.0E-02	1.2E-02	1.0E-02	1.2E-02	9.9E-03	1.2E-02	1.3E+01	1.3E+01	NC	NC	6.4E-04	6.4E-04	6.4E-04	6.4E-04
n-Butylbenzene	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
n-Propylbenzene	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
o-Xylene	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
p-Isopropyltoluene	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
sec-Butylbenzene	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
Styrene	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
tert-Butylbenzene	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
Tetrachloroethene	NC	NC	NC	NC	NC	NC	NC	NC	5.0E-01	5.0E-01	NC	NC	NC	NC	NC	NC
Toluene	NC	NC	NC	NC	NC	NC	NC	NC	5.0E-01	5.0E-01	NC	NC	1.8E-03	1.8E-03	1.8E-03	1.8E-03
trans-1,2-Dichloroethene	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
trans-1,3-Dichloropropene	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
Trichloroethene	NC	NC	NC	NC	NC	NC	NC	NC	5.0E-01	5.0E-01	6.6E-01	6.6E-01	1.0E-02	1.0E-02	1.0E-02	1.0E-02
Trichlorofluoromethane	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
Vinyl acetate	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
Vinyl chloride	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
Xylenes (total)	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
SVOCs																
1,4-Dioxane	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
2,4,5-Trichlorophenol	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
2,4,6-Trichlorophenol	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
2,4-Dichlorophenol	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
2,4-Dimethylphenol	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
2,4-Dinitrophenol	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
2,4-Dinitrotoluene	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
2,6-Dinitrotoluene	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
2-Chloronaphthalene	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
2-Chlorophenol	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC

Exposure Point Concentrations for COPCs and CPECs - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Chemical	Soil/Sediment (0-2 feet bgs) EPCs		Soil/Sediment (0-4 feet bgs) EPCs		Soil/Sediment (0-6 feet bgs) EPCs		Soil/Sediment (0-10 feet bgs) EPCs		Soil Vapor (0-10 feet bgs) EPCs		SRE Surface Water EPCs		SRE Chatsworth Formation Groundwater EPCs		Group 6 Chatsworth Formation Groundwater EPCs	
	CTE[a] (mg/kg)	RME[b] (mg/kg)	CTE (mg/kg)	RME (mg/kg)	CTE (mg/kg)	RME (mg/kg)	CTE (mg/kg)	RME (mg/kg)	CTE (µg/L)	RME (µg/L)	CTE (mg/L)	RME (mg/L)	CTE (mg/L)	RME (mg/L)	CTE (mg/L)	RME (mg/L)
2-Methylnaphthalene	NC	NC	NC	NC	NC	NC	2.2E-02	2.5E-02	NC	NC	NC	NC	NC	NC	NC	NC
2-Methylphenol	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
2-Nitroaniline	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
2-Nitrophenol	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
3- and 4-Methylphenol Coelution	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
3-Methylphenol	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
4-Methylphenol	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
3,3'-Dichlorobenzidine	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
3-Nitroaniline	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
4,6-Dinitro-2-methylphenol	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
4-Bromophenyl phenyl ether	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
4-Chloro-3-methylphenol	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
4-Chloroaniline	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
4-Chlorophenyl phenyl ether	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
4-Nitroaniline	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
4-Nitrophenol	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
Acenaphthene	2.6E-02	1.1E-01	8.8E-02	3.3E-01	7.5E-02	2.8E-01	6.8E-02	2.5E-01	NC	NC	NC	NC	NC	NC	NC	NC
Acenaphthylene	4.6E-03	1.6E-02	6.1E-03	1.7E-02	5.4E-03	1.5E-02	4.9E-03	1.4E-02	NC	NC	NC	NC	NC	NC	NC	NC
Aniline	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
Anthracene	1.8E-02	7.3E-02	2.5E-01	1.3E+00	2.1E-01	1.1E+00	1.9E-01	9.9E-01	NC	NC	NC	NC	NC	NC	NC	NC
Benzidine	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
Benzo(a)anthracene	2.8E-03	8.8E-03	1.1E+00	1.4E+01	9.0E-01	1.4E+01	8.2E-01	1.4E+01	NC	NC	NC	NC	NC	NC	NC	NC
Benzo(a)pyrene	3.0E-03	8.9E-03	1.1E+00	1.5E+01	9.6E-01	1.5E+01	8.8E-01	1.5E+01	NC	NC	NC	NC	NC	NC	NC	NC
Benzo(b)fluoranthene	4.3E-03	1.1E-02	1.0E+00	1.3E+01	8.6E-01	7.5E+00	7.8E-01	6.9E+00	NC	NC	NC	NC	NC	NC	NC	NC
Benzo(e)pyrene	2.0E-02	6.7E-02	2.4E-02	6.8E-02	2.2E-02	6.1E-02	2.0E-02	5.5E-02	NC	NC	NC	NC	NC	NC	NC	NC
Benzo(g,h,i)perylene	1.2E-02	4.4E-02	3.4E-01	3.1E+00	2.9E-01	2.6E+00	2.7E-01	2.4E+00	NC	NC	NC	NC	NC	NC	NC	NC
Benzo(k)fluoranthene	2.8E-03	8.3E-03	1.1E+00	1.5E+01	9.5E-01	1.5E+01	8.7E-01	1.5E+01	NC	NC	NC	NC	NC	NC	NC	NC
Benzoic acid	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
Benzyl alcohol	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
bis(2-Chloroethoxy)methane	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
bis(2-Chloroethyl)ether	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
bis(2-Chloroisopropyl) ether	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
bis(2-Ethylhexyl)phthalate	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	2.5E+01	2.5E+01	NC	NC	NC	NC
Butyl benzyl phthalate	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	9.8E+00	9.8E+00	NC	NC	NC	NC
Carbazole	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
Chrysene	5.1E-03	1.2E-02	7.7E-01	8.4E+00	6.5E-01	7.1E+00	6.0E-01	6.5E+00	NC	NC	NC	NC	NC	NC	NC	NC
Dibenz(a,h)anthracene	1.9E-03	6.9E-03	1.5E-01	1.4E+00	1.3E-01	1.2E+00	1.2E-01	1.1E+00	NC	NC	NC	NC	NC	NC	NC	NC
Dibenzofuran	NC	NC	2.8E-01	2.8E-01	2.8E-01	2.8E-01	2.8E-01	2.8E-01	NC	NC	NC	NC	NC	NC	NC	NC
Diethylphthalate	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	4.9E+00	4.9E+00	NC	NC	NC	NC
Dimethyl phthalate	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
Di-n-butylphthalate	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	9.8E+00	9.8E+00	NC	NC	NC	NC
Di-n-octyl phthalate	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	9.8E+00	9.8E+00	NC	NC	NC	NC
Fluoranthene	5.6E-03	1.2E-02	1.9E+00	2.5E+01	1.6E+00	1.4E+01	1.5E+00	1.3E+01	NC	NC	NC	NC	NC	NC	NC	NC
Fluorene	2.6E-02	1.1E-01	8.9E-02	3.3E-01	7.6E-02	2.8E-01	7.0E-02	2.6E-01	NC	NC	NC	NC	NC	NC	NC	NC
Hexachlorobenzene	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
Hexachlorobutadiene	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	4.9E+00	4.9E+00	NC	NC	NC	NC
Hexachlorocyclopentadiene	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	9.8E+00	9.8E+00	NC	NC	NC	NC
Hexachloroethane	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
Indeno(1,2,3-cd)pyrene	2.7E-03	8.5E-03	4.8E-01	6.4E+00	4.1E-01	3.7E+00	3.7E-01	3.3E+00	NC	NC	NC	NC	NC	NC	NC	NC
Isophorone	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
Naphthalene	NC	NC	NC	NC	2.3E-02	5.8E-02	2.0E-02	5.8E-02	NC	NC	NC	NC	NC	NC	NC	NC
Nitrobenzene	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
N-Nitrosodimethylamine	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
N-Nitrosodi-n-propylamine	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
N-Nitrosodiphenylamine	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
Pentachlorophenol	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	9.8E+00	9.8E+00	NC	NC	NC	NC
Perylene	1.1E-02	3.8E-02	1.4E-02	3.9E-02	1.2E-02	3.5E-02	1.1E-02	3.1E-02	NC	NC	NC	NC	NC	NC	NC	NC

Exposure Point Concentrations for COPCs and CPECs - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Chemical	Soil/Sediment (0-2 feet bgs) EPCs		Soil/Sediment (0-4 feet bgs) EPCs		Soil/Sediment (0-6 feet bgs) EPCs		Soil/Sediment (0-10 feet bgs) EPCs		Soil Vapor (0-10 feet bgs) EPCs		SRE Surface Water EPCs		SRE Chatsworth Formation Groundwater EPCs		Group 6 Chatsworth Formation Groundwater EPCs	
	CTE[a] (mg/kg)	RME[b] (mg/kg)	CTE (mg/kg)	RME (mg/kg)	CTE (mg/kg)	RME (mg/kg)	CTE (mg/kg)	RME (mg/kg)	CTE (µg/L)	RME (µg/L)	CTE (mg/L)	RME (mg/L)	CTE (mg/L)	RME (mg/L)	CTE (mg/L)	RME (mg/L)
Phenanthrene	7.1E-02	3.0E-01	9.0E-01	7.5E+00	7.7E-01	6.4E+00	7.0E-01	5.8E+00	NC	NC	NC	NC	NC	NC	NC	NC
Phenol	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
Pyrene	8.2E-03	2.8E-02	1.6E+00	1.4E+01	1.3E+00	1.2E+01	1.2E+00	1.1E+01	NC	NC	NC	NC	NC	NC	NC	NC
Pyridine	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
Pesticides																
4,4'-DDD	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
4,4'-DDE	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
4,4'-DDT	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	5.0E-02	5.0E-02	NC	NC	NC	NC
a-BHC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
Aldrin	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
b-BHC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
Chlordane	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	4.9E-01	4.9E-01	NC	NC	NC	NC
d-BHC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
Dieldrin	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	5.0E-02	5.0E-02	NC	NC	NC	NC
Endosulfan I	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	5.0E-02	5.0E-02	NC	NC	NC	NC
Endosulfan II	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	5.0E-02	5.0E-02	NC	NC	NC	NC
Endosulfan sulfate	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
Endrin	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	5.0E-02	5.0E-02	NC	NC	NC	NC
Endrin aldehyde	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
Endrin ketone	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
Heptachlor	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	5.0E-02	5.0E-02	NC	NC	NC	NC
Heptachlor epoxide	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	5.0E-02	5.0E-02	NC	NC	NC	NC
Lindane (gamma-BHC)	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
Methoxychlor	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
Toxaphene	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	2.5E+00	2.5E+00	NC	NC	NC	NC
Total Petroleum Hydrocarbons																
C08-C11(Gasoline Range)	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
C11-C14(Kerosene Range)	1.0E+01	4.0E+01	9.3E+00	4.0E+01	8.5E+00	4.0E+01	7.8E+00	3.8E+01	NC	NC	NC	NC	NC	NC	NC	NC
C14-C20(Diesel Range)	NC	NC	8.7E+00	1.7E+01	7.9E+00	1.4E+01	7.3E+00	1.8E+01	NC	NC	NC	NC	5.0E-02	5.0E-02	5.0E-02	5.0E-02
C20-C30(Lubricant Oil Range)	7.8E+01	4.7E+02	9.9E+01	4.7E+02	8.8E+01	4.7E+02	7.9E+01	4.3E+02	NC	NC	NC	NC	NC	NC	NC	NC
Hydrocarbons	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC
Dioxins																
2,3,7,8-TCDD	1.9E-07	4.0E-07	1.5E-07	3.5E-07	1.5E-07	3.5E-07	1.5E-07	3.5E-07	NC	NC	NC	NC	NC	NC	NC	NC
1,2,3,7,8-PeCDD	7.3E-07	1.5E-06	5.6E-07	1.3E-06	5.6E-07	1.3E-06	5.6E-07	1.3E-06	NC	NC	1.7E-06	1.7E-06	NC	NC	NC	NC
1,2,3,4,7,8-HxCDD	2.1E-06	4.2E-06	1.6E-06	3.7E-06	1.6E-06	3.7E-06	1.6E-06	3.7E-06	NC	NC	2.5E-06	2.5E-06	NC	NC	NC	NC
1,2,3,6,7,8-HxCDD	1.1E-05	2.0E-05	8.3E-06	1.9E-05	8.3E-06	1.9E-05	8.3E-06	1.9E-05	NC	NC	2.7E-05	6.6E-05	NC	NC	NC	NC
1,2,3,7,8,9-HxCDD	4.5E-06	1.0E-05	3.4E-06	8.7E-06	3.4E-06	8.7E-06	3.4E-06	8.7E-06	NC	NC	1.4E-05	1.4E-05	NC	NC	NC	NC
1,2,3,4,6,7,8-HpCDD	3.1E-04	5.0E-04	2.4E-04	4.9E-04	2.4E-04	4.9E-04	2.4E-04	4.9E-04	NC	NC	2.2E-04	1.9E-03	NC	NC	NC	NC
OCDD	5.0E-03	7.3E-03	3.7E-03	7.3E-03	3.7E-03	7.3E-03	3.7E-03	7.3E-03	NC	NC	1.8E-03	2.7E-03	NC	NC	NC	NC
2,3,7,8-TCDF	4.7E-07	7.9E-07	3.6E-07	7.8E-07	3.6E-07	7.8E-07	3.6E-07	7.8E-07	NC	NC	4.0E-06	4.5E-06	NC	NC	NC	NC
1,2,3,7,8-PeCDF	1.8E-07	3.9E-07	1.5E-07	3.9E-07	1.5E-07	3.9E-07	1.5E-07	3.9E-07	NC	NC	7.2E-06	7.2E-06	NC	NC	NC	NC
2,3,4,7,8-PeCDF	5.4E-07	9.9E-07	4.2E-07	9.0E-07	4.2E-07	9.0E-07	4.2E-07	9.0E-07	NC	NC	1.8E-05	2.0E-05	NC	NC	NC	NC
1,2,3,4,7,8-HxCDF	1.2E-06	1.8E-06	8.8E-07	1.7E-06	8.8E-07	1.7E-06	8.8E-07	1.7E-06	NC	NC	1.9E-05	2.1E-05	NC	NC	NC	NC
1,2,3,6,7,8-HxCDF	9.5E-07	1.8E-06	7.2E-07	1.6E-06	7.2E-07	1.6E-06	7.2E-07	1.6E-06	NC	NC	1.1E-05	1.1E-05	NC	NC	NC	NC
2,3,4,6,7,8-HxCDF	1.8E-06	3.0E-06	1.4E-06	2.8E-06	1.4E-06	2.8E-06	1.4E-06	2.8E-06	NC	NC	1.9E-05	2.1E-05	NC	NC	NC	NC
1,2,3,7,8,9-HxCDF	1.6E-07	1.8E-07	1.4E-07	1.8E-07	1.4E-07	1.8E-07	1.4E-07	1.8E-07	NC	NC	1.8E-05	2.3E-05	NC	NC	NC	NC
1,2,3,4,6,7,8-HpCDF	3.7E-05	5.0E-05	2.8E-05	5.0E-05	2.8E-05	5.0E-05	2.8E-05	5.0E-05	NC	NC	2.7E-05	5.1E-05	NC	NC	NC	NC
1,2,3,4,7,8,9-HpCDF	3.2E-06	4.2E-06	2.4E-06	4.2E-06	2.4E-06	4.2E-06	2.4E-06	4.2E-06	NC	NC	1.4E-05	1.4E-05	NC	NC	NC	NC
OCDF	1.0E-04	1.5E-04	7.5E-05	1.5E-04	7.5E-05	1.5E-04	7.5E-05	1.5E-04	NC	NC	7.2E-05	1.3E-04	NC	NC	NC	NC
Total Tetra	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	-	-	NC	NC	NC	NC
Total Penta	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	-	-	NC	NC	NC	NC
Total Hexa	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	-	-	NC	NC	NC	NC
Total Hepta	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	-	-	NC	NC	NC	NC
Total Octa	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	-	-	NC	NC	NC	NC

Exposure Point Concentrations for COPCs and CPECs - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Chemical	Soil/Sediment (0-2 feet bgs) EPCs		Soil/Sediment (0-4 feet bgs) EPCs		Soil/Sediment (0-6 feet bgs) EPCs		Soil/Sediment (0-10 feet bgs) EPCs		Soil Vapor (0-10 feet bgs) EPCs		SRE Surface Water EPCs		SRE Chatsworth Formation Groundwater EPCs		Group 6 Chatsworth Formation Groundwater EPCs	
	CTE[a] (mg/kg)	RME[b] (mg/kg)	CTE (mg/kg)	RME (mg/kg)	CTE (mg/kg)	RME (mg/kg)	CTE (mg/kg)	RME (mg/kg)	CTE (µg/L)	RME (µg/L)	CTE (mg/L)	RME (mg/L)	CTE (mg/L)	RME (mg/L)	CTE (mg/L)	RME (mg/L)
PCDD/PCDF	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	-	-	NC	NC	NC	NC
PCBs																
Aroclor-1016	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	4.9E-01	4.9E-01	NC	NC	NC	NC
Aroclor-1221	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	4.9E-01	4.9E-01	NC	NC	NC	NC
Aroclor-1232	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	4.9E-01	4.9E-01	NC	NC	NC	NC
Aroclor-1242	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	4.9E-01	4.9E-01	NC	NC	NC	NC
Aroclor-1248	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	4.9E-01	4.9E-01	NC	NC	NC	NC
Aroclor-1254	1.7E-01	4.3E-01	1.6E-01	4.3E-01	1.6E-01	4.3E-01	1.6E-01	4.3E-01	NC	NC	4.9E-01	4.9E-01	NC	NC	NC	NC
Aroclor-1260	1.5E+00	7.8E+00	1.4E+00	7.7E+00	1.4E+00	7.7E+00	1.4E+00	7.7E+00	NC	NC	4.9E-01	4.9E-01	NC	NC	NC	NC
PCB-105	1.3E-04	6.4E-04	1.2E-04	6.3E-04	1.2E-04	6.3E-04	1.2E-04	6.3E-04	NC	NC	NC	NC	NC	NC	NC	NC
PCB-114	2.4E-06	1.1E-05	2.3E-06	1.1E-05	2.3E-06	1.1E-05	2.3E-06	1.1E-05	NC	NC	NC	NC	NC	NC	NC	NC
PCB-118	2.5E-04	1.3E-03	2.4E-04	1.3E-03	2.4E-04	1.3E-03	2.4E-04	1.3E-03	NC	NC	NC	NC	NC	NC	NC	NC
PCB-123	3.5E-06	1.8E-05	3.4E-06	1.8E-05	3.4E-06	1.8E-05	3.4E-06	1.8E-05	NC	NC	NC	NC	NC	NC	NC	NC
PCB-126	9.6E-06	5.0E-05	9.2E-06	4.9E-05	9.2E-06	4.9E-05	9.2E-06	4.9E-05	NC	NC	NC	NC	NC	NC	NC	NC
PCB-156	8.3E-05	4.3E-04	7.9E-05	4.2E-04	7.9E-05	4.2E-04	7.9E-05	4.2E-04	NC	NC	NC	NC	NC	NC	NC	NC
PCB-157	3.6E-05	1.9E-04	3.5E-05	1.9E-04	3.5E-05	1.9E-04	3.5E-05	1.9E-04	NC	NC	NC	NC	NC	NC	NC	NC
PCB-167	6.3E-05	3.3E-04	6.0E-05	3.3E-04	6.0E-05	3.3E-04	6.0E-05	3.3E-04	NC	NC	NC	NC	NC	NC	NC	NC
PCB-169	9.4E-07	5.0E-06	9.0E-07	4.9E-06	9.0E-07	4.9E-06	9.0E-07	4.9E-06	NC	NC	NC	NC	NC	NC	NC	NC
PCB-189	9.4E-06	5.0E-05	9.0E-06	4.9E-05	9.0E-06	4.9E-05	9.0E-06	4.9E-05	NC	NC	NC	NC	NC	NC	NC	NC
PCB-77	1.9E-05	9.9E-05	1.8E-05	9.7E-05	1.8E-05	9.7E-05	1.8E-05	9.7E-05	NC	NC	NC	NC	NC	NC	NC	NC
PCB-81	3.4E-06	1.8E-05	3.3E-06	1.7E-05	3.3E-06	1.7E-05	3.3E-06	1.7E-05	NC	NC	NC	NC	NC	NC	NC	NC

Notes:
a. Either the arithmetic mean concentration for two or more samples or the reported concentration for a single sample.
b. Either the 95% upper confidence limit (95% UCL) on the arithmetic mean for three or more samples, or the maximum concentration for less than three samples, or the maximum concentration in cases where the 95% UCL exceeds the maximum concentration.
COPC - chemical of potential concern
EPC - exposure point concentration
CTE - central tendency exposure
RME - reasonable maximum exposure
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCBs - polychlorinated biphenyls
"-" not applicable
mg/kg - milligrams per kilogram
bgs - below ground surface

Human Health Toxicity Criteria
Sodium Reactor Experiment (SRE) Area

	Oral CSF [1/(mg/kg-day)]		Dermal CSF [1/(mg/kg-day)]		Inhalation CSF [1/(mg/kg-day)]		Oral Reference Dose (mg/kg-day)		Dermal Reference Dose (mg/kg-day)		Inhalation Reference Dose (mg/kg-day)	
Compound	Value	Source	Value	Source	Value	Source	Value	Source	Value	Source	Value	Source
Inorganic Compounds												
Aluminum	NTV		NTV		NTV		1	USEPA 2004	1	USEPA 2004	0.0014	USEPA 2004
Antimony	NTV		NTV		NTV		0.0004	USEPA 2006	0.0004	USEPA 2006	NTV	
Arsenic	9.45	OEHHA 2006	9.45	OEHHA 2006	12	OEHHA 2006	0.0003	USEPA 2006	0.0003	USEPA 2006	8.571E-06	OEHHA 2006
Cadmium	0.38	OEHHA 2006	0.38	OEHHA 2006	15	OEHHA 2006	0.001	USEPA 2006	0.001	USEPA 2006	5.714E-06	OEHHA 2006
Chromium	NTV		NTV		NTV		1.5	USEPA 2006	1.5	USEPA 2006	5.714E-05	OEHHA 2006 (Cr6)
Copper	NTV		NTV		NTV		0.040	USEPA 1997	0.04	USEPA 1997	0.000686	CAPCOA 1992
Fluoride	NTV		NTV		NTV		0.060	USEPA 2006	0.060	USEPA 2006	NTV	
Lead	NTV		NTV		NTV		NTV		NTV		NTV	
Mercury	NTV		NTV		NTV		0.0003	CAPCOA 1992	0.0003	CAPCOA 1992	2.571E-05	OEHHA 2006
Methyl Mercury	NTV		NTV		NTV		0.00010	USEPA 2004	0.00010	USEPA 2004	NTV	
Nickel	NTV		NTV		0.91	OEHHA 2006	0.020	USEPA 2006	0.02	USEPA 2006	1.429E-05	OEHHA 2006
Nitrate	NTV		NTV		NTV		1.6	USEPA 2006	1.6	USEPA 2006	NTV	
Silver	NTV		NTV		NTV		0.005	USEPA 2006	0.005	USEPA 2006	NTV	
Thallium	NTV		NTV		NTV		0.00008	USEPA 2006	0.00008	USEPA 2006	NTV	
Vanadium	NTV		NTV		NTV		0.001	USEPA 2004	0.001	USEPA 2004	NTV	
Zinc	NTV		NTV		NTV		0.3	USEPA 2006	0.3	USEPA 2006	0.01	CAPCOA 1992
VOCs												
1,1,1-Trichloroethane	NTV		NTV		NTV		0.28	USEPA 2004	0.28	USEPA 2004	0.63	USEPA 2004
1,1,2-Trichloro-1,2,2-trifluoroethane	NTV		NTV		NTV		30	USEPA 2006	30	USEPA 2006	8.6	USEPA 1997
1,1-Dichloroethane	0.0057	OEHHA 2006	0.0057	OEHHA 2006	0.0057	OEHHA 2006	0.1	USEPA 1997	0.1	USEPA 1997	0.14	USEPA 1997
1,2-Dichloroethane	0.047	OEHHA 2006	0.047	OEHHA 2006	0.072	OEHHA 2006	0.02	USEPA 2004	0.02	USEPA 2004	0.0014	USEPA 2004
1,2-Dichloroethene (total)	NTV		NTV		NTV		0.02	USEPA 2006	0.02	USEPA 2006	0.02	USEPA 2006
1-Chlorohexane	NTV		NTV		NTV		NTV		NTV		NTV	
2-Butanone	NTV		NTV		NTV		0.6	USEPA 2006	0.6	USEPA 2006	1.4	USEPA 2006
2-Hexanone	NTV		NTV		NTV		NTV		NTV		NTV	
Acetone	NTV		NTV		NTV		0.9	USEPA 2006	0.9	USEPA 2006	0.9	USEPA 2006
Benzene	0.1	OEHHA 2006	0.1	OEHHA 2006	0.1	OEHHA 2006	0.004	USEPA 2006	0.004	USEPA 2006	0.0086	USEPA 2006
Chloromethane	NTV		NTV		NTV		NTV		NTV		0.026	USEPA 2006
cis-1,2-Dichloroethene	NTV		NTV		NTV		0.01	USEPA 2004	0.01	USEPA 2004	0.01	USEPA 2004
Ethylbenzene	NTV		NTV		NTV		0.1	USEPA 2006	0.1	USEPA 2006	0.286	USEPA 2006
m,p-Xylene	NTV		NTV		NTV		0.2	USEPA 2006	0.2	USEPA 2006	0.029	USEPA 2006
Methylene chloride	0.014	OEHHA 2006	0.014	OEHHA 2006	0.0035	OEHHA 2006	0.06	USEPA 2006	0.06	USEPA 2006	0.11	OEHHA 2006
Tetrachloroethene	0.54	OEHHA 2006	0.54	OEHHA 2006	0.021	OEHHA 2006	0.01	USEPA 2006	0.01	USEPA 2006	0.01	OEHHA 2006
Toluene	NTV		NTV		NTV		0.08	USEPA 2006	0.08	USEPA 2006	1.4	USEPA 2006
Trichloroethene	0.013	OEHHA 2006	0.013	OEHHA 2006	0.007	OEHHA 2006	0.0003	USEPA 2004	0.0003	USEPA 2004	0.17	OEHHA 2006
Xylenes (total)	NTV		NTV		NTV		0.2	USEPA 2006	0.2	USEPA 2006	0.029	USEPA 2006
SVOCs												
2-Methylnaphthalene	NTV		NTV		NTV		0.004	USEPA 2006	0.004	USEPA 2006	0.004	route-to-route
Acenaphthene	NTV		NTV		NTV		0.06	USEPA 2006	0.06	USEPA 2006	0.06	USEPA 2006
Acenaphthylene	NTV		NTV		NTV		0.03	Value for pyrene	0.03	Value for pyrene	0.03	Value for pyrene
Anthracene	NTV		NTV		NTV		0.3	USEPA 2006	0.3	USEPA 2006	0.3	USEPA 2006
Benzo(a)anthracene	1.2	OEHHA 2006	1.2	OEHHA 2006	0.39	OEHHA 2006	NTV		NTV		NTV	
Benzo(a)pyrene	12	OEHHA 2006	12	OEHHA 2006	3.9	OEHHA 2006	NTV		NTV		NTV	
Benzo(e)pyrene	NTV		NTV		NTV		NTV		NTV		NTV	
Benzo(b)fluoranthene	1.2	OEHHA 2006	1.2	OEHHA 2006	0.39	OEHHA 2006	NTV		NTV		NTV	
Benzo(g,h,i)perylene	NTV		NTV		NTV		NTV		NTV		NTV	
Benzo(k)fluoranthene	1.2	OEHHA 2006	1.2	OEHHA 2006	0.39	OEHHA 2006	NTV		NTV		NTV	
Chrysene	0.12	OEHHA 2006	0.12	OEHHA 2006	0.039	OEHHA 2006	NTV		NTV		NTV	
Dibenz(a,h)anthracene	4.1	OEHHA 2006	4.1	OEHHA 2006	4.1	OEHHA 2006	NTV		NTV		NTV	
Dibenzofuran	NTV		NTV		NTV		0.002	USEPA 2004	0.002	USEPA 2004	0.002	route-to-route
Fluoranthene	NTV		NTV		NTV		0.04	USEPA 2006	0.04	USEPA 2006	0.04	USEPA 2006
Fluorene	NTV		NTV		NTV		0.04	USEPA 2006	0.04	USEPA 2006	0.04	USEPA 2006
Indeno(1,2,3-cd)pyrene	1.2	OEHHA 2006	1.2	OEHHA 2006	0.39	OEHHA 2006	NTV		NTV		NTV	
Naphthalene	NTV		NTV		0.119	OEHHA 2006	0.02	USEPA 2006	0.02	USEPA 2006	0.00086	USEPA 2006

Human Health Toxicity Criteria
Sodium Reactor Experiment (SRE) Area

	Oral CSF [1/(mg/kg-day)]		Dermal CSF [1/(mg/kg-day)]		Inhalation CSF [1/(mg/kg-day)]		Oral Reference Dose (mg/kg-day)		Dermal Reference Dose (mg/kg-day)		Inhalation Reference Dose (mg/kg-day)	
Compound	Value	Source	Value	Source	Value	Source	Value	Source	Value	Source	Value	Source
Perylene	NTV		NTV		NTV		NTV		NTV		NTV	
Phenanthrene	NTV		NTV		NTV		0.03	Value for pyrene	0.03	Value for pyrene	0.03	Value for pyrene
Pyrene	NTV		NTV		NTV		0.03	USEPA 2006	0.03	USEPA 2006	0.03	USEPA 2006
Total Petroleum Hydrocarbons												
C11-C14(Kerosene Range)	NTV		NTV		NTV		NTV		NTV		NTV	
C14-C20(Diesel Range)	NTV		NTV		NTV		NTV		NTV		NTV	
C20-C30(Lubricant Oil Range)	NTV		NTV		NTV		NTV		NTV		NTV	
Dioxins												
2,3,7,8-TCDD	130000	OEHHA 2006	130000	OEHHA 2006	130000	OEHHA 2006	NTV		NTV		NTV	
1,2,3,7,8-PeCDD	130000	TCDD x WHO 2005 TEF (1.0)	130000	TCDD x WHO 2005 TEF (1.0)	130000	TCDD x WHO 2005 TEF (1.0)	NTV		NTV		NTV	
1,2,3,4,7,8-HxCDD	13000	TCDD x WHO 2005 TEF (0.1)	13000	TCDD x WHO 2005 TEF (0.1)	13000	TCDD x WHO 2005 TEF (0.1)	NTV		NTV		NTV	
1,2,3,6,7,8-HxCDD	13000	TCDD x WHO 2005 TEF (0.1)	13000	TCDD x WHO 2005 TEF (0.1)	13000	TCDD x WHO 2005 TEF (0.1)	NTV		NTV		NTV	
1,2,3,7,8,9-HxCDD	13000	TCDD x WHO 2005 TEF (0.1)	13000	TCDD x WHO 2005 TEF (0.1)	13000	TCDD x WHO 2005 TEF (0.1)	NTV		NTV		NTV	
1,2,3,4,6,7,8-HpCDD	390	TCDD x WHO 2005 TEF (0.01)	1300	TCDD x WHO 2005 TEF (0.01)	1300	TCDD x WHO 2005 TEF (0.01)	NTV		NTV		NTV	
OCDD	39	TCDD x WHO 2005 TEF (0.0003)	39	TCDD x WHO 2005 TEF (0.0003)	39	TCDD x WHO 2005 TEF (0.0003)	NTV		NTV		NTV	
2,3,7,8-TCDF	13000	TCDD x WHO 2005 TEF (0.1)	13000	TCDD x WHO 2005 TEF (0.1)	13000	TCDD x WHO 2005 TEF (0.1)	NTV		NTV		NTV	
1,2,3,7,8-PeCDF	1170	TCDD x WHO 2005 TEF (0.03)	1170	TCDD x WHO 2005 TEF (0.03)	1170	TCDD x WHO 2005 TEF (0.03)	NTV		NTV		NTV	
2,3,4,7,8-PeCDF	39000	TCDD x WHO 2005 TEF (0.3)	39000	TCDD x WHO 2005 TEF (0.3)	39000	TCDD x WHO 2005 TEF (0.3)	NTV		NTV		NTV	
1,2,3,4,7,8-HxCDF	13000	TCDD x WHO 2005 TEF (0.1)	13000	TCDD x WHO 2005 TEF (0.1)	13000	TCDD x WHO 2005 TEF (0.1)	NTV		NTV		NTV	
1,2,3,6,7,8-HxCDF	13000	TCDD x WHO 2005 TEF (0.1)	13000	TCDD x WHO 2005 TEF (0.1)	13000	TCDD x WHO 2005 TEF (0.1)	NTV		NTV		NTV	
2,3,4,6,7,8-HxCDF	13000	TCDD x WHO 2005 TEF (0.1)	13000	TCDD x WHO 2005 TEF (0.1)	13000	TCDD x WHO 2005 TEF (0.1)	NTV		NTV		NTV	
1,2,3,7,8,9-HxCDF	13000	TCDD x WHO 2005 TEF (0.1)	13000	TCDD x WHO 2005 TEF (0.1)	13000	TCDD x WHO 2005 TEF (0.1)	NTV		NTV		NTV	
1,2,3,4,6,7,8-HpCDF	1300	TCDD x WHO 2005 TEF (0.01)	1300	TCDD x WHO 2005 TEF (0.01)	1300	TCDD x WHO 2005 TEF (0.01)	NTV		NTV		NTV	
1,2,3,4,7,8,9-HpCDF	1300	TCDD x WHO 2005 TEF (0.01)	1300	TCDD x WHO 2005 TEF (0.01)	1300	TCDD x WHO 2005 TEF (0.01)	NTV		NTV		NTV	
OCDF	39	TCDD x WHO 2005 TEF (0.0003)	39	TCDD x WHO 2005 TEF (0.0003)	39	TCDD x WHO 2005 TEF (0.0003)	NTV		NTV		NTV	
PCBs												
Aroclor-1254	2	USEPA 2006	2	USEPA 2006	2	USEPA 2006	0.00002	USEPA 2006	0.00002	USEPA 2006	0.00002	USEPA 2006
Aroclor-1260	2	USEPA 2006	2	USEPA 2006	2	USEPA 2006	NTV		NTV		NTV	
PCB-105	3.9	TCDD x WHO 2005 TEF (0.00003)	3.9	TCDD x WHO 2005 TEF (0.00003)	3.9	TCDD x WHO 2005 TEF (0.00003)	NTV		NTV		NTV	
PCB-114	3.9	TCDD x WHO 2005 TEF (0.00003)	3.9	TCDD x WHO 2005 TEF (0.00003)	3.9	TCDD x WHO 2005 TEF (0.00003)	NTV		NTV		NTV	
PCB-118	3.9	TCDD x WHO 2005 TEF (0.00003)	3.9	TCDD x WHO 2005 TEF (0.00003)	3.9	TCDD x WHO 2005 TEF (0.00003)	NTV		NTV		NTV	
PCB-123	3.9	TCDD x WHO 2005 TEF (0.00003)	3.9	TCDD x WHO 2005 TEF (0.00003)	3.9	TCDD x WHO 2005 TEF (0.00003)	NTV		NTV		NTV	
PCB-126	13000	TCDD x WHO 2005 TEF (0.1)	13000	TCDD x WHO 2005 TEF (0.1)	13000	TCDD x WHO 2005 TEF (0.1)	NTV		NTV		NTV	
PCB-156	3.9	TCDD x WHO 2005 TEF (0.00003)	3.9	TCDD x WHO 2005 TEF (0.00003)	3.9	TCDD x WHO 2005 TEF (0.00003)	NTV		NTV		NTV	
PCB-157	3.9	TCDD x WHO 2005 TEF (0.00003)	3.9	TCDD x WHO 2005 TEF (0.00003)	3.9	TCDD x WHO 2005 TEF (0.00003)	NTV		NTV		NTV	
PCB-167	3.9	TCDD x WHO 2005 TEF (0.00003)	3.9	TCDD x WHO 2005 TEF (0.00003)	3.9	TCDD x WHO 2005 TEF (0.00003)	NTV		NTV		NTV	

Table C3-4 (3 of 3)

Human Health Toxicity Criteria
Sodium Reactor Experiment (SRE) Area

	Oral CSF [1/(mg/kg-day)]		Dermal CSF [1/(mg/kg-day)]		Inhalation CSF [1/(mg/kg-day)]		Oral Reference Dose (mg/kg-day)		Dermal Reference Dose (mg/kg-day)		Inhalation Reference Dose (mg/kg-day)	
Compound	Value	Source	Value	Source	Value	Source	Value	Source	Value	Source	Value	Source
PCB-169	3900	TCDD x WHO 2005 TEF (0.03)	3900	TCDD x WHO 2005 TEF (0.03)	3900	TCDD x WHO 2005 TEF (0.03)	NTV		NTV		NTV	
PCB-189	3.9	TCDD x WHO 2005 TEF (0.00003)	3.9	TCDD x WHO 2005 TEF (0.00003)	3.9	TCDD x WHO 2005 TEF (0.00003)	NTV		NTV		NTV	
PCB-77	13	TCDD x WHO 2005 TEF (0.0001)	13	TCDD x WHO 2005 TEF (0.0001)	13	TCDD x WHO 2005 TEF (0.0001)	NTV		NTV		NTV	
PCB-81	39	TCDD x WHO 2005 TEF (0.0003)	39	TCDD x WHO 2005 TEF (0.0003)	39	TCDD x WHO 2005 TEF (0.0003)	NTV		NTV		NTV	

Total Risk Estimates for the Adult Worker - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Central Tendency Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation of Indoor Air_s		Inhalation Ambient Air_s		Inhalation of Indoor Air_{gw}		Inhalation Ambient Air_{gw}		Cumulative Risk		Soil Media Risk		Groundwater Risk	
	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)
Inorganic Compounds																				
Cadmium	2.2E-04	9.9E-09	2.2E-07	9.9E-12	1.6E-06	1.7E-11	-	-	-	-	-	-	-	-	2.2E-04	1.0E-08	2.2E-04	1.0E-08	-	-
Copper	2.3E-04	-	2.3E-06	-	5.6E-07	-	-	-	-	-	-	-	-	-	2.3E-04	-	2.3E-04	-	-	-
Fluoride	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Lead	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Mercury	2.7E-03	-	2.7E-05	-	1.4E-06	-	-	-	-	-	-	-	-	-	2.8E-03	-	2.8E-03	-	-	-
Methyl Mercury	7.5E-06	-	7.5E-08	-	-	-	-	-	-	-	-	-	-	-	7.5E-06	-	7.5E-06	-	-	-
Nitrate	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Silver	6.6E-05	-	6.6E-07	-	-	-	-	-	-	-	-	-	-	-	6.7E-05	-	6.7E-05	-	-	-
Thallium	1.8E-03	-	1.8E-05	-	-	-	-	-	-	-	-	-	-	-	1.8E-03	-	1.8E-03	-	-	-
Zinc	2.4E-04	-	2.4E-06	-	3.1E-07	-	-	-	-	-	-	-	-	-	2.5E-04	-	2.5E-04	-	-	-
VOCs																				
1,1,1-Trichloroethane	-	-	-	-	-	-	1.5E-05	-	-	-	-	-	-	-	1.5E-05	-	1.5E-05	-	-	-
1,1,2-Trichloro-1,2,2-trifluoroethane	1.7E-10	-	1.7E-11	-	-	-	5.5E-06	-	-	-	-	-	-	-	5.5E-06	-	5.5E-06	-	-	-
1,1-Dichloroethane	-	-	-	-	-	-	6.5E-05	6.2E-09	9.1E-07	8.7E-11	4.3E-07	4.1E-11	9.1E-07	8.7E-11	6.6E-05	6.3E-09	6.6E-05	6.3E-09	1.3E-06	1.3E-10
1,2-Dichloroethane	-	-	-	-	-	-	-	-	2.1E-05	2.5E-10	7.0E-06	8.5E-11	2.1E-05	2.5E-10	2.8E-05	3.4E-10	2.1E-05	2.5E-10	2.8E-05	3.4E-10
1,2-Dichloroethene (total)	6.0E-07	-	6.0E-08	-	-	-	-	-	-	-	-	-	-	-	6.7E-07	-	6.7E-07	-	-	-
1-Chlorohexane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
2-Butanone	2.6E-08	-	2.6E-09	-	-	-	-	-	-	-	-	-	-	-	2.9E-08	-	2.9E-08	-	-	-
2-Hexanone	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Acetone	3.2E-07	-	3.2E-08	-	-	-	-	-	1.2E-09	-	4.4E-10	-	1.2E-09	-	3.6E-07	-	3.6E-07	-	1.7E-09	-
Benzene	-	-	-	-	-	-	-	-	1.7E-05	1.7E-09	6.4E-06	6.5E-10	1.7E-05	1.7E-09	2.3E-05	2.4E-09	1.7E-05	1.7E-09	2.3E-05	2.4E-09
Carbon disulfide	-	-	-	-	-	-	-	-	-	-	1.5E-06	-	5.0E-06	-	6.4E-06	-	-	-	6.4E-06	-
Chloromethane	-	-	-	-	-	-	-	-	-	-	3.2E-06	-	1.5E-05	-	1.8E-05	-	-	-	1.8E-05	-
cis-1,2-Dichloroethene	-	-	-	-	-	-	-	-	9.0E-06	-	3.2E-06	-	9.0E-06	-	1.2E-05	-	9.0E-06	-	1.2E-05	-
Ethylbenzene	-	-	-	-	-	-	3.2E-05	-	-	-	-	-	-	-	3.2E-05	-	3.2E-05	-	-	-
m,p-Xylene	-	-	-	-	-	-	6.2E-04	-	-	-	-	-	-	-	6.2E-04	-	6.2E-04	-	-	-
Methylene chloride	9.3E-08	9.4E-12	9.3E-09	9.4E-13	-	-	2.3E-03	1.1E-07	6.0E-07	2.9E-11	1.5E-07	7.2E-12	6.0E-07	2.9E-11	2.3E-03	1.1E-07	2.3E-03	1.1E-07	7.5E-07	3.6E-11
Tetrachloroethene	8.9E-07	5.8E-10	8.9E-08	5.8E-11	-	-	8.9E-04	2.3E-08	-	-	-	-	-	-	8.9E-04	2.3E-08	8.9E-04	2.3E-08	-	-
Toluene	3.0E-07	-	3.0E-08	-	-	-	6.9E-06	-	-	-	-	-	-	-	7.2E-06	-	7.2E-06	-	-	-
Trichloroethene	5.3E-05	2.5E-11	5.3E-06	2.5E-12	-	-	5.5E-05	7.9E-09	1.4E-06	2.0E-10	4.3E-07	6.2E-11	1.4E-06	2.0E-10	1.1E-04	8.1E-09	1.1E-04	8.1E-09	1.8E-06	2.6E-10
Xylenes (total)	5.4E-08	-	5.4E-09	-	-	-	-	-	-	-	-	-	-	-	6.0E-08	-	6.0E-08	-	-	-
SVOCs																				
2-Methylnaphthalene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Acenaphthene	3.2E-07	-	4.1E-08	-	1.3E-11	-	-	-	-	-	-	-	-	-	3.6E-07	-	3.6E-07	-	-	-
Acenaphthylene	4.4E-07	-	5.7E-08	-	1.9E-11	-	-	-	-	-	-	-	-	-	5.0E-07	-	5.0E-07	-	-	-
Anthracene	5.5E-08	-	7.2E-09	-	2.4E-12	-	-	-	-	-	-	-	-	-	6.3E-08	-	6.3E-08	-	-	-
Benzo(a)anthracene	-	2.2E-09	-	2.4E-09	-	3.1E-14	-	-	-	-	-	-	-	-	-	4.6E-09	-	4.6E-09	-	-
Benzo(a)pyrene	-	2.2E-08	-	2.4E-08	-	3.1E-13	-	-	-	-	-	-	-	-	-	4.6E-08	-	4.6E-08	-	-
Benzo(e)pyrene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Benzo(b)fluoranthene	-	3.0E-09	-	3.3E-09	-	4.2E-14	-	-	-	-	-	-	-	-	-	6.3E-09	-	6.3E-09	-	-
Benzo(g,h,i)perylene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Benzo(k)fluoranthene	-	1.8E-09	-	2.0E-09	-	2.5E-14	-	-	-	-	-	-	-	-	-	3.8E-09	-	3.8E-09	-	-
Chrysene	-	2.7E-10	-	3.0E-10	-	3.8E-15	-	-	-	-	-	-	-	-	-	5.7E-10	-	5.7E-10	-	-
Dibenz(a,h)anthracene	-	6.1E-09	-	6.6E-09	-	2.6E-13	-	-	-	-	-	-	-	-	-	1.3E-08	-	1.3E-08	-	-
Dibenzofuran	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Fluoranthene	6.4E-07	-	8.4E-08	-	2.7E-11	-	-	-	-	-	-	-	-	-	7.3E-07	-	7.3E-07	-	-	-
Fluorene	4.7E-07	-	6.1E-08	-	2.0E-11	-	-	-	-	-	-	-	-	-	5.3E-07	-	5.3E-07	-	-	-
Indeno(1,2,3-cd)pyrene	-	2.1E-09	-	2.3E-09	-	2.9E-14	-	-	-	-	-	-	-	-	-	4.4E-09	-	4.4E-09	-	-
Naphthalene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Perylene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Phenanthrene	1.1E-06	-	1.5E-07	-	4.8E-11	-	-	-	-	-	-	-	-	-	1.3E-06	-	1.3E-06	-	-	-
Pyrene	7.6E-07	-	9.9E-08	-	3.2E-11	-	-	-	-	-	-	-	-	-	8.6E-07	-	8.6E-07	-	-	-
Total Petroleum Hydrocarbons																				
C11-C14(Kerosene Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
C14-C20(Diesel Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
C20-C30(Lubricant Oil Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

Total Risk Estimates for the Adult Worker - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Central Tendency Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation of Indoor Air$_{s-gw}$		Inhalation Ambient Air$_{s-gw}$		Inhalation of Indoor Air$_{s-gw}$		Inhalation Ambient Air$_{s-gw}$		Cumulative Risk		Soil Media Risk		Groundwater Risk	
	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)
Dioxins																				
2,3,7,8-TCDD	-	1.8E-09	-	5.5E-11	-	7.8E-14	-	-	-	-	-	-	-	-	-	1.9E-09	-	1.9E-09	-	-
1,2,3,7,8-PeCDD	-	7.3E-09	-	2.2E-10	-	3.1E-13	-	-	-	-	-	-	-	-	-	7.6E-09	-	7.6E-09	-	-
1,2,3,4,7,8-HxCDD	-	2.7E-09	-	8.2E-11	-	1.2E-13	-	-	-	-	-	-	-	-	-	2.8E-09	-	2.8E-09	-	-
1,2,3,6,7,8-HxCDD	-	1.1E-08	-	3.2E-10	-	4.5E-13	-	-	-	-	-	-	-	-	-	1.1E-08	-	1.1E-08	-	-
1,2,3,7,8,9-HxCDD	-	4.0E-09	-	1.2E-10	-	1.7E-13	-	-	-	-	-	-	-	-	-	4.1E-09	-	4.1E-09	-	-
1,2,3,4,6,7,8-HpCDD	-	1.1E-08	-	3.4E-10	-	1.6E-12	-	-	-	-	-	-	-	-	-	1.2E-08	-	1.2E-08	-	-
OCDD	-	1.7E-08	-	5.0E-10	-	7.1E-13	-	-	-	-	-	-	-	-	-	1.7E-08	-	1.7E-08	-	-
2,3,7,8-TCDF	-	3.7E-10	-	1.1E-11	-	1.6E-14	-	-	-	-	-	-	-	-	-	3.8E-10	-	3.8E-10	-	-
1,2,3,7,8-PeCDF	-	1.7E-11	-	5.0E-13	-	7.1E-16	-	-	-	-	-	-	-	-	-	1.7E-11	-	1.7E-11	-	-
2,3,4,7,8-PeCDF	-	1.6E-09	-	4.9E-11	-	7.0E-14	-	-	-	-	-	-	-	-	-	1.7E-09	-	1.7E-09	-	-
1,2,3,4,7,8-HxCDF	-	1.2E-09	-	3.6E-11	-	5.1E-14	-	-	-	-	-	-	-	-	-	1.2E-09	-	1.2E-09	-	-
1,2,3,6,7,8-HxCDF	-	1.0E-09	-	3.1E-11	-	4.4E-14	-	-	-	-	-	-	-	-	-	1.1E-09	-	1.1E-09	-	-
2,3,4,6,7,8-HxCDF	-	2.6E-09	-	7.7E-11	-	1.1E-13	-	-	-	-	-	-	-	-	-	2.6E-09	-	2.6E-09	-	-
1,2,3,7,8,9-HxCDF	-	2.4E-10	-	7.2E-12	-	1.0E-14	-	-	-	-	-	-	-	-	-	2.5E-10	-	2.5E-10	-	-
1,2,3,4,6,7,8-HpCDF	-	3.5E-09	-	1.1E-10	-	1.5E-13	-	-	-	-	-	-	-	-	-	3.6E-09	-	3.6E-09	-	-
1,2,3,4,7,8,9-HpCDF	-	3.3E-10	-	9.8E-12	-	1.4E-14	-	-	-	-	-	-	-	-	-	3.3E-10	-	3.3E-10	-	-
OCDF	-	2.7E-10	-	8.1E-12	-	1.2E-14	-	-	-	-	-	-	-	-	-	2.8E-10	-	2.8E-10	-	-
PCBs																				
Aroclor-1254	3.5E-03	1.7E-08	4.8E-04	2.3E-09	1.5E-07	7.1E-13	-	-	-	-	-	-	-	-	3.9E-03	1.9E-08	3.9E-03	1.9E-08	-	-
Aroclor-1260	-	1.4E-07	-	1.9E-08	-	5.8E-12	-	-	-	-	-	-	-	-	-	1.6E-07	-	1.6E-07	-	-
PCB-105	-	2.3E-11	-	3.2E-12	-	9.7E-16	-	-	-	-	-	-	-	-	-	2.6E-11	-	2.6E-11	-	-
PCB-114	-	4.4E-13	-	6.1E-14	-	1.9E-17	-	-	-	-	-	-	-	-	-	5.0E-13	-	5.0E-13	-	-
PCB-118	-	4.6E-11	-	6.4E-12	-	2.0E-15	-	-	-	-	-	-	-	-	-	5.2E-11	-	5.2E-11	-	-
PCB-123	-	6.4E-13	-	9.0E-14	-	2.7E-17	-	-	-	-	-	-	-	-	-	7.3E-13	-	7.3E-13	-	-
PCB-126	-	5.9E-09	-	8.2E-10	-	2.5E-13	-	-	-	-	-	-	-	-	-	6.7E-09	-	6.7E-09	-	-
PCB-156	-	1.5E-11	-	2.1E-12	-	6.4E-16	-	-	-	-	-	-	-	-	-	1.7E-11	-	1.7E-11	-	-
PCB-157	-	6.6E-12	-	9.3E-13	-	2.8E-16	-	-	-	-	-	-	-	-	-	7.5E-12	-	7.5E-12	-	-
PCB-167	-	1.2E-11	-	1.6E-12	-	4.9E-16	-	-	-	-	-	-	-	-	-	1.3E-11	-	1.3E-11	-	-
PCB-169	-	1.7E-10	-	2.4E-11	-	7.3E-15	-	-	-	-	-	-	-	-	-	2.0E-10	-	2.0E-10	-	-
PCB-189	-	1.7E-12	-	2.4E-13	-	7.3E-17	-	-	-	-	-	-	-	-	-	2.0E-12	-	2.0E-12	-	-
PCB-77	-	1.2E-11	-	1.6E-12	-	5.0E-16	-	-	-	-	-	-	-	-	-	1.3E-11	-	1.3E-11	-	-
PCB-81	-	6.2E-12	-	8.7E-13	-	2.7E-16	-	-	-	-	-	-	-	-	-	7.1E-12	-	7.1E-12	-	-
Total PCB Congeners	-	6.1E-09	-	8.6E-10	-	2.6E-13	-	-	-	-	-	-	-	-	-	7.0E-09	-	7.0E-09	-	-
Cumulative Risk	8.8E-03	2.7E-07	5.4E-04	6.4E-08	4.0E-06	2.8E-11	4.0E-03	1.5E-07	5.0E-05	2.3E-09	2.2E-05	8.5E-10	6.9E-05	2.3E-09	1.3E-02	4.8E-07	1.3E-02	4.8E-07	9.2E-05	3.2E-09

Table C3-5a (3 of 4)

Total Risk Estimates for the Adult Worker - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Reasonable Maximum Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation of Indoor Air_s		Inhalation Ambient Air_s		Inhalation of Indoor Air_{gw}		Inhalation Ambient Air_{gw}		Cumulative Risk		Soil Media Risk		Near-Surface Groundwater Risk	
	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)
Inorganic Compounds																				
Cadmium	2.2E-03	2.8E-07	5.6E-06	7.0E-10	9.5E-06	2.7E-10	-	-	-	-	-	-	-	-	2.2E-03	2.8E-07	2.2E-03	2.8E-07	-	-
Copper	2.2E-03	-	5.6E-05	-	3.2E-06	-	-	-	-	-	-	-	-	-	2.3E-03	-	2.3E-03	-	-	-
Fluoride	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Lead	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Mercury	2.9E-02	-	7.2E-04	-	8.2E-06	-	-	-	-	-	-	-	-	-	3.0E-02	-	3.0E-02	-	-	-
Methyl Mercury	7.1E-05	-	1.8E-06	-	-	-	-	-	-	-	-	-	-	-	7.3E-05	-	7.3E-05	-	-	-
Nitrate	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Silver	1.1E-03	-	2.8E-05	-	-	-	-	-	-	-	-	-	-	-	1.1E-03	-	1.1E-03	-	-	-
Thallium	8.1E-03	-	2.0E-04	-	-	-	-	-	-	-	-	-	-	-	8.3E-03	-	8.3E-03	-	-	-
Zinc	2.9E-03	-	7.1E-05	-	2.1E-06	-	-	-	-	-	-	-	-	-	2.9E-03	-	2.9E-03	-	-	-
VOCs																				
1,1,1-Trichloroethane	-	-	-	-	-	-	3.9E-05	-	-	-	-	-	-	-	3.9E-05	-	3.9E-05	-	-	-
1,1,2-Trichloro-1,2,2-trifluoroethane	7.8E-10	-	2.0E-10	-	-	-	1.7E-05	-	-	-	-	-	-	-	1.7E-05	-	1.7E-05	-	-	-
1,1-Dichloroethane	-	-	-	-	-	-	1.7E-04	4.5E-08	2.4E-06	6.3E-10	1.1E-06	3.0E-10	2.4E-06	6.3E-10	1.7E-04	4.6E-08	1.7E-04	4.6E-08	3.5E-06	9.3E-10
1,2-Dichloroethane	-	-	-	-	-	-	-	-	5.5E-05	1.9E-09	1.9E-05	6.2E-10	5.5E-05	1.9E-09	7.4E-05	2.5E-09	5.5E-05	1.9E-09	7.4E-05	2.5E-09
1,2-Dichloroethene (total)	6.8E-06	-	1.7E-06	-	-	-	-	-	-	-	-	-	-	-	8.6E-06	-	8.6E-06	-	-	-
1-Chlorohexane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
2-Butanone	1.2E-07	-	3.0E-08	-	-	-	-	-	-	-	-	-	-	-	1.5E-07	-	1.5E-07	-	-	-
2-Hexanone	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Acetone	9.1E-06	-	2.3E-06	-	-	-	-	-	3.2E-09	-	1.2E-09	-	3.2E-09	-	1.1E-05	-	1.1E-05	-	4.4E-09	-
Benzene	-	-	-	-	-	-	-	-	4.4E-05	1.3E-08	1.7E-05	4.8E-09	4.4E-05	1.3E-08	6.1E-05	1.7E-08	4.4E-05	1.3E-08	6.1E-05	1.7E-08
Carbon disulfide	-	-	-	-	-	-	-	-	-	-	3.9E-06	-	1.3E-05	-	1.7E-05	-	-	-	1.7E-05	-
Chloromethane	-	-	-	-	-	-	-	-	-	-	8.4E-06	-	3.9E-05	-	4.7E-05	-	-	-	4.7E-05	-
cis-1,2-Dichloroethene	-	-	-	-	-	-	-	-	2.4E-05	-	8.4E-06	-	2.4E-05	-	3.2E-05	-	2.4E-05	-	3.2E-05	-
Ethylbenzene	-	-	-	-	-	-	8.4E-05	-	-	-	-	-	-	-	8.4E-05	-	8.4E-05	-	-	-
m,p-Xylene	-	-	-	-	-	-	1.6E-03	-	-	-	-	-	-	-	1.6E-03	-	1.6E-03	-	-	-
Methylene chloride	4.2E-07	1.2E-10	1.1E-07	3.0E-11	-	-	6.2E-03	8.2E-07	1.6E-06	2.1E-10	3.9E-07	5.3E-11	1.6E-06	2.1E-10	6.2E-03	8.2E-07	6.2E-03	8.2E-07	2.0E-06	2.6E-10
Tetrachloroethene	1.7E-05	3.1E-08	4.3E-06	7.8E-09	-	-	2.4E-03	1.6E-07	-	-	-	-	-	-	2.4E-03	2.0E-07	2.4E-03	2.0E-07	-	-
Toluene	8.4E-06	-	2.1E-06	-	-	-	1.8E-05	-	-	-	-	-	-	-	2.9E-05	-	2.9E-05	-	-	-
Trichloroethene	1.3E-03	1.7E-09	3.3E-04	4.3E-10	-	-	1.5E-04	5.8E-08	3.7E-06	1.5E-09	1.1E-06	4.5E-10	3.7E-06	1.5E-09	1.8E-03	6.1E-08	1.8E-03	6.1E-08	4.8E-06	1.9E-09
Xylenes (total)	5.0E-07	-	1.3E-07	-	-	-	-	-	-	-	-	-	-	-	6.3E-07	-	6.3E-07	-	-	-
SVOCs																				
2-Methylnaphthalene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Acenaphthene	3.3E-06	-	1.1E-06	-	8.0E-11	-	-	-	-	-	-	-	-	-	4.3E-06	-	4.3E-06	-	-	-
Acenaphthylene	5.5E-06	-	1.8E-06	-	1.4E-10	-	-	-	-	-	-	-	-	-	7.3E-06	-	7.3E-06	-	-	-
Anthracene	5.3E-07	-	1.7E-07	-	1.3E-11	-	-	-	-	-	-	-	-	-	7.1E-07	-	7.1E-07	-	-	-
Benzo(a)anthracene	-	1.2E-07	-	3.8E-08	-	9.3E-13	-	-	-	-	-	-	-	-	-	1.5E-07	-	1.5E-07	-	-
Benzo(a)pyrene	-	1.2E-06	-	3.8E-07	-	9.3E-12	-	-	-	-	-	-	-	-	-	1.5E-06	-	1.5E-06	-	-
Benzo(e)pyrene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Benzo(b)fluoranthene	-	2.1E-07	-	6.7E-08	-	1.7E-12	-	-	-	-	-	-	-	-	-	2.8E-07	-	2.8E-07	-	-
Benzo(g,h,i)perylene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Benzo(k)fluoranthene	-	6.7E-08	-	2.2E-08	-	5.3E-13	-	-	-	-	-	-	-	-	-	8.8E-08	-	8.8E-08	-	-
Chrysene	-	1.7E-08	-	5.5E-09	-	1.4E-13	-	-	-	-	-	-	-	-	-	2.2E-08	-	2.2E-08	-	-
Dibenz(a,h)anthracene	-	2.3E-07	-	7.4E-08	-	5.6E-12	-	-	-	-	-	-	-	-	-	3.0E-07	-	3.0E-07	-	-
Dibenzofuran	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Fluoranthene	1.8E-05	-	6.0E-06	-	4.5E-10	-	-	-	-	-	-	-	-	-	2.4E-05	-	2.4E-05	-	-	-
Fluorene	4.9E-06	-	1.6E-06	-	1.2E-10	-	-	-	-	-	-	-	-	-	6.5E-06	-	6.5E-06	-	-	-
Indeno(1,2,3-cd)pyrene	-	1.1E-07	-	3.4E-08	-	8.5E-13	-	-	-	-	-	-	-	-	-	1.4E-07	-	1.4E-07	-	-
Naphthalene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Perylene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Phenanthrene	1.3E-05	-	4.3E-06	-	3.2E-10	-	-	-	-	-	-	-	-	-	1.7E-05	-	1.7E-05	-	-	-
Pyrene	1.0E-05	-	3.3E-06	-	2.5E-10	-	-	-	-	-	-	-	-	-	1.3E-05	-	1.3E-05	-	-	-
Total Petroleum Hydrocarbons																				
C11-C14(Kerosene Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
C14-C20(Diesel Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
C20-C30(Lubricant Oil Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

Table C3-5a (4 of 4)

Total Risk Estimates for the Adult Worker - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Reasonable Maximum Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation of Indoor Air_{s-gw}		Inhalation Ambient Air_{s-gw}		Inhalation of Indoor Air_{s-gw}		Inhalation Ambient Air_{s-gw}		Cumulative Risk		Soil Media Risk		Near-Surface Groundwater Risk	
	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)
Dioxins																				
2,3,7,8-TCDD	-	4.5E-08	-	3.4E-09	-	1.1E-12	-	-	-	-	-	-	-	-	-	4.9E-08	-	4.9E-08	-	-
1,2,3,7,8-PeCDD	-	1.8E-07	-	1.4E-08	-	4.5E-12	-	-	-	-	-	-	-	-	-	2.0E-07	-	2.0E-07	-	-
1,2,3,4,7,8-HxCDD	-	7.7E-08	-	5.7E-09	-	1.9E-12	-	-	-	-	-	-	-	-	-	8.2E-08	-	8.2E-08	-	-
1,2,3,6,7,8-HxCDD	-	2.5E-07	-	1.9E-08	-	6.2E-12	-	-	-	-	-	-	-	-	-	2.7E-07	-	2.7E-07	-	-
1,2,3,7,8,9-HxCDD	-	8.5E-08	-	6.4E-09	-	2.1E-12	-	-	-	-	-	-	-	-	-	9.1E-08	-	9.1E-08	-	-
1,2,3,4,6,7,8-HpCDD	-	3.0E-07	-	2.3E-08	-	2.5E-11	-	-	-	-	-	-	-	-	-	3.2E-07	-	3.2E-07	-	-
OCDD	-	4.3E-07	-	3.2E-08	-	1.1E-11	-	-	-	-	-	-	-	-	-	4.6E-07	-	4.6E-07	-	-
2,3,7,8-TCDF	-	6.7E-09	-	5.0E-10	-	1.6E-13	-	-	-	-	-	-	-	-	-	7.2E-09	-	7.2E-09	-	-
1,2,3,7,8-PeCDF	-	4.4E-10	-	3.3E-11	-	1.1E-14	-	-	-	-	-	-	-	-	-	4.7E-10	-	4.7E-10	-	-
2,3,4,7,8-PeCDF	-	4.0E-08	-	3.0E-09	-	9.8E-13	-	-	-	-	-	-	-	-	-	4.3E-08	-	4.3E-08	-	-
1,2,3,4,7,8-HxCDF	-	2.8E-08	-	2.1E-09	-	7.0E-13	-	-	-	-	-	-	-	-	-	3.1E-08	-	3.1E-08	-	-
1,2,3,6,7,8-HxCDF	-	2.7E-08	-	2.0E-09	-	6.6E-13	-	-	-	-	-	-	-	-	-	2.9E-08	-	2.9E-08	-	-
2,3,4,6,7,8-HxCDF	-	7.5E-08	-	5.6E-09	-	1.8E-12	-	-	-	-	-	-	-	-	-	8.0E-08	-	8.0E-08	-	-
1,2,3,7,8,9-HxCDF	-	8.2E-09	-	6.2E-10	-	2.0E-13	-	-	-	-	-	-	-	-	-	8.8E-09	-	8.8E-09	-	-
1,2,3,4,6,7,8-HpCDF	-	8.1E-08	-	6.1E-09	-	2.0E-12	-	-	-	-	-	-	-	-	-	8.7E-08	-	8.7E-08	-	-
1,2,3,4,7,8,9-HpCDF	-	7.8E-09	-	5.9E-10	-	1.9E-13	-	-	-	-	-	-	-	-	-	8.4E-09	-	8.4E-09	-	-
OCDF	-	6.0E-09	-	4.5E-10	-	1.5E-13	-	-	-	-	-	-	-	-	-	6.5E-09	-	6.5E-09	-	-
PCBs																				
Aroclor-1254	4.2E-02	5.6E-07	1.5E-02	2.0E-07	1.0E-06	1.4E-11	-	-	-	-	-	-	-	-	5.7E-02	7.6E-07	5.7E-02	7.6E-07	-	-
Aroclor-1260	-	9.5E-06	-	3.3E-06	-	2.3E-10	-	-	-	-	-	-	-	-	-	1.3E-05	-	1.3E-05	-	-
PCB-105	-	1.4E-09	-	5.0E-10	-	3.5E-14	-	-	-	-	-	-	-	-	-	1.9E-09	-	1.9E-09	-	-
PCB-114	-	2.6E-11	-	8.9E-12	-	6.3E-16	-	-	-	-	-	-	-	-	-	3.4E-11	-	3.4E-11	-	-
PCB-118	-	2.9E-09	-	1.0E-09	-	7.0E-14	-	-	-	-	-	-	-	-	-	3.9E-09	-	3.9E-09	-	-
PCB-123	-	4.1E-11	-	1.4E-11	-	1.0E-15	-	-	-	-	-	-	-	-	-	5.5E-11	-	5.5E-11	-	-
PCB-126	-	3.7E-07	-	1.3E-07	-	9.1E-12	-	-	-	-	-	-	-	-	-	5.0E-07	-	5.0E-07	-	-
PCB-156	-	9.6E-10	-	3.4E-10	-	2.3E-14	-	-	-	-	-	-	-	-	-	1.3E-09	-	1.3E-09	-	-
PCB-157	-	4.3E-10	-	1.5E-10	-	1.1E-14	-	-	-	-	-	-	-	-	-	5.8E-10	-	5.8E-10	-	-
PCB-167	-	7.5E-10	-	2.6E-10	-	1.8E-14	-	-	-	-	-	-	-	-	-	1.0E-09	-	1.0E-09	-	-
PCB-169	-	1.1E-08	-	3.9E-09	-	2.7E-13	-	-	-	-	-	-	-	-	-	1.5E-08	-	1.5E-08	-	-
PCB-189	-	1.1E-10	-	3.9E-11	-	2.7E-15	-	-	-	-	-	-	-	-	-	1.5E-10	-	1.5E-10	-	-
PCB-77	-	7.4E-10	-	2.6E-10	-	1.8E-14	-	-	-	-	-	-	-	-	-	1.0E-09	-	1.0E-09	-	-
PCB-81	-	3.9E-10	-	1.4E-10	-	9.7E-15	-	-	-	-	-	-	-	-	-	5.3E-10	-	5.3E-10	-	-
Total PCB Congeners	-	3.9E-07	-	1.4E-07	-	9.6E-12	-	-	-	-	-	-	-	-	-	5.3E-07	-	5.3E-07	-	-
Cumulative Risk	8.9E-02	1.4E-05	1.6E-02	4.3E-06	2.4E-05	6.0E-10	1.1E-02	1.1E-06	1.3E-04	1.7E-08	5.9E-05	6.2E-09	1.8E-04	1.7E-08	1.2E-01	1.9E-05	1.2E-01	1.9E-05	2.4E-04	2.3E-08

Notes:
Inhalation Indoor Air_{s-gw} - Exposure associated with indoor air concentrations of COPCs modeled from soil vapor, soil, or groundwater.
Inhalation Ambient Air_{s-gw} - Exposure associated with ambient air concentrations of COPCs modeled from soil or groundwater.
HQ - hazard quotient
HI - hazard index
Risk - incremental increased lifetime cancer risk
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCDD/PCDF - Polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.
PCB - polychlorinated biphenyls
COPC - chemical of potential concern
"-" indicates that either adequate toxicity data were not available for a chemical or the exposure pathway was not applicable to that chemical.
HIs and cancer risks for PCB congeners. These results not included in cumulative risk estimates.

Total Risk Estimates for the Adult Worker - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Central Tendency Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation of Indoor Air_s		Inhalation Ambient Air_s		Inhalation of Indoor Air_{gw}		Inhalation Ambient Air_{gw}		Cumulative Risk		Soil Media Risk		Groundwater Risk	
	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)
Inorganic Compounds																				
Aluminum	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Antimony	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Arsenic	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Cadmium	8.2E-05	3.7E-09	8.2E-08	3.7E-12	6.1E-07	6.3E-12	-	-	-	-	-	-	-	-	8.3E-05	3.7E-09	8.3E-05	3.7E-09	-	-
Chromium	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Copper	1.0E-04	-	1.0E-06	-	2.6E-07	-	-	-	-	-	-	-	-	-	1.1E-04	-	1.1E-04	-	-	-
Fluoride	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Lead	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Mercury	2.5E-03	-	2.5E-05	-	1.2E-06	-	-	-	-	-	-	-	-	-	2.5E-03	-	2.5E-03	-	-	-
Methyl Mercury	7.5E-06	-	7.5E-08	-	-	-	-	-	-	-	-	-	-	-	7.5E-06	-	7.5E-06	-	-	-
Nickel	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Nitrate	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Silver	1.1E-04	-	1.1E-06	-	-	-	-	-	-	-	-	-	-	-	1.1E-04	-	1.1E-04	-	-	-
Thallium	5.3E-03	-	5.3E-05	-	-	-	-	-	-	-	-	-	-	-	5.4E-03	-	5.4E-03	-	-	-
Vanadium	-		-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Zinc	9.7E-05	-	9.7E-07	-	1.2E-07	-	-	-	-	-	-	-	-	-	9.8E-05	-	9.8E-05	-	-	-
VOCs																				
1,1,1-Trichloroethane	-	-	-	-	-	-	1.5E-05	-	-	-	-	-	-	-	1.5E-05	-	1.5E-05	-	-	-
1,1,2-Trichloro-1,2,2-trifluoroethane	1.7E-10	-	1.7E-11	-	-	-	5.5E-06	-	-	-	-	-	-	-	5.5E-06	-	5.5E-06	-	-	-
1,1-Dichloroethane	-	-	-	-	-	-	6.5E-05	6.2E-09	9.1E-07	8.7E-11	4.3E-07	4.1E-11	9.1E-07	8.7E-11	6.6E-05	6.3E-09	6.6E-05	6.3E-09	1.3E-06	1.3E-10
1,2-Dichloroethane	-	-	-	-	-	-	-	-	2.1E-05	2.5E-10	7.0E-06	8.5E-11	2.1E-05	2.5E-10	2.8E-05	3.4E-10	2.1E-05	2.5E-10	2.8E-05	3.4E-10
1,2-Dichloroethene (total)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
1-Chlorohexane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
2-Butanone	1.4E-08	-	1.4E-09	-	-	-	-	-	-	-	-	-	-	-	1.5E-08	-	1.5E-08	-	-	-
2-Hexanone	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Acetone	2.9E-07	-	2.9E-08	-	-	-	-	-	1.2E-09	-	4.4E-10	-	1.2E-09	-	3.3E-07	-	3.2E-07	-	1.7E-09	-
Benzene	-	-	-	-	-	-	-	-	1.7E-05	1.7E-09	6.4E-06	6.5E-10	1.7E-05	1.7E-09	2.3E-05	2.4E-09	1.7E-05	1.7E-09	2.3E-05	2.4E-09
Carbon disulfide	-	-	-	-	-	-	-	-	-	-	3.9E-06	-	1.3E-05	-	1.7E-05	-	-	-	1.7E-05	-
Chloromethane	-	-	-	-	-	-	-	-	-	-	3.2E-06	-	1.5E-05	-	1.8E-05	-	-	-	1.8E-05	-
cis-1,2-Dichloroethene	-	-	-	-	-	-	-	-	9.0E-06	-	3.2E-06	-	9.0E-06	-	1.2E-05	-	9.0E-06	-	1.2E-05	-
Ethylbenzene	-	-	-	-	-	-	3.2E-05	-	-	-	-	-	-	-	3.2E-05	-	3.2E-05	-	-	-
m,p-Xylene	7.4E-09	-	7.4E-10	-	-	-	6.2E-04	-	-	-	-	-	-	-	6.2E-04	-	6.2E-04	-	-	-
Methylene chloride	7.1E-08	7.1E-12	7.1E-09	7.1E-13	-	-	2.3E-03	1.1E-07	6.0E-07	2.9E-11	1.5E-07	7.2E-12	6.0E-07	2.9E-11	2.3E-03	1.1E-07	2.3E-03	1.1E-07	7.5E-07	3.6E-11
Tetrachloroethene	-	-	-	-	-	-	8.9E-04	2.3E-08	-	-	-	-	-	-	8.9E-04	2.3E-08	8.9E-04	2.3E-08	-	-
Toluene	-	-	-	-	-	-	6.9E-06	-	-	-	-	-	-	-	6.9E-06	-	6.9E-06	-	-	-
Trichloroethene	-	-	-	-	-	-	5.5E-05	7.9E-09	1.4E-06	2.0E-10	4.3E-07	6.2E-11	1.4E-06	2.0E-10	5.6E-05	8.1E-09	5.6E-05	8.1E-09	1.8E-06	2.6E-10
Xylenes (total)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
SVOCs																				
2-Methylnaphthalene	2.3E-06	-	3.0E-07	-	9.8E-11	-	-	-	-	-	-	-	-	-	2.6E-06	-	2.6E-06	-	-	-
Acenaphthene	4.9E-07	-	6.4E-08	-	2.1E-11	-	-	-	-	-	-	-	-	-	5.5E-07	-	5.5E-07	-	-	-
Acenaphthylene	7.0E-08	-	9.1E-09	-	3.0E-12	-	-	-	-	-	-	-	-	-	7.9E-08	-	7.9E-08	-	-	-
Anthracene	2.8E-07	-	3.6E-08	-	1.2E-11	-	-	-	-	-	-	-	-	-	3.1E-07	-	3.1E-07	-	-	-
Benzo(a)anthracene	-	5.0E-08	-	5.5E-08	-	7.0E-13	-	-	-	-	-	-	-	-	-	1.0E-07	-	1.0E-07	-	-
Benzo(a)pyrene	-	5.4E-07	-	5.9E-07	-	7.5E-12	-	-	-	-	-	-	-	-	-	1.1E-06	-	1.1E-06	-	-
Benzo(e)pyrene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Benzo(b)fluoranthene	-	4.8E-08	-	5.2E-08	-	6.7E-13	-	-	-	-	-	-	-	-	-	1.0E-07	-	1.0E-07	-	-
Benzo(g,h,i)perylene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Benzo(k)fluoranthene	-	5.3E-08	-	5.8E-08	-	7.4E-13	-	-	-	-	-	-	-	-	-	1.1E-07	-	1.1E-07	-	-
Chrysene	-	3.7E-09	-	4.0E-09	-	5.1E-14	-	-	-	-	-	-	-	-	-	7.7E-09	-	7.7E-09	-	-
Dibenz(a,h)anthracene	-	2.4E-08	-	2.6E-08	-	1.0E-12	-	-	-	-	-	-	-	-	-	5.1E-08	-	5.1E-08	-	-
Dibenzofuran	6.0E-05	-	7.8E-06	-	2.6E-09	-	-	-	-	-	-	-	-	-	6.8E-05	-	6.8E-05	-	-	-
Fluoranthene	1.6E-05	-	2.0E-06	-	6.6E-10	-	-	-	-	-	-	-	-	-	1.8E-05	-	1.8E-05	-	-	-
Fluorene	7.5E-07	-	9.7E-08	-	3.2E-11	-	-	-	-	-	-	-	-	-	8.4E-07	-	8.4E-07	-	-	-
Indeno(1,2,3-cd)pyrene	-	2.3E-08	-	2.5E-08	-	3.2E-13	-	-	-	-	-	-	-	-	-	4.8E-08	-	4.8E-08	-	-
Naphthalene	4.2E-07	-	5.5E-08	-	4.2E-10	5.1E-15	-	-	-	-	-	-	-	-	4.8E-07	5.1E-15	4.8E-07	5.1E-15	-	-
Perylene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Phenanthrene	1.0E-05	-	1.3E-06	-	4.2E-10	-	-	-	-	-	-	-	-	-	1.1E-05	-	1.1E-05	-	-	-
Pyrene	1.7E-05	-	2.3E-06	-	7.4E-10	-	-	-	-	-	-	-	-	-	2.0E-05	-	2.0E-05	-	-	-
Total Petroleum Hydrocarbons																				
C11-C14(Kerosene Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
C14-C20(Diesel Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
C20-C30(Lubricant Oil Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

Total Risk Estimates for the Adult Worker - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Central Tendency Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation of Indoor Air_s		Inhalation Ambient Air_s		Inhalation of Indoor Air_{gw}		Inhalation Ambient Air_{gw}		Cumulative Risk		Soil Media Risk		Groundwater Risk	
	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)
Dioxins																				
2,3,7,8-TCDD	-	9.9E-10	-	3.0E-11	-	4.2E-14	-	-	-	-	-	-	-	-	-	1.0E-09	-	1.0E-09	-	-
1,2,3,7,8-PeCDD	-	3.8E-09	-	1.1E-10	-	1.6E-13	-	-	-	-	-	-	-	-	-	3.9E-09	-	3.9E-09	-	-
1,2,3,4,7,8-HxCDD	-	1.1E-09	-	3.3E-11	-	4.6E-14	-	-	-	-	-	-	-	-	-	1.1E-09	-	1.1E-09	-	-
1,2,3,6,7,8-HxCDD	-	5.6E-09	-	1.7E-10	-	2.4E-13	-	-	-	-	-	-	-	-	-	5.7E-09	-	5.7E-09	-	-
1,2,3,7,8,9-HxCDD	-	2.3E-09	-	6.9E-11	-	9.8E-14	-	-	-	-	-	-	-	-	-	2.4E-09	-	2.4E-09	-	-
1,2,3,4,6,7,8-HpCDD	-	4.7E-09	-	1.4E-10	-	6.7E-13	-	-	-	-	-	-	-	-	-	4.9E-09	-	4.9E-09	-	-
OCDD	-	7.5E-09	-	2.2E-10	-	3.2E-13	-	-	-	-	-	-	-	-	-	7.7E-09	-	7.7E-09	-	-
2,3,7,8-TCDF	-	2.4E-10	-	7.3E-12	-	1.0E-14	-	-	-	-	-	-	-	-	-	2.5E-10	-	2.5E-10	-	-
1,2,3,7,8-PeCDF	-	8.9E-12	-	2.7E-13	-	3.8E-16	-	-	-	-	-	-	-	-	-	9.1E-12	-	9.1E-12	-	-
2,3,4,7,8-PeCDF	-	8.4E-10	-	2.5E-11	-	3.6E-14	-	-	-	-	-	-	-	-	-	8.7E-10	-	8.7E-10	-	-
1,2,3,4,7,8-HxCDF	-	5.9E-10	-	1.8E-11	-	2.5E-14	-	-	-	-	-	-	-	-	-	6.0E-10	-	6.0E-10	-	-
1,2,3,6,7,8-HxCDF	-	4.8E-10	-	1.4E-11	-	2.0E-14	-	-	-	-	-	-	-	-	-	4.9E-10	-	4.9E-10	-	-
2,3,4,6,7,8-HxCDF	-	9.1E-10	-	2.7E-11	-	3.8E-14	-	-	-	-	-	-	-	-	-	9.3E-10	-	9.3E-10	-	-
1,2,3,7,8,9-HxCDF	-	9.3E-11	-	2.8E-12	-	4.0E-15	-	-	-	-	-	-	-	-	-	9.6E-11	-	9.6E-11	-	-
1,2,3,4,6,7,8-HpCDF	-	1.8E-09	-	5.5E-11	-	7.8E-14	-	-	-	-	-	-	-	-	-	1.9E-09	-	1.9E-09	-	-
1,2,3,4,7,8,9-HpCDF	-	1.6E-10	-	4.8E-12	-	6.8E-15	-	-	-	-	-	-	-	-	-	1.6E-10	-	1.6E-10	-	-
OCDF	-	1.5E-10	-	4.5E-12	-	6.4E-15	-	-	-	-	-	-	-	-	-	1.6E-10	-	1.6E-10	-	-
PCBs																				
Aroclor-1254	3.5E-03	1.7E-08	4.9E-04	2.4E-09	1.5E-07	7.1E-13	-	-	-	-	-	-	-	-	4.0E-03	1.9E-08	4.0E-03	1.9E-08	-	-
Aroclor-1260	-	1.4E-07	-	2.0E-08	-	6.1E-12	-	-	-	-	-	-	-	-	-	1.6E-07	-	1.6E-07	-	-
PCB-105	-	2.4E-11	-	3.4E-12	-	1.0E-15	-	-	-	-	-	-	-	-	-	2.7E-11	-	2.7E-11	-	-
PCB-114	-	4.6E-13	-	6.4E-14	-	1.9E-17	-	-	-	-	-	-	-	-	-	5.2E-13	-	5.2E-13	-	-
PCB-118	-	4.8E-11	-	6.8E-12	-	2.1E-15	-	-	-	-	-	-	-	-	-	5.5E-11	-	5.5E-11	-	-
PCB-123	-	6.7E-13	-	9.4E-14	-	2.9E-17	-	-	-	-	-	-	-	-	-	7.7E-13	-	7.7E-13	-	-
PCB-126	-	6.1E-09	-	8.6E-10	-	2.6E-13	-	-	-	-	-	-	-	-	-	7.0E-09	-	7.0E-09	-	-
PCB-156	-	1.6E-11	-	2.2E-12	-	6.7E-16	-	-	-	-	-	-	-	-	-	1.8E-11	-	1.8E-11	-	-
PCB-157	-	6.9E-12	-	9.7E-13	-	3.0E-16	-	-	-	-	-	-	-	-	-	7.9E-12	-	7.9E-12	-	-
PCB-167	-	1.2E-11	-	1.7E-12	-	5.1E-16	-	-	-	-	-	-	-	-	-	1.4E-11	-	1.4E-11	-	-
PCB-169	-	1.8E-10	-	2.5E-11	-	7.7E-15	-	-	-	-	-	-	-	-	-	2.1E-10	-	2.1E-10	-	-
PCB-189	-	1.8E-12	-	2.5E-13	-	7.7E-17	-	-	-	-	-	-	-	-	-	2.1E-12	-	2.1E-12	-	-
PCB-77	-	1.2E-11	-	1.7E-12	-	5.2E-16	-	-	-	-	-	-	-	-	-	1.4E-11	-	1.4E-11	-	-
PCB-81	-	6.5E-12	-	9.2E-13	-	2.8E-16	-	-	-	-	-	-	-	-	-	7.5E-12	-	7.5E-12	-	-
Cumulative Risk	1.2E-02	9.4E-07	5.9E-04	8.3E-07	2.4E-06	2.6E-11	4.0E-03	1.5E-07	5.0E-05	2.3E-09	2.5E-05	8.5E-10	7.8E-05	2.3E-09	1.7E-02	1.9E-06	1.7E-02	1.9E-06	1.0E-04	3.2E-09

Total Risk Estimates for the Adult Worker - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Reasonable Maximum Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation of Indoor Air_s		Inhalation Ambient Air_s		Inhalation of Indoor Air_{gw}		Inhalation Ambient Air_{gw}		Cumulative Risk		Soil Media Risk		Groundwater Risk	
	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)
Inorganic Compounds																				
Aluminum	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Antimony	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Arsenic	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Cadmium	5.9E-04	7.5E-08	1.5E-06	1.9E-10	2.6E-06	7.3E-11	-	-	-	-	-	-	-	-	6.0E-04	7.6E-08	6.0E-04	7.6E-08	-	-
Chromium	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Copper	8.6E-04	-	2.1E-05	-	1.2E-06	-	-	-	-	-	-	-	-	-	8.8E-04	-	8.8E-04	-	-	-
Fluoride	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Lead	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Mercury	2.5E-02	-	6.2E-04	-	7.1E-06	-	-	-	-	-	-	-	-	-	2.5E-02	-	2.5E-02	-	-	-
Methyl Mercury	7.1E-05	-	1.8E-06	-	-	-	-	-	-	-	-	-	-	-	7.3E-05	-	7.3E-05	-	-	-
Nickel	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Nitrate	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Silver	1.0E-03	-	2.6E-05	-	-	-	-	-	-	-	-	-	-	-	1.1E-03	-	1.1E-03	-	-	-
Thallium	8.8E-02	-	2.2E-03	-	-	-	-	-	-	-	-	-	-	-	9.0E-02	-	9.0E-02	-	-	-
Vanadium	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Zinc	1.4E-03	-	3.6E-05	-	1.1E-06	-	-	-	-	-	-	-	-	-	1.5E-03	-	1.5E-03	-	-	-
VOCs																				
1,1,1-Trichloroethane	-	-	-	-	-	-	3.9E-05	-	-	-	-	-	-	-	3.9E-05	-	3.9E-05	-	-	-
1,1,2-Trichloro-1,2,2-trifluoroethane	7.8E-10	-	2.0E-10	-	-	-	1.7E-05	-	-	-	-	-	-	-	1.7E-05	-	1.7E-05	-	-	-
1,1-Dichloroethane	-	-	-	-	-	-	1.7E-04	4.5E-08	2.4E-06	6.3E-10	1.1E-06	3.0E-10	2.4E-06	6.3E-10	1.7E-04	4.6E-08	1.7E-04	4.6E-08	3.5E-06	9.3E-10
1,2-Dichloroethane	-	-	-	-	-	-	-	-	5.5E-05	1.9E-09	1.9E-05	6.2E-10	5.5E-05	1.9E-09	7.4E-05	2.5E-09	5.5E-05	1.9E-09	7.4E-05	2.5E-09
1,2-Dichloroethene (total)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
1-Chlorohexane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
2-Butanone	8.8E-08	-	2.2E-08	-	-	-	-	-	-	-	-	-	-	-	1.1E-07	-	1.1E-07	-	-	-
2-Hexanone	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Acetone	1.1E-05	-	2.8E-06	-	-	-	-	-	3.2E-09	-	1.2E-09	-	3.2E-09	-	1.4E-05	-	1.4E-05	-	4.4E-09	-
Benzene	-	-	-	-	-	-	-	-	4.4E-05	1.3E-08	1.7E-05	4.8E-09	4.4E-05	1.3E-08	6.1E-05	1.7E-08	4.4E-05	1.3E-08	6.1E-05	1.7E-08
Carbon disulfide	-	-	-	-	-	-	-	-	-	-	3.9E-06	-	1.3E-05	-	1.7E-05	-	-	-	1.7E-05	-
Chloromethane	-	-	-	-	-	-	-	-	-	-	8.4E-06	-	3.9E-05	-	4.7E-05	-	-	-	4.7E-05	-
cis-1,2-Dichloroethene	-	-	-	-	-	-	-	-	2.4E-05	-	8.4E-06	-	2.4E-05	-	3.2E-05	-	2.4E-05	-	3.2E-05	-
Ethylbenzene	-	-	-	-	-	-	8.4E-05	-	-	-	-	-	-	-	8.4E-05	-	8.4E-05	-	-	-
m,p-Xylene	0.0E+00	-	0.0E+00	-	-	-	1.6E-03	-	-	-	-	-	-	-	1.6E-03	-	1.6E-03	-	-	-
Methylene chloride	3.8E-07	1.1E-10	9.5E-08	2.7E-11	-	-	6.2E-03	8.2E-07	1.6E-06	2.1E-10	3.9E-07	5.3E-11	1.6E-06	2.1E-10	6.2E-03	8.2E-07	6.2E-03	8.2E-07	2.0E-06	2.6E-10
Tetrachloroethene	-	-	-	-	-	-	2.4E-03	1.6E-07	-	-	-	-	-	-	2.4E-03	1.6E-07	2.4E-03	1.6E-07	-	-
Toluene	-	-	-	-	-	-	1.8E-05	-	-	-	-	-	-	-	1.8E-05	-	1.8E-05	-	-	-
Trichloroethene	-	-	-	-	-	-	1.5E-04	5.8E-08	3.7E-06	1.5E-09	1.1E-06	4.5E-10	3.7E-06	1.5E-09	1.5E-04	5.9E-08	1.5E-04	5.9E-08	4.8E-06	1.9E-09
Xylenes (total)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
SVOCs																				
2-Methylnaphthalene	1.2E-05	-	4.0E-06	-	3.0E-10	-	-	-	-	-	-	-	-	-	1.6E-05	-	1.6E-05	-	-	-
Acenaphthene	8.3E-06	-	2.7E-06	-	2.0E-10	-	-	-	-	-	-	-	-	-	1.1E-05	-	1.1E-05	-	-	-
Acenaphthylene	8.9E-07	-	2.9E-07	-	2.2E-11	-	-	-	-	-	-	-	-	-	1.2E-06	-	1.2E-06	-	-	-
Anthracene	6.4E-06	-	2.1E-06	-	1.6E-10	-	-	-	-	-	-	-	-	-	8.5E-06	-	8.5E-06	-	-	-
Benzo(a)anthracene	-	1.1E-05	-	3.6E-06	-	8.7E-11	-	-	-	-	-	-	-	-	-	1.5E-05	-	1.5E-05	-	-
Benzo(a)pyrene	-	1.2E-04	-	3.8E-05	-	9.4E-10	-	-	-	-	-	-	-	-	-	1.6E-04	-	1.6E-04	-	-
Benzo(e)pyrene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Benzo(b)fluoranthene	-	5.4E-06	-	1.7E-06	-	4.3E-11	-	-	-	-	-	-	-	-	-	7.1E-06	-	7.1E-06	-	-
Benzo(g,h,i)perylene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Benzo(k)fluoranthene	-	1.2E-05	-	3.8E-06	-	9.4E-11	-	-	-	-	-	-	-	-	-	1.6E-05	-	1.6E-05	-	-
Chrysene	-	5.1E-07	-	1.6E-07	-	4.0E-12	-	-	-	-	-	-	-	-	-	6.7E-07	-	6.7E-07	-	-
Dibenz(a,h)anthracene	-	3.0E-06	-	9.7E-07	-	7.3E-11	-	-	-	-	-	-	-	-	-	3.9E-06	-	3.9E-06	-	-
Dibenzofuran	2.7E-04	-	8.9E-05	-	6.7E-09	-	-	-	-	-	-	-	-	-	3.6E-04	-	3.6E-04	-	-	-
Fluoranthene	6.4E-04	-	2.1E-04	-	1.6E-08	-	-	-	-	-	-	-	-	-	8.5E-04	-	8.5E-04	-	-	-
Fluorene	1.3E-05	-	4.1E-06	-	3.1E-10	-	-	-	-	-	-	-	-	-	1.7E-05	-	1.7E-05	-	-	-
Indeno(1,2,3-cd)pyrene	-	2.6E-06	-	8.5E-07	-	2.1E-11	-	-	-	-	-	-	-	-	-	3.5E-06	-	3.5E-06	-	-
Naphthalene	5.7E-06	-	1.8E-06	-	3.2E-09	1.1E-13	-	-	-	-	-	-	-	-	7.5E-06	1.1E-13	7.5E-06	1.1E-13	-	-
Perylene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Phenanthrene	3.8E-04	-	1.2E-04	-	9.3E-09	-	-	-	-	-	-	-	-	-	5.0E-04	-	5.0E-04	-	-	-
Pyrene	7.1E-04	-	2.3E-04	-	1.7E-08	-	-	-	-	-	-	-	-	-	9.4E-04	-	9.4E-04	-	-	-
Total Petroleum Hydrocarbons																				
C11-C14(Kerosene Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
C14-C20(Diesel Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
C20-C30(Lubricant Oil Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

Total Risk Estimates for the Adult Worker - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Reasonable Maximum Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation of Indoor Air_s		Inhalation Ambient Air_s		Inhalation of Indoor Air_{gw}		Inhalation Ambient Air_{gw}		Cumulative Risk		Soil Media Risk		Groundwater Risk	
	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)
Dioxins																				
2,3,7,8-TCDD	-	2.9E-08	-	2.2E-09	-	7.2E-13	-	-	-	-	-	-	-	-	-	3.2E-08	-	3.2E-08	-	-
1,2,3,7,8-PeCDD	-	1.1E-07	-	8.4E-09	-	2.7E-12	-	-	-	-	-	-	-	-	-	1.2E-07	-	1.2E-07	-	-
1,2,3,4,7,8-HxCDD	-	3.2E-08	-	2.4E-09	-	7.7E-13	-	-	-	-	-	-	-	-	-	3.4E-08	-	3.4E-08	-	-
1,2,3,6,7,8-HxCDD	-	1.6E-07	-	1.2E-08	-	3.9E-12	-	-	-	-	-	-	-	-	-	1.7E-07	-	1.7E-07	-	-
1,2,3,7,8,9-HxCDD	-	7.4E-08	-	5.5E-09	-	1.8E-12	-	-	-	-	-	-	-	-	-	7.9E-08	-	7.9E-08	-	-
1,2,3,4,6,7,8-HpCDD	-	1.3E-07	-	9.4E-09	-	1.0E-11	-	-	-	-	-	-	-	-	-	1.4E-07	-	1.4E-07	-	-
OCDD	-	1.9E-07	-	1.4E-08	-	4.6E-12	-	-	-	-	-	-	-	-	-	2.0E-07	-	2.0E-07	-	-
2,3,7,8-TCDF	-	6.6E-09	-	4.9E-10	-	1.6E-13	-	-	-	-	-	-	-	-	-	7.1E-09	-	7.1E-09	-	-
1,2,3,7,8-PeCDF	-	3.0E-10	-	2.2E-11	-	7.3E-15	-	-	-	-	-	-	-	-	-	3.2E-10	-	3.2E-10	-	-
2,3,4,7,8-PeCDF	-	2.3E-08	-	1.7E-09	-	5.6E-13	-	-	-	-	-	-	-	-	-	2.5E-08	-	2.5E-08	-	-
1,2,3,4,7,8-HxCDF	-	1.5E-08	-	1.1E-09	-	3.6E-13	-	-	-	-	-	-	-	-	-	1.6E-08	-	1.6E-08	-	-
1,2,3,6,7,8-HxCDF	-	1.4E-08	-	1.0E-09	-	3.4E-13	-	-	-	-	-	-	-	-	-	1.5E-08	-	1.5E-08	-	-
2,3,4,6,7,8-HxCDF	-	2.4E-08	-	1.8E-09	-	5.9E-13	-	-	-	-	-	-	-	-	-	2.6E-08	-	2.6E-08	-	-
1,2,3,7,8,9-HxCDF	-	1.5E-09	-	1.1E-10	-	3.6E-14	-	-	-	-	-	-	-	-	-	1.6E-09	-	1.6E-09	-	-
1,2,3,4,6,7,8-HpCDF	-	4.2E-08	-	3.2E-09	-	1.0E-12	-	-	-	-	-	-	-	-	-	4.6E-08	-	4.6E-08	-	-
1,2,3,4,7,8,9-HpCDF	-	3.6E-09	-	2.7E-10	-	8.8E-14	-	-	-	-	-	-	-	-	-	3.9E-09	-	3.9E-09	-	-
OCDF	-	3.8E-09	-	2.9E-10	-	9.4E-14	-	-	-	-	-	-	-	-	-	4.1E-09	-	4.1E-09	-	-
PCBs																				
Aroclor-1254	4.2E-02	5.6E-07	1.5E-02	2.0E-07	1.0E-06	1.4E-11	-	-	-	-	-	-	-	-	5.7E-02	7.6E-07	5.7E-02	7.6E-07	-	-
Aroclor-1260	-	1.0E-05	-	3.5E-06	-	2.5E-10	-	-	-	-	-	-	-	-	-	1.3E-05	-	1.3E-05	-	-
PCB-105	-	1.6E-09	-	5.6E-10	-	3.9E-14	-	-	-	-	-	-	-	-	-	2.2E-09	-	2.2E-09	-	-
PCB-114	-	2.8E-11	-	9.9E-12	-	7.0E-16	-	-	-	-	-	-	-	-	-	3.8E-11	-	3.8E-11	-	-
PCB-118	-	3.2E-09	-	1.1E-09	-	7.8E-14	-	-	-	-	-	-	-	-	-	4.3E-09	-	4.3E-09	-	-
PCB-123	-	4.5E-11	-	1.6E-11	-	1.1E-15	-	-	-	-	-	-	-	-	-	6.1E-11	-	6.1E-11	-	-
PCB-126	-	4.1E-07	-	1.4E-07	-	1.0E-11	-	-	-	-	-	-	-	-	-	5.6E-07	-	5.6E-07	-	-
PCB-156	-	1.1E-09	-	3.7E-10	-	2.6E-14	-	-	-	-	-	-	-	-	-	1.4E-09	-	1.4E-09	-	-
PCB-157	-	4.8E-10	-	1.7E-10	-	1.2E-14	-	-	-	-	-	-	-	-	-	6.5E-10	-	6.5E-10	-	-
PCB-167	-	8.3E-10	-	2.9E-10	-	2.0E-14	-	-	-	-	-	-	-	-	-	1.1E-09	-	1.1E-09	-	-
PCB-169	-	1.2E-08	-	4.3E-09	-	3.0E-13	-	-	-	-	-	-	-	-	-	1.7E-08	-	1.7E-08	-	-
PCB-189	-	1.2E-10	-	4.3E-11	-	3.0E-15	-	-	-	-	-	-	-	-	-	1.7E-10	-	1.7E-10	-	-
PCB-77	-	8.3E-10	-	2.9E-10	-	2.0E-14	-	-	-	-	-	-	-	-	-	1.1E-09	-	1.1E-09	-	-
PCB-81	-	4.4E-10	-	1.5E-10	-	1.1E-14	-	-	-	-	-	-	-	-	-	5.9E-10	-	5.9E-10	-	-
Cumulative Risk	1.6E-01	1.6E-04	1.8E-02	5.3E-05	1.3E-05	1.6E-09	1.1E-02	1.1E-06	1.3E-04	1.7E-08	5.9E-05	6.2E-09	1.8E-04	1.7E-08	1.9E-01	2.2E-04	1.9E-01	2.2E-04	2.4E-04	2.3E-08

Notes:
Inhalation Indoor Air_{s-gw} - Exposure associated with indoor air concentrations of COPCs modeled from soil vapor, soil, or groundwater.
Inhalation Ambient Air_{s-gw} - Exposure associated with ambient air concentrations of COPCs modeled from soil or groundwater.
HQ - hazard quotient
HI - hazard index
Risk - incremental increased lifetime cancer risk
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCDD/PCDF - Polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.
PCB - polychlorinated biphenyls
COPC - chemical of potential concern
"-" indicates that either adequate toxicity data were not available for a chemical or the exposure pathway was not applicable to that chemical.

Table C3-6a (1 of 4)

Total Risk Estimates for the Adult Recreator - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Central Tendency Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation Ambient Air_s		Inhalation Ambient Air_{gw}		Cumulative Risk		Soil Media Risk		Groundwater Risk	
	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)
Inorganic Compounds																
Cadmium	2.5E-05	1.1E-09	2.8E-08	1.3E-12	1.9E-07	1.9E-12	-	-	-	-	2.5E-05	1.1E-09	2.5E-05	1.1E-09	-	-
Copper	2.6E-05	-	2.9E-07	-	6.4E-08	-	-	-	-	-	2.6E-05	-	2.6E-05	-	-	-
Fluoride	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Lead	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Mercury	3.1E-04	-	3.5E-06	-	1.5E-07	-	-	-	-	-	3.1E-04	-	3.1E-04	-	-	-
Methyl Mercury	8.5E-07	-	9.7E-09	-	-	-	-	-	-	-	8.6E-07	-	8.6E-07	-	-	-
Nitrate	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Silver	7.6E-06	-	8.6E-08	-	-	-	-	-	-	-	7.7E-06	-	7.7E-06	-	-	-
Thallium	2.0E-04	-	2.3E-06	-	-	-	-	-	-	-	2.0E-04	-	2.0E-04	-	-	-
Zinc	2.8E-05	-	3.2E-07	-	-	-	-	-	-	-	2.8E-05	-	2.8E-05	-	-	-
VOCs																
1,1,1-Trichloroethane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
1,1,2-Trichloro-1,2,2-trifluoroethane	2.0E-11	-	2.2E-12	-	-	-	-	-	-	-	2.2E-11	-	2.2E-11	-	-	-
1,1-Dichloroethane	-	-	-	-	-	-	1.0E-07	9.9E-12	1.0E-07	9.9E-12	1.0E-07	9.9E-12	1.0E-07	9.9E-12	1.0E-07	9.9E-12
1,2-Dichloroethane	-	-	-	-	-	-	2.4E-06	2.9E-11	2.4E-06	2.9E-11	2.4E-06	2.9E-11	2.4E-06	2.9E-11	2.4E-06	2.9E-11
1,2-Dichloroethene (total)	6.9E-08	-	7.9E-09	-	-	-	-	-	-	-	7.7E-08	-	7.7E-08	-	-	-
1-Chlorohexane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
2-Butanone	3.0E-09	-	3.4E-10	-	-	-	-	-	-	-	3.4E-09	-	3.4E-09	-	-	-
2-Hexanone	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Acetone	3.7E-08	-	4.2E-09	-	-	-	1.4E-10	-	1.4E-10	-	4.1E-08	-	4.1E-08	-	1.4E-10	-
Benzene	-	-	-	-	-	-	1.9E-06	2.0E-10	1.9E-06	2.0E-10	1.9E-06	2.0E-10	1.9E-06	2.0E-10	1.9E-06	2.0E-10
Carbon disulfide	-	-	-	-	-	-	-	-	5.7E-07	-	5.7E-07	-	-	-	5.7E-07	-
Chloromethane	-	-	-	-	-	-	-	-	1.7E-06	-	1.7E-06	-	-	-	1.7E-06	-
cis-1,2-Dichloroethene	-	-	-	-	-	-	1.0E-06	-	1.0E-06	-	1.0E-06	-	1.0E-06	-	1.0E-06	-
Ethylbenzene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
m,p-Xylene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Methylene chloride	1.1E-08	1.1E-12	1.2E-09	1.2E-13	-	-	6.8E-08	3.3E-12	6.8E-08	3.3E-12	8.0E-08	4.5E-12	8.0E-08	4.5E-12	6.8E-08	3.3E-12
Tetrachloroethene	1.0E-07	6.6E-11	1.2E-08	7.5E-12	-	-	-	-	-	-	1.1E-07	7.3E-11	1.1E-07	7.3E-11	-	-
Toluene	3.4E-08	-	3.9E-09	-	-	-	-	-	-	-	3.8E-08	-	3.8E-08	-	-	-
Trichloroethene	6.0E-06	2.8E-12	6.9E-07	3.2E-13	-	-	1.6E-07	2.3E-11	1.6E-07	2.3E-11	6.9E-06	2.6E-11	6.9E-06	2.6E-11	1.6E-07	2.3E-11
Xylenes (total)	6.2E-09	-	7.1E-10	-	-	-	-	-	-	-	6.9E-09	-	6.9E-09	-	-	-
SVOCs																
2-Methylnaphthalene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Acenaphthene	3.6E-08	-	5.3E-09	-	1.5E-12	-	-	-	-	-	4.1E-08	-	4.1E-08	-	-	-
Acenaphthylene	5.0E-08	-	7.4E-09	-	2.1E-12	-	-	-	-	-	5.8E-08	-	5.8E-08	-	-	-
Anthracene	6.3E-09	-	9.4E-10	-	2.7E-13	-	-	-	-	-	7.3E-09	-	7.3E-09	-	-	-
Benzo(a)anthracene	-	2.5E-10	-	3.7E-11	-	3.5E-15	-	-	-	-	-	2.9E-10	-	2.9E-10	-	-
Benzo(a)pyrene	-	2.5E-09	-	3.8E-10	-	3.5E-14	-	-	-	-	-	2.9E-09	-	2.9E-09	-	-
Benzo(b)fluoranthene	-	3.4E-10	-	5.1E-11	-	4.8E-15	-	-	-	-	-	3.9E-10	-	3.9E-10	-	-
Benzo(g,h,i)perylene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Benzo(k)fluoranthene	-	2.1E-10	-	3.1E-11	-	2.9E-15	-	-	-	-	-	2.4E-10	-	2.4E-10	-	-
Chrysene	-	3.1E-11	-	4.6E-12	-	4.3E-16	-	-	-	-	-	3.6E-11	-	3.6E-11	-	-
Dibenz(a,h)anthracene	-	7.0E-10	-	1.0E-10	-	3.0E-14	-	-	-	-	-	8.0E-10	-	8.0E-10	-	-
Dibenzofuran	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Fluoranthene	7.3E-08	-	1.1E-08	-	3.1E-12	-	-	-	-	-	8.4E-08	-	8.4E-08	-	-	-
Fluorene	5.4E-08	-	8.0E-09	-	2.3E-12	-	-	-	-	-	6.2E-08	-	6.2E-08	-	-	-
Indeno(1,2,3-cd)pyrene	-	2.4E-10	-	3.6E-11	-	3.3E-15	-	-	-	-	-	2.8E-10	-	2.8E-10	-	-
Naphthalene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Phenanthrene	1.3E-07	-	1.9E-08	-	5.5E-12	-	-	-	-	-	1.5E-07	-	1.5E-07	-	-	-
Perylene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Pyrene	8.7E-08	-	1.3E-08	-	3.7E-12	-	-	-	-	-	1.0E-07	-	1.0E-07	-	-	-
Total Petroleum Hydrocarbons																
C11-C14(Kerosene Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
C14-C20(Diesel Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
C20-C30(Lubricant Oil Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

Table C3-6a (2 of 4)

Total Risk Estimates for the Adult Recreator - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Central Tendency Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation Ambient Air_s		Inhalation Ambient Air_{gw}		Cumulative Risk		Soil Media Risk		Groundwater Risk	
	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (mg/kg-day)	Risk (mg/kg-day)	HQ (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)
Dioxins																
2,3,7,8-TCDD	-	2.1E-10	-	7.1E-12	-	8.9E-15	-	-	-	-	-	2.2E-10	-	2.2E-10	-	-
1,2,3,7,8-PeCDD	-	8.4E-10	-	2.9E-11	-	3.6E-14	-	-	-	-	-	8.7E-10	-	8.7E-10	-	-
1,2,3,4,7,8-HxCDD	-	3.1E-10	-	1.1E-11	-	1.3E-14	-	-	-	-	-	3.2E-10	-	3.2E-10	-	-
1,2,3,6,7,8-HxCDD	-	1.2E-09	-	4.1E-11	-	5.1E-14	-	-	-	-	-	1.2E-09	-	1.2E-09	-	-
1,2,3,7,8,9-HxCDD	-	4.5E-10	-	1.5E-11	-	1.9E-14	-	-	-	-	-	4.7E-10	-	4.7E-10	-	-
1,2,3,4,6,7,8-HpCDD	-	1.3E-09	-	4.4E-11	-	1.8E-13	-	-	-	-	-	1.3E-09	-	1.3E-09	-	-
OCDD	-	1.9E-09	-	6.6E-11	-	8.1E-14	-	-	-	-	-	2.0E-09	-	2.0E-09	-	-
2,3,7,8-TCDF	-	4.2E-11	-	1.4E-12	-	1.8E-15	-	-	-	-	-	4.3E-11	-	4.3E-11	-	-
1,2,3,7,8-PeCDF	-	1.9E-12	-	6.5E-14	-	8.1E-17	-	-	-	-	-	2.0E-12	-	2.0E-12	-	-
2,3,4,7,8-PeCDF	-	1.9E-10	-	6.4E-12	-	7.9E-15	-	-	-	-	-	1.9E-10	-	1.9E-10	-	-
1,2,3,4,7,8-HxCDF	-	1.4E-10	-	4.6E-12	-	5.8E-15	-	-	-	-	-	1.4E-10	-	1.4E-10	-	-
1,2,3,6,7,8-HxCDF	-	1.2E-10	-	4.0E-12	-	5.0E-15	-	-	-	-	-	1.2E-10	-	1.2E-10	-	-
2,3,4,6,7,8-HxCDF	-	2.9E-10	-	1.0E-11	-	1.2E-14	-	-	-	-	-	3.0E-10	-	3.0E-10	-	-
1,2,3,7,8,9-HxCDF	-	2.8E-11	-	9.4E-13	-	1.2E-15	-	-	-	-	-	2.9E-11	-	2.9E-11	-	-
1,2,3,4,6,7,8-HpCDF	-	4.0E-10	-	1.4E-11	-	1.7E-14	-	-	-	-	-	4.1E-10	-	4.1E-10	-	-
1,2,3,4,7,8,9-HpCDF	-	3.7E-11	-	1.3E-12	-	1.6E-15	-	-	-	-	-	3.8E-11	-	3.8E-11	-	-
OCDF	-	3.1E-11	-	1.1E-12	-	1.3E-15	-	-	-	-	-	3.2E-11	-	3.2E-11	-	-
PCBs																
Aroclor-1254	4.0E-04	1.9E-09	6.3E-05	3.0E-10	1.7E-08	8.1E-14	-	-	-	-	4.6E-04	2.2E-09	4.6E-04	2.2E-09	-	-
Aroclor-1260	-	1.6E-08	-	2.5E-09	-	6.6E-13	-	-	-	-	-	1.8E-08	-	1.8E-08	-	-
PCB-105	-	2.6E-12	-	4.2E-13	-	1.1E-16	-	-	-	-	-	3.0E-12	-	3.0E-12	-	-
PCB-114	-	5.0E-14	-	8.0E-15	-	2.1E-18	-	-	-	-	-	5.8E-14	-	5.8E-14	-	-
PCB-118	-	5.3E-12	-	8.4E-13	-	2.2E-16	-	-	-	-	-	6.1E-12	-	6.1E-12	-	-
PCB-123	-	7.3E-14	-	1.2E-14	-	3.1E-18	-	-	-	-	-	8.5E-14	-	8.5E-14	-	-
PCB-126	-	6.7E-10	-	1.1E-10	-	2.8E-14	-	-	-	-	-	7.7E-10	-	7.7E-10	-	-
PCB-156	-	1.7E-12	-	2.7E-13	-	7.3E-17	-	-	-	-	-	2.0E-12	-	2.0E-12	-	-
PCB-157	-	7.6E-13	-	1.2E-13	-	3.2E-17	-	-	-	-	-	8.8E-13	-	8.8E-13	-	-
PCB-167	-	1.3E-12	-	2.1E-13	-	5.6E-17	-	-	-	-	-	1.5E-12	-	1.5E-12	-	-
PCB-169	-	2.0E-11	-	3.1E-12	-	8.3E-16	-	-	-	-	-	2.3E-11	-	2.3E-11	-	-
PCB-189	-	2.0E-13	-	3.1E-14	-	8.3E-18	-	-	-	-	-	2.3E-13	-	2.3E-13	-	-
PCB-77	-	1.3E-12	-	2.1E-13	-	5.7E-17	-	-	-	-	-	1.6E-12	-	1.6E-12	-	-
PCB-81	-	7.1E-13	-	1.1E-13	-	3.0E-17	-	-	-	-	-	8.3E-13	-	8.3E-13	-	-
Total PCB Congeners	-	7.0E-10	-	1.1E-10	-	3.0E-14	-	-	-	-	-	8.1E-10	-	8.1E-10	-	-
Cumulative Risk	1.0E-03	3.1E-08	7.0E-05	3.7E-09	4.2E-07	3.2E-12	5.7E-06	2.6E-10	7.9E-06	2.6E-10	1.1E-03	3.5E-08	1.1E-03	3.5E-08	7.9E-06	2.6E-10

Table C3-6a (3 of 4)

Total Risk Estimates for the Adult Recreator - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Reasonable Maximum Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation Ambient Air_s		Inhalation Ambient Air_{gw}		Cumulative Risk		Soil Media Risk		Groundwater Risk	
	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (mg/kg-day)	Risk (mg/kg-day)	HQ (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)
Inorganic Compounds																
Cadmium	2.2E-04	2.7E-08	1.1E-05	1.4E-09	8.3E-07	2.3E-11	-	-	-	-	2.3E-04	2.8E-08	2.3E-04	2.8E-08	-	-
Copper	2.2E-04	-	1.1E-04	-	2.8E-07	-	-	-	-	-	3.4E-04	-	3.4E-04	-	-	-
Fluoride	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Lead	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Mercury	2.9E-03	-	1.5E-03	-	7.1E-07	-	-	-	-	-	4.4E-03	-	4.4E-03	-	-	-
Methyl Mercury	7.1E-06	-	3.6E-06	-	-	-	-	-	-	-	1.1E-05	-	1.1E-05	-	-	-
Nitrate	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Silver	1.1E-04	-	5.7E-05	-	-	-	-	-	-	-	1.7E-04	-	1.7E-04	-	-	-
Thallium	8.1E-04	-	4.1E-04	-	-	-	-	-	-	-	1.2E-03	-	1.2E-03	-	-	-
Zinc	2.9E-04	-	1.5E-04	-	-	-	-	-	-	-	4.3E-04	-	4.3E-04	-	-	-
VOCs																
1,1,1-Trichloroethane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
1,1,2-Trichloro-1,2,2-trifluoroethane	7.8E-11	-	4.0E-10	-	-	-	-	-	-	-	4.8E-10	-	4.8E-10	-	-	-
1,1-Dichloroethane	-	-	-	-	-	-	2.1E-07	5.3E-11	2.1E-07	5.3E-11	2.1E-07	5.3E-11	2.1E-07	5.3E-11	2.1E-07	5.3E-11
1,2-Dichloroethane	-	-	-	-	-	-	4.8E-06	1.5E-10	4.8E-06	1.5E-10	4.8E-06	1.5E-10	4.8E-06	1.5E-10	4.8E-06	1.5E-10
1,2-Dichloroethene (total)	6.8E-07	-	3.5E-06	-	-	-	-	-	-	-	4.2E-06	-	4.2E-06	-	-	-
1-Chlorohexane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
2-Butanone	1.2E-08	-	6.2E-08	-	-	-	-	-	-	-	7.4E-08	-	7.4E-08	-	-	-
2-Hexanone	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Acetone	9.1E-07	-	4.7E-06	-	-	-	2.8E-10	-	2.8E-10	-	5.6E-06	-	5.6E-06	-	2.8E-10	-
Benzene	-	-	-	-	-	-	3.8E-06	1.1E-09	3.8E-06	1.1E-09	3.8E-06	1.1E-09	3.8E-06	1.1E-09	3.8E-06	1.1E-09
Carbon disulfide	-	-	-	-	-	-	-	-	1.1E-06	-	1.1E-06	-	-	-	1.1E-06	-
Chloromethane	-	-	-	-	-	-	-	-	3.4E-06	-	3.4E-06	-	-	-	3.4E-06	-
cis-1,2-Dichloroethene	-	-	-	-	-	-	2.1E-06	-	2.1E-06	-	2.1E-06	-	2.1E-06	-	2.1E-06	-
Ethylbenzene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
m,p-Xylene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Methylene chloride	4.2E-08	1.1E-11	2.2E-07	5.8E-11	-	-	1.4E-07	1.7E-11	1.4E-07	1.7E-11	4.0E-07	8.7E-11	4.0E-07	8.7E-11	1.4E-07	1.7E-11
Tetrachloroethene	1.7E-06	3.0E-09	8.9E-06	1.5E-08	-	-	-	-	-	-	1.1E-05	1.8E-08	1.1E-05	1.8E-08	-	-
Toluene	8.4E-07	-	4.3E-06	-	-	-	-	-	-	-	5.1E-06	-	5.1E-06	-	-	-
Trichloroethene	1.3E-04	1.6E-10	6.8E-04	8.4E-10	-	-	3.2E-07	1.2E-10	3.2E-07	1.2E-10	8.1E-04	1.1E-09	8.1E-04	1.1E-09	3.2E-07	1.2E-10
Xylenes (total)	5.0E-08	-	2.6E-07	-	-	-	-	-	-	-	3.1E-07	-	3.1E-07	-	-	-
SVOCs																
2-Methylnaphthalene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Acenaphthene	3.3E-07	-	2.2E-06	-	6.9E-12	-	-	-	-	-	2.5E-06	-	2.5E-06	-	-	-
Acenaphthylene	5.5E-07	-	3.7E-06	-	1.2E-11	-	-	-	-	-	4.3E-06	-	4.3E-06	-	-	-
Anthracene	5.3E-08	-	3.6E-07	-	1.1E-12	-	-	-	-	-	4.1E-07	-	4.1E-07	-	-	-
Benzo(a)anthracene	-	1.1E-08	-	7.4E-08	-	7.7E-14	-	-	-	-	-	8.6E-08	-	8.6E-08	-	-
Benzo(a)pyrene	-	1.1E-07	-	7.4E-07	-	7.7E-13	-	-	-	-	-	8.6E-07	-	8.6E-07	-	-
Benzo(e)pyrene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Benzo(b)fluoranthene	-	2.0E-08	-	1.3E-07	-	1.4E-13	-	-	-	-	-	1.5E-07	-	1.5E-07	-	-
Benzo(g,h,i)perylene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Benzo(k)fluoranthene	-	6.4E-09	-	4.3E-08	-	4.4E-14	-	-	-	-	-	4.9E-08	-	4.9E-08	-	-
Chrysene	-	1.6E-09	-	1.1E-08	-	1.1E-14	-	-	-	-	-	1.2E-08	-	1.2E-08	-	-
Dibenz(a,h)anthracene	-	2.2E-08	-	1.5E-07	-	4.6E-13	-	-	-	-	-	1.7E-07	-	1.7E-07	-	-
Dibenzofuran	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Fluoranthene	1.8E-06	-	1.2E-05	-	3.9E-11	-	-	-	-	-	1.4E-05	-	1.4E-05	-	-	-
Fluorene	4.9E-07	-	3.2E-06	-	1.0E-11	-	-	-	-	-	3.7E-06	-	3.7E-06	-	-	-
Indeno(1,2,3-cd)pyrene	-	1.0E-08	-	6.8E-08	-	7.0E-14	-	-	-	-	-	7.8E-08	-	7.8E-08	-	-
Naphthalene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Perylene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Phenanthrene	1.3E-06	-	8.7E-06	-	2.8E-11	-	-	-	-	-	1.0E-05	-	1.0E-05	-	-	-
Pyrene	1.0E-06	-	6.8E-06	-	2.2E-11	-	-	-	-	-	7.8E-06	-	7.8E-06	-	-	-
Total Petroleum Hydrocarbons																
C11-C14(Kerosene Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
C14-C20(Diesel Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
C20-C30(Lubricant Oil Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

Table C3-6a (4 of 4)

Total Risk Estimates for the Adult Recreator - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Reasonable Maximum Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation Ambient Air_s		Inhalation Ambient Air_{gw}		Cumulative Risk		Soil Media Risk		Groundwater Risk	
	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (mg/kg-day)	Risk (mg/kg-day)	HQ (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)
Dioxins																
2,3,7,8-TCDD	-	4.3E-09	-	6.7E-09	-	9.2E-14	-	-	-	-	-	1.1E-08	-	1.1E-08	-	-
1,2,3,7,8-PeCDD	-	1.8E-08	-	2.7E-08	-	3.8E-13	-	-	-	-	-	4.5E-08	-	4.5E-08	-	-
1,2,3,4,7,8-HxCDD	-	7.4E-09	-	1.1E-08	-	1.6E-13	-	-	-	-	-	1.9E-08	-	1.9E-08	-	-
1,2,3,6,7,8-HxCDD	-	2.4E-08	-	3.7E-08	-	5.1E-13	-	-	-	-	-	6.1E-08	-	6.1E-08	-	-
1,2,3,7,8,9-HxCDD	-	8.1E-09	-	1.3E-08	-	1.7E-13	-	-	-	-	-	2.1E-08	-	2.1E-08	-	-
1,2,3,4,6,7,8-HpCDD	-	2.9E-08	-	4.5E-08	-	2.1E-12	-	-	-	-	-	7.3E-08	-	7.3E-08	-	-
OCDD	-	4.1E-08	-	6.3E-08	-	8.7E-13	-	-	-	-	-	1.0E-07	-	1.0E-07	-	-
2,3,7,8-TCDF	-	6.4E-10	-	9.9E-10	-	1.4E-14	-	-	-	-	-	1.6E-09	-	1.6E-09	-	-
1,2,3,7,8-PeCDF	-	4.2E-11	-	6.5E-11	-	8.9E-16	-	-	-	-	-	1.1E-10	-	1.1E-10	-	-
2,3,4,7,8-PeCDF	-	3.8E-09	-	5.9E-09	-	8.1E-14	-	-	-	-	-	9.7E-09	-	9.7E-09	-	-
1,2,3,4,7,8-HxCDF	-	2.7E-09	-	4.2E-09	-	5.8E-14	-	-	-	-	-	6.9E-09	-	6.9E-09	-	-
1,2,3,6,7,8-HxCDF	-	2.6E-09	-	4.0E-09	-	5.5E-14	-	-	-	-	-	6.5E-09	-	6.5E-09	-	-
2,3,4,6,7,8-HxCDF	-	7.2E-09	-	1.1E-08	-	1.5E-13	-	-	-	-	-	1.8E-08	-	1.8E-08	-	-
1,2,3,7,8,9-HxCDF	-	7.9E-10	-	1.2E-09	-	1.7E-14	-	-	-	-	-	2.0E-09	-	2.0E-09	-	-
1,2,3,4,6,7,8-HpCDF	-	7.8E-09	-	1.2E-08	-	1.7E-13	-	-	-	-	-	2.0E-08	-	2.0E-08	-	-
1,2,3,4,7,8,9-HpCDF	-	7.5E-10	-	1.2E-09	-	1.6E-14	-	-	-	-	-	1.9E-09	-	1.9E-09	-	-
OCDF	-	5.8E-10	-	8.9E-10	-	1.2E-14	-	-	-	-	-	1.5E-09	-	1.5E-09	-	-
PCBs																
Aroclor-1254	4.2E-03	5.4E-08	3.0E-02	3.9E-07	8.9E-08	1.1E-12	-	-	-	-	3.4E-02	4.4E-07	3.4E-02	4.4E-07	-	-
Aroclor-1260	-	9.2E-07	-	6.6E-06	-	1.9E-11	-	-	-	-	-	7.5E-06	-	7.5E-06	-	-
PCB-105	-	1.4E-10	-	9.9E-10	-	2.9E-15	-	-	-	-	-	1.1E-09	-	1.1E-09	-	-
PCB-114	-	2.5E-12	-	1.8E-11	-	5.2E-17	-	-	-	-	-	2.0E-11	-	2.0E-11	-	-
PCB-118	-	2.8E-10	-	2.0E-09	-	5.9E-15	-	-	-	-	-	2.3E-09	-	2.3E-09	-	-
PCB-123	-	3.9E-12	-	2.8E-11	-	8.3E-17	-	-	-	-	-	3.2E-11	-	3.2E-11	-	-
PCB-126	-	3.6E-08	-	2.6E-07	-	7.6E-13	-	-	-	-	-	2.9E-07	-	2.9E-07	-	-
PCB-156	-	9.2E-11	-	6.6E-10	-	2.0E-15	-	-	-	-	-	7.5E-10	-	7.5E-10	-	-
PCB-157	-	4.1E-11	-	3.0E-10	-	8.8E-16	-	-	-	-	-	3.4E-10	-	3.4E-10	-	-
PCB-167	-	7.2E-11	-	5.2E-10	-	1.5E-15	-	-	-	-	-	5.9E-10	-	5.9E-10	-	-
PCB-169	-	1.1E-09	-	7.7E-09	-	2.3E-14	-	-	-	-	-	8.8E-09	-	8.8E-09	-	-
PCB-189	-	1.1E-11	-	7.7E-11	-	2.3E-16	-	-	-	-	-	8.8E-11	-	8.8E-11	-	-
PCB-77	-	7.1E-11	-	5.1E-10	-	1.5E-15	-	-	-	-	-	5.8E-10	-	5.8E-10	-	-
PCB-81	-	3.8E-11	-	2.7E-10	-	8.1E-16	-	-	-	-	-	3.1E-10	-	3.1E-10	-	-
Total PCB Congeners	-	3.8E-08	-	2.7E-07	-	8.0E-13	-	-	-	-	-	3.1E-07	-	3.1E-07	-	-
Cumulative Risk	8.9E-03	1.3E-06	3.3E-02	8.4E-06	1.9E-06	5.0E-11	1.1E-05	1.4E-09	1.6E-05	1.4E-09	4.2E-02	9.8E-06	4.2E-02	9.8E-06	1.6E-05	1.4E-09

Notes:
Inhalation Ambient Air_{s-gw} - Exposure associated with ambient air concentrations of COPCs modeled from soil or groundwater.
HQ - hazard quotient
HI - hazard index
Risk - incremental increased lifetime cancer risk
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCDD/PCDF - Polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.
PCB - polychlorinated biphenyls
COPC - chemical of potential concern
"-" indicates that either adequate toxicity data were not available for a chemical or the exposure pathway was not applicable to that chemical.
mg/kg-day - milligrams per kilogram per day
HIs and cancer risks for PCB congeners. These results not included in cumulative risk estimates.

Table C3-6b (1 of 4)

Total Risk Estimates for the Adult Recreator - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Central Tendency Exposure

Chemical	Soil Ingestion HQ (unitless)	Soil Ingestion Risk (unitless)	Soil Dermal Contact HQ (unitless)	Soil Dermal Contact Risk (unitless)	Soil Particulate Inhalation HQ (unitless)	Soil Particulate Inhalation Risk (unitless)	Inhalation Ambient Air_s HQ (unitless)	Inhalation Ambient Air_s Risk (unitless)	Inhalation Ambient Air_{gw} HQ (unitless)	Inhalation Ambient Air_{gw} Risk (unitless)	Cumulative Risk HI (unitless)	Cumulative Risk Risk (unitless)	Soil Media Risk HI (unitless)	Soil Media Risk Risk (unitless)	Groundwater Risk HI (unitless)	Groundwater Risk Risk (unitless)	Surface Water Ingestion HI (unitless)	Surface Water Ingestion Risk (unitless)	Surface Water Dermal Contact HI (unitless)	Surface Water Dermal Contact Risk (unitless)	Surface Water Risk HI (unitless)	Surface Water Risk Risk (unitless)
Inorganic Compounds																						
Aluminum	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	5.0E-05	-	9.1E-06	-	5.9E-05	-
Antimony	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1.1E-04	-	2.0E-05	-	1.3E-04	-
Arsenic	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1.1E-03	3.7E-07	2.0E-04	6.8E-08	1.3E-03	4.4E-07
Barium	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Boron	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Cadmium	1.2E-05	5.3E-10	1.3E-08	6.1E-13	8.9E-08	9.1E-13	-	-	-	-	1.2E-05	5.4E-10	1.2E-05	5.4E-10	-	-	7.4E-06	3.4E-10	1.4E-06	6.2E-11	8.8E-06	4.0E-10
Chromium	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	7.5E-08	-	1.4E-08	-	8.9E-08	-
Copper	1.2E-05	-	1.4E-07	-	3.1E-08	-	-	-	-	-	1.2E-05	-	1.2E-05	-	-	-	5.3E-06	-	9.7E-07	-	6.3E-06	-
Fluoride	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Lead	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Mercury	3.5E-04	-	4.0E-06	-	1.8E-07	-	-	-	-	-	3.5E-04	-	3.5E-04	-	-	-	1.9E-05	-	3.5E-06	-	2.3E-05	-
Methyl Mercury	8.5E-07	-	9.7E-09	-	-	-	-	-	-	-	8.6E-07	-	8.6E-07	-	-	-	-	-	-	-	-	-
Nickel	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1.0E-05	-	3.6E-07	-	1.0E-05	-
Nitrate	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Silver	9.9E-06	-	1.1E-07	-	-	-	-	-	-	-	1.0E-05	-	1.0E-05	-	-	-	-	-	-	-	-	-
Thallium	2.0E-04	-	2.3E-06	-	-	-	-	-	-	-	2.0E-04	-	2.0E-04	-	-	-	1.3E-04	-	2.3E-05	-	1.5E-04	-
Vanadium	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	2.0E-04	-	3.6E-05	-	2.3E-04	-
Zinc	1.4E-05	-	1.6E-07	-	-	-	-	-	-	-	1.4E-05	-	1.4E-05	-	-	-	-	-	-	-	-	-
VOCs																						
1,1,1-Trichloroethane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1.3E-07	-	0.0E+00	-	1.3E-07	-
1,1,2-Trichloro-1,2,2-trifluoroethane	2.0E-11	-	2.2E-12	-	-	-	-	-	-	-	2.2E-11	-	2.2E-11	-	-	-	-	-	-	-	-	-
1,1-Dichloroethane	-	-	-	-	-	-	1.0E-07	9.9E-12	1.0E-07	9.9E-12	1.0E-07	9.9E-12	1.0E-07	9.9E-12	1.0E-07	9.9E-12	-	-	-	-	-	-
1,2-Dichloroethane	-	-	-	-	-	-	2.4E-06	2.9E-11	2.4E-06	2.9E-11	2.4E-06	2.9E-11	2.4E-06	2.9E-11	2.4E-06	2.9E-11	-	-	-	-	-	-
1,2-Dichloroethene (total)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
1-Chlorohexane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
2-Butanone	1.7E-09	-	2.0E-10	-	-	-	-	-	-	-	1.9E-09	-	1.9E-09	-	-	-	-	-	-	-	-	-
2-Hexanone	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Acetone	6.0E-08	-	6.8E-09	-	-	-	1.4E-10	-	1.4E-10	-	6.6E-08	-	6.6E-08	-	1.4E-10	-	-	-	-	-	-	-
Benzene	-	-	-	-	-	-	1.9E-06	2.0E-10	1.9E-06	2.0E-10	1.9E-06	2.0E-10	1.9E-06	2.0E-10	1.9E-06	2.0E-10	-	-	-	-	-	-
Carbon disulfide	-	-	-	-	-	-	-	-	5.7E-07	-	5.7E-07	-	-	-	5.7E-07	-	-	-	-	-	-	-
Chloromethane	-	-	-	-	-	-	-	-	1.7E-06	-	1.7E-06	-	-	-	1.7E-06	-	-	-	-	-	-	-
cis-1,2-Dichloroethene	-	-	-	-	-	-	1.0E-06	-	1.0E-06	-	1.0E-06	-	1.0E-06	-	1.0E-06	-	-	-	-	-	-	-
Ethylbenzene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
m,p-Xylene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Methylene chloride	8.3E-09	8.4E-13	9.5E-10	9.6E-14	-	-	6.8E-08	3.3E-12	6.8E-08	3.3E-12	7.7E-08	4.2E-12	7.7E-08	4.2E-12	6.8E-08	3.3E-12	-	-	-	-	-	-
Tetrachloroethene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Toluene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Trichloroethene	-	-	-	-	-	-	1.6E-07	2.3E-11	1.6E-07	2.3E-11	1.6E-07	2.3E-11	1.6E-07	2.3E-11	1.6E-07	2.3E-11	1.1E-04	5.0E-11	2.3E-04	1.1E-10	3.4E-04	1.6E-10
Xylenes (total)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
SVOCs																						
2-Methylnaphthalene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Acenaphthene	2.1E-08	-	3.2E-09	-	9.3E-13	-	-	-	-	-	2.5E-08	-	2.5E-08	-	-	-	-	-	-	-	-	-
Acenaphthylene	7.6E-09	-	1.1E-09	-	3.3E-13	-	-	-	-	-	8.7E-09	-	8.7E-09	-	-	-	-	-	-	-	-	-
Anthracene	2.9E-09	-	4.3E-10	-	1.3E-13	-	-	-	-	-	3.3E-09	-	3.3E-09	-	-	-	-	-	-	-	-	-
Benzo(a)anthracene	-	2.0E-11	-	3.0E-12	-	2.8E-16	-	-	-	-	-	2.3E-11	-	2.3E-11	-	-	-	-	-	-	-	-
Benzo(a)pyrene	-	2.1E-10	-	3.1E-11	-	3.0E-15	-	-	-	-	-	2.4E-10	-	2.4E-10	-	-	-	-	-	-	-	-
Benzo(b)fluoranthene	-	3.0E-11	-	4.5E-12	-	4.3E-16	-	-	-	-	-	3.5E-11	-	3.5E-11	-	-	-	-	-	-	-	-
Benzo(g,h,i)perylene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Benzo(k)fluoranthene	-	2.0E-11	-	2.9E-12	-	2.8E-16	-	-	-	-	-	2.3E-11	-	2.3E-11	-	-	-	-	-	-	-	-
Chrysene	-	3.6E-12	-	5.3E-13	-	5.0E-17	-	-	-	-	-	4.1E-12	-	4.1E-12	-	-	-	-	-	-	-	-
Dibenz(a,h)anthracene	-	4.5E-11	-	6.7E-12	-	2.0E-15	-	-	-	-	-	5.2E-11	-	5.2E-11	-	-	-	-	-	-	-	-
Dibenzofuran	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Fluoranthene	6.9E-09	-	1.0E-09	-	3.0E-13	-	-	-	-	-	7.9E-09	-	7.9E-09	-	-	-	-	-	-	-	-	-
Fluorene	3.2E-08	-	4.7E-09	-	1.4E-12	-	-	-	-	-	3.7E-08	-	3.7E-08	-	-	-	-	-	-	-	-	-
Indeno(1,2,3-cd)pyrene	-	1.9E-11	-	2.9E-12	-	2.7E-16	-	-	-	-	-	2.2E-11	-	2.2E-11	-	-	-	-	-	-	-	-
Naphthalene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Phenanthrene	1.2E-07	-	1.7E-08	-	5.0E-12	-	-	-	-	-	1.3E-07	-	1.3E-07	-	-	-	-	-	-	-	-	-
Perylene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Pyrene	1.3E-08	-	2.0E-09	-	5.8E-13	-	-	-	-	-	1.5E-08	-	1.5E-08	-	-	-	-	-	-	-	-	-
Total Petroleum Hydrocarbons																						
C11-C14(Kerosene Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
C14-C20(Diesel Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
C20-C30(Lubricant Oil Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

Table C3-6b (2 of 4)

Total Risk Estimates for the Adult Recreator - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Central Tendency Exposure

Chemical	Soil Ingestion HQ (unitless)	Soil Ingestion Risk (unitless)	Soil Dermal Contact HQ (unitless)	Soil Dermal Contact Risk (unitless)	Soil Particulate Inhalation HQ (unitless)	Soil Particulate Inhalation Risk (unitless)	Inhalation Ambient Air_s HQ (mg/kg-day)	Inhalation Ambient Air_s Risk (mg/kg-day)	Inhalation Ambient Air_{gw} HQ (unitless)	Inhalation Ambient Air_{gw} Risk (unitless)	Cumulative Risk HI (unitless)	Cumulative Risk Risk (unitless)	Soil Media Risk HI (unitless)	Soil Media Risk Risk (unitless)	Groundwater Risk HI (unitless)	Groundwater Risk Risk (unitless)	Surface Water Ingestion HI (unitless)	Surface Water Ingestion Risk (unitless)	Surface Water Dermal Contact HI (unitless)	Surface Water Dermal Contact Risk (unitless)	Surface Water Risk HI (unitless)	Surface Water Risk Risk (unitless)
Dioxins																						
2,3,7,8-TCDD	-	1.4E-10	-	4.9E-12	-	6.1E-15	-	-	-	-	-	1.5E-10	-	1.5E-10	-	-	-	-	-	-	-	-
1,2,3,7,8-PeCDD	-	5.6E-10	-	1.9E-11	-	2.4E-14	-	-	-	-	-	5.8E-10	-	5.8E-10	-	-	-	1.3E-09	-	1.9E-07	-	1.9E-07
1,2,3,4,7,8-HxCDD	-	1.6E-10	-	5.6E-12	-	7.1E-15	-	-	-	-	-	1.7E-10	-	1.7E-10	-	-	-	1.9E-10	-	2.8E-08	-	2.8E-08
1,2,3,6,7,8-HxCDD	-	8.5E-10	-	2.9E-11	-	3.7E-14	-	-	-	-	-	8.7E-10	-	8.7E-10	-	-	-	2.1E-09	-	3.0E-07	-	3.0E-07
1,2,3,7,8,9-HxCDD	-	3.5E-10	-	1.2E-11	-	1.5E-14	-	-	-	-	-	3.6E-10	-	3.6E-10	-	-	-	1.1E-09	-	1.6E-07	-	1.6E-07
1,2,3,4,6,7,8-HpCDD	-	7.2E-10	-	2.5E-11	-	1.0E-13	-	-	-	-	-	7.4E-10	-	7.4E-10	-	-	-	5.0E-10	-	7.4E-08	-	7.5E-08
OCDD	-	1.1E-09	-	3.9E-11	-	4.9E-14	-	-	-	-	-	1.2E-09	-	1.2E-09	-	-	-	4.1E-10	-	6.0E-08	-	6.0E-08
2,3,7,8-TCDF	-	3.6E-11	-	1.2E-12	-	1.6E-15	-	-	-	-	-	3.7E-11	-	3.7E-11	-	-	-	3.0E-10	-	4.5E-08	-	4.5E-08
1,2,3,7,8-PeCDF	-	1.2E-12	-	4.1E-14	-	5.2E-17	-	-	-	-	-	1.2E-12	-	1.2E-12	-	-	-	5.0E-11	-	7.3E-09	-	7.4E-09
2,3,4,7,8-PeCDF	-	1.2E-10	-	4.2E-12	-	5.4E-15	-	-	-	-	-	1.3E-10	-	1.3E-10	-	-	-	4.1E-09	-	6.1E-07	-	6.1E-07
1,2,3,4,7,8-HxCDF	-	8.8E-11	-	3.0E-12	-	3.8E-15	-	-	-	-	-	9.1E-11	-	9.1E-11	-	-	-	1.4E-09	-	2.1E-07	-	2.1E-07
1,2,3,6,7,8-HxCDF	-	7.2E-11	-	2.5E-12	-	3.1E-15	-	-	-	-	-	7.5E-11	-	7.5E-11	-	-	-	8.4E-10	-	1.2E-07	-	1.2E-07
2,3,4,6,7,8-HxCDF	-	1.4E-10	-	4.7E-12	-	5.9E-15	-	-	-	-	-	1.4E-10	-	1.4E-10	-	-	-	1.5E-09	-	2.1E-07	-	2.2E-07
1,2,3,7,8,9-HxCDF	-	1.2E-11	-	4.2E-13	-	5.3E-16	-	-	-	-	-	1.3E-11	-	1.3E-11	-	-	-	1.4E-09	-	2.0E-07	-	2.1E-07
1,2,3,4,6,7,8-HpCDF	-	2.8E-10	-	9.6E-12	-	1.2E-14	-	-	-	-	-	2.9E-10	-	2.9E-10	-	-	-	2.1E-10	-	3.1E-08	-	3.1E-08
1,2,3,4,7,8,9-HpCDF	-	2.4E-11	-	8.2E-13	-	1.0E-15	-	-	-	-	-	2.5E-11	-	2.5E-11	-	-	-	1.1E-10	-	1.6E-08	-	1.6E-08
OCDF	-	2.3E-11	-	7.8E-13	-	9.9E-16	-	-	-	-	-	2.4E-11	-	2.4E-11	-	-	-	1.7E-11	-	2.4E-09	-	2.4E-09
Aroclor-1254	4.2E-04	2.0E-09	6.7E-05	3.2E-10	1.8E-08	8.7E-14	-	-	-	-	4.8E-04	2.3E-09	4.8E-04	2.3E-09	-	-	-	-	-	-	-	-
Aroclor-1260	-	1.7E-08	-	2.7E-09	-	7.5E-13	-	-	-	-	-	2.0E-08	-	2.0E-08	-	-	-	-	-	-	-	-
PCB-105	-	2.9E-12	-	4.6E-13	-	1.2E-16	-	-	-	-	-	3.3E-12	-	3.3E-12	-	-	-	-	-	-	-	-
PCB-114	-	5.5E-14	-	8.7E-15	-	2.4E-18	-	-	-	-	-	6.3E-14	-	6.3E-14	-	-	-	-	-	-	-	-
PCB-118	-	5.8E-12	-	9.2E-13	-	2.5E-16	-	-	-	-	-	6.7E-12	-	6.7E-12	-	-	-	-	-	-	-	-
PCB-123	-	8.1E-14	-	1.3E-14	-	3.5E-18	-	-	-	-	-	9.4E-14	-	9.4E-14	-	-	-	-	-	-	-	-
PCB-126	-	7.4E-10	-	1.2E-10	-	3.2E-14	-	-	-	-	-	8.5E-10	-	8.5E-10	-	-	-	-	-	-	-	-
PCB-156	-	1.9E-12	-	3.0E-13	-	8.2E-17	-	-	-	-	-	2.2E-12	-	2.2E-12	-	-	-	-	-	-	-	-
PCB-157	-	8.3E-13	-	1.3E-13	-	3.6E-17	-	-	-	-	-	9.7E-13	-	9.7E-13	-	-	-	-	-	-	-	-
PCB-167	-	1.4E-12	-	2.3E-13	-	6.3E-17	-	-	-	-	-	1.7E-12	-	1.7E-12	-	-	-	-	-	-	-	-
PCB-169	-	2.2E-11	-	3.5E-12	-	9.4E-16	-	-	-	-	-	2.5E-11	-	2.5E-11	-	-	-	-	-	-	-	-
PCB-189	-	2.2E-13	-	3.4E-14	-	9.3E-18	-	-	-	-	-	2.5E-13	-	2.5E-13	-	-	-	-	-	-	-	-
PCB-77	-	1.5E-12	-	2.4E-13	-	6.4E-17	-	-	-	-	-	1.7E-12	-	1.7E-12	-	-	-	-	-	-	-	-
PCB-81	-	7.9E-13	-	1.3E-13	-	3.4E-17	-	-	-	-	-	9.1E-13	-	9.1E-13	-	-	-	-	-	-	-	-
Cumulative Risk	1.0E-03	2.5E-08	7.3E-05	3.3E-09	3.1E-07	2.0E-12	5.7E-06	2.6E-10	7.9E-06	2.6E-10	1.1E-03	2.8E-08	1.1E-03	2.8E-08	7.9E-06	2.6E-10	1.7E-03	3.9E-07	5.3E-04	2.3E-06	2.3E-03	2.7E-06

Table C3-6b (3 of 4)

Total Risk Estimates for the Adult Recreator - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Reasonable Maximum Exposure

Chemical	Soil Ingestion HQ (unitless)	Soil Ingestion Risk (unitless)	Soil Dermal Contact HQ (unitless)	Soil Dermal Contact Risk (unitless)	Soil Particulate Inhalation HQ (unitless)	Soil Particulate Inhalation Risk (unitless)	Inhalation Ambient Air_s HQ (mg/kg-day)	Inhalation Ambient Air_s Risk (mg/kg-day)	Inhalation Ambient Air_{gw} HQ (unitless)	Inhalation Ambient Air_{gw} Risk (unitless)	Cumulative Risk HI (unitless)	Cumulative Risk Risk (unitless)	Soil Media Risk HI (unitless)	Soil Media Risk Risk (unitless)	Groundwater Risk HI (unitless)	Groundwater Risk Risk (unitless)	Surface Water Ingestion HI (unitless)	Surface Water Ingestion Risk (unitless)	Surface Water Dermal Contact HI (unitless)	Surface Water Dermal Contact Risk (unitless)	Surface Water Risk HI (unitless)	Surface Water Risk Risk (unitless)
Inorganic Compounds																						
Aluminum	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	3.3E-04	-	1.2E-04	-	4.5E-04	-
Antimony	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	7.5E-04	-	2.7E-04	-	1.0E-03	-
Arsenic	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	7.2E-03	6.5E-06	2.6E-03	1.2E-06	9.8E-03	7.7E-06
Barium	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Boron	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Cadmium	8.1E-05	9.9E-09	4.2E-06	5.1E-10	3.1E-07	8.5E-12	-	-	-	-	8.6E-05	1.0E-08	8.6E-05	1.0E-08	-	-	5.5E-05	6.7E-09	2.0E-05	1.2E-09	7.5E-05	7.9E-09
Chromium	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	4.4E-07	-	1.6E-07	-	6.0E-07	-
Copper	9.7E-05	-	5.0E-05	-	1.2E-07	-	-	-	-	-	1.5E-04	-	1.5E-04	-	-	-	2.8E-05	-	1.0E-05	-	3.8E-05	-
Fluoride	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Lead	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Mercury	3.6E-03	-	1.8E-03	-	9.1E-07	-	-	-	-	-	5.4E-03	-	5.4E-03	-	-	-	8.9E-05	-	3.2E-05	-	1.2E-04	-
Methyl Mercury	7.1E-06	-	3.6E-06	-	-	-	-	-	-	-	1.1E-05	-	1.1E-05	-	-	-	-	-	-	-	-	-
Nickel	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	4.0E-05	-	2.9E-06	-	4.3E-05	-
Nitrate	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Silver	1.1E-04	-	5.5E-05	-	-	-	-	-	-	-	1.6E-04	-	1.6E-04	-	-	-	-	-	-	-	-	-
Thallium	8.1E-04	-	4.1E-04	-	-	-	-	-	-	-	1.2E-03	-	1.2E-03	-	-	-	5.1E-04	-	1.9E-04	-	7.0E-04	-
Vanadium	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1.1E-03	-	4.0E-04	-	1.5E-03	-
Zinc	1.2E-04	-	6.3E-05	-	-	-	-	-	-	-	1.9E-04	-	1.9E-04	-	-	-	-	-	-	-	-	-
VOCs																						
1,1,1-Trichloroethane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	5.3E-07	-	0.0E+00	-	5.3E-07	-
1,1,2-Trichloro-1,2,2-trifluoroethane	7.8E-11	-	4.0E-10	-	-	-	-	-	-	-	4.8E-10	-	4.8E-10	-	-	-	-	-	-	-	-	-
1,1-Dichloroethane	-	-	-	-	-	-	2.1E-07	5.3E-11	2.1E-07	5.3E-11	2.1E-07	5.3E-11	2.1E-07	5.3E-11	2.1E-07	5.3E-11	-	-	-	-	-	-
1,2-Dichloroethane	-	-	-	-	-	-	4.8E-06	1.5E-10	4.8E-06	1.5E-10	4.8E-06	1.5E-10	4.8E-06	1.5E-10	4.8E-06	1.5E-10	-	-	-	-	-	-
1,2-Dichloroethene (total)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
1-Chlorohexane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
2-Butanone	1.1E-08	-	5.8E-08	-	-	-	-	-	-	-	6.9E-08	-	6.9E-08	-	-	-	-	-	-	-	-	-
2-Hexanone	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Acetone	1.1E-06	-	5.8E-06	-	-	-	2.8E-10	-	2.8E-10	-	6.9E-06	-	6.9E-06	-	2.8E-10	-	-	-	-	-	-	-
Benzene	-	-	-	-	-	-	3.8E-06	1.1E-09	3.8E-06	1.1E-09	3.8E-06	1.1E-09	3.8E-06	1.1E-09	3.8E-06	1.1E-09	-	-	-	-	-	-
Carbon disulfide	-	-	-	-	-	-	-	-	1.1E-06	-	1.1E-06	-	-	-	1.1E-06	-	-	-	-	-	-	-
Chloromethane	-	-	-	-	-	-	-	-	3.4E-06	-	3.4E-06	-	-	-	3.4E-06	-	-	-	-	-	-	-
cis-1,2-Dichloroethene	-	-	-	-	-	-	2.1E-06	-	2.1E-06	-	2.1E-06	-	2.1E-06	-	2.1E-06	-	-	-	-	-	-	-
Ethylbenzene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
m,p-Xylene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Methylene chloride	4.2E-08	1.1E-11	2.2E-07	5.8E-11	-	-	1.4E-07	1.7E-11	1.4E-07	1.7E-11	4.0E-07	8.7E-11	4.0E-07	8.7E-11	1.4E-07	1.7E-11	-	-	-	-	-	-
Tetrachloroethene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Toluene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Trichloroethene	-	-	-	-	-	-	3.2E-07	1.2E-10	3.2E-07	1.2E-10	3.2E-07	1.2E-10	3.2E-07	1.2E-10	3.2E-07	1.2E-10	4.3E-04	5.4E-10	1.9E-03	1.2E-09	2.3E-03	1.7E-09
Xylenes (total)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
SVOCs																						
2-Methylnaphthalene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Acenaphthene	3.6E-07	-	2.4E-06	-	7.8E-12	-	-	-	-	-	2.8E-06	-	2.8E-06	-	-	-	-	-	-	-	-	-
Acenaphthylene	1.0E-07	-	6.8E-07	-	2.2E-12	-	-	-	-	-	7.8E-07	-	7.8E-07	-	-	-	-	-	-	-	-	-
Anthracene	4.7E-08	-	3.2E-07	-	1.0E-12	-	-	-	-	-	3.6E-07	-	3.6E-07	-	-	-	-	-	-	-	-	-
Benzo(a)anthracene	-	6.6E-10	-	4.4E-09	-	4.6E-15	-	-	-	-	-	5.1E-09	-	5.1E-09	-	-	-	-	-	-	-	-
Benzo(a)pyrene	-	6.7E-09	-	4.5E-08	-	4.7E-14	-	-	-	-	-	5.2E-08	-	5.2E-08	-	-	-	-	-	-	-	-
Benzo(e)pyrene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Benzo(b)fluoranthene	-	8.3E-10	-	5.5E-09	-	5.8E-15	-	-	-	-	-	6.3E-09	-	6.3E-09	-	-	-	-	-	-	-	-
Benzo(g,h,i)perylene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Benzo(k)fluoranthene	-	6.3E-10	-	4.2E-09	-	4.4E-15	-	-	-	-	-	4.8E-09	-	4.8E-09	-	-	-	-	-	-	-	-
Chrysene	-	9.2E-11	-	6.1E-10	-	6.5E-16	-	-	-	-	-	7.0E-10	-	7.0E-10	-	-	-	-	-	-	-	-
Dibenz(a,h)anthracene	-	1.8E-09	-	1.2E-08	-	3.8E-14	-	-	-	-	-	1.4E-08	-	1.4E-08	-	-	-	-	-	-	-	-
Dibenzofuran	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Fluoranthene	5.9E-08	-	3.9E-07	-	1.3E-12	-	-	-	-	-	4.5E-07	-	4.5E-07	-	-	-	-	-	-	-	-	-
Fluorene	5.4E-07	-	3.6E-06	-	1.2E-11	-	-	-	-	-	4.1E-06	-	4.1E-06	-	-	-	-	-	-	-	-	-
Indeno(1,2,3-cd)pyrene	-	6.4E-10	-	4.2E-09	-	4.5E-15	-	-	-	-	-	4.9E-09	-	4.9E-09	-	-	-	-	-	-	-	-
Naphthalene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Perylene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Phenanthrene	1.9E-06	-	1.3E-05	-	4.2E-11	-	-	-	-	-	1.5E-05	-	1.5E-05	-	-	-	-	-	-	-	-	-
Pyrene	1.8E-07	-	1.2E-06	-	4.0E-12	-	-	-	-	-	1.4E-06	-	1.4E-06	-	-	-	-	-	-	-	-	-
Total Petroleum Hydrocarbons																						
C11-C14(Kerosene Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
C14-C20(Diesel Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
C20-C30(Lubricant Oil Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

Table C3-6b (4 of 4)

Total Risk Estimates for the Adult Recreator - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Reasonable Maximum Exposure

Chemical	Soil Ingestion HQ (unitless)	Soil Ingestion Risk (unitless)	Soil Dermal Contact HQ (unitless)	Soil Dermal Contact Risk (unitless)	Soil Particulate Inhalation HQ (unitless)	Soil Particulate Inhalation Risk (unitless)	Inhalation Ambient Air_s HQ (mg/kg-day)	Inhalation Ambient Air_s Risk (mg/kg-day)	Inhalation Ambient Air_{gw} HQ (unitless)	Inhalation Ambient Air_{gw} Risk (unitless)	Cumulative Risk HI (unitless)	Cumulative Risk Risk (unitless)	Soil Media Risk HI (unitless)	Soil Media Risk Risk (unitless)	Groundwater Risk HI (unitless)	Groundwater Risk Risk (unitless)	Surface Water Ingestion HI (unitless)	Surface Water Ingestion Risk (unitless)	Surface Water Dermal Contact HI (unitless)	Surface Water Dermal Contact Risk (unitless)	Surface Water Risk HI (unitless)	Surface Water Risk Risk (unitless)
Dioxins																						
2,3,7,8-TCDD	-	3.3E-09	-	5.0E-09	-	7.1E-14	-	-	-	-	-	8.3E-09	-	8.3E-09	-	-	-	-	-	-	-	-
1,2,3,7,8-PeCDD	-	1.2E-08	-	1.9E-08	-	2.6E-13	-	-	-	-	-	3.1E-08	-	3.1E-08	-	-	-	1.4E-08	-	2.0E-06	-	2.0E-06
1,2,3,4,7,8-HxCDD	-	3.4E-09	-	5.3E-09	-	7.4E-14	-	-	-	-	-	8.7E-09	-	8.7E-09	-	-	-	2.0E-09	-	3.0E-07	-	3.0E-07
1,2,3,6,7,8-HxCDD	-	1.6E-08	-	2.5E-08	-	3.5E-13	-	-	-	-	-	4.1E-08	-	4.1E-08	-	-	-	5.4E-08	-	7.9E-06	-	8.0E-06
1,2,3,7,8,9-HxCDD	-	8.1E-09	-	1.3E-08	-	1.8E-13	-	-	-	-	-	2.1E-08	-	2.1E-08	-	-	-	1.1E-08	-	1.7E-06	-	1.7E-06
1,2,3,4,6,7,8-HpCDD	-	1.2E-08	-	1.9E-08	-	8.8E-13	-	-	-	-	-	3.1E-08	-	3.1E-08	-	-	-	4.7E-08	-	6.9E-06	-	6.9E-06
OCDD	-	1.8E-08	-	2.7E-08	-	3.9E-13	-	-	-	-	-	4.5E-08	-	4.5E-08	-	-	-	6.5E-09	-	9.5E-07	-	9.6E-07
2,3,7,8-TCDF	-	6.4E-10	-	9.9E-10	-	1.4E-14	-	-	-	-	-	1.6E-09	-	1.6E-09	-	-	-	3.6E-09	-	5.4E-07	-	5.4E-07
1,2,3,7,8-PeCDF	-	2.8E-11	-	4.4E-11	-	6.2E-16	-	-	-	-	-	7.2E-11	-	7.2E-11	-	-	-	5.3E-10	-	7.8E-08	-	7.9E-08
2,3,4,7,8-PeCDF	-	2.4E-09	-	3.7E-09	-	5.2E-14	-	-	-	-	-	6.2E-09	-	6.2E-09	-	-	-	4.9E-08	-	7.2E-06	-	7.2E-06
1,2,3,4,7,8-HxCDF	-	1.5E-09	-	2.3E-09	-	3.2E-14	-	-	-	-	-	3.7E-09	-	3.7E-09	-	-	-	1.7E-08	-	2.6E-06	-	2.6E-06
1,2,3,6,7,8-HxCDF	-	1.5E-09	-	2.3E-09	-	3.2E-14	-	-	-	-	-	3.8E-09	-	3.8E-09	-	-	-	9.0E-09	-	1.3E-06	-	1.3E-06
2,3,4,6,7,8-HxCDF	-	2.5E-09	-	3.8E-09	-	5.3E-14	-	-	-	-	-	6.2E-09	-	6.2E-09	-	-	-	1.7E-08	-	2.6E-06	-	2.6E-06
1,2,3,7,8,9-HxCDF	-	1.4E-10	-	2.2E-10	-	3.1E-15	-	-	-	-	-	3.6E-10	-	3.6E-10	-	-	-	1.9E-08	-	2.8E-06	-	2.8E-06
1,2,3,4,6,7,8-HpCDF	-	4.1E-09	-	6.3E-09	-	8.8E-14	-	-	-	-	-	1.0E-08	-	1.0E-08	-	-	-	4.1E-09	-	6.1E-07	-	6.1E-07
1,2,3,4,7,8,9-HpCDF	-	3.5E-10	-	5.3E-10	-	7.5E-15	-	-	-	-	-	8.8E-10	-	8.8E-10	-	-	-	1.1E-09	-	1.7E-07	-	1.7E-07
OCDF	-	3.7E-10	-	5.6E-10	-	7.9E-15	-	-	-	-	-	9.3E-10	-	9.3E-10	-	-	-	3.3E-10	-	4.8E-08	-	4.8E-08
PCBs																						
Aroclor-1254	4.2E-03	5.4E-08	3.0E-02	3.9E-07	9.1E-08	1.2E-12	-	-	-	-	3.4E-02	4.4E-07	3.4E-02	4.4E-07	-	-	-	-	-	-	-	-
Aroclor-1260	-	9.8E-07	-	7.0E-06	-	2.1E-11	-	-	-	-	-	8.0E-06	-	8.0E-06	-	-	-	-	-	-	-	-
PCB-105	-	1.6E-10	-	1.1E-09	-	3.4E-15	-	-	-	-	-	1.3E-09	-	1.3E-09	-	-	-	-	-	-	-	-
PCB-114	-	2.8E-12	-	2.0E-11	-	6.0E-17	-	-	-	-	-	2.3E-11	-	2.3E-11	-	-	-	-	-	-	-	-
PCB-118	-	3.1E-10	-	2.2E-09	-	6.8E-15	-	-	-	-	-	2.6E-09	-	2.6E-09	-	-	-	-	-	-	-	-
PCB-123	-	4.4E-12	-	3.2E-11	-	9.6E-17	-	-	-	-	-	3.6E-11	-	3.6E-11	-	-	-	-	-	-	-	-
PCB-126	-	4.0E-08	-	2.9E-07	-	8.8E-13	-	-	-	-	-	3.3E-07	-	3.3E-07	-	-	-	-	-	-	-	-
PCB-156	-	1.0E-10	-	7.5E-10	-	2.3E-15	-	-	-	-	-	8.5E-10	-	8.5E-10	-	-	-	-	-	-	-	-
PCB-157	-	4.7E-11	-	3.4E-10	-	1.0E-15	-	-	-	-	-	3.8E-10	-	3.8E-10	-	-	-	-	-	-	-	-
PCB-167	-	8.1E-11	-	5.8E-10	-	1.8E-15	-	-	-	-	-	6.7E-10	-	6.7E-10	-	-	-	-	-	-	-	-
PCB-169	-	1.2E-09	-	8.7E-09	-	2.6E-14	-	-	-	-	-	9.9E-09	-	9.9E-09	-	-	-	-	-	-	-	-
PCB-189	-	1.2E-11	-	8.7E-11	-	2.6E-16	-	-	-	-	-	9.9E-11	-	9.9E-11	-	-	-	-	-	-	-	-
PCB-77	-	8.1E-11	-	5.8E-10	-	1.8E-15	-	-	-	-	-	6.6E-10	-	6.6E-10	-	-	-	-	-	-	-	-
PCB-81	-	4.3E-11	-	3.1E-10	-	9.3E-16	-	-	-	-	-	3.5E-10	-	3.5E-10	-	-	-	-	-	-	-	-
Cumulative Risk	9.0E-03	1.1E-06	3.3E-02	7.6E-06	1.4E-06	3.3E-11	1.1E-05	1.4E-09	1.6E-05	1.4E-09	4.2E-02	8.8E-06	4.2E-02	8.8E-06	1.6E-05	1.4E-09	1.1E-02	6.8E-06	5.5E-03	3.9E-05	1.6E-02	4.5E-05

Notes:
Inhalation Ambient Air_{s-gw} - Exposure associated with ambient air concentrations of COPCs modeled from soil or groundwater.
HQ - hazard quotient
HI - hazard index
Risk - incremental increased lifetime cancer risk
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCDD/PCDF - Polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.
PCB - polychlorinated biphenyls
COPC - chemical of potential concern
"-" indicates that either adequate toxicity data were not available for a chemical or the exposure pathway was not applicable to that chemical.
mg/kg-day - milligrams per kilogram per day

Table C3-7a (1 of 4)

Total Risk Estimates for the Child Recreator - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Central Tendency Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation Ambient Air_s		Inhalation Ambient Air_{gw}		Cumulative Risk		Soil Media Risk		Groundwater Risk	
	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (mg/kg-day)	Risk (mg/kg-day)	HQ (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)
Inorganic Compounds																
Cadmium	4.6E-04	1.4E-08	7.8E-07	2.4E-11	1.5E-06	1.0E-11	-	-	-	-	4.7E-04	1.4E-08	4.7E-04	1.4E-08	-	-
Copper	4.8E-04	-	8.1E-06	-	5.0E-07	-	-	-	-	-	4.9E-04	-	4.9E-04	-	-	-
Fluoride	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Lead	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Mercury	5.8E-03	-	9.8E-05	-	1.2E-06	-	-	-	-	-	5.9E-03	-	5.9E-03	-	-	-
Methyl Mercury	1.6E-05	-	2.7E-07	-	-	-	-	-	-	-	1.6E-05	-	1.6E-05	-	-	-
Nitrate	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Silver	1.4E-04	-	2.4E-06	-	-	-	-	-	-	-	1.4E-04	-	1.4E-04	-	-	-
Thallium	3.8E-03	-	6.3E-05	-	-	-	-	-	-	-	3.8E-03	-	3.8E-03	-	-	-
Zinc	5.2E-04	-	8.7E-06	-	2.8E-07	-	-	-	-	-	5.3E-04	-	5.3E-04	-	-	-
VOCs																
1,1,1-Trichloroethane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
1,1,2-Trichloro-1,2,2-trifluoroethane	3.7E-10	-	6.1E-11	-	-	-	-	-	-	-	4.3E-10	-	4.3E-10	-	-	-
1,1-Dichloroethane	-	-	-	-	-	-	8.2E-07	5.2E-11	8.2E-07	5.2E-11	8.2E-07	5.2E-11	8.2E-07	5.2E-11	8.2E-07	5.2E-11
1,2-Dichloroethane	-	-	-	-	-	-	1.9E-05	1.5E-10	1.9E-05	1.5E-10	1.9E-05	1.5E-10	1.9E-05	1.5E-10	1.9E-05	1.5E-10
1,2-Dichloroethene (total)	1.3E-06	-	2.2E-07	-	-	-	-	-	-	-	1.5E-06	-	1.5E-06	-	-	-
1-Chlorohexane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
2-Butanone	5.6E-08	-	9.5E-09	-	-	-	-	-	-	-	6.6E-08	-	6.6E-08	-	-	-
2-Hexanone	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Acetone	6.9E-07	-	1.2E-07	-	-	-	1.1E-09	-	1.1E-09	-	8.1E-07	-	8.1E-07	-	1.1E-09	-
Benzene	-	-	-	-	-	-	1.5E-05	1.0E-09	1.5E-05	1.0E-09	1.5E-05	1.0E-09	1.5E-05	1.0E-09	1.5E-05	1.0E-09
Carbon disulfide	-	-	-	-	-	-	-	-	4.5E-06	-	4.5E-06	-	-	-	4.5E-06	-
Chloromethane	-	-	-	-	-	-	-	-	1.3E-05	-	1.3E-05	-	-	-	1.3E-05	-
cis-1,2-Dichloroethene	-	-	-	-	-	-	8.1E-06	-	8.1E-06	-	8.1E-06	-	8.1E-06	-	8.1E-06	-
Ethylbenzene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
m,p-Xylene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Methylene chloride	2.0E-07	1.3E-11	3.3E-08	2.2E-12	-	-	5.4E-07	1.7E-11	5.4E-07	1.7E-11	7.7E-07	3.3E-11	7.7E-07	3.3E-11	5.4E-07	1.7E-11
Tetrachloroethene	1.9E-06	8.2E-10	3.2E-07	1.4E-10	-	-	-	-	-	-	2.2E-06	9.6E-10	2.2E-06	9.6E-10	-	-
Toluene	6.4E-07	-	1.1E-07	-	-	-	-	-	-	-	7.5E-07	-	7.5E-07	-	-	-
Trichloroethene	1.1E-04	3.5E-11	1.9E-05	5.9E-12	-	-	1.3E-06	1.2E-10	1.3E-06	1.2E-10	1.3E-04	1.6E-10	1.3E-04	1.6E-10	1.3E-06	1.2E-10
Xylenes (total)	1.2E-07	-	1.9E-08	-	-	-	-	-	-	-	1.4E-07	-	1.4E-07	-	-	-
SVOCs																
2-Methylnaphthalene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Acenaphthene	6.7E-07	-	1.5E-07	-	1.2E-11	-	-	-	-	-	8.2E-07	-	8.2E-07	-	-	-
Acenaphthylene	9.4E-07	-	2.0E-07	-	1.7E-11	-	-	-	-	-	1.1E-06	-	1.1E-06	-	-	-
Anthracene	1.2E-07	-	2.6E-08	-	2.1E-12	-	-	-	-	-	1.4E-07	-	1.4E-07	-	-	-
Benzo(a)anthracene	-	3.1E-09	-	6.9E-10	-	1.8E-14	-	-	-	-	-	3.8E-09	-	3.8E-09	-	-
Benzo(a)pyrene	-	3.2E-08	-	6.9E-09	-	1.8E-13	-	-	-	-	-	3.8E-08	-	3.8E-08	-	-
Benzo(e)pyrene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Benzo(b)fluoranthene	-	4.3E-09	-	9.3E-10	-	2.5E-14	-	-	-	-	-	5.2E-09	-	5.2E-09	-	-
Benzo(g,h,i)perylene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Benzo(k)fluoranthene	-	2.6E-09	-	5.7E-10	-	1.5E-14	-	-	-	-	-	3.2E-09	-	3.2E-09	-	-
Chrysene	-	3.9E-10	-	8.5E-11	-	2.3E-15	-	-	-	-	-	4.8E-10	-	4.8E-10	-	-
Dibenz(a,h)anthracene	-	8.7E-09	-	1.9E-09	-	1.6E-13	-	-	-	-	-	1.1E-08	-	1.1E-08	-	-
Dibenzofuran	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Fluoranthene	1.4E-06	-	3.0E-07	-	2.5E-11	-	-	-	-	-	1.7E-06	-	1.7E-06	-	-	-
Fluorene	1.0E-06	-	2.2E-07	-	1.8E-11	-	-	-	-	-	1.2E-06	-	1.2E-06	-	-	-
Indeno(1,2,3-cd)pyrene	-	3.0E-09	-	6.6E-10	-	1.8E-14	-	-	-	-	-	3.7E-09	-	3.7E-09	-	-
Naphthalene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Perylene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Phenanthrene	2.4E-06	-	5.3E-07	-	4.3E-11	-	-	-	-	-	2.9E-06	-	2.9E-06	-	-	-
Pyrene	1.6E-06	-	3.5E-07	-	2.9E-11	-	-	-	-	-	2.0E-06	-	2.0E-06	-	-	-
Total Petroleum Hydrocarbons																
C11-C14(Kerosene Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
C14-C20(Diesel Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
C20-C30(Lubricant Oil Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

Table C3-7a (2 of 4)

Total Risk Estimates for the Child Recreator - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Central Tendency Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation Ambient Air_s		Inhalation Ambient Air_{gw}		Cumulative Risk		Soil Media Risk		Groundwater Risk	
	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (mg/kg-day)	Risk (mg/kg-day)	HQ (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)
Dioxins																
2,3,7,8-TCDD	-	2.6E-09	-	1.3E-10	-	4.7E-14	-	-	-	-	-	2.7E-09	-	2.7E-09	-	-
1,2,3,7,8-PeCDD	-	1.0E-08	-	5.3E-10	-	1.9E-13	-	-	-	-	-	1.1E-08	-	1.1E-08	-	-
1,2,3,4,7,8-HxCDD	-	3.9E-09	-	2.0E-10	-	7.0E-14	-	-	-	-	-	4.1E-09	-	4.1E-09	-	-
1,2,3,6,7,8-HxCDD	-	1.5E-08	-	7.6E-10	-	2.7E-13	-	-	-	-	-	1.6E-08	-	1.6E-08	-	-
1,2,3,7,8,9-HxCDD	-	5.6E-09	-	2.8E-10	-	1.0E-13	-	-	-	-	-	5.9E-09	-	5.9E-09	-	-
1,2,3,4,6,7,8-HpCDD	-	1.6E-08	-	8.1E-10	-	9.7E-13	-	-	-	-	-	1.7E-08	-	1.7E-08	-	-
OCDD	-	2.4E-08	-	1.2E-09	-	4.3E-13	-	-	-	-	-	2.5E-08	-	2.5E-08	-	-
2,3,7,8-TCDF	-	5.2E-10	-	2.6E-11	-	9.4E-15	-	-	-	-	-	5.5E-10	-	5.5E-10	-	-
1,2,3,7,8-PeCDF	-	2.4E-11	-	1.2E-12	-	4.3E-16	-	-	-	-	-	2.5E-11	-	2.5E-11	-	-
2,3,4,7,8-PeCDF	-	2.3E-09	-	1.2E-10	-	4.2E-14	-	-	-	-	-	2.4E-09	-	2.4E-09	-	-
1,2,3,4,7,8-HxCDF	-	1.7E-09	-	8.5E-11	-	3.0E-14	-	-	-	-	-	1.8E-09	-	1.8E-09	-	-
1,2,3,6,7,8-HxCDF	-	1.5E-09	-	7.4E-11	-	2.7E-14	-	-	-	-	-	1.5E-09	-	1.5E-09	-	-
2,3,4,6,7,8-HxCDF	-	3.6E-09	-	1.8E-10	-	6.6E-14	-	-	-	-	-	3.8E-09	-	3.8E-09	-	-
1,2,3,7,8,9-HxCDF	-	3.4E-10	-	1.7E-11	-	6.2E-15	-	-	-	-	-	3.6E-10	-	3.6E-10	-	-
1,2,3,4,6,7,8-HpCDF	-	5.0E-09	-	2.5E-10	-	9.0E-14	-	-	-	-	-	5.2E-09	-	5.2E-09	-	-
1,2,3,4,7,8,9-HpCDF	-	4.6E-10	-	2.3E-11	-	8.3E-15	-	-	-	-	-	4.9E-10	-	4.9E-10	-	-
OCDF	-	3.8E-10	-	1.9E-11	-	6.9E-15	-	-	-	-	-	4.0E-10	-	4.0E-10	-	-
PCBs																
Aroclor-1254	7.4E-03	2.4E-08	1.7E-03	5.6E-09	1.3E-07	4.2E-13	-	-	-	-	9.1E-03	2.9E-08	9.1E-03	2.9E-08	-	-
Aroclor-1260	-	1.9E-07	-	4.6E-08	-	3.5E-12	-	-	-	-	-	2.4E-07	-	2.4E-07	-	-
PCB-105	-	3.3E-11	-	7.6E-12	-	5.8E-16	-	-	-	-	-	4.0E-11	-	4.0E-11	-	-
PCB-114	-	6.2E-13	-	1.5E-13	-	1.1E-17	-	-	-	-	-	7.7E-13	-	7.7E-13	-	-
PCB-118	-	6.5E-11	-	1.5E-11	-	1.2E-15	-	-	-	-	-	8.1E-11	-	8.1E-11	-	-
PCB-123	-	9.1E-13	-	2.1E-13	-	1.6E-17	-	-	-	-	-	1.1E-12	-	1.1E-12	-	-
PCB-126	-	8.3E-09	-	2.0E-09	-	1.5E-13	-	-	-	-	-	1.0E-08	-	1.0E-08	-	-
PCB-156	-	2.1E-11	-	5.0E-12	-	3.8E-16	-	-	-	-	-	2.6E-11	-	2.6E-11	-	-
PCB-157	-	9.4E-12	-	2.2E-12	-	1.7E-16	-	-	-	-	-	1.2E-11	-	1.2E-11	-	-
PCB-167	-	1.6E-11	-	3.8E-12	-	2.9E-16	-	-	-	-	-	2.0E-11	-	2.0E-11	-	-
PCB-169	-	2.4E-10	-	5.7E-11	-	4.4E-15	-	-	-	-	-	3.0E-10	-	3.0E-10	-	-
PCB-189	-	2.4E-12	-	5.7E-13	-	4.4E-17	-	-	-	-	-	3.0E-12	-	3.0E-12	-	-
PCB-77	-	1.7E-11	-	3.9E-12	-	3.0E-16	-	-	-	-	-	2.1E-11	-	2.1E-11	-	-
PCB-81	-	8.9E-12	-	2.1E-12	-	1.6E-16	-	-	-	-	-	1.1E-11	-	1.1E-11	-	-
Total PCB Congeners	-	8.7E-09	-	2.1E-09	-	1.6E-13	-	-	-	-	-	1.1E-08	-	1.1E-08	-	-
Cumulative Risk	1.9E-02	3.8E-07	1.9E-03	6.8E-08	3.6E-06	1.7E-11	4.5E-05	1.4E-09	6.3E-05	1.4E-09	2.1E-02	4.5E-07	2.1E-02	4.5E-07	6.3E-05	1.4E-09

Table C3-7a (3 of 4)

Total Risk Estimates for the Child Recreator - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Reasonable Maximum Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation Ambient Air_s		Inhalation Ambient Air_{gw}		Cumulative Risk		Soil Media Risk		Groundwater Risk	
	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (mg/kg-day)	Risk (mg/kg-day)	HQ (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)
Inorganic Compounds																
Cadmium	4.6E-04	1.4E-08	7.8E-07	2.4E-11	1.5E-06	1.0E-11	-	-	-	-	4.7E-04	1.4E-08	4.7E-04	1.4E-08	-	-
Copper	4.8E-04	-	8.1E-06	-	5.0E-07	-	-	-	-	-	4.9E-04	-	4.9E-04	-	-	-
Fluoride	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Lead	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Mercury	5.8E-03	-	9.8E-05	-	1.2E-06	-	-	-	-	-	5.9E-03	-	5.9E-03	-	-	-
Methyl Mercury	1.6E-05	-	2.7E-07	-	-	-	-	-	-	-	1.6E-05	-	1.6E-05	-	-	-
Nitrate	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Silver	1.4E-04	-	2.4E-06	-	-	-	-	-	-	-	1.4E-04	-	1.4E-04	-	-	-
Thallium	3.8E-03	-	6.3E-05	-	-	-	-	-	-	-	3.8E-03	-	3.8E-03	-	-	-
Zinc	5.2E-04	-	8.7E-06	-	2.8E-07	-	-	-	-	-	5.3E-04	-	5.3E-04	-	-	-
VOCs																
1,1,1-Trichloroethane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
1,1,2-Trichloro-1,2,2-trifluoroethane	1.5E-09	-	4.1E-10	-	-	-	-	-	-	-	1.9E-09	-	1.9E-09	-	-	-
1,1-Dichloroethane	-	-	-	-	-	-	3.3E-06	2.1E-10	3.3E-06	2.1E-10	3.3E-06	2.1E-10	3.3E-06	2.1E-10	3.3E-06	2.1E-10
1,2-Dichloroethane	-	-	-	-	-	-	7.6E-05	6.1E-10	7.6E-05	6.1E-10	7.6E-05	6.1E-10	7.6E-05	6.1E-10	7.6E-05	6.1E-10
1,2-Dichloroethene (total)	1.3E-05	-	3.6E-06	-	-	-	-	-	-	-	1.6E-05	-	1.6E-05	-	-	-
1-Chlorohexane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
2-Butanone	2.3E-07	-	6.3E-08	-	-	-	-	-	-	-	2.9E-07	-	2.9E-07	-	-	-
2-Hexanone	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Acetone	1.7E-05	-	4.8E-06	-	-	-	4.4E-09	-	4.4E-09	-	2.2E-05	-	2.2E-05	-	4.4E-09	-
Benzene	-	-	-	-	-	-	6.1E-05	4.2E-09	6.1E-05	4.2E-09	6.1E-05	4.2E-09	6.1E-05	4.2E-09	6.1E-05	4.2E-09
Carbon disulfide	-	-	-	-	-	-	-	-	1.8E-05	-	1.8E-05	-	-	-	1.8E-05	-
Chloromethane	-	-	-	-	-	-	-	-	5.3E-05	-	5.3E-05	-	-	-	5.3E-05	-
cis-1,2-Dichloroethene	-	-	-	-	-	-	3.3E-05	-	3.3E-05	-	3.3E-05	-	3.3E-05	-	3.3E-05	-
Ethylbenzene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
m,p-Xylene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Methylene chloride	7.9E-07	5.3E-11	2.2E-07	1.5E-11	-	-	2.2E-06	6.9E-11	2.2E-06	6.9E-11	3.2E-06	1.4E-10	3.2E-06	1.4E-10	2.2E-06	6.9E-11
Tetrachloroethene	3.2E-05	1.4E-08	9.0E-06	3.9E-09	-	-	-	-	-	-	4.1E-05	1.8E-08	4.1E-05	1.8E-08	-	-
Toluene	1.6E-05	-	4.4E-06	-	-	-	-	-	-	-	2.0E-05	-	2.0E-05	-	-	-
Trichloroethene	2.5E-03	7.7E-10	6.9E-04	2.1E-10	-	-	5.0E-06	4.8E-10	5.0E-06	4.8E-10	3.2E-03	1.5E-09	3.2E-03	1.5E-09	5.0E-06	4.8E-10
Xylenes (total)	9.4E-07	-	2.6E-07	-	-	-	-	-	-	-	1.2E-06	-	1.2E-06	-	-	-
SVOCs																
2-Methylnaphthalene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Acenaphthene	6.1E-06	-	2.2E-06	-	1.1E-10	-	-	-	-	-	8.3E-06	-	8.3E-06	-	-	-
Acenaphthylene	1.0E-05	-	3.8E-06	-	1.9E-10	-	-	-	-	-	1.4E-05	-	1.4E-05	-	-	-
Anthracene	1.0E-06	-	3.6E-07	-	1.8E-11	-	-	-	-	-	1.4E-06	-	1.4E-06	-	-	-
Benzo(a)anthracene	-	5.2E-08	-	6.9E-10	-	3.0E-13	-	-	-	-	-	5.3E-08	-	5.3E-08	-	-
Benzo(a)pyrene	-	5.2E-07	-	6.9E-09	-	3.0E-12	-	-	-	-	-	5.3E-07	-	5.3E-07	-	-
Benzo(e)pyrene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Benzo(b)fluoranthene	-	9.3E-08	-	9.3E-10	-	5.4E-13	-	-	-	-	-	9.4E-08	-	9.4E-08	-	-
Benzo(g,h,i)perylene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Benzo(k)fluoranthene	-	3.0E-08	-	5.7E-10	-	1.7E-13	-	-	-	-	-	3.0E-08	-	3.0E-08	-	-
Chrysene	-	7.6E-09	-	8.5E-11	-	4.4E-14	-	-	-	-	-	7.7E-09	-	7.7E-09	-	-
Dibenz(a,h)anthracene	-	1.0E-07	-	1.9E-09	-	1.8E-12	-	-	-	-	-	1.0E-07	-	1.0E-07	-	-
Dibenzofuran	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Fluoranthene	3.4E-05	-	1.2E-05	-	6.2E-10	-	-	-	-	-	4.7E-05	-	4.7E-05	-	-	-
Fluorene	9.1E-06	-	3.3E-06	-	1.6E-10	-	-	-	-	-	1.2E-05	-	1.2E-05	-	-	-
Indeno(1,2,3-cd)pyrene	-	4.8E-08	-	6.6E-10	-	2.8E-13	-	-	-	-	-	4.8E-08	-	4.8E-08	-	-
Naphthalene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Perylene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Phenanthrene	2.4E-05	-	8.9E-06	-	4.4E-10	-	-	-	-	-	3.3E-05	-	3.3E-05	-	-	-
Pyrene	1.9E-05	-	6.9E-06	-	3.4E-10	-	-	-	-	-	2.6E-05	-	2.6E-05	-	-	-
Total Petroleum Hydrocarbons																
C11-C14(Kerosene Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
C14-C20(Diesel Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
C20-C30(Lubricant Oil Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

Table C3-7a (4 of 4)

Total Risk Estimates for the Child Recreator - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Reasonable Maximum Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation Ambient Air_s		Inhalation Ambient Air_{gw}		Cumulative Risk		Soil Media Risk		Groundwater Risk	
	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (mg/kg-day)	Risk (mg/kg-day)	HQ (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)
Dioxins																
2,3,7,8-TCDD	-	2.0E-08	-	1.7E-09	-	3.6E-13	-	-	-	-	-	2.2E-08	-	2.2E-08	-	-
1,2,3,7,8-PeCDD	-	8.3E-08	-	6.9E-09	-	1.5E-12	-	-	-	-	-	9.0E-08	-	9.0E-08	-	-
1,2,3,4,7,8-HxCDD	-	3.4E-08	-	2.9E-09	-	6.2E-13	-	-	-	-	-	3.7E-08	-	3.7E-08	-	-
1,2,3,6,7,8-HxCDD	-	1.1E-07	-	9.4E-09	-	2.0E-12	-	-	-	-	-	1.2E-07	-	1.2E-07	-	-
1,2,3,7,8,9-HxCDD	-	3.8E-08	-	3.2E-09	-	6.8E-13	-	-	-	-	-	4.1E-08	-	4.1E-08	-	-
1,2,3,4,6,7,8-HpCDD	-	1.4E-07	-	1.1E-08	-	8.1E-12	-	-	-	-	-	1.5E-07	-	1.5E-07	-	-
OCDD	-	1.9E-07	-	1.6E-08	-	3.5E-12	-	-	-	-	-	2.1E-07	-	2.1E-07	-	-
2,3,7,8-TCDF	-	3.0E-09	-	2.5E-10	-	5.4E-14	-	-	-	-	-	3.2E-09	-	3.2E-09	-	-
1,2,3,7,8-PeCDF	-	2.0E-10	-	1.6E-11	-	3.5E-15	-	-	-	-	-	2.1E-10	-	2.1E-10	-	-
2,3,4,7,8-PeCDF	-	1.8E-08	-	1.5E-09	-	3.2E-13	-	-	-	-	-	1.9E-08	-	1.9E-08	-	-
1,2,3,4,7,8-HxCDF	-	1.3E-08	-	1.1E-09	-	2.3E-13	-	-	-	-	-	1.4E-08	-	1.4E-08	-	-
1,2,3,6,7,8-HxCDF	-	1.2E-08	-	1.0E-09	-	2.2E-13	-	-	-	-	-	1.3E-08	-	1.3E-08	-	-
2,3,4,6,7,8-HxCDF	-	3.3E-08	-	2.8E-09	-	6.0E-13	-	-	-	-	-	3.6E-08	-	3.6E-08	-	-
1,2,3,7,8,9-HxCDF	-	3.7E-09	-	3.1E-10	-	6.6E-14	-	-	-	-	-	4.0E-09	-	4.0E-09	-	-
1,2,3,4,6,7,8-HpCDF	-	3.6E-08	-	3.1E-09	-	6.6E-13	-	-	-	-	-	3.9E-08	-	3.9E-08	-	-
1,2,3,4,7,8,9-HpCDF	-	3.5E-09	-	2.9E-10	-	6.3E-14	-	-	-	-	-	3.8E-09	-	3.8E-09	-	-
OCDF	-	2.7E-09	-	2.3E-10	-	4.9E-14	-	-	-	-	-	2.9E-09	-	2.9E-09	-	-
PCBs																
Aroclor-1254	7.9E-02	2.5E-07	3.1E-02	9.9E-08	1.4E-06	4.5E-12	-	-	-	-	1.1E-01	3.5E-07	1.1E-01	3.5E-07	-	-
Aroclor-1260	-	4.3E-06	-	1.7E-06	-	7.7E-11	-	-	-	-	-	5.9E-06	-	5.9E-06	-	-
PCB-105	-	6.4E-10	-	2.5E-10	-	1.2E-14	-	-	-	-	-	9.0E-10	-	9.0E-10	-	-
PCB-114	-	1.1E-11	-	4.5E-12	-	2.1E-16	-	-	-	-	-	1.6E-11	-	1.6E-11	-	-
PCB-118	-	1.3E-09	-	5.0E-10	-	2.3E-14	-	-	-	-	-	1.8E-09	-	1.8E-09	-	-
PCB-123	-	1.8E-11	-	7.1E-12	-	3.3E-16	-	-	-	-	-	2.5E-11	-	2.5E-11	-	-
PCB-126	-	1.7E-07	-	6.5E-08	-	3.0E-12	-	-	-	-	-	2.3E-07	-	2.3E-07	-	-
PCB-156	-	4.3E-10	-	1.7E-10	-	7.7E-15	-	-	-	-	-	6.0E-10	-	6.0E-10	-	-
PCB-157	-	1.9E-10	-	7.6E-11	-	3.5E-15	-	-	-	-	-	2.7E-10	-	2.7E-10	-	-
PCB-167	-	3.4E-10	-	1.3E-10	-	6.0E-15	-	-	-	-	-	4.7E-10	-	4.7E-10	-	-
PCB-169	-	5.0E-09	-	2.0E-09	-	9.0E-14	-	-	-	-	-	7.0E-09	-	7.0E-09	-	-
PCB-189	-	5.0E-11	-	2.0E-11	-	9.0E-16	-	-	-	-	-	7.0E-11	-	7.0E-11	-	-
PCB-77	-	3.3E-10	-	1.3E-10	-	6.0E-15	-	-	-	-	-	4.6E-10	-	4.6E-10	-	-
PCB-81	-	1.8E-10	-	6.9E-11	-	3.2E-15	-	-	-	-	-	2.5E-10	-	2.5E-10	-	-
Total PCB Congeners	-	1.8E-07	-	6.9E-08	-	3.2E-12	-	-	-	-	-	2.4E-07	-	2.4E-07	-	-
Cumulative Risk	9.2E-02	6.1E-06	3.2E-02	1.9E-06	4.9E-06	1.2E-10	1.8E-04	5.5E-09	2.5E-04	5.5E-09	1.2E-01	8.0E-06	1.2E-01	8.0E-06	2.5E-04	5.5E-09

Notes:
Inhalation Ambient Air $_{s\text{-}gw}$ - Exposure associated with ambient air concentrations of COPCs modeled from soil or groundwater.
HQ - hazard quotient
HI - hazard index
Risk - incremental increased lifetime cancer risk
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCDD/PCDF - Polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.
PCB - polychlorinated biphenyls
COPC - chemical of potential concern
"-" indicates that either adequate toxicity data were not available for a chemical or the exposure pathway was not applicable to that chemical.
mg/kg-day - milligrams per kilogram per day
HIs and cancer risks for PCB congeners. These results not included in cumulative risk estimates.

Table C3-7b (1 of 4)

Total Risk Estimates for the Child Recreator - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Central Tendency Exposure

Chemical	Soil Ingestion HQ (unitless)	Soil Ingestion Risk (unitless)	Soil Dermal Contact HQ (unitless)	Soil Dermal Contact Risk (unitless)	Soil Particulate Inhalation HQ (unitless)	Soil Particulate Inhalation Risk (unitless)	Inhalation Ambient Air$_{\xi}$ HQ (unitless)	Inhalation Ambient Air$_{\xi}$ Risk (unitless)	Inhalation Ambient Air$_{gw}$ HQ (unitless)	Inhalation Ambient Air$_{gw}$ Risk (unitless)	Cumulative Risk HI (unitless)	Cumulative Risk Risk (unitless)	Soil Media Risk HI (unitless)	Soil Media Risk Risk (unitless)	Groundwater Risk HI (unitless)	Groundwater Risk Risk (unitless)	Surface Water Ingestion HI (unitless)	Surface Water Ingestion Risk (unitless)	Surface Water Dermal Contact HI (unitless)	Surface Water Dermal Contact Risk (unitless)	Surface Water Risk HI (unitless)	Surface Water Risk Risk (unitless)
Inorganic Compounds																						
Aluminum	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	4.7E-04	-	6.6E-06	-	4.7E-04	-
Antimony	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1.0E-03	-	1.4E-05	-	1.0E-03	-
Arsenic	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1.0E-02	2.3E-06	1.4E-04	3.3E-08	1.0E-02	2.4E-06
Barium	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Boron	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Cadmium	2.2E-04	6.6E-09	3.7E-07	1.1E-11	6.9E-07	4.7E-12	-	-	-	-	2.2E-04	6.7E-09	2.2E-04	6.7E-09	-	-	6.9E-05	2.1E-09	9.8E-07	3.0E-11	7.0E-05	2.1E-09
Chromium	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	7.0E-07	-	9.8E-09	-	7.1E-07	-
Copper	2.3E-04	-	3.8E-06	-	2.4E-07	-	-	-	-	-	2.3E-04	-	2.3E-04	-	-	-	5.0E-05	-	7.0E-07	-	5.1E-05	-
Fluoride	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Lead	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Mercury	6.5E-03	-	1.1E-04	-	1.4E-06	-	-	-	-	-	6.6E-03	-	6.6E-03	-	-	-	1.8E-04	-	2.5E-06	-	1.8E-04	-
Methyl Mercury	1.6E-05	-	2.7E-07	-	-	-	-	-	-	-	1.6E-05	-	1.6E-05	-	-	-	-	-	-	-	-	-
Nickel	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	9.4E-05	-	2.6E-07	-	9.4E-05	-
Nitrate	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Silver	1.9E-04	-	3.1E-06	-	-	-	-	-	-	-	1.9E-04	-	1.9E-04	-	-	-	-	-	-	-	-	-
Thallium	3.8E-03	-	6.3E-05	-	-	-	-	-	-	-	3.8E-03	-	3.8E-03	-	-	-	1.2E-03	-	1.7E-05	-	1.2E-03	-
Vanadium	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1.8E-03	-	2.6E-05	-	1.9E-03	-
Zinc	2.6E-04	-	4.3E-06	-	1.4E-07	-	-	-	-	-	2.6E-04	-	2.6E-04	-	-	-	-	-	-	-	-	-
VOCs																						
1,1,1-Trichloroethane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1.2E-06	-	0.0E+00	-	1.2E-06	-
1,1,2-Trichloro-1,2,2-trifluoroethane	3.7E-10	-	6.1E-11	-	-	-	-	-	-	-	4.3E-10	-	4.3E-10	-	-	-	-	-	-	-	-	-
1,1-Dichloroethane	-	-	-	-	-	-	8.2E-07	5.2E-11	8.2E-07	5.2E-11	8.2E-07	5.2E-11	8.2E-07	5.2E-11	8.2E-07	5.2E-11	-	-	-	-	-	-
1,2-Dichloroethane	-	-	-	-	-	-	1.9E-05	1.5E-10	1.9E-05	1.5E-10	1.9E-05	1.5E-10	1.9E-05	1.5E-10	1.9E-05	1.5E-10	-	-	-	-	-	-
1,2-Dichloroethene (total)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
1-Chlorohexane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
2-Butanone	3.3E-08	-	5.5E-09	-	-	-	-	-	-	-	3.8E-08	-	3.8E-08	-	-	-	-	-	-	-	-	-
2-Hexanone	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Acetone	1.1E-06	-	1.9E-07	-	-	-	1.1E-09	-	1.1E-09	-	1.3E-06	-	1.3E-06	-	1.1E-09	-	-	-	-	-	-	-
Benzene	-	-	-	-	-	-	1.5E-05	1.0E-09	1.5E-05	1.0E-09	1.5E-05	1.0E-09	1.5E-05	1.0E-09	1.5E-05	1.0E-09	-	-	-	-	-	-
Carbon disulfide	-	-	-	-	-	-	-	-	4.5E-06	-	4.5E-06	-	-	-	4.5E-06	-	-	-	-	-	-	-
Chloromethane	-	-	-	-	-	-	-	-	1.3E-05	-	1.3E-05	-	-	-	1.3E-05	-	-	-	-	-	-	-
cis-1,2-Dichloroethene	-	-	-	-	-	-	8.1E-06	-	8.1E-06	-	8.1E-06	-	8.1E-06	-	8.1E-06	-	-	-	-	-	-	-
Ethylbenzene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
m,p-Xylene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Methylene chloride	1.6E-07	1.0E-11	2.6E-08	1.8E-12	-	-	5.4E-07	1.7E-11	5.4E-07	1.7E-11	7.2E-07	2.9E-11	7.2E-07	2.9E-11	5.4E-07	1.7E-11	-	-	-	-	-	-
Tetrachloroethene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Toluene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Trichloroethene	-	-	-	-	-	-	1.3E-06	1.2E-10	1.3E-06	1.2E-10	1.3E-06	1.2E-10	1.3E-06	1.2E-10	1.3E-06	1.2E-10	1.0E-03	3.1E-10	1.7E-04	5.3E-11	1.2E-03	3.7E-10
Xylenes (total)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
SVOCs																						
2-Methylnaphthalene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Acenaphthene	4.0E-07	-	8.7E-08	-	7.2E-12	-	-	-	-	-	4.9E-07	-	4.9E-07	-	-	-	-	-	-	-	-	-
Acenaphthylene	1.4E-07	-	3.1E-08	-	2.5E-12	-	-	-	-	-	1.7E-07	-	1.7E-07	-	-	-	-	-	-	-	-	-
Anthracene	5.4E-08	-	1.2E-08	-	9.7E-13	-	-	-	-	-	6.6E-08	-	6.6E-08	-	-	-	-	-	-	-	-	-
Benzo(a)anthracene	-	2.5E-10	-	5.4E-11	-	1.5E-15	-	-	-	-	-	3.0E-10	-	3.0E-10	-	-	-	-	-	-	-	-
Benzo(a)pyrene	-	2.6E-09	-	5.7E-10	-	1.5E-14	-	-	-	-	-	3.2E-09	-	3.2E-09	-	-	-	-	-	-	-	-
Benzo(e)pyrene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Benzo(b)fluoranthene	-	3.8E-10	-	8.3E-11	-	2.2E-15	-	-	-	-	-	4.6E-10	-	4.6E-10	-	-	-	-	-	-	-	-
Benzo(g,h,i)perylene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Benzo(k)fluoranthene	-	2.5E-10	-	5.4E-11	-	1.4E-15	-	-	-	-	-	3.0E-10	-	3.0E-10	-	-	-	-	-	-	-	-
Chrysene	-	4.5E-11	-	9.7E-12	-	2.6E-16	-	-	-	-	-	5.4E-11	-	5.4E-11	-	-	-	-	-	-	-	-
Dibenz(a,h)anthracene	-	5.6E-10	-	1.2E-10	-	1.0E-14	-	-	-	-	-	6.8E-10	-	6.8E-10	-	-	-	-	-	-	-	-
Dibenzofuran	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Fluoranthene	1.3E-07	-	2.8E-08	-	2.3E-12	-	-	-	-	-	1.6E-07	-	1.6E-07	-	-	-	-	-	-	-	-	-
Fluorene	5.9E-07	-	1.3E-07	-	1.1E-11	-	-	-	-	-	7.2E-07	-	7.2E-07	-	-	-	-	-	-	-	-	-
Indeno(1,2,3-cd)pyrene	-	2.4E-10	-	5.2E-11	-	1.4E-15	-	-	-	-	-	2.9E-10	-	2.9E-10	-	-	-	-	-	-	-	-
Naphthalene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Perylene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Phenanthrene	2.2E-06	-	4.7E-07	-	3.9E-11	-	-	-	-	-	2.6E-06	-	2.6E-06	-	-	-	-	-	-	-	-	-
Pyrene	2.5E-07	-	5.5E-08	-	4.5E-12	-	-	-	-	-	3.0E-07	-	3.0E-07	-	-	-	-	-	-	-	-	-
Total Petroleum Hydrocarbons																						
C11-C14(Kerosene Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
C14-C20(Diesel Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
C20-C30(Lubricant Oil Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

Table C3-7b (2 of 4)

Total Risk Estimates for the Child Recreator - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Central Tendency Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation Ambient Air$_{\xi}$		Inhalation Ambient Air$_{gw}$		Cumulative Risk		Soil Media Risk		Groundwater Risk		Surface Water Ingestion		Surface Water Dermal Contact		Surface Water Risk	
	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (mg/kg-day)	Risk (mg/kg-day)	HQ (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)
Dioxins																						
2,3,7,8-TCDD	-	1.8E-09	-	8.9E-11	-	3.2E-14	-	-	-	-	-	1.9E-09	-	1.9E-09	-	-	-	-	-	-	-	-
1,2,3,7,8-PeCDD	-	7.0E-09	-	3.5E-10	-	1.3E-13	-	-	-	-	-	7.3E-09	-	7.3E-09	-	-	-	8.0E-09	-	9.1E-08	-	9.9E-08
1,2,3,4,7,8-HxCDD	-	2.0E-09	-	1.0E-10	-	3.7E-14	-	-	-	-	-	2.1E-09	-	2.1E-09	-	-	-	1.2E-09	-	1.3E-08	-	1.5E-08
1,2,3,6,7,8-HxCDD	-	1.1E-08	-	5.3E-10	-	1.9E-13	-	-	-	-	-	1.1E-08	-	1.1E-08	-	-	-	1.3E-08	-	1.5E-07	-	1.6E-07
1,2,3,7,8,9-HxCDD	-	4.3E-09	-	2.2E-10	-	7.8E-14	-	-	-	-	-	4.5E-09	-	4.5E-09	-	-	-	6.6E-09	-	7.6E-08	-	8.2E-08
1,2,3,4,6,7,8-HpCDD	-	8.9E-09	-	4.5E-10	-	5.4E-13	-	-	-	-	-	9.4E-09	-	9.4E-09	-	-	-	3.1E-09	-	3.6E-08	-	3.9E-08
OCDD	-	1.4E-08	-	7.1E-10	-	2.5E-13	-	-	-	-	-	1.5E-08	-	1.5E-08	-	-	-	2.5E-09	-	2.9E-08	-	3.1E-08
2,3,7,8-TCDF	-	4.5E-10	-	2.3E-11	-	8.0E-15	-	-	-	-	-	4.7E-10	-	4.7E-10	-	-	-	1.9E-09	-	2.2E-08	-	2.3E-08
1,2,3,7,8-PeCDF	-	1.5E-11	-	7.6E-13	-	2.7E-16	-	-	-	-	-	1.6E-11	-	1.6E-11	-	-	-	3.1E-10	-	3.5E-09	-	3.8E-09
2,3,4,7,8-PeCDF	-	1.5E-09	-	7.8E-11	-	2.8E-14	-	-	-	-	-	1.6E-09	-	1.6E-09	-	-	-	2.6E-08	-	2.9E-07	-	3.2E-07
1,2,3,4,7,8-HxCDF	-	1.1E-09	-	5.5E-11	-	2.0E-14	-	-	-	-	-	1.2E-09	-	1.2E-09	-	-	-	8.9E-09	-	1.0E-07	-	1.1E-07
1,2,3,6,7,8-HxCDF	-	9.0E-10	-	4.5E-11	-	1.6E-14	-	-	-	-	-	9.4E-10	-	9.4E-10	-	-	-	5.2E-09	-	5.9E-08	-	6.5E-08
2,3,4,6,7,8-HxCDF	-	1.7E-09	-	8.6E-11	-	3.1E-14	-	-	-	-	-	1.8E-09	-	1.8E-09	-	-	-	9.0E-09	-	1.0E-07	-	1.1E-07
1,2,3,7,8,9-HxCDF	-	1.5E-10	-	7.6E-12	-	2.7E-15	-	-	-	-	-	1.6E-10	-	1.6E-10	-	-	-	8.7E-09	-	9.9E-08	-	1.1E-07
1,2,3,4,6,7,8-HpCDF	-	3.5E-09	-	1.8E-10	-	6.3E-14	-	-	-	-	-	3.7E-09	-	3.7E-09	-	-	-	1.3E-09	-	1.5E-08	-	1.6E-08
1,2,3,4,7,8,9-HpCDF	-	3.0E-10	-	1.5E-11	-	5.4E-15	-	-	-	-	-	3.1E-10	-	3.1E-10	-	-	-	6.6E-10	-	7.6E-09	-	8.2E-09
OCDF	-	2.8E-10	-	1.4E-11	-	5.1E-15	-	-	-	-	-	3.0E-10	-	3.0E-10	-	-	-	1.0E-10	-	1.2E-09	-	1.3E-09
PCBs																						
Aroclor-1254	7.8E-03	2.5E-08	1.8E-03	5.9E-09	1.4E-07	4.5E-13	-	-	-	-	9.6E-03	3.1E-08	9.6E-03	3.1E-08	-	-	-	-	-	-	-	-
Aroclor-1260	-	2.1E-07	-	5.0E-08	-	3.9E-12	-	-	-	-	-	2.6E-07	-	2.6E-07	-	-	-	-	-	-	-	-
PCB-105	-	3.6E-11	-	8.4E-12	-	6.4E-16	-	-	-	-	-	4.4E-11	-	4.4E-11	-	-	-	-	-	-	-	-
PCB-114	-	6.8E-13	-	1.6E-13	-	1.2E-17	-	-	-	-	-	8.4E-13	-	8.4E-13	-	-	-	-	-	-	-	-
PCB-118	-	7.2E-11	-	1.7E-11	-	1.3E-15	-	-	-	-	-	8.9E-11	-	8.9E-11	-	-	-	-	-	-	-	-
PCB-123	-	1.0E-12	-	2.4E-13	-	1.8E-17	-	-	-	-	-	1.2E-12	-	1.2E-12	-	-	-	-	-	-	-	-
PCB-126	-	9.2E-09	-	2.2E-09	-	1.6E-13	-	-	-	-	-	1.1E-08	-	1.1E-08	-	-	-	-	-	-	-	-
PCB-156	-	2.4E-11	-	5.5E-12	-	4.2E-16	-	-	-	-	-	2.9E-11	-	2.9E-11	-	-	-	-	-	-	-	-
PCB-157	-	1.0E-11	-	2.4E-12	-	1.9E-16	-	-	-	-	-	1.3E-11	-	1.3E-11	-	-	-	-	-	-	-	-
PCB-167	-	1.8E-11	-	4.2E-12	-	3.2E-16	-	-	-	-	-	2.2E-11	-	2.2E-11	-	-	-	-	-	-	-	-
PCB-169	-	2.7E-10	-	6.3E-11	-	4.8E-15	-	-	-	-	-	3.3E-10	-	3.3E-10	-	-	-	-	-	-	-	-
PCB-189	-	2.7E-12	-	6.3E-13	-	4.8E-17	-	-	-	-	-	3.3E-12	-	3.3E-12	-	-	-	-	-	-	-	-
PCB-77	-	1.8E-11	-	4.3E-12	-	3.3E-16	-	-	-	-	-	2.3E-11	-	2.3E-11	-	-	-	-	-	-	-	-
PCB-81	-	9.8E-12	-	2.3E-12	-	1.8E-16	-	-	-	-	-	1.2E-11	-	1.2E-11	-	-	-	-	-	-	-	-
Cumulative Risk	1.9E-02	3.1E-07	2.0E-03	6.0E-08	2.6E-06	1.0E-11	4.5E-05	1.4E-09	6.3E-05	1.4E-09	2.1E-02	3.7E-07	2.1E-02	3.7E-07	6.3E-05	1.4E-09	1.6E-02	2.4E-06	3.8E-04	1.1E-06	1.7E-02	3.6E-06

Table C3-7b (3 of 4)

Total Risk Estimates for the Child Recreator - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Reasonable Maximum Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation Ambient Air$_{\xi}$		Inhalation Ambient Air$_{gw}$		Cumulative Risk		Soil Media Risk		Groundwater Risk		Surface Water Ingestion		Surface Water Dermal Contact		Surface Water Risk	
	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (mg/kg-day)	Risk (mg/kg-day)	HQ (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)
Inorganic Compounds																						
Aluminum	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	3.1E-03	-	8.7E-05	-	3.2E-03	-
Antimony	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	7.0E-03	-	2.0E-04	-	7.2E-03	-
Arsenic	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	6.7E-02	1.5E-05	1.9E-03	2.1E-07	6.9E-02	1.5E-05
Barium	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Boron	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Cadmium	2.2E-04	6.6E-09	3.7E-07	1.1E-11	6.9E-07	4.7E-12	-	-	-	-	2.2E-04	6.7E-09	2.2E-04	6.7E-09	-	-	5.1E-04	1.6E-08	1.4E-05	2.2E-10	5.3E-04	1.6E-08
Chromium	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	4.1E-06	-	1.2E-07	-	4.3E-06	-
Copper	2.3E-04	-	3.8E-06	-	2.4E-07	-	-	-	-	-	2.3E-04	-	2.3E-04	-	-	-	2.6E-04	-	7.3E-06	-	2.7E-04	-
Fluoride	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Lead	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Mercury	6.5E-03	-	1.1E-04	-	1.4E-06	-	-	-	-	-	6.6E-03	-	6.6E-03	-	-	-	8.3E-04	-	2.3E-05	-	8.5E-04	-
Methyl Mercury	1.6E-05	-	2.7E-07	-	-	-	-	-	-	-	1.6E-05	-	1.6E-05	-	-	-	-	-	-	-	-	-
Nickel	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	3.7E-04	-	2.1E-06	-	3.8E-04	-
Nitrate	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Silver	1.9E-04	-	3.1E-06	-	-	-	-	-	-	-	1.9E-04	-	1.9E-04	-	-	-	-	-	-	-	-	-
Thallium	3.8E-03	-	6.3E-05	-	-	-	-	-	-	-	3.8E-03	-	3.8E-03	-	-	-	4.8E-03	-	1.3E-04	-	4.9E-03	-
Vanadium	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1.0E-02	-	2.9E-04	-	1.1E-02	-
Zinc	2.6E-04	-	4.3E-06	-	1.4E-07	-	-	-	-	-	2.6E-04	-	2.6E-04	-	-	-	-	-	-	-	-	-
VOCs																						
1,1,1-Trichloroethane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	5.0E-06	-	0.0E+00	-	5.0E-06	-
1,1,2-Trichloro-1,2,2-trifluoroethane	1.5E-09	-	4.1E-10	-	-	-	-	-	-	-	1.9E-09	-	1.9E-09	-	-	-	-	-	-	-	-	-
1,1-Dichloroethane	-	-	-	-	-	-	3.3E-06	2.1E-10	3.3E-06	2.1E-10	3.3E-06	2.1E-10	3.3E-06	2.1E-10	3.3E-06	2.1E-10	-	-	-	-	-	-
1,2-Dichloroethane	-	-	-	-	-	-	7.6E-05	6.1E-10	7.6E-05	6.1E-10	7.6E-05	6.1E-10	7.6E-05	6.1E-10	7.6E-05	6.1E-10	-	-	-	-	-	-
1,2-Dichloroethene (total)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
1-Chlorohexane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
2-Butanone	2.1E-07	-	5.9E-08	-	-	-	-	-	-	-	2.7E-07	-	2.7E-07	-	-	-	-	-	-	-	-	-
2-Hexanone	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Acetone	2.1E-05	-	5.9E-06	-	-	-	4.4E-09	-	4.4E-09	-	2.7E-05	-	2.7E-05	-	4.4E-09	-	-	-	-	-	-	-
Benzene	-	-	-	-	-	-	6.1E-05	4.2E-09	6.1E-05	4.2E-09	6.1E-05	4.2E-09	6.1E-05	4.2E-09	6.1E-05	4.2E-09	-	-	-	-	-	-
Carbon disulfide	-	-	-	-	-	-	-	-	1.8E-05	-	1.8E-05	-	-	-	1.8E-05	-	-	-	-	-	-	-
Chloromethane	-	-	-	-	-	-	-	-	5.3E-05	-	5.3E-05	-	-	-	5.3E-05	-	-	-	-	-	-	-
cis-1,2-Dichloroethene	-	-	-	-	-	-	3.3E-05	-	3.3E-05	-	3.3E-05	-	3.3E-05	-	3.3E-05	-	-	-	-	-	-	-
Ethylbenzene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
m,p-Xylene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Methylene chloride	7.9E-07	5.3E-11	2.2E-07	1.5E-11	-	-	2.2E-06	6.9E-11	2.2E-06	6.9E-11	3.2E-06	1.4E-10	3.2E-06	1.4E-10	2.2E-06	6.9E-11	-	-	-	-	-	-
Tetrachloroethene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Toluene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Trichloroethene	-	-	-	-	-	-	5.0E-06	4.8E-10	5.0E-06	4.8E-10	5.0E-06	4.8E-10	5.0E-06	4.8E-10	5.0E-06	4.8E-10	4.0E-03	1.3E-09	1.4E-03	2.1E-10	5.4E-03	1.5E-09
Xylenes (total)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
SVOCs																						
2-Methylnaphthalene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Acenaphthene	6.7E-06	-	2.5E-06	-	1.2E-10	-	-	-	-	-	9.2E-06	-	9.2E-06	-	-	-	-	-	-	-	-	-
Acenaphthylene	1.9E-06	-	6.9E-07	-	3.4E-11	-	-	-	-	-	2.6E-06	-	2.6E-06	-	-	-	-	-	-	-	-	-
Anthracene	8.9E-07	-	3.2E-07	-	1.6E-11	-	-	-	-	-	1.2E-06	-	1.2E-06	-	-	-	-	-	-	-	-	-
Benzo(a)anthracene	-	3.1E-09	-	5.4E-11	-	1.8E-14	-	-	-	-	-	3.1E-09	-	3.1E-09	-	-	-	-	-	-	-	-
Benzo(a)pyrene	-	3.1E-08	-	5.7E-10	-	1.8E-13	-	-	-	-	-	3.2E-08	-	3.2E-08	-	-	-	-	-	-	-	-
Benzo(e)pyrene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Benzo(b)fluoranthene	-	3.9E-09	-	8.3E-11	-	2.3E-14	-	-	-	-	-	3.9E-09	-	3.9E-09	-	-	-	-	-	-	-	-
Benzo(g,h,i)perylene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Benzo(k)fluoranthene	-	2.9E-09	-	5.4E-11	-	1.7E-14	-	-	-	-	-	3.0E-09	-	3.0E-09	-	-	-	-	-	-	-	-
Chrysene	-	4.3E-10	-	9.7E-12	-	2.5E-15	-	-	-	-	-	4.4E-10	-	4.4E-10	-	-	-	-	-	-	-	-
Dibenz(a,h)anthracene	-	8.2E-09	-	1.2E-10	-	1.5E-13	-	-	-	-	-	8.3E-09	-	8.3E-09	-	-	-	-	-	-	-	-
Dibenzofuran	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Fluoranthene	1.1E-06	-	4.0E-07	-	2.0E-11	-	-	-	-	-	1.5E-06	-	1.5E-06	-	-	-	-	-	-	-	-	-
Fluorene	1.0E-05	-	3.7E-06	-	1.8E-10	-	-	-	-	-	1.4E-05	-	1.4E-05	-	-	-	-	-	-	-	-	-
Indeno(1,2,3-cd)pyrene	-	3.0E-09	-	5.2E-11	-	1.7E-14	-	-	-	-	-	3.0E-09	-	3.0E-09	-	-	-	-	-	-	-	-
Naphthalene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Perylene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Phenanthrene	3.6E-05	-	1.3E-05	-	6.5E-10	-	-	-	-	-	4.9E-05	-	4.9E-05	-	-	-	-	-	-	-	-	-
Pyrene	3.4E-06	-	1.2E-06	-	6.2E-11	-	-	-	-	-	4.7E-06	-	4.7E-06	-	-	-	-	-	-	-	-	-
Total Petroleum Hydrocarbons																						
C11-C14(Kerosene Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
C14-C20(Diesel Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
C20-C30(Lubricant Oil Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

Table C3-7b (4 of 4)

Total Risk Estimates for the Child Recreator - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Reasonable Maximum Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation Ambient Air$_{s}$		Inhalation Ambient Air$_{gw}$		Cumulative Risk		Soil Media Risk		Groundwater Risk		Surface Water Ingestion		Surface Water Dermal Contact		Surface Water Risk	
	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (mg/kg-day)	Risk (mg/kg-day)	HQ (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)
Dioxins																						
2,3,7,8-TCDD	-	1.5E-08	-	1.3E-09	-	2.7E-13	-	-	-	-	-	1.6E-08	-	1.6E-08	-	-	-	-	-	-	-	-
1,2,3,7,8-PeCDD	-	5.7E-08	-	4.8E-09	-	1.0E-12	-	-	-	-	-	6.2E-08	-	6.2E-08	-	-	-	3.2E-08	-	3.6E-07	-	4.0E-07
1,2,3,4,7,8-HxCDD	-	1.6E-08	-	1.3E-09	-	2.9E-13	-	-	-	-	-	1.7E-08	-	1.7E-08	-	-	-	4.7E-09	-	5.4E-08	-	5.8E-08
1,2,3,6,7,8-HxCDD	-	7.6E-08	-	6.4E-09	-	1.4E-12	-	-	-	-	-	8.2E-08	-	8.2E-08	-	-	-	1.3E-07	-	1.4E-06	-	1.6E-06
1,2,3,7,8,9-HxCDD	-	3.8E-08	-	3.2E-09	-	6.8E-13	-	-	-	-	-	4.1E-08	-	4.1E-08	-	-	-	2.7E-08	-	3.0E-07	-	3.3E-07
1,2,3,4,6,7,8-HpCDD	-	5.7E-08	-	4.8E-09	-	3.4E-12	-	-	-	-	-	6.2E-08	-	6.2E-08	-	-	-	1.1E-07	-	1.2E-06	-	1.3E-06
OCDD	-	8.3E-08	-	7.0E-09	-	1.5E-12	-	-	-	-	-	9.0E-08	-	9.0E-08	-	-	-	1.5E-08	-	1.7E-07	-	1.9E-07
2,3,7,8-TCDF	-	3.0E-09	-	2.5E-10	-	5.4E-14	-	-	-	-	-	3.2E-09	-	3.2E-09	-	-	-	8.5E-09	-	9.7E-08	-	1.1E-07
1,2,3,7,8-PeCDF	-	1.3E-10	-	1.1E-11	-	2.4E-15	-	-	-	-	-	1.4E-10	-	1.4E-10	-	-	-	1.2E-09	-	1.4E-08	-	1.5E-08
2,3,4,7,8-PeCDF	-	1.1E-08	-	9.5E-10	-	2.0E-13	-	-	-	-	-	1.2E-08	-	1.2E-08	-	-	-	1.1E-07	-	1.3E-06	-	1.4E-06
1,2,3,4,7,8-HxCDF	-	6.9E-09	-	5.8E-10	-	1.2E-13	-	-	-	-	-	7.5E-09	-	7.5E-09	-	-	-	4.1E-08	-	4.6E-07	-	5.0E-07
1,2,3,6,7,8-HxCDF	-	7.0E-09	-	5.8E-10	-	1.3E-13	-	-	-	-	-	7.5E-09	-	7.5E-09	-	-	-	2.1E-08	-	2.4E-07	-	2.6E-07
2,3,4,6,7,8-HxCDF	-	1.1E-08	-	9.6E-10	-	2.1E-13	-	-	-	-	-	1.2E-08	-	1.2E-08	-	-	-	4.1E-08	-	4.6E-07	-	5.1E-07
1,2,3,7,8,9-HxCDF	-	6.6E-10	-	5.6E-11	-	1.2E-14	-	-	-	-	-	7.2E-10	-	7.2E-10	-	-	-	4.4E-08	-	5.0E-07	-	5.4E-07
1,2,3,4,6,7,8-HpCDF	-	1.9E-08	-	1.6E-09	-	3.4E-13	-	-	-	-	-	2.1E-08	-	2.1E-08	-	-	-	9.7E-09	-	1.1E-07	-	1.2E-07
1,2,3,4,7,8,9-HpCDF	-	1.6E-09	-	1.4E-10	-	2.9E-14	-	-	-	-	-	1.7E-09	-	1.7E-09	-	-	-	2.7E-09	-	3.0E-08	-	3.3E-08
OCDF	-	1.7E-09	-	1.4E-10	-	3.1E-14	-	-	-	-	-	1.9E-09	-	1.9E-09	-	-	-	7.6E-10	-	8.7E-09	-	9.5E-09
PCBs																						
Aroclor-1254	7.9E-02	2.5E-07	3.1E-02	9.9E-08	1.4E-06	4.5E-12	-	-	-	-	1.1E-01	3.5E-07	1.1E-01	3.5E-07	-	-	-	-	-	-	-	-
Aroclor-1260	-	4.6E-06	-	1.8E-06	-	8.2E-11	-	-	-	-	-	6.3E-06	-	6.3E-06	-	-	-	-	-	-	-	-
PCB-105	-	7.3E-10	-	2.9E-10	-	1.3E-14	-	-	-	-	-	1.0E-09	-	1.0E-09	-	-	-	-	-	-	-	-
PCB-114	-	1.3E-11	-	5.1E-12	-	2.3E-16	-	-	-	-	-	1.8E-11	-	1.8E-11	-	-	-	-	-	-	-	-
PCB-118	-	1.5E-09	-	5.7E-10	-	2.6E-14	-	-	-	-	-	2.0E-09	-	2.0E-09	-	-	-	-	-	-	-	-
PCB-123	-	2.1E-11	-	8.1E-12	-	3.7E-16	-	-	-	-	-	2.9E-11	-	2.9E-11	-	-	-	-	-	-	-	-
PCB-126	-	1.9E-07	-	7.4E-08	-	3.4E-12	-	-	-	-	-	2.6E-07	-	2.6E-07	-	-	-	-	-	-	-	-
PCB-156	-	4.8E-10	-	1.9E-10	-	8.7E-15	-	-	-	-	-	6.7E-10	-	6.7E-10	-	-	-	-	-	-	-	-
PCB-157	-	2.2E-10	-	8.6E-11	-	3.9E-15	-	-	-	-	-	3.0E-10	-	3.0E-10	-	-	-	-	-	-	-	-
PCB-167	-	3.8E-10	-	1.5E-10	-	6.8E-15	-	-	-	-	-	5.3E-10	-	5.3E-10	-	-	-	-	-	-	-	-
PCB-169	-	5.7E-09	-	2.2E-09	-	1.0E-13	-	-	-	-	-	7.9E-09	-	7.9E-09	-	-	-	-	-	-	-	-
PCB-189	-	5.7E-11	-	2.2E-11	-	1.0E-15	-	-	-	-	-	7.9E-11	-	7.9E-11	-	-	-	-	-	-	-	-
PCB-77	-	3.8E-10	-	1.5E-10	-	6.8E-15	-	-	-	-	-	5.2E-10	-	5.2E-10	-	-	-	-	-	-	-	-
PCB-81	-	2.0E-10	-	7.8E-11	-	3.6E-15	-	-	-	-	-	2.8E-10	-	2.8E-10	-	-	-	-	-	-	-	-
Cumulative Risk	9.0E-02	5.3E-06	3.1E-02	1.9E-06	3.8E-06	1.0E-10	1.8E-04	5.5E-09	2.5E-04	5.5E-09	1.2E-01	7.2E-06	1.2E-01	7.2E-06	2.5E-04	5.5E-09	9.8E-02	1.6E-05	4.0E-03	7.0E-06	1.0E-01	2.3E-05

Notes:
Inhalation Ambient Air$_{s-gw}$ - Exposure associated with ambient air concentrations of COPCs modeled from soil or groundwater.
HQ - hazard quotient
HI - hazard index
Risk - incremental increased lifetime cancer risk
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCDD/PCDF - Polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.
PCB - polychlorinated biphenyls
COPC - chemical of potential concern
"-" indicates that either adequate toxicity data were not available for a chemical or the exposure pathway was not applicable to that chemical.
mg/kg-day - milligrams per kilogram per day

Table C3-8a (1 of 4)

Total Risk Estimates for the Adult Resident - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Central Tendency Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation of Indoor Air_s		Inhalation Ambient Air_s		Inhalation of Indoor Air_{gw}		Inhalation Ambient Air_{gw}		Domestic Groundwater Use		Plant Consumption		Cumulative Risk		Soil Media Risk		Groundwater Risk	
	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)
Inorganic Compounds																								
Cadmium	3.5E-04	1.6E-08	4.0E-07	1.8E-11	1.7E-06	1.8E-11	-	-	-	-	-	-	-	-	-	-	1.3E-02	5.7E-07	3.5E-04	1.6E-08	3.5E-04	1.6E-08	-	-
Copper	3.6E-04	-	4.1E-06	-	6.0E-07	-	-	-	-	-	-	-	-	-	6.2E-03	-	2.0E-01	-	6.5E-03	-	3.7E-04	-	6.2E-03	-
Fluoride	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1.3E-01	-	-	-	1.3E-01	-	-	-	1.3E-01	-
Lead	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Mercury	4.4E-03	-	5.0E-05	-	1.5E-06	-	-	-	-	-	-	-	-	-	-	-	2.4E-01	-	4.4E-03	-	4.4E-03	-	-	-
Methyl Mercury	1.2E-05	-	1.4E-07	-	-	-	-	-	-	-	-	-	-	-	-	-	1.2E-03	-	1.2E-05	-	1.2E-05	-	-	-
Nitrate	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1.2E-01	-	-	-	1.2E-01	-	-	-	1.2E-01	-
Silver	1.1E-04	-	1.2E-06	-	-	-	-	-	-	-	-	-	-	-	-	-	2.1E-05	-	1.1E-04	-	1.1E-04	-	-	-
Thallium	2.8E-03	-	3.2E-05	-	-	-	-	-	-	-	-	-	-	-	9.2E-02	-	3.9E-01	-	9.5E-02	-	2.9E-03	-	9.2E-02	-
Zinc	3.9E-04	-	4.4E-06	-	3.3E-07	-	-	-	-	-	-	-	-	-	-	-	5.3E-02	-	3.9E-04	-	3.9E-04	-	-	-
VOCs																								
1,1,1-Trichloroethane	-	-	-	-	-	-	4.8E-05	-	-	-	-	-	-	-	-	-	-	-	4.8E-05	-	4.8E-05	-	-	-
1,1,2-Trichloro-1,2,2-trifluoroethane	2.7E-10	-	3.1E-11	-	-	-	1.8E-05	-	-	-	-	-	-	-	-	-	3.9E-07	-	1.8E-05	-	1.8E-05	-	-	-
1,1-Dichloroethane	-	-	-	-	-	-	2.1E-04	2.0E-08	9.8E-07	9.3E-11	1.4E-06	1.4E-10	9.8E-07	9.3E-11	7.1E-04	4.9E-08	-	-	9.2E-04	6.9E-08	2.1E-04	2.0E-08	7.1E-04	4.9E-08
1,2-Dichloroethane	-	-	-	-	-	-	-	-	2.3E-05	2.7E-10	2.4E-05	2.9E-10	2.3E-05	2.7E-10	1.2E-03	1.4E-07	-	-	1.3E-03	1.4E-07	2.3E-05	2.7E-10	1.3E-03	1.4E-07
1,2-Dichloroethene (total)	9.7E-07	-	1.1E-07	-	-	-	-	-	-	-	-	-	-	-	-	-	9.6E-03	-	1.1E-06	-	1.1E-06	-	-	-
1-Chlorohexane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
2-Butanone	4.2E-08	-	4.8E-09	-	-	-	-	-	-	-	-	-	-	-	-	-	2.8E-03	-	4.7E-08	-	4.7E-08	-	-	-
2-Hexanone	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Acetone	5.2E-07	-	5.9E-08	-	-	-	-	-	1.3E-09	-	1.5E-09	-	1.3E-09	-	4.9E-04	-	6.8E-02	-	4.9E-04	-	5.8E-07	-	4.9E-04	-
Benzene	-	-	-	-	-	-	-	-	1.8E-05	1.9E-09	2.1E-05	2.2E-09	1.8E-05	1.9E-09	4.0E-03	1.9E-07	-	-	4.0E-03	1.9E-07	1.8E-05	1.9E-09	4.0E-03	1.9E-07
Carbon disulfide	-	-	-	-	-	-	-	-	-	-	5.0E-06	-	5.3E-06	-	7.1E-04	-	-	-	7.2E-04	-	-	-	7.2E-04	-
Chloromethane	-	-	-	-	-	-	-	-	-	-	1.1E-05	-	1.6E-05	-	-	-	-	-	2.7E-05	-	-	-	2.7E-05	-
cis-1,2-Dichloroethene	-	-	-	-	-	-	-	-	9.7E-06	-	1.1E-05	-	9.7E-06	-	1.4E-01	-	-	-	1.4E-01	-	9.7E-06	-	1.4E-01	-
Ethylbenzene	-	-	-	-	-	-	1.0E-04	-	-	-	-	-	-	-	-	-	-	-	1.0E-04	-	1.0E-04	-	-	-
m,p-Xylene	-	-	-	-	-	-	2.0E-03	-	-	-	-	-	-	-	-	-	-	-	2.0E-03	-	2.0E-03	-	-	-
Methylene chloride	1.5E-07	1.5E-11	1.7E-08	1.7E-12	-	-	7.6E-03	3.6E-07	6.4E-07	3.1E-11	5.0E-07	2.4E-11	6.4E-07	3.1E-11	2.9E-04	2.9E-08	4.3E-03	4.4E-07	7.8E-03	3.9E-07	7.6E-03	3.6E-07	2.9E-04	3.0E-08
Tetrachloroethene	1.4E-06	9.2E-10	1.6E-07	1.1E-10	-	-	2.9E-03	7.3E-08	-	-	-	-	-	-	-	-	1.5E-03	9.6E-07	2.9E-03	7.4E-08	2.9E-03	7.4E-08	-	-
Toluene	4.8E-07	-	5.5E-08	-	-	-	2.2E-05	-	-	-	-	-	-	-	6.2E-04	-	1.2E-03	-	6.4E-04	-	2.3E-05	-	6.2E-04	-
Trichloroethene	8.4E-05	3.9E-11	9.6E-06	4.5E-12	-	-	1.8E-04	2.5E-08	1.5E-06	2.1E-10	1.5E-06	2.1E-10	1.5E-06	2.1E-10	9.1E-01	4.3E-07	2.9E-01	1.4E-07	9.1E-01	4.5E-07	2.7E-04	2.6E-08	9.1E-01	4.3E-07
Xylenes (total)	8.7E-08	-	9.9E-09	-	-	-	-	-	-	-	-	-	-	-	-	-	1.3E-04	-	9.7E-08	-	9.7E-08	-	-	-
																			-					
SVOCs																			-					
2-Methylnaphthalene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Acenaphthene	5.0E-07	-	7.5E-08	-	1.4E-11	-	-	-	-	-	-	-	-	-	-	-	2.4E-04	-	5.8E-07	-	5.8E-07	-	-	-
Acenaphthylene	7.0E-07	-	1.0E-07	-	2.0E-11	-	-	-	-	-	-	-	-	-	-	-	3.0E-04	-	8.1E-07	-	8.1E-07	-	-	-
Anthracene	8.9E-08	-	1.3E-08	-	2.5E-12	-	-	-	-	-	-	-	-	-	-	-	2.3E-05	-	1.0E-07	-	1.0E-07	-	-	-
Benzo(a)anthracene	-	3.5E-09	-	5.2E-10	-	3.3E-14	-	-	-	-	-	-	-	-	-	-	-	1.7E-07	-	4.1E-09	-	4.1E-09	-	-
Benzo(a)pyrene	-	3.5E-08	-	5.3E-09	-	3.3E-13	-	-	-	-	-	-	-	-	-	-	-	7.3E-07	-	4.1E-08	-	4.1E-08	-	-
Benzo(e)pyrene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Benzo(b)fluoranthene	-	4.8E-09	-	7.1E-10	-	4.5E-14	-	-	-	-	-	-	-	-	-	-	-	1.1E-07	-	5.5E-09	-	5.5E-09	-	-
Benzo(g,h,i)perylene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Benzo(k)fluoranthene	-	2.9E-09	-	4.3E-10	-	2.7E-14	-	-	-	-	-	-	-	-	-	-	-	8.7E-08	-	3.4E-09	-	3.4E-09	-	-
Chrysene	-	4.4E-10	-	6.5E-11	-	4.1E-15	-	-	-	-	-	-	-	-	-	-	-	2.0E-08	-	5.0E-10	-	5.0E-10	-	-
Dibenz(a,h)anthracene	-	9.8E-09	-	1.5E-09	-	2.8E-13	-	-	-	-	-	-	-	-	-	-	-	1.0E-07	-	1.1E-08	-	1.1E-08	-	-
Dibenzofuran	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Fluoranthene	1.0E-06	-	1.5E-07	-	2.9E-11	-	-	-	-	-	-	-	-	-	-	-	1.1E-04	-	1.2E-06	-	1.2E-06	-	-	-
Fluorene	7.5E-07	-	1.1E-07	-	2.2E-11	-	-	-	-	-	-	-	-	-	-	-	8.1E-05	-	8.6E-07	-	8.6E-07	-	-	-
Indeno(1,2,3-cd)pyrene	-	3.4E-09	-	5.0E-10	-	3.1E-14	-	-	-	-	-	-	-	-	-	-	-	2.1E-08	-	3.9E-09	-	3.9E-09	-	-
Naphthalene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Perylene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Phenanthrene	1.8E-06	-	2.7E-07	-	5.2E-11	-	-	-	-	-	-	-	-	-	-	-	4.0E-04	-	2.1E-06	-	2.1E-06	-	-	-
Pyrene	1.2E-06	-	1.8E-07	-	3.5E-11	-	-	-	-	-	-	-	-	-	-	-	1.5E-04	-	1.4E-06	-	1.4E-06	-	-	-
Total Petroleum Hydrocarbons																								
C11-C14(Kerosene Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
C14-C20(Diesel Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
C20-C30(Lubricant Oil Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

Table C3-8a (2 of 4)

Total Risk Estimates for the Adult Resident - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Central Tendency Exposure

Chemical	Soil Ingestion HQ (unitless)	Soil Ingestion Risk (unitless)	Soil Dermal Contact HQ (unitless)	Soil Dermal Contact Risk (unitless)	Soil Particulate Inhalation HQ (unitless)	Soil Particulate Inhalation Risk (unitless)	Inhalation of Indoor Air_s HQ (unitless)	Inhalation of Indoor Air_s Risk (unitless)	Inhalation Ambient Air_s HQ (unitless)	Inhalation Ambient Air_s Risk (unitless)	Inhalation of Indoor Air_{gw} HQ (unitless)	Inhalation of Indoor Air_{gw} Risk (unitless)	Inhalation Ambient Air_{gw} HQ (unitless)	Inhalation Ambient Air_{gw} Risk (unitless)	Domestic Groundwater Use HQ (unitless)	Domestic Groundwater Use Risk (unitless)	Plant Consumption HQ (unitless)	Plant Consumption Risk (unitless)	Cumulative Risk HI (unitless)	Cumulative Risk Risk (unitless)	Soil Media Risk HI (unitless)	Soil Media Risk Risk (unitless)	Groundwater Risk HI (unitless)	Groundwater Risk Risk (unitless)
Dioxins																								
2,3,7,8-TCDD	-	2.9E-09	-	1.0E-10	-	8.4E-14	-	-	-	-	-	-	-	-	-	-	-	-	-	3.0E-09	-	3.0E-09	-	-
1,2,3,7,8-PeCDD	-	1.2E-08	-	4.0E-10	-	3.4E-13	-	-	-	-	-	-	-	-	-	-	-	-	-	1.2E-08	-	1.2E-08	-	-
1,2,3,4,7,8-HxCDD	-	4.4E-09	-	1.5E-10	-	1.3E-13	-	-	-	-	-	-	-	-	-	-	-	-	-	4.5E-09	-	4.5E-09	-	-
1,2,3,6,7,8-HxCDD	-	1.7E-08	-	5.8E-10	-	4.8E-13	-	-	-	-	-	-	-	-	-	-	-	-	-	1.7E-08	-	1.7E-08	-	-
1,2,3,7,8,9-HxCDD	-	6.3E-09	-	2.2E-10	-	1.8E-13	-	-	-	-	-	-	-	-	-	-	-	-	-	6.5E-09	-	6.5E-09	-	-
1,2,3,4,6,7,8-HpCDD	-	1.8E-08	-	6.2E-10	-	1.7E-12	-	-	-	-	-	-	-	-	-	-	-	-	-	1.9E-08	-	1.9E-08	-	-
OCDD	-	2.7E-08	-	9.2E-10	-	7.7E-13	-	-	-	-	-	-	-	-	-	-	-	-	-	2.8E-08	-	2.8E-08	-	-
2,3,7,8-TCDF	-	5.9E-10	-	2.0E-11	-	1.7E-14	-	-	-	-	-	-	-	-	-	-	-	-	-	6.1E-10	-	6.1E-10	-	-
1,2,3,7,8-PeCDF	-	2.7E-11	-	9.1E-13	-	7.6E-16	-	-	-	-	-	-	-	-	-	-	-	-	-	2.7E-11	-	2.7E-11	-	-
2,3,4,7,8-PeCDF	-	2.6E-09	-	8.9E-11	-	7.5E-14	-	-	-	-	-	-	-	-	-	-	-	-	-	2.7E-09	-	2.7E-09	-	-
1,2,3,4,7,8-HxCDF	-	1.9E-09	-	6.5E-11	-	5.4E-14	-	-	-	-	-	-	-	-	-	-	-	-	-	2.0E-09	-	2.0E-09	-	-
1,2,3,6,7,8-HxCDF	-	1.7E-09	-	5.7E-11	-	4.7E-14	-	-	-	-	-	-	-	-	-	-	-	-	-	1.7E-09	-	1.7E-09	-	-
2,3,4,6,7,8-HxCDF	-	4.1E-09	-	1.4E-10	-	1.2E-13	-	-	-	-	-	-	-	-	-	-	-	-	-	4.2E-09	-	4.2E-09	-	-
1,2,3,7,8,9-HxCDF	-	3.9E-10	-	1.3E-11	-	1.1E-14	-	-	-	-	-	-	-	-	-	-	-	-	-	4.0E-10	-	4.0E-10	-	-
1,2,3,4,6,7,8-HpCDF	-	5.6E-09	-	1.9E-10	-	1.6E-13	-	-	-	-	-	-	-	-	-	-	-	-	-	5.8E-09	-	5.8E-09	-	-
1,2,3,4,7,8,9-HpCDF	-	5.2E-10	-	1.8E-11	-	1.5E-14	-	-	-	-	-	-	-	-	-	-	-	-	-	5.4E-10	-	5.4E-10	-	-
OCDF	-	4.3E-10	-	1.5E-11	-	1.2E-14	-	-	-	-	-	-	-	-	-	-	-	-	-	4.5E-10	-	4.5E-10	-	-
PCBs																								
Aroclor-1254	5.5E-03	2.7E-08	8.8E-04	4.2E-09	1.6E-07	7.6E-13	-	-	-	-	-	-	-	-	-	-	1.2E-01	5.8E-07	6.4E-03	3.1E-08	6.4E-03	3.1E-08	-	-
Aroclor-1260	-	2.2E-07	-	3.5E-08	-	6.3E-12	-	-	-	-	-	-	-	-	-	-	-	2.4E-06	-	2.5E-07	-	2.5E-07	-	-
PCB-105	-	3.7E-11	-	5.8E-12	-	1.0E-15	-	-	-	-	-	-	-	-	-	-	-	7.9E-10	-	4.2E-11	-	4.2E-11	-	-
PCB-114	-	7.0E-13	-	1.1E-13	-	2.0E-17	-	-	-	-	-	-	-	-	-	-	-	1.5E-11	-	8.1E-13	-	8.1E-13	-	-
PCB-118	-	7.4E-11	-	1.2E-11	-	2.1E-15	-	-	-	-	-	-	-	-	-	-	-	1.6E-09	-	8.5E-11	-	8.5E-11	-	-
PCB-123	-	1.0E-12	-	1.6E-13	-	2.9E-17	-	-	-	-	-	-	-	-	-	-	-	2.2E-11	-	1.2E-12	-	1.2E-12	-	-
PCB-126	-	9.3E-09	-	1.5E-09	-	2.7E-13	-	-	-	-	-	-	-	-	-	-	-	2.0E-07	-	1.1E-08	-	1.1E-08	-	-
PCB-156	-	2.4E-11	-	3.8E-12	-	6.9E-16	-	-	-	-	-	-	-	-	-	-	-	5.2E-10	-	2.8E-11	-	2.8E-11	-	-
PCB-157	-	1.1E-11	-	1.7E-12	-	3.0E-16	-	-	-	-	-	-	-	-	-	-	-	2.3E-10	-	1.2E-11	-	1.2E-11	-	-
PCB-167	-	1.8E-11	-	2.9E-12	-	5.3E-16	-	-	-	-	-	-	-	-	-	-	-	4.0E-10	-	2.1E-11	-	2.1E-11	-	-
PCB-169	-	2.7E-10	-	4.4E-11	-	7.9E-15	-	-	-	-	-	-	-	-	-	-	-	6.0E-09	-	3.2E-10	-	3.2E-10	-	-
PCB-189	-	2.7E-12	-	4.4E-13	-	7.9E-17	-	-	-	-	-	-	-	-	-	-	-	5.9E-11	-	3.2E-12	-	3.2E-12	-	-
PCB-77	-	1.9E-11	-	3.0E-12	-	5.4E-16	-	-	-	-	-	-	-	-	-	-	-	2.3E-10	-	2.2E-11	-	2.2E-11	-	-
PCB-81	-	1.0E-11	-	1.6E-12	-	2.9E-16	-	-	-	-	-	-	-	-	-	-	-	1.2E-10	-	1.2E-11	-	1.2E-11	-	-
Total PCB Congeners	-	9.8E-09	-	1.6E-09	-	2.8E-13	-	-	-	-	-	-	-	-	-	-	-	2.1E-07	-	1.1E-08	-	1.1E-08	-	-
Cumulative Risk	1.4E-02	4.3E-07	9.9E-04	5.2E-08	4.3E-06	3.0E-11	1.3E-02	4.8E-07	5.4E-05	2.5E-09	7.5E-05	2.9E-09	7.5E-05	2.5E-09	1.4E+00	8.4E-07	1.4E+00	6.4E-06	1.4E+00	1.8E-06	2.8E-02	9.6E-07	1.4E+00	8.4E-07
W/O Domestic Groundwater Use																			2.8E-02	9.7E-07			1.5E-04	5.3E-09

Table C3-8a (3 of 4)

Total Risk Estimates for the Adult Resident - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Reasonable Maximum Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation of Indoor Air_s		Inhalation Ambient Air_s		Inhalation of Indoor Air_{gw}		Inhalation Ambient Air_{gw}		Domestic Groundwater Use		Plant Consumption		Cumulative Risk		Soil Media Risk		Near-Surface Groundwater R	
	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)
Inorganic Compounds																								
Cadmium	1.6E-03	1.9E-07	6.2E-06	7.5E-10	1.1E-05	3.0E-10	-	-	-	-	-	-	-	-	-	-	2.8E-02	6.8E-05	1.6E-03	1.9E-07	1.6E-03	1.9E-07	-	-
Copper	1.6E-03	-	6.2E-05	-	3.7E-06	-	-	-	-	-	-	-	-	-	9.5E-03	-	4.4E-01	-	1.1E-02	-	1.6E-03	-	9.5E-03	-
Fluoride	-	-	-	-	-	-	-	-	-	-	-	-	-	-	2.0E-01	-	-	-	2.0E-01	-	-	-	2.0E-01	-
Lead	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Mercury	2.0E-02	-	8.1E-04	-	9.5E-06	-	-	-	-	-	-	-	-	-	-	-	5.6E-01	-	2.1E-02	-	2.1E-02	-	-	-
Methyl Mercury	5.0E-05	-	2.0E-06	-	-	-	-	-	-	-	-	-	-	-	-	-	2.4E-03	-	5.2E-05	-	5.2E-05	-	-	-
Nitrate	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1.9E-01	-	-	-	1.9E-01	-	-	-	1.9E-01	-
Silver	7.8E-04	-	3.1E-05	-	-	-	-	-	-	-	-	-	-	-	-	-	7.6E-05	-	8.2E-04	-	8.2E-04	-	-	-
Thallium	5.7E-03	-	2.3E-04	-	-	-	-	-	-	-	-	-	-	-	1.4E-01	-	3.9E-01	-	1.5E-01	-	5.9E-03	-	1.4E-01	-
Zinc	2.0E-03	-	8.0E-05	-	2.4E-06	-	-	-	-	-	-	-	-	-	-	-	1.4E-01	-	2.1E-03	-	2.1E-03	-	-	-
VOCs																								
1,1,1-Trichloroethane	-	-	-	-	-	-	1.3E-04	-	-	-	-	-	-	-	-	-	-	-	1.3E-04	-	1.3E-04	-	-	-
1,1,2-Trichloro-1,2,2-trifluoroethane	5.5E-10	-	2.2E-10	-	-	-	5.7E-05	-	-	-	-	-	-	-	-	-	3.9E-07	-	5.7E-05	-	5.7E-05	-	-	-
1,1-Dichloroethane	-	-	-	-	-	-	5.9E-04	1.5E-07	2.8E-06	7.0E-10	4.1E-06	1.0E-09	2.8E-06	7.0E-10	1.1E-03	2.0E-07	-	-	1.7E-03	3.5E-07	5.9E-04	1.5E-07	1.1E-03	2.0E-07
1,2-Dichloroethane	-	-	-	-	-	-	-	-	6.4E-05	2.1E-09	6.7E-05	2.2E-09	6.4E-05	2.1E-09	1.9E-03	5.7E-07	-	-	2.0E-03	5.8E-07	6.4E-05	2.1E-09	2.0E-03	5.8E-07
1,2-Dichloroethene (total)	4.8E-06	-	1.9E-06	-	-	-	-	-	-	-	-	-	-	-	-	-	2.4E-02	-	6.7E-06	-	6.7E-06	-	-	-
1-Chlorohexane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
2-Butanone	8.4E-08	-	3.4E-08	-	-	-	-	-	-	-	-	-	-	-	-	-	2.8E-03	-	1.2E-07	-	1.2E-07	-	-	-
2-Hexanone	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Acetone	6.4E-06	-	2.5E-06	-	-	-	-	-	3.7E-09	-	4.2E-09	-	3.7E-09	-	7.5E-04	-	4.2E-01	-	7.6E-04	-	8.9E-06	-	7.5E-04	-
Benzene	-	-	-	-	-	-	-	-	5.1E-05	1.4E-08	6.0E-05	1.7E-08	5.1E-05	1.4E-08	6.1E-03	7.8E-07	-	-	6.2E-03	8.1E-07	5.1E-05	1.4E-08	6.2E-03	8.1E-07
Carbon disulfide	-	-	-	-	-	-	-	-	-	-	1.4E-05	-	1.5E-05	-	1.1E-03	-	-	-	1.1E-03	-	-	-	1.1E-03	-
Chloromethane	-	-	-	-	-	-	-	-	-	-	3.0E-05	-	4.5E-05	-	-	-	-	-	7.5E-05	-	-	-	7.5E-05	-
cis-1,2-Dichloroethene	-	-	-	-	-	-	-	-	2.7E-05	-	3.0E-05	-	2.7E-05	-	2.2E-01	-	-	-	2.2E-01	-	2.7E-05	-	2.2E-01	-
Ethylbenzene	-	-	-	-	-	-	2.9E-04	-	-	-	-	-	-	-	-	-	-	-	2.9E-04	-	2.9E-04	-	-	-
m,p-Xylene	-	-	-	-	-	-	5.6E-03	-	-	-	-	-	-	-	-	-	-	-	5.6E-03	-	5.6E-03	-	-	-
Methylene chloride	3.0E-07	8.0E-11	1.2E-07	3.2E-11	-	-	2.1E-02	2.7E-06	1.8E-06	2.3E-10	1.4E-06	1.8E-10	1.8E-06	2.3E-10	4.5E-04	1.2E-07	4.3E-03	2.3E-05	2.2E-02	2.9E-06	2.1E-02	2.7E-06	4.5E-04	1.2E-07
Tetrachloroethene	1.2E-05	2.1E-08	4.8E-06	8.3E-09	-	-	8.2E-03	5.5E-07	-	-	-	-	-	-	-	-	6.3E-03	2.2E-04	8.2E-03	5.8E-07	8.2E-03	5.8E-07	-	-
Toluene	5.9E-06	-	2.3E-06	-	-	-	6.3E-05	-	-	-	-	-	-	-	9.5E-04	-	7.5E-03	-	1.0E-03	-	7.1E-05	-	9.5E-04	-
Trichloroethene	9.2E-04	1.2E-09	3.7E-04	4.6E-10	-	-	5.0E-04	1.9E-07	4.2E-06	1.6E-09	4.1E-06	1.6E-09	4.2E-06	1.6E-09	1.4E+00	1.8E-06	1.6E+00	3.9E-05	1.4E+00	1.9E-06	1.8E-03	1.9E-07	1.4E+00	1.8E-06
Xylenes (total)	3.5E-07	-	1.4E-07	-	-	-	-	-	-	-	-	-	-	-	-	-	2.7E-04	-	4.9E-07	-	4.9E-07	-	-	-
SVOCs																								
2-Methylnaphthalene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Acenaphthene	2.3E-06	-	1.2E-06	-	9.2E-11	-	-	-	-	-	-	-	-	-	-	-	5.5E-04	-	3.5E-06	-	3.5E-06	-	-	-
Acenaphthylene	3.9E-06	-	2.0E-06	-	1.6E-10	-	-	-	-	-	-	-	-	-	-	-	8.3E-04	-	5.9E-06	-	5.9E-06	-	-	-
Anthracene	3.7E-07	-	1.9E-07	-	1.5E-11	-	-	-	-	-	-	-	-	-	-	-	4.8E-05	-	5.7E-07	-	5.7E-07	-	-	-
Benzo(a)anthracene	-	7.8E-08	-	4.1E-08	-	1.0E-12	-	-	-	-	-	-	-	-	-	-	-	3.8E-05	-	1.2E-07	-	1.2E-07	-	-
Benzo(a)pyrene	-	7.8E-07	-	4.1E-07	-	1.0E-11	-	-	-	-	-	-	-	-	-	-	-	1.6E-04	-	1.2E-06	-	1.2E-06	-	-
Benzo(e)pyrene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Benzo(b)fluoranthene	-	1.4E-07	-	7.2E-08	-	1.8E-12	-	-	-	-	-	-	-	-	-	-	-	3.1E-05	-	2.1E-07	-	2.1E-07	-	-
Benzo(g,h,i)perylene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Benzo(k)fluoranthene	-	4.5E-08	-	2.3E-08	-	5.9E-13	-	-	-	-	-	-	-	-	-	-	-	1.3E-05	-	6.8E-08	-	6.8E-08	-	-
Chrysene	-	1.1E-08	-	5.9E-09	-	1.5E-13	-	-	-	-	-	-	-	-	-	-	-	5.1E-06	-	1.7E-08	-	1.7E-08	-	-
Dibenz(a,h)anthracene	-	1.5E-07	-	7.9E-08	-	6.2E-12	-	-	-	-	-	-	-	-	-	-	-	1.6E-05	-	2.3E-07	-	2.3E-07	-	-
Dibenzofuran	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Fluoranthene	1.3E-05	-	6.7E-06	-	5.2E-10	-	-	-	-	-	-	-	-	-	-	-	6.9E-04	-	2.0E-05	-	2.0E-05	-	-	-
Fluorene	3.4E-06	-	1.8E-06	-	1.4E-10	-	-	-	-	-	-	-	-	-	-	-	1.8E-04	-	5.2E-06	-	5.2E-06	-	-	-
Indeno(1,2,3-cd)pyrene	-	7.1E-08	-	3.7E-08	-	9.4E-13	-	-	-	-	-	-	-	-	-	-	-	4.4E-06	-	1.1E-07	-	1.1E-07	-	-
Naphthalene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Perylene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Phenanthrene	9.2E-06	-	4.7E-06	-	3.7E-10	-	-	-	-	-	-	-	-	-	-	-	1.0E-03	-	1.4E-05	-	1.4E-05	-	-	-
Pyrene	7.1E-06	-	3.7E-06	-	2.9E-10	-	-	-	-	-	-	-	-	-	-	-	4.3E-04	-	1.1E-05	-	1.1E-05	-	-	-
Total Petroleum Hydrocarbons																								
C11-C14(Kerosene Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
C14-C20(Diesel Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
C20-C30(Lubricant Oil Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

Table C3-8a (4 of 4)

Total Risk Estimates for the Adult Resident - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Reasonable Maximum Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation of Indoor Air_s		Inhalation Ambient Air_s		Inhalation of Indoor Air_{gw}		Inhalation Ambient Air_{gw}		Domestic Groundwater Use		Plant Consumption		Cumulative Risk		Soil Media Risk		Near-Surface Groundwater R	
	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)
Dioxins																								
2,3,7,8-TCDD	-	3.0E-08	-	3.6E-09	-	1.2E-12	-	-	-	-	-	-	-	-	-	-	-	-	-	3.4E-08	-	3.4E-08	-	-
1,2,3,7,8-PeCDD	-	1.2E-07	-	1.5E-08	-	5.0E-12	-	-	-	-	-	-	-	-	-	-	-	-	-	1.4E-07	-	1.4E-07	-	-
1,2,3,4,7,8-HxCDD	-	5.1E-08	-	6.2E-09	-	2.1E-12	-	-	-	-	-	-	-	-	-	-	-	-	-	5.8E-08	-	5.8E-08	-	-
1,2,3,6,7,8-HxCDD	-	1.7E-07	-	2.0E-08	-	6.8E-12	-	-	-	-	-	-	-	-	-	-	-	-	-	1.9E-07	-	1.9E-07	-	-
1,2,3,7,8,9-HxCDD	-	5.7E-08	-	6.8E-09	-	2.3E-12	-	-	-	-	-	-	-	-	-	-	-	-	-	6.4E-08	-	6.4E-08	-	-
1,2,3,4,6,7,8-HpCDD	-	2.0E-07	-	2.4E-08	-	2.7E-11	-	-	-	-	-	-	-	-	-	-	-	-	-	2.3E-07	-	2.3E-07	-	-
OCDD	-	2.9E-07	-	3.4E-08	-	1.2E-11	-	-	-	-	-	-	-	-	-	-	-	-	-	3.2E-07	-	3.2E-07	-	-
2,3,7,8-TCDF	-	4.5E-09	-	5.4E-10	-	1.8E-13	-	-	-	-	-	-	-	-	-	-	-	-	-	5.0E-09	-	5.0E-09	-	-
1,2,3,7,8-PeCDF	-	2.9E-10	-	3.5E-11	-	1.2E-14	-	-	-	-	-	-	-	-	-	-	-	-	-	3.3E-10	-	3.3E-10	-	-
2,3,4,7,8-PeCDF	-	2.7E-08	-	3.2E-09	-	1.1E-12	-	-	-	-	-	-	-	-	-	-	-	-	-	3.0E-08	-	3.0E-08	-	-
1,2,3,4,7,8-HxCDF	-	1.9E-08	-	2.3E-09	-	7.7E-13	-	-	-	-	-	-	-	-	-	-	-	-	-	2.1E-08	-	2.1E-08	-	-
1,2,3,6,7,8-HxCDF	-	1.8E-08	-	2.2E-09	-	7.3E-13	-	-	-	-	-	-	-	-	-	-	-	-	-	2.0E-08	-	2.0E-08	-	-
2,3,4,6,7,8-HxCDF	-	5.0E-08	-	6.0E-09	-	2.0E-12	-	-	-	-	-	-	-	-	-	-	-	-	-	5.6E-08	-	5.6E-08	-	-
1,2,3,7,8,9-HxCDF	-	5.5E-09	-	6.6E-10	-	2.2E-13	-	-	-	-	-	-	-	-	-	-	-	-	-	6.2E-09	-	6.2E-09	-	-
1,2,3,4,6,7,8-HpCDF	-	5.5E-08	-	6.5E-09	-	2.2E-12	-	-	-	-	-	-	-	-	-	-	-	-	-	6.1E-08	-	6.1E-08	-	-
1,2,3,4,7,8,9-HpCDF	-	5.3E-09	-	6.3E-10	-	2.1E-13	-	-	-	-	-	-	-	-	-	-	-	-	-	5.9E-09	-	5.9E-09	-	-
OCDF	-	4.1E-09	-	4.8E-10	-	1.6E-13	-	-	-	-	-	-	-	-	-	-	-	-	-	4.5E-09	-	4.5E-09	-	-
PCBs																								
Aroclor-1254	2.9E-02	3.8E-07	1.6E-02	2.1E-07	1.2E-06	1.5E-11	-	-	-	-	-	-	-	-	-	-	3.2E-01	8.1E-05	4.6E-02	5.9E-07	4.6E-02	5.9E-07	-	-
Aroclor-1260	-	6.4E-06	-	3.6E-06	-	2.6E-10	-	-	-	-	-	-	-	-	-	-	-	7.1E-04	-	1.0E-05	-	1.0E-05	-	-
PCB-105	-	9.7E-10	-	5.4E-10	-	3.9E-14	-	-	-	-	-	-	-	-	-	-	-	2.1E-07	-	1.5E-09	-	1.5E-09	-	-
PCB-114	-	1.7E-11	-	9.6E-12	-	6.9E-16	-	-	-	-	-	-	-	-	-	-	-	3.7E-09	-	2.7E-11	-	2.7E-11	-	-
PCB-118	-	1.9E-09	-	1.1E-09	-	7.8E-14	-	-	-	-	-	-	-	-	-	-	-	4.2E-07	-	3.0E-09	-	3.0E-09	-	-
PCB-123	-	2.7E-11	-	1.5E-11	-	1.1E-15	-	-	-	-	-	-	-	-	-	-	-	5.9E-09	-	4.3E-11	-	4.3E-11	-	-
PCB-126	-	2.5E-07	-	1.4E-07	-	1.0E-11	-	-	-	-	-	-	-	-	-	-	-	5.4E-05	-	3.9E-07	-	3.9E-07	-	-
PCB-156	-	6.4E-10	-	3.6E-10	-	2.6E-14	-	-	-	-	-	-	-	-	-	-	-	1.4E-07	-	1.0E-09	-	1.0E-09	-	-
PCB-157	-	2.9E-10	-	1.6E-10	-	1.2E-14	-	-	-	-	-	-	-	-	-	-	-	6.2E-08	-	4.5E-10	-	4.5E-10	-	-
PCB-167	-	5.0E-10	-	2.8E-10	-	2.0E-14	-	-	-	-	-	-	-	-	-	-	-	1.1E-07	-	7.9E-10	-	7.9E-10	-	-
PCB-169	-	7.5E-09	-	4.2E-09	-	3.0E-13	-	-	-	-	-	-	-	-	-	-	-	1.6E-06	-	1.2E-08	-	1.2E-08	-	-
PCB-189	-	7.5E-11	-	4.2E-11	-	3.0E-15	-	-	-	-	-	-	-	-	-	-	-	1.6E-08	-	1.2E-10	-	1.2E-10	-	-
PCB-77	-	5.0E-10	-	2.8E-10	-	2.0E-14	-	-	-	-	-	-	-	-	-	-	-	6.2E-08	-	7.8E-10	-	7.8E-10	-	-
PCB-81	-	2.7E-10	-	1.5E-10	-	1.1E-14	-	-	-	-	-	-	-	-	-	-	-	3.3E-08	-	4.1E-10	-	4.1E-10	-	-
Total PCB Congeners	-	2.6E-07	-	1.5E-07	-	1.1E-11	-	-	-	-	-	-	-	-	-	-	-	5.7E-05	-	4.1E-07	-	4.1E-07	-	-
Cumulative Risk	6.2E-02	9.4E-06	1.8E-02	4.6E-06	2.8E-05	6.6E-10	3.7E-02	3.6E-06	1.5E-04	1.9E-08	2.1E-04	2.2E-08	2.1E-04	1.9E-08	2.2E+00	3.4E-06	3.9E+00	1.4E-03	2.3E+00	2.1E-05	1.2E-01	1.8E-05	2.2E+00	3.5E-06
W/O Domestic Groundwater Use																			1.2E-01	1.8E-05			4.2E-04	4.0E-08

Notes:
Inhalation Indoor Air_{s-gw} - Exposure associated with indoor air concentrations of COPCs modeled from soil vapor, soil, or groundwater.
Inhalation Ambient Air_{s-gw} - Exposure associated with ambient air concentrations of COPCs modeled from soil or groundwater.
HQ - hazard quotient
HI - hazard index
Risk - incremental increased lifetime cancer risk
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCDD/PCDF - Polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.
PCB - polychlorinated biphenyls
COPC - chemical of potential concern
"-" indicates that either adequate toxicity data were not available for a chemical or the exposure pathway was not applicable to that chemical.
HIs and cancer risks for PCB congeners. These results not included in cumulative risk estimates.

Table C3-8b (1 of 4)

Total Risk Estimates for the Adult Resident - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Central Tendency Exposure

Chemical	Soil Ingestion HQ (unitless)	Soil Ingestion Risk (unitless)	Soil Dermal Contact HQ (unitless)	Soil Dermal Contact Risk (unitless)	Soil Particulate Inhalation HQ (unitless)	Soil Particulate Inhalation Risk (unitless)	Inhalation of Indoor Air$_s$ HQ (unitless)	Inhalation of Indoor Air$_s$ Risk (unitless)	Inhalation Ambient Air$_s$ HQ (unitless)	Inhalation Ambient Air$_s$ Risk (unitless)	Inhalation of Indoor Air$_{gw}$ HQ (unitless)	Inhalation of Indoor Air$_{gw}$ Risk (unitless)	Inhalation Ambient Air$_{gw}$ HQ (unitless)	Inhalation Ambient Air$_{gw}$ Risk (unitless)	Domestic Groundwater Use HQ (unitless)	Domestic Groundwater Use Risk (unitless)	Plant Consumption HQ (unitless)	Plant Consumption Risk (unitless)	Cumulative Risk HI (unitless)	Cumulative Risk Risk (unitless)	Soil Media Risk HI (unitless)	Soil Media Risk Risk (unitless)	Groundwater Risk HI (unitless)	Groundwater Risk Risk (unitless)	Surface Water Ingestion HI (unitless)	Surface Water Ingestion Risk (unitless)	Surface Water Dermal Contact HI (unitless)	Surface Water Dermal Contact Risk (unitless)	Surface Water Risk HI (unitless)	Surface Water Risk Risk (unitless)
Inorganic Compounds																														
Aluminum	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	5.0E-05	-	9.1E-06	-	5.9E-05	-
Antimony	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1.1E-04	-	2.0E-05	-	1.3E-04	-
Arsenic	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1.1E-03	3.7E-07	2.0E-04	6.8E-08	1.3E-03	4.4E-07
Barium	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Boron	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Cadmium	1.3E-04	6.0E-09	1.5E-07	6.8E-12	6.6E-07	6.7E-12	-	-	-	-	-	-	-	-	-	-	1.3E-02	5.7E-07	1.3E-04	6.0E-09	1.3E-04	6.0E-09	-	-	7.4E-06	3.4E-10	1.4E-06	6.2E-11	8.8E-06	4.0E-10
Chromium	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	7.5E-08	-	1.4E-08	-	8.9E-08	-
Copper	1.7E-04	-	1.9E-06	-	2.8E-07	-	-	-	-	-	-	-	-	-	6.2E-03	-	2.0E-01	-	6.3E-03	-	1.7E-04	-	6.2E-03	-	5.3E-06	-	9.7E-07	-	6.3E-06	-
Fluoride	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1.3E-01	-	-	-	1.3E-01	-	-	-	1.3E-01	-	-	-	-	-	-	-
Lead	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Mercury	4.0E-03	-	4.6E-05	-	1.3E-06	-	-	-	-	-	-	-	-	-	-	-	2.4E-01	-	4.0E-03	-	4.0E-03	-	-	-	1.9E-05	-	3.5E-06	-	2.3E-05	-
Methyl Mercury	1.2E-05	-	1.4E-07	-	-	-	-	-	-	-	-	-	-	-	-	-	1.2E-03	-	1.2E-05	-	1.2E-05	-	-	-	-	-	-	-	-	-
Nickel	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1.0E-05	-	3.6E-07	-	1.0E-05	-
Nitrate	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1.2E-01	-	-	-	1.2E-01	-	-	-	1.2E-01	-	-	-	-	-	-	-
Silver	1.8E-04	-	2.0E-06	-	-	-	-	-	-	-	-	-	-	-	-	-	2.1E-05	-	1.8E-04	-	1.8E-04	-	-	-	-	-	-	-	-	-
Thallium	8.5E-03	-	9.7E-05	-	-	-	-	-	-	-	-	-	-	-	9.2E-02	-	3.9E-01	-	1.0E-01	-	8.6E-03	-	9.2E-02	-	1.3E-04	-	2.3E-05	-	1.5E-04	-
Vanadium	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	2.0E-04	-	3.6E-05	-	2.3E-04	-
Zinc	1.5E-04	-	1.8E-06	-	1.3E-07	-	-	-	-	-	-	-	-	-	-	-	5.3E-02	-	1.6E-04	-	1.6E-04	-	-	-	-	-	-	-	-	-
VOCs																														
1,1,1-Trichloroethane	-	-	-	-	-	-	4.8E-05	-	-	-	-	-	-	-	-	-	-	-	4.8E-05	-	4.8E-05	-	-	-	1.3E-07	-	0.0E+00	-	1.3E-07	-
1,1,2-Trichloro-1,2,2-trifluoroethane	2.7E-10	-	3.1E-11	-	2.7E-14	-	1.8E-05	-	-	-	-	-	-	-	-	-	3.9E-07	-	1.8E-05	-	1.8E-05	-	-	-	-	-	-	-	-	-
1,1-Dichloroethane	-	-	-	-	-	-	2.1E-04	2.0E-08	9.8E-07	9.3E-11	1.4E-06	1.4E-10	9.8E-07	9.3E-11	7.1E-04	4.9E-08	-	-	9.2E-04	6.9E-08	2.1E-04	2.0E-08	7.1E-04	4.9E-08	-	-	-	-	-	-
1,2-Dichloroethane	-	-	-	-	-	-	-	-	2.3E-05	2.7E-10	2.4E-05	2.9E-10	2.3E-05	2.7E-10	1.2E-03	1.4E-07	-	-	1.3E-03	1.4E-07	2.3E-05	2.7E-10	1.3E-03	1.4E-07	-	-	-	-	-	-
1,2-Dichloroethene (total)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	9.6E-03	-	-	-	-	-	-	-	-	-	-	-	-	-
1-Chlorohexane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
2-Butanone	2.2E-08	-	2.5E-09	-	2.6E-13	-	-	-	-	-	-	-	-	-	-	-	2.8E-03	-	2.4E-08	-	2.4E-08	-	-	-	-	-	-	-	-	-
2-Hexanone	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Acetone	4.7E-07	-	5.4E-08	-	1.3E-11	-	-	-	1.3E-09	-	1.5E-09	-	1.3E-09	-	4.9E-04	-	6.8E-02	-	4.9E-04	-	5.3E-07	-	4.9E-04	-	-	-	-	-	-	-
Benzene	-	-	-	-	-	-	-	-	1.8E-05	1.9E-09	2.1E-05	2.2E-09	1.8E-05	1.9E-09	4.0E-03	1.9E-07	-	-	4.0E-03	1.9E-07	1.8E-05	1.9E-09	4.0E-03	1.9E-07	-	-	-	-	-	-
Carbon disulfide	-	-	-	-	-	-	-	-	-	-	5.0E-06	-	5.3E-06	-	7.1E-04	-	-	-	7.2E-04	-	-	-	7.2E-04	-	-	-	-	-	-	-
Chloromethane	-	-	-	-	-	-	-	-	-	-	1.1E-05	-	1.6E-05	-	-	-	-	-	2.7E-05	-	-	-	2.7E-05	-	-	-	-	-	-	-
cis-1,2-Dichloroethene	-	-	-	-	-	-	-	-	9.7E-06	-	1.1E-05	-	9.7E-06	-	1.4E-01	-	-	-	1.4E-01	-	9.7E-06	-	1.4E-01	-	-	-	-	-	-	-
Ethylbenzene	-	-	-	-	-	-	1.0E-04	-	-	-	-	-	-	-	-	-	-	-	1.0E-04	-	1.0E-04	-	-	-	-	-	-	-	-	-
m,p-Xylene	-	-	-	-	-	-	2.0E-03	-	-	-	-	-	-	-	-	-	-	-	2.0E-03	-	2.0E-03	-	-	-	-	-	-	-	-	-
Methylene chloride	1.1E-07	1.1E-11	1.3E-08	1.3E-12	1.7E-12	8.2E-17	7.6E-03	3.6E-07	6.4E-07	3.1E-11	5.0E-07	2.4E-11	6.4E-07	3.1E-11	2.9E-04	2.9E-08	4.3E-03	4.4E-07	7.8E-03	3.9E-07	7.6E-03	3.6E-07	2.9E-04	3.0E-08	-	-	-	-	-	-
Tetrachloroethene	-	-	-	-	-	-	2.9E-03	7.3E-08	-	-	-	-	-	-	-	-	1.5E-03	9.6E-07	2.9E-03	7.3E-08	2.9E-03	7.3E-08	-	-	-	-	-	-	-	-
Toluene	-	-	-	-	-	-	2.2E-05	-	-	-	-	-	-	-	6.2E-04	-	1.2E-03	-	6.4E-04	-	2.2E-05	-	6.2E-04	-	-	-	-	-	-	-
Trichloroethene	-	-	-	-	-	-	1.8E-04	2.5E-08	1.5E-06	2.1E-10	1.5E-06	2.1E-10	1.5E-06	2.1E-10	9.1E-01	4.3E-07	2.9E-01	1.4E-07	9.1E-01	4.5E-07	1.8E-04	2.6E-08	9.1E-01	4.3E-07	1.1E-04	5.0E-11	2.3E-04	1.1E-10	3.4E-04	1.6E-10
Xylenes (total)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1.3E-04	-	-	-	-	-	-	-	-	-	-	-	-	-
SVOCs																			-											
2-Methylnaphthalene	3.7E-06	-	5.5E-07	-	1.1E-10	-	-	-	-	-	-	-	-	-	-	-	-	-	4.2E-06	-	4.2E-06	-	-	-	-	-	-	-	-	-
Acenaphthene	7.8E-07	-	1.2E-07	-	2.2E-11	-	-	-	-	-	-	-	-	-	-	-	2.2E-04	-	9.0E-07	-	9.0E-07	-	-	-	-	-	-	-	-	-
Acenaphthylene	1.1E-07	-	1.7E-08	-	3.2E-12	-	-	-	-	-	-	-	-	-	-	-	3.1E-04	-	1.3E-07	-	1.3E-07	-	-	-	-	-	-	-	-	-
Anthracene	4.4E-07	-	6.6E-08	-	1.3E-11	-	-	-	-	-	-	-	-	-	-	-	2.9E-05	-	5.1E-07	-	5.1E-07	-	-	-	-	-	-	-	-	-
Benzo(a)anthracene	-	8.1E-08	-	1.2E-08	-	7.5E-13	-	-	-	-	-	-	-	-	-	-	-	1.7E-07	-	9.2E-08	-	9.2E-08	-	-	-	-	-	-	-	-
Benzo(a)pyrene	-	8.6E-07	-	1.3E-07	-	8.0E-12	-	-	-	-	-	-	-	-	-	-	-	7.2E-07	-	9.9E-07	-	9.9E-07	-	-	-	-	-	-	-	-
Benzo(e)pyrene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Benzo(b)fluoranthene	-	7.7E-08	-	1.1E-08	-	7.2E-13	-	-	-	-	-	-	-	-	-	-	-	1.0E-07	-	8.8E-08	-	8.8E-08	-	-	-	-	-	-	-	-
Benzo(g,h,i)perylene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Benzo(k)fluoranthene	-	8.5E-08	-	1.3E-08	-	8.0E-13	-	-	-	-	-	-	-	-	-	-	-	1.8E-08	-	9.8E-08	-	9.8E-08	-	-	-	-	-	-	-	-
Chrysene	-	5.9E-09	-	8.7E-10	-	5.5E-14	-	-	-	-	-	-	-	-	-	-	-	1.9E-08	-	6.7E-09	-	6.7E-09	-	-	-	-	-	-	-	-
Dibenz(a,h)anthracene	-	3.9E-08	-	5.8E-09	-	1.1E-12	-	-	-	-	-	-	-	-	-	-	-	1.0E-07	-	4.5E-08	-	4.5E-08	-	-	-	-	-	-	-	-
Dibenzofuran	9.6E-05	-	1.4E-05	-	2.7E-09	-	-	-	-	-	-	-	-	-	-	-	-	-	1.1E-04	-	1.1E-04	-	-	-	-	-	-	-	-	-
Fluoranthene	2.5E-05	-	3.7E-06	-	7.2E-10	-	-	-	-	-	-	-	-	-	-	-	1.1E-04	-	2.9E-05	-	2.9E-05	-	-	-	-	-	-	-	-	-
Fluorene	1.2E-06	-	1.8E-07	-	3.4E-11	-	-	-	-	-	-	-	-	-	-	-	8.2E-05	-	1.4E-06	-	1.4E-06	-	-	-	-	-	-	-	-	-
Indeno(1,2,3-cd)pyrene	-	3.7E-08	-	5.4E-09	-	3.4E-13	-	-	-	-	-	-	-	-	-	-	-	2.1E-08	-	4.2E-08	-	4.2E-08	-	-	-	-	-	-	-	-
Naphthalene	6.7E-07	-	1.0E-07	-	4.5E-10	5.5E-15	-	-	-	-	-	-	-	-	-	-	-	-	7.7E-07	5.5E-15	7.7E-07	5.5E-15	-	-	-	-	-	-	-	-
Perylene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Phenanthrene	1.6E-05	-	2.4E-06	-	4.6E-10	-	-	-	-	-	-	-	-	-	-	-	3.5E-04	-	1.8E-05	-	1.8E-05	-	-	-	-	-	-	-	-	-
Pyrene	2.8E-05	-	4.1E-06	-	8.0E-10	-	-	-	-	-	-	-	-	-	-	-	1.5E-04	-	3.2E-05	-	3.2E-05	-	-	-	-	-	-	-	-	-
Total Petroleum Hydrocarbons																														
C11-C14(Kerosene Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
C14-C20(Diesel Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
C20-C30(Lubricant Oil Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

Table C3-8b (2 of 4)

Total Risk Estimates for the Adult Resident - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Central Tendency Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation of Indoor Air$_s$		Inhalation Ambient Air$_s$		Inhalation of Indoor Air$_{gw}$		Inhalation Ambient Air$_{gw}$		Domestic Groundwater Use		Plant Consumption		Cumulative Risk		Soil Media Risk		Groundwater Risk		Near-Surface Groundwater Risk		Deep-Surface Groundwater Risk		Surface Water Risk	
	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)
Dioxins																														
2,3,7,8-TCDD	-	1.6E-09	-	5.4E-11	-	4.6E-14	-	-	-	-	-	-	-	-	-	-	-	-	-	1.6E-09	-	1.6E-09	-	-	-	-	-	-	-	-
1,2,3,7,8-PeCDD	-	6.0E-09	-	2.1E-10	-	1.7E-13	-	-	-	-	-	-	-	-	-	-	-	-	-	6.2E-09	-	6.2E-09	-	-	-	1.3E-09	-	1.9E-07	-	1.9E-07
1,2,3,4,7,8-HxCDD	-	1.7E-09	-	6.0E-11	-	5.0E-14	-	-	-	-	-	-	-	-	-	-	-	-	-	1.8E-09	-	1.8E-09	-	-	-	1.9E-10	-	2.8E-08	-	2.8E-08
1,2,3,6,7,8-HxCDD	-	8.9E-09	-	3.0E-10	-	2.6E-13	-	-	-	-	-	-	-	-	-	-	-	-	-	9.2E-09	-	9.2E-09	-	-	-	2.1E-09	-	3.0E-07	-	3.0E-07
1,2,3,7,8,9-HxCDD	-	3.7E-09	-	1.3E-10	-	1.1E-13	-	-	-	-	-	-	-	-	-	-	-	-	-	3.8E-09	-	3.8E-09	-	-	-	1.1E-09	-	1.6E-07	-	1.6E-07
1,2,3,4,6,7,8-HpCDD	-	7.5E-09	-	2.6E-10	-	7.2E-13	-	-	-	-	-	-	-	-	-	-	-	-	-	7.8E-09	-	7.8E-09	-	-	-	5.0E-10	-	7.4E-08	-	7.5E-08
OCDD	-	1.2E-08	-	4.1E-10	-	3.4E-13	-	-	-	-	-	-	-	-	-	-	-	-	-	1.2E-08	-	1.2E-08	-	-	-	4.1E-10	-	6.0E-08	-	6.0E-08
2,3,7,8-TCDF	-	3.9E-10	-	1.3E-11	-	1.1E-14	-	-	-	-	-	-	-	-	-	-	-	-	-	4.0E-10	-	4.0E-10	-	-	-	3.0E-10	-	4.5E-08	-	4.5E-08
1,2,3,7,8-PeCDF	-	1.4E-11	-	4.8E-13	-	4.1E-16	-	-	-	-	-	-	-	-	-	-	-	-	-	1.5E-11	-	1.5E-11	-	-	-	5.0E-11	-	7.3E-09	-	7.4E-09
2,3,4,7,8-PeCDF	-	1.3E-09	-	4.6E-11	-	3.9E-14	-	-	-	-	-	-	-	-	-	-	-	-	-	1.4E-09	-	1.4E-09	-	-	-	4.1E-09	-	6.1E-07	-	6.1E-07
1,2,3,4,7,8-HxCDF	-	9.4E-10	-	3.2E-11	-	2.7E-14	-	-	-	-	-	-	-	-	-	-	-	-	-	9.7E-10	-	9.7E-10	-	-	-	1.4E-09	-	2.1E-07	-	2.1E-07
1,2,3,6,7,8-HxCDF	-	7.7E-10	-	2.6E-11	-	2.2E-14	-	-	-	-	-	-	-	-	-	-	-	-	-	7.9E-10	-	7.9E-10	-	-	-	8.4E-10	-	1.2E-07	-	1.2E-07
2,3,4,6,7,8-HxCDF	-	1.4E-09	-	4.9E-11	-	4.1E-14	-	-	-	-	-	-	-	-	-	-	-	-	-	1.5E-09	-	1.5E-09	-	-	-	1.5E-09	-	2.1E-07	-	2.2E-07
1,2,3,7,8,9-HxCDF	-	1.5E-10	-	5.1E-12	-	4.3E-15	-	-	-	-	-	-	-	-	-	-	-	-	-	1.5E-10	-	1.5E-10	-	-	-	1.4E-09	-	2.0E-07	-	2.1E-07
1,2,3,4,6,7,8-HpCDF	-	2.9E-09	-	1.0E-10	-	8.4E-14	-	-	-	-	-	-	-	-	-	-	-	-	-	3.0E-09	-	3.0E-09	-	-	-	2.1E-10	-	3.1E-08	-	3.1E-08
1,2,3,4,7,8,9-HpCDF	-	2.5E-10	-	8.7E-12	-	7.3E-15	-	-	-	-	-	-	-	-	-	-	-	-	-	2.6E-10	-	2.6E-10	-	-	-	1.1E-10	-	1.6E-08	-	1.6E-08
OCDF	-	2.4E-10	-	8.2E-12	-	6.9E-15	-	-	-	-	-	-	-	-	-	-	-	-	-	2.5E-10	-	2.5E-10	-	-	-	1.7E-11	-	2.4E-09	-	2.4E-09
PCBs																														
Aroclor-1254	5.6E-03	2.7E-08	8.9E-04	4.3E-09	1.6E-07	7.7E-13	-	-	-	-	-	-	-	-	-	-	1.2E-01	5.8E-07	6.5E-03	3.1E-08	6.5E-03	3.1E-08	-	-	-	-	-	-	-	-
Aroclor-1260	-	2.3E-07	-	3.7E-08	-	6.6E-12	-	-	-	-	-	-	-	-	-	-	-	2.4E-06	-	2.7E-07	-	2.7E-07	-	-	-	-	-	-	-	-
PCB-105	-	3.8E-11	-	6.1E-12	-	1.1E-15	-	-	-	-	-	-	-	-	-	-	-	7.9E-10	-	4.4E-11	-	4.4E-11	-	-	-	-	-	-	-	-
PCB-114	-	7.3E-13	-	1.2E-13	-	2.1E-17	-	-	-	-	-	-	-	-	-	-	-	1.5E-11	-	8.4E-13	-	8.4E-13	-	-	-	-	-	-	-	-
PCB-118	-	7.7E-11	-	1.2E-11	-	2.2E-15	-	-	-	-	-	-	-	-	-	-	-	1.6E-09	-	8.9E-11	-	8.9E-11	-	-	-	-	-	-	-	-
PCB-123	-	1.1E-12	-	1.7E-13	-	3.1E-17	-	-	-	-	-	-	-	-	-	-	-	2.2E-11	-	1.2E-12	-	1.2E-12	-	-	-	-	-	-	-	-
PCB-126	-	9.8E-09	-	1.6E-09	-	2.8E-13	-	-	-	-	-	-	-	-	-	-	-	2.0E-07	-	1.1E-08	-	1.1E-08	-	-	-	-	-	-	-	-
PCB-156	-	2.5E-11	-	4.0E-12	-	7.2E-16	-	-	-	-	-	-	-	-	-	-	-	5.2E-10	-	2.9E-11	-	2.9E-11	-	-	-	-	-	-	-	-
PCB-157	-	1.1E-11	-	1.8E-12	-	3.2E-16	-	-	-	-	-	-	-	-	-	-	-	2.3E-10	-	1.3E-11	-	1.3E-11	-	-	-	-	-	-	-	-
PCB-167	-	1.9E-11	-	3.1E-12	-	5.5E-16	-	-	-	-	-	-	-	-	-	-	-	4.0E-10	-	2.2E-11	-	2.2E-11	-	-	-	-	-	-	-	-
PCB-169	-	2.9E-10	-	4.6E-11	-	8.3E-15	-	-	-	-	-	-	-	-	-	-	-	6.0E-09	-	3.3E-10	-	3.3E-10	-	-	-	-	-	-	-	-
PCB-189	-	2.9E-12	-	4.6E-13	-	8.2E-17	-	-	-	-	-	-	-	-	-	-	-	5.9E-11	-	3.3E-12	-	3.3E-12	-	-	-	-	-	-	-	-
PCB-77	-	2.0E-11	-	3.1E-12	-	5.6E-16	-	-	-	-	-	-	-	-	-	-	-	2.3E-10	-	2.3E-11	-	2.3E-11	-	-	-	-	-	-	-	-
PCB-81	-	1.0E-11	-	1.7E-12	-	3.0E-16	-	-	-	-	-	-	-	-	-	-	-	1.2E-10	-	1.2E-11	-	1.2E-11	-	-	-	-	-	-	-	-
Cumulative Risk	1.9E-02	1.5E-06	1.1E-03	2.2E-07	2.6E-06	2.8E-11	1.3E-02	4.8E-07	5.4E-05	2.5E-09	7.5E-05	2.9E-09	7.5E-05	2.5E-09	1.4E+00	8.4E-07	1.4E+00	6.3E-06	1.4E+00	3.0E-06	3.3E-02	2.2E-06	1.4E+00	8.4E-07	1.7E-03	3.9E-07	5.3E-04	2.3E-06	2.3E-03	2.7E-06
W/O Domestic Groundwater Use																			3.3E-02	2.2E-06			1.5E-04	5.3E-09						

Table C3-8b (3 of 4)

Total Risk Estimates for the Adult Resident - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Reasonable Maximum Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation of Indoor Air$_s$		Inhalation Ambient Air$_s$		Inhalation of Indoor Air$_{gw}$		Inhalation Ambient Air$_{gw}$		Domestic Groundwater Use		Plant Consumption		Cumulative Risk		Soil Media Risk		Groundwater Risk		Surface Water Ingestion		Surface Water Dermal Contact		Surface Water Risk	
	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)
Inorganic Compounds																														
Aluminum	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	3.3E-04	-	1.2E-04	-	4.5E-04	-
Antimony	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	7.5E-04	-	2.7E-04	-	1.0E-03	-
Arsenic	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	7.2E-03	6.5E-06	2.6E-03	1.2E-06	9.8E-03	7.7E-06
Barium	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Boron	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Cadmium	4.2E-04	5.1E-08	1.7E-06	2.0E-10	2.9E-06	8.1E-11	-	-	-	-	-	-	-	-	-	-	2.8E-02	6.8E-05	4.2E-04	5.1E-08	4.2E-04	5.1E-08	-	-	5.5E-05	6.7E-09	2.0E-05	1.2E-09	7.5E-05	7.9E-09
Chromium	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	4.4E-07	-	1.6E-07	-	6.0E-07	-
Copper	6.0E-04	-	2.4E-05	-	1.4E-06	-	-	-	-	-	-	-	-	-	9.5E-03	-	4.4E-01	-	1.0E-02	-	6.3E-04	-	9.5E-03	-	2.8E-05	-	1.0E-05	-	3.8E-05	-
Fluoride	-	-	-	-	-	-	-	-	-	-	-	-	-	-	2.0E-01	-	-	-	2.0E-01	-	-	-	2.0E-01	-	-	-	-	-	-	-
Lead	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Mercury	1.7E-02	-	6.9E-04	-	8.2E-06	-	-	-	-	-	-	-	-	-	-	-	5.6E-01	-	1.8E-02	-	1.8E-02	-	-	-	8.9E-05	-	3.2E-05	-	1.2E-04	-
Methyl Mercury	5.0E-05	-	2.0E-06	-	-	-	-	-	-	-	-	-	-	-	-	-	2.4E-03	-	5.2E-05	-	5.2E-05	-	-	-	-	-	-	-	-	-
Nickel	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	4.0E-05	-	2.9E-06	-	4.3E-05	-
Nitrate	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1.9E-01	-	-	-	1.9E-01	-	-	-	1.9E-01	-	-	-	-	-	-	-
Silver	7.3E-04	-	2.9E-05	-	-	-	-	-	-	-	-	-	-	-	-	-	7.6E-05	-	7.6E-04	-	7.6E-04	-	-	-	-	-	-	-	-	-
Thallium	6.1E-02	-	2.5E-03	-	-	-	-	-	-	-	-	-	-	-	1.4E-01	-	3.9E-01	-	2.1E-01	-	6.4E-02	-	1.4E-01	-	5.1E-04	-	1.9E-04	-	7.0E-04	-
Vanadium	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1.1E-03	-	4.0E-04	-	1.5E-03	-
Zinc	1.0E-03	-	4.0E-05	-	1.2E-06	-	-	-	-	-	-	-	-	-	-	-	1.4E-01	-	1.0E-03	-	1.0E-03	-	-	-	-	-	-	-	-	-
VOCs																														
1,1,1-Trichloroethane	-	-	-	-	-	-	1.3E-04	-	-	-	-	-	-	-	-	-	-	-	1.3E-04	-	1.3E-04	-	-	-	5.3E-07	-	0.0E+00	-	5.3E-07	-
1,1,2-Trichloro-1,2,2-trifluoroethane	5.5E-10	-	2.2E-10	-	-	-	5.7E-05	-	-	-	-	-	-	-	-	-	3.9E-07	-	5.7E-05	-	5.7E-05	-	-	-	-	-	-	-	-	-
1,1-Dichloroethane	-	-	-	-	-	-	5.9E-04	1.5E-07	2.8E-06	7.0E-10	4.1E-06	1.0E-09	2.8E-06	7.0E-10	1.1E-03	2.0E-07	-	-	1.7E-03	3.5E-07	5.9E-04	1.5E-07	1.1E-03	2.0E-07	-	-	-	-	-	-
1,2-Dichloroethane	-	-	-	-	-	-	-	-	6.4E-05	2.1E-09	6.7E-05	2.2E-09	6.4E-05	2.1E-09	1.9E-03	5.7E-07	-	-	2.0E-03	5.8E-07	6.4E-05	2.1E-09	2.0E-03	5.8E-07	-	-	-	-	-	-
1,2-Dichloroethene (total)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	2.4E-02	-	-	-	-	-	-	-	-	-	-	-	-	-
1-Chlorohexane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
2-Butanone	6.1E-08	-	2.4E-08	-	-	-	-	-	-	-	-	-	-	-	-	-	2.8E-03	-	8.6E-08	-	8.6E-08	-	-	-	-	-	-	-	-	-
2-Hexanone	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Acetone	7.9E-06	-	3.2E-06	-	-	-	-	-	3.7E-09	-	4.2E-09	-	3.7E-09	-	7.5E-04	-	4.2E-01	-	7.6E-04	-	1.1E-05	-	7.5E-04	-	-	-	-	-	-	-
Benzene	-	-	-	-	-	-	-	-	5.1E-05	1.4E-08	6.0E-05	1.7E-08	5.1E-05	1.4E-08	6.1E-03	7.8E-07	-	-	6.2E-03	8.1E-07	5.1E-05	1.4E-08	6.2E-03	8.1E-07	-	-	-	-	-	-
Carbon disulfide	-	-	-	-	-	-	-	-	-	-	1.4E-05	-	1.5E-05	-	1.1E-03	-	-	-	1.1E-03	-	-	-	1.1E-03	-	-	-	-	-	-	-
Chloromethane	-	-	-	-	-	-	-	-	-	-	3.0E-05	-	4.5E-05	-	-	-	-	-	7.5E-05	-	-	-	7.5E-05	-	-	-	-	-	-	-
cis-1,2-Dichloroethene	-	-	-	-	-	-	-	-	2.7E-05	-	3.0E-05	-	2.7E-05	-	2.2E-01	-	-	-	2.2E-01	-	2.7E-05	-	2.2E-01	-	-	-	-	-	-	-
Ethylbenzene	-	-	-	-	-	-	2.9E-04	-	-	-	-	-	-	-	-	-	-	-	2.9E-04	-	2.9E-04	-	-	-	-	-	-	-	-	-
m,p-Xylene	-	-	-	-	-	-	5.6E-03	-	-	-	-	-	-	-	-	-	-	-	5.6E-03	-	5.6E-03	-	-	-	-	-	-	-	-	-
Methylene chloride	2.7E-07	7.2E-11	1.1E-07	2.9E-11	-	-	2.1E-02	2.7E-06	1.8E-06	2.3E-10	1.4E-06	1.8E-10	1.8E-06	2.3E-10	4.5E-04	1.2E-07	4.3E-03	2.3E-05	2.2E-02	2.9E-06	2.1E-02	2.7E-06	4.5E-04	1.2E-07	-	-	-	-	-	-
Tetrachloroethene	-	-	-	-	-	-	8.2E-03	5.5E-07	-	-	-	-	-	-	-	-	6.3E-03	2.2E-04	8.2E-03	5.5E-07	8.2E-03	5.5E-07	-	-	-	-	-	-	-	-
Toluene	-	-	-	-	-	-	6.3E-05	-	-	-	-	-	-	-	9.5E-04	-	7.5E-03	-	1.0E-03	-	6.3E-05	-	9.5E-04	-	-	-	-	-	-	-
Trichloroethene	-	-	-	-	-	-	5.0E-04	1.9E-07	4.2E-06	1.6E-09	4.1E-06	1.6E-09	4.2E-06	1.6E-09	1.4E+00	1.8E-06	1.6E+00	3.9E-05	1.4E+00	1.9E-06	5.1E-04	1.9E-07	1.4E+00	1.8E-06	4.3E-04	5.4E-10	1.9E-03	1.2E-09	2.3E-03	1.7E-09
Xylenes (total)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	2.7E-04	-	-	-	-	-	-	-	-	-	-	-	-	-
SVOCs																														
2-Methylnaphthalene	8.6E-06	-	4.4E-06	-	3.5E-10	-	-	-	-	-	-	-	-	-	-	-	-	-	1.3E-05	-	1.3E-05	-	-	-	-	-	-	-	-	-
Acenaphthene	5.8E-06	-	3.0E-06	-	2.3E-10	-	-	-	-	-	-	-	-	-	-	-	8.2E-04	-	8.8E-06	-	8.8E-06	-	-	-	-	-	-	-	-	-
Acenaphthylene	6.2E-07	-	3.2E-07	-	2.5E-11	-	-	-	-	-	-	-	-	-	-	-	4.7E-04	-	9.5E-07	-	9.5E-07	-	-	-	-	-	-	-	-	-
Anthracene	4.5E-06	-	2.3E-06	-	1.8E-10	-	-	-	-	-	-	-	-	-	-	-	7.3E-05	-	6.8E-06	-	6.8E-06	-	-	-	-	-	-	-	-	-
Benzo(a)anthracene	-	7.4E-06	-	3.8E-06	-	9.7E-11	-	-	-	-	-	-	-	-	-	-	-	1.7E-05	-	1.1E-05	-	1.1E-05	-	-	-	-	-	-	-	-
Benzo(a)pyrene	-	7.9E-05	-	4.1E-05	-	1.0E-09	-	-	-	-	-	-	-	-	-	-	-	1.6E-04	-	1.2E-04	-	1.2E-04	-	-	-	-	-	-	-	-
Benzo(e)pyrene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Benzo(b)fluoranthene	-	3.6E-06	-	1.9E-06	-	4.7E-11	-	-	-	-	-	-	-	-	-	-	-	2.5E-05	-	5.5E-06	-	5.5E-06	-	-	-	-	-	-	-	-
Benzo(g,h,i)perylene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Benzo(k)fluoranthene	-	7.9E-06	-	4.1E-06	-	1.0E-10	-	-	-	-	-	-	-	-	-	-	-	9.4E-07	-	1.2E-05	-	1.2E-05	-	-	-	-	-	-	-	-
Chrysene	-	3.4E-07	-	1.8E-07	-	4.5E-12	-	-	-	-	-	-	-	-	-	-	-	5.1E-06	-	5.2E-07	-	5.2E-07	-	-	-	-	-	-	-	-
Dibenz(a,h)anthracene	-	2.0E-06	-	1.0E-06	-	8.1E-11	-	-	-	-	-	-	-	-	-	-	-	1.3E-06	-	3.0E-06	-	3.0E-06	-	-	-	-	-	-	-	-
Dibenzofuran	1.9E-04	-	9.9E-05	-	7.8E-09	-	-	-	-	-	-	-	-	-	-	-	-	-	2.9E-04	-	2.9E-04	-	-	-	-	-	-	-	-	-
Fluoranthene	4.5E-04	-	2.3E-04	-	1.8E-08	-	-	-	-	-	-	-	-	-	-	-	6.9E-04	-	6.8E-04	-	6.8E-04	-	-	-	-	-	-	-	-	-
Fluorene	8.9E-06	-	4.6E-06	-	3.6E-10	-	-	-	-	-	-	-	-	-	-	-	3.3E-04	-	1.3E-05	-	1.3E-05	-	-	-	-	-	-	-	-	-
Indeno(1,2,3-cd)pyrene	-	1.8E-06	-	9.1E-07	-	2.3E-11	-	-	-	-	-	-	-	-	-	-	-	4.4E-06	-	2.7E-06	-	2.7E-06	-	-	-	-	-	-	-	-
Naphthalene	4.0E-06	-	2.1E-06	-	3.7E-09	1.2E-13	-	-	-	-	-	-	-	-	-	-	-	-	6.0E-06	1.2E-13	6.0E-06	1.2E-13	-	-	-	-	-	-	-	-
Perylene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Phenanthrene	2.7E-04	-	1.4E-04	-	1.1E-08	-	-	-	-	-	-	-	-	-	-	-	9.2E-04	-	4.0E-04	-	4.0E-04	-	-	-	-	-	-	-	-	-
Pyrene	5.0E-04	-	2.6E-04	-	2.0E-08	-	-	-	-	-	-	-	-	-	-	-	8.0E-04	-	7.6E-04	-	7.6E-04	-	-	-	-	-	-	-	-	-
Total Petroleum Hydrocarbons																														
C11-C14(Kerosene Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
C14-C20(Diesel Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
C20-C30(Lubricant Oil Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

Table C3-8b (4 of 4)

Total Risk Estimates for the Adult Resident - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Reasonable Maximum Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation of Indoor Air$_s$		Inhalation Ambient Air$_s$		Inhalation of Indoor Air$_{gw}$		Inhalation Ambient Air$_{gw}$		Domestic Groundwater Use		Plant Consumption		Cumulative Risk		Soil Media Risk		Groundwater Risk		Near-Surface Groundwater Risk		Deep-Surface Groundwater Risk		Surface Water Risk	
	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)
Dioxins																														
2,3,7,8-TCDD	-	2.0E-08	-	2.4E-09	-	8.0E-13	-	-	-	-	-	-	-	-	-	-	-	-	-	2.2E-08	-	2.2E-08	-	-	-	-	-	-	-	-
1,2,3,7,8-PeCDD	-	7.5E-08	-	9.0E-09	-	3.0E-12	-	-	-	-	-	-	-	-	-	-	-	-	-	8.4E-08	-	8.4E-08	-	-	-	1.4E-08	-	2.0E-06	-	2.0E-06
1,2,3,4,7,8-HxCDD	-	2.1E-08	-	2.5E-09	-	8.6E-13	-	-	-	-	-	-	-	-	-	-	-	-	-	2.4E-08	-	2.4E-08	-	-	-	2.0E-09	-	3.0E-07	-	3.0E-07
1,2,3,6,7,8-HxCDD	-	1.1E-07	-	1.3E-08	-	4.3E-12	-	-	-	-	-	-	-	-	-	-	-	-	-	1.2E-07	-	1.2E-07	-	-	-	5.4E-08	-	7.9E-06	-	8.0E-06
1,2,3,7,8,9-HxCDD	-	4.9E-08	-	5.9E-09	-	2.0E-12	-	-	-	-	-	-	-	-	-	-	-	-	-	5.5E-08	-	5.5E-08	-	-	-	1.1E-08	-	1.7E-06	-	1.7E-06
1,2,3,4,6,7,8-HpCDD	-	8.5E-08	-	1.0E-08	-	1.1E-11	-	-	-	-	-	-	-	-	-	-	-	-	-	9.5E-08	-	9.5E-08	-	-	-	4.7E-08	-	6.9E-06	-	6.9E-06
OCDD	-	1.2E-07	-	1.5E-08	-	5.1E-12	-	-	-	-	-	-	-	-	-	-	-	-	-	1.4E-07	-	1.4E-07	-	-	-	6.5E-09	-	9.5E-07	-	9.6E-07
2,3,7,8-TCDF	-	4.4E-09	-	5.3E-10	-	1.8E-13	-	-	-	-	-	-	-	-	-	-	-	-	-	5.0E-09	-	5.0E-09	-	-	-	3.6E-09	-	5.4E-07	-	5.4E-07
1,2,3,7,8-PeCDF	-	2.0E-10	-	2.4E-11	-	8.1E-15	-	-	-	-	-	-	-	-	-	-	-	-	-	2.2E-10	-	2.2E-10	-	-	-	5.3E-10	-	7.8E-08	-	7.9E-08
2,3,4,7,8-PeCDF	-	1.5E-08	-	1.8E-09	-	6.2E-13	-	-	-	-	-	-	-	-	-	-	-	-	-	1.7E-08	-	1.7E-08	-	-	-	4.9E-08	-	7.2E-06	-	7.2E-06
1,2,3,4,7,8-HxCDF	-	9.9E-09	-	1.2E-09	-	4.0E-13	-	-	-	-	-	-	-	-	-	-	-	-	-	1.1E-08	-	1.1E-08	-	-	-	1.7E-08	-	2.6E-06	-	2.6E-06
1,2,3,6,7,8-HxCDF	-	9.3E-09	-	1.1E-09	-	3.8E-13	-	-	-	-	-	-	-	-	-	-	-	-	-	1.0E-08	-	1.0E-08	-	-	-	9.0E-09	-	1.3E-06	-	1.3E-06
2,3,4,6,7,8-HxCDF	-	1.6E-08	-	1.9E-09	-	6.6E-13	-	-	-	-	-	-	-	-	-	-	-	-	-	1.8E-08	-	1.8E-08	-	-	-	1.7E-08	-	2.6E-06	-	2.6E-06
1,2,3,7,8,9-HxCDF	-	1.0E-09	-	1.2E-10	-	4.0E-14	-	-	-	-	-	-	-	-	-	-	-	-	-	1.1E-09	-	1.1E-09	-	-	-	1.9E-08	-	2.8E-06	-	2.8E-06
1,2,3,4,6,7,8-HpCDF	-	2.8E-08	-	3.4E-09	-	1.2E-12	-	-	-	-	-	-	-	-	-	-	-	-	-	3.2E-08	-	3.2E-08	-	-	-	4.1E-09	-	6.1E-07	-	6.1E-07
1,2,3,4,7,8,9-HpCDF	-	2.4E-09	-	2.9E-10	-	9.8E-14	-	-	-	-	-	-	-	-	-	-	-	-	-	2.7E-09	-	2.7E-09	-	-	-	1.1E-09	-	1.7E-07	-	1.7E-07
OCDF	-	2.6E-09	-	3.1E-10	-	1.0E-13	-	-	-	-	-	-	-	-	-	-	-	-	-	2.9E-09	-	2.9E-09	-	-	-	3.3E-10	-	4.8E-08	-	4.8E-08
PCBs																														
Aroclor-1254	2.9E-02	3.8E-07	1.6E-02	2.1E-07	1.2E-06	1.5E-11	-	-	-	-	-	-	-	-	-	-	3.2E-01	8.1E-05	4.6E-02	5.9E-07	4.6E-02	5.9E-07	-	-	-	-	-	-	-	-
Aroclor-1260	-	6.7E-06	-	3.8E-06	-	2.7E-10	-	-	-	-	-	-	-	-	-	-	-	7.1E-04	-	1.0E-05	-	1.0E-05	-	-	-	-	-	-	-	-
PCB-105	-	1.1E-09	-	6.0E-10	-	4.3E-14	-	-	-	-	-	-	-	-	-	-	-	2.1E-07	-	1.7E-09	-	1.7E-09	-	-	-	-	-	-	-	-
PCB-114	-	1.9E-11	-	1.1E-11	-	7.7E-16	-	-	-	-	-	-	-	-	-	-	-	3.7E-09	-	3.0E-11	-	3.0E-11	-	-	-	-	-	-	-	-
PCB-118	-	2.1E-09	-	1.2E-09	-	8.7E-14	-	-	-	-	-	-	-	-	-	-	-	4.2E-07	-	3.3E-09	-	3.3E-09	-	-	-	-	-	-	-	-
PCB-123	-	3.0E-11	-	1.7E-11	-	1.2E-15	-	-	-	-	-	-	-	-	-	-	-	5.9E-09	-	4.7E-11	-	4.7E-11	-	-	-	-	-	-	-	-
PCB-126	-	2.8E-07	-	1.6E-07	-	1.1E-11	-	-	-	-	-	-	-	-	-	-	-	5.4E-05	-	4.3E-07	-	4.3E-07	-	-	-	-	-	-	-	-
PCB-156	-	7.1E-10	-	4.0E-10	-	2.9E-14	-	-	-	-	-	-	-	-	-	-	-	1.4E-07	-	1.1E-09	-	1.1E-09	-	-	-	-	-	-	-	-
PCB-157	-	3.2E-10	-	1.8E-10	-	1.3E-14	-	-	-	-	-	-	-	-	-	-	-	6.2E-08	-	5.0E-10	-	5.0E-10	-	-	-	-	-	-	-	-
PCB-167	-	5.6E-10	-	3.1E-10	-	2.3E-14	-	-	-	-	-	-	-	-	-	-	-	1.1E-07	-	8.7E-10	-	8.7E-10	-	-	-	-	-	-	-	-
PCB-169	-	8.3E-09	-	4.7E-09	-	3.4E-13	-	-	-	-	-	-	-	-	-	-	-	1.6E-06	-	1.3E-08	-	1.3E-08	-	-	-	-	-	-	-	-
PCB-189	-	8.3E-11	-	4.7E-11	-	3.4E-15	-	-	-	-	-	-	-	-	-	-	-	1.6E-08	-	1.3E-10	-	1.3E-10	-	-	-	-	-	-	-	-
PCB-77	-	5.6E-10	-	3.1E-10	-	2.2E-14	-	-	-	-	-	-	-	-	-	-	-	6.2E-08	-	8.7E-10	-	8.7E-10	-	-	-	-	-	-	-	-
PCB-81	-	2.9E-10	-	1.6E-10	-	1.2E-14	-	-	-	-	-	-	-	-	-	-	-	3.3E-08	-	4.6E-10	-	4.6E-10	-	-	-	-	-	-	-	-
Cumulative Risk	1.1E-01	1.1E-04	2.0E-02	5.7E-05	1.5E-05	1.8E-09	3.7E-02	3.6E-06	1.5E-04	1.9E-08	2.1E-04	2.2E-08	2.1E-04	1.9E-08	2.2E+00	3.4E-06	3.9E+00	1.4E-03	2.3E+00	1.7E-04	1.7E-01	1.7E-04	2.2E+00	3.5E-06	1.1E-02	6.8E-06	5.5E-03	3.9E-05	1.6E-02	4.5E-05
W/O Domestic Groundwater Use																			1.7E-01	1.7E-04			4.2E-04	4.0E-08						

Notes:

Inhalation Indoor Air$_{s-gw}$ - Exposure associated with indoor air concentrations of COPCs modeled from soil vapor, soil, or groundwater.

Inhalation Ambient Air$_{s-gw}$ - Exposure associated with ambient air concentrations of COPCs modeled from soil or groundwater.

HQ - hazard quotient
HI - hazard index
Risk - incremental increased lifetime cancer risk
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCDD/PCDF - Polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.
PCB - polychlorinated biphenyls
COPC - chemical of potential concern
"-" indicates that either adequate toxicity data were not available for a chemical or the exposure pathway was not applicable to that chemical.

Table C3-9a (1 of 4)

Total Risk Estimates for the Child Resident - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Central Tendency Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation of Indoor Air_s		Inhalation Ambient Air_s		Inhalation of Indoor Air_{gw}		Inhalation Ambient Air_{gw}		Domestic Groundwater Use		Plant Consumption		Cumulative Risk		Soil Media Risk		Groundwater Risk	
	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)
Inorganic Compounds																								
Cadmium	3.2E-03	9.9E-08	5.5E-06	1.7E-10	9.8E-06	6.7E-11	-	-	-	-	-	-	-	-	-	-	1.9E-02	5.8E-07	3.3E-03	9.9E-08	3.3E-03	9.9E-08	-	-
Copper	3.4E-03	-	5.7E-05	-	3.4E-06	-	-	-	-	-	-	-	-	-	2.2E-02	-	3.1E-01	-	2.5E-02	-	3.4E-03	-	2.2E-02	-
Fluoride	-	-	-	-	-	-	-	-	-	-	-	-	-	-	4.5E-01	-	-	-	4.5E-01	-	-	-	4.5E-01	-
Lead	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Mercury	4.1E-02	-	6.8E-04	-	8.1E-06	-	-	-	-	-	-	-	-	-	-	-	3.7E-01	-	4.1E-02	-	4.1E-02	-	-	-
Methyl Mercury	1.1E-04	-	1.9E-06	-	-	-	-	-	-	-	-	-	-	-	-	-	1.7E-03	-	1.1E-04	-	1.1E-04	-	-	-
Nitrate	-	-	-	-	-	-	-	-	-	-	-	-	-	-	4.3E-01	-	-	-	4.3E-01	-	-	-	4.3E-01	-
Silver	9.9E-04	-	1.7E-05	-	-	-	-	-	-	-	-	-	-	-	-	-	3.1E-05	-	1.0E-03	-	1.0E-03	-	-	-
Thallium	2.6E-02	-	4.4E-04	-	-	-	-	-	-	-	-	-	-	-	3.2E-01	-	5.8E-01	-	3.5E-01	-	2.7E-02	-	3.2E-01	-
Zinc	3.6E-03	-	6.1E-05	-	1.9E-06	-	-	-	-	-	-	-	-	-	-	-	8.0E-02	-	3.7E-03	-	3.7E-03	-	-	-
VOCs																								
1,1,1-Trichloroethane	-	-	-	-	-	-	2.7E-04	-	-	-	-	-	-	-	-	-	-	-	2.7E-04	-	2.7E-04	-	-	-
1,1,2-Trichloro-1,2,2-trifluoroetha	2.6E-09	-	4.3E-10	-	-	-	9.9E-05	-	-	-	-	-	-	-	-	-	5.9E-07	-	9.9E-05	-	9.9E-05	-	-	-
1,1-Dichloroethane	-	-	-	-	-	-	1.2E-03	7.5E-08	5.5E-06	3.5E-10	8.0E-06	5.1E-10	5.5E-06	3.5E-10	2.5E-03	1.1E-07	-	-	3.7E-03	1.9E-07	1.2E-03	7.5E-08	2.5E-03	1.1E-07
1,2-Dichloroethane	-	-	-	-	-	-	-	-	1.3E-04	1.0E-09	1.3E-04	1.1E-09	1.3E-04	1.0E-09	4.3E-03	3.2E-07	-	-	4.6E-03	3.3E-07	1.3E-04	1.0E-09	4.6E-03	3.3E-07
1,2-Dichloroethene (total)	9.0E-06	-	1.5E-06	-	-	-	-	-	-	-	-	-	-	-	-	-	1.4E-02	-	1.1E-05	-	1.1E-05	-	-	-
1-Chlorohexane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
2-Butanone	3.9E-07	-	6.6E-08	-	-	-	-	-	-	-	-	-	-	-	-	-	4.2E-03	-	4.6E-07	-	4.6E-07	-	-	-
2-Hexanone	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Acetone	4.8E-06	-	8.1E-07	-	-	-	-	-	7.4E-09	-	8.3E-09	-	7.4E-09	-	1.7E-03	-	1.0E-01	-	1.7E-03	-	5.6E-06	-	1.7E-03	-
Benzene	-	-	-	-	-	-	-	-	1.0E-04	7.0E-09	1.2E-04	8.2E-09	1.0E-04	7.0E-09	1.4E-02	4.4E-07	-	-	1.4E-02	4.6E-07	1.0E-04	7.0E-09	1.4E-02	4.6E-07
Carbon disulfide	-	-	-	-	-	-	-	-	-	-	2.8E-05	-	3.0E-05	-	2.5E-03	-	-	-	2.6E-03	-	-	-	2.6E-03	-
Chloromethane	-	-	-	-	-	-	-	-	-	-	6.0E-05	-	8.9E-05	-	-	-	-	-	1.5E-04	-	-	-	1.5E-04	-
cis-1,2-Dichloroethene	-	-	-	-	-	-	-	-	5.4E-05	-	6.0E-05	-	5.4E-05	-	4.9E-01	-	-	-	4.9E-01	-	5.4E-05	-	4.9E-01	-
Ethylbenzene	-	-	-	-	-	-	5.8E-04	-	-	-	-	-	-	-	-	-	-	-	5.8E-04	-	5.8E-04	-	-	-
m,p-Xylene	-	-	-	-	-	-	1.1E-02	-	-	-	-	-	-	-	-	-	-	-	1.1E-02	-	1.1E-02	-	-	-
Methylene chloride	1.4E-06	9.3E-11	2.3E-07	1.6E-11	-	-	4.2E-02	1.4E-06	3.6E-06	1.2E-10	2.8E-06	9.0E-11	3.6E-06	1.2E-10	1.0E-03	6.9E-08	6.5E-03	4.4E-07	4.3E-02	1.4E-06	4.2E-02	1.4E-06	1.0E-03	6.9E-08
Tetrachloroethene	1.3E-05	5.7E-09	2.2E-06	9.6E-10	-	-	1.6E-02	2.7E-07	-	-	-	-	-	-	-	-	2.2E-03	9.7E-07	1.6E-02	2.8E-07	1.6E-02	2.8E-07	-	-
Toluene	4.5E-06	-	7.5E-07	-	-	-	1.2E-04	-	-	-	-	-	-	-	2.2E-03	-	1.8E-03	-	2.3E-03	-	1.3E-04	-	2.2E-03	-
Trichloroethene	7.9E-04	2.5E-10	1.3E-04	4.1E-11	-	-	1.0E-03	9.5E-08	8.4E-06	8.0E-10	8.1E-06	7.7E-10	8.4E-06	8.0E-10	3.2E+00	1.0E-06	4.3E-01	1.4E-07	3.2E+00	1.1E-06	1.9E-03	9.6E-08	3.2E+00	1.0E-06
Xylenes (total)	8.1E-07	-	1.4E-07	-	-	-	-	-	-	-	-	-	-	-	-	-	2.0E-04	-	9.5E-07	-	9.5E-07	-	-	-
SVOCs																								
2-Methylnaphthalene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Acenaphthene	4.7E-06	-	1.0E-06	-	8.1E-11	-	-	-	-	-	-	-	-	-	-	-	3.6E-04	-	5.7E-06	-	5.7E-06	-	-	-
Acenaphthylene	6.6E-06	-	1.4E-06	-	1.1E-10	-	-	-	-	-	-	-	-	-	-	-	4.5E-04	-	8.0E-06	-	8.0E-06	-	-	-
Anthracene	8.3E-07	-	1.8E-07	-	1.4E-11	-	-	-	-	-	-	-	-	-	-	-	3.4E-05	-	1.0E-06	-	1.0E-06	-	-	-
Benzo(a)anthracene	-	2.2E-08	-	4.8E-09	-	1.2E-13	-	-	-	-	-	-	-	-	-	-	-	1.7E-07	-	2.7E-08	-	2.7E-08	-	-
Benzo(a)pyrene	-	2.2E-07	-	4.8E-08	-	1.2E-12	-	-	-	-	-	-	-	-	-	-	-	7.3E-07	-	2.7E-07	-	2.7E-07	-	-
Benzo(e)pyrene							-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Benzo(b)fluoranthene	-	3.0E-08	-	6.5E-09	-	1.7E-13	-	-	-	-	-	-	-	-	-	-	-	1.1E-07	-	3.6E-08	-	3.6E-08	-	-
Benzo(g,h,i)perylene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Benzo(k)fluoranthene	-	1.8E-08	-	4.0E-09	-	1.0E-13	-	-	-	-	-	-	-	-	-	-	-	8.8E-08	-	2.2E-08	-	2.2E-08	-	-
Chrysene	-	2.7E-09	-	6.0E-10	-	1.5E-14	-	-	-	-	-	-	-	-	-	-	-	2.0E-08	-	3.3E-09	-	3.3E-09	-	-
Dibenz(a,h)anthracene	-	6.1E-08	-	1.3E-08	-	1.0E-12	-	-	-	-	-	-	-	-	-	-	-	1.0E-07	-	7.4E-08	-	7.4E-08	-	-
Dibenzofuran	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Fluoranthene	9.6E-06	-	2.1E-06	-	1.6E-10	-	-	-	-	-	-	-	-	-	-	-	1.7E-04	-	1.2E-05	-	1.2E-05	-	-	-
Fluorene	7.0E-06	-	1.5E-06	-	1.2E-10	-	-	-	-	-	-	-	-	-	-	-	1.2E-04	-	8.6E-06	-	8.6E-06	-	-	-
Indeno(1,2,3-cd)pyrene	-	2.1E-08	-	4.6E-09	-	1.2E-13	-	-	-	-	-	-	-	-	-	-	-	2.1E-08	-	2.6E-08	-	2.6E-08	-	-
Naphthalene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Perylene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Phenanthrene	1.7E-05	-	3.7E-06	-	2.9E-10	-	-	-	-	-	-	-	-	-	-	-	6.0E-04	-	2.1E-05	-	2.1E-05	-	-	-
Pyrene	1.1E-05	-	2.5E-06	-	1.9E-10	-	-	-	-	-	-	-	-	-	-	-	2.2E-04	-	1.4E-05	-	1.4E-05	-	-	-
Total Petroleum Hydrocarbons																								
C11-C14(Kerosene Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
C14-C20(Diesel Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
C20-C30(Lubricant Oil Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

Table C3-9a (2 of 4)

Total Risk Estimates for the Child Resident - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Central Tendency Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation of Indoor Air_s		Inhalation Ambient Air_s		Inhalation of Indoor Air_{gw}		Inhalation Ambient Air_{gw}		Domestic Groundwater Use		Plant Consumption		Cumulative Risk		Soil Media Risk		Near-Surface Groundwater Risk	
	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)
Dioxins																								
2,3,7,8-TCDD	-	1.8E-08	-	9.1E-10	-	3.1E-13	-	-	-	-	-	-	-	-	-	-	-	-	-	1.9E-08	-	1.9E-08	-	-
1,2,3,7,8-PeCDD	-	7.3E-08	-	3.7E-09	-	1.3E-12	-	-	-	-	-	-	-	-	-	-	-	-	-	7.7E-08	-	7.7E-08	-	-
1,2,3,4,7,8-HxCDD	-	2.7E-08	-	1.4E-09	-	4.7E-13	-	-	-	-	-	-	-	-	-	-	-	-	-	2.9E-08	-	2.9E-08	-	-
1,2,3,6,7,8-HxCDD	-	1.1E-07	-	5.3E-09	-	1.8E-12	-	-	-	-	-	-	-	-	-	-	-	-	-	1.1E-07	-	1.1E-07	-	-
1,2,3,7,8,9-HxCDD	-	3.9E-08	-	2.0E-09	-	6.7E-13	-	-	-	-	-	-	-	-	-	-	-	-	-	4.1E-08	-	4.1E-08	-	-
1,2,3,4,6,7,8-HpCDD	-	1.1E-07	-	5.7E-09	-	6.4E-12	-	-	-	-	-	-	-	-	-	-	-	-	-	1.2E-07	-	1.2E-07	-	-
OCDD	-	1.7E-07	-	8.4E-09	-	2.9E-12	-	-	-	-	-	-	-	-	-	-	-	-	-	1.8E-07	-	1.8E-07	-	-
2,3,7,8-TCDF	-	3.7E-09	-	1.8E-10	-	6.3E-14	-	-	-	-	-	-	-	-	-	-	-	-	-	3.8E-09	-	3.8E-09	-	-
1,2,3,7,8-PeCDF	-	1.7E-10	-	8.3E-12	-	2.8E-15	-	-	-	-	-	-	-	-	-	-	-	-	-	1.7E-10	-	1.7E-10	-	-
2,3,4,7,8-PeCDF	-	1.6E-08	-	8.2E-10	-	2.8E-13	-	-	-	-	-	-	-	-	-	-	-	-	-	1.7E-08	-	1.7E-08	-	-
1,2,3,4,7,8-HxCDF	-	1.2E-08	-	6.0E-10	-	2.0E-13	-	-	-	-	-	-	-	-	-	-	-	-	-	1.2E-08	-	1.2E-08	-	-
1,2,3,6,7,8-HxCDF	-	1.0E-08	-	5.2E-10	-	1.8E-13	-	-	-	-	-	-	-	-	-	-	-	-	-	1.1E-08	-	1.1E-08	-	-
2,3,4,6,7,8-HxCDF	-	2.6E-08	-	1.3E-09	-	4.4E-13	-	-	-	-	-	-	-	-	-	-	-	-	-	2.7E-08	-	2.7E-08	-	-
1,2,3,7,8,9-HxCDF	-	2.4E-09	-	1.2E-10	-	4.1E-14	-	-	-	-	-	-	-	-	-	-	-	-	-	2.5E-09	-	2.5E-09	-	-
1,2,3,4,6,7,8-HpCDF	-	3.5E-08	-	1.8E-09	-	6.0E-13	-	-	-	-	-	-	-	-	-	-	-	-	-	3.7E-08	-	3.7E-08	-	-
1,2,3,4,7,8,9-HpCDF	-	3.2E-09	-	1.6E-10	-	5.6E-14	-	-	-	-	-	-	-	-	-	-	-	-	-	3.4E-09	-	3.4E-09	-	-
OCDF	-	2.7E-09	-	1.4E-10	-	4.6E-14	-	-	-	-	-	-	-	-	-	-	-	-	-	2.8E-09	-	2.8E-09	-	-
PCBs																								
Aroclor-1254	5.2E-02	1.7E-07	1.2E-02	3.9E-08	8.9E-07	2.8E-12	-	-	-	-	-	-	-	-	-	-	1.8E-01	5.8E-07	6.4E-02	2.0E-07	6.4E-02	2.0E-07	-	-
Aroclor-1260	-	1.4E-06	-	3.2E-07	-	2.3E-11	-	-	-	-	-	-	-	-	-	-	-	2.4E-06	-	1.7E-06	-	1.7E-06	-	-
PCB-105	-	2.3E-10	-	5.4E-11	-	3.9E-15	-	-	-	-	-	-	-	-	-	-	-	8.0E-10	-	2.8E-10	-	2.8E-10	-	-
PCB-114	-	4.4E-12	-	1.0E-12	-	7.5E-17	-	-	-	-	-	-	-	-	-	-	-	1.5E-11	-	5.4E-12	-	5.4E-12	-	-
PCB-118	-	4.6E-10	-	1.1E-10	-	7.9E-15	-	-	-	-	-	-	-	-	-	-	-	1.6E-09	-	5.7E-10	-	5.7E-10	-	-
PCB-123	-	6.4E-12	-	1.5E-12	-	1.1E-16	-	-	-	-	-	-	-	-	-	-	-	2.2E-11	-	7.9E-12	-	7.9E-12	-	-
PCB-126	-	5.8E-08	-	1.4E-08	-	1.0E-12	-	-	-	-	-	-	-	-	-	-	-	2.0E-07	-	7.2E-08	-	7.2E-08	-	-
PCB-156	-	1.5E-10	-	3.5E-11	-	2.6E-15	-	-	-	-	-	-	-	-	-	-	-	5.2E-10	-	1.8E-10	-	1.8E-10	-	-
PCB-157	-	6.6E-11	-	1.5E-11	-	1.1E-15	-	-	-	-	-	-	-	-	-	-	-	2.3E-10	-	8.1E-11	-	8.1E-11	-	-
PCB-167	-	1.1E-10	-	2.7E-11	-	2.0E-15	-	-	-	-	-	-	-	-	-	-	-	4.0E-10	-	1.4E-10	-	1.4E-10	-	-
PCB-169	-	1.7E-09	-	4.0E-10	-	2.9E-14	-	-	-	-	-	-	-	-	-	-	-	6.0E-09	-	2.1E-09	-	2.1E-09	-	-
PCB-189	-	1.7E-11	-	4.0E-12	-	2.9E-16	-	-	-	-	-	-	-	-	-	-	-	6.0E-11	-	2.1E-11	-	2.1E-11	-	-
PCB-77	-	1.2E-10	-	2.7E-11	-	2.0E-15	-	-	-	-	-	-	-	-	-	-	-	2.3E-10	-	1.4E-10	-	1.4E-10	-	-
PCB-81	-	6.2E-11	-	1.5E-11	-	1.1E-15	-	-	-	-	-	-	-	-	-	-	-	1.2E-10	-	7.7E-11	-	7.7E-11	-	-
Total PCB Congeners	-	6.1E-08	-	1.4E-08	-	1.0E-12	-	-	-	-	-	-	-	-	-	-	-	2.1E-07	-	7.5E-08	-	7.5E-08	-	-
Cumulative Risk	1.3E-01	2.7E-06	1.4E-02	4.8E-07	2.4E-05	1.1E-10	7.3E-02	1.8E-06	3.0E-04	9.2E-09	4.2E-04	1.1E-08	4.2E-04	9.2E-09	4.9E+00	1.9E-06	2.1E+00	6.4E-06	5.1E+00	6.9E-06	2.2E-01	4.9E-06	4.9E+00	2.0E-06
W/O Domestic Groundwater Use																			2.2E-01	4.9E-06			8.4E-04	2.0E-08

Table C3-9a (3 of 4)

Total Risk Estimates for the Child Resident - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Reasonable Maximum Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation of Indoor Air_s		Inhalation Ambient Air_s		Inhalation of Indoor Air_{gw}		Inhalation Ambient Air_{gw}		Domestic Groundwater Use		Plant Consumption		Cumulative Risk		Soil Media Risk		Groundwater Risk	
	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)
Inorganic Compounds																								
Cadmium	1.5E-02	4.4E-07	4.1E-05	1.2E-09	3.3E-05	2.2E-10	-	-	-	-	-	-	-	-	-	-	4.2E-02	1.9E-05	1.5E-02	4.4E-07	1.5E-02	4.4E-07	-	-
Copper	1.5E-02	-	4.1E-04	-	1.1E-05	-	-	-	-	-	-	-	-	-	3.6E-02	-	6.6E-01	-	5.1E-02	-	1.5E-02	-	3.6E-02	-
Fluoride	-	-	-	-	-	-	-	-	-	-	-	-	-	-	7.5E-01	-	-	-	7.5E-01	-	-	-	7.5E-01	-
Lead	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Mercury	1.9E-01	-	5.3E-03	-	2.8E-05	-	-	-	-	-	-	-	-	-	-	-	8.5E-01	-	1.9E-01	-	1.9E-01	-	-	-
Methyl Mercury	4.6E-04	-	1.3E-05	-	-	-	-	-	-	-	-	-	-	-	-	-	3.6E-03	-	4.8E-04	-	4.8E-04	-	-	-
Nitrate	-	-	-	-	-	-	-	-	-	-	-	-	-	-	7.1E-01	-	-	-	7.1E-01	-	-	-	7.1E-01	-
Silver	7.3E-03	-	2.0E-04	-	-	-	-	-	-	-	-	-	-	-	-	-	1.1E-04	-	7.5E-03	-	7.5E-03	-	-	-
Thallium	5.3E-02	-	1.5E-03	-	-	-	-	-	-	-	-	-	-	-	5.4E-01	-	5.8E-01	-	5.9E-01	-	5.4E-02	-	5.4E-01	-
Zinc	1.9E-02	-	5.2E-04	-	7.2E-06	-	-	-	-	-	-	-	-	-	-	-	2.1E-01	-	1.9E-02	-	1.9E-02	-	-	-
VOCs																								
1,1,1-Trichloroethane	-	-	-	-	-	-	4.0E-04	-	-	-	-	-	-	-	-	-	-	-	4.0E-04	-	4.0E-04	-	-	-
1,1,2-Trichloro-1,2,2-trifluoroetha	5.1E-09	-	1.4E-09	-	-	-	1.7E-04	-	-	-	-	-	-	-	-	-	5.9E-07	-	1.7E-04	-	1.7E-04	-	-	-
1,1-Dichloroethane	-	-	-	-	-	-	1.8E-03	1.1E-07	8.2E-06	5.2E-10	1.2E-05	7.7E-10	8.2E-06	5.2E-10	4.2E-03	1.9E-07	-	-	5.9E-03	3.0E-07	1.8E-03	1.1E-07	4.2E-03	1.9E-07
1,2-Dichloroethane	-	-	-	-	-	-	-	-	1.9E-04	1.5E-09	2.0E-04	1.6E-09	1.9E-04	1.5E-09	7.2E-03	5.4E-07	-	-	7.6E-03	5.4E-07	1.9E-04	1.5E-09	7.6E-03	5.4E-07
1,2-Dichloroethene (total)	4.5E-05	-	1.3E-05	-	-	-	-	-	-	-	-	-	-	-	-	-	3.6E-02	-	5.7E-05	-	5.7E-05	-	-	-
1-Chlorohexane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
2-Butanone	7.9E-07	-	2.2E-07	-	-	-	-	-	-	-	-	-	-	-	-	-	4.2E-03	-	1.0E-06	-	1.0E-06	-	-	-
2-Hexanone	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Acetone	5.9E-05	-	1.7E-05	-	-	-	-	-	1.1E-08	-	1.3E-08	-	1.1E-08	-	2.8E-03	-	6.3E-01	-	2.9E-03	-	7.6E-05	-	2.8E-03	-
Benzene	-	-	-	-	-	-	-	-	1.5E-04	1.0E-08	1.8E-04	1.2E-08	1.5E-04	1.0E-08	2.3E-02	7.4E-07	-	-	2.4E-02	7.6E-07	1.5E-04	1.0E-08	2.4E-02	7.6E-07
Carbon disulfide	-	-	-	-	-	-	-	-	-	-	4.2E-05	-	4.5E-05	-	4.2E-03	-	-	-	4.2E-03	-	-	-	4.2E-03	-
Chloromethane	-	-	-	-	-	-	-	-	-	-	9.0E-05	-	1.3E-04	-	-	-	-	-	2.2E-04	-	-	-	2.2E-04	-
cis-1,2-Dichloroethene	-	-	-	-	-	-	-	-	8.1E-05	-	8.9E-05	-	8.1E-05	-	8.2E-01	-	-	-	8.2E-01	-	8.1E-05	-	8.2E-01	-
Ethylbenzene	-	-	-	-	-	-	8.6E-04	-	-	-	-	-	-	-	-	-	-	-	8.6E-04	-	8.6E-04	-	-	-
m,p-Xylene	-	-	-	-	-	-	1.7E-02	-	-	-	-	-	-	-	-	-	-	-	1.7E-02	-	1.7E-02	-	-	-
Methylene chloride	2.8E-06	1.9E-10	7.8E-07	5.2E-11	-	-	6.3E-02	2.0E-06	5.4E-06	1.7E-10	4.2E-06	1.3E-10	5.4E-06	1.7E-10	1.7E-03	1.1E-07	6.5E-03	6.4E-06	6.5E-02	2.1E-06	6.3E-02	2.0E-06	1.7E-03	1.1E-07
Tetrachloroethene	1.1E-04	4.9E-08	3.2E-05	1.4E-08	-	-	2.4E-02	4.1E-07	-	-	-	-	-	-	-	-	9.5E-03	6.0E-05	2.4E-02	4.7E-07	2.4E-02	4.7E-07	-	-
Toluene	5.5E-05	-	1.5E-05	-	-	-	1.9E-04	-	-	-	-	-	-	-	3.6E-03	-	1.1E-02	-	3.9E-03	-	2.6E-04	-	3.6E-03	-
Trichloroethene	8.6E-03	2.7E-09	2.4E-03	7.5E-10	-	-	1.5E-03	1.4E-07	1.3E-05	1.2E-09	1.2E-05	1.2E-09	1.3E-05	1.2E-09	5.3E+00	1.7E-06	2.4E+00	1.1E-05	5.3E+00	1.8E-06	1.3E-02	1.5E-07	5.3E+00	1.7E-06
Xylenes (total)	3.3E-06	-	9.2E-07	-	-	-	-	-	-	-	-	-	-	-	-	-	4.0E-04	-	4.2E-06	-	4.2E-06	-	-	-
SVOCs																								
2-Methylnaphthalene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Acenaphthene	2.1E-05	-	7.8E-06	-	2.7E-10	-	-	-	-	-	-	-	-	-	-	-	8.3E-04	-	2.9E-05	-	2.9E-05	-	-	-
Acenaphthylene	3.6E-05	-	1.3E-05	-	4.7E-10	-	-	-	-	-	-	-	-	-	-	-	1.2E-03	-	4.9E-05	-	4.9E-05	-	-	-
Anthracene	3.5E-06	-	1.3E-06	-	4.5E-11	-	-	-	-	-	-	-	-	-	-	-	7.2E-05	-	4.8E-06	-	4.8E-06	-	-	-
Benzo(a)anthracene	-	1.8E-07	-	6.6E-08	-	7.6E-13	-	-	-	-	-	-	-	-	-	-	-	1.0E-05	-	2.5E-07	-	2.5E-07	-	-
Benzo(a)pyrene	-	1.8E-06	-	6.6E-07	-	7.6E-12	-	-	-	-	-	-	-	-	-	-	-	4.4E-05	-	2.5E-06	-	2.5E-06	-	-
Benzo(e)pyrene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Benzo(b)fluoranthene	-	3.3E-07	-	1.2E-07	-	1.4E-12	-	-	-	-	-	-	-	-	-	-	-	8.5E-06	-	4.4E-07	-	4.4E-07	-	-
Benzo(g,h,i)perylene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Benzo(k)fluoranthene	-	1.0E-07	-	3.8E-08	-	4.4E-13	-	-	-	-	-	-	-	-	-	-	-	3.7E-06	-	1.4E-07	-	1.4E-07	-	-
Chrysene	-	2.7E-08	-	9.7E-09	-	1.1E-13	-	-	-	-	-	-	-	-	-	-	-	1.4E-06	-	3.6E-08	-	3.6E-08	-	-
Dibenz(a,h)anthracene	-	3.6E-07	-	1.3E-07	-	4.6E-12	-	-	-	-	-	-	-	-	-	-	-	4.4E-06	-	4.9E-07	-	4.9E-07	-	-
Dibenzofuran	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Fluoranthene	1.2E-04	-	4.4E-05	-	1.5E-09	-	-	-	-	-	-	-	-	-	-	-	1.0E-03	-	1.6E-04	-	1.6E-04	-	-	-
Fluorene	3.2E-05	-	1.2E-05	-	4.1E-10	-	-	-	-	-	-	-	-	-	-	-	2.7E-04	-	4.3E-05	-	4.3E-05	-	-	-
Indeno(1,2,3-cd)pyrene	-	1.7E-07	-	6.1E-08	-	7.0E-13	-	-	-	-	-	-	-	-	-	-	-	1.2E-06	-	2.3E-07	-	2.3E-07	-	-
Naphthalene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Phenanthrene	8.5E-05	-	3.1E-05	-	1.1E-09	-	-	-	-	-	-	-	-	-	-	-	1.5E-03	-	1.2E-04	-	1.2E-04	-	-	-
Perylene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Pyrene	6.6E-05	-	2.4E-05	-	8.6E-10	-	-	-	-	-	-	-	-	-	-	-	6.4E-04	-	9.1E-05	-	9.1E-05	-	-	-
Total Petroleum Hydrocarbons																								
C11-C14(Kerosene Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
C14-C20(Diesel Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
C20-C30(Lubricant Oil Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

Table C3-9a (4 of 4)

Total Risk Estimates for the Child Resident - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Reasonable Maximum Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation of Indoor Air_s		Inhalation Ambient Air_s		Inhalation of Indoor Air_{gw}		Inhalation Ambient Air_{gw}		Domestic Groundwater Use		Plant Consumption		Cumulative Risk		Soil Media Risk		Near-Surface Groundwater Risk	
	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)
Dioxins																								
2,3,7,8-TCDD	-	7.1E-08	-	6.0E-09	-	9.1E-13	-	-	-	-	-	-	-	-	-	-	-	-	-	7.7E-08	-	7.7E-08	-	-
1,2,3,7,8-PeCDD	-	2.9E-07	-	2.4E-08	-	3.7E-12	-	-	-	-	-	-	-	-	-	-	-	-	-	3.1E-07	-	3.1E-07	-	-
1,2,3,4,7,8-HxCDD	-	1.2E-07	-	1.0E-08	-	1.5E-12	-	-	-	-	-	-	-	-	-	-	-	-	-	1.3E-07	-	1.3E-07	-	-
1,2,3,6,7,8-HxCDD	-	3.9E-07	-	3.3E-08	-	5.1E-12	-	-	-	-	-	-	-	-	-	-	-	-	-	4.3E-07	-	4.3E-07	-	-
1,2,3,7,8,9-HxCDD	-	1.3E-07	-	1.1E-08	-	1.7E-12	-	-	-	-	-	-	-	-	-	-	-	-	-	1.4E-07	-	1.4E-07	-	-
1,2,3,4,6,7,8-HpCDD	-	4.7E-07	-	4.0E-08	-	2.0E-11	-	-	-	-	-	-	-	-	-	-	-	-	-	5.1E-07	-	5.1E-07	-	-
OCDD	-	6.7E-07	-	5.6E-08	-	8.7E-12	-	-	-	-	-	-	-	-	-	-	-	-	-	7.3E-07	-	7.3E-07	-	-
2,3,7,8-TCDF	-	1.0E-08	-	8.8E-10	-	1.4E-13	-	-	-	-	-	-	-	-	-	-	-	-	-	1.1E-08	-	1.1E-08	-	-
1,2,3,7,8-PeCDF	-	6.9E-10	-	5.8E-11	-	8.8E-15	-	-	-	-	-	-	-	-	-	-	-	-	-	7.4E-10	-	7.4E-10	-	-
2,3,4,7,8-PeCDF	-	6.3E-08	-	5.3E-09	-	8.1E-13	-	-	-	-	-	-	-	-	-	-	-	-	-	6.8E-08	-	6.8E-08	-	-
1,2,3,4,7,8-HxCDF	-	4.4E-08	-	3.7E-09	-	5.7E-13	-	-	-	-	-	-	-	-	-	-	-	-	-	4.8E-08	-	4.8E-08	-	-
1,2,3,6,7,8-HxCDF	-	4.2E-08	-	3.5E-09	-	5.4E-13	-	-	-	-	-	-	-	-	-	-	-	-	-	4.6E-08	-	4.6E-08	-	-
2,3,4,6,7,8-HxCDF	-	1.2E-07	-	9.8E-09	-	1.5E-12	-	-	-	-	-	-	-	-	-	-	-	-	-	1.3E-07	-	1.3E-07	-	-
1,2,3,7,8,9-HxCDF	-	1.3E-08	-	1.1E-09	-	1.7E-13	-	-	-	-	-	-	-	-	-	-	-	-	-	1.4E-08	-	1.4E-08	-	-
1,2,3,4,6,7,8-HpCDF	-	1.3E-07	-	1.1E-08	-	1.6E-12	-	-	-	-	-	-	-	-	-	-	-	-	-	1.4E-07	-	1.4E-07	-	-
1,2,3,4,7,8,9-HpCDF	-	1.2E-08	-	1.0E-09	-	1.6E-13	-	-	-	-	-	-	-	-	-	-	-	-	-	1.3E-08	-	1.3E-08	-	-
OCDF	-	9.5E-09	-	7.9E-10	-	1.2E-13	-	-	-	-	-	-	-	-	-	-	-	-	-	1.0E-08	-	1.0E-08	-	-
PCBs																								
Aroclor-1254	2.7E-01	8.8E-07	1.1E-01	3.4E-07	3.5E-06	1.1E-11	-	-	-	-	-	-	-	-	-	-	4.8E-01	2.2E-05	3.8E-01	1.2E-06	3.8E-01	1.2E-06	-	-
Aroclor-1260	-	1.5E-05	-	5.9E-06	-	1.9E-10	-	-	-	-	-	-	-	-	-	-	-	2.0E-04	-	2.1E-05	-	2.1E-05	-	-
PCB-105	-	2.3E-09	-	8.8E-10	-	2.9E-14	-	-	-	-	-	-	-	-	-	-	-	5.8E-08	-	3.1E-09	-	3.1E-09	-	-
PCB-114	-	4.0E-11	-	1.6E-11	-	5.2E-16	-	-	-	-	-	-	-	-	-	-	-	1.0E-09	-	5.6E-11	-	5.6E-11	-	-
PCB-118	-	4.5E-09	-	1.8E-09	-	5.8E-14	-	-	-	-	-	-	-	-	-	-	-	1.2E-07	-	6.3E-09	-	6.3E-09	-	-
PCB-123	-	6.4E-11	-	2.5E-11	-	8.2E-16	-	-	-	-	-	-	-	-	-	-	-	1.6E-09	-	8.9E-11	-	8.9E-11	-	-
PCB-126	-	5.8E-07	-	2.3E-07	-	7.5E-12	-	-	-	-	-	-	-	-	-	-	-	1.5E-05	-	8.1E-07	-	8.1E-07	-	-
PCB-156	-	1.5E-09	-	5.9E-10	-	1.9E-14	-	-	-	-	-	-	-	-	-	-	-	3.8E-08	-	2.1E-09	-	2.1E-09	-	-
PCB-157	-	6.8E-10	-	2.6E-10	-	8.7E-15	-	-	-	-	-	-	-	-	-	-	-	1.7E-08	-	9.4E-10	-	9.4E-10	-	-
PCB-167	-	1.2E-09	-	4.6E-10	-	1.5E-14	-	-	-	-	-	-	-	-	-	-	-	3.0E-08	-	1.6E-09	-	1.6E-09	-	-
PCB-169	-	1.8E-08	-	6.9E-09	-	2.3E-13	-	-	-	-	-	-	-	-	-	-	-	4.5E-07	-	2.4E-08	-	2.4E-08	-	-
PCB-189	-	1.8E-10	-	6.9E-11	-	2.3E-15	-	-	-	-	-	-	-	-	-	-	-	4.5E-09	-	2.4E-10	-	2.4E-10	-	-
PCB-77	-	1.2E-09	-	4.6E-10	-	1.5E-14	-	-	-	-	-	-	-	-	-	-	-	1.7E-08	-	1.6E-09	-	1.6E-09	-	-
PCB-81	-	6.2E-10	-	2.4E-10	-	8.0E-15	-	-	-	-	-	-	-	-	-	-	-	9.0E-09	-	8.6E-10	-	8.6E-10	-	-
Total PCB Congeners	-	6.1E-07	-	2.4E-07	-	7.9E-12	-	-	-	-	-	-	-	-	-	-	-	1.6E-05	-	8.5E-07	-	8.5E-07	-	-
Cumulative Risk	5.8E-01	2.2E-05	1.2E-01	7.5E-06	8.3E-05	4.9E-10	1.1E-01	2.7E-06	4.5E-04	1.4E-08	6.3E-04	1.6E-08	6.3E-04	1.4E-08	8.2E+00	3.2E-06	5.9E+00	3.9E-04	9.0E+00	3.5E-05	8.1E-01	3.2E-05	8.2E+00	3.3E-06
W/O Domestic Groundwater Use																			8.1E-01	3.2E-05			1.3E-03	3.0E-08

Notes:
Inhalation Indoor Air_{s-gw} - Exposure associated with indoor air concentrations of COPCs modeled from soil vapor, soil, or groundwater.
Inhalation Ambient Air_{s-gw} - Exposure associated with ambient air concentrations of COPCs modeled from soil or groundwater.
HQ - hazard quotient
HI - hazard index
Risk - incremental increased lifetime cancer risk
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCDD/PCDFs - Polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.
PCB - polychlorinated biphenyls
COPC - chemical of potential concern
"-" indicates that either adequate toxicity data were not available for a chemical or the exposure pathway was not applicable to that chemical.

Table C3-9b (1 of 4)

Total Risk Estimates for the Child Resident - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Central Tendency Exposure

Chemical	Soil Ingestion HQ (unitless)	Soil Ingestion Risk (unitless)	Soil Dermal Contact HQ (unitless)	Soil Dermal Contact Risk (unitless)	Soil Particulate Inhalation HQ (unitless)	Soil Particulate Inhalation Risk (unitless)	Inhalation of Indoor Air$_s$ HQ (unitless)	Inhalation of Indoor Air$_s$ Risk (unitless)	Inhalation Ambient Air$_s$ HQ (unitless)	Inhalation Ambient Air$_s$ Risk (unitless)	Inhalation of Indoor Air$_{gw}$ HQ (unitless)	Inhalation of Indoor Air$_{gw}$ Risk (unitless)	Inhalation Ambient Air$_{gw}$ HQ (unitless)	Inhalation Ambient Air$_{gw}$ Risk (unitless)	Domestic Groundwater Use HQ (unitless)	Domestic Groundwater Use Risk (unitless)	Plant Consumption HQ (unitless)	Plant Consumption Risk (unitless)	Cumulative Risk HI (unitless)	Cumulative Risk Risk (unitless)	Soil Media Risk HI (unitless)	Soil Media Risk Risk (unitless)	Groundwater Risk HI (unitless)	Groundwater Risk Risk (unitless)	Surface Water Ingestion HI (unitless)	Surface Water Ingestion Risk (unitless)	Surface Water Dermal Contact HI (unitless)	Surface Water Dermal Contact Risk (unitless)	Surface Water Risk HI (unitless)	Surface Water Risk Risk (unitless)
Inorganic Compounds																														
Aluminum	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	4.7E-04	-	6.6E-06	-	4.7E-04	-
Antimony	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1.0E-03	-	1.4E-05	-	1.0E-03	-
Arsenic	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1.0E-02	2.3E-06	1.4E-04	3.3E-08	1.0E-02	2.4E-06
Barium	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Boron	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Cadmium	1.2E-03	3.7E-08	2.1E-06	6.2E-11	3.7E-06	2.5E-11	-	-	-	-	-	-	-	-	-	-	1.9E-02	5.8E-07	1.2E-03	3.7E-08	1.2E-03	3.7E-08	-	-	6.9E-05	2.1E-09	9.8E-07	3.0E-11	7.0E-05	2.1E-09
Chromium	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	7.0E-07	-	9.8E-09	-	7.1E-07	-
Copper	1.5E-03	-	2.6E-05	-	1.5E-06	-	-	-	-	-	-	-	-	-	2.2E-02	-	3.1E-01	-	2.3E-02	-	1.6E-03	-	2.2E-02	-	5.0E-05	-	7.0E-07	-	5.1E-05	-
Fluoride	-	-	-	-	-	-	-	-	-	-	-	-	-	-	4.5E-01	-	-	-	4.5E-01	-	-	-	4.5E-01	-	-	-	-	-	-	-
Lead	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Mercury	3.7E-02	-	6.3E-04	-	7.5E-06	-	-	-	-	-	-	-	-	-	-	-	3.7E-01	-	3.8E-02	-	3.8E-02	-	-	-	1.8E-04	-	2.5E-06	-	1.8E-04	-
Methyl Mercury	1.1E-04	-	1.9E-06	-	-	-	-	-	-	-	-	-	-	-	-	-	1.7E-03	-	1.1E-04	-	1.1E-04	-	-	-	-	-	-	-	-	-
Nickel	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	9.4E-05	-	2.6E-07	-	9.4E-05	-
Nitrate	-	-	-	-	-	-	-	-	-	-	-	-	-	-	4.3E-01	-	-	-	4.3E-01	-	-	-	4.3E-01	-	-	-	-	-	-	-
Silver	1.7E-03	-	2.8E-05	-	-	-	-	-	-	-	-	-	-	-	-	-	3.1E-05	-	1.7E-03	-	1.7E-03	-	-	-	-	-	-	-	-	-
Thallium	7.9E-02	-	1.3E-03	-	-	-	-	-	-	-	-	-	-	-	3.2E-01	-	5.8E-01	-	4.0E-01	-	8.1E-02	-	3.2E-01	-	1.2E-03	-	1.7E-05	-	1.2E-03	-
Vanadium	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1.8E-03	-	2.6E-05	-	1.9E-03	-
Zinc	1.4E-03	-	2.4E-05	-	7.4E-07	-	-	-	-	-	-	-	-	-	-	-	8.0E-02	-	1.5E-03	-	1.5E-03	-	-	-	-	-	-	-	-	-
VOCs																														
1,1,1-Trichloroethane	-	-	-	-	-	-	2.7E-04	-	-	-	-	-	-	-	-	-	-	-	2.7E-04	-	2.7E-04	-	-	-	1.2E-06	-	0.0E+00	-	1.2E-06	-
1,1,2-Trichloro-1,2,2-trifluoroethane	2.6E-09	-	4.3E-10	-	-	-	9.9E-05	-	-	-	-	-	-	-	-	-	5.9E-07	-	9.9E-05	-	9.9E-05	-	-	-	-	-	-	-	-	-
1,1-Dichloroethane	-	-	-	-	-	-	1.2E-03	7.5E-08	5.5E-06	3.5E-10	8.0E-06	5.1E-10	5.5E-06	3.5E-10	2.5E-03	1.1E-07	-	-	3.7E-03	1.9E-07	1.2E-03	7.5E-08	2.5E-03	1.1E-07	-	-	-	-	-	-
1,2-Dichloroethane	-	-	-	-	-	-	-	-	1.3E-04	1.0E-09	1.3E-04	1.1E-09	1.3E-04	1.0E-09	4.3E-03	3.2E-07	-	-	4.6E-03	3.3E-07	1.3E-04	1.0E-09	4.6E-03	3.3E-07	-	-	-	-	-	-
1,2-Dichloroethene (total)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1.4E-02	-	-	-	-	-	-	-	-	-	-	-	-	-
1-Chlorohexane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
2-Butanone	2.0E-07	-	3.4E-08	-	-	-	-	-	-	-	-	-	-	-	-	-	4.2E-03	-	2.4E-07	-	2.4E-07	-	-	-	-	-	-	-	-	-
2-Hexanone	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Acetone	4.4E-06	-	7.4E-07	-	-	-	-	-	7.4E-09	-	8.3E-09	-	7.4E-09	-	1.7E-03	-	1.0E-01	-	1.7E-03	-	5.1E-06	-	1.7E-03	-	-	-	-	-	-	-
Benzene	-	-	-	-	-	-	-	-	1.0E-04	7.0E-09	1.2E-04	8.2E-09	1.0E-04	7.0E-09	1.4E-02	4.4E-07	-	-	1.4E-02	4.6E-07	1.0E-04	7.0E-09	1.4E-02	4.6E-07	-	-	-	-	-	-
Carbon disulfide	-	-	-	-	-	-	-	-	-	-	2.8E-05	-	3.0E-05	-	2.5E-03	-	-	-	2.6E-03	-	-	-	2.6E-03	-	-	-	-	-	-	-
Chloromethane	-	-	-	-	-	-	-	-	-	-	6.0E-05	-	8.9E-05	-	-	-	-	-	1.5E-04	-	-	-	1.5E-04	-	-	-	-	-	-	-
cis-1,2-Dichloroethene	-	-	-	-	-	-	-	-	5.4E-05	-	6.0E-05	-	5.4E-05	-	4.9E-01	-	-	-	4.9E-01	-	5.4E-05	-	4.9E-01	-	-	-	-	-	-	-
Ethylbenzene	-	-	-	-	-	-	5.8E-04	-	-	-	-	-	-	-	-	-	-	-	5.8E-04	-	5.8E-04	-	-	-	-	-	-	-	-	-
m,p-Xylene	-	-	-	-	-	-	1.1E-02	-	-	-	-	-	-	-	-	-	-	-	1.1E-02	-	1.1E-02	-	-	-	-	-	-	-	-	-
Methylene chloride	1.1E-06	7.1E-11	1.8E-07	1.2E-11	-	-	4.2E-02	1.4E-06	3.6E-06	1.2E-10	2.8E-06	9.0E-11	3.6E-06	1.2E-10	1.0E-03	6.9E-08	6.5E-03	4.4E-07	4.3E-02	1.4E-06	4.2E-02	1.4E-06	1.0E-03	6.9E-08	-	-	-	-	-	-
Tetrachloroethene	-	-	-	-	-	-	1.6E-02	2.7E-07	-	-	-	-	-	-	-	-	2.2E-03	9.7E-07	1.6E-02	2.7E-07	1.6E-02	2.7E-07	-	-	-	-	-	-	-	-
Toluene	-	-	-	-	-	-	1.2E-04	-	-	-	-	-	-	-	2.2E-03	-	1.8E-03	-	2.3E-03	-	1.2E-04	-	2.2E-03	-	-	-	-	-	-	-
Trichloroethene	-	-	-	-	-	-	1.0E-03	9.5E-08	8.4E-06	8.0E-10	8.1E-06	7.7E-10	8.4E-06	8.0E-10	3.2E+00	1.0E-06	4.3E-01	1.4E-07	3.2E+00	1.1E-06	1.0E-03	9.6E-08	3.2E+00	1.0E-06	1.0E-03	3.1E-10	1.7E-04	5.3E-11	1.2E-03	3.7E-10
Xylenes (total)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	2.0E-04	-	-	-	-	-	-	-	-	-	-	-	-	-
SVOCs																														
2-Methylnaphthalene	3.4E-05	-	7.5E-06	-	5.9E-10	-	-	-	-	-	-	-	-	-	-	-	-	-	4.2E-05	-	4.2E-05	-	-	-	-	-	-	-	-	-
Acenaphthene	7.3E-06	-	1.6E-06	-	1.3E-10	-	-	-	-	-	-	-	-	-	-	-	3.4E-04	-	8.9E-06	-	8.9E-06	-	-	-	-	-	-	-	-	-
Acenaphthylene	1.0E-06	-	2.3E-07	-	1.8E-11	-	-	-	-	-	-	-	-	-	-	-	4.6E-04	-	1.3E-06	-	1.3E-06	-	-	-	-	-	-	-	-	-
Anthracene	4.1E-06	-	9.1E-07	-	7.1E-11	-	-	-	-	-	-	-	-	-	-	-	4.3E-05	-	5.1E-06	-	5.1E-06	-	-	-	-	-	-	-	-	-
Benzo(a)anthracene	-	5.0E-07	-	1.1E-07	-	2.8E-12	-	-	-	-	-	-	-	-	-	-	-	1.7E-07	-	6.1E-07	-	6.1E-07	-	-	-	-	-	-	-	-
Benzo(a)pyrene	-	5.4E-06	-	1.2E-06	-	3.0E-11	-	-	-	-	-	-	-	-	-	-	-	7.2E-07	-	6.5E-06	-	6.5E-06	-	-	-	-	-	-	-	-
Benzo(b)fluoranthene	-	4.8E-07	-	1.0E-07	-	2.7E-12	-	-	-	-	-	-	-	-	-	-	-	1.0E-07	-	5.8E-07	-	5.8E-07	-	-	-	-	-	-	-	-
Benzo(g,h,i)perylene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Benzo(k)fluoranthene	-	5.3E-07	-	1.2E-07	-	3.0E-12	-	-	-	-	-	-	-	-	-	-	-	1.8E-08	-	6.5E-07	-	6.5E-07	-	-	-	-	-	-	-	-
Chrysene	-	3.7E-08	-	8.0E-09	-	2.0E-13	-	-	-	-	-	-	-	-	-	-	-	1.9E-08	-	4.5E-08	-	4.5E-08	-	-	-	-	-	-	-	-
Dibenz(a,h)anthracene	-	2.4E-07	-	5.3E-08	-	4.2E-12	-	-	-	-	-	-	-	-	-	-	-	1.0E-07	-	3.0E-07	-	3.0E-07	-	-	-	-	-	-	-	-
Dibenzofuran	8.9E-04	-	2.0E-04	-	1.5E-08	-	-	-	-	-	-	-	-	-	-	-	-	-	1.1E-03	-	1.1E-03	-	-	-	-	-	-	-	-	-
Fluoranthene	2.3E-04	-	5.1E-05	-	4.0E-09	-	-	-	-	-	-	-	-	-	-	-	1.6E-04	-	2.8E-04	-	2.8E-04	-	-	-	-	-	-	-	-	-
Fluorene	1.1E-05	-	2.4E-06	-	1.9E-10	-	-	-	-	-	-	-	-	-	-	-	1.2E-04	-	1.4E-05	-	1.4E-05	-	-	-	-	-	-	-	-	-
Indeno(1,2,3-cd)pyrene	-	2.3E-07	-	5.0E-08	-	1.3E-12	-	-	-	-	-	-	-	-	-	-	-	2.1E-08	-	2.8E-07	-	2.8E-07	-	-	-	-	-	-	-	-
Naphthalene	6.3E-06	-	1.4E-06	-	2.5E-09	2.0E-14	-	-	-	-	-	-	-	-	-	-	-	-	7.6E-06	2.0E-14	7.6E-06	2.0E-14	-	-	-	-	-	-	-	-
Perylene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Phenanthrene	1.5E-04	-	3.3E-05	-	2.6E-09	-	-	-	-	-	-	-	-	-	-	-	5.2E-04	-	1.8E-04	-	1.8E-04	-	-	-	-	-	-	-	-	-
Pyrene	2.6E-04	-	5.7E-05	-	4.4E-09	-	-	-	-	-	-	-	-	-	-	-	2.3E-04	-	3.2E-04	-	3.2E-04	-	-	-	-	-	-	-	-	-
Total Petroleum Hydrocarbons																														
C11-C14(Kerosene Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
C14-C20(Diesel Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
C20-C30(Lubricant Oil Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

Table C3-9b (2 of 4)

Total Risk Estimates for the Child Resident - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Central Tendency Exposure

Chemical	Soil Ingestion HQ (unitless)	Soil Ingestion Risk (unitless)	Soil Dermal Contact HQ (unitless)	Soil Dermal Contact Risk (unitless)	Soil Particulate Inhalation HQ (unitless)	Soil Particulate Inhalation Risk (unitless)	Inhalation of Indoor Air_s HQ (unitless)	Inhalation of Indoor Air_s Risk (unitless)	Inhalation Ambient Air_s HQ (unitless)	Inhalation Ambient Air_s Risk (unitless)	Inhalation of Indoor Air_{gw} HQ (unitless)	Inhalation of Indoor Air_{gw} Risk (unitless)	Inhalation Ambient Air_{gw} HQ (unitless)	Inhalation Ambient Air_{gw} Risk (unitless)	Domestic Groundwater Use HQ (unitless)	Domestic Groundwater Use Risk (unitless)	Plant Consumption HQ (unitless)	Plant Consumption Risk (unitless)	Cumulative Risk HI (unitless)	Cumulative Risk Risk (unitless)	Soil Media Risk HI (unitless)	Soil Media Risk Risk (unitless)	Groundwater Risk HI (unitless)	Groundwater Risk Risk (unitless)	Surface Water Ingestion HI (unitless)	Surface Water Ingestion Risk (unitless)	Surface Water Dermal Contact HI (unitless)	Surface Water Dermal Contact Risk (unitless)	Surface Water Risk HI (unitless)	Surface Water Risk Risk (unitless)
Dioxins																														
2,3,7,8-TCDD	-	9.9E-09	-	5.0E-10	-	1.7E-13	-	-	-	-	-	-	-	-	-	-	-	-	-	1.0E-08	-	1.0E-08	-	-	-	-	-	-	-	-
1,2,3,7,8-PeCDD	-	3.7E-08	-	1.9E-09	-	6.4E-13	-	-	-	-	-	-	-	-	-	-	-	-	-	3.9E-08	-	3.9E-08	-	-	-	8.0E-09	-	9.1E-08	-	9.9E-08
1,2,3,4,7,8-HxCDD	-	1.1E-08	-	5.5E-10	-	1.9E-13	-	-	-	-	-	-	-	-	-	-	-	-	-	1.1E-08	-	1.1E-08	-	-	-	1.2E-09	-	1.3E-08	-	1.5E-08
1,2,3,6,7,8-HxCDD	-	5.5E-08	-	2.8E-09	-	9.5E-13	-	-	-	-	-	-	-	-	-	-	-	-	-	5.8E-08	-	5.8E-08	-	-	-	1.3E-08	-	1.5E-07	-	1.6E-07
1,2,3,7,8,9-HxCDD	-	2.3E-08	-	1.2E-09	-	3.9E-13	-	-	-	-	-	-	-	-	-	-	-	-	-	2.4E-08	-	2.4E-08	-	-	-	6.6E-09	-	7.6E-08	-	8.2E-08
1,2,3,4,6,7,8-HpCDD	-	4.7E-08	-	2.4E-09	-	2.7E-12	-	-	-	-	-	-	-	-	-	-	-	-	-	4.9E-08	-	4.9E-08	-	-	-	3.1E-09	-	3.6E-08	-	3.9E-08
OCDD	-	7.4E-08	-	3.7E-09	-	1.3E-12	-	-	-	-	-	-	-	-	-	-	-	-	-	7.8E-08	-	7.8E-08	-	-	-	2.5E-09	-	2.9E-08	-	3.1E-08
2,3,7,8-TCDF	-	2.4E-09	-	1.2E-10	-	4.2E-14	-	-	-	-	-	-	-	-	-	-	-	-	-	2.5E-09	-	2.5E-09	-	-	-	1.9E-09	-	2.2E-08	-	2.3E-08
1,2,3,7,8-PeCDF	-	8.8E-11	-	4.4E-12	-	1.5E-15	-	-	-	-	-	-	-	-	-	-	-	-	-	9.2E-11	-	9.2E-11	-	-	-	3.1E-10	-	3.5E-09	-	3.8E-09
2,3,4,7,8-PeCDF	-	8.4E-09	-	4.2E-10	-	1.4E-13	-	-	-	-	-	-	-	-	-	-	-	-	-	8.8E-09	-	8.8E-09	-	-	-	2.6E-08	-	2.9E-07	-	3.2E-07
1,2,3,4,7,8-HxCDF	-	5.8E-09	-	2.9E-10	-	1.0E-13	-	-	-	-	-	-	-	-	-	-	-	-	-	6.1E-09	-	6.1E-09	-	-	-	8.9E-09	-	1.0E-07	-	1.1E-07
1,2,3,6,7,8-HxCDF	-	4.8E-09	-	2.4E-10	-	8.2E-14	-	-	-	-	-	-	-	-	-	-	-	-	-	5.0E-09	-	5.0E-09	-	-	-	5.2E-09	-	5.9E-08	-	6.5E-08
2,3,4,6,7,8-HxCDF	-	9.0E-09	-	4.5E-10	-	1.5E-13	-	-	-	-	-	-	-	-	-	-	-	-	-	9.5E-09	-	9.5E-09	-	-	-	9.0E-09	-	1.0E-07	-	1.1E-07
1,2,3,7,8,9-HxCDF	-	9.2E-10	-	4.7E-11	-	1.6E-14	-	-	-	-	-	-	-	-	-	-	-	-	-	9.7E-10	-	9.7E-10	-	-	-	8.7E-09	-	9.9E-08	-	1.1E-07
1,2,3,4,6,7,8-HpCDF	-	1.8E-08	-	9.2E-10	-	3.1E-13	-	-	-	-	-	-	-	-	-	-	-	-	-	1.9E-08	-	1.9E-08	-	-	-	1.3E-09	-	1.5E-08	-	1.6E-08
1,2,3,4,7,8,9-HpCDF	-	1.6E-09	-	8.0E-11	-	2.7E-14	-	-	-	-	-	-	-	-	-	-	-	-	-	1.7E-09	-	1.7E-09	-	-	-	6.6E-10	-	7.6E-09	-	8.2E-09
OCDF	-	1.5E-09	-	7.5E-11	-	2.6E-14	-	-	-	-	-	-	-	-	-	-	-	-	-	1.6E-09	-	1.6E-09	-	-	-	1.0E-10	-	1.2E-09	-	1.3E-09
PCBs																														
Aroclor-1254	5.2E-02	1.7E-07	1.2E-02	3.9E-08	9.0E-07	2.9E-12	-	-	-	-	-	-	-	-	-	-	1.8E-01	5.8E-07	6.5E-02	2.1E-07	6.5E-02	2.1E-07	-	-	-	-	-	-	-	-
Aroclor-1260	-	1.4E-06	-	3.4E-07	-	2.5E-11	-	-	-	-	-	-	-	-	-	-	-	2.4E-06	-	1.8E-06	-	1.8E-06	-	-	-	-	-	-	-	-
PCB-105	-	2.4E-10	-	5.6E-11	-	4.1E-15	-	-	-	-	-	-	-	-	-	-	-	8.0E-10	-	2.9E-10	-	2.9E-10	-	-	-	-	-	-	-	-
PCB-114	-	4.5E-12	-	1.1E-12	-	7.8E-17	-	-	-	-	-	-	-	-	-	-	-	1.5E-11	-	5.6E-12	-	5.6E-12	-	-	-	-	-	-	-	-
PCB-118	-	4.8E-10	-	1.1E-10	-	8.2E-15	-	-	-	-	-	-	-	-	-	-	-	1.6E-09	-	5.9E-10	-	5.9E-10	-	-	-	-	-	-	-	-
PCB-123	-	6.7E-12	-	1.6E-12	-	1.2E-16	-	-	-	-	-	-	-	-	-	-	-	2.2E-11	-	8.3E-12	-	8.3E-12	-	-	-	-	-	-	-	-
PCB-126	-	6.1E-08	-	1.4E-08	-	1.0E-12	-	-	-	-	-	-	-	-	-	-	-	2.0E-07	-	7.5E-08	-	7.5E-08	-	-	-	-	-	-	-	-
PCB-156	-	1.6E-10	-	3.7E-11	-	2.7E-15	-	-	-	-	-	-	-	-	-	-	-	5.2E-10	-	1.9E-10	-	1.9E-10	-	-	-	-	-	-	-	-
PCB-157	-	6.9E-11	-	1.6E-11	-	1.2E-15	-	-	-	-	-	-	-	-	-	-	-	2.3E-10	-	8.5E-11	-	8.5E-11	-	-	-	-	-	-	-	-
PCB-167	-	1.2E-10	-	2.8E-11	-	2.1E-15	-	-	-	-	-	-	-	-	-	-	-	4.0E-10	-	1.5E-10	-	1.5E-10	-	-	-	-	-	-	-	-
PCB-169	-	1.8E-09	-	4.2E-10	-	3.1E-14	-	-	-	-	-	-	-	-	-	-	-	6.0E-09	-	2.2E-09	-	2.2E-09	-	-	-	-	-	-	-	-
PCB-189	-	1.8E-11	-	4.2E-12	-	3.1E-16	-	-	-	-	-	-	-	-	-	-	-	6.0E-11	-	2.2E-11	-	2.2E-11	-	-	-	-	-	-	-	-
PCB-77	-	1.2E-10	-	2.9E-11	-	2.1E-15	-	-	-	-	-	-	-	-	-	-	-	2.3E-10	-	1.5E-10	-	1.5E-10	-	-	-	-	-	-	-	-
PCB-81	-	6.5E-11	-	1.5E-11	-	1.1E-15	-	-	-	-	-	-	-	-	-	-	-	1.2E-10	-	8.0E-11	-	8.0E-11	-	-	-	-	-	-	-	-
Cumulative Risk	1.8E-01	9.3E-06	1.5E-02	2.0E-06	1.4E-05	1.0E-10	7.3E-02	1.8E-06	3.0E-04	9.2E-09	4.2E-04	1.1E-08	4.2E-04	9.2E-09	4.9E+00	1.9E-06	2.1E+00	6.3E-06	5.2E+00	1.5E-05	2.6E-01	1.3E-05	4.9E+00	2.0E-06	1.6E-02	2.4E-06	3.8E-04	1.1E-06	1.7E-02	3.6E-06
W/O Domestic Groundwater Use																			2.6E-01	1.3E-05			8.4E-04	2.0E-08						

Table C3-9b (3 of 4)

Total Risk Estimates for the Child Resident - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Reasonable Maximum Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation of Indoor Air$_s$		Inhalation Ambient Air$_s$		Inhalation of Indoor Air$_{gw}$		Inhalation Ambient Air$_{gw}$		Domestic Groundwater Use		Plant Consumption		Cumulative Risk		Soil Media Risk		Groundwater Risk		Surface Water Ingestion		Surface Water Dermal Contact		Surface Water Risk	
	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)
Inorganic Compounds																														
Aluminum	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	3.1E-03	-	8.7E-05	-	3.2E-03	-
Antimony	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	7.0E-03	-	2.0E-04	-	7.2E-03	-
Arsenic	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	6.7E-02	1.5E-05	1.9E-03	2.1E-07	6.9E-02	1.5E-05
Barium	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Boron	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Cadmium	3.9E-03	1.2E-07	1.1E-05	3.3E-10	8.8E-06	6.0E-11	-	-	-	-	-	-	-	-	-	-	4.2E-02	1.9E-05	3.9E-03	1.2E-07	3.9E-03	1.2E-07	-	-	5.1E-04	1.6E-08	1.4E-05	2.2E-10	5.3E-04	1.6E-08
Chromium	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	4.1E-06	-	1.2E-07	-	4.3E-06	-
Copper	5.6E-03	-	1.6E-04	-	4.2E-06	-	-	-	-	-	-	-	-	-	3.6E-02	-	6.6E-01	-	4.2E-02	-	5.8E-03	-	3.6E-02	-	2.6E-04	-	7.3E-06	-	2.7E-04	-
Fluoride	-	-	-	-	-	-	-	-	-	-	-	-	-	-	7.5E-01	-	-	-	7.5E-01	-	-	-	7.5E-01	-	-	-	-	-	-	-
Lead	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Mercury	1.6E-01	-	4.5E-03	-	2.4E-05	-	-	-	-	-	-	-	-	-	-	-	8.5E-01	-	1.7E-01	-	1.7E-01	-	-	-	8.3E-04	-	2.3E-05	-	8.5E-04	-
Methyl Mercury	4.6E-04	-	1.3E-05	-	-	-	-	-	-	-	-	-	-	-	-	-	3.6E-03	-	4.8E-04	-	4.8E-04	-	-	-	-	-	-	-	-	-
Nickel	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	3.7E-04	-	2.1E-06	-	3.8E-04	-
Nitrate	-	-	-	-	-	-	-	-	-	-	-	-	-	-	7.1E-01	-	-	-	7.1E-01	-	-	-	7.1E-01	-	-	-	-	-	-	-
Silver	6.9E-03	-	1.9E-04	-	-	-	-	-	-	-	-	-	-	-	-	-	1.1E-04	-	7.0E-03	-	7.0E-03	-	-	-	-	-	-	-	-	-
Thallium	5.7E-01	-	1.6E-02	-	-	-	-	-	-	-	-	-	-	-	5.4E-01	-	5.8E-01	-	1.1E+00	-	5.9E-01	-	5.4E-01	-	4.8E-03	-	1.3E-04	-	4.9E-03	-
Vanadium	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1.0E-02	-	2.9E-04	-	1.1E-02	-
Zinc	9.3E-03	-	2.6E-04	-	3.6E-06	-	-	-	-	-	-	-	-	-	-	-	2.1E-01	-	9.6E-03	-	9.6E-03	-	-	-	-	-	-	-	-	-
VOCs																														
1,1,1-Trichloroethane	-	-	-	-	-	-	4.0E-04	-	-	-	-	-	-	-	-	-	-	-	4.0E-04	-	4.0E-04	-	-	-	5.0E-06	-	0.0E+00	-	5.0E-06	-
1,1,2-Trichloro-1,2,2-trifluoroethane	5.1E-09	-	1.4E-09	-	2.3E-13	-	1.7E-04	-	-	-	-	-	-	-	-	-	5.9E-07	-	1.7E-04	-	1.7E-04	-	-	-	-	-	-	-	-	-
1,1-Dichloroethane	-	-	-	-	-	-	1.8E-03	1.1E-07	8.2E-06	5.2E-10	1.2E-05	7.7E-10	8.2E-06	5.2E-10	4.2E-03	1.9E-07	-	-	5.9E-03	3.0E-07	1.8E-03	1.1E-07	4.2E-03	1.9E-07	-	-	-	-	-	-
1,2-Dichloroethane	-	-	-	-	-	-	-	-	1.9E-04	1.5E-09	2.0E-04	1.6E-09	1.9E-04	1.5E-09	7.2E-03	5.4E-07	-	-	7.6E-03	5.4E-07	1.9E-04	1.5E-09	7.6E-03	5.4E-07	-	-	-	-	-	-
1,2-Dichloroethene (total)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	3.6E-02	-	-	-	-	-	-	-	-	-	-	-	-	-
1-Chlorohexane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
2-Butanone	5.7E-07	-	1.6E-07	-	3.1E-12	-	-	-	-	-	-	-	-	-	-	-	4.2E-03	-	7.3E-07	-	7.3E-07	-	-	-	-	-	-	-	-	-
2-Hexanone	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Acetone	7.4E-05	-	2.1E-05	-	9.5E-10	-	-	-	1.1E-08	-	1.3E-08	-	1.1E-08	-	2.8E-03	-	6.3E-01	-	2.9E-03	-	9.5E-05	-	2.8E-03	-	-	-	-	-	-	-
Benzene	-	-	-	-	-	-	-	-	1.5E-04	1.0E-08	1.8E-04	1.2E-08	1.5E-04	1.0E-08	2.3E-02	7.4E-07	-	-	2.4E-02	7.6E-07	1.5E-04	1.0E-08	2.4E-02	7.6E-07	-	-	-	-	-	-
Carbon disulfide	-	-	-	-	-	-	-	-	-	-	4.2E-05	-	4.5E-05	-	4.2E-03	-	-	-	4.2E-03	-	-	-	4.2E-03	-	-	-	-	-	-	-
Chloromethane	-	-	-	-	-	-	-	-	-	-	9.0E-05	-	1.3E-04	-	-	-	-	-	2.2E-04	-	-	-	2.2E-04	-	-	-	-	-	-	-
cis-1,2-Dichloroethene	-	-	-	-	-	-	-	-	8.1E-05	-	8.9E-05	-	8.1E-05	-	8.2E-01	-	-	-	8.2E-01	-	8.1E-05	-	8.2E-01	-	-	-	-	-	-	-
Ethylbenzene	-	-	-	-	-	-	8.6E-04	-	-	-	-	-	-	-	-	-	-	-	8.6E-04	-	8.6E-04	-	-	-	-	-	-	-	-	-
m,p-Xylene	-	-	-	-	-	-	1.7E-02	-	-	-	-	-	-	-	-	-	-	-	1.7E-02	-	1.7E-02	-	-	-	-	-	-	-	-	-
Methylene chloride	2.5E-06	1.7E-10	7.0E-07	4.7E-11	1.7E-11	5.4E-16	6.3E-02	2.0E-06	5.4E-06	1.7E-10	4.2E-06	1.3E-10	5.4E-06	1.7E-10	1.7E-03	1.1E-07	6.5E-03	6.4E-06	6.5E-02	2.1E-06	6.3E-02	2.0E-06	1.7E-03	1.1E-07	-	-	-	-	-	-
Tetrachloroethene	-	-	-	-	-	-	2.4E-02	4.1E-07	-	-	-	-	-	-	-	-	9.5E-03	6.0E-05	2.4E-02	4.1E-07	2.4E-02	4.1E-07	-	-	-	-	-	-	-	-
Toluene	-	-	-	-	-	-	1.9E-04	-	-	-	-	-	-	-	3.6E-03	-	1.1E-02	-	3.8E-03	-	1.9E-04	-	3.6E-03	-	-	-	-	-	-	-
Trichloroethene	-	-	-	-	-	-	1.5E-03	1.4E-07	1.3E-05	1.2E-09	1.2E-05	1.2E-09	1.3E-05	1.2E-09	5.3E+00	1.7E-06	2.4E+00	1.1E-05	5.3E+00	1.8E-06	1.5E-03	1.4E-07	5.3E+00	1.7E-06	4.0E-03	1.3E-09	1.4E-03	2.1E-10	5.4E-03	1.5E-09
Xylenes (total)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	4.0E-04	-	-	-	-	-	-	-	-	-	-	-	-	-
SVOCs																														
2-Methylnaphthalene	8.0E-05	-	2.9E-05	-	1.0E-09	-	-	-	-	-	-	-	-	-	-	-	-	-	1.1E-04	-	1.1E-04	-	-	-	-	-	-	-	-	-
Acenaphthene	5.4E-05	-	2.0E-05	-	7.0E-10	-	-	-	-	-	-	-	-	-	-	-	1.2E-03	-	7.4E-05	-	7.4E-05	-	-	-	-	-	-	-	-	-
Acenaphthylene	5.8E-06	-	2.1E-06	-	7.5E-11	-	-	-	-	-	-	-	-	-	-	-	7.0E-04	-	7.9E-06	-	7.9E-06	-	-	-	-	-	-	-	-	-
Anthracene	4.2E-05	-	1.5E-05	-	5.4E-10	-	-	-	-	-	-	-	-	-	-	-	1.1E-04	-	5.7E-05	-	5.7E-05	-	-	-	-	-	-	-	-	-
Benzo(a)anthracene	-	1.7E-05	-	6.3E-06	-	7.2E-11	-	-	-	-	-	-	-	-	-	-	-	4.8E-06	-	2.3E-05	-	2.3E-05	-	-	-	-	-	-	-	-
Benzo(a)pyrene	-	1.8E-04	-	6.7E-05	-	7.7E-10	-	-	-	-	-	-	-	-	-	-	-	4.4E-05	-	2.5E-04	-	2.5E-04	-	-	-	-	-	-	-	-
Benzo(e)pyrene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Benzo(b)fluoranthene	-	8.4E-06	-	3.1E-06	-	3.5E-11	-	-	-	-	-	-	-	-	-	-	-	6.8E-06	-	1.1E-05	-	1.1E-05	-	-	-	-	-	-	-	-
Benzo(g,h,i)perylene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Benzo(k)fluoranthene	-	1.8E-05	-	6.7E-06	-	7.7E-11	-	-	-	-	-	-	-	-	-	-	-	2.6E-07	-	2.5E-05	-	2.5E-05	-	-	-	-	-	-	-	-
Chrysene	-	7.9E-07	-	2.9E-07	-	3.3E-12	-	-	-	-	-	-	-	-	-	-	-	1.4E-06	-	1.1E-06	-	1.1E-06	-	-	-	-	-	-	-	-
Dibenz(a,h)anthracene	-	4.7E-06	-	1.7E-06	-	6.0E-11	-	-	-	-	-	-	-	-	-	-	-	3.7E-07	-	6.4E-06	-	6.4E-06	-	-	-	-	-	-	-	-
Dibenzofuran	1.8E-03	-	6.5E-04	-	2.3E-08	-	-	-	-	-	-	-	-	-	-	-	-	-	2.4E-03	-	2.4E-03	-	-	-	-	-	-	-	-	-
Fluoranthene	4.2E-03	-	1.5E-03	-	5.4E-08	-	-	-	-	-	-	-	-	-	-	-	1.0E-03	-	5.7E-03	-	5.7E-03	-	-	-	-	-	-	-	-	-
Fluorene	8.3E-05	-	3.0E-05	-	1.1E-09	-	-	-	-	-	-	-	-	-	-	-	4.9E-04	-	1.1E-04	-	1.1E-04	-	-	-	-	-	-	-	-	-
Indeno(1,2,3-cd)pyrene	-	4.1E-06	-	1.5E-06	-	1.7E-11	-	-	-	-	-	-	-	-	-	-	-	1.2E-06	-	5.6E-06	-	5.6E-06	-	-	-	-	-	-	-	-
Naphthalene	3.7E-05	-	1.3E-05	-	1.1E-08	9.1E-14	-	-	-	-	-	-	-	-	-	-	-	-	5.1E-05	9.1E-14	5.1E-05	9.1E-14	-	-	-	-	-	-	-	-
Phenanthrene	2.5E-03	-	9.0E-04	-	3.2E-08	-	-	-	-	-	-	-	-	-	-	-	1.4E-03	-	3.4E-03	-	3.4E-03	-	-	-	-	-	-	-	-	-
Perylene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Pyrene	4.7E-03	-	1.7E-03	-	6.0E-08	-	-	-	-	-	-	-	-	-	-	-	1.2E-03	-	6.4E-03	-	6.4E-03	-	-	-	-	-	-	-	-	-
Total Petroleum Hydrocarbons																														
C11-C14(Kerosene Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
C14-C20(Diesel Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
C20-C30(Lubricant Oil Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

Table C3-9b (4 of 4)

Total Risk Estimates for the Child Resident - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Reasonable Maximum Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation of Indoor Air_s		Inhalation Ambient Air_s		Inhalation of Indoor Air_{gw}		Inhalation Ambient Air_{gw}		Domestic Groundwater Use		Plant Consumption		Cumulative Risk		Soil Media Risk		Groundwater Risk		Surface Water Ingestion		Surface Water Dermal Contact		Surface Water Risk	
	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)
Dioxins																														
2,3,7,8-TCDD	-	4.6E-08	-	3.9E-09	-	6.0E-13	-	-	-	-	-	-	-	-	-	-	-	-	-	5.0E-08	-	5.0E-08	-	-	-	-	-	-	-	-
1,2,3,7,8-PeCDD	-	1.8E-07	-	1.5E-08	-	2.3E-12	-	-	-	-	-	-	-	-	-	-	-	-	-	1.9E-07	-	1.9E-07	-	-	-	3.2E-08	-	3.6E-07	-	4.0E-07
1,2,3,4,7,8-HxCDD	-	5.0E-08	-	4.2E-09	-	6.4E-13	-	-	-	-	-	-	-	-	-	-	-	-	-	5.4E-08	-	5.4E-08	-	-	-	4.7E-09	-	5.4E-08	-	5.8E-08
1,2,3,6,7,8-HxCDD	-	2.5E-07	-	2.1E-08	-	3.2E-12	-	-	-	-	-	-	-	-	-	-	-	-	-	2.7E-07	-	2.7E-07	-	-	-	1.3E-07	-	1.4E-06	-	1.6E-06
1,2,3,7,8,9-HxCDD	-	1.2E-07	-	9.7E-09	-	1.5E-12	-	-	-	-	-	-	-	-	-	-	-	-	-	1.3E-07	-	1.3E-07	-	-	-	2.7E-08	-	3.0E-07	-	3.3E-07
1,2,3,4,6,7,8-HpCDD	-	2.0E-07	-	1.7E-08	-	8.5E-12	-	-	-	-	-	-	-	-	-	-	-	-	-	2.1E-07	-	2.1E-07	-	-	-	1.1E-07	-	1.2E-06	-	1.3E-06
OCDD	-	2.9E-07	-	2.4E-08	-	3.8E-12	-	-	-	-	-	-	-	-	-	-	-	-	-	3.2E-07	-	3.2E-07	-	-	-	1.5E-08	-	1.7E-07	-	1.9E-07
2,3,7,8-TCDF	-	1.0E-08	-	8.7E-10	-	1.3E-13	-	-	-	-	-	-	-	-	-	-	-	-	-	1.1E-08	-	1.1E-08	-	-	-	8.5E-09	-	9.7E-08	-	1.1E-07
1,2,3,7,8-PeCDF	-	4.6E-10	-	3.9E-11	-	6.0E-15	-	-	-	-	-	-	-	-	-	-	-	-	-	5.0E-10	-	5.0E-10	-	-	-	1.2E-09	-	1.4E-08	-	1.5E-08
2,3,4,7,8-PeCDF	-	3.6E-08	-	3.0E-09	-	4.6E-13	-	-	-	-	-	-	-	-	-	-	-	-	-	3.9E-08	-	3.9E-08	-	-	-	1.1E-07	-	1.3E-06	-	1.4E-06
1,2,3,4,7,8-HxCDF	-	2.3E-08	-	1.9E-09	-	3.0E-13	-	-	-	-	-	-	-	-	-	-	-	-	-	2.5E-08	-	2.5E-08	-	-	-	4.1E-08	-	4.6E-07	-	5.0E-07
1,2,3,6,7,8-HxCDF	-	2.2E-08	-	1.8E-09	-	2.8E-13	-	-	-	-	-	-	-	-	-	-	-	-	-	2.3E-08	-	2.3E-08	-	-	-	2.1E-08	-	2.4E-07	-	2.6E-07
2,3,4,6,7,8-HxCDF	-	3.8E-08	-	3.2E-09	-	4.9E-13	-	-	-	-	-	-	-	-	-	-	-	-	-	4.1E-08	-	4.1E-08	-	-	-	4.1E-08	-	4.6E-07	-	5.1E-07
1,2,3,7,8,9-HxCDF	-	2.3E-09	-	2.0E-10	-	3.0E-14	-	-	-	-	-	-	-	-	-	-	-	-	-	2.5E-09	-	2.5E-09	-	-	-	4.4E-08	-	5.0E-07	-	5.4E-07
1,2,3,4,6,7,8-HpCDF	-	6.6E-08	-	5.6E-09	-	8.6E-13	-	-	-	-	-	-	-	-	-	-	-	-	-	7.2E-08	-	7.2E-08	-	-	-	9.7E-09	-	1.1E-07	-	1.2E-07
1,2,3,4,7,8,9-HpCDF	-	5.6E-09	-	4.7E-10	-	7.3E-14	-	-	-	-	-	-	-	-	-	-	-	-	-	6.1E-09	-	6.1E-09	-	-	-	2.7E-09	-	3.0E-08	-	3.3E-08
OCDF	-	6.0E-09	-	5.0E-10	-	7.7E-14	-	-	-	-	-	-	-	-	-	-	-	-	-	6.5E-09	-	6.5E-09	-	-	-	7.6E-10	-	8.7E-09	-	9.5E-09
PCBs																														
Aroclor-1254	2.7E-01	8.8E-07	1.1E-01	3.4E-07	3.5E-06	1.1E-11	-	-	-	-	-	-	-	-	-	-	4.8E-01	2.2E-05	3.8E-01	1.2E-06	3.8E-01	1.2E-06	-	-	-	-	-	-	-	-
Aroclor-1260	-	1.6E-05	-	6.1E-06	-	2.0E-10	-	-	-	-	-	-	-	-	-	-	-	2.0E-04	-	2.2E-05	-	2.2E-05	-	-	-	-	-	-	-	-
PCB-105	-	2.5E-09	-	9.8E-10	-	3.2E-14	-	-	-	-	-	-	-	-	-	-	-	5.8E-08	-	3.5E-09	-	3.5E-09	-	-	-	-	-	-	-	-
PCB-114	-	4.4E-11	-	1.7E-11	-	5.7E-16	-	-	-	-	-	-	-	-	-	-	-	1.0E-09	-	6.2E-11	-	6.2E-11	-	-	-	-	-	-	-	-
PCB-118	-	5.0E-09	-	2.0E-09	-	6.4E-14	-	-	-	-	-	-	-	-	-	-	-	1.2E-07	-	7.0E-09	-	7.0E-09	-	-	-	-	-	-	-	-
PCB-123	-	7.1E-11	-	2.8E-11	-	9.1E-16	-	-	-	-	-	-	-	-	-	-	-	1.6E-09	-	9.9E-11	-	9.9E-11	-	-	-	-	-	-	-	-
PCB-126	-	6.5E-07	-	2.5E-07	-	8.3E-12	-	-	-	-	-	-	-	-	-	-	-	1.5E-05	-	9.0E-07	-	9.0E-07	-	-	-	-	-	-	-	-
PCB-156	-	1.7E-09	-	6.5E-10	-	2.1E-14	-	-	-	-	-	-	-	-	-	-	-	3.8E-08	-	2.3E-09	-	2.3E-09	-	-	-	-	-	-	-	-
PCB-157	-	7.5E-10	-	2.9E-10	-	9.7E-15	-	-	-	-	-	-	-	-	-	-	-	1.7E-08	-	1.0E-09	-	1.0E-09	-	-	-	-	-	-	-	-
PCB-167	-	1.3E-09	-	5.1E-10	-	1.7E-14	-	-	-	-	-	-	-	-	-	-	-	3.0E-08	-	1.8E-09	-	1.8E-09	-	-	-	-	-	-	-	-
PCB-169	-	1.9E-08	-	7.6E-09	-	2.5E-13	-	-	-	-	-	-	-	-	-	-	-	4.5E-07	-	2.7E-08	-	2.7E-08	-	-	-	-	-	-	-	-
PCB-189	-	1.9E-10	-	7.6E-11	-	2.5E-15	-	-	-	-	-	-	-	-	-	-	-	4.5E-09	-	2.7E-10	-	2.7E-10	-	-	-	-	-	-	-	-
PCB-77	-	1.3E-09	-	5.1E-10	-	1.7E-14	-	-	-	-	-	-	-	-	-	-	-	1.7E-08	-	1.8E-09	-	1.8E-09	-	-	-	-	-	-	-	-
PCB-81	-	6.9E-10	-	2.7E-10	-	8.8E-15	-	-	-	-	-	-	-	-	-	-	-	9.0E-09	-	9.6E-10	-	9.6E-10	-	-	-	-	-	-	-	-
Cumulative Risk	1.0E+00	2.6E-04	1.3E-01	9.3E-05	4.5E-05	1.3E-09	1.1E-01	2.7E-06	4.5E-04	1.4E-08	6.3E-04	1.6E-08	6.3E-04	1.4E-08	8.2E+00	3.2E-06	5.9E+00	3.7E-04	9.5E+00	3.5E-04	1.3E+00	3.5E-04	8.2E+00	3.3E-06	9.8E-02	1.6E-05	4.0E-03	7.0E-06	1.0E-01	2.3E-05
W/O Domestic Groundwater Use																			1.3E+00	3.5E-04			1.3E-03	3.0E-08						

Notes:

Inhalation Indoor Air_{s-gw} - Exposure associated with indoor air concentrations of COPCs modeled from soil vapor, soil, or groundwater.

Inhalation Ambient Air_{s-gw} - Exposure associated with ambient air concentrations of COPCs modeled from soil or groundwater.

HQ - hazard quotient

HI - hazard index

Risk - incremental increased lifetime cancer risk

VOC - volatile organic compound

SVOC - semi-volatile organic compound

PCDD/PCDFs - Polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.

PCB - polychlorinated biphenyls

COPC - chemical of potential concern

"-" indicates that either adequate toxicity data were not available for a chemical or the exposure pathway was not applicable to that chemical.

Table C3-10a (1 of 1)

Estimated Blood Lead Levels - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Exposure Scenario	Percentile Estimate of Blood Lead Concentration (µg/dl)				
	50th	90th	95th	98th	99th
Central Tendency Exposure					
Adult Worker	0.87	1.6	1.9	2.3	2.6
Adult Recreator	0.85	1.5	1.8	2.2	2.5
Child Recreator	1.0	1.8	2.1	2.6	2.9
Adult Resident	0.87	1.6	1.9	2.3	2.6
Child Resident	1.1	2.0	2.4	2.9	3.3
Reasonable Maximum Exposure					
Adult Worker	1.0	1.8	2.2	2.7	3.0
Adult Recreator	0.96	1.75	2.1	2.5	2.9
Child Recreator	1.2	2.2	2.6	3.2	3.6
Adult Resident	1.0	1.8	2.2	2.7	3.0
Child Resident	1.4	2.6	3.1	3.7	4.3

Notes:

Blood lead concentrations estimated using the DTSC LeadSpread Model, Version 7, and incpororation of site-specific exposure parameters specified in the SRAM for skin surface area, soil adherence factor, soil ingestion rate, inhalation rate, drinking water consumption rate, and homegrown edible plant consumption rate.

µg/dl - micrograms per deciliter

Table C3-10b (1 of 1)

Estimated Blood Lead Levels - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Exposure Scenario	Percentile Estimate of Blood Lead Concentration (µg/dl)				
	50th	90th	95th	98th	99th
Central Tendency Exposure					
Adult Worker	0.86	1.6	1.9	2.3	2.6
Adult Recreator	0.85	1.5	1.8	2.2	2.5
Child Recreator	1.0	1.8	2.1	2.6	2.9
Adult Resident	0.87	1.6	1.9	2.3	2.6
Child Resident	1.1	2.0	2.3	2.8	3.2
Reasonable Maximum Exposure					
Adult Worker	1.0	1.8	2.1	2.6	3.0
Adult Recreator	0.94	1.72	2.0	2.5	2.8
Child Recreator	1.1	2.0	2.4	2.9	3.3
Adult Resident	1.0	1.8	2.1	2.6	3.0
Child Resident	1.3	2.4	2.8	3.4	3.9

Notes:

Blood lead concentrations estimated using the DTSC LeadSpread Model, Version 7, and incpororation of site-specific exposure parameters specified in the SRAM for skin surface area, soil adherence factor, soil ingestion rate, inhalation rate, drinking water consumption rate, and homegrown edible plant consumption rate.

µg/dl - micrograms per deciliter

Table C3-11a (Page 1 of 1)

Human Health Risk Estimates - Dry Pond Scenario[1]
Sodium Reactor Experiment (SRE) Area

Receptor	Soil Media[2]				Groundwater[3]				Total for Site Media			
	HI Range	CD[4]	Risk Range	CD	HI Range	CD	Risk Range	CD	HI Range	CD	Risk Range	CD
Adult Worker	0.013 - 0.12		5E-07 - 2E-05	a,b,c	<0.001 - <0.001		3E-09 - 2E-08		0.013 - 0.12		5E-07 - 2E-05	a,b,c
Future Adult Recreator	0.0011 - 0.042		3E-08 - 1E-05	c	<0.001 - <0.001		3E-10 - 1E-09		0.0011 - 0.042		3E-08 - 1E-05	c
Future Child Recreator	0.021 - 0.12		4E-07 - 8E-06	c	<0.001 - <0.001		1E-09 - 6E-09		0.021 - 0.12	c	4E-07 - 8E-06	c
Future Adult Resident	0.028 - 0.12		1E-06 - 2E-05	a,b,c,d	1.4 - 2.2	e	8E-07 - 3E-06	e	1.4 - 2.3	e	2E-06 - 2E-05	a,b,c,d,e
without domestic use of groundwater[5]	NA NA		NA NA		<0.001 - <0.001		5E-09 - 4E-08		0.028 - 0.12		1E-06 - 2E-05	a,b,c,d
Future Child Resident	0.22 - 0.81		5E-06 - 3E-05	a,b,c,d	4.9 - 8.2	e	2E-06 - 3E-06	e	5.1 - 9.0	e	7E-06 - 4E-05	a,b,c,d,e
without domestic use of groundwater[5]	NA NA		NA NA		<0.001 - 0.0013		2E-08 - 3E-08		0.22 - 0.81		5E-06 - 3E-05	a,b,c,d

Notes:
1. Risk estimates shown are a sum of all exposure pathways per media; the range reported is for the central tendency and reasonable maximum exposures, respectively.
2. Soil media risk estimates are a sum of all direct and indirect exposure so site soil and soil vapor.
3. Groundwater media risk estimates are a sum of exposure to site groundwater.
4. Chemical risk drivers are those COPCs detected onsite with an HI > 1, risk > $1x10^{-6}$. Only major risk contributors listed if cumulative HI >> 1 or cancer risk >> $1x10^{-6}$.
5. Groundwater media risk estimates are for indirect exposure only and assume no domestic use of groundwater.

a = PAHs
b = Dioxins
c = PCBs
d = Methylene Chloride
e = TCE

CD = Chemical risk driver
COPC = Chemical of potential concern
HI = Hazard index
NA = Not Applicable

Table C3-11b (Page 1 of 1)

Human Health Risk Estimates - Wet Pond Scenario[1]
Sodium Reactor Experiment (SRE) Area

Receptor	Soil/Sediment Media[2]				Groundwater[3]				Surface Water				Total for Site Media			
	HI Range	CD[4]	Risk Range	CD	HI Range	CD	Risk Range	CD	HI Range	CD	Risk Range	CD	HI Range	CD	Risk Range	CD
Adult Worker	0.017 - 0.19		2E-06 - 2E-04	a,b	<0.001 - <0.001		3E-09 - 2E-08		- - -		- - -		0.017 - 0.19		2E-06 - 2E-04	a,b
Future Adult Recreator	0.0011 - 0.042		3E-08 - 9E-06	b	<0.001 - <0.001		3E-10 - 1E-09		0.0023 - 0.016		3E-06 - 5E-05	c,d	0.0011 - 0.042		3E-08 - 9E-06	b
Future Child Recreator	0.021 - 0.12		4E-07 - 7E-06	b	<0.001 - <0.001		1E-09 - 6E-09		0.017 - 0.10		4E-06 - 2E-05	c,d	0.021 - 0.12		4E-07 - 7E-06	b
Future Adult Resident	0.033 - 0.17		2E-06 - 2E-04	a,b,e	1.4 - 2.2	f	8E-07 - 3E-06	f	0.0017 - 0.011		4E-07 - 7E-06	c,d	1.4 - 2.3	f	3E-06 - 2E-04	a,b,e,f
without domestic use of groundwater	NA NA		NA NA		<0.001 - <0.001		5E-09 - 4E-08		NA NA		NA NA		0.033 - 0.17		2E-06 - 2E-04	a,b,e
Future Child Resident	0.26 - 1.3		1E-05 - 4E-04	a,b,d,e	4.9 - 8.2	f	2E-06 - 3E-06	f	0.016 0.098		2E-06 2E-05	c,d	5.2 - 9.5	f,g	2E-05 - 4E-04	a,b,d,e,f
without domestic use of groundwater	NA NA		NA NA		<0.001 - 0.0013		2E-08 - 3E-08		NA NA		NA NA		0.26 - 1.3		1E-05 - 4E-04	a,b,d,e

Notes:

1. Risk estimates shown are a sum of all exposure pathways per media; the range reported is for the central tendency and reasonable maximum exposures, respectively.
   Potential exposure to soil/sediment assumes that the SRE Pond may not at some time in the future contain water and that sediments may be dry (i.e. dry sediments are the same as soil with respect exposure pathways).
   Therefore, risks and HIs presented for Soil/Sediment Media, Near-Surface Groundwater, and Total for Site Media are mutually exclusive of those presented for Surface Water. Total for Site Media risks and HIs include only Sediment/Soil Media Groundwater.
2. Soil media risk estimates are a sum of all direct and indirect exposure so site soil and soil vapor.
3. Groundwater media risk estimates are a sum of exposure to site groundwater.
4. Chemical risk drivers are those COPCs detected onsite with an HI > 1, risk > $1x10^{-6}$. Only major risk contributors listed if cumulative HI >> 1 or cancer risk >> $1x10^{-6}$.
5. Groundwater media risk estimates are for indirect exposure only and assume no domestic use of groundwater.

a. PAHs
b. PCBs
c. Arsenic
d. Dioxins
e. Methylene Chloride
f. Trichloroethene
g. Thallium

CD = Chemical risk driver
COPC = Chemical of potential concern
HI = Hazard index
NA = Not Applicable

Table C3-12 (1 of 2)

Human Health Risk Assessment Uncertainty Analysis
Sodium Reactor Experiment (SRE) Area

Assessment Element	Uncertainty	Magnitude of Impact	Direction of Impact
Exposure Pathways	The SRE Area contains an intermittent pond. Based on the potential for both dry (e.g. fugitive dust) and wet (e.g. surface water) exposures in the same area; both scenarios were evaluated separately.	Low	Conservative
	Domestic use of near surface groundwater was determined to be an incomplete exposure pathway because the estimated production rate is below the minimum criteria of 200 gpd specified in the SRAM.	Low	Realistic, reasonable determination
	Risks associated with drinking of groundwater are not realistic because the groundwater beneath the SSFL is not currently used as a drinking water source and the presence of the contamination will likely require a restriction on its future use as well.	High	Conservative
	Groundwater monitoring data and comparison concentrations (I.e., background), are filtered samples (I.e., dissolved concentrations) as per agency-approved groundwater monitoring work plan. Although dissolved concentrations represent the concentrations that may migrate, the total concentration in groundwater may be greater when there are significant amounts of dissolved solids present (i.e., total concentration.	Moderate	Realistic, reasonable determination
	Future land use of the site is currently undecided but may be commercial or recreational, which have lower risks than residential.	Moderate	Uncertain
COPC Selection	A number of inorganics (e.g., cadmium, copper) that were demonstrated to be consistent with background concentrations through Wilcoxon Rank Sum test were included as COPCs because the maximum detected concentrations were substantially above the maximum detected background concentration, and were located in areas of suspected metals impacts.	Moderate	Conservative
EPC Calculations	The extrapolation of soil TPH concentrations to individual petroleum constituent (i.e., PAHs) concentrations introduces some uncertainty into the EPC estimates for petroleum constituents. Because several samples collected for SVOCs did not detect PAHs, the uncertainty associated with this procedure is low.	Low	Conservative
	Significant risks from soil matrix COPCs are associated vapor concentrations estimated to be 1/2 the soil vapor DL though the chemical was not detected in soil vapor.	Low	Conservative
	The mean concentration for some chemicals exceeded the selected RME concentrations, therefore the RME concentration was also used as the CTE concentration under some circumstances. The mean could be biased high by higher detection limits.	Moderate	Conservative
	The 95% UCL concentration of some chemicals is greater than the maximum concentration, therefore the maximum was used as the EPC. This is considered to be a likely overestimation of the representative exposure point concentration because samples were collected in areas with the highest likelihood to detect the highest concentrations at the site.	Moderate	Conservative
	The maximum detected concentration of each COPC detected in groundwater was used as the EPC.	Moderate	Conservative
	Vapor migration into indoor air has been estimated using a model which is being validated for the site. Migration estimates may be changed once the model validation is complete.	Moderate	Uncertain
	The Johnson & Ettinger model used to estimate indoor air concentrations is highly conservative for warm and arid climates since it was developed based on building characteristics in the northeast.	Moderate	Conservative
Cancer Slope Factor	Extrapolation of dose-response data from laboratory animals to humans.	High	Conservative
	Assumes that all carcinogens do not have a threshold below which carcinogenic response occurs, and therefore, any dose, no matter how small, results in some potential risk.	Moderate	Conservative

Table C3-12 (2 of 2)

Human Health Risk Assessment Uncertainty Analysis
Sodium Reactor Experiment (SRE) Area

Assessment Element	Uncertainty	Magnitude of Impact	Direction of Impact
	Cancer slope factors derived from animal studies are the upper-bound maximum likelihood estimates based on a linear dose-response curve, and therefore, overstate carcinogenic potency.	Moderate	Conservative
Reference Dose	High degree of uncertainty in extrapolation of dose-response data from laboratory animals to humans.	High	Conservative

Notes:

PAH - polycyclic aromatic hydrocarbon
EPC - exposure point concentration
UCL - upper confidence limit

Table C3-13 (1 of 2)

Summary of Chemicals of Potential Ecological Concern
Sodium Reactor Experiment (SRE) Area

Chemical	Soil/Sediment (0 to 2 feet bgs)	Soil/Sediment (0 to 4 feet bgs)	Soil/Sediment (0 to 6 feet bgs)	Soil Vapor (0 to 6 feet bgs)	Surface Water
Inorganic Compounds					
Aluminum					X
Antimony					X
Arsenic					X
Beryllium					X
Cadmium	X	X	X		X
Chromium					X
Copper	X	X	X		X
Lead	X	X	X		X
Mercury	X	X	X		X
Methyl Mercury	X	X	X		
Nickel					X
Selenium					X
Silver	X	X	X		X
Thallium	X	X	X		X
Vanadium					X
Zinc	X	X	X		
VOCs					
1,1,1-Trichloroethane		X	X	X[a]	X
1,1,2-Trichloro-1,2,2-trifluoroethane	X	X	X	X	
1,1-Dichloroethane		X	X	X[a]	
1,2-Dichloroethene (total)	X	X	X		
2-Butanone	X	X	X		
Acetone	X	X	X		
Ethylbenzene			X	X[a]	
m,p-Xylene			X[b]	X[a]	
Methylene chloride	X	X	X	X[a]	
Tetrachloroethene	X	X	X	X[a]	
Toluene	X	X	X	X[a]	
Trichloroethene	X	X	X	X[a]	X
Xylenes (total)	X	X	X		
SVOCs					
Acenaphthene	X	X	X		
Acenaphthylene	X	X	X		
Anthracene	X	X	X		
Benzo(a)anthracene	X	X	X		
Benzo(a)pyrene	X	X	X		
Benzo(b)fluoranthene	X	X	X		
Benzo(e)pyrene	X	X	X		
Benzo(g,h,i)perylene	X	X	X		
Benzo(k)fluoranthene	X	X	X		
bis(2-Ethylhexyl)phthalate					X
Butyl benzyl phthalate					X
Chrysene	X	X	X		
Dibenz(a,h)anthracene	X	X	X		
Dibenzofuran		X	X		
Diethylphthalate					X
Di-n-butylphthalate					X
Di-n-octyl phthalate					X
Fluoranthene	X	X	X		
Fluorene	X	X	X		
Hexachlorobutadiene					X
Hexachlorocyclopentadiene					X
Indeno(1,2,3-cd)pyrene	X	X	X		
Naphthalene			X		
Pentachlorophenol					X
Perylene	X	X	X		
Phenanthrene	X	X	X		
Pyrene	X	X	X		

Table C3-13 (2 of 2)

Summary of Chemicals of Potential Ecological Concern
Sodium Reactor Experiment (SRE) Area

Chemical	Soil/Sediment (0 to 2 feet bgs)	Soil/Sediment (0 to 4 feet bgs)	Soil/Sediment (0 to 6 feet bgs)	Soil Vapor (0 to 6 feet bgs)	Surface Water
Pesticides					
4,4'-DDT					X
Chlordane					X
Dieldrin					X
Endosulfan I					X
Endosulfan II					X
Endrin					X
Heptachlor					X
Heptachlor epoxide					X
Toxaphene					X
Total Petroleum Hydrocarbons					
C11-C14(Kerosene Range)	X	X	X		
C14-C20(Diesel Range)		X	X		
C20-C30(Lubricant Oil Range)	X	X	X		
Dioxins					
2,3,7,8-TCDD	X	X	X		
1,2,3,7,8-PeCDD	X	X	X		X
1,2,3,4,7,8-HxCDD	X	X	X		X
1,2,3,6,7,8-HxCDD	X	X	X		X
1,2,3,7,8,9-HxCDD	X	X	X		X
1,2,3,4,6,7,8-HpCDD	X	X	X		X
OCDD	X	X	X		X
2,3,7,8-TCDF	X	X	X		X
1,2,3,7,8-PeCDF	X	X	X		X
2,3,4,7,8-PeCDF	X	X	X		X
1,2,3,4,7,8-HxCDF	X	X	X		X
1,2,3,6,7,8-HxCDF	X	X	X		X
2,3,4,6,7,8-HxCDF	X	X	X		X
1,2,3,7,8,9-HxCDF	X	X	X		X
1,2,3,4,6,7,8-HpCDF	X	X	X		X
1,2,3,4,7,8,9-HpCDF	X	X	X		X
OCDF	X	X	X		X
PCBs					
Aroclor-1016					X
Aroclor-1221					X
Aroclor-1232					X
Aroclor-1242					X
Aroclor-1248					X
Aroclor-1254	X	X	X		X
Aroclor-1260	X	X	X		X
PCB-105	X	X	X		
PCB-114	X	X	X		
PCB-118	X	X	X		
PCB-156	X	X	X		
PCB-157	X	X	X		
PCB-167	X	X	X		
PCB-169	X	X	X		
PCB-189	X	X	X		
PCB-77	X	X	X		
PCB-81	X	X	X		

Notes:
X - selected as a CPEC.
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyl
bgs - below ground surface
CPEC - chemical of potential ecological concern
(a) Chemical selected as a CPEC since it was selected as a CPEC in soil at 0 to 6 feet bgs.
(b) Risks were quantified from total xylenes and not m,p-xylenes because the exposure point concentrations were greater for total xylenes than for m,p-xylenes.

Table C3-14 (1 of 1)

Ecological Risk Assessment Conceptual Site Model
Sodium Reactor Experiment (SRE) Area

NOTES:
(*) Trophic Level: P = primary producers (e.g., plants); D = detrivores (e.g., invertabrates); 1 = 1st consumer (e.g., mule deer); 2 = 2nd consumer (e.g. deer mouse); 3 = 3rd consumer (e.g., red-tailed hawk).
(**) Exposure limited to volatile compounds as defined in the text.
(***) Exposures limited to bioacummulative compounds as defined in the text.

- complete and potentially complete exposure pathways evaluated in this risk assessment

- incomplete exposure pathways not evaluated in this risk assessment

- minor exposure pathway not evaluated in this risk assessment

Baseline Toxicity Criteria for Ecological Risk Assessment
Sodium Reactor Experiment (SRE) Area

Chemical	Mammalian Scaling Factor[a]	Small Mammal TRV (mg/kg-day)	Small Mammal Scaling Used?[b]	Source	Small Mammal RfC (mg/m^3)	Source	Bobcat TRV[b] (mg/kg-day)	Bobcat Scaling Used?	Mule Deer TRV[b] (mg/kg-day)	Mule Deer Scaling Used?	Avian TRV (mg/kg-day)	Source
Inorganic Compounds												
Antimony	0.94	-	-	-	-	-	-	-	-	-	-	-
Aluminum	0.94	-	-	-	-	-	-	-	-	-	-	-
Arsenic	0.491	-	-	-	-	-	-	-	-	-	-	-
Beryllium	0.94	-	-	-	-	-	-	-	-	-	-	-
Cadmium	0.44	1.0	No	s	-	-	1.0	No	0.047	Yes	0.080	g
Chromium	0.94	-	-	-	-	-	-	-	-	-	-	-
Copper	0.94	10	No	f	-	-	-	-	-	-	2.3	g
Lead	0.94	1.0	No	d	-	-	-	-	0.74	Yes	0.014	e
Mercury	0.983	1.2	No	I	-	-	-	-	-	-	0.45	g
Methyl Mercury	0.64	-	-	-	-	-	-	-	-	-	-	-
Nickel	0.94	-	-	-	-	-	-	-	-	-	-	-
Selenium	1.01	-	-	-	-	-	-	-	-	-	-	-
Silver	0.94	65	No	p	-	-	-	-	-	-	-	-
Thallium	0.81	-	-	-	-	-	-	-	-	-	-	-
Vanadium	1.201	-	-	-	-	-	-	-	-	-	-	-
Zinc	0.85	120	No	k	-	-	120	No	53	Yes	15	g
VOCs												
1,1,1-Trichloroethane	0.65	-	-	-	1111	g	-	-	-	-	-	-
1,1,2-Trichloro-1,2,2-trifluoroethane	0.94	-	-	-	55	g	-	-	-	-	-	-
1,1-Dichloroethane	0.94	-	-	-	56	g	-	-	-	-	-	-
2-Butanone	0.94	-	-	-	-	-	-	-	-	-	-	-
Acetone	1.128	-	-	-	-	-	-	-	-	-	-	-
Bromomethane	0.94	-	-	-	-	-	-	-	-	-	-	-
Ethylbenzene	0.94	-	-	-	60	t	-	-	-	-	-	-
m,p-Xylene	0.94	-	-	-	15	u	-	-	-	-	-	-
Methylene chloride	0.813	-	-	-	6.5	g	-	-	-	-	-	-
Tetrachloroethene	0.94	-	-	-	198	v	-	-	-	-	-	-
Toluene	0.94	-	-	-	219	w	-	-	-	-	-	-
trans-1,3-Dichloropropene	0.94	-	-	-	-	-	-	-	-	-	-	-
Trichloroethene	1.11	-	-	-	1736	y	-	-	-	-	-	-
Xylenes (total)	0.94	-	-	-	-	-	-	-	-	-	-	-

Baseline Toxicity Criteria for Ecological Risk Assessment
Sodium Reactor Experiment (SRE) Area

Chemical	Mammalian Scaling Factor[a]	Small Mammal TRV (mg/kg-day)	Small Mammal Scaling Used?[b]	Source	Small Mammal RfC (mg/m^3)	Source	Bobcat TRV[b] (mg/kg-day)	Bobcat Scaling Used?	Mule Deer TRV[b] (mg/kg-day)	Mule Deer Scaling Used?	Avian TRV (mg/kg-day)	Source
SVOCs												
Acenaphthene	0.94	-	-	-	-	-	-	-	-	-	-	-
Acenaphthylene	0.94	-	-	-	-	-	-	-	-	-	-	-
Anthracene	0.94	-	-	-	-	-	-	-	-	-	-	-
Benzo(a)anthracene	0.94	-	-	g	-	-	0.92	Yes	-	-	-	-
Benzo(a)pyrene	0.94	-	-	g	-	-	0.92	Yes	-	-	-	-
Benzo(b)fluoranthene	0.94	-	-	g	-	-	0.92	Yes	-	-	-	-
Benzo(e)pyrene	NA	-	-	-	-	-	-	-	-	-	-	-
Benzo(g,h,i)perylene	0.94	-	-	-	-	-	-	-	-	-	-	-
Benzo(k)fluoranthene	0.94	-	-	g	-	-	0.92	Yes	-	-	-	-
bis(2-Ethylhexyl)phthalate	1.531	-	-	-	-	-	-	-	-	-	-	-
Butyl benzyl phthalate	0.94	-	-	-	-	-	-	-	-	-	-	-
Chrysene	0.94	-	-	g	-	-	0.92	Yes	-	-	-	-
Dibenz(a,h)anthracene	0.94	-	-	-	-	-	-	-	-	-	-	-
Dibenzofuran	0.94	-	-	-	-	-	-	-	-	-	-	-
Diethylphthalate	0.716	-	-	-	-	-	-	-	-	-	-	-
Di-n-butylphthalate	1.345	-	-	-	-	-	-	-	-	-	0.11	g
Di-n-octyl phthalate	0.94	-	-	-	-	-	-	-	-	-	-	-
Fluoranthene	0.94	-	-	-	-	-	-	-	-	-	-	-
Fluorene	0.94	-	-	-	-	-	-	-	-	-	-	-
Hexachlorobutadiene	0.94	-	-	-	-	-	-	-	-	-	-	-
Hexachlorocyclopentadiene	0.94	-	-	-	-	-	-	-	-	-	-	-
Indeno(1,2,3-cd)pyrene	0.94	-	-	-	-	-	0.9	Yes	-	-	-	-
Naphthalene	0.94	-	-	-	-	-	-	-	-	-	-	-
Pentachlorophenol	0.817	-	-	-	-	-	-	-	-	-	-	-
Perylene	NA	-	-	-	-	-	-	-	-	-	-	-
Phenanthrene	0.94	-	-	-	-	-	-	-	-	-	1.1	g
Pyrene	0.94	-	-	-	-	-	-	-	-	-	-	-
Pesticides												
4,4'-DDT	0.94	-	-	-	-	-	-	-	-	-	-	-
Chlordane	0.94	-	-	-	-	-	-	-	-	-	-	-
Dieldrin	0.94	-	-	-	-	-	-	-	-	-	-	-
Endosulfan I	0.94	-	-	-	-	-	-	-	-	-	-	-
Endosulfan II	0.94	-	-	-	-	-	-	-	-	-	-	-

Baseline Toxicity Criteria for Ecological Risk Assessment
Sodium Reactor Experiment (SRE) Area

Chemical	Mammalian Scaling Factor[a]	Small Mammal TRV (mg/kg-day)	Small Mammal Scaling Used?[b]	Source	Small Mammal RfC (mg/m^3)	Source	Bobcat TRV[b] (mg/kg-day)	Bobcat Scaling Used?	Mule Deer TRV[b] (mg/kg-day)	Mule Deer Scaling Used?	Avian TRV (mg/kg-day)	Source
Endrin	0.94	-	-	-	-	-	-	-	-	-	-	-
Heptachlor	0.94	-	-	-	-	-	-	-	-	-	-	-
Heptachlor epoxide	0.94	-	-	-	-	-	-	-	-	-	-	-
Toxaphene	0.94	-	-	-	-	-	-	-	-	-	-	-
Dioxins												
2,3,7,8-TCDD	0.537	-	-	-	-	-	-	-	-	-	-	-
1,2,3,7,8-PeCDD	0.537	-	-	-	-	-	-	-	-	-	-	-
1,2,3,4,7,8-HxCDD	0.537	-	-	-	-	-	-	-	-	-	-	-
1,2,3,6,7,8-HxCDD	0.537	-	-	-	-	-	-	-	-	-	-	-
1,2,3,7,8,9-HxCDD	0.537	-	-	-	-	-	-	-	-	-	-	-
1,2,3,4,6,7,8-HpCDD	0.537	0.00010	No	g	-	-	-	-	-	-	-	-
OCDD	0.537	-	-	-	-	-	-	-	-	-	-	-
2,3,7,8-TCDF	0.537	-	-	-	-	-	-	-	-	-	-	-
1,2,3,7,8-PeCDF	0.537	-	-	-	-	-	-	-	-	-	-	-
2,3,4,7,8-PeCDF	0.537	-	-	-	-	-	-	-	-	-	-	-
1,2,3,4,7,8-HxCDF	0.537	-	-	-	-	-	-	-	-	-	-	-
1,2,3,6,7,8-HxCDF	0.537	-	-	-	-	-	-	-	-	-	-	-
1,2,3,4,6,7,8-HpCDF	0.537	-	-	-	-	-	-	-	-	-	-	-
1,2,3,4,7,8,9-HpCDF	0.537	-	-	-	-	-	-	-	-	-	-	-
OCDF	0.537	-	-	-	-	-	-	-	-	-	-	-
PCBs												
Aroclor-1016	0.94	-	-	-	-	-	-	-	-	-	-	-
Aroclor-1221	0.94	-	-	-	-	-	-	-	-	-	-	-
Aroclor-1232	0.94	-	-	-	-	-	-	-	-	-	-	-
Aroclor-1242	0.94	-	-	-	-	-	-	-	-	-	-	-
Aroclor-1248	0.94	-	-	-	-	-	-	-	-	-	-	-
Aroclor-1254	0.94	0.36	No	r	-	-	-	-	-	-	-	-
Aroclor-1260	0.94	0.36	No	r	-	-	0.36	No	0.26	Yes	0.42	z
PCB-105	0.94	-	-	-	-	-	-	-	-	-	-	-
PCB-114	0.94	-	-	-	-	-	-	-	-	-	-	-
PCB-118	0.94	-	-	-	-	-	-	-	-	-	-	-
PCB-123	0.94	-	-	-	-	-	-	-	-	-	-	-
PCB-126	0.94	0.000010	No	g	-	-	-	-	-	-	-	-

Baseline Toxicity Criteria for Ecological Risk Assessment
Sodium Reactor Experiment (SRE) Area

Chemical	Mammalian Scaling Factor[a]	Small Mammal TRV (mg/kg-day)	Small Mammal Scaling Used?[b]	Source	Small Mammal RfC (mg/m^3)	Source	Bobcat TRV[b] (mg/kg-day)	Bobcat Scaling Used?	Mule Deer TRV[b] (mg/kg-day)	Mule Deer Scaling Used?	Avian TRV (mg/kg-day)	Source
PCB-156	0.94	-	-	-	-	-	-	-	-	-	-	-
PCB-157	0.94	-	-	-	-	-	-	-	-	-	-	-
PCB-167	0.94	-	-	-	-	-	-	-	-	-	-	-
PCB-169	0.94	-	-	-	-	-	-	-	-	-	-	-
PCB-189	0.94	-	-	-	-	-	-	-	-	-	-	-
PCB-77	0.94	-	-	-	-	-	-	-	-	-	-	-
PCB-81	0.94	-	-	-	-	-	-	-	-	-	-	-

Notes:

a. Based on Sample and Arenal (2000).

b. Bobcat and mule deer TRVs are based on small mammal TRVs. Allometric scaling was performed if there was body weight difference between the test species and the receptor species greater than 100-fold.

d. Lead - small mammal TRV based on chronic NOAEL in the rat (0.35 kg) of 8 mg/kg-day for reproductive effects mg/kg-day (Sample et al. 1996).

e. Lead - avian TRV based on NOAEL in Japanese quail of 1.13 (Sample et al., 1996).

f. Copper - small mammal TRV based on subchronic NOAEL in the rat (0.131 kg) of 102 mg/kg-day with an uncertainty factor of 10 applied to convert from subchronic to chronic (Hebert et al. 1993).

g. Lowest available toxicity values for mammals as used to derive ecological screening levels (ESLs).

i. Mercury - small mammal TRV based on chronic NOAEL in the mink (0.91 kg) of 1.2 mg/kg-day for reproductive effects (Aulerich et al, 1974).

k. Zinc - small mammal TRV based on chronic NOAEL in the rat (0.25 kg) of 120 mg/kg-day for no adverse effect on fetal development (Schlicker & Cox 1968).

p. Silver - small mammal TRV based on chronic NOAEL in the rat (0.25 kg) of 65 mg/kg-day (Walker 1971).

r. Aroclor 1254 - BTAG-low value (DTSC, 2002).

s. Cadmium - small mammal TRV based on chronic NOAEL in the rat (0.25 kg) of 1 mg/kg-day for no adverse effects on number of copulating females, number of, pregnant females, total implants, live fetuses, average fetal weight, and male fertility (Sutou et al . 1980).

t. Ethylbenzene - small mammal RfC based on chronic LOAEL in the rat (0.25 kg) of 600 mg/kg-day for reproductive effects with an adjusted exposure time and uncertainty factor of 10 to adjust from a LOAEL to a NOAEL (Ungvary and Tatrai 1985).

u. Xylenes - small mammal RfC based on chronic LOAEL in the rat (0.25 kg) of 150 mg/kg-day for reproductive effects with an adjusted exposure time and uncertainty factor of 10 to adjust from a LOAEL to a NOAEL (Ungvary et al 1980).

v. Tetrachloroethene - small mammal RfC based on chronic NOAEL in the rat (0.25 kg) of 198 mg/kg-day with no reproductive effects with an adjusted exposure time (Nelson et al 1980).

w. Toluene - small mammal RfC based on chronic NOAEL in the rat (0.25 kg) of 219 mg/kg-day with no reproductive effects with an adjusted exposure time (Gibson and Hardisty (NTP 1990)).

y. Trichloroethene - small mammal RfC based on chronic NOAEL in the rat (0.25 kg) of 1736 mg/kg-day with no reproductive or developmental effects with an adjusted exposure time (Dorfmueller et al 1979).

z. Aroclor-1260 - avian TRV based on chronic NOAEL in the screech owl (0.18 kg) of 0.42 mg/kg-day with no adverse effects on fertility or hatchability (McLane and Hughes 1980).

TRV - Toxicity Reference Value RfC - Reference Concentration - - Not Applicable

ESL Toxicity Criteria for Ecological Risk Assessment
Sodium Reactor Experiment (SRE) Area

Chemical	Mammalian Scaling Factor[a]	Small Mammal ESL TRV[b] (mg/kg-day)	Small Mammal Scaling Used?[c]	Bobcat ESL TRV[c] (mg/kg-day)	Bobcat Scaling Used?	Mule Deer ESL TRV[c] (mg/kg-day)	Mule Deer Scaling Used?	Avian ESL TRV (mg/kg-day)
Inorganic Compounds								
Antimony	0.94	0.13	No	0.088	Yes	0.081	Yes	NTV
Aluminum	0.94	1.9	No	1.4	Yes	1.3	Yes	110
Arsenic	0.49	0.32	No	0.017	Yes	0.0083	Yes	5.1
Beryllium	0.94	0.66	No	0.66	No	0.50	Yes	NTV
Cadmium	0.44	0.06	No	0.0024	Yes	0.0011	Yes	0.080
Chromium	0.94	1,468	No	1,468	No	1,106	Yes	NTV
Copper	0.94	2.7	No	1.9	Yes	1.7	Yes	2.3
Lead	0.94	1.0	No	1.0	No	0.75	Yes	0.014
Mercury	0.98	1.0	No	1.0	No	1.0	No	0.45
Methyl Mercury	0.64	0.25	No	0.25	No	0.037	Yes	0.039
Nickel	0.94	0.13	No	0.13	No	0.10	Yes	1.4
Selenium	1.01	0.050	No	0.050	No	0.053	Yes	0.23
Silver	0.94	0.38	No	0.26	Yes	0.24	Yes	NTV
Thallium	0.81	0.48	No	0.48	No	0.19	Yes	NTV
Vanadium	1.20	0.21	No	0.21	No	0.58	Yes	11
Zinc	0.85	9.6	No	3.9	Yes	3.2	Yes	15
VOCs								
1,1,1-Trichloroethane	0.65	1000	No	137	Yes	85	Yes	NTV
1,1,2-Trichloro-1,2,2-trifluoroethane	0.94	49	Yes	30	No	30	No	NTV
1,1-Dichloroethane	0.94	50	No	36	Yes	33	Yes	NTV
2-Butanone	0.94	1,771	No	1,771	No	1,335	Yes	NTV
Acetone	1.13	10	No	10	No	18	Yes	5,464
Bromomethane	0.94	5.9	No	5.9	No	4.4	Yes	NTV
Ethylbenzene	0.94	49	No	49	No	37	Yes	NTV
m,p-Xylene	0.94	30	No	30	No	23	Yes	NTV
Methylene chloride	0.81	5.9	No	5.9	No	2.4	Yes	NTV
Tetrachloroethene	0.94	0.50	No	0.33	Yes	0.31	Yes	NTV
Toluene	0.94	0.58	No	0.41	Yes	0.37	Yes	NTV
trans-1,3-Dichloropropene	0.94	1.0	No	1.0	No	0.77	Yes	NTV
Trichloroethene	1.11	0.70	No	1.3	Yes	1.6	Yes	NTV
Xylenes (total)	0.94	30	No	30	No	23	Yes	NTV

ESL Toxicity Criteria for Ecological Risk Assessment
Sodium Reactor Experiment (SRE) Area

Chemical	Mammalian Scaling Factor[a]	Small Mammal ESL TRV[b] (mg/kg-day)	Small Mammal Scaling Used?[c]	Bobcat ESL TRV[c] (mg/kg-day)	Bobcat Scaling Used?	Mule Deer ESL TRV[c] (mg/kg-day)	Mule Deer Scaling Used?	Avian ESL TRV (mg/kg-day)
SVOCs								
Acenaphthene	0.94	88	No	62	Yes	57	Yes	1.0
Acenaphthylene	0.94	175	No	123	Yes	114	Yes	NTV
Anthracene	0.94	500	No	353	Yes	325	Yes	1.1
Benzo(a)anthracene	0.94	1.3	No	0.92	Yes	0.85	Yes	NTV
Benzo(a)pyrene	0.94	1.3	No	0.92	Yes	0.85	Yes	NTV
Benzo(b)fluoranthene	0.94	1.3	No	0.92	Yes	0.85	Yes	NTV
Benzo(e)pyrene	NA	NTV	NA	NTV	NA	NTV	NA	NTV
Benzo(g,h,i)perylene	0.94	1.3	No	0.92	Yes	0.85	Yes	NTV
Benzo(k)fluoranthene	0.94	1.3	No	0.92	Yes	0.85	Yes	NTV
bis(2-Ethylhexyl)phthalate	1.53	18	No	401	Yes	827	Yes	1.1
Butyl benzyl phthalate	0.94	80	No	80	No	60	Yes	NTV
Chrysene	0.94	1.3	No	0.92	Yes	0.85	Yes	NTV
Dibenz(a,h)anthracene	0.94	1.3	No	0.92	Yes	0.85	Yes	NTV
Dibenzofuran	0.94	1000	No	706	Yes	650	Yes	NTV
Diethylphthalate	0.72	1625	No	312	Yes	212	Yes	NTV
Di-n-butylphthalate	1.35	120	No	120	No	611	Yes	0.11
Di-n-octyl phthalate	0.94	350	No	350	No	264	Yes	NTV
Fluoranthene	0.94	63	No	44	Yes	41	Yes	NTV
Fluorene	0.94	63	No	44	Yes	41	Yes	1.0
Hexachlorobutadiene	0.94	0.20	No	0.20	No	0.15	Yes	3.2
Hexachlorocyclopentadiene	0.94	3.0	No	3.0	No	2.3	Yes	NTV
Indeno(1,2,3-cd)pyrene	0.94	1.3	No	0.92	Yes	0.85	Yes	NTV
Naphthalene	0.94	50	No	50	No	37	Yes	NTV
Pentachlorophenol	0.82	3.0	No	3.0	No	1.3	Yes	8.7
Perylene	NA	NTV	NA	NTV	NA	NTV	NA	NTV
Phenanthrene	0.94	75	No	53	Yes	49	Yes	1.1
Pyrene	0.94	38	No	26	Yes	24	Yes	NTV
Pesticides								
4,4'-DDT	1.27	0.80	No	0.80	No	2.9	Yes	0.0028
Chlordane	0.83	0.080	No	0.080	No	0.036	Yes	0.23
Dieldrin	1.06	0.020	No	0.020	No	0.026	Yes	0.077
Endosulfan I	NA	NTV	NA	NTV	NA	NTV	NA	NTV
Endosulfan II	NA	NTV	NA	NTV	NA	NTV	NA	NTV

ESL Toxicity Criteria for Ecological Risk Assessment
Sodium Reactor Experiment (SRE) Area

Chemical	Mammalian Scaling Factor[a]	Small Mammal ESL TRV[b] (mg/kg-day)	Small Mammal Scaling Used?[c]	Bobcat ESL TRV[c] (mg/kg-day)	Bobcat Scaling Used?	Mule Deer ESL TRV[c] (mg/kg-day)	Mule Deer Scaling Used?	Avian ESL TRV (mg/kg-day)
Endrin	0.97	0.031	Yes	0.025	No	0.025	No	0.010
Heptachlor	1.09	0.13	No	0.13	No	0.22	Yes	1.3
Heptachlor epoxide	0.94	0.0037	Yes	0.0025	No	0.0025	No	NTV
Toxaphene	NA	NTV	NA	NTV	NA	NTV	NA	NTV
Dioxins								
2,3,7,8-TCDD	0.54	0.0000010	No	0.0000010	No	0.00000011	Yes	0.000014
1,2,3,7,8-PeCDD	0.54	0.0000010	No	0.0000010	No	0.00000011	Yes	0.000014
1,2,3,4,7,8-HxCDD	0.54	0.000010	No	0.000010	No	0.0000011	Yes	0.00029
1,2,3,6,7,8-HxCDD	0.54	0.000010	No	0.000010	No	0.0000011	Yes	0.0014
1,2,3,7,8,9-HxCDD	0.54	0.000010	No	0.000010	No	0.0000011	Yes	0.00014
1,2,3,4,6,7,8-HpCDD	0.54	0.000100	No	0.00010	No	0.000011	Yes	0.014
OCDD	0.54	0.010	No	0.010	No	0.0011	Yes	0.14
2,3,7,8-TCDF	0.54	0.000010	No	0.000010	No	0.0000011	Yes	0.0000010
1,2,3,7,8-PeCDF	0.54	0.000020	No	0.000020	No	0.0000023	Yes	0.00014
2,3,4,7,8-PeCDF	0.54	0.0000020	No	0.0000020	No	0.00000023	Yes	0.000014
1,2,3,4,7,8-HxCDF	0.54	0.000010	No	0.000010	No	0.0000011	Yes	0.00014
1,2,3,6,7,8-HxCDF	0.54	0.000010	No	0.000010	No	0.0000011	Yes	0.00014
1,2,3,4,6,7,8-HpCDF	0.54	0.00010	No	0.00010	No	0.000011	Yes	0.0014
1,2,3,4,7,8,9-HpCDF	0.54	0.00010	No	0.00010	No	0.000011	Yes	0.0014
OCDF	0.54	0.010	No	0.010	No	0.0011	Yes	0.14
PCBs								
Aroclor-1016	0.94	1.4	No	1.4	No	1.4	No	NTV
Aroclor-1221	0.94	1.4	No	1.4	No	1.4	No	NTV
Aroclor-1232	0.94	0.068	No	0.046	Yes	0.042	Yes	NTV
Aroclor-1242	0.94	0.069	No	0.069	No	0.069	No	NTV
Aroclor-1248	0.94	0.014	Yes	0.010	No	0.010	No	NTV
Aroclor-1254	0.94	0.068	No	0.046	Yes	0.042	Yes	0.41
Aroclor-1260	0.94	0.068	No	0.046	Yes	0.042	Yes	0.090
PCB-105	0.94	0.010	No	0.010	No	0.0075	Yes	0.14
PCB-114	0.94	0.0020	No	0.0020	No	0.0015	Yes	0.14
PCB-118	0.94	0.010	No	0.010	No	0.0075	Yes	1.4
PCB-123	0.94	0.010	No	0.010	No	0.0075	Yes	1.4

ESL Toxicity Criteria for Ecological Risk Assessment
Sodium Reactor Experiment (SRE) Area

Chemical	Mammalian Scaling Factor[a]	Small Mammal ESL TRV[b] (mg/kg-day)	Small Mammal Scaling Used?[c]	Bobcat ESL TRV[c] (mg/kg-day)	Bobcat Scaling Used?	Mule Deer ESL TRV[c] (mg/kg-day)	Mule Deer Scaling Used?	Avian ESL TRV (mg/kg-day)
PCB-126	0.94	0.000010	No	0.000010	No	0.0000075	Yes	0.00014
PCB-156	0.94	0.0020	No	0.0020	No	0.0015	Yes	0.14
PCB-157	0.94	0.0020	No	0.0020	No	0.0015	Yes	0.14
PCB-167	0.94	0.10	No	0.10	No	0.075	Yes	1.4
PCB-169	0.94	0.00010	No	0.00010	No	0.000075	Yes	0.014
PCB-189	0.94	0.010	No	0.010	No	0.0075	Yes	1.4
PCB-77	0.94	0.010	No	0.010	No	0.0075	Yes	0.00029
PCB-81	0.94	0.010	No	0.010	No	0.0075	Yes	0.00014

Notes:
a. Based on Sample and Arenal (1999).
b. Lowest available toxicity values for mammals as used to derive ecological screening levels (ESLs).
c. Bobcat and mule deer TRVs are based on small mammal TRVs. Allometric scaling was performed if there was body weight difference between the test species and the receptor species greater than 100-fold.
TRV - Toxicity Reference Value
RfC - Reference Concentration
NTV - No Toxicity Value
NA - Not applicable

Table C3-17 (1 of 4)

Reference Concentrations for Aquatic Biota Exposed to Surface Water

	Selected Reference Concentration (ug/L water)	Chronic TRV (ug/L water)	FW AWQC CMC (ug/L water)	FW AWQC CCC (ug/L water)
Inorganic Compounds				
Aluminum	750	-	750	87
Antimony	0.30	0.30	-	-
Arsenic	340	-	340	150
Beryllium	0.31	0.31	-	-
Cadmium	2	-	2	0.25
Chromium	570	-	570	74
Copper	13	-	13	9
Lead	65	-	65	2.5
Mercury	1.4	-	1.4	0.77
Methyl Mercury	NRC	-	-	-
Nickel	470	-	470	52
Selenium	5	-	-	5
Silver	3.2	-	3.2	-
Thallium	4.5	4.5	-	-
Vanadium	26	26	-	-
Zinc	120	-	120	120
VOCs				
1,1,1-Trichloroethane	2,350	2,350	-	-
1,1,2-Trichloro-1,2,2-trifluoroethane	47	47	-	-
1,1-Dichloroethane	5,556	5,556	-	-
2-Butanone	178,889	178,889	-	-
Acetone	178,889	178,889	-	-
Bromomethane	0.044	0.044	-	-
Ethylbenzene	233	233	-	-
m,p-Xylene	467	467	-	-
Methylene chloride	10,722	10,722	-	-
Tetrachloroethene	200	200	-	-
Toluene	306	306	-	-
trans-1,3-Dichloropropene	7,056	7,056	-	-
Trichloroethene	172	172	-	-
Xylenes (total)	183	183	-	-
SVOCs				
Acenaphthene	13	13	-	-
Acenaphthylene	13	13	-	-
Anthracene	0.071	0.071	-	-

Table C3-17 (2 of 4)

Reference Concentrations for Aquatic Biota Exposed to Surface Water

	Selected Reference Concentration (ug/L water)	Chronic TRV (ug/L water)	FW AWQC CMC (ug/L water)	FW AWQC CCC (ug/L water)
Benzo(a)anthracene	0.56	0.56	-	-
Benzo(a)pyrene	0.28	0.28	-	-
Benzo(b)fluoranthene	0.28	0.28	-	-
Benzo(e)pyrene	0.28	0.28	-	-
Benzo(g,h,i)perylene	0.28	0.28	-	-
Benzo(k)fluoranthene	0.28	0.28	-	-
bis(2-Ethylhexyl)phthalate	8.9	8.9	-	-
Butyl benzyl phthalate	38	38	-	-
Chrysene	0.56	0.56	-	-
Dibenz(a,h)anthracene	0.28	0.28	-	-
Dibenzofuran	58	58	-	-
Diethylphthalate	3.0	3.0	-	-
Di-n-butylphthalate	19	19	-	-
Di-n-octyl phthalate	19	19	-	-
Fluoranthene	0.38	0.38	-	-
Fluorene	33	33	-	-
Hexachlorobutadiene	5	5	-	-
Hexachlorocyclopentadiene	0.39	0.39	-	-
Indeno(1,2,3-cd)pyrene	0.56	0.56	-	-
Naphthalene	56	56	-	-
Pentachlorophenol	19	-	19	15
Perylene	NRC	-	-	-
Phenanthrene	5.6	5.6	-	-
Pyrene	111	111	-	-
Pesticides				
4,4'-DDT	1.1	-	1.1	0.001
Chlordane	2.4	-	2.4	0.0043
Dieldrin	0.24	-	0.24	0.056
Endosulfan I	0.22	-	0.22	0.056
Endosulfan II	0.22	-	0.22	0.056
Endrin	0.086	-	0.086	0.036
Heptachlor	0.52	-	0.52	0.0038
Heptachlor epoxide	0.52	-	0.52	0.0038
Toxaphene	0.73	-	0.73	0.0002

Table C3-17 (3 of 4)

Reference Concentrations for Aquatic Biota Exposed to Surface Water

	Selected Reference Concentration (ug/L water)	Chronic TRV (ug/L water)	FW AWQC CMC (ug/L water)	FW AWQC CCC (ug/L water)
Total Petroleum Hydrocarbons				
C11-C14(Kerosene Range)	NRC	-	-	-
C14-C20(Diesel Range)	NRC	-	-	-
C20-C30(Lubricant Oil Range)	NRC	-	-	-
Dioxins				
2,3,7,8-TCDD	0.0036	0.0036	-	-
1,2,3,7,8-PeCDD	0.0036	0.0036	-	-
1,2,3,4,7,8-HxCDD	0.0072	0.0072	-	-
1,2,3,6,7,8-HxCDD	0.36	0.36	-	-
1,2,3,7,8,9-HxCDD	0.36	0.36	-	-
1,2,3,4,6,7,8-HpCDD	36	36	-	-
OCDD	36	36	-	-
2,3,7,8-TCDF	0.072	0.072	-	-
1,2,3,7,8-PeCDF	0.072	0.072	-	-
2,3,4,7,8-PeCDF	0.0072	0.0072	-	-
1,2,3,4,7,8-HxCDF	0.036	0.036	-	-
1,2,3,6,7,8-HxCDF	0.036	0.036	-	-
1,2,3,4,6,7,8-HpCDF	0.36	0.36	-	-
1,2,3,4,7,8,9-HpCDF	0.36	0.36	-	-
OCDF	36	36	-	-
PCBs				
Aroclor-1016	NRC	-	-	-
Aroclor-1221	NRC	-	-	-
Aroclor-1232	NRC	-	-	-
Aroclor-1242	NRC	-	-	-
Aroclor-1248	1.6	1.6	-	-
Aroclor-1254	0.018	0.018	-	-
Aroclor-1260	11	11	-	-
PCB-105	13,000	13,000	-	-
PCB-114	13,000	13,000	-	-
PCB-118	13,000	13,000	-	-
PCB-123	13,000	13,000	-	-
PCB-126	13	13	-	-
PCB-156	13,000	13,000	-	-
PCB-157	13,000	13,000	-	-

Table C3-17 (4 of 4)

Reference Concentrations for Aquatic Biota Exposed to Surface Water

	Selected Reference Concentration (ug/L water)	Chronic TRV (ug/L water)	FW AWQC CMC (ug/L water)	FW AWQC CCC (ug/L water)
PCB-167	13,000	13,000	-	-
PCB-169	1,300	1,300	-	-
PCB-189	13,000	13,000	-	-
PCB-77	650	650	-	-
PCB-81	130	130	-	-

Table C3-18 (1 of 3)

Reference Concentrations for Aquatic Biota Exposed to Sediment

	Consensus Based Threshold Effects Concentration[a] (mg/kg sediment)	Sediment-Based Threshold Concentration[b] (mg/kg sediment)	Selected Reference Concentration (mg/kg sediment)
Inorganic Compounds			
Aluminum	-	-	-
Antimony	2	-	2.0
Arsenic	9.79	-	9.8
Beryllium	-	-	-
Cadmium	0.99	-	0.99
Chromium	43.4	-	43.4
Copper	31.6	-	31.6
Lead	35.8	-	35.8
Mercury	0.18	-	0.2
Methyl Mercury	-	-	NRC
Nickel	22.7	-	22.7
Selenium	-	-	NRC
Silver	1	-	1.0
Thallium	-	-	NRC
Vanadium	-	-	NRC
Zinc	121	-	121
VOCs			
1,1,1-Trichloroethane	-	-	NRC
1,1,2-Trichloro-1,2,2-trifluoroethane	-	-	NRC
1,1-Dichloroethane	-	-	NRC
2-Butanone	-	-	NRC
Acetone	-	-	NRC
Bromomethane	-	-	NRC
Ethylbenzene	-	-	NRC
m,p-Xylene	-	-	NRC
Methylene chloride	-	-	NRC
Tetrachloroethene	-	-	NRC
Toluene	-	-	NRC
trans-1,3-Dichloropropene	-	-	NRC
Trichloroethene	-	-	NRC
Xylenes (total)	-	-	NRC
SVOCs			
Acenaphthene	-	-	NRC
Acenaphthylene	-	-	NRC
Anthracene	0.0572	-	0.0572
Benzo(a)anthracene	0.108	-	0.108
Benzo(a)pyrene	0.15	-	0.15

Table C3-18 (2 of 3)

Reference Concentrations for Aquatic Biota Exposed to Sediment

	Consensus Based Threshold Effects Concentration[a] (mg/kg sediment)	Sediment-Based Threshold Concentration[b] (mg/kg sediment)	Selected Reference Concentration (mg/kg sediment)
Benzo(b)fluoranthene	-	-	NRC
Benzo(e)pyrene	0.15	-	0.15
Benzo(g,h,i)perylene	-	-	NRC
Benzo(k)fluoranthene	-	-	NRC
bis(2-Ethylhexyl)phthalate	-	-	NRC
Butyl benzyl phthalate	-	-	NRC
Chrysene	0.166	-	0.166
Dibenz(a,h)anthracene	0.033	-	0.033
Dibenzofuran	-	-	NRC
Diethylphthalate	-	-	NRC
Di-n-butylphthalate	-	-	NRC
Di-n-octyl phthalate	-	-	NRC
Fluoranthene	0.423	-	0.423
Fluorene	0.0774	-	0.0774
Hexachlorobutadiene	-	-	NRC
Hexachlorocyclopentadiene	-	-	NRC
Indeno(1,2,3-cd)pyrene	0.2	-	0.20
Naphthalene	0.176	-	0.176
Pentachlorophenol	-	-	NRC
Perylene	-	-	NRC
Phenanthrene	0.204	-	0.204
Pyrene	0.195	-	0.195
Pesticides			
4,4'-DDT	0.0042	-	0.0042
Chlordane	0.0032	-	0.0032
Dieldrin	0.0019	-	0.0019
Endosulfan I	-	-	NRC
Endosulfan II	-	-	NRC
Endrin	0.022	-	0.022
Heptachlor	0.0025	-	0.0025
Heptachlor epoxide	0.0025	-	0.0025
Toxaphene	0.001	-	0.0010
Total Petroleum Hydrocarbons			
C11-C14(Kerosene Range)	-	-	NRC
C14-C20(Diesel Range)	-	-	NRC
C20-C30(Lubricant Oil Range)	-	-	NRC

Table C3-18 (3 of 3)

Reference Concentrations for Aquatic Biota Exposed to Sediment

	Consensus Based Threshold Effects Concentration[a] (mg/kg sediment)	Sediment-Based Threshold Concentration[b] (mg/kg sediment)	Selected Reference Concentration (mg/kg sediment)
Dioxins			
2,3,7,8-TCDD	-	-	NRC
1,2,3,7,8-PeCDD	-	-	NRC
1,2,3,4,7,8-HxCDD	-	-	NRC
1,2,3,6,7,8-HxCDD	-	-	NRC
1,2,3,7,8,9-HxCDD	-	-	NRC
1,2,3,4,6,7,8-HpCDD	-	-	NRC
OCDD	-	-	NRC
2,3,7,8-TCDF	-	-	NRC
1,2,3,7,8-PeCDF	-	-	NRC
2,3,4,7,8-PeCDF	-	-	NRC
1,2,3,4,7,8-HxCDF	-	-	NRC
1,2,3,6,7,8-HxCDF	-	-	NRC
1,2,3,4,6,7,8-HpCDF	-	-	NRC
1,2,3,4,7,8,9-HpCDF	-	-	NRC
OCDF	-	-	NRC
PCBs			
Aroclor-1016	-	113	113
Aroclor-1221	-	113	113
Aroclor-1232	-	113	113
Aroclor-1242	-	113	113
Aroclor-1248	-	113	113
Aroclor-1254	-	113	113
Aroclor-1260	-	113	113
PCB-105	-	-	NRC
PCB-114	-	-	NRC
PCB-118	-	-	NRC
PCB-123	-	-	NRC
PCB-126	-	-	NRC
PCB-156	-	-	NRC
PCB-157	-	-	NRC
PCB-167	-	-	NRC
PCB-169	-	-	NRC
PCB-189	-	-	NRC
PCB-77	-	-	NRC
PCB-81	-	-	NRC

a - MacDonald, D.D., C.G. Ingersoll, T.A. Berger. 2000.
b - Meader, J.P., T.K. Collier, and J.E. Stein. 2002.

Table C3-19a (1 of 3)

Risk Estimates for the Deer Mouse - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

	Applied Daily Dose		Hazard Quotient			
	CTE (mg/kg-day)	RME (mg/kg-day)	CTE_{ESL} (unitless)	RME_{ESL} (unitless)	CTE_{TRV} (unitless)	RME_{TRV} (unitless)
Ingestion Exposure Route						
Inorganic Compounds						
Cadmium	1.5E+00	3.3E+00	**2.4E+01**	**5.4E+01**	**1.5E+00**	**3.3E+00**
Copper	2.6E+01	5.6E+01	**9.6E+00**	**2.1E+01**	**2.6E+00**	**5.6E+00**
Lead	5.4E+00	1.1E+01	**5.4E+00**	**1.1E+01**	**5.4E+00**	**1.1E+01**
Mercury	6.4E-01	1.5E+00	6.3E-01	**1.5E+00**	-	**1.2E+00**
Methyl Mercury	3.8E-04	7.9E-04	1.5E-03	3.1E-03	-	-
Silver	5.3E-01	1.9E+00	**1.4E+00**	**5.2E+00**	8.1E-03	3.0E-02
Thallium	5.2E-02	5.7E-02	1.1E-01	1.2E-01	-	-
Zinc	7.5E+01	1.9E+02	**7.9E+00**	**2.0E+01**	6.3E-01	**1.6E+00**
VOCs						
1,1,1-Trichloroethane	2.0E-04	1.1E-03	2.0E-07	1.1E-06	-	-
1,1,2-Trichloro-1,2,2-trifluoroethane	2.6E-03	2.6E-03	5.3E-05	5.3E-05	-	-
1,1-Dichloroethane	9.6E-05	3.5E-04	1.9E-06	7.1E-06	-	-
1,2-Dichloroethene (total)	6.1E-03	1.5E-02	3.8E-04	9.5E-04	-	-
2-Butanone	8.0E-03	8.0E-03	4.5E-06	4.5E-06	-	-
Acetone	1.5E-01	9.0E-01	1.5E-02	9.0E-02	-	-
Ethylbenzene	-	-	-	-	-	-
m,p-Xylene	2.6E-06	2.6E-06	8.5E-08	8.5E-08	-	-
Methylene chloride	4.5E-03	1.4E-02	7.7E-04	2.4E-03	-	-
Tetrachloroethene	4.6E-03	2.0E-02	9.2E-03	3.9E-02	-	-
Toluene	1.3E-02	8.2E-02	2.3E-02	1.4E-01	-	-
Trichloroethene	8.3E-03	4.6E-02	1.2E-02	6.5E-02	-	-
Xylenes (total)	5.7E-03	1.3E-02	1.9E-04	4.2E-04	-	-
SVOCs						
Acenaphthene	1.4E-02	3.1E-02	1.6E-04	3.6E-04	-	-
Acenaphthylene	6.7E-03	1.8E-02	3.8E-05	1.1E-04	-	-
Anthracene	1.3E-02	3.0E-02	2.7E-05	5.9E-05	-	-
Benzo(a)anthracene	3.5E-02	1.5E-01	2.7E-02	1.2E-01	-	-
Benzo(a)pyrene	1.0E-02	5.3E-02	7.8E-03	4.0E-02	-	-
Benzo(b)fluoranthene	1.6E-02	9.3E-02	1.2E-02	7.1E-02	-	-
Benzo(e)pyrene	4.2E-03	1.4E-02	-	-	-	-
Benzo(g,h,i)perylene	8.4E-03	2.3E-02	6.4E-03	1.8E-02	-	-
Benzo(k)fluoranthene	8.6E-03	3.9E-02	6.5E-03	2.9E-02	-	-
Chrysene	2.6E-02	1.3E-01	1.9E-02	1.0E-01	-	-
Dibenz(a,h)anthracene	6.7E-03	2.1E-02	5.1E-03	1.6E-02	-	-
Dibenzofuran	4.2E-04	5.1E-04	4.2E-07	5.1E-07	-	-
Fluoranthene	3.3E-02	2.2E-01	5.3E-04	3.5E-03	-	-
Fluorene	1.8E-02	4.1E-02	2.9E-04	6.5E-04	-	-
Indeno(1,2,3-cd)pyrene	8.1E-03	3.7E-02	6.2E-03	2.8E-02	-	-
Naphthalene	-	-	-	-	-	-
Perylene	2.3E-03	7.7E-03	-	-	-	-
Phenanthrene	9.7E-02	2.5E-01	1.3E-03	3.3E-03	-	-
Pyrene	2.8E-02	1.0E-01	7.6E-04	2.7E-03	-	-
Total Petroleum Hydrocarbons						
C11-C14(Kerosene Range)	2.1E+00	8.7E+00	-	-	-	-
C14-C20(Diesel Range)	3.6E-02	6.1E-02	-	-	-	-
C20-C30(Lubricant Oil Range)	1.6E+01	1.0E+02	-	-	-	-

Table C3-19a (2 of 3)

Risk Estimates for the Deer Mouse - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

	Applied Daily Dose		Hazard Quotient			
	CTE (mg/kg-day)	RME (mg/kg-day)	CTE_{ESL} (unitless)	RME_{ESL} (unitless)	CTE_{TRV} (unitless)	RME_{TRV} (unitless)
Dioxins						
2,3,7,8-TCDD	5.9E-08	1.2E-07	5.9E-02	1.2E-01	-	-
1,2,3,7,8-PeCDD	2.3E-07	4.5E-07	2.3E-01	4.5E-01	-	-
1,2,3,4,7,8-HxCDD	8.3E-07	1.8E-06	8.3E-02	1.8E-01	-	-
1,2,3,6,7,8-HxCDD	1.2E-06	2.3E-06	1.2E-01	2.3E-01	-	-
1,2,3,7,8,9-HxCDD	1.3E-06	2.1E-06	1.3E-01	2.1E-01	-	-
1,2,3,4,6,7,8-HpCDD	4.9E-05	1.0E-04	4.9E-01	**1.0E+00**	-	**1.0E+00**
OCDD	5.7E-04	1.2E-03	5.7E-02	1.2E-01	-	-
2,3,7,8-TCDF	1.2E-07	1.7E-07	1.2E-02	1.7E-02	-	-
1,2,3,7,8-PeCDF	5.0E-08	1.0E-07	2.5E-03	5.2E-03	-	-
2,3,4,7,8-PeCDF	1.5E-07	2.9E-07	7.6E-02	1.5E-01	-	-
1,2,3,4,7,8-HxCDF	3.5E-07	6.5E-07	3.5E-02	6.5E-02	-	-
1,2,3,6,7,8-HxCDF	2.6E-07	5.3E-07	2.6E-02	5.3E-02	-	-
2,3,4,6,7,8-HxCDF	7.2E-07	1.7E-06	7.2E-02	1.7E-01	-	-
1,2,3,7,8,9-HxCDF	7.8E-08	2.1E-07	7.8E-03	2.1E-02	-	-
1,2,3,4,6,7,8-HpCDF	3.7E-06	6.9E-06	3.7E-02	6.9E-02	-	-
1,2,3,4,7,8,9-HpCDF	1.1E-06	2.0E-06	1.1E-02	2.0E-02	-	-
OCDF	1.1E-05	2.0E-05	1.1E-03	2.0E-03	-	-
PCBs						
Aroclor-1254	3.5E-02	9.3E-02	5.2E-01	**1.4E+00**	-	2.6E-01
Aroclor-1260	2.9E-01	1.6E+00	**4.2E+00**	**2.3E+01**	8.0E-01	**4.4E+00**
PCB-105	1.3E-04	6.5E-04	1.3E-02	6.5E-02	-	-
PCB-114	4.9E-06	2.3E-05	2.4E-03	1.1E-02	-	-
PCB-118	2.8E-04	1.4E-03	2.8E-02	1.4E-01	-	-
PCB-123	4.2E-06	2.1E-05	4.2E-04	2.1E-03	-	-
PCB-126	5.9E-06	3.0E-05	5.9E-01	**3.0E+00**	-	**3.0E+00**
PCB-156	5.6E-05	2.8E-04	2.8E-02	1.4E-01	-	-
PCB-157	2.5E-05	1.3E-04	1.3E-02	6.5E-02	-	-
PCB-167	4.5E-05	2.3E-04	4.5E-04	2.3E-03	-	-
PCB-169	1.9E-07	9.5E-07	1.9E-03	9.5E-03	-	-
PCB-189	4.1E-06	2.1E-05	4.1E-04	2.1E-03	-	-
PCB-77	1.3E-05	6.7E-05	1.3E-03	6.7E-03	-	-
PCB-81	2.6E-06	1.3E-05	2.6E-04	1.3E-03	-	-
Total PCB Congeners	-	-	6.8E-01	**3.4E+00**	0.0E+00	**3.0E+00**
Total Ingestion HI:			5.6E+01	1.4E+02	1.1E+01	2.9E+01

Table C3-19a (3 of 3)

Risk Estimates for the Deer Mouse - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

	Applied Daily Dose		Hazard Quotient			
	CTE (mg/kg-day)	RME (mg/kg-day)	CTE_{ESL} (unitless)	RME_{ESL} (unitless)	CTE_{TRV} (unitless)	RME_{TRV} (unitless)

	Burrow Air Concentration		Hazard Quotient	
	CTE (mg/m^3)	RME (mg/m^3)	CTE (unitless)	RME (unitless)
Inhalation Exposure Route				
VOCs				
1,1,1-Trichloroethane	5.0E-01	5.0E-01	3.8E-04	3.8E-04
1,1,2-Trichloro-1,2,2-trifluoroethane	2.7E+00	3.1E+00	4.9E-02	5.7E-02
1,1-Dichloroethane	5.0E-01	5.0E-01	9.0E-03	9.0E-03
Ethylbenzene	5.0E-01	5.0E-01	8.3E-03	8.3E-03
m,p-Xylene	1.0E+00	1.0E+00	6.7E-02	6.7E-02
Methylene chloride	1.3E+01	1.3E+01	**2.0E+00**	**2.0E+00**
Tetrachloroethene	5.0E-01	5.0E-01	2.5E-03	2.5E-03
Toluene	5.0E-01	5.0E-01	2.3E-03	2.3E-03
Trichloroethene	5.0E-01	5.0E-01	2.9E-04	2.9E-04
Total Inhalation HI:			2.1E+00	**2.1E+00**
Total Pathway HI:			1.3E+01	**3.1E+01**

Notes:
CTE - central tendancy exposure
RME - reasonable maximum exposure
CTE_{ESL} or RME_{ESL}- The hazard quotient based on the NOAEL equivalent TRV used to calculate the ESL.
CTE_{TRV} or RME_{TRV}- The hazard quotient based on the TRV is calculated only if the hazard quotient based on the ESL is greater than 1.
TRV - toxicity reference value
RfC - reference concentration
HI - Hazard Index
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyls
mg/kg-day - milligrams per kilogram per day
mg/m^3 - milligrams per cubic meter
"-" not applicable
= HIs for PCB congeners. Not included in Total estimates.

Table C3-19b (1 of 4)

Risk Estimates for the Deer Mouse - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

	Applied Daily Dose		Hazard Quotient			
	CTE (mg/kg-day)	RME (mg/kg-day)	CTE_{ESL} (unitless)	RME_{ESL} (unitless)	CTE_{TRV} (unitless)	RME_{TRV} (unitless)
Ingestion Exposure Route						
Inorganic Compounds						
Aluminum	-	-	-	-	-	-
Antimony	-	-	-	-	-	-
Arsenic	-	-	-	-	-	-
Beryllium	-	-	-	-	-	-
Cadmium	6.9E-01	1.2E+00	**1.1E+01**	**2.0E+01**	6.9E-01	**1.2E+00**
Chromium	-	-	-	-	-	-
Copper	1.2E+01	2.4E+01	**4.5E+00**	**9.1E+00**	**1.2E+00**	**2.4E+00**
Lead	3.2E+00	4.3E+00	**3.2E+00**	**4.3E+00**	**3.2E+00**	**4.3E+00**
Mercury	7.1E-01	1.8E+00	7.1E-01	**1.8E+00**	-	**1.5E+00**
Methyl Mercury	3.8E-04	7.9E-04	1.5E-03	3.1E-03	-	-
Nickel	-	-	-	-	-	-
Selenium	-	-	-	-	-	-
Silver	6.9E-01	1.9E+00	**1.8E+00**	**5.0E+00**	1.1E-02	2.9E-02
Thallium	5.2E-02	5.7E-02	1.1E-01	1.2E-01	-	-
Vanadium	-	-	-	-	-	-
Zinc	3.7E+01	8.4E+01	**3.9E+00**	**8.8E+00**	3.1E-01	7.0E-01
VOCs						
1,1,1-Trichloroethane	-	-	-	-	-	-
1,1,2-Trichloro-1,2,2-trifluoroethane	2.6E-03	2.6E-03	5.3E-05	5.3E-05	-	-
1,1-Dichloroethane	-	-	-	-	-	-
2-Butanone	4.6E-03	7.5E-03	2.6E-06	4.2E-06	-	-
Acetone	2.4E-01	1.1E+00	2.4E-02	1.1E-01	-	-
Bromomethane	-	-	-	-	-	-
Ethylbenzene	-	-	-	-	-	-
m,p-Xylene	-	-	-	-	-	-
Methylene chloride	2.2E-03	2.8E-03	3.8E-04	4.8E-04	-	-
Tetrachloroethene	-	-	-	-	-	-
Toluene	-	-	-	-	-	-
trans-1,3-Dichloropropene	-	-	-	-	-	-
Trichloroethene	-	-	-	-	-	-
Xylenes (total)	-	-	-	-	-	-
SVOCs						
Acenaphthene	8.3E-03	3.5E-02	9.5E-05	4.0E-04	-	-
Acenaphthylene	1.0E-03	3.4E-03	5.8E-06	1.9E-05	-	-
Anthracene	6.9E-03	2.9E-02	1.4E-05	5.9E-05	-	-
Benzo(a)anthracene	7.1E-03	6.8E-02	5.4E-03	5.2E-02	-	-
Benzo(a)pyrene	5.5E-03	6.6E-02	4.2E-03	5.0E-02	-	-
Benzo(b)fluoranthene	5.5E-03	5.8E-02	4.2E-03	4.5E-02	-	-
Benzo(e)pyrene	4.4E-03	1.5E-02	-	-	-	-
Benzo(g,h,i)perylene	3.6E-03	2.1E-02	2.8E-03	1.6E-02	-	-
Benzo(k)fluoranthene	5.3E-03	6.6E-02	4.1E-03	5.0E-02	-	-
bis(2-Ethylhexyl)phthalate	-	-	-	-	-	-
Butyl benzyl phthalate	-	-	-	-	-	-
Chrysene	6.0E-03	4.2E-02	4.6E-03	3.2E-02	-	-
Dibenz(a,h)anthracene	1.0E-03	7.6E-03	7.9E-04	5.8E-03	-	-
Dibenzofuran	1.2E-03	1.2E-03	1.2E-06	1.2E-06	-	-
Diethylphthalate	-	-	-	-	-	-

Table C3-19b (2 of 4)

Risk Estimates for the Deer Mouse - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

	Applied Daily Dose		Hazard Quotient			
	CTE (mg/kg-day)	RME (mg/kg-day)	CTE_{ESL} (unitless)	RME_{ESL} (unitless)	CTE_{TRV} (unitless)	RME_{TRV} (unitless)
Di-n-butylphthalate	-	-	-	-	-	-
Di-n-octyl phthalate	-	-	-	-	-	-
Fluoranthene	1.1E-02	1.1E-01	1.7E-04	1.8E-03	-	-
Fluorene	1.1E-02	4.5E-02	1.7E-04	7.2E-04	-	-
Hexachlorobutadiene	-	-	-	-	-	-
Hexachlorocyclopentadiene	-	-	-	-	-	-
Indeno(1,2,3-cd)pyrene	2.6E-03	2.9E-02	2.0E-03	2.2E-02	-	-
Naphthalene	-	-	-	-	-	-
Pentachlorophenol	-	-	-	-	-	-
Perylene	2.5E-03	8.3E-03	-	-	-	-
Phenanthrene	8.8E-02	3.9E-01	1.2E-03	5.1E-03	-	-
Pyrene	1.1E-02	7.3E-02	2.8E-04	2.0E-03	-	-
Pesticides						
4,4'-DDT	-	-	-	-	-	-
Chlordane	-	-	-	-	-	-
Dieldrin	-	-	-	-	-	-
Endosulfan I	-	-	-	-	-	-
Endosulfan II	-	-	-	-	-	-
Endrin	-	-	-	-	-	-
Heptachlor	-	-	-	-	-	-
Heptachlor epoxide	-	-	-	-	-	-
Toxaphene	-	-	-	-	-	-
Total Petroleum Hydrocarbons						
C11-C14(Kerosene Range)	2.2E+00	8.7E+00	-	-	-	-
C14-C20(Diesel Range)	3.4E-02	6.0E-02	-	-	-	-
C20-C30(Lubricant Oil Range)	1.7E+01	1.0E+02	-	-	-	-
Dioxins						
2,3,7,8-TCDD	4.0E-08	8.7E-08	4.0E-02	8.7E-02	-	-
1,2,3,7,8-PeCDD	1.5E-07	3.1E-07	1.5E-01	3.1E-01	-	-
1,2,3,4,7,8-HxCDD	4.3E-07	8.5E-07	4.3E-02	8.5E-02	-	-
1,2,3,6,7,8-HxCDD	8.5E-07	1.5E-06	8.5E-02	1.5E-01	-	-
1,2,3,7,8,9-HxCDD	9.6E-07	2.1E-06	9.6E-02	2.1E-01	-	-
1,2,3,4,6,7,8-HpCDD	2.7E-05	4.4E-05	2.7E-01	4.4E-01	-	-
OCDD	3.4E-04	5.1E-04	3.4E-02	5.1E-02	-	-
2,3,7,8-TCDF	1.0E-07	1.7E-07	1.0E-02	1.7E-02	-	-
1,2,3,7,8-PeCDF	3.2E-08	7.0E-08	1.6E-03	3.5E-03	-	-
2,3,4,7,8-PeCDF	1.0E-07	1.8E-07	5.0E-02	9.2E-02	-	-
1,2,3,4,7,8-HxCDF	2.2E-07	3.5E-07	2.2E-02	3.5E-02	-	-
1,2,3,6,7,8-HxCDF	1.6E-07	3.1E-07	1.6E-02	3.1E-02	-	-
1,2,3,4,6,7,8-HpCDF	2.6E-06	3.6E-06	2.6E-02	3.6E-02	-	-
1,2,3,4,7,8,9-HpCDF	6.8E-07	9.2E-07	6.8E-03	9.2E-03	-	-
OCDF	8.5E-06	1.3E-05	8.5E-04	1.3E-03	-	-
PCBs						
Aroclor-1016	-	-	-	-	-	-
Aroclor-1221	-	-	-	-	-	-
Aroclor-1232	-	-	-	-	-	-
Aroclor-1242	-	-	-	-	-	-

Table C3-19b (3 of 4)

Risk Estimates for the Deer Mouse - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

	Applied Daily Dose		Hazard Quotient			
	CTE (mg/kg-day)	RME (mg/kg-day)	CTE_{ESL} (unitless)	RME_{ESL} (unitless)	CTE_{TRV} (unitless)	RME_{TRV} (unitless)
Aroclor-1248	-	-	-	-	-	-
Aroclor-1254	3.7E-02	9.3E-02	5.5E-01	**1.4E+00**	-	2.6E-01
Aroclor-1260	3.2E-01	1.7E+00	**4.7E+00**	**2.5E+01**	8.8E-01	**4.7E+00**
PCB-105	1.5E-04	7.4E-04	1.5E-02	7.4E-02	-	-
PCB-114	5.4E-06	2.5E-05	2.7E-03	1.3E-02	-	-
PCB-118	3.0E-04	1.5E-03	3.0E-02	1.5E-01	-	-
PCB-123	4.6E-06	2.4E-05	4.6E-04	2.4E-03	-	-
PCB-126	6.5E-06	3.4E-05	6.5E-01	**3.4E+00**	-	**3.4E+00**
PCB-156	6.1E-05	3.2E-04	3.1E-02	1.6E-01	-	-
PCB-157	2.8E-05	1.5E-04	1.4E-02	7.4E-02	-	-
PCB-167	5.0E-05	2.6E-04	5.0E-04	2.6E-03	-	-
PCB-169	2.0E-07	1.1E-06	2.0E-03	1.1E-02	-	-
PCB-189	4.5E-06	2.4E-05	4.5E-04	2.4E-03	-	-
PCB-77	1.5E-05	7.5E-05	1.5E-03	7.5E-03	-	-
PCB-81	2.9E-06	1.5E-05	2.9E-04	1.5E-03	-	-
Total Ingestion HI:			3.2E+01	7.7E+01	6.3E+00	1.5E+01

Table C3-19b (4 of 4)

Risk Estimates for the Deer Mouse - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

	Applied Daily Dose		Hazard Quotient			
	CTE (mg/kg-day)	RME (mg/kg-day)	CTE_{ESL} (unitless)	RME_{ESL} (unitless)	CTE_{TRV} (unitless)	RME_{TRV} (unitless)

	Burrow Air Concentration		Hazard Quotient	
	CTE (mg/m^3)	RME (mg/m^3)	CTE (unitless)	RME (unitless)
Inhalation Exposure Route				
VOCs				
1,1,1-Trichloroethane	5.0E-01	5.0E-01	4.5E-04	4.5E-04
1,1,2-Trichloro-1,2,2-trifluoroethane	2.7E+00	3.1E+00	4.9E-02	5.7E-02
1,1-Dichloroethane	5.0E-01	5.0E-01	9.0E-03	9.0E-03
Ethylbenzene	5.0E-01	5.0E-01	8.3E-03	8.3E-03
m,p-Xylene	1.0E+00	1.0E+00	6.7E-02	6.7E-02
Methylene chloride	1.3E+01	1.3E+01	**2.0E+00**	**2.0E+00**
Tetrachloroethene	5.0E-01	5.0E-01	2.5E-03	2.5E-03
Toluene	5.0E-01	5.0E-01	2.3E-03	2.3E-03
Trichloroethene	5.0E-01	5.0E-01	2.9E-04	2.9E-04
Total Inhalation HI:			2.1E+00	**2.1E+00**
Total Pathway HI:			8.4E+00	**1.7E+01**

Notes:
CTE - central tendancy exposure
RME - reasonable maximum exposure
CTE_{ESL} or RME_{ESL}- The hazard quotient based on the NOAEL equivalent TRV used to calculate the ESL.
CTE_{TRV} or RME_{TRV}- The hazard quotient based on the TRV is calculated only if the hazard quotient based on the ESL is greater than 1.
TRV - toxicity reference value
RfC - reference concentration
HI - Hazard Index
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyls
PCDD/PCDF - polychlorinated dibenzo-p-dioxins and dibenzofurans
mg/kg-day - milligrams per kilogram per day
mg/m^3 - milligrams per cubic meter
"-" not applicable

Table C3-20a (1 of 2)

Risk Estimates for the Thrush - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

	Applied Daily Dose		Hazard Quotient			
	CTE (mg/kg-day)	RME (mg/kg-day)	CTE_{ESL} (unitless)	RME_{ESL} (unitless)	CTE_{TRV} (unitless)	RME_{TRV} (unitless)
Ingestion Exposure Route						
Inorganic Compounds						
Cadmium	1.8E+00	4.0E+00	**2.2E+01**	**5.0E+01**	**2.24E+01**	**5.00E+01**
Copper	4.5E+01	9.7E+01	**1.9E+01**	**4.2E+01**	**1.94E+01**	**4.20E+01**
Lead	3.6E+00	7.5E+00	**2.5E+02**	**5.4E+02**	**2.5E+02**	**5.4E+02**
Mercury	9.8E-01	2.3E+00	**2.2E+00**	**5.0E+00**	**2.2E+00**	**5.0E+00**
Methyl Mercury	3.9E-04	8.2E-04	1.0E-02	2.1E-02	-	-
Silver	8.0E-01	2.9E+00	-	-	-	-
Thallium	6.5E-02	6.5E-02	-	-	-	-
Zinc	9.5E+01	2.4E+02	**6.5E+00**	**1.7E+01**	**6.5E+00**	**1.7E+01**
VOCs						
1,1,1-Trichloroethane	-	-	-	-	-	-
1,1,2-Trichloro-1,2,2-trifluoroethane	2.7E-03	2.7E-03	-	-	-	-
1,1-Dichloroethane	-	-	-	-	-	-
1,2-Dichloroethene (total)	6.4E-03	1.6E-02	-	-	-	-
2-Butanone	8.3E-03	8.3E-03	-	-	-	-
Acetone	1.5E-01	9.4E-01	2.8E-05	1.7E-04	-	-
Ethylbenzene	-	-	-	-	-	-
m,p-Xylene	-	-	-	-	-	-
Methylene chloride	2.9E-03	2.9E-03	-	-	-	-
Tetrachloroethene	4.7E-03	2.0E-02	-	-	-	-
Toluene	1.3E-02	7.7E-02	-	-	-	-
Trichloroethene	8.3E-03	4.5E-02	-	-	-	-
Xylenes (total)	5.7E-03	1.2E-02	-	-	-	-
SVOCs						
Acenaphthene	1.8E-02	4.1E-02	1.8E-02	4.1E-02	-	-
Acenaphthylene	6.9E-03	1.9E-02	-	-	-	-
Anthracene	1.8E-02	3.8E-02	1.6E-02	3.4E-02	-	-
Benzo(a)anthracene	2.5E-02	1.0E-01	-	-	-	-
Benzo(a)pyrene	8.1E-03	3.3E-02	-	-	-	-
Benzo(b)fluoranthene	1.8E-02	9.6E-02	-	-	-	-
Benzo(e)pyrene	4.4E-03	1.5E-02	-	-	-	-
Benzo(g,h,i)perylene	6.7E-03	1.5E-02	-	-	-	-
Benzo(k)fluoranthene	6.3E-03	1.8E-02	-	-	-	-
Chrysene	2.2E-02	1.1E-01	-	-	-	-
Dibenz(a,h)anthracene	6.6E-03	1.9E-02	-	-	-	-
Dibenzofuran	-	-	-	-	-	-
Fluoranthene	2.2E-02	1.4E-01	-	-	-	-
Fluorene	2.7E-02	6.1E-02	2.7E-02	6.1E-02	-	-
Indeno(1,2,3-cd)pyrene	7.1E-03	2.8E-02	-	-	-	-
Naphthalene	-	-	-	-	-	-
Perylene	2.4E-03	8.0E-03	-	-	-	-
Phenanthrene	6.8E-02	1.7E-01	6.0E-02	1.5E-01	-	-
Pyrene	3.0E-02	8.7E-02	-	-	-	-
Total Petroleum Hydrocarbons						
C11-C14(Kerosene Range)	2.2E+00	9.0E+00	-	-	-	-
C14-C20(Diesel Range)	-	-	-	-	-	-
C20-C30(Lubricant Oil Range)	1.6E+01	1.1E+02	-	-	-	-

Table C3-20a (2 of 2)

Risk Estimates for the Thrush - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

	Applied Daily Dose		Hazard Quotient			
	CTE (mg/kg-day)	RME (mg/kg-day)	CTE_{ESL} (unitless)	RME_{ESL} (unitless)	CTE_{TRV} (unitless)	RME_{TRV} (unitless)
Dioxins						
2,3,7,8-TCDD	6.1E-08	1.2E-07	4.3E-03	8.4E-03	-	-
1,2,3,7,8-PeCDD	2.3E-07	4.5E-07	1.6E-02	3.2E-02	-	-
1,2,3,4,7,8-HxCDD	8.1E-07	1.8E-06	2.8E-03	6.2E-03	-	-
1,2,3,6,7,8-HxCDD	2.0E-06	3.7E-06	1.4E-03	2.6E-03	-	-
1,2,3,7,8,9-HxCDD	1.3E-06	2.2E-06	9.0E-03	1.5E-02	-	-
1,2,3,4,6,7,8-HpCDD	6.1E-05	1.3E-04	4.3E-03	8.9E-03	-	-
OCDD	7.6E-04	1.5E-03	5.3E-03	1.1E-02	-	-
2,3,7,8-TCDF	1.3E-07	1.8E-07	1.3E-01	1.8E-01	-	-
1,2,3,7,8-PeCDF	4.1E-08	8.6E-08	2.9E-04	6.0E-04	-	-
2,3,4,7,8-PeCDF	1.3E-07	2.5E-07	9.2E-03	1.8E-02	-	-
1,2,3,4,7,8-HxCDF	3.2E-07	6.0E-07	2.2E-03	4.2E-03	-	-
1,2,3,6,7,8-HxCDF	2.0E-07	4.0E-07	1.4E-03	2.8E-03	-	-
2,3,4,6,7,8-HxCDF	6.4E-07	1.5E-06	4.5E-03	1.0E-02	-	-
1,2,3,7,8,9-HxCDF	8.1E-08	2.2E-07	5.7E-04	1.5E-03	-	-
1,2,3,4,6,7,8-HpCDF	5.2E-06	9.5E-06	3.6E-03	6.6E-03	-	-
1,2,3,4,7,8,9-HpCDF	1.1E-06	2.1E-06	7.7E-04	1.5E-03	-	-
OCDF	1.4E-05	2.4E-05	9.8E-05	1.7E-04	-	-
PCBs						
Aroclor-1254	3.6E-02	9.7E-02	8.9E-02	2.4E-01	-	-
Aroclor-1260	3.0E-01	1.6E+00	**3.3E+00**	**1.8E+01**	7.1E-01	**3.9E+00**
PCB-105	1.9E-04	9.4E-04	1.3E-03	6.5E-03	-	-
PCB-114	8.4E-06	3.9E-05	5.9E-05	2.7E-04	-	-
PCB-118	4.1E-04	2.0E-03	2.9E-04	1.4E-03	-	-
PCB-123	6.3E-06	3.1E-05	4.4E-06	2.2E-05	-	-
PCB-126	7.9E-06	4.0E-05	5.5E-02	2.8E-01	-	-
PCB-156	7.4E-05	3.7E-04	5.2E-04	2.6E-03	-	-
PCB-157	3.3E-05	1.7E-04	2.3E-04	1.2E-03	-	-
PCB-167	5.9E-05	3.0E-04	4.1E-05	2.1E-04	-	-
PCB-169	1.9E-07	9.9E-07	1.4E-05	6.9E-05	-	-
PCB-189	4.3E-06	2.2E-05	3.0E-06	1.6E-05	-	-
PCB-77	1.8E-05	9.1E-05	6.4E-02	3.2E-01	-	-
PCB-81	3.3E-06	1.6E-05	2.3E-02	1.1E-01	-	-
Total PCB Congeners	-	-	1.4E-01	7.2E-01	0.0E+00	0.0E+00
Total Ingestion HI:			**3.1E+02**	**6.7E+02**	**3.0E+02**	**6.5E+02**

Notes:
CTE - central tendancy exposure
RME - reasonable maximum exposure
CTE_{ESL} or RME_{ESL}- The hazard quotient based on the NOAEL equivalent TRV used to calculate the ESL.
CTE_{TRV} or RME_{TRV}- The hazard quotient based on the TRV is calculated only if the hazard quotient based on the ESL is greater than 1.
TRV - toxicity reference value
HI - Hazard Index
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyls
NTV - indicates that adequate toxicity data were not available for a chemical
mg/kg-day - milligram per kilogram per day
"-" not applicable
= HIs for PCB congeners. Not included in Total estimates.

Table C3-20b (1 of 3)

Risk Estimates for the Thrush - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

	Applied Daily Dose		Hazard Quotient			
	CTE (mg/kg-day)	RME (mg/kg-day)	CTE_{ESL} (unitless)	RME_{ESL} (unitless)	CTE_{TRV} (unitless)	RME_{TRV} (unitless)
Ingestion Exposure Route						
Inorganic Compounds						
Aluminum	-	-	-	-	-	-
Antimony	-	-	-	-	-	-
Arsenic	-	-	-	-	-	-
Beryllium	-	-	-	-	-	-
Cadmium	8.4E-01	1.5E+00	**1.1E+01**	**1.8E+01**	**1.1E+01**	**1.8E+01**
Chromium	-	-	-	-	-	-
Copper	2.1E+01	4.2E+01	**9.1E+00**	**1.8E+01**	**9.1E+00**	**1.8E+01**
Lead	2.1E+00	2.8E+00	**1.5E+02**	**2.0E+02**	**1.5E+02**	**2.0E+02**
Mercury	1.1E+00	2.8E+00	**2.4E+00**	**6.2E+00**	**2.4E+00**	**6.2E+00**
Methyl Mercury	3.9E-04	8.2E-04	1.0E-02	2.1E-02	-	-
Nickel	-	-	-	-	-	-
Selenium	-	-	-	-	-	-
Silver	1.0E+00	2.8E+00	-	-	-	-
Thallium	6.5E-02	6.5E-02	-	-	-	-
Vanadium	-	-	-	-	-	-
Zinc	4.7E+01	1.1E+02	**3.2E+00**	**7.3E+00**	**3.2E+00**	**7.3E+00**
VOCs						
1,1,1-Trichloroethane	-	-	-	-	-	-
1,1,2-Trichloro-1,2,2-trifluoroethane	2.7E-03	2.7E-03	-	-	-	-
1,1-Dichloroethane	-	-	-	-	-	-
2-Butanone	4.8E-03	7.8E-03	-	-	-	-
Acetone	2.5E-01	1.2E+00	4.5E-05	2.1E-04	-	-
Bromomethane	-	-	-	-	-	-
Ethylbenzene	-	-	-	-	-	-
m,p-Xylene	-	-	-	-	-	-
Methylene chloride	2.3E-03	2.9E-03	-	-	-	-
Tetrachloroethene	-	-	-	-	-	-
Toluene	-	-	-	-	-	-
trans-1,3-Dichloropropene	-	-	-	-	-	-
Trichloroethene	-	-	-	-	-	-
Xylenes (total)	-	-	-	-	-	-
SVOCs						
Acenaphthene	1.1E-02	4.6E-02	1.1E-02	4.5E-02	-	-
Acenaphthylene	1.0E-03	3.5E-03	-	-	-	-
Anthracene	8.2E-03	3.4E-02	7.4E-03	3.0E-02	-	-
Benzo(a)anthracene	2.0E-03	6.2E-03	-	-	-	-
Benzo(a)pyrene	6.7E-04	2.0E-03	-	-	-	-
Benzo(b)fluoranthene	1.6E-03	4.0E-03	-	-	-	-
Benzo(e)pyrene	4.7E-03	1.6E-02	-	-	-	-
Benzo(g,h,i)perylene	2.0E-03	7.3E-03	-	-	-	-
Benzo(k)fluoranthene	5.9E-04	1.8E-03	-	-	-	-
bis(2-Ethylhexyl)phthalate	-	-	-	-	-	-
Butyl benzyl phthalate	-	-	-	-	-	-
Chrysene	2.5E-03	6.0E-03	-	-	-	-
Dibenz(a,h)anthracene	4.2E-04	1.5E-03	-	-	-	-
Dibenzofuran	-	-	-	-	-	-
Diethylphthalate	-	-	-	-	-	-
Di-n-butylphthalate	-	-	-	-	-	-

Table C3-20b (2 of 3)

Risk Estimates for the Thrush - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

	Applied Daily Dose		Hazard Quotient			
	CTE (mg/kg-day)	RME (mg/kg-day)	CTE_{ESL} (unitless)	RME_{ESL} (unitless)	CTE_{TRV} (unitless)	RME_{TRV} (unitless)
Di-n-octyl phthalate	-	-	-	-	-	-
Fluoranthene	2.1E-03	4.4E-03	-	-	-	-
Fluorene	1.6E-02	6.7E-02	1.6E-02	6.7E-02	-	-
Hexachlorobutadiene	-	-	-	-	-	-
Hexachlorocyclopentadiene	-	-	-	-	-	-
Indeno(1,2,3-cd)pyrene	5.6E-04	1.7E-03	-	-	-	-
Naphthalene	-	-	-	-	-	-
Pentachlorophenol	-	-	-	-	-	-
Perylene	2.5E-03	8.6E-03	-	-	-	-
Phenanthrene	6.1E-02	2.6E-01	5.4E-02	2.3E-01	-	-
Pyrene	4.6E-03	1.6E-02	-	-	-	-
Pesticides						
4,4'-DDT	-	-	-	-	-	-
Chlordane	-	-	-	-	-	-
Dieldrin	-	-	-	-	-	-
Endosulfan I	-	-	-	-	-	-
Endosulfan II	-	-	-	-	-	-
Endrin	-	-	-	-	-	-
Heptachlor	-	-	-	-	-	-
Heptachlor epoxide	-	-	-	-	-	-
Toxaphene	-	-	-	-	-	-
Total Petroleum Hydrocarbons						
C11-C14(Kerosene Range)	2.3E+00	9.0E+00	-	-	-	-
C14-C20(Diesel Range)	-	-	-	-	-	-
C20-C30(Lubricant Oil Range)	1.8E+01	1.1E+02	-	-	-	-
Dioxins						
2,3,7,8-TCDD	4.2E-08	9.0E-08	2.9E-03	6.3E-03	-	-
1,2,3,7,8-PeCDD	1.5E-07	3.1E-07	1.1E-02	2.2E-02	-	-
1,2,3,4,7,8-HxCDD	4.2E-07	8.2E-07	1.5E-03	2.9E-03	-	-
1,2,3,6,7,8-HxCDD	1.4E-06	2.5E-06	9.6E-04	1.7E-03	-	-
1,2,3,7,8,9-HxCDD	9.9E-07	2.2E-06	6.9E-03	1.5E-02	-	-
1,2,3,4,6,7,8-HpCDD	3.4E-05	5.4E-05	2.4E-03	3.8E-03	-	-
OCDD	4.5E-04	6.6E-04	3.1E-03	4.6E-03	-	-
2,3,7,8-TCDF	1.1E-07	1.8E-07	1.1E-01	1.8E-01	-	-
1,2,3,7,8-PeCDF	2.6E-08	5.8E-08	1.8E-04	4.1E-04	-	-
2,3,4,7,8-PeCDF	8.7E-08	1.6E-07	6.1E-03	1.1E-02	-	-
1,2,3,4,7,8-HxCDF	2.1E-07	3.2E-07	1.4E-03	2.3E-03	-	-
1,2,3,6,7,8-HxCDF	1.2E-07	2.3E-07	8.4E-04	1.6E-03	-	-
1,2,3,4,6,7,8-HpCDF	3.6E-06	5.0E-06	2.5E-03	3.5E-03	-	-
1,2,3,4,7,8,9-HpCDF	7.1E-07	9.6E-07	5.0E-04	6.7E-04	-	-
OCDF	1.0E-05	1.6E-05	7.2E-05	1.1E-04	-	-
PCBs						
Aroclor-1016	-	-	-	-	-	-
Aroclor-1221	-	-	-	-	-	-
Aroclor-1232	-	-	-	-	-	-
Aroclor-1242	-	-	-	-	-	-
Aroclor-1248	-	-	-	-	-	-
Aroclor-1254	3.9E-02	9.7E-02	9.4E-02	2.4E-01	-	-

Table C3-20b (3 of 3)

Risk Estimates for the Thrush - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

	Applied Daily Dose		Hazard Quotient			
	CTE (mg/kg-day)	RME (mg/kg-day)	CTE_{ESL} (unitless)	RME_{ESL} (unitless)	CTE_{TRV} (unitless)	RME_{TRV} (unitless)
Aroclor-1260	3.3E-01	1.8E+00	**3.7E+00**	**2.0E+01**	7.9E-01	**4.2E+00**
PCB-105	2.1E-04	1.1E-03	1.5E-03	7.4E-03	-	-
PCB-114	9.1E-06	4.4E-05	6.4E-05	3.0E-04	-	-
PCB-118	4.5E-04	2.3E-03	3.2E-04	1.6E-03	-	-
PCB-123	6.9E-06	3.5E-05	4.8E-06	2.5E-05	-	-
PCB-126	8.7E-06	4.5E-05	6.1E-02	3.1E-01	-	-
PCB-156	8.1E-05	4.2E-04	5.7E-04	2.9E-03	-	-
PCB-157	3.7E-05	1.9E-04	2.6E-04	1.3E-03	-	-
PCB-167	6.5E-05	3.4E-04	4.5E-05	2.4E-04	-	-
PCB-169	2.1E-07	1.1E-06	1.5E-05	7.8E-05	-	-
PCB-189	4.8E-06	2.5E-05	3.3E-06	1.8E-05	-	-
PCB-77	2.0E-05	1.0E-04	7.0E-02	3.6E-01	-	-
PCB-81	3.6E-06	1.8E-05	2.5E-02	1.3E-01	-	-
Total Ingestion HI:			**1.8E+02**	**2.7E+02**	**1.7E+02**	**2.6E+02**

Notes:
CTE - central tendancy exposure
RME - reasonable maximum exposure
CTE_{ESL} or RME_{ESL}- The hazard quotient based on the NOAEL equivalent TRV used to calculate the ESL.
CTE_{TRV} or RME_{TRV}- The hazard quotient based on the TRV is calculated only if the hazard quotient based on the ESL is greater than 1.
TRV - toxicity reference value
HI - Hazard Index
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyls
PCDD/PCDF - polychlorinated dibenzo-p-dioxins and dibenzofurans
NTV - indicates that adequate toxicity data were not available for a chemical
mg/kg-day - milligram per kilogram per day
"-" not applicable

Table C3-21a (1 of 2)

Risk Estimates for the Hawk - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

	Applied Daily Dose		Hazard Quotient			
	CTE (mg/kg-day)	RME (mg/kg-day)	CTE_{ESL} (unitless)	RME_{ESL} (unitless)	CTE_{TRV} (unitless)	RME_{TRV} (unitless)
Ingestion Exposure Route						
Inorganic Compounds						
Cadmium	3.2E-02	1.3E-01	4.1E-01	**1.6E+00**	-	**1.6E+00**
Copper	1.1E+00	2.0E+00	4.7E-01	8.9E-01	-	-
Lead	1.1E+00	2.0E+00	**7.5E+01**	**1.4E+02**	**7.5E+01**	**1.4E+02**
Mercury	1.2E-01	3.8E-01	2.7E-01	8.3E-01	-	-
Methyl Mercury	1.3E-04	2.8E-04	3.5E-03	7.2E-03	-	-
Silver	7.8E-02	3.2E-01	-	-	-	-
Thallium	7.3E-02	1.6E-01	-	-	-	-
Zinc	3.5E+01	8.3E+01	**2.4E+00**	**5.7E+00**	**2.4E+00**	**5.7E+00**
VOCs						
1,1,1-Trichloroethane	3.6E-03	2.1E-02	-	-	-	-
1,1,2-Trichloro-1,2,2-trifluoroethane	9.3E-04	9.3E-04	-	-	-	-
1,1-Dichloroethane	1.8E-03	6.4E-03	-	-	-	-
1,2-Dichloroethene (total)	2.2E-03	4.3E-03	-	-	-	-
2-Butanone	2.9E-03	2.9E-03	-	-	-	-
Acetone	4.1E-02	2.0E-01	7.4E-06	3.7E-05	-	-
Ethylbenzene	-	-	-	-	-	-
m,p-Xylene	4.6E-05	4.6E-05	-	-	-	-
Methylene chloride	3.2E-02	2.0E-01	-	-	-	-
Tetrachloroethene	3.2E-03	1.6E-02	-	-	-	-
Toluene	2.4E-02	1.7E-01	-	-	-	-
Trichloroethene	7.8E-03	4.8E-02	-	-	-	-
Xylenes (total)	5.8E-03	3.2E-02	-	-	-	-
SVOCs						
Acenaphthene	6.1E-03	1.5E-02	6.0E-03	1.5E-02	-	-
Acenaphthylene	2.9E-03	6.6E-03	-	-	-	-
Anthracene	1.2E-02	5.0E-02	1.1E-02	4.5E-02	-	-
Benzo(a)anthracene	6.9E-01	5.8E+00	-	-	-	-
Benzo(a)pyrene	2.7E-01	2.3E+00	-	-	-	-
Benzo(b)fluoranthene	2.2E-01	1.8E+00	-	-	-	-
Benzo(e)pyrene	1.7E-03	4.7E-03	-	-	-	-
Benzo(g,h,i)perylene	7.2E-02	5.4E-01	-	-	-	-
Benzo(k)fluoranthene	3.5E-01	3.0E+00	-	-	-	-
Chrysene	2.1E-01	2.0E+00	-	-	-	-
Dibenz(a,h)anthracene	1.4E-01	9.3E-01	-	-	-	-
Dibenzofuran	7.6E-03	9.3E-03	-	-	-	-
Fluoranthene	1.8E-01	1.5E+00	-	-	-	-
Fluorene	6.1E-03	1.5E-02	6.1E-03	1.5E-02	-	-
Indeno(1,2,3-cd)pyrene	1.5E-01	1.2E+00	-	-	-	-
Naphthalene	-	-	-	-	-	-
Perylene	9.6E-04	2.7E-03	-	-	-	-
Phenanthrene	1.2E-01	4.9E-01	1.1E-01	4.3E-01	-	-
Pyrene	2.3E-01	1.9E+00	-	-	-	-
Total Petroleum Hydrocarbons						
C11-C14(Kerosene Range)	6.9E-01	3.1E+00	-	-	-	-
C14-C20(Diesel Range)	6.5E-01	1.1E+00	-	-	-	-
C20-C30(Lubricant Oil Range)	6.8E+00	3.6E+01	-	-	-	-

Table C3-21a (2 of 2)

Risk Estimates for the Hawk - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

	Applied Daily Dose		Hazard Quotient			
	CTE (mg/kg-day)	RME (mg/kg-day)	CTE_{ESL} (unitless)	RME_{ESL} (unitless)	CTE_{TRV} (unitless)	RME_{TRV} (unitless)
Dioxins						
2,3,7,8-TCDD	1.7E-08	3.4E-08	1.2E-03	2.4E-03	-	-
1,2,3,7,8-PeCDD	6.9E-08	1.4E-07	4.8E-03	9.5E-03	-	-
1,2,3,4,7,8-HxCDD	6.1E-08	1.3E-07	2.1E-04	4.6E-04	-	-
1,2,3,6,7,8-HxCDD	2.1E-07	4.1E-07	1.5E-04	2.8E-04	-	-
1,2,3,7,8,9-HxCDD	6.6E-08	1.3E-07	4.6E-04	9.1E-04	-	-
1,2,3,4,6,7,8-HpCDD	1.0E-05	2.1E-05	7.1E-04	1.5E-03	-	-
OCDD	1.1E-04	2.3E-04	7.7E-04	1.6E-03	-	-
2,3,7,8-TCDF	6.5E-09	1.1E-08	6.5E-03	1.1E-02	-	-
1,2,3,7,8-PeCDF	1.8E-08	3.6E-08	1.3E-04	2.5E-04	-	-
2,3,4,7,8-PeCDF	2.3E-08	4.4E-08	1.6E-03	3.1E-03	-	-
1,2,3,4,7,8-HxCDF	9.0E-09	1.7E-08	6.3E-05	1.2E-04	-	-
1,2,3,6,7,8-HxCDF	6.3E-08	1.3E-07	4.4E-04	9.0E-04	-	-
2,3,4,6,7,8-HxCDF	1.3E-07	2.9E-07	8.9E-04	2.0E-03	-	-
1,2,3,7,8,9-HxCDF	2.4E-08	7.5E-08	1.6E-04	5.2E-04	-	-
1,2,3,4,6,7,8-HpCDF	1.4E-06	2.7E-06	9.8E-04	1.9E-03	-	-
1,2,3,4,7,8,9-HpCDF	3.0E-07	5.9E-07	2.1E-04	4.1E-04	-	-
OCDF	7.8E-06	1.5E-05	5.5E-05	1.0E-04	-	-
PCBs						
Aroclor-1254	1.2E-02	3.3E-02	2.9E-02	8.1E-02	-	-
Aroclor-1260	9.9E-02	5.4E-01	**1.1E+00**	**6.0E+00**	2.3E-01	**1.3E+00**
PCB-105	2.3E-05	1.2E-04	1.6E-04	8.2E-04	-	-
PCB-114	1.1E-06	5.1E-06	7.4E-06	3.6E-05	-	-
PCB-118	4.8E-05	2.4E-04	3.3E-05	1.7E-04	-	-
PCB-123	8.0E-07	4.2E-06	5.6E-07	2.9E-06	-	-
PCB-126	1.2E-06	6.3E-06	8.4E-03	4.4E-02	-	-
PCB-156	2.2E-05	1.1E-04	1.5E-04	8.0E-04	-	-
PCB-157	6.5E-05	3.5E-04	4.5E-04	2.4E-03	-	-
PCB-167	2.1E-05	1.1E-04	1.5E-05	7.8E-05	-	-
PCB-169	6.3E-08	3.4E-07	4.4E-06	2.4E-05	-	-
PCB-189	4.5E-06	2.4E-05	3.1E-06	1.7E-05	-	-
PCB-77	1.0E-06	5.2E-06	3.5E-03	1.8E-02	-	-
PCB-81	2.3E-07	1.2E-06	1.6E-03	8.4E-03	-	-
Total PCB Congeners	-	-	1.4E-02	7.5E-02	-	-
Total Ingestion HI:			**8.0E+01**	**1.6E+02**	**7.8E+01**	**1.5E+02**
Total Ingestion HI Accounting for Home Range Factor [a]:			**3.8E+00**	**7.4E+00**	**3.7E+00**	**7.1E+00**

Notes:

a. Home range factor based on a minimum home range of 0.3 square miles (195 acres), as described in the SRAM, and SRE site area of 9.2 acres.

Home range factor = 0.047

CTE - central tendancy exposure
RME - reasonable maximum exposure
CTE_{ESL} or RME_{ESL}- The hazard quotient based on the NOAEL equivalent TRV used to calculate the ESL.
CTE_{TRV} or RME_{TRV}- The hazard quotient based on the TRV is calculated only if the hazard quotient based on the ESL is greater than 1.
TRV - toxicity reference value
HI - Hazard Index
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyls
NTV - indicates that adequate toxicity data were not available for a chemical
mg/kg-day - milligram per kilogram per day
"-" not applicable

= HIs for PCB congeners. Not included in Total estimates.

Table C3-21b (1 of 3)

Risk Estimates for the Hawk - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

	Applied Daily Dose		Hazard Quotient			
	CTE (mg/kg-day)	RME (mg/kg-day)	CTE_{ESL} (unitless)	RME_{ESL} (unitless)	CTE_{TRV} (unitless)	RME_{TRV} (unitless)
Ingestion Exposure Route						
Inorganic Compounds						
Aluminum	-	-	-	-	-	-
Antimony	-	-	-	-	-	-
Arsenic	-	-	-	-	-	-
Beryllium	-	-	-	-	-	-
Cadmium	1.7E-02	2.8E-02	2.1E-01	3.5E-01	-	-
Chromium	-	-	-	-	-	-
Copper	6.4E-01	1.2E+00	2.8E-01	5.1E-01	-	-
Lead	7.7E-01	9.9E-01	**5.5E+01**	**7.1E+01**	**5.5E+01**	**7.1E+01**
Mercury	1.4E-01	3.1E-01	3.2E-01	7.0E-01	-	-
Methyl Mercury	1.3E-04	2.8E-04	3.5E-03	7.2E-03	-	-
Nickel	-	-	-	-	-	-
Selenium	-	-	-	-	-	-
Silver	1.2E-01	2.7E-01	-	-	-	-
Thallium	6.5E-02	1.6E-01	-	-	-	-
Vanadium	-	-	-	-	-	-
Zinc	2.0E+01	4.1E+01	**1.4E+00**	**2.8E+00**	**1.4E+00**	**2.8E+00**
VOCs						
1,1,1-Trichloroethane	-	-	-	-	-	-
1,1,2-Trichloro-1,2,2-trifluoroethane	9.3E-04	9.3E-04	-	-	-	-
1,1-Dichloroethane	-	-	-	-	-	-
2-Butanone	1.4E-03	2.1E-03	-	-	-	-
Acetone	5.4E-02	1.8E-01	9.8E-06	3.3E-05	-	-
Bromomethane	-	-	-	-	-	-
Ethylbenzene	-	-	-	-	-	-
m,p-Xylene	-	-	-	-	-	-
Methylene chloride	8.0E-04	9.4E-04	-	-	-	-
Tetrachloroethene	-	-	-	-	-	-
Toluene	-	-	-	-	-	-
trans-1,3-Dichloropropene	-	-	-	-	-	-
Trichloroethene	-	-	-	-	-	-
Xylenes (total)	-	-	-	-	-	-
SVOCs						
Acenaphthene	6.8E-03	2.5E-02	6.7E-03	2.5E-02	-	-
Acenaphthylene	4.7E-04	1.3E-03	-	-	-	-
Anthracene	1.9E-02	9.8E-02	1.8E-02	8.9E-02	-	-
Benzo(a)anthracene	1.3E+00	1.7E+01	-	-	-	-
Benzo(a)pyrene	5.2E-01	6.9E+00	-	-	-	-
Benzo(b)fluoranthene	4.1E-01	5.3E+00	-	-	-	-
Benzo(e)pyrene	1.9E-03	5.3E-03	-	-	-	-
Benzo(g,h,i)perylene	1.2E-01	1.1E+00	-	-	-	-
Benzo(k)fluoranthene	6.8E-01	9.1E+00	-	-	-	-
bis(2-Ethylhexyl)phthalate	-	-	-	-	-	-
Butyl benzyl phthalate	-	-	-	-	-	-
Chrysene	3.8E-01	4.1E+00	-	-	-	-
Dibenz(a,h)anthracene	1.9E-01	1.8E+00	-	-	-	-
Dibenzofuran	2.2E-02	2.2E-02	-	-	-	-
Diethylphthalate	-	-	-	-	-	-
Di-n-butylphthalate	-	-	-	-	-	-
Di-n-octyl phthalate	-	-	-	-	-	-
Fluoranthene	3.4E-01	4.5E+00	-	-	-	-

Table C3-21b (2 of 3)

Risk Estimates for the Hawk - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

	Applied Daily Dose		Hazard Quotient			
	CTE (mg/kg-day)	RME (mg/kg-day)	CTE_{ESL} (unitless)	RME_{ESL} (unitless)	CTE_{TRV} (unitless)	RME_{TRV} (unitless)
Fluorene	6.9E-03	2.6E-02	6.8E-03	2.5E-02	-	-
Hexachlorobutadiene	-	-	-	-	-	-
Hexachlorocyclopentadiene	-	-	-	-	-	-
Indeno(1,2,3-cd)pyrene	2.7E-01	3.6E+00	-	-	-	-
Naphthalene	-	-	-	-	-	-
Pentachlorophenol	-	-	-	-	-	-
Perylene	1.1E-03	3.0E-03	-	-	-	-
Phenanthrene	2.3E-01	1.9E+00	2.1E-01	**1.7E+00**	-	**1.7E+00**
Pyrene	4.4E-01	3.9E+00	-	-	-	-
Pesticides						
4,4'-DDT	-	-	-	-	-	-
Chlordane	-	-	-	-	-	-
Dieldrin	-	-	-	-	-	-
Endosulfan I	-	-	-	-	-	-
Endosulfan II	-	-	-	-	-	-
Endrin	-	-	-	-	-	-
Heptachlor	-	-	-	-	-	-
Heptachlor epoxide	-	-	-	-	-	-
Toxaphene	-	-	-	-	-	-
Total Petroleum Hydrocarbons						
C11-C14(Kerosene Range)	7.2E-01	3.1E+00	-	-	-	-
C14-C20(Diesel Range)	-	-	-	-	-	-
C20-C30(Lubricant Oil Range)	7.7E+00	3.6E+01	-	-	-	-
Dioxins						
2,3,7,8-TCDD	1.2E-08	2.7E-08	8.0E-04	1.9E-03	-	-
1,2,3,7,8-PeCDD	4.3E-08	1.0E-07	3.0E-03	7.1E-03	-	-
1,2,3,4,7,8-HxCDD	3.0E-08	6.8E-08	1.0E-04	2.4E-04	-	-
1,2,3,6,7,8-HxCDD	1.4E-07	3.1E-07	9.7E-05	2.2E-04	-	-
1,2,3,7,8,9-HxCDD	4.7E-08	1.2E-07	3.3E-04	8.4E-04	-	-
1,2,3,4,6,7,8-HpCDD	5.2E-06	1.1E-05	3.7E-04	7.7E-04	-	-
OCDD	6.1E-05	1.2E-04	4.3E-04	8.4E-04	-	-
2,3,7,8-TCDF	5.3E-09	1.1E-08	5.3E-03	1.1E-02	-	-
1,2,3,7,8-PeCDF	1.1E-08	3.0E-08	8.0E-05	2.1E-04	-	-
2,3,4,7,8-PeCDF	1.4E-08	3.1E-08	1.0E-03	2.2E-03	-	-
1,2,3,4,7,8-HxCDF	5.5E-09	1.1E-08	3.9E-05	7.6E-05	-	-
1,2,3,6,7,8-HxCDF	3.6E-08	8.2E-08	2.5E-04	5.8E-04	-	-
1,2,3,4,6,7,8-HpCDF	9.2E-07	1.7E-06	6.4E-04	1.2E-03	-	-
1,2,3,4,7,8,9-HpCDF	1.8E-07	3.3E-07	1.3E-04	2.3E-04	-	-
OCDF	5.4E-06	1.1E-05	3.8E-05	7.6E-05	-	-
PCBs						
Aroclor-1016	-	-	-	-	-	-
Aroclor-1221	-	-	-	-	-	-
Aroclor-1232	-	-	-	-	-	-
Aroclor-1242	-	-	-	-	-	-
Aroclor-1248	-	-	-	-	-	-
Aroclor-1254	1.3E-02	3.3E-02	3.1E-02	8.1E-02	-	-
Aroclor-1260	1.1E-01	5.9E-01	**1.2E+00**	**6.6E+00**	2.6E-01	**1.4E+00**
PCB-105	2.5E-05	1.3E-04	1.7E-04	9.1E-04	-	-
PCB-114	1.2E-06	5.7E-06	8.1E-06	4.0E-05	-	-
PCB-118	5.2E-05	2.7E-04	3.6E-05	1.9E-04	-	-

Table C3-21b (3 of 3)

Risk Estimates for the Hawk - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

	Applied Daily Dose		Hazard Quotient			
	CTE (mg/kg-day)	RME (mg/kg-day)	CTE_{ESL} (unitless)	RME_{ESL} (unitless)	CTE_{TRV} (unitless)	RME_{TRV} (unitless)
PCB-123	8.8E-07	4.6E-06	6.1E-07	3.2E-06	-	-
PCB-126	1.3E-06	7.0E-06	9.2E-03	4.9E-02	-	-
PCB-156	2.4E-05	1.3E-04	1.7E-04	8.9E-04	-	-
PCB-157	7.1E-05	3.9E-04	5.0E-04	2.7E-03	-	-
PCB-167	2.3E-05	1.2E-04	1.6E-05	8.6E-05	-	-
PCB-169	7.0E-08	3.8E-07	4.9E-06	2.6E-05	-	-
PCB-189	4.9E-06	2.6E-05	3.4E-06	1.9E-05	-	-
PCB-77	1.1E-06	5.8E-06	3.8E-03	2.0E-02	-	-
PCB-81	2.5E-07	1.3E-06	1.8E-03	9.3E-03	-	-
Total Ingestion HI:					**5.7E+01**	**7.7E+01**
Total Ingestion HI Accounting for Home Range Factor[a]:					**2.7E+00**	**3.6E+00**

Notes:

a. Home range factor based on a minimum home range of 0.3 square miles (195 acres), as described in the SRAM, and SRE RFI site area of 9.2 acres.

Home range factor = 0.0472

CTE - central tendancy exposure
RME - reasonable maximum exposure
CTE_{ESL} or RME_{ESL}- The hazard quotient based on the NOAEL equivalent TRV used to calculate the ESL.
CTE_{TRV} or RME_{TRV}- The hazard quotient based on the TRV is calculated only if the hazard quotient based on the ESL is greater than 1.
TRV - toxicity reference value
HI - Hazard Index
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyls
PCDD/PCDF - polychlorinated dibenzo-p-dioxins and dibenzofurans
NTV - indicates that adequate toxicity data were not available for a chemical
mg/kg-day - milligram per kilogram per day
"-" not applicable

Table C3-22a (1 of 2)

Risk Estimates for the Bobcat - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

	Applied Daily Dose		Hazard Quotient			
	CTE (mg/kg-day)	RME (mg/kg-day)	CTE_{ESL} (unitless)	RME_{ESL} (unitless)	CTE_{TRV} (unitless)	RME_{TRV} (unitless)
Ingestion Exposure Route						
Inorganic Compounds						
Cadmium	1.4E-02	5.6E-02	**5.8E+00**	**2.3E+01**	1.4E-02	5.6E-02
Copper	4.7E-01	8.8E-01	2.5E-01	4.7E-01	-	-
Lead	4.5E-01	8.5E-01	4.5E-01	8.5E-01	-	-
Mercury	5.1E-02	1.6E-01	5.1E-02	1.6E-01	-	-
Methyl Mercury	5.8E-05	1.2E-04	2.3E-04	4.8E-04	-	-
Silver	3.4E-02	1.4E-01	1.3E-01	5.1E-01	-	-
Thallium	3.1E-02	7.0E-02	6.5E-02	1.5E-01	-	-
Zinc	1.5E+01	3.5E+01	**3.8E+00**	**9.0E+00**	1.3E-01	3.0E-01
VOCs						
1,1,1-Trichloroethane	1.6E-03	8.9E-03	1.1E-05	6.5E-05	-	-
1,1,2-Trichloro-1,2,2-trifluoroethane	4.0E-04	4.0E-04	1.3E-05	1.3E-05	-	-
1,1-Dichloroethane	7.5E-04	2.7E-03	2.1E-05	7.7E-05	-	-
1,2-Dichloroethene (total)	9.5E-04	1.9E-03	5.9E-05	1.2E-04	-	-
2-Butanone	1.2E-03	1.2E-03	6.9E-07	6.9E-07	-	-
Acetone	1.7E-02	8.6E-02	1.7E-03	8.6E-03	-	-
Ethylbenzene	-	-	-	-	-	-
m,p-Xylene	2.0E-05	2.0E-05	6.6E-07	6.6E-07	-	-
Methylene chloride	1.4E-02	8.7E-02	2.3E-03	1.5E-02	-	-
Tetrachloroethene	1.4E-03	6.8E-03	4.1E-03	2.0E-02	-	-
Toluene	1.0E-02	7.3E-02	2.6E-02	1.8E-01	-	-
Trichloroethene	3.4E-03	2.0E-02	2.5E-03	1.5E-02	-	-
Xylenes (total)	2.5E-03	1.4E-02	8.2E-05	4.6E-04	-	-
SVOCs						
Acenaphthene	2.6E-03	6.4E-03	4.2E-05	1.0E-04	-	-
Acenaphthylene	1.3E-03	2.8E-03	1.0E-05	2.3E-05	-	-
Anthracene	5.2E-03	2.2E-02	1.5E-05	6.1E-05	-	-
Benzo(a)anthracene	2.9E-01	2.5E+00	3.2E-01	**2.7E+00**	-	**2.7E+00**
Benzo(a)pyrene	1.2E-01	9.8E-01	1.3E-01	**1.1E+00**	-	**1.1E+00**
Benzo(b)fluoranthene	9.4E-02	7.6E-01	1.0E-01	8.2E-01	-	-
Benzo(e)pyrene	7.2E-04	2.0E-03	-	-	-	-
Benzo(g,h,i)perylene	3.1E-02	2.3E-01	3.3E-02	2.5E-01	-	-
Benzo(k)fluoranthene	1.5E-01	1.3E+00	1.6E-01	**1.4E+00**	-	**1.4E+00**
Chrysene	8.9E-02	8.7E-01	9.6E-02	9.4E-01	-	-
Dibenz(a,h)anthracene	5.9E-02	4.0E-01	6.4E-02	4.3E-01	-	-
Dibenzofuran	3.3E-03	4.0E-03	4.6E-06	5.7E-06	-	-
Fluoranthene	7.6E-02	6.4E-01	1.7E-03	1.5E-02	-	-
Fluorene	2.6E-03	6.5E-03	5.9E-05	1.5E-04	-	-
Indeno(1,2,3-cd)pyrene	6.5E-02	5.1E-01	7.0E-02	5.5E-01	-	-
Naphthalene	-	-	-	-	-	-
Perylene	4.1E-04	1.2E-03	-	-	-	-
Phenanthrene	5.4E-02	2.1E-01	1.0E-03	4.0E-03	-	-
Pyrene	9.8E-02	8.3E-01	3.7E-03	3.1E-02	-	-
Total Petroleum Hydrocarbons						
C11-C14(Kerosene Range)	2.9E-01	1.3E+00	-	-	-	-
C14-C20(Diesel Range)	2.8E-01	4.8E-01	-	-	-	-
C20-C30(Lubricant Oil Range)	2.9E+00	1.6E+01	-	-	-	-

Table C3-22a (2 of 2)

Risk Estimates for the Bobcat - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

	Applied Daily Dose		Hazard Quotient			
	CTE (mg/kg-day)	RME (mg/kg-day)	CTE_{ESL} (unitless)	RME_{ESL} (unitless)	CTE_{TRV} (unitless)	RME_{TRV} (unitless)
Dioxins						
2,3,7,8-TCDD	7.5E-09	1.5E-08	7.5E-03	1.5E-02	-	-
1,2,3,7,8-PeCDD	3.0E-08	5.9E-08	3.0E-02	5.9E-02	-	-
1,2,3,4,7,8-HxCDD	2.6E-08	5.6E-08	2.6E-03	5.6E-03	-	-
1,2,3,6,7,8-HxCDD	9.0E-08	1.7E-07	9.0E-03	1.7E-02	-	-
1,2,3,7,8,9-HxCDD	2.8E-08	5.6E-08	2.8E-03	5.6E-03	-	-
1,2,3,4,6,7,8-HpCDD	4.3E-06	9.1E-06	4.3E-02	9.1E-02	-	-
OCDD	4.7E-05	9.7E-05	4.7E-03	9.7E-03	-	-
2,3,7,8-TCDF	2.8E-09	4.9E-09	2.8E-04	4.9E-04	-	-
1,2,3,7,8-PeCDF	7.8E-09	1.5E-08	3.9E-04	7.6E-04	-	-
2,3,4,7,8-PeCDF	9.7E-09	1.9E-08	4.9E-03	9.4E-03	-	-
1,2,3,4,7,8-HxCDF	3.9E-09	7.5E-09	3.9E-04	7.5E-04	-	-
1,2,3,6,7,8-HxCDF	2.7E-08	5.5E-08	2.7E-03	5.5E-03	-	-
2,3,4,6,7,8-HxCDF	5.5E-08	1.2E-07	5.5E-03	1.2E-02	-	-
1,2,3,7,8,9-HxCDF	1.0E-08	3.2E-08	1.0E-03	3.2E-03	-	-
1,2,3,4,6,7,8-HpCDF	6.0E-07	1.1E-06	6.0E-03	1.1E-02	-	-
1,2,3,4,7,8,9-HpCDF	1.3E-07	2.5E-07	1.3E-03	2.5E-03	-	-
OCDF	3.4E-06	6.2E-06	3.4E-04	6.2E-04	-	-
PCBs						
Aroclor-1254	5.1E-03	1.4E-02	1.1E-01	3.1E-01	-	-
Aroclor-1260	4.2E-02	2.3E-01	9.2E-01	**5.1E+00**	-	6.4E-01
PCB-105	9.8E-06	5.1E-05	9.8E-04	5.1E-03	-	-
PCB-114	4.6E-07	2.2E-06	2.3E-04	1.1E-03	-	-
PCB-118	2.0E-05	1.0E-04	2.0E-03	1.0E-02	-	-
PCB-123	3.4E-07	1.8E-06	3.4E-05	1.8E-04	-	-
PCB-126	5.1E-07	2.7E-06	5.1E-02	2.7E-01	-	-
PCB-156	9.4E-06	4.9E-05	4.7E-03	2.5E-02	-	-
PCB-157	2.8E-05	1.5E-04	1.4E-02	7.5E-02	-	-
PCB-167	8.9E-06	4.8E-05	8.9E-05	4.8E-04	-	-
PCB-169	2.7E-08	1.5E-07	2.7E-04	1.5E-03	-	-
PCB-189	1.9E-06	1.0E-05	1.9E-04	1.0E-03	-	-
PCB-77	4.3E-07	2.2E-06	4.3E-05	2.2E-04	-	-
PCB-81	9.9E-08	5.1E-07	9.9E-06	5.1E-05	-	-
Total PCB Congeners	-	-	7.4E-02	3.9E-01	0.0E+00	0.0E+00
Total Ingestion HI:			**1.3E+01**	**4.9E+01**	1.4E-01	**6.1E+00**
Total Ingestion HI Accounting for Home Range Factor [a]:			1.0E-01	3.9E-01	1.1E-03	4.9E-02

Notes:

a. Home range factor based on a minimum home range of 1.8 square miles (1,152 acres), as described in the SRAM, and SRE site area of 9.2 acres.

Home range factor = 0.008

CTE - central tendancy exposure
RME - reasonable maximum exposure
NOAEL - no observable adverse effect level
CTE_{ESL} or RME_{ESL}- The hazard quotient based on the NOAEL equivalent TRV used to calculate the ESL.
CTE_{TRV} or RME_{TRV}- The hazard quotient based on the TRV is calculated only if the hazard quotient based on the ESL is greater than 1.
TRV - toxicity reference value
HI - Hazard Index
VOC - volatile organic compund
SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyls
mg/kg-day - milligram per kilogram per day
"-" not applicable

= HIs for PCB congeners. Not included in Total estimates.

Table C3-22b (1 of 3)

Risk Estimates for the Bobcat - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

	Applied Daily Dose		Hazard Quotient			
	CTE (mg/kg-day)	RME (mg/kg-day)	CTE_{ESL} (unitless)	RME_{ESL} (unitless)	CTE_{TRV} (unitless)	RME_{TRV} (unitless)
Ingestion Exposure Route						
Inorganic Compounds						
Aluminum	-	-	-	-	-	-
Antimony	-	-	-	-	-	-
Arsenic	-	-	-	-	-	-
Beryllium	-	-	-	-	-	-
Cadmium	7.3E-03	1.2E-02	**3.0E+00**	**4.9E+00**	7.3E-03	1.2E-02
Chromium	-	-	-	-	-	-
Copper	2.8E-01	5.0E-01	1.5E-01	2.7E-01	-	-
Lead	3.3E-01	4.3E-01	3.3E-01	4.3E-01	-	-
Mercury	6.1E-02	1.3E-01	6.1E-02	1.3E-01	-	-
Methyl Mercury	5.8E-05	1.2E-04	2.3E-04	4.8E-04	-	-
Nickel	-	-	-	-	-	-
Selenium	-	-	-	-	-	-
Silver	5.0E-02	1.2E-01	1.9E-01	4.4E-01	-	-
Thallium	2.8E-02	7.0E-02	5.8E-02	1.5E-01	-	-
Vanadium	-	-	-	-	-	-
Zinc	8.6E+00	1.8E+01	**2.2E+00**	**4.5E+00**	7.2E-02	1.5E-01
VOCs						
1,1,1-Trichloroethane	-	-	-	-	-	-
1,1,2-Trichloro-1,2,2-trifluoroethane	4.0E-04	4.0E-04	1.3E-05	1.3E-05	-	-
1,1-Dichloroethane	-	-	-	-	-	-
2-Butanone	6.1E-04	9.1E-04	3.4E-07	5.1E-07	-	-
Acetone	2.3E-02	7.6E-02	2.3E-03	7.6E-03	-	-
Bromomethane	-	-	-	-	-	-
Ethylbenzene	-	-	-	-	-	-
m,p-Xylene	-	-	-	-	-	-
Methylene chloride	3.4E-04	4.0E-04	5.9E-05	6.9E-05	-	-
Tetrachloroethene	-	-	-	-	-	-
Toluene	-	-	-	-	-	-
trans-1,3-Dichloropropene	-	-	-	-	-	-
Trichloroethene	-	-	-	-	-	-
Xylenes (total)	-	-	-	-	-	-
SVOCs						
Acenaphthene	2.9E-03	1.1E-02	4.7E-05	1.7E-04	-	-
Acenaphthylene	2.0E-04	5.7E-04	1.6E-06	4.6E-06	-	-
Anthracene	8.3E-03	4.2E-02	2.4E-05	1.2E-04	-	-
Benzo(a)anthracene	5.6E-01	7.5E+00	6.1E-01	**8.1E+00**	-	**8.1E+00**
Benzo(a)pyrene	2.2E-01	3.0E+00	2.4E-01	**3.2E+00**	-	**3.2E+00**
Benzo(b)fluoranthene	1.8E-01	2.3E+00	1.9E-01	**2.4E+00**	-	**2.4E+00**
Benzo(e)pyrene	8.0E-04	2.3E-03	-	-	-	-
Benzo(g,h,i)perylene	5.1E-02	4.7E-01	5.6E-02	5.0E-01	-	-
Benzo(k)fluoranthene	2.9E-01	3.9E+00	3.1E-01	**4.2E+00**	-	**4.2E+00**
bis(2-Ethylhexyl)phthalate	-	-	-	-	-	-
Butyl benzyl phthalate	-	-	-	-	-	-
Chrysene	1.6E-01	1.8E+00	1.8E-01	**1.9E+00**	-	**1.9E+00**
Dibenz(a,h)anthracene	8.2E-02	7.9E-01	8.8E-02	8.5E-01	-	-
Dibenzofuran	9.3E-03	9.3E-03	1.3E-05	1.3E-05	-	-
Diethylphthalate	-	-	-	-	-	-
Di-n-butylphthalate	-	-	-	-	-	-
Di-n-octyl phthalate	-	-	-	-	-	-
Fluoranthene	1.5E-01	1.9E+00	3.3E-03	4.4E-02	-	-
Fluorene	3.0E-03	1.1E-02	6.7E-05	2.5E-04	-	-
Hexachlorobutadiene	-	-	-	-	-	-

Table C3-22b (2 of 3)

Risk Estimates for the Bobcat - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

	Applied Daily Dose		Hazard Quotient			
	CTE (mg/kg-day)	RME (mg/kg-day)	CTE_{ESL} (unitless)	RME_{ESL} (unitless)	CTE_{TRV} (unitless)	RME_{TRV} (unitless)
Hexachlorocyclopentadiene	-	-	-	-	-	-
Indeno(1,2,3-cd)pyrene	1.1E-01	1.5E+00	1.2E-01	**1.7E+00**	-	**1.7E+00**
Naphthalene	-	-	-	-	-	-
Pentachlorophenol	-	-	-	-	-	-
Perylene	4.6E-04	1.3E-03	-	-	-	-
Phenanthrene	1.0E-01	8.3E-01	1.9E-03	1.6E-02	-	-
Pyrene	1.9E-01	1.7E+00	7.1E-03	6.4E-02	-	-
Pesticides						
4,4'-DDT	-	-	-	-	-	-
Chlordane	-	-	-	-	-	-
Dieldrin	-	-	-	-	-	-
Endosulfan I	-	-	-	-	-	-
Endosulfan II	-	-	-	-	-	-
Endrin	-	-	-	-	-	-
Heptachlor	-	-	-	-	-	-
Heptachlor epoxide	-	-	-	-	-	-
Toxaphene	-	-	-	-	-	-
Dioxins						
2,3,7,8-TCDD	4.9E-09	1.2E-08	4.9E-03	1.2E-02	-	-
1,2,3,7,8-PeCDD	1.9E-08	4.4E-08	1.9E-02	4.4E-02	-	-
1,2,3,4,7,8-HxCDD	1.3E-08	2.9E-08	1.3E-03	2.9E-03	-	-
1,2,3,6,7,8-HxCDD	5.9E-08	1.3E-07	5.9E-03	1.3E-02	-	-
1,2,3,7,8,9-HxCDD	2.0E-08	5.1E-08	2.0E-03	5.1E-03	-	-
1,2,3,4,6,7,8-HpCDD	2.3E-06	4.7E-06	2.3E-02	4.7E-02	-	-
OCDD	2.6E-05	5.2E-05	2.6E-03	5.2E-03	-	-
2,3,7,8-TCDF	2.3E-09	4.8E-09	2.3E-04	4.8E-04	-	-
1,2,3,7,8-PeCDF	4.9E-09	1.3E-08	2.4E-04	6.4E-04	-	-
2,3,4,7,8-PeCDF	6.2E-09	1.3E-08	3.1E-03	6.6E-03	-	-
1,2,3,4,7,8-HxCDF	2.4E-09	4.7E-09	2.4E-04	4.7E-04	-	-
1,2,3,6,7,8-HxCDF	1.6E-08	3.5E-08	1.6E-03	3.5E-03	-	-
1,2,3,4,6,7,8-HpCDF	4.0E-07	7.2E-07	4.0E-03	7.2E-03	-	-
1,2,3,4,7,8,9-HpCDF	7.9E-08	1.4E-07	7.9E-04	1.4E-03	-	-
OCDF	2.3E-06	4.7E-06	2.3E-04	4.7E-04	-	-
PCBs						
Aroclor-1016	-	-	-	-	-	-
Aroclor-1221	-	-	-	-	-	-
Aroclor-1232	-	-	-	-	-	-
Aroclor-1242	-	-	-	-	-	-
Aroclor-1248	-	-	-	-	-	-
Aroclor-1254	5.4E-03	1.4E-02	1.2E-01	3.1E-01	-	-
Aroclor-1260	4.6E-02	2.5E-01	**1.0E+00**	**5.5E+00**	1.3E-01	7.1E-01
PCB-105	1.1E-05	5.6E-05	1.1E-03	5.6E-03	-	-
PCB-114	5.0E-07	2.4E-06	2.5E-04	1.2E-03	-	-
PCB-118	2.2E-05	1.2E-04	2.2E-03	1.2E-02	-	-
PCB-123	3.8E-07	2.0E-06	3.8E-05	2.0E-04	-	-
PCB-126	5.6E-07	3.0E-06	5.6E-02	3.0E-01	-	-
PCB-156	1.0E-05	5.5E-05	5.1E-03	2.7E-02	-	-
PCB-157	3.1E-05	1.7E-04	1.5E-02	8.3E-02	-	-
PCB-167	9.8E-06	5.3E-05	9.8E-05	5.3E-04	-	-
PCB-169	3.0E-08	1.6E-07	3.0E-04	1.6E-03	-	-
PCB-189	2.1E-06	1.1E-05	2.1E-04	1.1E-03	-	-
PCB-77	4.7E-07	2.5E-06	4.7E-05	2.5E-04	-	-
PCB-81	1.1E-07	5.7E-07	1.1E-05	5.7E-05	-	-

Table C3-22b (3 of 3)

Risk Estimates for the Bobcat - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

	Applied Daily Dose		Hazard Quotient			
	CTE (mg/kg-day)	RME (mg/kg-day)	CTE_{ESL} (unitless)	RME_{ESL} (unitless)	CTE_{TRV} (unitless)	RME_{TRV} (unitless)
Total Ingestion HI:					2.1E-01	**2.2E+01**
Total Ingestion HI Accounting for Home Range Factor[a]:					1.7E-03	1.8E-01

Notes:

a. Home range factor based on a minimum home range of 1.8 square miles (1,152 acres), as described in the SRAM, in the SRAM, and SRE RFI site area of 9.2 acres.

Home range factor = 0.0080

CTE - central tendancy exposure
RME - reasonable maximum exposure
NOAEL - no observable adverse effect level
CTE_{ESL} or RME_{ESL}- The hazard quotient based on the NOAEL equivalent TRV used to calculate the ESL.
CTE_{TRV} or RME_{TRV}- The hazard quotient based on the TRV is calculated only if the hazard quotient based on the ESL is greater than 1.
TRV - toxicity reference value
HI - Hazard Index
VOC - volatile organic compund
SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyls
PCDD/PCDF - polychlorinated dibenzo-p-dioxins and dibenzofurans
mg/kg-day - milligram per kilogram per day
"-" not applicable

Table C3-23a (1 of 2)

Risk Estimates for the Mule Deer - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

	Applied Daily Dose		Hazard Quotient			
	CTE (mg/kg-day)	RME (mg/kg-day)	CTE_{ESL} (unitless)	RME_{ESL} (unitless)	CTE_{TRV} (unitless)	RME_{TRV} (unitless)
Ingestion Exposure Route						
Inorganic Compounds						
Cadmium	2.2E-01	4.9E-01	**2.0E+02**	**4.4E+02**	**4.7E+00**	**1.0E+01**
Copper	1.6E+00	3.5E+00	9.2E-01	**2.0E+00**	-	5.0E-01
Lead	1.4E+00	2.9E+00	**1.8E+00**	**3.9E+00**	**1.9E+00**	**4.0E+00**
Mercury	6.4E-02	1.5E-01	6.3E-02	1.5E-01	-	-
Methyl Mercury	7.1E-05	1.5E-04	1.9E-03	4.0E-03	-	-
Silver	5.3E-02	2.0E-01	2.2E-01	8.0E-01	-	-
Thallium	7.0E-03	7.0E-03	3.6E-02	3.6E-02	-	-
Zinc	1.1E+01	2.9E+01	**3.5E+00**	**8.9E+00**	2.1E-01	5.4E-01
VOCs						
1,1,1-Trichloroethane	-	-	-	-	-	-
1,1,2-Trichloro-1,2,2-trifluoroethane	4.9E-04	4.9E-04	1.6E-05	1.6E-05	-	-
1,1-Dichloroethane	-	-	-	-	-	-
1,2-Dichloroethene (total)	1.2E-03	2.9E-03	9.6E-05	2.4E-04	-	-
2-Butanone	1.5E-03	1.5E-03	1.1E-06	1.1E-06	-	-
Acetone	2.8E-02	1.7E-01	1.5E-03	9.3E-03	-	-
Ethylbenzene	-	-	-	-	-	-
m,p-Xylene	-	-	-	-	-	-
Methylene chloride	5.3E-04	5.3E-04	2.2E-04	2.2E-04	-	-
Tetrachloroethene	8.5E-04	3.6E-03	2.8E-03	1.2E-02	-	-
Toluene	2.3E-03	1.4E-02	6.1E-03	3.7E-02	-	-
Trichloroethene	1.5E-03	8.2E-03	9.7E-04	5.3E-03	-	-
Xylenes (total)	1.0E-03	2.1E-03	4.6E-05	9.3E-05	-	-
SVOCs						
Acenaphthene	1.8E-03	4.1E-03	3.2E-05	7.2E-05	-	-
Acenaphthylene	1.3E-03	3.5E-03	1.1E-05	3.0E-05	-	-
Anthracene	1.6E-03	3.3E-03	4.9E-06	1.0E-05	-	-
Benzo(a)anthracene	7.6E-03	3.1E-02	8.9E-03	3.7E-02	-	-
Benzo(a)pyrene	1.5E-03	6.1E-03	1.7E-03	7.1E-03	-	-
Benzo(b)fluoranthene	2.0E-03	1.1E-02	2.3E-03	1.3E-02	-	-
Benzo(e)pyrene	7.6E-04	2.6E-03	-	-	-	-
Benzo(g,h,i)perylene	1.7E-03	3.7E-03	2.0E-03	4.3E-03	-	-
Benzo(k)fluoranthene	1.2E-03	3.5E-03	1.4E-03	4.1E-03	-	-
Chrysene	5.0E-03	2.4E-02	5.9E-03	2.9E-02	-	-
Dibenz(a,h)anthracene	1.2E-03	3.5E-03	1.4E-03	4.1E-03	-	-
Dibenzofuran	-	-	-	-	-	-
Fluoranthene	6.9E-03	4.3E-02	1.7E-04	1.1E-03	-	-
Fluorene	1.8E-03	4.1E-03	4.4E-05	1.0E-04	-	-
Indeno(1,2,3-cd)pyrene	1.4E-03	5.5E-03	1.6E-03	6.5E-03	-	-
Naphthalene	-	-	-	-	-	-
Perylene	4.3E-04	1.5E-03	-	-	-	-
Phenanthrene	2.3E-02	5.8E-02	4.7E-04	1.2E-03	-	-
Pyrene	4.1E-03	1.2E-02	1.7E-04	4.9E-04	-	-
Total Petroleum Hydrocarbons						
C11-C14(Kerosene Range)	3.9E-01	1.6E+00	-	-	-	-
C14-C20(Diesel Range)	-	-	-	-	-	-
C20-C30(Lubricant Oil Range)	3.0E+00	1.9E+01	-	-	-	-

Table C3-23a (2 of 2)

Risk Estimates for the Mule Deer - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

	Applied Daily Dose		Hazard Quotient			
	CTE (mg/kg-day)	RME (mg/kg-day)	CTE_{ESL} (unitless)	RME_{ESL} (unitless)	CTE_{TRV} (unitless)	RME_{TRV} (unitless)
Dioxins						
2,3,7,8-TCDD	1.1E-08	2.2E-08	9.9E-02	1.9E-01	-	-
1,2,3,7,8-PeCDD	4.5E-08	8.9E-08	4.0E-01	7.9E-01	-	-
1,2,3,4,7,8-HxCDD	1.7E-07	3.7E-07	1.5E-01	3.3E-01	-	-
1,2,3,6,7,8-HxCDD	1.2E-07	2.2E-07	1.0E-01	1.9E-01	-	-
1,2,3,7,8,9-HxCDD	2.4E-07	4.1E-07	2.1E-01	3.6E-01	-	-
1,2,3,4,6,7,8-HpCDD	7.8E-06	1.6E-05	6.9E-01	**1.5E+00**	-	**1.8E+00**
OCDD	8.5E-05	1.7E-04	7.6E-02	1.5E-01	-	-
2,3,7,8-TCDF	2.2E-08	3.2E-08	2.0E-02	2.9E-02	-	-
1,2,3,7,8-PeCDF	1.1E-08	2.3E-08	5.0E-03	1.0E-02	-	-
2,3,4,7,8-PeCDF	3.3E-08	6.4E-08	1.5E-01	2.8E-01	-	-
1,2,3,4,7,8-HxCDF	7.3E-08	1.4E-07	6.4E-02	1.2E-01	-	-
1,2,3,6,7,8-HxCDF	6.3E-08	1.3E-07	5.6E-02	1.1E-01	-	-
2,3,4,6,7,8-HxCDF	1.6E-07	3.6E-07	1.4E-01	3.2E-01	-	-
1,2,3,7,8,9-HxCDF	1.5E-08	4.0E-08	1.3E-02	3.5E-02	-	-
1,2,3,4,6,7,8-HpCDF	5.1E-07	9.4E-07	4.6E-02	8.3E-02	-	-
1,2,3,4,7,8,9-HpCDF	2.0E-07	3.8E-07	1.8E-02	3.3E-02	-	-
OCDF	1.9E-06	3.3E-06	1.7E-03	3.0E-03	-	-
PCBs						
Aroclor-1254	6.6E-03	1.8E-02	1.6E-01	4.2E-01	-	-
Aroclor-1260	5.4E-02	3.0E-01	**1.3E+00**	**7.1E+00**	2.1E-01	**1.2E+00**
PCB-105	1.5E-05	7.5E-05	2.0E-03	1.0E-02	-	-
PCB-114	3.2E-07	1.5E-06	2.1E-04	9.9E-04	-	-
PCB-118	2.9E-05	1.4E-04	3.9E-03	1.9E-02	-	-
PCB-123	4.4E-07	2.2E-06	5.9E-05	2.9E-04	-	-
PCB-126	7.9E-07	3.9E-06	1.0E-01	5.2E-01	-	-
PCB-156	7.5E-06	3.8E-05	5.0E-03	2.5E-02	-	-
PCB-157	3.5E-06	1.8E-05	2.3E-03	1.2E-02	-	-
PCB-167	6.4E-06	3.3E-05	8.5E-05	4.4E-04	-	-
PCB-169	3.5E-08	1.8E-07	4.6E-04	2.4E-03	-	-
PCB-189	7.5E-07	3.8E-06	9.9E-05	5.1E-04	-	-
PCB-77	1.7E-06	8.5E-06	2.3E-04	1.1E-03	-	-
PCB-81	3.8E-07	1.9E-06	5.0E-05	2.5E-04	-	-
Total PCB Congeners	-	-	1.2E-01	6.0E-01	0.0E+00	0.0E+00
Total Ingestion HI:			**2.1E+02**	**4.7E+02**	**7.0E+00**	**1.8E+01**
Total Ingestion HI Accounting for Home Range Factor [a]:			**9.9E+00**	**2.2E+01**	3.4E-01	8.8E-01

Notes:

a. Home range factor based on minimum home range of 0.3 square miles (192 acres), as described in the SRAM, and SRE site area of 9.2 acres.

Home range factor = 0.048

CTE - central tendancy exposure
RME - reasonable maximum exposure
NOAEL - no observable adverse effect level
CTE_{ESL} or RME_{ESL}- The hazard quotient based on the NOAEL equivalent TRV used to calculate the ESL.
CTE_{TRV} or RME_{TRV}- The hazard quotient based on the TRV is calculated only if the hazard quotient based on the ESL is greater than 1.
TRV - toxicity reference value
HI - Hazard Index
VOC - volatile organic compund
SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyls
PCDD/PCDF - polychlorinated dibenzo-p-dioxins and dibenzofurans
mg/kg-day - milligram per kilogram per day
"-" not applicable

= HIs for PCB congeners. Not included in Total estimates.

Table C3-23b (1 of 3)

Risk Estimates for the Mule Deer - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

	Applied Daily Dose		Hazard Quotient			
	CTE (mg/kg-day)	RME (mg/kg-day)	CTE_{ESL} (unitless)	RME_{ESL} (unitless)	CTE_{TRV} (unitless)	RME_{TRV} (unitless)
Ingestion Exposure Route						
Inorganic Compounds						
Aluminum	-	-	-	-	-	-
Antimony	-	-	-	-	-	-
Arsenic	-	-	-	-	-	-
Beryllium	-	-	-	-	-	-
Cadmium	1.0E-01	1.8E-01	**9.2E+01**	**1.6E+02**	**2.2E+00**	**3.8E+00**
Chromium	-	-	-	-	-	-
Copper	7.5E-01	1.5E+00	4.4E-01	8.7E-01	-	-
Lead	8.0E-01	1.1E+00	**1.1E+00**	**1.5E+00**	**1.1E+00**	**1.5E+00**
Mercury	7.2E-02	1.8E-01	7.1E-02	1.8E-01	-	-
Methyl Mercury	7.1E-05	1.5E-04	1.9E-03	4.0E-03	-	-
Nickel	-	-	-	-	-	-
Selenium	-	-	-	-	-	-
Silver	6.9E-02	1.9E-01	2.8E-01	7.7E-01	-	-
Thallium	7.0E-03	7.0E-03	3.6E-02	3.6E-02	-	-
Vanadium	-	-	-	-	-	-
Zinc	5.5E+00	1.2E+01	**1.7E+00**	**3.9E+00**	1.0E-01	2.3E-01
VOCs						
1,1,1-Trichloroethane	-	-	-	-	-	-
1,1,2-Trichloro-1,2,2-trifluoroethane	4.9E-04	4.9E-04	1.6E-05	1.6E-05	-	-
1,1-Dichloroethane	-	-	-	-	-	-
2-Butanone	8.7E-04	1.4E-03	6.5E-07	1.1E-06	-	-
Acetone	4.5E-02	2.1E-01	2.4E-03	1.2E-02	-	-
Bromomethane	-	-	-	-	-	-
Ethylbenzene	-	-	-	-	-	-
m,p-Xylene	-	-	-	-	-	-
Methylene chloride	4.2E-04	5.3E-04	1.7E-04	2.2E-04	-	-
Tetrachloroethene	-	-	-	-	-	-
Toluene	-	-	-	-	-	-
trans-1,3-Dichloropropene	-	-	-	-	-	-
Trichloroethene	-	-	-	-	-	-
Xylenes (total)	-	-	-	-	-	-
SVOCs						
Acenaphthene	1.1E-03	4.5E-03	1.9E-05	8.0E-05	-	-
Acenaphthylene	1.9E-04	6.4E-04	1.7E-06	5.6E-06	-	-
Anthracene	7.2E-04	3.0E-03	2.2E-06	9.1E-06	-	-
Benzo(a)anthracene	6.0E-04	1.8E-03	7.0E-04	2.2E-03	-	-
Benzo(a)pyrene	1.2E-04	3.6E-04	1.4E-04	4.3E-04	-	-
Benzo(b)fluoranthene	1.8E-04	4.5E-04	2.1E-04	5.3E-04	-	-
Benzo(e)pyrene	8.1E-04	2.7E-03	-	-	-	-
Benzo(g,h,i)perylene	4.9E-04	1.8E-03	5.7E-04	2.1E-03	-	-
Benzo(k)fluoranthene	1.1E-04	3.4E-04	1.3E-04	4.0E-04	-	-
bis(2-Ethylhexyl)phthalate	-	-	-	-	-	-
Butyl benzyl phthalate	-	-	-	-	-	-
Chrysene	5.7E-04	1.4E-03	6.7E-04	1.6E-03	-	-
Dibenz(a,h)anthracene	7.6E-05	2.8E-04	9.0E-05	3.3E-04	-	-
Dibenzofuran	-	-	-	-	-	-
Diethylphthalate	-	-	-	-	-	-
Di-n-butylphthalate	-	-	-	-	-	-
Di-n-octyl phthalate	-	-	-	-	-	-
Fluoranthene	6.5E-04	1.4E-03	1.6E-05	3.4E-05	-	-
Fluorene	1.1E-03	4.5E-03	2.6E-05	1.1E-04	-	-
Hexachlorobutadiene	-	-	-	-	-	-

Table C3-23b (2 of 3)

Risk Estimates for the Mule Deer - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

	Applied Daily Dose		Hazard Quotient			
	CTE (mg/kg-day)	RME (mg/kg-day)	CTE_{ESL} (unitless)	RME_{ESL} (unitless)	CTE_{TRV} (unitless)	RME_{TRV} (unitless)
Hexachlorocyclopentadiene	-	-	-	-	-	-
Indeno(1,2,3-cd)pyrene	1.1E-04	3.5E-04	1.3E-04	4.1E-04	-	-
Naphthalene	-	-	-	-	-	-
Pentachlorophenol	-	-	-	-	-	-
Perylene	4.6E-04	1.6E-03	-	-	-	-
Phenanthrene	2.0E-02	8.6E-02	4.2E-04	1.8E-03	-	-
Pyrene	6.3E-04	2.2E-03	2.6E-05	8.9E-05	-	-
Pesticides						
4,4'-DDT	-	-	-	-	-	-
Chlordane	-	-	-	-	-	-
Dieldrin	-	-	-	-	-	-
Endosulfan I	-	-	-	-	-	-
Endosulfan II	-	-	-	-	-	-
Endrin	-	-	-	-	-	-
Heptachlor	-	-	-	-	-	-
Heptachlor epoxide	-	-	-	-	-	-
Toxaphene	-	-	-	-	-	-
Total Petroleum Hydrocarbons						
C11-C14(Kerosene Range)	4.1E-01	1.6E+00	-	-	-	-
C14-C20(Diesel Range)	-	-	-	-	-	-
C20-C30(Lubricant Oil Range)	3.2E+00	1.9E+01	-	-	-	-
Dioxins						
2,3,7,8-TCDD	7.6E-09	1.6E-08	6.7E-02	1.4E-01	-	-
1,2,3,7,8-PeCDD	3.0E-08	6.1E-08	2.7E-01	5.4E-01	-	-
1,2,3,4,7,8-HxCDD	8.7E-08	1.7E-07	7.8E-02	1.5E-01	-	-
1,2,3,6,7,8-HxCDD	8.1E-08	1.5E-07	7.2E-02	1.3E-01	-	-
1,2,3,7,8,9-HxCDD	1.9E-07	4.1E-07	1.6E-01	3.6E-01	-	-
1,2,3,4,6,7,8-HpCDD	4.3E-06	6.9E-06	3.8E-01	6.1E-01	-	-
OCDD	5.0E-05	7.4E-05	4.5E-02	6.6E-02	-	-
2,3,7,8-TCDF	1.9E-08	3.2E-08	1.7E-02	2.9E-02	-	-
1,2,3,7,8-PeCDF	7.2E-09	1.6E-08	3.2E-03	7.0E-03	-	-
2,3,4,7,8-PeCDF	2.2E-08	4.0E-08	9.8E-02	1.8E-01	-	-
1,2,3,4,7,8-HxCDF	4.7E-08	7.4E-08	4.2E-02	6.6E-02	-	-
1,2,3,6,7,8-HxCDF	3.9E-08	7.5E-08	3.4E-02	6.6E-02	-	-
1,2,3,4,6,7,8-HpCDF	3.6E-07	4.9E-07	3.2E-02	4.4E-02	-	-
1,2,3,4,7,8,9-HpCDF	1.3E-07	1.7E-07	1.1E-02	1.5E-02	-	-
OCDF	1.4E-06	2.1E-06	1.3E-03	1.9E-03	-	-
PCBs						
Aroclor-1016	-	-	-	-	-	-
Aroclor-1221	-	-	-	-	-	-
Aroclor-1232	-	-	-	-	-	-
Aroclor-1242	-	-	-	-	-	-
Aroclor-1248	-	-	-	-	-	-
Aroclor-1254	7.0E-03	1.8E-02	1.7E-01	4.2E-01	-	-
Aroclor-1260	6.0E-02	3.2E-01	**1.4E+00**	**7.5E+00**	2.3E-01	**1.2E+00**
PCB-105	1.7E-05	8.5E-05	2.2E-03	1.1E-02	-	-
PCB-114	3.5E-07	1.7E-06	2.3E-04	1.1E-03	-	-
PCB-118	3.2E-05	1.6E-04	4.3E-03	2.2E-02	-	-
PCB-123	4.9E-07	2.5E-06	6.4E-05	3.3E-04	-	-
PCB-126	8.7E-07	4.5E-06	1.1E-01	5.9E-01	-	-
PCB-156	8.3E-06	4.3E-05	5.5E-03	2.8E-02	-	-
PCB-157	3.9E-06	2.0E-05	2.6E-03	1.3E-02	-	-

Table C3-23b (3 of 3)

Risk Estimates for the Mule Deer - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

	Applied Daily Dose		Hazard Quotient			
	CTE (mg/kg-day)	RME (mg/kg-day)	CTE_{ESL} (unitless)	RME_{ESL} (unitless)	CTE_{TRV} (unitless)	RME_{TRV} (unitless)
PCB-167	7.1E-06	3.7E-05	9.4E-05	4.9E-04	-	-
PCB-169	3.9E-08	2.0E-07	5.1E-04	2.7E-03	-	-
PCB-189	8.2E-07	4.3E-06	1.1E-04	5.8E-04	-	-
PCB-77	1.9E-06	9.7E-06	2.5E-04	1.3E-03	-	-
PCB-81	4.1E-07	2.1E-06	5.5E-05	2.8E-04	-	-
Total Ingestion HI:					**3.6E+00**	**6.8E+00**
Total Ingestion HI Accounting for Home Range Factor[a]:					1.7E-01	3.3E-01

Notes:

a. Home range factor based on minimum home range of 0.3 square miles (192 acres), as described in the SRAM, in the SRAM, and SRE RFI site area of 9.2 acres.

Home range factor = 0.0479

CTE - central tendancy exposure
RME - reasonable maximum exposure
NOAEL - no observable adverse effect level
CTE_{ESL} or RME_{ESL}- The hazard quotient based on the NOAEL equivalent TRV used to calculate the ESL.
CTE_{TRV} or RME_{TRV}- The hazard quotient based on the TRV is calculated only if the hazard quotient based on the ESL is greater than 1.
TRV - toxicity reference value
HI - Hazard Index
VOC - volatile organic compund
SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyls
PCDD/PCDF - polychlorinated dibenzo-p-dioxins and dibenzofurans
mg/kg-day - milligram per kilogram per day
"-" not applicable

Table C3-24 (1 of 4)

Risk Estimates for the Great Blue Heron
Sodium Reactor Experiment (SRE) Area

	Applied Daily Dose for Surface Water Ingestion		Applied Daily Dose for Sediment/Prey Ingestion		Hazard Quotient for Surface Water Ingestion				Hazard Quotient for Sediment/Prey Ingestion			
	CTE (mg/kg-day)	RME (mg/kg-day)	CTE (mg/kg-day)	RME (mg/kg-day)	CTE_{ESL} (unitless)	RME_{ESL} (unitless)	CTE_{TRV} (unitless)	RME_{TRV} (unitless)	CTE_{ESL} (unitless)	RME_{ESL} (unitless)	CTE_{TRV} (unitless)	RME_{TRV} (unitless)
Ingestion Exposure Route												
Inorganic Compounds												
Aluminum	4.6E+01	7.7E+01	-	-	4.2E-01	7.0E-01	-	-	-	-	-	-
Antimony	4.0E-02	6.9E-02	-	-	-	-	-	-	-	-	-	-
Arsenic	3.0E-01	5.0E-01	-	-	5.9E-02	9.6E-02	-	-	-	-	-	-
Beryllium	4.5E-02	4.5E-02	-	-	-	-	-	-	-	-	-	-
Cadmium	6.8E-03	1.3E-02	5.0E-02	2.5E-01	8.6E-02	1.6E-01	-	-	6.3E-01	**3.2E+00**	6.3E-01	**3.2E+00**
Chromium	1.0E-01	1.5E-01	-	-	-	-	-	-	-	-	-	-
Copper	2.0E-01	2.6E-01	1.1E+00	2.0E+00	8.5E-02	1.1E-01	-	-	4.8E-01	8.7E-01	-	-
Lead	3.6E-02	4.7E-02	1.5E+00	2.9E+00	**2.6E+00**	**3.4E+00**	**2.6E+00**	**3.4E+00**	**1.1E+02**	**2.1E+02**	1.1E+02	**2.1E+02**
Mercury	5.3E-03	6.1E-03	5.3E-02	1.0E-01	1.2E-02	1.4E-02	-	-	1.2E-01	2.3E-01	-	-
Methyl Mercury	-	-	-	-	-	-	-	-	-	-	-	-
Nickel	2.0E-01	1.8E-01	-	-	1.5E-01	1.3E-01	-	-	-	-	-	-
Selenium	1.7E-01	1.7E-01	-	-	7.3E-01	7.3E-01	-	-	-	-	-	-
Silver	2.3E-01	2.3E-01	2.2E-02	4.1E-02	-	-	-	-	-	-	-	-
Thallium	9.5E-03	9.5E-03	1.6E-02	2.8E-02	-	-	-	-	-	-	-	-
Vanadium	1.8E-01	2.6E-01	-	-	1.6E-02	2.3E-02	-	-	-	-	-	-
Zinc	-	-	9.9E+00	2.2E+01	-	-	-	-	6.8E-01	**1.5E+00**	6.8E-01	**1.5E+00**
VOCs												
1,1,1-Trichloroethane	3.4E-02	3.4E-02	-	-	-	-	-	-	-	-	-	-
1,1,2-Trichloro-1,2,2-trifluoroethane	-	-	7.7E-04	7.7E-04	-	-	-	-	-	-	-	-
1,1-Dichloroethane	-	-	-	-	-	-	-	-	-	-	-	-
2-Butanone	-	-	-	-	-	-	-	-	-	-	-	-
Acetone	-	-	-	-	-	-	-	-	-	-	-	-
Bromomethane	-	-	-	-	-	-	-	-	-	-	-	-
Ethylbenzene	-	-	-	-	-	-	-	-	-	-	-	-
m,p-Xylene	-	-	-	-	-	-	-	-	-	-	-	-
Methylene chloride	-	-	-	-	-	-	-	-	-	-	-	-
Tetrachloroethene	-	-	1.7E-03	3.8E-03	-	-	-	-	-	-	-	-
Toluene	-	-	4.7E-03	2.3E-02	-	-	-	-	-	-	-	-
trans-1,3-Dichloropropene	-	-	-	-	-	-	-	-	-	-	-	-
Trichloroethene	3.0E-02	3.0E-02	3.0E-03	1.2E-02	-	-	-	-	-	-	-	-
Xylenes (total)	-	-	1.7E-03	2.4E-03	-	-	-	-	-	-	-	-

Table C3-24 (2 of 4)

Risk Estimates for the Great Blue Heron
Sodium Reactor Experiment (SRE) Area

	Applied Daily Dose for Surface Water Ingestion		Applied Daily Dose for Sediment/Prey Ingestion		Hazard Quotient for Surface Water Ingestion				Hazard Quotient for Sediment/Prey Ingestion			
	CTE (mg/kg-day)	RME (mg/kg-day)	CTE (mg/kg-day)	RME (mg/kg-day)	CTE_{ESL} (unitless)	RME_{ESL} (unitless)	CTE_{TRV} (unitless)	RME_{TRV} (unitless)	CTE_{ESL} (unitless)	RME_{ESL} (unitless)	CTE_{TRV} (unitless)	RME_{TRV} (unitless)
SVOCs												
Acenaphthene	-	-	1.2E-03	3.5E-03	-	-	-	-	1.2E-03	3.5E-03	-	-
Acenaphthylene	-	-	1.4E-04	2.5E-04	-	-	-	-	-	-	-	-
Anthracene	-	-	2.6E-03	1.2E-02	-	-	-	-	2.4E-03	1.1E-02	-	-
Benzo(a)anthracene	-	-	1.7E-01	2.2E+00	-	-	-	-	-	-	-	-
Benzo(a)pyrene	-	-	6.9E-02	8.6E-01	-	-	-	-	-	-	-	-
Benzo(b)fluoranthene	-	-	5.7E-02	6.7E-01	-	-	-	-	-	-	-	-
Benzo(e)pyrene	-	-	4.2E-04	8.4E-04	-	-	-	-	-	-	-	-
Benzo(g,h,i)perylene	-	-	1.9E-02	1.4E-01	-	-	-	-	-	-	-	-
Benzo(k)fluoranthene	-	-	8.4E-02	1.1E+00	-	-	-	-	-	-	-	-
bis(2-Ethylhexyl)phthalate	1.1E+00	1.1E+00	-	-	9.9E-01	9.9E-01	-	-	-	-	-	-
Butyl benzyl phthalate	4.4E-01	4.4E-01	-	-	-	-	-	-	-	-	-	-
Chrysene	-	-	5.3E-02	5.3E-01	-	-	-	-	-	-	-	-
Dibenz(a,h)anthracene	-	-	2.4E-02	2.3E-01	-	-	-	-	-	-	-	-
Dibenzofuran	-	-	-	-	-	-	-	-	-	-	-	-
Diethylphthalate	2.2E-01	2.2E-01	-	-	-	-	-	-	-	-	-	-
Di-n-butylphthalate	4.4E-01	4.4E-01	-	-	**4.0E+00**	**4.0E+00**	**4.0E+00**	**4.0E+00**	-	-	-	-
Di-n-octyl phthalate	4.4E-01	4.4E-01	-	-	-	-	-	-	-	-	-	-
Fluoranthene	-	-	4.4E-02	5.7E-01	-	-	-	-	-	-	-	-
Fluorene	-	-	1.4E-03	3.7E-03	-	-	-	-	1.4E-03	3.7E-03	-	-
Hexachlorobutadiene	2.2E-01	2.2E-01	-	-	6.9E-02	6.9E-02	-	-	-	-	-	-
Hexachlorocyclopentadiene	4.4E-01	4.4E-01	-	-	-	-	-	-	-	-	-	-
Indeno(1,2,3-cd)pyrene	-	-	3.7E-02	4.5E-01	-	-	-	-	-	-	-	-
Naphthalene	-	-	-	-	-	-	-	-	-	-	-	-
Pentachlorophenol	4.4E-01	4.4E-01	-	-	5.0E-02	5.0E-02	-	-	-	-	-	-
Perylene	-	-	2.4E-04	4.8E-04	-	-	-	-	-	-	-	-
Phenanthrene	-	-	3.1E-02	2.5E-01	-	-	-	-	2.8E-02	2.2E-01	-	-
Pyrene	-	-	6.1E-02	5.1E-01	-	-	-	-	-	-	-	-
Pesticides												
4,4'-DDT	2.3E-03	2.3E-03	-	-	8.0E-01	8.0E-01	-	-	-	-	-	-
Chlordane	2.2E-02	2.2E-02	-	-	9.4E-02	9.4E-02	-	-	-	-	-	-
Dieldrin	2.3E-03	2.3E-03	-	-	2.9E-02	2.9E-02	-	-	-	-	-	-
Endosulfan I	2.3E-03	2.3E-03	-	-	-	-	-	-	-	-	-	-
Endosulfan II	2.3E-03	2.3E-03	-	-	-	-	-	-	-	-	-	-

Table C3-24 (3 of 4)

Risk Estimates for the Great Blue Heron
Sodium Reactor Experiment (SRE) Area

	Applied Daily Dose for Surface Water Ingestion		Applied Daily Dose for Sediment/Prey Ingestion		Hazard Quotient for Surface Water Ingestion				Hazard Quotient for Sediment/Prey Ingestion			
	CTE (mg/kg-day)	RME (mg/kg-day)	CTE (mg/kg-day)	RME (mg/kg-day)	CTE_{ESL} (unitless)	RME_{ESL} (unitless)	CTE_{TRV} (unitless)	RME_{TRV} (unitless)	CTE_{ESL} (unitless)	RME_{ESL} (unitless)	CTE_{TRV} (unitless)	RME_{TRV} (unitless)
Endrin	2.3E-03	2.3E-03	-	-	2.3E-01	2.3E-01	-	-	-	-	-	-
Heptachlor	2.3E-03	2.3E-03	-	-	1.7E-03	1.7E-03	-	-	-	-	-	-
Heptachlor epoxide	2.3E-03	2.3E-03	-	-	-	-	-	-	-	-	-	-
Toxaphene	1.1E-01	1.1E-01	-	-	-	-	-	-	-	-	-	-
Dioxins												
2,3,7,8-TCDD	-	-	6.6E-08	6.8E-08	-	-	-	-	4.6E-03	4.7E-03	-	-
1,2,3,7,8-PeCDD	7.6E-08	7.6E-08	1.6E-07	1.6E-07	5.3E-03	5.3E-03	-	-	1.1E-02	1.1E-02	-	-
1,2,3,4,7,8-HxCDD	1.1E-07	1.1E-07	2.0E-07	2.0E-07	3.9E-04	3.9E-04	-	-	7.0E-04	7.2E-04	-	-
1,2,3,6,7,8-HxCDD	1.2E-06	3.0E-06	8.7E-07	8.9E-07	8.5E-04	2.1E-03	-	-	6.1E-04	6.2E-04	-	-
1,2,3,7,8,9-HxCDD	6.3E-07	6.3E-07	1.4E-07	1.5E-07	4.4E-03	4.4E-03	-	-	9.6E-04	1.0E-03	-	-
1,2,3,4,6,7,8-HpCDD	9.9E-06	8.6E-05	8.3E-06	9.0E-06	6.9E-04	6.0E-03	-	-	5.8E-04	6.3E-04	-	-
OCDD	8.0E-05	1.2E-04	1.0E-04	1.1E-04	5.6E-04	8.3E-04	-	-	7.1E-04	7.6E-04	-	-
2,3,7,8-TCDF	1.8E-07	2.0E-07	5.5E-08	5.6E-08	1.8E-01	2.0E-01	-	-	5.5E-02	5.6E-02	-	-
1,2,3,7,8-PeCDF	3.3E-07	3.3E-07	3.1E-08	3.3E-08	2.3E-03	2.3E-03	-	-	2.2E-04	2.3E-04	-	-
2,3,4,7,8-PeCDF	8.1E-07	9.0E-07	1.3E-07	1.3E-07	5.7E-02	6.3E-02	-	-	9.2E-03	9.4E-03	-	-
1,2,3,4,7,8-HxCDF	8.4E-07	9.6E-07	4.3E-08	4.4E-08	5.9E-03	6.7E-03	-	-	3.0E-04	3.0E-04	-	-
1,2,3,6,7,8-HxCDF	5.0E-07	5.0E-07	9.6E-08	1.0E-07	3.5E-03	3.5E-03	-	-	6.7E-04	7.1E-04	-	-
1,2,3,4,6,7,8-HpCDF	1.2E-06	2.3E-06	7.0E-07	8.0E-07	8.6E-04	1.6E-03	-	-	4.9E-04	5.6E-04	-	-
1,2,3,4,7,8,9-HpCDF	6.3E-07	6.3E-07	5.1E-07	5.3E-07	4.4E-04	4.4E-04	-	-	3.5E-04	3.7E-04	-	-
OCDF	3.2E-06	6.0E-06	1.7E-06	2.4E-06	2.3E-05	4.2E-05	-	-	1.2E-05	1.7E-05	-	-
PCBs												
Aroclor-1016	2.2E-02	2.2E-02	-	-	-	-	-	-	-	-	-	-
Aroclor-1221	2.2E-02	2.2E-02	-	-	-	-	-	-	-	-	-	-
Aroclor-1232	2.2E-02	2.2E-02	-	-	-	-	-	-	-	-	-	-
Aroclor-1242	2.2E-02	2.2E-02	-	-	-	-	-	-	-	-	-	-
Aroclor-1248	2.2E-02	2.2E-02	-	-	-	-	-	-	-	-	-	-
Aroclor-1254	2.2E-02	2.2E-02	5.8E-03	1.0E-02	5.4E-02	5.4E-02	-	-	1.4E-02	2.5E-02	-	-
Aroclor-1260	2.2E-02	2.2E-02	2.0E-02	8.3E-02	2.4E-01	2.4E-01	-	-	2.2E-01	9.3E-01	-	-
PCB-105	-	-	1.3E-04	1.9E-04	-	-	-	-	8.8E-04	1.4E-03	-	-
PCB-114	-	-	4.6E-06	7.1E-06	-	-	-	-	3.2E-05	4.9E-05	-	-
PCB-118	-	-	3.1E-04	4.6E-04	-	-	-	-	2.2E-04	3.2E-04	-	-
PCB-123	-	-	4.7E-06	7.5E-06	-	-	-	-	3.3E-06	5.2E-06	-	-
PCB-126	-	-	4.1E-06	6.9E-06	-	-	-	-	2.8E-02	4.8E-02	-	-

Table C3-24 (4 of 4)

Risk Estimates for the Great Blue Heron
Sodium Reactor Experiment (SRE) Area

	Applied Daily Dose for Surface Water Ingestion		Applied Daily Dose for Sediment/Prey Ingestion		Hazard Quotient for Surface Water Ingestion				Hazard Quotient for Sediment/Prey Ingestion			
	CTE (mg/kg-day)	RME (mg/kg-day)	CTE (mg/kg-day)	RME (mg/kg-day)	CTE_{ESL} (unitless)	RME_{ESL} (unitless)	CTE_{TRV} (unitless)	RME_{TRV} (unitless)	CTE_{ESL} (unitless)	RME_{ESL} (unitless)	CTE_{TRV} (unitless)	RME_{TRV} (unitless)
PCB-156	-	-	1.1E-04	1.8E-04	-	-	-	-	7.6E-04	1.3E-03	-	-
PCB-157	-	-	4.5E-05	1.0E-04	-	-	-	-	3.1E-04	7.3E-04	-	-
PCB-167	-	-	8.6E-05	1.5E-04	-	-	-	-	6.0E-05	1.0E-04	-	-
PCB-169	-	-	1.3E-08	5.3E-08	-	-	-	-	8.8E-07	3.7E-06	-	-
PCB-189	-	-	1.1E-06	4.1E-06	-	-	-	-	7.8E-07	2.9E-06	-	-
PCB-77	-	-	1.5E-06	2.9E-06	-	-	-	-	5.4E-03	1.0E-02	-	-
PCB-81	-	-	1.6E-06	2.5E-06	-	-	-	-	1.1E-02	1.8E-02	-	-
Total Hazard Ratio:							**6.6E+00**	**7.3E+00**			**1.1E+02**	**2.1E+02**

Notes:
CTE - central tendancy exposure
RME - reasonable maximum exposure
CTE_{ESL} or RME_{ESL}- The hazard quotient based on the NOAEL equivalent TRV used to calculate the ESL.
CTE_{TRV} or RME_{TRV}- The hazard quotient based on the TRV is calculated only if the hazard quotient based on the ESL is greater than 1.
TRV - toxicity reference value
HI - Hazard Index
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyls
PCDD/PCDF - polychlorinated dibenzo-p-dioxins and dibenzofurans
mg/kg-day - milligram per kilogram per day
"-" not applicable

Table C3-25 (1 of 3)

Risk Estimates for Generic Aquatic Receptors - Surface Water
Sodium Reactor Experiment (SRE) Area

	Surface Water Concentration		Surface Water RfC	Surface Water Hazard Ratio	
	CTE (µg/L)	RME (µg/L)	(µg/L)	CTE (unitless)	RME (unitless)
Inorganic Compounds					
Aluminum	1.0E+03	1.7E+03	7.5E+02	**1.4E+00**	**2.3E+00**
Antimony	9.0E-01	1.5E+00	3.0E-01	**3.0E+00**	**5.1E+00**
Arsenic	6.8E+00	1.1E+01	3.4E+02	2.0E-02	3.2E-02
Beryllium	1.0E+00	1.0E+00	3.1E-01	**3.2E+00**	**3.2E+00**
Cadmium	1.5E-01	2.8E-01	2.0E+00	7.6E-02	1.4E-01
Chromium	2.3E+00	3.4E+00	5.7E+02	4.0E-03	6.0E-03
Copper	4.4E+00	5.7E+00	1.3E+01	3.4E-01	4.4E-01
Lead	8.1E-01	1.0E+00	6.5E+01	1.2E-02	1.6E-02
Mercury	1.2E-01	1.4E-01	1.4E+00	8.5E-02	9.7E-02
Methyl Mercury	-	-	NRC	-	-
Nickel	4.6E+00	4.1E+00	4.7E+02	9.7E-03	8.7E-03
Selenium	3.8E+00	3.8E+00	5.0E+00	7.5E-01	7.5E-01
Silver	5.0E+00	5.0E+00	3.2E+00	**1.6E+00**	**1.6E+00**
Thallium	2.1E-01	2.1E-01	4.5E+00	4.7E-02	4.7E-02
Vanadium	4.0E+00	5.7E+00	2.6E+01	1.5E-01	2.2E-01
Zinc	-	-	1.2E+02	-	-
VOCs					
1,1,1-Trichloroethane	7.6E-01	7.6E-01	2.4E+03	3.2E-04	3.2E-04
1,1,2-Trichloro-1,2,2-trifluoroethane	-	-	4.7E+01	-	-
1,1-Dichloroethane	-	-	5.6E+03	-	-
2-Butanone	-	-	1.8E+05	-	-
Acetone	-	-	1.8E+05	-	-
Bromomethane	-	-	4.4E-02	-	-
Ethylbenzene	-	-	2.3E+02	-	-
m,p-Xylene	-	-	4.7E+02	-	-
Methylene chloride	-	-	1.1E+04	-	-
Tetrachloroethene	-	-	2.0E+02	-	-
Toluene	-	-	3.1E+02	-	-
trans-1,3-Dichloropropene	-	-	7.1E+03	-	-
Trichloroethene	6.6E-01	6.6E-01	1.7E+02	3.8E-03	3.8E-03
Xylenes (total)	-	-	1.8E+02	-	-
SVOCs					
Acenaphthene	-	-	1.3E+01	-	-
Acenaphthylene	-	-	1.3E+01	-	-
Anthracene	-	-	7.1E-02	-	-
Benzo(a)anthracene	-	-	5.6E-01	-	-
Benzo(a)pyrene	-	-	2.8E-01	-	-
Benzo(b)fluoranthene	-	-	2.8E-01	-	-
Benzo(e)pyrene	-	-	2.8E-01	-	-
Benzo(g,h,i)perylene	-	-	2.8E-01	-	-
Benzo(k)fluoranthene	-	-	2.8E-01	-	-
bis(2-Ethylhexyl)phthalate	2.5E+01	2.5E+01	8.9E+00	**2.8E+00**	**2.8E+00**
Butyl benzyl phthalate	9.8E+00	9.8E+00	3.8E+01	2.6E-01	2.6E-01
Chrysene	-	-	5.6E-01	-	-
Dibenz(a,h)anthracene	-	-	2.8E-01	-	-

Table C3-25 (2 of 3)

Risk Estimates for Generic Aquatic Receptors - Surface Water
Sodium Reactor Experiment (SRE) Area

	Surface Water Concentration		Surface Water RfC	Surface Water Hazard Ratio	
	CTE (µg/L)	RME (µg/L)	(µg/L)	CTE (unitless)	RME (unitless)
Dibenzofuran	-	-	5.8E+01	-	-
Diethylphthalate	4.9E+00	4.9E+00	3.0E+00	**1.6E+00**	**1.6E+00**
Di-n-butylphthalate	9.8E+00	9.8E+00	1.9E+01	5.0E-01	5.0E-01
Di-n-octyl phthalate	9.8E+00	9.8E+00	1.9E+01	5.0E-01	5.0E-01
Fluoranthene	-	-	3.8E-01	-	-
Fluorene	-	-	3.3E+01	-	-
Hexachlorobutadiene	4.9E+00	4.9E+00	5.0E+00	9.8E-01	9.8E-01
Hexachlorocyclopentadiene	9.8E+00	9.8E+00	3.9E-01	**2.5E+01**	**2.5E+01**
Indeno(1,2,3-cd)pyrene	-	-	5.6E-01	-	-
Naphthalene	-	-	5.6E+01	-	-
Pentachlorophenol	9.8E+00	9.8E+00	1.9E+01	5.1E-01	5.1E-01
Perylene	-	-	NRC	-	-
Phenanthrene	-	-	5.6E+00	-	-
Pyrene	-	-	1.1E+02	-	-
Pesticides					
4,4'-DDT	5.0E-02	5.0E-02	1.1E+00	4.5E-02	4.5E-02
Chlordane	4.9E-01	4.9E-01	2.4E+00	2.0E-01	2.0E-01
Dieldrin	5.0E-02	5.0E-02	2.4E-01	2.1E-01	2.1E-01
Endosulfan I	5.0E-02	5.0E-02	2.2E-01	2.3E-01	2.3E-01
Endosulfan II	5.0E-02	5.0E-02	2.2E-01	2.3E-01	2.3E-01
Endrin	5.0E-02	5.0E-02	8.6E-02	5.8E-01	5.8E-01
Heptachlor	5.0E-02	5.0E-02	5.2E-01	9.6E-02	9.6E-02
Heptachlor epoxide	5.0E-02	5.0E-02	5.2E-01	9.6E-02	9.6E-02
Toxaphene	2.5E+00	2.5E+00	7.3E-01	**3.4E+00**	**3.4E+00**
Total Petroleum Hydrocarbons					
C11-C14(Kerosene Range)	-	-	NRC	-	-
C14-C20(Diesel Range)	-	-	NRC	-	-
C20-C30(Lubricant Oil Range)	-	-	NRC	-	-
Dioxins					
2,3,7,8-TCDD	-	-	3.6E-03	-	-
1,2,3,7,8-PeCDD	1.7E-06	1.7E-06	3.6E-03	4.7E-04	4.7E-04
1,2,3,4,7,8-HxCDD	2.5E-06	2.5E-06	7.2E-03	3.4E-04	3.4E-04
1,2,3,6,7,8-HxCDD	2.7E-05	6.6E-05	3.6E-01	7.5E-05	1.8E-04
1,2,3,7,8,9-HxCDD	1.4E-05	1.4E-05	3.6E-01	3.9E-05	3.9E-05
1,2,3,4,6,7,8-HpCDD	2.2E-04	1.9E-03	3.6E+01	6.1E-06	5.3E-05
OCDD	1.8E-03	2.7E-03	3.6E+01	4.9E-05	7.3E-05
2,3,7,8-TCDF	4.0E-06	4.5E-06	7.2E-02	5.5E-05	6.2E-05
1,2,3,7,8-PeCDF	7.2E-06	7.2E-06	7.2E-02	1.0E-04	1.0E-04
2,3,4,7,8-PeCDF	1.8E-05	2.0E-05	7.2E-03	2.5E-03	2.8E-03
1,2,3,4,7,8-HxCDF	1.9E-05	2.1E-05	3.6E-02	5.2E-04	5.9E-04
1,2,3,6,7,8-HxCDF	1.1E-05	1.1E-05	3.6E-02	3.0E-04	3.0E-04
1,2,3,4,6,7,8-HpCDF	2.7E-05	5.1E-05	3.6E-01	7.6E-05	1.4E-04
1,2,3,4,7,8,9-HpCDF	1.4E-05	1.4E-05	3.6E-01	3.9E-05	3.9E-05
OCDF	7.2E-05	1.3E-04	3.6E+01	2.0E-06	3.7E-06

Table C3-25 (3 of 3)

Risk Estimates for Generic Aquatic Receptors - Surface Water
Sodium Reactor Experiment (SRE) Area

	Surface Water Concentration		Surface Water RfC	Surface Water Hazard Ratio	
	CTE (µg/L)	RME (µg/L)	(µg/L)	CTE (unitless)	RME (unitless)
PCBs					
Aroclor-1016	4.9E-01	4.9E-01	NRC	-	-
Aroclor-1221	4.9E-01	4.9E-01	NRC	-	-
Aroclor-1232	4.9E-01	4.9E-01	NRC	-	-
Aroclor-1242	4.9E-01	4.9E-01	NRC	-	-
Aroclor-1248	4.9E-01	4.9E-01	1.6E+00	3.0E-01	3.0E-01
Aroclor-1254	4.9E-01	4.9E-01	1.8E-02	**2.7E+01**	**2.7E+01**
Aroclor-1260	4.9E-01	4.9E-01	1.1E+01	4.4E-02	4.4E-02
PCB-105	-	-	1.3E+04	-	-
PCB-114	-	-	1.3E+04	-	-
PCB-118	-	-	1.3E+04	-	-
PCB-123	-	-	1.3E+04	-	-
PCB-126	-	-	1.3E+01	-	-
PCB-156	-	-	1.3E+04	-	-
PCB-157	-	-	1.3E+04	-	-
PCB-167	-	-	1.3E+04	-	-
PCB-169	-	-	1.3E+03	-	-
PCB-189	-	-	1.3E+04	-	-
PCB-77	-	-	6.5E+02	-	-
PCB-81	-	-	1.3E+02	-	-
Total Hazard Ratio:				**7.6E+01**	**7.9E+01**

Notes:
CTE - central tendancy exposure
RME - reasonable maximum exposure
RfC - reference concentration
VOC - volatile organic compund
SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyls
PCDD/PCDF - polychlorinated dibenzo-p-dioxins and dibenzofurans
mg/kg-day - milligram per kilogram per day
"-" not applicable

Table C3-26 (1 of 3)

Risk Estimates for Generic Aquatic Receptors - Sediment
Sodium Reactor Experiment (SRE) Area

	Sediment Concentration		Sediment RfC	Sediment Hazard Ratio	
	CTE (mg/kg)	RME (mg/kg)	(mg/kg)	CTE (unitless)	RME (unitless)
Inorganic Compounds					
Aluminum	-	-	-	-	-
Antimony	-	-	2.0E+00	-	-
Arsenic	-	-	9.8E+00	-	-
Beryllium	-	-	-	-	-
Cadmium	8.9E-01	4.6E+00	9.9E-01	8.9E-01	**4.6E+00**
Chromium	-	-	4.3E+01	-	-
Copper	3.7E+01	6.6E+01	3.2E+01	**1.2E+00**	**2.1E+00**
Lead	2.5E+01	5.1E+01	3.6E+01	7.1E-01	**1.4E+00**
Mercury	6.0E-01	1.1E+00	1.8E-01	**3.4E+00**	**6.3E+00**
Methyl Mercury	-	-	NRC	-	-
Nickel	-	-	2.3E+01	-	-
Selenium	-	-	NRC	-	-
Silver	1.4E-01	1.4E-01	1.0E+00	1.4E-01	1.4E-01
Thallium	1.6E-01	1.6E-01	NRC	-	-
Vanadium	-	-	NRC	-	-
Zinc	2.9E+02	6.6E+02	1.2E+02	**2.4E+00**	**5.4E+00**
VOCs					
1,1,1-Trichloroethane	-	-	NRC	-	-
1,1,2-Trichloro-1,2,2-trifluoroethane	1.2E-02	1.2E-02	NRC	-	-
1,1-Dichloroethane	-	-	NRC	-	-
2-Butanone	-	-	NRC	-	-
Acetone	-	-	NRC	-	-
Bromomethane	-	-	NRC	-	-
Ethylbenzene	-	-	NRC	-	-
m,p-Xylene	-	-	NRC	-	-
Methylene chloride	-	-	NRC	-	-
Tetrachloroethene	3.1E-02	7.0E-02	NRC	-	-
Toluene	8.6E-02	4.2E-01	NRC	-	-
trans-1,3-Dichloropropene	-	-	NRC	-	-
Trichloroethene	5.6E-02	2.2E-01	NRC	-	-
Xylenes (total)	3.2E-02	4.5E-02	NRC	-	-
SVOCs					
Acenaphthene	7.4E-03	7.4E-03	NRC	-	-
Acenaphthylene	1.5E-03	1.5E-03	NRC	-	-
Anthracene	4.0E-03	4.0E-03	5.7E-02	7.0E-02	7.0E-02
Benzo(a)anthracene	8.5E-02	1.7E-01	1.1E-01	7.9E-01	**1.6E+00**
Benzo(a)pyrene	8.5E-02	1.7E-01	1.5E-01	5.7E-01	**1.1E+00**
Benzo(b)fluoranthene	1.2E-01	3.3E-01	NRC	-	-
Benzo(e)pyrene	3.4E-03	3.4E-03	1.5E-01	2.3E-02	2.3E-02
Benzo(g,h,i)perylene	8.5E-02	1.7E-01	NRC	-	-
Benzo(k)fluoranthene	2.7E-05	2.7E-05	NRC	-	-
bis(2-Ethylhexyl)phthalate	-	-	NRC	-	-
Butyl benzyl phthalate	-	-	NRC	-	-
Chrysene	1.0E-01	2.6E-01	1.7E-01	6.2E-01	**1.6E+00**
Dibenz(a,h)anthracene	2.3E-04	2.3E-04	3.3E-02	6.9E-03	6.9E-03

Table C3-26 (2 of 3)

Risk Estimates for Generic Aquatic Receptors - Sediment
Sodium Reactor Experiment (SRE) Area

	Sediment Concentration		Sediment RfC	Sediment Hazard Ratio	
	CTE (mg/kg)	RME (mg/kg)	(mg/kg)	CTE (unitless)	RME (unitless)
Dibenzofuran	-	-	NRC	-	-
Diethylphthalate	-	-	NRC	-	-
Di-n-butylphthalate	-	-	NRC	-	-
Di-n-octyl phthalate	-	-	NRC	-	-
Fluoranthene	1.4E-01	4.6E-01	4.2E-01	3.3E-01	**1.1E+00**
Fluorene	1.0E-02	1.0E-02	7.7E-02	1.3E-01	1.3E-01
Hexachlorobutadiene	-	-	NRC	-	-
Hexachlorocyclopentadiene	-	-	NRC	-	-
Indeno(1,2,3-cd)pyrene	8.1E-02	1.5E-01	2.0E-01	4.1E-01	7.7E-01
Naphthalene	-	-	1.8E-01	-	-
Pentachlorophenol	-	-	NRC	-	-
Perylene	1.9E-03	1.9E-03	NRC	-	-
Phenanthrene	9.2E-02	1.9E-01	2.0E-01	4.5E-01	9.3E-01
Pyrene	1.2E-01	3.5E-01	2.0E-01	6.2E-01	**1.8E+00**
Pesticides					
4,4'-DDT	-	-	4.2E-03	-	-
Chlordane	-	-	3.2E-03	-	-
Dieldrin	-	-	1.9E-03	-	-
Endosulfan I	-	-	NRC	-	-
Endosulfan II	-	-	NRC	-	-
Endrin	-	-	2.2E-02	-	-
Heptachlor	-	-	2.5E-03	-	-
Heptachlor epoxide	-	-	2.5E-03	-	-
Toxaphene	-	-	1.0E-03	-	-
C11-C14(Kerosene Range)	-	-	NRC	-	-
C14-C20(Diesel Range)	-	-	NRC	-	-
C20-C30(Lubricant Oil Range)	-	-	NRC	-	-
Dioxins					
2,3,7,8-TCDD	5.3E-07	5.3E-07	NRC	-	-
1,2,3,7,8-PeCDD	2.2E-06	2.2E-06	NRC	-	-
1,2,3,4,7,8-HxCDD	1.0E-05	1.0E-05	NRC	-	-
1,2,3,6,7,8-HxCDD	3.0E-05	3.0E-05	NRC	-	-
1,2,3,7,8,9-HxCDD	1.0E-05	1.0E-05	NRC	-	-
1,2,3,4,6,7,8-HpCDD	1.3E-03	1.3E-03	NRC	-	-
OCDD	1.9E-02	1.9E-02	NRC	-	-
2,3,7,8-TCDF	7.9E-07	7.9E-07	NRC	-	-
1,2,3,7,8-PeCDF	5.8E-07	5.8E-07	NRC	-	-
2,3,4,7,8-PeCDF	1.6E-06	1.6E-06	NRC	-	-
1,2,3,4,7,8-HxCDF	3.7E-06	3.7E-06	NRC	-	-
1,2,3,6,7,8-HxCDF	3.4E-06	3.4E-06	NRC	-	-
1,2,3,4,6,7,8-HpCDF	1.0E-04	1.0E-04	NRC	-	-
1,2,3,4,7,8,9-HpCDF	1.0E-05	1.0E-05	NRC	-	-
OCDF	2.4E-04	2.4E-04	NRC	-	-

Table C3-26 (3 of 3)

Risk Estimates for Generic Aquatic Receptors - Sediment
Sodium Reactor Experiment (SRE) Area

	Sediment Concentration		Sediment RfC	Sediment Hazard Ratio	
	CTE (mg/kg)	RME (mg/kg)	(mg/kg)	CTE (unitless)	RME (unitless)
PCBs					
Aroclor-1016	-	-	1.1E+02	-	-
Aroclor-1221	-	-	1.1E+02	-	-
Aroclor-1232	-	-	1.1E+02	-	-
Aroclor-1242	-	-	1.1E+02	-	-
Aroclor-1248	-	-	1.1E+02	-	-
Aroclor-1254	7.8E-02	1.1E-01	1.1E+02	6.9E-04	9.7E-04
Aroclor-1260	1.1E-01	1.8E-01	1.1E+02	1.0E-03	1.6E-03
PCB-105	1.0E-05	1.5E-05	NRC	-	-
PCB-114	3.5E-07	5.0E-07	NRC	-	-
PCB-118	2.1E-05	2.9E-05	NRC	-	-
PCB-123	2.8E-07	4.2E-07	NRC	-	-
PCB-126	7.4E-07	1.1E-06	NRC	-	-
PCB-156	6.3E-06	9.8E-06	NRC	-	-
PCB-157	2.8E-06	4.4E-06	NRC	-	-
PCB-167	4.8E-06	7.7E-06	NRC	-	-
PCB-169	7.2E-08	1.1E-07	NRC	-	-
PCB-189	7.2E-07	1.1E-06	NRC	-	-
PCB-77	1.5E-06	2.3E-06	NRC	-	-
PCB-81	2.7E-07	4.1E-07	NRC	-	-
Total Ingestion HI:				**1.3E+01**	**2.9E+01**

Notes:
CTE - central tendancy exposure
RME - reasonable maximum exposure
NOAEL - no observable adverse effect level
TRV - toxicity reference value
HI - Hazard Index
VOC - volatile organic compund
SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyls
PCDD/PCDF - polychlorinated dibenzo-p-dioxins and dibenzofurans
mg/kg - milligram per kilogram
"-" not applicable
NRC - no reference concentration

Table C3-27a (1 of 2)

Risk Estimates for Terrestrial Invertebrates - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Chemical	Soil EPC		Hazard Quotient	
	CTE (mg/kg)	RME (mg/kg)	CTE (unitless)	RME (unitless)
Inorganic Compounds				
Cadmium	5.1E-01	1.1E+00	3.6E-03	8.1E-03
Copper	2.1E+01	4.6E+01	6.6E-01	1.4E+00
Lead	1.6E+01	3.4E+01	9.4E-03	2.0E-02
Mercury	1.9E+00	4.4E+00	1.9E+01	4.4E+01
Methyl Mercury	1.7E-03	3.6E-03	7.0E-04	1.4E-03
Silver	7.7E-01	2.9E+00	-	-
Thallium	3.3E-01	3.3E-01	-	-
Zinc	1.7E+02	4.4E+02	8.5E-01	2.2E+00
VOCs				
1,1,1-Trichloroethane	-	-	-	-
1,1,2-Trichloro-1,2,2-trifluoroethane	1.2E-02	1.2E-02	-	-
1,1-Dichloroethane	-	-	-	-
1,2-Dichloroethene (total)	2.8E-02	7.0E-02	-	-
2-Butanone	3.7E-02	3.7E-02	-	-
Acetone	6.8E-01	4.2E+00	-	-
Ethylbenzene	-	-	-	-
m,p-Xylene	-	-	-	-
Methylene chloride	1.3E-02	1.3E-02	-	-
Tetrachloroethene	2.1E-02	8.8E-02	-	-
Toluene	5.6E-02	3.4E-01	-	-
Trichloroethene	3.7E-02	2.0E-01	-	-
Xylenes (total)	2.5E-02	5.1E-02	-	-
SVOCs				
Acenaphthene	4.4E-02	1.0E-01	-	-
Acenaphthylene	3.1E-02	8.5E-02	-	-
Anthracene	3.9E-02	8.2E-02	-	-
Benzo(a)anthracene	3.6E-02	1.5E-01	-	-
Benzo(a)pyrene	3.6E-02	1.5E-01	1.4E-06	5.9E-06
Benzo(b)fluoranthene	4.9E-02	2.7E-01	-	-
Benzo(e)pyrene	1.9E-02	6.3E-02	-	-
Benzo(g,h,i)perylene	4.1E-02	9.0E-02	-	-
Benzo(k)fluoranthene	3.0E-02	8.5E-02	-	-
Chrysene	4.4E-02	2.2E-01	-	-
Dibenz(a,h)anthracene	2.9E-02	8.5E-02	-	-
Dibenzofuran	-	-	-	-
Fluoranthene	6.0E-02	3.8E-01	1.6E-03	9.9E-03
Fluorene	4.4E-02	1.0E-01	1.6E-03	3.7E-03
Indeno(1,2,3-cd)pyrene	3.4E-02	1.4E-01	-	-
Naphthalene	-	-	-	-
Perylene	1.1E-02	3.6E-02	-	-
Phenanthrene	7.9E-02	2.0E-01	2.3E-03	5.9E-03
Pyrene	5.3E-02	1.6E-01	3.0E-03	8.7E-03
Total Petroleum Hydrocarbons				
C11-C14(Kerosene Range)	9.7E+00	4.0E+01	-	-
C14-C20(Diesel Range)	-	-	-	-
C20-C30(Lubricant Oil Range)	7.3E+01	4.7E+02	-	-

Table C3-27a (2 of 2)

Risk Estimates for Terrestrial Invertebrates - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Chemical	Soil EPC		Hazard Quotient	
	CTE (mg/kg)	RME (mg/kg)	CTE (unitless)	RME (unitless)
Inorganic Compounds				
Dioxins				
2,3,7,8-TCDD	2.7E-07	5.3E-07	5.5E-10	1.1E-09
1,2,3,7,8-PeCDD	1.1E-06	2.2E-06	-	-
1,2,3,4,7,8-HxCDD	4.1E-06	9.0E-06	-	-
1,2,3,6,7,8-HxCDD	1.6E-05	3.0E-05	-	-
1,2,3,7,8,9-HxCDD	5.9E-06	1.0E-05	-	-
1,2,3,4,6,7,8-HpCDD	5.7E-04	1.2E-03	-	-
OCDD	8.4E-03	1.7E-02	-	-
2,3,7,8-TCDF	5.5E-07	7.9E-07	-	-
1,2,3,7,8-PeCDF	2.8E-07	5.7E-07	-	-
2,3,4,7,8-PeCDF	8.2E-07	1.6E-06	-	-
1,2,3,4,7,8-HxCDF	1.8E-06	3.3E-06	-	-
1,2,3,6,7,8-HxCDF	1.6E-06	3.2E-06	-	-
2,3,4,6,7,8-HxCDF	3.8E-06	8.8E-06	-	-
1,2,3,7,8,9-HxCDF	3.6E-07	9.7E-07	-	-
1,2,3,4,6,7,8-HpCDF	5.3E-05	9.6E-05	-	-
1,2,3,4,7,8,9-HpCDF	4.9E-06	9.2E-06	-	-
OCDF	1.4E-04	2.4E-04	-	-
PCBs				
Aroclor-1254	1.6E-01	4.3E-01	3.2E-03	8.6E-03
Aroclor-1260	1.3E+00	7.3E+00	-	-
PCB-105	1.1E-04	5.6E-04	-	-
PCB-114	2.2E-06	1.0E-05	-	-
PCB-118	2.3E-04	1.1E-03	-	-
PCB-123	3.2E-06	1.6E-05	-	-
PCB-126	8.8E-06	4.4E-05	-	-
PCB-156	7.5E-05	3.8E-04	-	-
PCB-157	3.3E-05	1.7E-04	-	-
PCB-167	5.7E-05	2.9E-04	-	-
PCB-169	8.6E-07	4.4E-06	-	-
PCB-189	8.6E-06	4.4E-05	-	-
PCB-77	1.8E-05	8.8E-05	-	-
PCB-81	3.1E-06	1.6E-05	-	-
Total HI:			**2.1E+01**	**4.8E+01**

Notes:
EPC - exposure point concentration (based on 0 to 2 feet bgs data) as presented in Spreadsheet D-90.
CTE - central tendancy exposure
RME - reasonable maximum exposure
CPEC - chemical of potential ecological concern
TRV - toxicity reference value
HI - Hazard Index
VOC - volatile organic compound
SVOC - semi-volatile organic compounds
PCB - polychlorinated biphenyls
PCDD/PCDF - polychlorinated dibenzo-p-dioxins and dibenzofurans
"-" not applicable
mg/kg - milligram per kilogram
= HIs for PCB congeners. Not included in Total estimates.

Table C3-27b (1 of 3)

Risk Estimates for Terrestrial Invertebrates - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Chemical	Soil EPC		Hazard Quotient	
	CTE (mg/kg)	RME (mg/kg)	CTE (unitless)	RME (unitless)
Inorganic Compounds				
Aluminum	-	-	-	-
Antimony	-	-	-	-
Arsenic	-	-	-	-
Beryllium	-	-	-	-
Cadmium	2.4E-01	4.2E-01	1.7E-03	3.0E-03
Chromium	-	-	-	-
Copper	9.9E+00	2.0E+01	3.1E-01	6.2E-01
Lead	9.3E+00	1.3E+01	5.5E-03	7.5E-03
Mercury	2.1E+00	5.5E+00	2.1E+01	5.5E+01
Methyl Mercury	1.7E-03	3.6E-03	7.0E-04	1.4E-03
Nickel	-	-	-	-
Selenium	-	-	-	-
Silver	1.0E+00	2.7E+00	-	-
Thallium	3.3E-01	3.3E-01	-	-
Vanadium	-	-	-	-
Zinc	8.4E+01	1.9E+02	4.2E-01	9.5E-01
VOCs				
1,1,1-Trichloroethane	-	-	-	-
1,1,2-Trichloro-1,2,2-trifluoroethane	1.2E-02	1.2E-02	-	-
1,1-Dichloroethane	-	-	-	-
1,2-Dichloroethene (total)	-	-	-	-
2-Butanone	2.1E-02	3.5E-02	-	-
Acetone	1.1E+00	5.2E+00	-	-
Bromomethane	-	-	-	-
Ethylbenzene	-	-	-	-
m,p-Xylene	-	-	-	-
Methylene chloride	1.0E-02	1.3E-02	-	-
Tetrachloroethene	-	-	-	-
Toluene	-	-	-	-
trans-1,3-Dichloropropene	-	-	-	-
Trichloroethene	-	-	-	-
Xylenes (total)	-	-	-	-
SVOCs				
Acenaphthene	2.6E-02	1.1E-01	-	-
Acenaphthylene	4.6E-03	1.6E-02	-	-
Anthracene	1.8E-02	7.3E-02	-	-
Benzo(a)anthracene	2.8E-03	8.8E-03	-	-
Benzo(a)pyrene	3.0E-03	8.9E-03	1.2E-07	3.6E-07
Benzo(b)fluoranthene	4.3E-03	1.1E-02	-	-
Benzo(e)pyrene	2.0E-02	6.7E-02	-	-
Benzo(g,h,i)perylene	1.2E-02	4.4E-02	-	-
Benzo(k)fluoranthene	2.8E-03	8.3E-03	-	-
bis(2-Ethylhexyl)phthalate	-	-	-	-
Butyl benzyl phthalate	-	-	-	-
Chrysene	5.1E-03	1.2E-02	-	-
Dibenz(a,h)anthracene	1.9E-03	6.9E-03	-	-
Dibenzofuran	-	-	-	-
Diethylphthalate	-	-	-	-
Di-n-butylphthalate	-	-	-	-
Di-n-octyl phthalate	-	-	-	-
Fluoranthene	5.6E-03	1.2E-02	1.5E-04	3.2E-04
Fluorene	2.6E-02	1.1E-01	9.6E-04	4.1E-03
Hexachlorobutadiene	-	-	-	-
Hexachlorocyclopentadiene	-	-	-	-

Table C3-27b (2 of 3)

Risk Estimates for Terrestrial Invertebrates - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Chemical	Soil EPC		Hazard Quotient	
	CTE (mg/kg)	RME (mg/kg)	CTE (unitless)	RME (unitless)
Inorganic Compounds				
Indeno(1,2,3-cd)pyrene	2.7E-03	8.5E-03	-	-
Naphthalene	-	-	-	-
Pentachlorophenol	-	-	-	-
Perylene	1.1E-02	3.8E-02	-	-
Phenanthrene	7.1E-02	3.0E-01	2.1E-03	8.7E-03
Pyrene	8.2E-03	2.8E-02	4.6E-04	1.6E-03
Pesticides				
4,4'-DDT	-	-	-	-
Chlordane	-	-	-	-
Dieldrin	-	-	-	-
Endosulfan I	-	-	-	-
Endosulfan II	-	-	-	-
Endrin	-	-	-	-
Heptachlor	-	-	-	-
Heptachlor epoxide	-	-	-	-
Toxaphene	-	-	-	-
Total Petroleum Hydrocarbons				
C11-C14(Kerosene Range)	1.0E+01	4.0E+01	-	-
C14-C20(Diesel Range)	-	-	-	-
C20-C30(Lubricant Oil Range)	7.8E+01	4.7E+02	-	-
Dioxins				
2,3,7,8-TCDD	1.9E-07	4.0E-07	3.7E-10	8.0E-10
1,2,3,7,8-PeCDD	7.3E-07	1.5E-06	-	-
1,2,3,4,7,8-HxCDD	2.1E-06	4.2E-06	-	-
1,2,3,6,7,8-HxCDD	1.1E-05	2.0E-05	-	-
1,2,3,7,8,9-HxCDD	4.5E-06	1.0E-05	-	-
1,2,3,4,6,7,8-HpCDD	3.1E-04	5.0E-04	-	-
OCDD	5.0E-03	7.3E-03	-	-
2,3,7,8-TCDF	4.7E-07	7.9E-07	-	-
1,2,3,7,8-PeCDF	1.8E-07	3.9E-07	-	-
2,3,4,7,8-PeCDF	5.4E-07	9.9E-07	-	-
1,2,3,4,7,8-HxCDF	1.2E-06	1.8E-06	-	-
1,2,3,6,7,8-HxCDF	9.5E-07	1.8E-06	-	-
1,2,3,4,6,7,8-HpCDF	3.7E-05	5.0E-05	-	-
1,2,3,4,7,8,9-HpCDF	3.2E-06	4.2E-06	-	-
OCDF	1.0E-04	1.5E-04	-	-
PCBs				
Aroclor-1016	-	-	-	-
Aroclor-1221	-	-	-	-
Aroclor-1232	-	-	-	-
Aroclor-1242	-	-	-	-
Aroclor-1248	-	-	-	-
Aroclor-1254	1.7E-01	4.3E-01	3.4E-03	8.6E-03
Aroclor-1260	1.5E+00	7.8E+00	-	-
PCB-105	1.3E-04	6.4E-04	-	-
PCB-114	2.4E-06	1.1E-05	-	-
PCB-118	2.5E-04	1.3E-03	-	-
PCB-123	3.5E-06	1.8E-05	-	-
PCB-126	9.6E-06	5.0E-05	-	-
PCB-156	8.3E-05	4.3E-04	-	-
PCB-157	3.6E-05	1.9E-04	-	-
PCB-167	6.3E-05	3.3E-04	-	-

Table C3-27b (3 of 3)

Risk Estimates for Terrestrial Invertebrates - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Chemical	Soil EPC		Hazard Quotient	
	CTE (mg/kg)	RME (mg/kg)	CTE (unitless)	RME (unitless)
Inorganic Compounds				
PCB-169	9.4E-07	5.0E-06	-	-
PCB-189	9.4E-06	5.0E-05	-	-
PCB-77	1.9E-05	9.9E-05	-	-
PCB-81	3.4E-06	1.8E-05	-	-
Total HI:			**2.2E+01**	**5.6E+01**

Notes:
EPC - exposure point concentration (based on 0 to 2 feet bgs data) as presented in Spreadsheet D-90.
CTE - central tendancy exposure
RME - reasonable maximum exposure
NC - not selected as a CPEC in the indicated media, per the SRAM (MWH 2005).
CPEC - chemical of potential ecological concern
TRV - toxicity reference value
HI - Hazard Index
VOC - volatile organic compound
SVOC - semi-volatile organic compounds
PCB - polychlorinated biphenyls
PCDD/PCDF - polychlorinated dibenzo-p-dioxins and dibenzofurans
mg/kg - milligram per kilogram
= HIs for PCB congeners. Not included in Total estimates.

Ecological Risk Assessment Uncertainty Analysis
Sodium Reactor Experiment (SRE) Area

Assessment Element	Uncertainty	Magnitude of Impact	Direction of Impact
Exposure Pathways	The SRE Area contains an intermittent pond. Based on the potential for both dry (e.g. soil ingestion) and wet (e.g. surface water) exposures in the same area; both scenarios were evaluated separately.	Low	Conservative
EPC Calculations	The extrapolation of soil TPH concentrations to individual petroleum constituent (i.e., PAHs) concentrations introduces some uncertainty into the EPC estimates for petroleum constituents. Because several samples collected for SVOCs did not detect PAHs, the uncertainty associated with this procedure is low.	Low	Conservative
	A number of inorganics (e.g., cadmium, copper) that were demonstrated to be consistent with background concentrations through Wilcoxon Rank Sum test were included as CPECs because the maximum detected concentrations were substantially above the maximum detected background concentration, were located in suspected areas of metals impacts and in some cases SQLs were above ESLs.	Moderate	Conservative
	Significant risks from soil matrix COPCs are associated vapor concentrations estimated to be 1/2 the soil vapor DL though the chemical was not detected in soil vapor.	Low	Conservative
	Although a chemical may not have been detected in soil, if it was detected in soil vapor is was assumed to be a soil matrix COPC.	Moderate	Conservative
	Estimation of soil vapor concentrations overstates actual burrow concentrations: 1. Model is conservative 2. Air flow in burrows is not accounted for	Moderate	Conservative
Toxicity Reference Value	High degree of uncertainty in extrapolation of dose-response data from laboratory animals to representative receptors.	High	Conservative
	Avian toxicity values are only available for a limited number of chemicals. For the types of chemicals observed at the SRE RFI site, there is likely little difference in the degree of toxicity between mammals and avian species.	Low	Not conservative
	Use of short-term (acute) toxicity data to estimate chronic toxicity values are highly uncertain.	High	Conservative

Notes:
UCL - upper confidence limit

GROUP 6 – NORTHEASTERN PORTION OF AREA IV
RCRA FACILITY INVESTIGATION RISK ASSESSMENT REPORT
SANTA SUSANA FIELD LABORATORY
VENTURA COUNTY, CALIFORNIA

VOLUME IV – APPENDICES B THROUGH D

APPENDIX C, ATTACHMENT C4

B064 DOE LEACH FIELD (AREA IV AOC)

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* A standard list of risk tables, figures, and attachments is used for all the RFI site reports for ease of comparison. If a table, figure, or attachment is not included in this site report it was not necessary for the risk assessments.

LIST OF ACRONYMNS AND ABBREVIATIONS

ADD	average daily dosage or applied daily dosage
AOC	Area of Concern
bgs	below ground surface
B064 LF	Building 64 Leach Fields
BAF	bioaccumulation factor
COPC	chemical of potential concern
CPEC	chemical of potential ecological concern
CSF	cancer slope factor
CSM	conceptual site model
CTE	central tendency exposure
DCA	dichloroethane
DCE	dichloroethene
DTSC	Department of Toxic Substance Control
EPC	exposure point concentration
EPV	exposure point values
ERA	ecological risk assessment
ESL	ecological screening level
HI	hazard index
HQ	hazard quotient
HRA	human health risk assessment
HSDB	Hazardous Substances Data Bank
gpm	gallons per minute
IRIS	Integrated Risk Information System
LADD	lifetime average daily dosage
LOAEL	lowest observable adverse effect level
mg/kg	milligrams per kilogram
mg/kg-day	milligrams per kilogram per day
mg/L	milligrams per liter
NOAEL	no observable adverse effect level
p	probability
PCE	tetrachloroethene
PEF	particulate emission factor
RCRA	Resource Conservation and Recovery Act
RfD	reference dose
RFI	RCRA facility investigation
RME	reasonable maximum exposure
SQL	sample quantitation limit
SRAM	Standardized Risk Assessment Methodology
SSFL	Santa Susana Field Laboratory
SVOC	semivolatile organic compound
SWRCB	State Water Resources Control Board
TCA	trichloroethane

LIST OF ACRONYMNS AND ABBREVIATIONS (Continued)

TCE	trichloroethene
TDS	total dissolved solids
TPH	total petroleum hydrocarbons
TRV	toxicity reference value
USEPA	United States Environmental Protection Agency
VOC	volatile organic compound
µg/L	micrograms per liter

C1.0 INTRODUCTION

This attachment to Appendix C of the Group 6 Resource Conservation Recovery Act (RCRA) Facility Investigation (RFI) Report presents the human health risk assessment (HRA) and ecological risk assessment (ERA) for the Building 64 Leach Field (B064 LF) RFI Site (Area IV Area of Concern [AOC]) at the Santa Susana Field Laboratory (SSFL). The RCRA Corrective Action Program at the SSFL is being conducted under the oversight of the California Environmental Protection Agency, Department of Toxic Substances Control (DTSC).

The risk assessments were performed following the methods described in the Standardized Risk Assessment Methodology, Revision 2 (SRAM) for the Santa Susana Field Laboratory (SSFL) (MWH 2005); any additional procedures or differences from the SRAM are described in this Appendix C text. Supporting background information and data for the risk assessment were presented in Sections 1 through 3 of Appendix A4. Laboratory data are presented in Attachment 3 of Appendix A4. The following sections describe the HRA and ERA performed for the B064 LF RFI site at the SSFL. Key findings of the HRA and ERA are presented in Appendix A4, Section 4.

This report contains the following sections:

Section 1	Introduction
Section 2	Data Usability Assessment
Section 3	Human Health Risk Assessment
Section 4	Ecological Risk Assessment
Section 5	References

Risk assessment Tables C4-1 through C4-13 are provided both in electronic and printed format. The printed tables follow the text of this appendix. The electronic copies of the tables, and associated calculation spreadsheets (S-C4-1 through S-C4-89) used to generate these tables, are included as electronic copies in Appendix C, Attachment C8.

Please note that a standard list of risk assessment tables, figures, spreadsheets[i], and attachments is used for all SSFL RFI site risk assessment reports for terrestrial sites. Not all tables, figures, spreadsheets, or attachments are applicable to all site risk assessments. Therefore, some items may be missing or not in consecutive order in the following text.

C2.0 DATA USABILITY ASSESSMENT FOR RISK ASSESSMENT

Chemical data collected at the B064 LF RFI site were evaluated for their usability for risk assessment. Colocated duplicates, laboratory confirmation, or agency split sample soil data were used to evaluate data quality, but are not used quantitatively in the risk assessments.

All Chatsworth formation groundwater underlying the B064 LF RFI site, and Group 6 RFI report area Chatsworth formation groundwater data were determined to be usable for risk assessment. These data are presented in Attachment 3 of Appendix A4 and Appendix B for soil and groundwater, respectively. Soil data for various chemical groups are presented in Figures A4.3-1 through A4.3-4. Section C-4.3 of Appendix C presents how site data were selected for assessment calculations.

Exposure to near surface groundwater is not a potentially complete exposure pathway because near surface groundwater is not present at the B064 LF RFI site. Therefore, exposures to near surface groundwater are not evaluated at the B064 LF RFI site.

Chatsworth formation groundwater monitoring wells and analytical data representative of the B064 LF RFI site as well as all of Group 6 reporting areas were selected following the methods described in the SRAM (MWH 2005). The B064 data were selected to evaluate potential indirect exposures (i.e. vapor) and the Group 6 data to evaluate potential domestic groundwater use. In summary, the most recent available 3 years of monitoring data are used for all wells determined to be representative of groundwater beneath the site. These data are further supplemented with previous years' data in cases where chemicals of potential concern (COPCs) identified in soil or soil vapor at the site were not sampled in the most recent 3 years.

[i] See FL64-RiskBook00-README.xls file for a list of tables and spreadsheets used in the risk assessment for B064 LF.

C3.0 HUMAN HEALTH RISK ASSESSMENT

The following sections describe the HRA for the B064 LF RFI site.

C3.1 SELECTION OF CHEMICALS OF POTENTIAL CONCERN

The selection of Chemicals of Potential Concern (COPCs) is the process of identifying those media-specific chemicals that may pose a risk or hazard to human receptors. COPCs selected for the HRA at the B064 LF RFI site are presented in Table C4-1.

As discussed in the Sections 1 through 3 of Appendix A4, available historical soil data samples show no detected VOCs. Documented B064 LF soil removal activities and trench inspection indicate no soil contamination.

Findings of WRS tests found that on-site boron and thallium concentrations were not consistent with background concentrations. However, a further examination of boron concentrations found that on-site concentrations ranged from 2.8 to 3.5 mg/kg and were within the range of background concentrations (<0.97 to 9.7 mg/kg). Moreover, the maximum on-site concentration of thallium (0.48 mg/kg) was just slightly greater than the maximum background concentration (0.46 mg/kg). This small difference is within analytical uncertainty, and is not considered to be biologically significant. Therefore, no COPC were selected for soils and soil vapor for the B064 LF RFI site, only COPCs associated with groundwater are assessed for the B064 LF RFI site.

The COPC selection process is summarized in Spreadsheets C4-1 through C4-4 for soil at 0 to 2 feet below ground surface (bgs), Spreadsheets C4-4 for Group 6 RFI report area and B064 LF Chatsworth formation groundwater.

C3.2 CONCEPTUAL SITE MODEL FOR HUMAN HEALTH RISK ASSESSMENT

Following COPC selection, a site-specific conceptual site model (CSM) was developed to identify potential human receptors, exposure scenarios, and possible exposure pathways. The human health CSM for the B064 LF RFI site is presented in Table C4-2.

C3.3 EXPOSURE ASSESSMENT

This section presents the risk assessment for the B064 LF RFI site. This entire site has been considered as one exposure area. Therefore, the HRA assumes that receptors are exposed to chemicals over the entire 0.26 acre site.

C3.3.1 Exposure Point Concentrations for Direct Contact Media

For COPCs in Chatsworth formation groundwater underlying the Group 6 report areas, summary statistical calculation, distribution testing and 95 percent upper confidence limit of the arithmetic mean concentration (95% UCL) calculation for the purposes of estimating EPC, were calculated utilizing the most current version of USEPA's Pro UCL software. For COPCs in Chatsworth formation groundwater underlying the B064 LF RFI site, and Group 6 RFI report area Chatsworth formation groundwater, exposure point concentrations [EPCs]) were based upon the maximum detected groundwater concentration. The maximum groundwater concentration is used in the calculation of both the central tendency exposure (CTE) and reasonable maximum exposure (RME). EPCs for Group 6 RFI report area Chatsworth formation groundwater are summarized in Spreadsheet C4-13.

C3.3.2 Exposure Point Concentrations for Indirect Contact Media

EPCs for the following indirect contact media are discussed in this section: ambient air and indoor air. Ambient air COPC concentrations were estimated for volatile COPCs by modeling migration from groundwater water to ambient air. Parameter values used for groundwater to air migration and estimation of ambient air EPCs related to soils are presented in Spreadsheets C4-22 and C4-23, respectively.

Indoor air COPC concentrations were estimated for volatile COPCs by modeling migration from Chatsworth formation groundwater underlying the B064 LF RFI site to hypothetical residential and commercial buildings. Results for B064 LF RFI Chatsworth formation groundwater COPC migration to indoor air for commercial and residential buildings are presented in Spreadsheets C4-28 and C4-29 respectively.

C3.3.3 Human Intake of COPCs

EPCs were applied to human intake equations, as presented in the SRAM, to calculate lifetime average daily dosages (LADDs) and average daily dosages (ADDs). Pathway- and chemical-specific LADDs and ADDs are presented in Spreadsheets C4-32 through C4-36 for adult workers, adult recreators, child recreators, adult residents, and child residents. Pathway-specific spreadsheets used to calculate intakes for these receptors are presented in Spreadsheets C4-41 through C4-73.

C3.4 RISK CHARACTERIZATION

Potential human health cancer and non-cancer risks were estimated by application of DTSC-approved toxicity values to the LADDs and ADDs presented in Section 3.3.3. Human health toxicity values utilized in this risk assessment are presented in Table C4-4. Risk estimates are presented in Section 3.4.1, and an evaluation of the uncertainty associated with these risk estimates is presented in Section 3.4.3. Generally, estimated cancer risks within the range 10^{-6} to 10^{-4}, and HIs less than 1, are considered to be acceptable for the purpose of making remedial decisions (USEPA 1993).

C3.4.1 Estimates of Human Health Risks

Total pathway- and chemical-specific cancer risks and hazard quotients (HQs), as well as cumulative cancer risks, and hazard indices (HIs), are presented in Tables C4-5 through C4-9 for the adult worker, adult recreator, child recreator, adult resident, and child resident.

None of the chemicals (acetone and toluene) detected in Chatsworth formation groundwater underlying B064 LF RFI site are carcinogenic, therefore, no cancer risks were estimated for indirect exposures for all receptors at the B064 LF RFI site. For the receptor with the greatest potential exposure and risk (child resident), estimated HIs range from 0. 0.0000022 (CTE) to 0.0000034 (RME). The only chemicals contributing to these potential risks are acetone and toluene in groundwater.

Risks based on direct use of Chatsworth formation groundwater as a drinking water source range from 8×10^{-7} (CTE) to 3×10^{-6} (RME) and HIs range from 1.4 (CTE) to 8.2 (RME). For the receptor with the greatest potential exposure and risk (child resident), risks range

from 2×10^{-6} (CTE) to 3×10^{-6} (RME) and HIs range from 4.9 to 8.2. The chemical contributing most substantially to these potential risks is trichloroethene (TCE) in groundwater.

The risks based on both exposure to all relevant surficial media plus both indirect and direct exposures to chemicals in groundwater for all receptors range from 8×10^{-7} to 3×10^{-6} and HIs range from 0.0000022 to 8.2. For the receptor with the greatest potential exposure and risk (child resident), risks range from 2×10^{-6} (CTE) to 3×10^{-6} (RME) and HIs range from 4.9 to 8.2. The chemicals contributing to these potential risks are TCE in groundwater.

C3.4.2 Potential Sediment Migration

Because there are no soil COPCs, there is no potential for the migration of chemicals from the B064 LF RFI site to a downgradient RFI site via sediment migration via drainages. There are no RFI sites upgradient of the B064 LF RFI site from which chemicals can migrate to the B064 LF RFI site.

C3.4.3 Uncertainty Analysis

There is some degree of uncertainty associated with nearly all exposure parameter values, toxicity values, and exposure assumptions used in the risk assessment process. In nearly all cases, exposure and toxicity values are upper-bound estimates that result in a conservative estimate of risk. Thus, any uncertainty in the risk assessment is accounted for by use of data and assumptions that are protective of human health. Generally, quantitative risk estimates are considered to be overstated.

Several uncertainties were identified for the HRA performed at the B064 LF RFI site. The uncertainties are described below, and a qualitative analysis of the uncertainties associated with other key exposure assumptions and toxicity values used to estimate human health cancer and non-cancer risk is presented in Table C4-11.

1. The maximum detected concentration of each COPC detected in groundwater was utilized as the EPC. This is likely to result in an overestimation of potential exposures.

2. WRS test results indicated boron and thallium were potentially inconsistent with background distributions of these chemicals, but further examination of the data determined they were sufficiently consistent with background to be biologically insignificant, resulting in their exclusion as COPCs for quantitative analysis. Further review of the detected concentrations of boron and thallium against human health-based RBSLs presented in Table C-8 demonstrates the maximum detected concentration of each is below a concentration of concern. Therefore, the exclusion of these chemicals is unlikely to have a significant effect on risk estimates for the site.

C4.0 ECOLOGICAL RISK ASSESSMENT

The following sections describe the ERA performed for the B064 LF RFI site.

C4.1 SELECTION OF CHEMICALS OF POTENTIAL ECOLOGICAL CONCERN

The selection of chemicals of potential ecological concern (CPECs) is the process of identifying media-specific chemical contaminants that may pose a risk or hazard to ecological receptors. CPECs do not necessarily signify a risk—rather, they are merely chemicals that have been identified for further analyses. Criteria for selecting CPECs are specified in the SRAM and are the same as for selecting COPCs (see Section 3.1), except that CPEC selection requires an additional step. In this step SQLs are compared to ecological screening levels (ESLs) to assure that SQLs are sufficiently low to detect a concentration that may pose an ecological risk.

As described in Section 3.1, detected concentrations of metals in soils were determined to be consistent with background and biologically insignificant. Therefore, no CPECs were identified for the B064 LR RFI site.

C4.2 CONCEPTUAL SITE MODEL AND ENDPOINTS FOR THE ECOLOGICAL RISK ASSESSMENT

Following CPEC selection, a site-specific CSM was developed that identifies ecological receptors and potentially complete exposure pathways, and assessment and measurement endpoints were selected to focus the ERA.

C4.2.1 Conceptual Site Model

The B064 LF RFI site is approximately 0.26 acres and is characterized by thin soils with small areas of rock outcrops and almost entirely supports ruderal habitat consisting of small patches of non-native grasses and coast live oak. Patches of a scrub variety are found extensively throughout the southwestern portion of the B064 LF RFI site as is the Santa Susana Tarplant (see Attachment C6). The types of habitats near the B064 LF RFI site and the representative ecological receptors of concern are summarized in Spreadsheet C4-88.

The ecological CSM for the B064 LF RFI site is presented in Table C4-13. Because no CPECs are present, no potentially complete exposure pathways were identified.

C4.2.2 Assessment and Measurement Endpoints

Assessment endpoints are "explicit expressions of the actual environmental value that is to be protected" (USEPA 1992d). Measurement endpoints are measurable biological responses to a stressor that can be related to the valued characteristic chosen as the assessment endpoint (USEPA 1992d). The assessment and measurement endpoints for the B064 LF RFI site ERA are presented in Spreadsheet C4-89.

C4.3 EXPOSURE ASSESSMENT FOR ECOLOGICAL RECEPTORS

The exposure assessment quantifies the magnitude and type of potential exposure of an ecological receptor to a CPEC.

C4.3.1 Exposure Point Concentrations

An EPC is an estimate of the concentration of a CPEC contacted by a target ecological receptor in a given exposure area. Since no CPECs were identified for the B064 LR RFI site, no EPCs were calculated.

C4.4 ECOLOGICAL RISK CHARACTERIZATION

C4.4.1 Estimates of Ecological Risks

There are no significant complete exposure pathways for ecological receptors at the B064 LF RFI site. Therefore, by definition, there exists a negligible potential for ecological risks at the B064 LF RFI site. Other factors to consider when interpreting these results are the relatively small size of the site, the disturbed nature of the habitat at the Site, and the relatively robust ability of annual grassland communities to recover given the surrounding biotic communities.

C4.4.2 Observational Assessment of Native Vegetation

As described in the SRAM (MWH 2005), an observational assessment of native vegetation at the B064 LF RFI site was performed. The results of the observational assessment are presented in Appendix C, Attachment C6. Based on a visual comparison of the reference areas to the assessment areas, none of the assessment areas showed significant differences in vegetative cover or species composition that could not be accounted for by mechanical or other historical disturbances, with one exception. One plant, a California sagebrush, located within the B064 LF RFI site, exhibited signs of stress that could not be readily attributed to other natural causes of stress identified at the site (annual senescence, drought stress, and crown sprouting following fire). However, given the lack of significant effects noted on plant communities across the B064 LF RFI site, it is considered unlikely that significant adverse affects related to the abundance of native species are occurring.

C4.4.3 Potential Sediment Migration

Because there are no soil COPCs, there is no potential for the migration of chemicals from the B064 LF RFI site to a downgradient RFI site via sediment migration via drainages. There are no RFI sites upgradient of the B064 LF RFI site from which chemicals can migrate to the B064 LF RFI site.

C4.4.4 Uncertainty Analysis

As discussed in Section 3.4.3, there is some degree of uncertainty associated with nearly all exposure parameter values, toxicity values, and exposure assumptions used in the risk assessment process. However, in nearly all cases, exposure and toxicity values used in the risk assessment were selected to result in a conservative estimate of risk. Thus, for the most part, uncertainty in the risk assessment is accounted for by use of data and assumptions that are protective of ecological receptors (see also Section 6.2 of the Group 6 Bundled Report).

Several site-specific uncertainties were identified for the ERA performed at the B064 LF RFI site:

1. One plant, a California sagebrush, located within the B064 LF RFI site, exhibited signs of stress that could not be readily attributed to other natural causes of stress identified at the site. However, given the lack of similar signs for other plants observed throughout the rest of the B064 LF RFI site, it is considered unlikely that significant adverse affects related to the abundance of native species are occurring at the B064 LF RFI site.

2. WRS test results indicated boron and thallium were potentially inconsistent with background distributions of these chemicals, but further examination of the data determined they were sufficiently consistent with background to be biologically insignificant, resulting in their exclusion as CPECs for quantitative analysis. Further review of the detected concentrations of boron and thallium against ecologically-based RBSLs presented in Table C-8 demonstrates the maximum detected concentration of each is below a concentration of concern. Therefore, the exclusion of these chemicals is unlikely to have a significant effect on risk estimates for the site.

C5.0 CONCLUSIONS

The human health risk assessments conducted for the B064 LF RFI site indicate that theoretical upper-bound incremental lifetime cancer risks for human receptors are between 8×10^{-7} and 3×10^{-6}. The human health assessment indicates that HIs are less than 1.0 for exposures not associated with the assumption of domestic use of groundwater. Furthermore, no potentially complete direct pathways were considered complete for ecological receptors. The qualitative assessment of potential impacts to vegetation at the B064 LF RFI site showed that even under conditions of highly compacted soil at the B064 LF RFI site , vegetation (with the exception of a single plant) is healthy and supporting both non-native and native

species, including the Santa Susana Tarplant. The uncertainties associated with the risk assessments are, for the most part, unlikely to lead to significant underestimates of risk. In addition, the assumptions used in this risk assessment were designed to mitigate the effects of uncertainties that may result in underestimation of risks. Therefore, it can be concluded that:

- The theoretical upper-bound incremental lifetime cancer risks associated with indirect exposures for all receptors unrelated to domestic use of groundwater are less than 1×10^{-6} and HI of 1.0
- The theoretical upper-bound incremental lifetime cancer risks for residents assumed to drink Chatsworth formation groundwater within the Group 6 RFI report area are 3×10^{-6};
- The HIs for residents assumed to drink Chatsworth formation groundwater within the Group 6 RFI report area are elevated;
- Given the lack of CPECs, no potentially complete exposure pathways for ecological receptors were identified for the B064 LF RFI site. Therefore, ecological risks associated with all media at the B064 LF RFI site were considered to be at acceptable levels.

These HRA and ERA results are appropriate to use in CMS recommendations.

C6.0 REFERENCES

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Table C4-1 (1 of 1)

Chemicals of Potential Concern for Human Health
Building 64 Leach Fields RFI Site

Chemical	Soil (0 to 2 feet bgs)	Soil (0 to 10 feet bgs)	RFI Site Chatsworth Groundwater (Indirect Pathway)[a]	RFI Site Chatsworth Groundwater (Direct Pathway)[a]	Soil Vapor
Inorganic Compounds					
Copper				X	
Fluoride				X	
Nitrate				X	
Thallium				X	
VOCs					
1,1-Dichloroethane				X	
1,2-Dichloroethane				X	
Acetone			X	X	
Benzene				X	
Carbon disulfide				X	
Chloromethane				X	
cis-1,2-Dichloroethene				X	
Methylene chloride				X	
Toluene			X	X	
Trichloroethene				X	
Total Petroleum Hydrocarbons					
C14-C20(Diesel Range)				X	

Notes:
(a) Only Chatsworth formation groundwater is considered in the risk assessment since near-surface groundwater is localized (does not occur at the B064 LF RFI site) or does not meet State Water Resources Control Board yield requirements.

VOC - volatile organic compound
bgs - below ground surface

Table C4-2 (1 of 1)

Human Health Risk Assessment Conceptual Site Model
Building 64 Leach Fields RFI Site

NOTES:

As described in the SRAM (MWH 2005), note that risk estimates for the potential future recreational user (recreator) are used as surrogate risk estimates for the trespasse

(*) Exposure limited to volatile compounds as defined in the text; residential and worker receptors include both indoor and outdoor air exposure to volatiles; non-residental and non-worker receptors include only outdoor air exposure. For workers, inhalation of volatiles from groundwater beneath the RFI site includes pathways associated with both migration to indoor air and ambient air (domestic groundwater use is an incomplete exposure pathway). For residents, exposures to reporting area Chatsworth formation groundwater includes pathways associated with both migration to indoor air and ambient air, as well as domestic use. Information presented in the RFI report for this site indicates that no known releases occurred at the site, and no impacts have been detected in historical soil vapor samples. Therefore, exposure via soil vapor is considered likely to be an incomplete pathway. However, though considered incomplete, theoretical migration of COPCs from Chatsworth Formation groundwater beanth the site to indoor air was conservatively assessed. Exposure to fugitive dust is limited to non-VOC compounds.

(**) Exposure limited to bioaccumulatable compounds as described in the text.

- complete and potentially complete exposure pathways evaluated in this risk assessment

- incomplete exposure pathways not evaluated in this risk assessment

Table C4-3 (1 of 1)

Exposure Point Concentrations for COPCs
Building 64 Leach Fields

Chemical	RFI Site Chatsworth Groundwater (Indirect Pathway)[a]		RFI Site Chatsworth Groundwater (Direct Pathway)[a]	
	CTE (mg/L)	RME (mg/L)	CTE (mg/L)	RME (mg/L)
Inorganic Compounds				
Copper	NC	NC	1.8E-02	1.8E-02
Fluoride	NC	NC	5.6E-01	5.6E-01
Nitrate	NC	NC	1.4E+01	1.4E+01
Thallium	NC	NC	5.4E-04	5.4E-04
VOCs				
1,1-Dichloroethane	NC	NC	2.6E-03	2.6E-03
1,2-Dichloroethane	NC	NC	9.0E-04	9.0E-04
Acetone	5.0E-03	5.0E-03	1.6E-02	1.6E-02
Benzene	NC	NC	5.8E-04	5.8E-04
Carbon disulfide	NC	NC	2.6E-03	2.6E-03
Chloromethane	NC	NC	3.2E-04	3.2E-04
cis-1,2-Dichloroethene	NC	NC	5.1E-02	5.1E-02
Methylene chloride	NC	NC	6.4E-04	6.4E-04
Toluene	1.8E-03	1.8E-03	1.8E-03	1.8E-03
Trichloroethene	NC	NC	1.0E-02	1.0E-02
Total Petroleum Hydrocarbons				
C14-C20(Diesel Range)	NC	NC	5.0E-02	5.0E-02

Notes:
COPC - chemical of potential concern
NC - not selected as a COPC in the indicated media/depth
EPC - exposure point concentration
CTE - central tendency exposure
RME - reasonable maximum exposure
VOC - volatile organic compound
mg/L - milligrams per liter
(a) Only Chatsworth formation groundwater is considered in the risk assessment since near-surface groundwater is localized (does not occur at the B064 LF RFI site) or does not meet State Water Resources Control Board yield requirements.

Toxicity Criteria
Building 64 Leach Field

	Oral CSF [1/(mg/kg-day)]		Dermal CSF [1/(mg/kg-day)]		Inhalation CSF [1/(mg/kg-day)]		Oral Reference Dose (mg/kg-day)		Dermal Reference Dose (mg/kg-day)		Inhalation Reference Dose (mg/kg-day)	
Compound	Value	Source	Value	Source	Value	Source	Value	Source	Value	Source	Value	Source
Inorganic Compounds												
Copper	NTV		NTV		NTV		4.0 E-2	USEPA 1997	4.0 E-2	USEPA 1997	6.9 E-4	CAPCOA 1992
Fluoride	NTV		NTV		NTV		6.0 E-2	USEPA 2006	6.0 E-2	USEPA 2006	NTV	
Nitrate	NTV		NTV									
Thallium	NTV		NTV		NTV		8.0 E-5	USEPA 2006	8.0 E-5	USEPA 2006	NTV	
VOCs												
1,1-Dichloroethane	5.7 E-3	OEHHA 2006	5.7 E-3	OEHHA 2006	5.7 E-3	OEHHA 2006	1.0 E-1	USEPA 1997	1.0 E-1	USEPA 1997	1.4 E-1	USEPA 1997
Acetone	NTV		NTV		NTV		9.0 E-1	USEPA 2006	9.0 E-1	USEPA 2006	9.0 E-1	USEPA 2006
Benzene	1.0 E-1	OEHHA 2006	1.0 E-1	OEHHA 2006	1.0 E-1	OEHHA 2006	4.0 E-3	USEPA 2006	4.0 E-3	USEPA 2006	8.6 E-3	USEPA 2006
Chloromethane	NTV		NTV		NTV		NTV		NTV		2.6 E-2	USEPA 2006
cis-1,2-Dichloroethene	NTV		NTV		NTV		1.0 E-2	USEPA 2004	1.0 E-2	USEPA 2004	1.0 E-2	USEPA 2004
Methylene chloride	1.4 E-2	OEHHA 2006	1.4 E-2	OEHHA 2006	3.5 E-3	OEHHA 2006	6.0 E-2	USEPA 2006	6.0 E-2	USEPA 2006	1.1 E-1	OEHHA 2006
Toluene	NTV		NTV		NTV		8.0 E-2	USEPA 2006	8.0 E-2	USEPA 2006	1.4 E+0	USEPA 2006
Trichloroethene	1.3 E-2	OEHHA 2006	1.3 E-2	OEHHA 2006	7.0 E-3	OEHHA 2006	3.0 E-4	USEPA 2004	3.0 E-4	USEPA 2004	1.7 E-1	OEHHA 2006
Total Petroleum Hydrocarbons												
C14-C20(Diesel Range)	NTV		NTV		NTV		NTV		NTV		NTV	

Notes:
NTV = No toxicity value
PCB - polychlorinated biphenyls
VOC - volatile organic compound
SVOC - semi-volatile organic compound
RfD = reference dose
CSF = cancer slope factor

Table C4-5 (1 of 1)

Total Risk Estimates for the Adult Worker
Building 64 Leach Field

Central Tendency Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation of Indoor Air_s		Inhalation Ambient Air_s		Inhalation of Indoor Air_{gw}		Inhalation Ambient Air_{gw}		Cumulative Risk		Soil Media Risk		Groundwater Risk	
	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)
Inorganic Compounds																				
Copper	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Nitrate	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Thallium	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
VOCs																				
1,1-Dichloroethane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Acetone	-	-	-	-	-	-	-	-	-	-	3.2E-09	-	4.2E-14	-	3.2E-09	-	0.0E+00	-	3.2E-09	-
Benzene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Carbon disulfide	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Chloromethane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
cis-1,2-Dichloroethene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Methylene chloride	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Toluene	-	-	-	-	-	-	-	-	-	-	1.1E-07	-	5.4E-09	-	1.2E-07	-	0.0E+00	-	1.2E-07	-
Trichloroethene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Total Petroleum Hydrocarbons																				
C14-C20(Diesel Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Cumulative Risk	-	-	-	-	-	-	-	-	-	-	1.2E-07	-	5.4E-09	-	1.2E-07	-	-	-	1.2E-07	-

Reasonable Maximum Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation of Indoor Air_s		Inhalation Ambient Air_s		Inhalation of Indoor Air_{gw}		Inhalation Ambient Air_{gw}		Cumulative Risk		Soil Media Risk		Near-Surface Groundwater Ri	
	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)
Inorganic Compounds																				
Copper	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Nitrate	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Thallium	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
VOCs																				
1,1-Dichloroethane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Acetone	-	-	-	-	-	-	-	-	-	-	8.3E-09	-	1.1E-13	-	8.3E-09	-	-	-	8.3E-09	-
Benzene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Carbon disulfide	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Chloromethane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
cis-1,2-Dichloroethene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Methylene chloride	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Toluene	-	-	-	-	-	-	-	-	-	-	3.0E-07	-	1.4E-08	-	3.2E-07	-	-	-	3.2E-07	-
Trichloroethene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Total Petroleum Hydrocarbons																				
C14-C20(Diesel Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Cumulative Risk	-	-	-	-	-	-	-	-	-	-	3.1E-07	-	1.4E-08	-	3.2E-07	-	-	-	3.2E-07	-

Notes:
Inhalation Indoor Air $_{s-gw}$ - Exposure associated with indoor air concentrations of COPCs modeled from soil vapor, soil, or groundwater.
Inhalation Ambient Air $_{s-gw}$ - Exposure associated with ambient air concentrations of COPCs modeled from soil or groundwater.
HQ - hazard quotient
HI - hazard index
Risk - incremental increased lifetime cancer risk
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyls
COPC - chemical of potential concern
"-" indicates that either adequate toxicity data were not available for a chemical or the exposure pathway was not applicable to that chemical.

 HIs and cancer risks for PCB congeners. These results not included in cumulative risk estimates.

Table C4-6 (1 of 1)

Total Risk Estimates for the Adult Recreator
Building 64 Leach Field

Central Tendency Exposure

Chemical	Soil Ingestion HQ (unitless)	Soil Ingestion Risk (unitless)	Soil Dermal Contact HQ (unitless)	Soil Dermal Contact Risk (unitless)	Soil Particulate Inhalation HQ (unitless)	Soil Particulate Inhalation Risk (unitless)	Inhalation Ambient Air_s HQ (unitless)	Inhalation Ambient Air_s Risk (unitless)	Inhalation Ambient Air_{gw} HQ (unitless)	Inhalation Ambient Air_{gw} Risk (unitless)	Cumulative Risk HI (unitless)	Cumulative Risk Risk (unitless)	Soil Media Risk HI (unitless)	Soil Media Risk Risk (unitless)	Groundwater Risk HI (unitless)	Groundwater Risk Risk (unitless)
Inorganic Compounds																
Copper	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Nitrate	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Thallium	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
VOCs																
1,1-Dichloroethane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Acetone	-	-	-	-	-	-	-	-	4.8E-15	-	4.8E-15	-	-	-	4.8E-15	-
Benzene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Carbon disulfide	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Chloromethane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
cis-1,2-Dichloroethene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Methylene chloride	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Toluene	-	-	-	-	-	-	-	-	6.1E-10	-	6.1E-10	-	-	-	6.1E-10	-
Trichloroethene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Total Petroleum Hydrocarbons																
C14-C20(Diesel Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Cumulative Risk	-	-	-	-	-	-	-	-	6.1E-10	-	6.1E-10	-	-	-	6.1E-10	-

Reasonable Maximum Exposure

Chemical	Soil Ingestion HQ (unitless)	Soil Ingestion Risk (unitless)	Soil Dermal Contact HQ (unitless)	Soil Dermal Contact Risk (unitless)	Soil Particulate Inhalation HQ (unitless)	Soil Particulate Inhalation Risk (unitless)	Inhalation Ambient Air_s HQ (mg/kg-day)	Inhalation Ambient Air_s Risk (mg/kg-day)	Inhalation Ambient Air_{gw} HQ (unitless)	Inhalation Ambient Air_{gw} Risk (unitless)	Cumulative Risk HI (unitless)	Cumulative Risk Risk (unitless)	Soil Media Risk HI (unitless)	Soil Media Risk Risk (unitless)	Groundwater Risk HI (unitless)	Groundwater Risk Risk (unitless)
Inorganic Compounds																
Copper	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Nitrate	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Thallium	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
VOCs																
1,1-Dichloroethane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Acetone	-	-	-	-	-	-	-	-	9.6E-15	-	9.6E-15	-	-	-	9.6E-15	-
Benzene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Carbon disulfide	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Chloromethane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
cis-1,2-Dichloroethene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Methylene chloride	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Toluene	-	-	-	-	-	-	-	-	1.2E-09	-	1.2E-09	-	-	-	1.2E-09	-
Trichloroethene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Total Petroleum Hydrocarbons																
C14-C20(Diesel Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Cumulative Risk	-	-	-	-	-	-	-	-	1.2E-09	-	1.2E-09	-	-	-	1.2E-09	-

Notes:
Inhalation Ambient Air_{s-gw} - Exposure associated with ambient air concentrations of COPCs modeled from soil or groundwater.
HQ - hazard quotient
HI - hazard index
Risk - incremental increased lifetime cancer risk
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyls
COPC - chemical of potential concern
"-" indicates that either adequate toxicity data were not available for a chemical or the exposure pathway was not applicable to that chemical.
mg/kg-day - milligrams per kilogram per day
HIs and cancer risks for PCB congeners. These results not included in cumulative risk estimates.

Table C4-7 (1 of 1)

Total Risk Estimates for the Child Recreator
Building 64 Leach Field

Central Tendency Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation Ambient Air_s		Inhalation Ambient Air_{gw}		Cumulative Risk		Soil Media Risk		Groundwater Risk	
	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (mg/kg-day)	Risk (mg/kg-day)	HQ (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)
Inorganic Compounds																
Copper	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Nitrate	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Thallium	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
VOCs																
1,1-Dichloroethane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Acetone	-	-	-	-	-	-	-	-	3.8E-14	-	3.8E-14	-	-	-	3.8E-14	-
Benzene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Carbon disulfide	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Chloromethane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
cis-1,2-Dichloroethene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Methylene chloride	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Toluene	-	-	-	-	-	-	-	-	4.8E-09	-	4.8E-09	-	-	-	4.8E-09	-
Trichloroethene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Total Petroleum Hydrocarbons																
C14-C20(Diesel Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Cumulative Risk	-	-	-	-	-	-	-	-	4.8E-09	-	4.8E-09	-	-	-	4.8E-09	-

Reasonable Maximum Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation Ambient Air_s		Inhalation Ambient Air_{gw}		Cumulative Risk		Soil Media Risk		Groundwater Risk	
	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (mg/kg-day)	Risk (mg/kg-day)	HQ (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)
Inorganic Compounds																
Copper	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Nitrate	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Thallium	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
VOCs																
1,1-Dichloroethane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Acetone	-	-	-	-	-	-	-	-	1.5E-13	-	1.5E-13	-	-	-	1.5E-13	-
Benzene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Carbon disulfide	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Chloromethane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
cis-1,2-Dichloroethene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Methylene chloride	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Toluene	-	-	-	-	-	-	-	-	1.9E-08	-	1.9E-08	-	-	-	1.9E-08	-
Trichloroethene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Total Petroleum Hydrocarbons																
C14-C20(Diesel Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Cumulative Risk	-	-	-	-	-	-	-	-	1.9E-08	-	1.9E-08	-	-	-	1.9E-08	-

Notes:
Inhalation Ambient Air $_{s\text{-}gw}$ - Exposure associated with ambient air concentrations of COPCs modeled from soil or groundwater.
HQ - hazard quotient
HI - hazard index
Risk - incremental increased lifetime cancer risk
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyls
COPC - chemical of potential concern
"-" indicates that either adequate toxicity data were not available for a chemical or the exposure pathway was not applicable to that chemical.
mg/kg-day - milligrams per kilogram per day
HIs and cancer risks for PCB congeners. These results not included in cumulative risk estimates.

Table C4-8 (1 of 1)

Total Risk Estimates for the Adult Resident
Building 64 Leach Field

Central Tendency Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation of Indoor Air$_s$		Inhalation Ambient Air$_s$		Inhalation of Indoor Air$_{gw}$		Inhalation Ambient Air$_{gw}$		Domestic Groundwater Use		Plant Consumption		Cumulative Risk		Soil Media Risk		Groundwater Risk	
	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)
Inorganic Compounds																								
Copper	-	-	-	-	-	-	-	-	-	-	-	-	-	-	6.2E-03	-	-	-	6.2E-03	-	-	-	6.2E-03	-
Fluoride	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1.3E-01	-	-	-	1.3E-01	-	-	-	1.3E-01	-
Nitrate	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1.2E-01	-	-	-	1.2E-01	-	-	-	1.2E-01	-
Thallium	-	-	-	-	-	-	-	-	-	-	-	-	-	-	9.2E-02	-	-	-	9.2E-02	-	-	-	9.2E-02	-
VOCs																								
1,1-Dichloroethane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	7.1E-04	5E-08	-	-	7.1E-04	5E-08	-	-	7.1E-04	5E-08
Acetone	-	-	-	-	-	-	-	-	-	-	1.1E-08	-	4.5E-14	-	4.9E-04	-	-	-	4.9E-04	-	-	-	4.9E-04	-
Benzene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	4.0E-03	2E-07	-	-	4.0E-03	2E-07	-	-	4.0E-03	2E-07
Carbon disulfide	-	-	-	-	-	-	-	-	-	-	-	-	-	-	7.1E-04	-	-	-	7.1E-04	-	-	-	7.1E-04	-
Chloromethane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
cis-1,2-Dichloroethene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1.4E-01	-	-	-	1.4E-01	-	-	-	1.4E-01	-
Methylene chloride	-	-	-	-	-	-	-	-	-	-	-	-	-	-	2.9E-04	3E-08	-	-	2.9E-04	3E-08	-	-	2.9E-04	3E-08
Toluene	-	-	-	-	-	-	-	-	-	-	3.8E-07	-	5.8E-09	-	6.2E-04	-	-	-	6.2E-04	-	-	-	6.2E-04	-
Trichloroethene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	9.1E-01	4E-07	-	-	9.1E-01	4E-07	-	-	9.1E-01	4E-07
Total Petroleum Hydrocarbons																			-					
C14-C20(Diesel Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Cumulative Risk	-	-	-	-	-	-	-	-	-	-	3.9E-07	-	5.8E-09	-	1.4E+00	8E-07	-	-	1.4E+00	8E-07	-	-	1.4E+00	8E-07
W/O Domestic Groundwater Use																			4.0E-07	0E+00			4.0E-07	0E+00

Reasonable Maximum Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation of Indoor Air$_s$		Inhalation Ambient Air$_s$		Inhalation of Indoor Air$_{gw}$		Inhalation Ambient Air$_{gw}$		Domestic Groundwater Use		Plant Consumption		Cumulative Risk		Soil Media Risk		Near-Surface Groundwater I	
	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)
Inorganic Compounds																								
Copper	-	-	-	-	-	-	-	-	-	-	-	-	-	-	9.5E-03	-	-	-	9.5E-03	-	-	-	9.5E-03	-
Fluoride	-	-	-	-	-	-	-	-	-	-	-	-	-	-	2.0E-01	-	-	-	2.0E-01	-	-	-	2.0E-01	-
Nitrate	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1.9E-01	-	-	-	1.9E-01	-	-	-	1.9E-01	-
Thallium	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1.4E-01	-	-	-	1.4E-01	-	-	-	1.4E-01	-
VOCs																								
1,1-Dichloroethane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1.1E-03	2E-07	-	-	1.1E-03	2E-07	-	-	1.1E-03	2E-07
Acetone	-	-	-	-	-	-	-	-	-	-	3.0E-08	-	1.3E-13	-	7.5E-04	-	-	-	7.5E-04	-	-	-	7.5E-04	-
Benzene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	6.1E-03	8E-07	-	-	6.1E-03	8E-07	-	-	6.1E-03	8E-07
Carbon disulfide	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1.1E-03	-	-	-	1.1E-03	-	-	-	1.1E-03	-
Chloromethane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
cis-1,2-Dichloroethene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	2.2E-01	-	-	-	2.2E-01	-	-	-	2.2E-01	-
Methylene chloride	-	-	-	-	-	-	-	-	-	-	-	-	-	-	4.5E-04	1E-07	-	-	4.5E-04	1E-07	-	-	4.5E-04	1E-07
Toluene	-	-	-	-	-	-	-	-	-	-	1.1E-06	-	1.6E-08	-	9.5E-04	-	-	-	9.5E-04	-	-	-	9.5E-04	-
Trichloroethene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1.4E+00	2E-06	-	-	1.4E+00	2E-06	-	-	1.4E+00	2E-06
Total Petroleum Hydrocarbons																								
C14-C20(Diesel Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
C20-C30(Lubricant Oil Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Cumulative Risk	-	-	-	-	-	-	-	-	-	-	1.1E-06	-	1.6E-08	-	2.2E+00	3E-06	-	-	2.2E+00	3E-06	-	-	2.2E+00	3E-06
W/O Domestic Groundwater Use																			1.1E-06	0E+00			1.1E-06	0E+00

Notes:
Inhalation Indoor Air $_{s-gw}$ - Exposure associated with indoor air concentrations of COPCs modeled from soil vapor, soil, or groundwater.
Inhalation Ambient Air $_{s-gw}$ - Exposure associated with ambient air concentrations of COPCs modeled from soil or groundwater.
HQ - hazard quotient
HI - hazard index
Risk - incremental increased lifetime cancer risk
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyls
COPC - chemical of potential concern
"-" indicates that either adequate toxicity data were not available for a chemical or the exposure pathway was not applicable to that chemical.
HIs and cancer risks for PCB congeners. These results not included in cumulative risk estimates.

Table C4-9 (1 of 1)

Total Risk Estimates for the Child Resident
Building 64 Leach Field

Central Tendency Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation of Indoor Air$_s$		Inhalation Ambient Air$_s$		Inhalation of Indoor Air$_{gw}$		Inhalation Ambient Air$_{gw}$		Domestic Groundwater Use		Plant Consumption		Cumulative Risk		Soil Media Risk		Groundwater Risk	
	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)
Inorganic Compounds																								
Copper	-	-	-	-	-	-	-	-	-	-	-	-	-	-	2.2E-02	-	-	-	2.2E-02	-	-	-	2.2E-02	-
Fluoride	-	-	-	-	-	-	-	-	-	-	-	-	-	-	4.5E-01	-	-	-	4.5E-01	-	-	-	4.5E-01	-
Nitrate	-	-	-	-	-	-	-	-	-	-	-	-	-	-	4.3E-01	-	-	-	4.3E-01	-	-	-	4.3E-01	-
Thallium	-	-	-	-	-	-	-	-	-	-	-	-	-	-	3.2E-01	-	-	-	3.2E-01	-	-	-	3.2E-01	-
VOCs																								
1,1-Dichloroethane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	2.5E-03	1E-07	-	-	2.5E-03	1E-07	-	-	2.5E-03	1E-07
Acetone	-	-	-	-	-	-	-	-	-	-	6.0E-08	-	2.5E-13	-	1.7E-03	-	-	-	1.7E-03	-	-	-	1.7E-03	-
Benzene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1.4E-02	4E-07	-	-	1.4E-02	4E-07	-	-	1.4E-02	4E-07
Carbon disulfide	-	-	-	-	-	-	-	-	-	-	-	-	-	-	2.5E-03	-	-	-	2.5E-03	-	-	-	2.5E-03	-
Chloromethane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
cis-1,2-Dichloroethene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	4.9E-01	-	-	-	4.9E-01	-	-	-	4.9E-01	-
Methylene chloride	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1.0E-03	7E-08	-	-	1.0E-03	7E-08	-	-	1.0E-03	7E-08
Toluene	-	-	-	-	-	-	-	-	-	-	2.1E-06	-	3.2E-08	-	2.2E-03	-	-	-	2.2E-03	-	-	-	2.2E-03	-
Trichloroethene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	3.2E+00	1E-06	-	-	3.2E+00	1E-06	-	-	3.2E+00	1E-06
Total Petroleum Hydrocarbons																								
C14-C20(Diesel Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Cumulative Risk	-	-	-	-	-	-	-	-	-	-	2.2E-06	-	3.2E-08	-	4.9E+00	2E-06	-	-	4.9E+00	2E-06	-	-	4.9E+00	2E-06
W/O Domestic Groundwater Use																			2.2E-06	0E+00			2.2E-06	0E+00

Reasonable Maximum Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation of Indoor Air$_s$		Inhalation Ambient Air$_s$		Inhalation of Indoor Air$_{gw}$		Inhalation Ambient Air$_{gw}$		Domestic Groundwater Use		Plant Consumption		Cumulative Risk		Soil Media Risk		Groundwater Risk	
	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HQ (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)	HI (unitless)	Risk (unitless)
Inorganic Compounds																								
Copper	-	-	-	-	-	-	-	-	-	-	-	-	-	-	3.6E-02	-	-	-	3.6E-02	-	-	-	3.6E-02	-
Fluoride	-	-	-	-	-	-	-	-	-	-	-	-	-	-	7.5E-01	-	-	-	7.5E-01	-	-	-	7.5E-01	-
Nitrate	-	-	-	-	-	-	-	-	-	-	-	-	-	-	7.1E-01	-	-	-	7.1E-01	-	-	-	7.1E-01	-
Thallium	-	-	-	-	-	-	-	-	-	-	-	-	-	-	5.4E-01	-	-	-	5.4E-01	-	-	-	5.4E-01	-
VOCs																								
1,1-Dichloroethane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	4.2E-03	2E-07	-	-	4.2E-03	2E-07	-	-	4.2E-03	2E-07
Acetone	-	-	-	-	-	-	-	-	-	-	8.9E-08	-	3.8E-13	-	2.8E-03	-	-	-	2.8E-03	-	-	-	2.8E-03	-
Benzene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	2.3E-02	7E-07	-	-	2.3E-02	7E-07	-	-	2.3E-02	7E-07
Carbon disulfide	-	-	-	-	-	-	-	-	-	-	-	-	-	-	4.2E-03	-	-	-	4.2E-03	-	-	-	4.2E-03	-
Chloromethane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
cis-1,2-Dichloroethene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	8.2E-01	-	-	-	8.2E-01	-	-	-	8.2E-01	-
Methylene chloride	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1.7E-03	1E-07	-	-	1.7E-03	1E-07	-	-	1.7E-03	1E-07
Toluene	-	-	-	-	-	-	-	-	-	-	3.2E-06	-	4.8E-08	-	3.6E-03	-	-	-	3.6E-03	-	-	-	3.6E-03	-
Trichloroethene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	5.3E+00	2E-06	-	-	5.3E+00	2E-06	-	-	5.3E+00	2E-06
Total Petroleum Hydrocarbons																								
C14-C20(Diesel Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Cumulative Risk	-	-	-	-	-	-	-	-	-	-	3.3E-06	-	4.8E-08	-	8.2E+00	3E-06	-	-	8.2E+00	3E-06	-	-	8.2E+00	3E-06
W/O Domestic Groundwater Use																			3.4E-06	0E+00			3.4E-06	0E+00

Notes:
Inhalation Indoor Air $_{s-gw}$ - Exposure associated with indoor air concentrations of COPCs modeled from soil vapor, soil, or groundwater.
Inhalation Ambient Air $_{s-gw}$ - Exposure associated with ambient air concentrations of COPCs modeled from soil or groundwater.
HQ - hazard quotient
HI - hazard index
Risk - incremental increased lifetime cancer risk
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyls
COPC - chemical of potential concern
"-" indicates that either adequate toxicity data were not available for a chemical or the exposure pathway was not applicable to that chemical.

Table C4-11 (1 of 1)

Human Health Risk Assessment Uncertainty Analysis
Building 64 Leach Fields RFI Site

Assessment Element	Uncertainty	Magnitude of Impact	Direction of Impact
Exposure Pathways	Risks associated with drinking of groundwater are not realistic because the groundwater beneath the SSFL is not currently used as a drinking water source and the presence of the contamination will likely require a restriction on its future use as well.	High	Conservative
	Groundwater monitoring data and comparison concentrations (i.e., background) are filtered samples (i.e., dissolved concentrations) as per agency-approved groundwater monitoring work plan. Although dissolved concentrations represent the concentrations that may migrate, the total concentration in groundwater may be greater when there are significant amount of suspended solids present (i.e., total concentration).	Moderate	Realistic
	Future land use of the site is currently undecided but may be commercial or recreational, which have lower risks than residential.	Moderate	Uncertain
EPC Calculations	The maximum detected concentration of each COPC detected in groundwater was used as the EPC.	High	Conservative
	Information presented in the RFI report for this site indicates that no known releases occurred at the site, and no impacts have been detected in historical soil vapor samples. Therefore, exposure via soil vapor is considered likely to be an incomplete pathway. However, though considered incomplete, theoretical migration of COPCs from Chatsworth Formation groundwater beneath the site to indoor air was conservatively assessed.	Moderate	Conservative
	Vapor migration into indoor air has been estimated using a model which is being validated for the site. Migration estimates may be changed once the model validation is complete.	Moderate	Uncertain
Cancer Slope Factor	Extrapolation of dose-response data from laboratory animals to humans.	High	Conservative
	Assumes that all carcinogens do not have a threshold below which carcinogenic response occurs, and therefore, any dose, no matter how small, results in some potential risk.	Moderate	Conservative
	Cancer slope factors derived from animal studies are the upper-bound maximum likelihood estimates based on a linear dose-response curve, and therefore, overstate carcinogenic potency.	Moderate	Conservative
Reference Dose	High degree of uncertainty in extrapolation of dose-response data from laboratory animals to humans.	High	Conservative

Notes:

PAH - polycyclic aromatic hydrocarbon
EPC - exposure point concentration
UCL - upper confidence limit

Table C4-13 (1 of 1)

Ecological Risk Assessment Conceptual Site Model
Building 64 Leach Fields RFI Site

NOTES:
(*) Trophic Level: P = primary producers (e.g., plants); D = detrivores (e.g., invertabrates); 1 = 1st consumer (e.g., mule deer); 2 = 2nd consumer (e.g. deer mouse); 3 = 3rd consumer (e.g., red-tailed hawk).
(**) Exposure limited to volatile compounds as defined in the text.
(***) Exposures limited to bioacummulative compounds as defined in the text.

- complete and potentially complete exposure pathways evaluated in this risk assessment

- incomplete exposure pathways not evaluated in this risk assessment

- minor exposure pathway not evaluated in this risk assessment

APPENDIX C5

BASELINE TOXICITY REFERENCE VALUES FOR THE ECOLOGICAL RISK ASSESSMENT (ELECTRONIC COPY)

GROUP 6 – NORTHEASTERN AREA IV
RCRA FACILITY INVESTIGATION RISK ASSESSMENT REPORT
SANTA SUSANA FIELD LABORATORY
VENTURA COUNTY, CALIFORNIA

APPENDIX C, ATTACHMENT C5

TOXICITY PROFILE FOR THE BASELINE ECOLOGICAL RISK ASSESSMENT

Prepared For:

THE BOEING COMPANY

AND

THE UNITED STATES DEPARTMENT OF ENERGY

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September 2006

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LIST OF ACRONYMNS AND ABBREVIATIONS

ADD	average daily dosage or applied daily dosage
AOC	Areas of Concern
bgs	below ground surface
B64 LF	Building 64 Leach Fields
BAF	bioaccumulation factor
COPC	chemical of potential concern
CPEC	chemical of potential ecological concern
CSF	cancer slope factor
CSM	conceptual site model
CTE	central tendency exposure
DCA	dichloroethane
DCE	dichloroethene
DTSC	Department of Toxic Substance Control
EPC	exposure point concentration
EPV	exposure point values
ERA	ecological risk assessment
ESL	ecological screening level
HI	hazard index
HQ	hazard quotient
HRA	human health risk assessment
HSDB	Hazardous Substances Data Bank
gpm	gallons per minute
IRIS	Integrated Risk Information System
LADD	lifetime average daily dosage
LOAEL	lowest observable adverse effect level
mg/kg	milligrams per kilogram
mg/kg-day	milligrams per kilogram per day
mg/L	milligrams per liter
NOAEL	no observable adverse effect level
p	probability

LIST OF ACRONYMNS AND ABBREVIATIONS (continued)

PC Permit	Post-Closure Permit
PCE	tetrachloroethene
PEF	particulate emission factor
RCRA	Resource Conservation and Recovery Act
RfD	reference dose
RFI	RCRA facility investigation
RME	reasonable maximum exposure
Rocketdyne	Rocketdyne Propulsion and Power Division
SQL	sample quantitation limit
SRAM	Standardized Risk Assessment Methodology
SSFL	Santa Susana Field Laboratory
SVOC	semivolatile organic compound
SWMU	Solid Waste Management Unit
SWRCB	State Water Resources Control Board
TCA	trichloroethane
TCE	trichloroethene
TDS	total dissolved solids
TPH	total petroleum hydrocarbons
TRV	toxicity reference value
UCL	upper confidence limit
USEPA	United States Environmental Protection Agency
VOC	volatile organic compound
µg/L	micrograms per liter

C1.0 INTRODUCTION

The ecological screening level (ESL) phase of the ecological risk assessment (ERA) provides a conservative evaluation so that clearly insignificant exposures can be removed from further evaluation. In the ESL ERA phase, BTAG Toxicity Reference Value-Low[1] (TRV-Low) values were used, where available, to derive ESL risk estimates for representative birds and mammals selected for RFI sites at the Santa Susana Field Laboratory (SSFL).

As presented in the SRAM (MWH 2005), the next phase, the baseline ERA, is intended to advance the ERA process using information that is more relevant to site-specific conditions and assessment endpoints. Just as BTAG TRV-Low values were used in the ESL ERA, baseline ERA TRVs (chronic no-observable-adverse-effect-levels [NOAELs]) are used in the baseline ERA. If the resultant baseline ERA HQs are less than one, it can be concluded that ecological risk is *de minimus*.

DTSC (2003) allows:

> "Alternative TRVs to be proposed and supported; however they must be evaluated in conjunction with the BTAG values."

As stipulated in the SRAM, TRVs for a baseline ERA were not presented in the SRAM, but "…were to be derived on a case-by-case basis…" as required. Both ESL TRV- and baseline ERA TRV-based risk estimates are presented in RFI site-specific risk tables (see Appendices C1 through C4).

Consistent with guidance (DTSC 1996, 2003; U.S. EPA 1992) and in accordance with the SRAM, this attachment to Appendix C identifies and provides rationale for selecting doses

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[1] The BTAG TRV-Low represents the lowest credible no-observable-adverse-effect-level (NOAEL) (DTSC 2003). Consequently, a BTAG TRV-Low dose would not be expected to produce an adverse effect and is protective of an individual or population of organisms. Using a BTAG TRV-Low value, a hazard quotient (HQ) less than one would suggest *de minimus* ecological risk (DTSC 2003).

A BTAG TRV-High represents the mid-point of a variety of adverse effects levels and, therefore, is not necessarily a lowest-observable-adverse-effect-level (LOAEL). A BTAG TRV-High dose would be expected to produce an adverse effect to an individual or population of organisms (DTSC 2003). Using a BTAG TRV-High value, a HQ greater than one suggests unacceptable ecological risk, which can be confirmed or determined to be not applicable to the specific site by a validation study.

A chemical with a BTAG TRV-Low-based HQ greater than one and a BTAG TRV-High-based HQ less than one would suggest that further site-specific information should be collected to reduce the uncertainty and obtain a more site-specific estimate of the potential for ecological risk.

reported in the toxicological literature that were used to derive avian and mammalian[2] baseline ERA TRVs for Group 6 RFI Sites.

C1.1 Preferred Toxicity Data

Toxicological studies and doses proposed for baseline ERA TRVs were selected based on their scientific merit. Only toxicological studies that reported all of the following data were selected:

- Chemical administered
- Test organism
- Administered dose(s)
- Exposure duration
- Exposure route
- Effect or response
- Sample size
- Full citation or full citation of source

Study features that were used to select among several germane studies include, but were not limited to, the following:

- Study responses are directly related (to the extent possible) to assessment endpoints that have been established for wildlife at SSFL—i.e., protection of avian and mammalian wildlife populations.
- Doses were administered via a route likely to be experienced in the field (i.e., ingestion of food, ingestion of drinking water, and inhalation as opposed to interperitoneal injection, gavage, etc.).
- Doses were administered during critical or sensitive periods (e.g., during gestation, early life stage) and/or effects were examined for sensitive life stage (e.g., effects on fetuses, embryos, juveniles).
- Chronic exposures or doses that were administered through most of the critical or sensitive periods (e.g., gestation).
- Use of a serial dosing regime—especially a serial dosing regime designed (divided finely enough) to characterize both a NOAEL and LOAEL.
- Wildlife species were examined in the study.
- A description and the results of statistical analyses were provided.

[2] At this time, baseline ERA TRVs are only proposed for avian and mammalian representative species.

Where available, affirmation of the scientific merit of the selected study and dose by an independent toxicological review for use at other sites was noted. Precedent as "used at another site" was not considered when selecting studies and doses.

C1.2 Scope of Toxicity Profile

Baseline ERA TRVs are proposed for the following constituents at Group 6 RFI sites:

- Antimony
- Cadmium
- Copper
- Molybdenum
- Nickel
- Selenium
- Silver
- Zinc
- PCBs
- Ethylbenzene
- Tetrachloroethene
- Toluene
- Trichlorethene
- Xylene

Summary information for toxicity studies selected to derive baseline ERA TRVs is provided in Tables C5-1 and C5-2.

If available, the BTAG TRV-Low and TRV-High values are also presented. A table listing BTAG TRVs was obtained from DTSC's website[3] (http://www.dtsc.ca.gov/ Assessing Risk/eco.cfm).

C2.0 ANTIMONY

Venugopal and Luckey (1978) report that soluble antimony salts are more toxic than similar lead or arsenic compounds. Symptoms of acute and chronic antimony poisoning occur more readily via ingestion than by other exposure routes. Nonetheless, animals are rarely poisoned with antimony or its compounds (Clarke et al. 1981).

No BTAG TRVs for antimony were provided by DTSC (2003).

C2.1 Mammalian Toxicity – Ingestion

The single administered dose of 1.0 mg[Sb]/kg-day was selected for use in deriving baseline TRVs for mammalian wildlife and was considered to be an ecologically relevant chronic NOAEL because:

- Antimony was administered throughout the lifetime of the mice.

[3] The documentation describing the toxicity studies and rationale for selecting individual BTAG TRVs was not available at DTSC's website.

- No adverse effect on survivorship and only minor reductions in growth and median life span at 540 days were observed among female mice at this administered dose.

Features that support the use of this study include:

- Although survivorship can be directly related to fitness and the persistence of populations, it is considered a less sensitive endpoint compared to reproductive and developmental endpoints. Growth is individual-level endpoint from which fitness and persistence of populations may be indirectly inferred.
- Reductions in life span and growth appear to be minor (less than 10% relative to the control group).
- A large sample size was used (54 females and 54 males per treatment).
- An independent review by the U.S. Department of Energy (U.S. DOE) (Sample *et al.* 1996) supports the use of this study to derive toxicity benchmarks for wildlife species.

Limitations of the data set include the fact that only three relevant studies were obtained; only growth and acute mortality data were obtained; and only one concentration was administered in the selected study, prohibiting an evaluation and characterization of a dose-response relationship.

C2.1.1 Selected Toxicity Study

Weanling mice were administered antimony potassium tartrate in their drinking water until natural death (Schroeder *et al.* 1968). No adverse effect on survivorship and no histopathological changes were observed in mice administered a concentration of 5 parts per million (ppm) [Sb] as antimony potassium tartrate in their drinking water (=1.0mg[Sb]/kg-day).

Test Spp: Mouse; Body weight = 0.025 kg (Schroeder *et al.* 1968); Water Intake = 5 ml/day (Lewis 1992)

Dosage: 5 ppm[Sb] in water = 5 mg[Sb]/L

NOAEL = (5 mg[Sb]/L • 5 ml/day • 1 L/1,000 ml) / 0.025 kg = 1.0 mg[Sb]/kg-day

However, reduced median life spans and some suppression of growth of older females were observed at this dose. The decrease in median life spans compared to the control group was less than 8 percent (569 days compared to 625 days in control group) and the decrease in growth of animals at 540 days of age compared to the control group was less than 9 percent (50.5 grams [g] average body weight compared to 55.2 [g] in control group). No difference

in the weight of female mice was observed at 30, 60, 90, 120, and 180 days of age. The biological significance of these effects on fitness and/or the persistence of populations was not discussed by the authors. However, the minor decrease in growth at 540 days of age is likely to be biologically insignificant since the effect occurs well past reproductive maturity and the life span of small mammals in the field is unlikely to be significantly longer than 540 days. Furthermore, no adverse effects on survivorship, growth, median life span, or longevity were observed in male mice administered the same dosing regime (Schroeder *et al.* 1968). Therefore, the use of this dose to develop toxicity benchmarks for wildlife appears to be protective relative to effects on reproductive success.

C2.1.2 Other Related Toxicity Studies

Two toxicity studies examining mortality endpoints were obtained for mammals ingesting antimony. These LD_{50} values are considerably greater than 1.0 mg[Sb]/kg-day. For perspective, the selected dose and doses from other related toxicity studies are plotted in Figure C5-1 (see also Table C5-3).

C2.2 Avian Toxicity – Ingestion

No avian toxicity benchmark for antimony is proposed for the baseline ERA.

C3.0 CADMIUM

Cadmium is a naturally occurring metal that is neither required by nor beneficial to biota. Birds and mammals are comparatively resistant to acute oral exposures to cadmium (Venugopal and Luckey 1978). The presence of metallothioneins in cells, which bind metals, may increase tolerance for cadmium.

C3.1 Mammalian Toxicity – Ingestion

The BTAG TRV-Low of 0.06 mg[Cd]/kg-day was derived based on a study by Webster (1988, as reported in USN 1998) wherein a serial dosing regime of 0.00038, 0.06, and 10 mg[Cd]/kg-day as cadmium chloride was administered to laboratory mice in their drinking water for 8 weeks. BTAG reported that no effects were reported on mean fetal weight at a dose of 0.06 mg/kg-day (no calculations of dose were provided by BTAG). Decreased mean fetal weight was observed at a dose of 10 mg/kg-day. The no effect dose of 0.06 mg/kg-day was chosen for the low TRV because it measured reproductive endpoints that may have population-level effects.

The BTAG TRV-High of 2.64 mg[Cd]/kg-day was obtained from a study by Schroeder and Mitchener (1971) wherein cadmium salts were administered to laboratory mice in their drinking water for three generations. BTAG reported that increased young deaths and runts in the second and third generation were observed among mice administered a dose of 2.64 mg[Cd]/kg-day (no calculations of dose were provided by BTAG). This dose was chosen for the BTAG TRV-High because it was a multigenerational study with significant reproductive effects and the dose was in the mid-range of other reproductive effects.

C3.1.1 Selected Toxicity Study

In a similar reproductive study, Sutou et al. (1980) exposed four groups of 14 female and 14 male rats to 0.1, 1, or 10 mg[Cd]/kg-day as cadmium chloride in their diet for 12 weeks throughout the reproductive period (6 weeks pre-mating, 3 weeks of mating, and day 1 to day 20 of gestation). The stated objective of this study was to investigate the toxicity, fertility, teratogenicity, and dominant lethality of cadmium. No adverse effects on number of copulating females, number of pregnant females, total implants, live fetuses, and average fetal weight were observed among rats administered dietary doses of up to 1.0 mg[Cd]/kg-day as cadmium chloride. Decreased numbers of implantations, live fetuses, and average fetal body weight were observed among rats given dietary exposures of 10 mg[Cd]/kg-day. Exposures to cadmium at the administered concentrations did not induce teratogenicity or dominant lethality.

In a related study, rats were administered cadmium chloride in their diet for 9 weeks (Sutou et al. 1980). No adverse effects on male fertility (as measured by copulating ability, impregnating ability, copulation ratio, pregnancy ratio, and pregnancy efficiency) were observed among rats administered doses of up to 10 mg[Cd]/kg-day in their diet.

The dose of 1.0 mg[Cd]/kg-day was selected to derive baseline ERA TRVs for mammalian wildlife and is considered to be an ecologically relevant chronic NOAEL because:

- The study considered exposure over12 weeks pre- and post-mating.
- No adverse effects on number of copulating females, number of pregnant females, total implants, live fetuses, average fetal weight, and male fertility were observed among rats administered this dose.

Features that support the use of this study include:

- Number of copulating females, number of pregnant females, total implants, live fetuses, average fetal weight, and male fertility can be directly related to reproductive success from which the persistence of populations may be inferred.
- Effects to a sensitive life stage (developing fetuses) were examined.
- A serial dosing regime was administered.
- Both a NOAEL and LOAEL were reported, thereby permitting a limited characterization of the dose-response relationship.
- Studies by Kelman et al. (1978), Pond and Walker (1975), and Webster (1988) support the results of this study that no adverse reproductive effects are likely to occur at doses comparable to 1.0 mg[Cd]/kg-day.
- An independent review of the selected study by U.S. DOE (Sample et al. 1996) supports the use of this study to derive toxicity benchmarks for wildlife species.
- An independent toxicological review by the University of California (UC Davis 2004) supports the use of this value to derive TRVs for wildlife species.

Sutou et al. (1980) used a less severe serial dosing regime (i.e., 0 [control], 0.1, 1,0, and 10 mg[Cd]/kg-day) compared to Webster's (1988) dosing regime (i.e., 0.00038, 0.06, and 10 mg[Cd]/kg-day). Sutou et al.'s (1980) next lowest dose was 1.0 mg[Cd]/kg-day compared to 0.06 mg[Cd]/kg-day of Webster (1988). Accordingly, given the extreme differences between serial doses, the value of the BTAG TRV-Low may simply be an artifact of Webster's (1988) study's design.

C3.1.2 Other Related Toxicity Studies

Twelve toxicity studies examining reproductive, developmental, growth, or mortality endpoints were obtained for mammals ingesting cadmium. For perspective, the selected dose and doses from other related toxicity studies are plotted in Figure C5-1.

C3.2 Avian Toxicity – Ingestion

The BTAG TRV-Low of 0.08 mg[Cd]/kg-day was obtained from a study by Cain et al. (1983) wherein administered cadmium chloride to mallards in their feed for 12 weeks. BTAG reported that at a dose of 0.78 mg/kg-day, no effects were observed on hematological or systemic endpoints (no calculations of dose were provided). At the same dose, the BTAG

stated that kidney degeneration was observed in 4 out of 12 ducklings. BTAG divided the reported dose by an effects level (EL)-to-NOAEL uncertainty factor[4] (UF) of 10 to render a BTAG TRV-Low of 0.08 mg[Cd]/kg-day. BTAG reported that this dose was selected over other doses because the endpoint tested in the study was the kidney, which is the target organ of cadmium and the test organism (mallard) appeared to be more sensitive to cadmium toxicity than are other test organisms given the suite of studies they reviewed.

The BTAG TRV-High of 10.4 mg[Cd]/kg-day was obtained from a study by Richardson et al. (1974) wherein cadmium chloride was administered to Japanese quail hatchlings in their feed for six weeks. BTAG reported that dose of 10.4 mg/kg-day resulted in decreases in body weight and testis weight, and altered hematological (e.g., hematocrit and hemoglobin) functions (no calculations of dose were provided). This dose was chosen for the high TRV because the systemic/histological study was considered to test ecologically significant endpoints and was in the mid-range of reproductive effects.

C3.2.1 Selected Toxicity Study

The same study used to derive the BTAG TRV-Low was selected (Cain *et al*. 1983). Cain et al. (1983) exposed mallard ducklings to cadmium in their diet for 12 weeks at nominal dietary concentrations of 0, 5, 10, and 20 ppm[Cd] (averaged 0.1, 4.3, 9.2, and 14.6 ppm[Cd], respectively, as reported by the authors,). No effects on blood chemistry, serum chemistry, body or liver weight, and no degenerative effects in gizzard, intestine, liver, kidney, heart, lung, spleen, or skeletal muscle were observed among mallard ducklings administered a dietary concentration of 9.2 ppm[Cd] (nominal 10 ppm = 0.87 mg[Cd]/kg-day) for 12 weeks).

Test Spp:	Mallard; Body weight = 1160 kg (Cain et al. 1983); Food Intake = 110 g/day (White & Finley 1978, as cited in Cain et al. 1983 for similarly sized adult mallards)
Dosage:	9.2 ppm[Cd] in diet = 9.2 mg[Cd]/kg
NOAEL	= (9.2 mg[Cd]/kg • 110 g/day • 1 kg/1,000 g) / 1.160 kg = 0.87 mg[Cd]/kg-day ≈ 0.80 mg[Cd]/kg-day (for consistency with BTAG TRV-Low) (minor difference from BTAG TRV-Low is likely due to small differences in body weight and ingestion rate used to calculate NOAEL)

It appears that BTAG inadvertently divided the NOAEL by an EL-to-NOAEL UF to obtain the BTAG TRV-Low of 0.08 mg[Cd]/kg-day. Comparable studies cited by the authors

[4] Note that BTAG UFs used to convert study-based values to chronic NOAEL-equivalent TRVs are different than toxicity UFs presented in the SRAM. For consistency, UFs used in this toxicity profile are consistent with BTAG (USN 1997).

reported kidney damage in young wood ducks and adult mallards at dietary concentrations 5 and 10 times higher, respectively.

The dose of 0.80 mg[Cd]/kg-day was selected to derive baseline ERA TRVs for avian wildlife and is considered to be an ecologically relevant chronic NOAEL because:

- The study considered exposure over 12 weeks to a sensitive life stage (ducklings).
- No effects on blood chemistry, serum chemistry, body or liver weight, and no degenerative effects in gizzard, intestine, liver, kidney, heart, lung, spleen, or skeletal muscle were observed among mallard ducklings administered this dose.

Features that support the use of this study include:

- Growth and systemic effects are individual-level endpoints from which fitness and persistence of populations may be indirectly inferred.
- A serial dosing regime was administered (e.g., control, 0, 5, 10, and 20 ppm[Cd] in their diet).
- Both a NOAEL and LOAEL were reported, thereby permitting a limited characterization of the dose-response relationship.
- Results are consistent with Mehring *et al.* (1960).
- An independent toxicological review by the University of California (UC Davis 2004) supports the use of this value to derive TRVs for wildlife species.

The value used to derive baseline ERA TRVs is derived from the same study as the BTAG TRV-Low, but the dose of 0.80 mg[Cd]/kg-day was not divided by an uncertainty factor because no adverse effects were observed at this dose. It appears that BTAG inadvertently divided the same dose by an effects-to-NOAEL UF of 10 to render a TRV of 0.08 mg[Cd]/kg-day. Further review of the paper revealed that adverse effects (i.e., "mild to severe kidney degeneration") were observed at the next highest dietary concentration 14.6 ppm[Cd] (nominal 20 ppm[Cd] = approximately 1.5 mg[Cd]/kg-day).

C3.2.2 Other Related Toxicity Studies

Five toxicity studies examining reproductive, developmental, growth, mortality, or physiological endpoints were obtained for birds ingesting cadmium. For perspective, the selected dose and doses from other related toxicity studies are plotted in Figure C5-2 (see also Table C5-4).

C4.0 COPPER

Copper is a required micronutrient for both plant and animals and is required for the proper functioning of many enzymes. In many macroinvertebrates, copper is the essential component of the oxygen-carrying protein hemocyanin. Copper is readily accumulated by aquatic organisms. In fish, exposures to elevated copper may result in effects on swimming, growth, and reproduction. In mammals, copper toxicity can be greater with low dietary intake of iron, molybdenum, sulfate, and zinc; molybdenum and sulfate reduce copper absorption and enhance its excretion. The influence of these minerals is less clear with avian species.

C4.1 Mammalian Toxicity – Ingestion

The BTAG TRV-Low of 2.7 mg[Cu]/kg-day was obtained from a study Pocino *et al.* (1991) wherein copper sulfate was administered to 8- to 10-week-old laboratory mice in drinking water for 10 weeks. BTAG reported that a dose of 26.7 mg[Cu]/kg-day had no adverse effects on number of cells in the thymus, food ingestion rate, body weight, or mortality (no calculations of dose were provided by BTAG). Further BTAG reported that several effects were reported from immune response experiments at doses below the no effect dose of 26.7 mg[Cd]/kg-day. In the immune response studies the test organisms were injected with antigens and exposed to diseases. Such circumstances do not occur in the field and so were considered of questionable ecological importance. Therefore, the reported dose of 26.7 mg[Cd]/kg-day was divided by a subchronic-to-chronic UF of 10 and considered the most appropriate ecologically relevant no effect level in the data set to derive the BTAG TRV-Low.

The BTAG TRV-high of 632 mg[Cu]/kg-day was obtained from Hebert et al. (1993) wherein six-week-old mice were administered copper as copper sulfate pentahydrate in drinking water for 2 weeks. BTAG reported that no adverse effects on food consumption, water consumption, body weight, and survival were observed among rats administered a dose of 211 mg[Cu]/kg-day (no calculations of dose were provided by BTAG). Decreased water consumption, body weight, and survival were observed among mice administered a dose of 632 mg[Cu]/kg-day. Decreased food consumption was observed among mice administered a dose of 1,421 mg[Cu]/kg-day.

C4.1.1 Selected Toxicity Study

An independent toxicological review by the University of California recommended the study by Hebert (1993) to derive chronic NOAEL-equivalent TRVs. University of California toxicologists (UC Davis 2004) reported that no adverse effects on food consumption, water consumption, body weight, and survival were observed among female rats administered a dose of 102 mg[Cu]/kg-day in their drinking water (no calculations of dose were provided by UC Davis). A subchronic-to-chronic UF was applied to 102 mg[Cu]/kg-day to obtain a chronic NOAEL-equivalent dose of 10 mg[Cu]/kg-day.

Subchronic-to-Chronic UF = 10

Chronic NOAEL-equivalent = 102 mg[Cu]/kg-day / 10

= 10 mg[Cu]/kg-day

The dose of 10 mg[Cu]/kg-day (Hebert et al. 1993) was selected for use in deriving baseline ERA TRVs for mammalian wildlife and is considered to be a chronic NOAEL because:

- A subchronic-to-chronic UF was applied to the administered dose to account for a subchronic exposure duration of 2 weeks.
- No adverse effects on food consumption, water consumption, body weight, and survival were observed among rats administered this dose.

Features that support the use of this study include:

- Growth is an individual-level endpoint from which fitness and persistence of populations may be indirectly inferred.
- A serial dosing regime was administered.
- Both a NOAEL and LOAEL were reported, permitting a limited characterization of a dose-response relationship.
- An independent toxicological review by the University of California (UC Davis 2004) supports the use of this value to derive TRVs for wildlife species.
- This study was selected by BTAG to derive the BTAG TRV-High.

C4.1.2 Other Related Toxicity Studies

Seven toxicity studies examining reproductive, developmental/growth, or mortality endpoints were considered for mammals ingesting copper. For perspective, the selected dose and doses from other related toxicity studies are plotted in Figure C5-1.

C4.2 Avian Toxicity – Ingestion

The BTAG TRV-Low of 2.3 mg[Cu]/kg-day was obtained from Norvell et al. (1975) wherein one-day old chicks administered copper as copper sulfate in their diet for 8 weeks. BTAG reported that no effects were observed on weight gain at a dose of 23 mg[Cu]/kg-day (no calculations of dose were provided by BTAG). A decrease in weight gain was reported at a dose of day 46 mg[Cu]/kg-day. The dose at 23 mg/kg-day was the lowest ecologically significant no effect dose and was administered to the sensitive life stage of the test organism; thus, it was used in deriving the low TRV. The reported dose of 23 mg[Cu]/kg-day was divided by a subchronic-subchronic-subchronic-subchronic-to-chronic UF of 10 to render a BTAG TRV-Low of 2.3 mg[Cu]/kg-day.

The BTAG TRV-High of 52 mg[Cu]/kg-day was obtained from Jensen and Maurice (1978) wherein broiler chicks were administered daily doses of cupric sulfate pentahydrate in their feed for 4 weeks. A dose of 26 mg[Cu]/kg-day caused a decrease in body weight, but caused no effect on the gizzard or feed-to-weight gain ratio (no calculations of dose were provided by BTAG). At a dose of 52 mg[Cu]/kg-day, gizzard erosion was reported—gizzard erosion affects feed consumption.

Note that the Association of Avian Veterinarians has established a minimum daily requirement of 8 ppm[Cu] for passerines.

Test Spp: Robin; Body weight = 0.079 kg (mean; U.S. EPA 1993b); Food Intake = 16 g/day (U.S. EPA 1993)

Dosage: 8 ppm[Cu] in diet = 8 mg[Cu]/kg_{food}

Min. Daily Requirement = (8 mg[Cu]/ kgf_{ood} • 16 g/day • 1 kg/1,000 g) / 0.079 kg

= 1.7 mg[Cu]/kg-day

Thus, daily doses less than or equal to approximately 1.7 mg[Cu]/kg-day may result in copper deficiency in similarly sized passerines (i.e., body weight approximately 79 g). An independent toxicological review by the University of California (UC Davis 2004) considered the BTAG TRV-Low of 2.3 mg[Cu]/kg-day to be almost at the dietary requirement and “too low” a value.

C4.2.1 Selected Toxicity Study

The same study used to derive the BTAG TRV-Low was selected (Norvell *et al*. 1975). A basal diet containing 16 ppm[Cu] was considered to be nutritionally adequate by the authors.

No copper-related effect on weight gain was observed among chicks administered dietary concentrations of up to 496 ppm[Cu] (up to 29 mg[Cu]/kg-day[5]).

Test Spp: Chick; Body weight = 0.702 kg (mean of control group at 4 wks, Norvell et al. 1975); Food Intake = 41 g/day (derived from U.S. EPA 1993)

Dosage: 496 ppm[Cu] in diet 496 mg[Cu]/kg_{food}

NOAEL = (496 mg[Cu]/ kg_{food} • 41 g/day • 1 kg/1,000 g) / 0.702 kg = 29 mg[Cu]/kg-day

A decrease in weight was observed among chicks administered a dietary concentration of 736 ppm[Cu] (= 43 mg[Cu]/kg-day).

The dose of 29 mg[Cu]/kg-day was selected for use in deriving baseline ERA TRVs for avian wildlife and is considered to be a chronic NOAEL because:

- The study considered exposure over 8 weeks to an early life stage (1-day-old chicks).
- No adverse effect on growth was observed in 1-day-old chicks administered this dose.

Features that support the use of this study include:

- Growth is an individual-level developmental endpoint from which fitness and persistence of populations may be indirectly inferred.
- Effects to a sensitive life stage (1-day-old chicks) were examined.
- A serial dosing regime was administered.
- Both a NOAEL and LOAEL were reported, permitting a limited characterization of a dose-response relationship.
- An independent toxicological review by the University of California (UC Davis 2004) supports the use of this value to derive TRVs for wildlife species.

The value used to derive baseline ERA TRVs is derived from the same study as the BTAG TRV-Low, but the dose of 29 mg[Cd]/kg-day was not divided by an UF because a the dose was administered to a sensitive life stage (hatching to 56 days of age).

[5] Using the same study, BTAG calculated a dose of 23 mg[Cu]/kg-day—however, calculations were not presented and could not be replicated.

C4.2.2 Other Related Toxicity Studies

Seven toxicity studies examining reproductive, developmental/growth, or mortality endpoints were considered for birds ingesting copper. For perspective, the selected dose and doses from other related toxicity studies are plotted in Figure C5-2.

C5.0 MOLYBDENUM

Molybdenum is an essential micronutrient for most living organisms. The general symptoms of chronic molybdenum intoxication in animals are loss of body weight, anorexia, anemia, deficient lactation, male sterility owing to testicular degeneration, osteoporosis, and bone-joint abnormalities. Molybdenum intoxication may be influenced by sulfate, copper, lead, zinc, and protein intake (Venugopal and Luckey 1978).

No BTAG TRVs for molybdenum were provided by DTSC (2003).

C5.1 Mammalian Toxicity – Ingestion

No mammalian toxicity benchmark for molybdenum is proposed for the baseline ERA.

C5.2 Avian Toxicity – Ingestion

The toxicity benchmark for birds was based on a reproductive study on chickens (Lepore and Miller 1965). A dose of 88 mg[Mo]/kg-day was selected to derive baseline ERA TRVs for avian wildlife and is considered to be an ecologically relevant chronic LOAEL because:

- The study considered exposure over 21 days during a critical and sensitive developmental period (e.g., reproduction).
- Fewer eggs were laid and embryo viability was reduced to zero among chickens administered this dose.

Features that support the use of this study include:

- Egg production and viability of embryos can be directly related to reproductive success.
- Effects to a sensitive life stage (embryos) were examined.
- A serial dosing regime was administered (e.g., control, 500 ppm, 1,000 ppm, and 2,000 ppm[Mo] in diet).

- 6 individuals per treatment were examined.
- An independent review by the U.S. DOE (Sample et al. 1996) supports the use of this study to derive toxicity benchmarks for wildlife species.

Limitations of the data set include the fact that only two relevant studies were obtained and effects were observed at the lowest administered dose. Because adverse effects were observed at the lowest treatment dose, a NOAEL value could not be identified.

C5.2.1 Selected Toxicity Study

Chickens were administered 500 ppm, 1,000 ppm, or 2,000 ppm[Mo] as sodium molybdate in the diet for 21 days (Lepore and Miller 1965). Fewer eggs were laid (15% reduction) and embryo viability was reduced to zero among chickens administered a concentration of 500 ppm[Mo] as sodium molybdate in the diet (= 88 mg[Mo]/kg-day).

Test Spp: Chicken; Body weight = 0.8 kg (Lewis 1992); Food Intake = 140 g/day (Lewis 1992)

Dosage: 500 ppm[Mo] in food = 500 mg[Mo]/kgfood

Effects Level = (500 mg[Mo]/kgfood • 140 g/day • 1 kg/1,000 g) / 0.8 kg = 88 mg[Mo]/kg-day

In the same study, 50 and 80 percent reductions in egg production were observed among birds administered concentrations of 1,000 ppm[Mo] and 2,000 ppm[Mo] as sodium molybdate in their diet, respectively (= 175 and 350 mg[Mo]/kg-day). Because adverse effects were observed at the lowest administered dose, a thorough evaluation of whether the response is dose-related and a characterization of a dose-response relationship are prohibited.

C5.2.2 Other Related Toxicity Studies

Two toxicity studies examining reproductive and/or developmental endpoints were obtained for birds ingesting molybdenum. For perspective, the selected dose and doses from other related toxicity studies are plotted in Figure C5-2.

C6.0 NICKEL

Nickel is an essential micronutrient and is typically found in low concentrations in animal tissue (Hoar 1975). Nickel compounds can be grouped according to their solubility in water: soluble compounds (e.g., nickel chloride, nickel sulfate, nickel nitrate) and insoluble compounds (e.g., nickel oxide, nickel subsulfide). Both the soluble and insoluble nickel compounds are important with regard to all relevant routes of exposure. Generally, the

soluble compounds are considered more toxic than the insoluble compounds. Ingestion of nickel compounds may cause intestinal disorders, convulsions, and asphyxia (Lewis 1992).

C6.1 Mammalian Toxicity – Ingestion

The BTAG TRV-Low of 1.3 mg[Ni]/kg-day was obtained from Smith et al. (1993) wherein nickel chloride was administered to female laboratory rats in their drinking water for 4 months. BTAG reported that at a dose of 1.3 mg/kg-day, no effects were observed on the first litter of pups, but pup mortality increased in the second litter (no calculations of dose were provided by BTAG). This was the lowest effect level in the data set.

The BTAG TRV-High of 32 mg[Ni]/kg-day was obtained from the same study. BTAG reported that a dose of 31.6 mg/kg-day caused an increase in pups born dead or dying shortly after birth. These doses were the only reproductive effect levels in the data set.

Note that a 50 mg[Ni]/kg (3.0 mg[Ni]/kg-day) of ration of nickel is necessary to prevent deficiency in rats (USPHS 1993).

Test Spp: Rat; Body weight = 0.25 kg (Lewis 1992); Food Intake = 15 g/day (Lewis 1992)

Dosage: 50 ppm[Ni] in food = 50 mg[Ni]/kg_{food}

Dietary Requirement = (50 mg[Ni]/kg_{food} • 15 g/day • 1 kg/1,000 g) / 0.25 kg = 1.5 mg[Ni]/kg-day

The BTAG TRV-Low is less than the dietary requirement identified by USPHS (1993). In addition, note that US EPA (IRIS 1999) concluded that “it is hard to define a NOAEL and LOAEL” from the Smith et al. (1993) study “due to the lack of a clear dose-response trend at the lower doses”.

C6.1.1 Selected Toxicity Study

Rats were administered a concentration of 250 ppm, 500 ppm, or 1,000 ppm[Ni] as nickel sulfate hexahydrate in their diet for three generations (Ambrose et al. 1976). Seventeen to twenty female rats and 89 to 211 weanling rats per treatment were examined. No adverse effects on fertility (pregnancies/matings), gestation (litters cast/pregnancies), offspring viability (live pups at Day 5/live pups born), and lactation (weaned/live pups at Day 5) indices were observed among rats administered concentrations of up to 1000 ppm[Ni] as nickel sulfate hexahydrate in their diet (up to 60 mg[Ni]/kg-day).

Test Spp: Rat; Body weight = 0.25 kg (Lewis 1992); Food Intake = 15 g/day (Lewis 1992)

Dosage: 1000 ppm[Ni] in food = 1000 mg[Ni]/kg_{food}

NOAEL = (1000 mg[Ni]/kg_{food} • 15 g/day • 1 kg/1,000 g) / 0.25 kg = 60 mg[Ni]/kg-day

A higher incidence of stillborns was observed only in the first generation among rats administered concentrations of 250 ppm[Ni] or greater as nickel sulfate hexahydrate in their diet (=15mg[Ni]/kg-day or greater). The authors considered this effect to be transitory since no effect on the incidence of stillborns was observed in second or third generations (Ambrose et al. 1976). Reduced weight was observed among weanlings born from rats administered a concentration of 1,000 ppm[Ni] as nickel sulfate hexahydrate in their diet (= 60 mg[Ni]/kg-day); however, from weanling to mating, offspring recovered from this deficit, averaging 92 percent of controls.

This study was selected to derive baseline ERA TRVs for mammalian wildlife because:

- The study considered exposure over three generations.
- No adverse effects on fertility, gestation, offspring viability, and lactation indices were observed among rats administered this dose.
- Observed effects on the incidence of stillborns were considered to be transitory since no effects on stillborns were observed in subsequent generations.

Features that support the use of this study include:

- Fertility, gestation, offspring viability, and lactation were assessed and can be related to the fitness (reproductive success) of individuals and the persistence of populations.
- A serial dosing regime was administered (e.g., control, 250 ppm, 500 ppm, and 1,000 ppm[Ni] in diet).
- Both a NOAEL and LOAEL were reported, permitting a limited characterization of dose-response relationship.
- 17 to 20 females per treatment in each generation and 89 to 211 weanling rats per treatment were examined.
- An independent review by the U.S. DOE (Sample et al. 1996) supports the use of this study to derive toxicity benchmarks for wildlife species.

An independent toxicological review by the University of California (UC Davis 2004) recommended the toxicity benchmark of 6.7 mg[Ni]/kg-day for mammals, which is the geometric mean of a LOAEL of 15 mg[Ni]/kg-day (Ambrose et al. 1976) and the USPHS (1993) dietary value.

C6.1.2 Other Related Toxicity Studies

Six toxicity studies examining reproductive, developmental, or growth endpoints were considered for mammals ingesting nickel. The data for adverse reproductive effects do not demonstrate consistent dose-response relationships. For perspective, the selected dose and doses from other related toxicity studies are plotted in Figure C5-1.

C6.2 Avian Toxicity – Ingestion

The BTAG TRV-Low of 1.4 mg[Ni]/kg-day was obtained from Cain and Pafford (1981) wherein mallard ducklings were administered nickel sulfate in their feed for 90 days. BTAG reported that at a dose of 13.8 mg/kg-day, no effects were observed on tremors or edema in toe and leg joints (no calculations of dose were provided by BTAG). However, tremors or edema in toe and leg joints were observed at 55.2 mg[Ni]/kg-day. A dose of 56.26 mg/kg-day caused a decrease in length to weight ratio of the humerus at 30 days—note that reduced humerus weight:length ratios was not observed at 90 days. BTAG noted that this transient change in bone density may be considered to be of limited ecological relevance. Reduced humerus weight:length ratios did not occur at 14.1 mg[Ni]/kg-day. The reported dose of 13.8 mg/kg-day was divided by an UF of 10 for a subchronic-to-chronic conversion, resulting in a BTAG TRV-Low of 1.4 mg[Ni]/kg-day. The dose of 55.2 mg/kg-day was chosen for the BTAG TRV-High.

C6.2.1 Selected Toxicity Study

The same study used to derive the BTAG TRV-Low was selected (Cain and Pafford 1981). A dose of 14 mg[Ni]/kg-day was selected to derive baseline ERA TRVs for avian wildlife and is considered to be an ecologically relevant chronic NOAEL because:

- The study considered exposure over 90 days during a critical and sensitive developmental period (i.e., from hatching to 90 days of age [through fledging]).
- No adverse effects on survivorship and growth were observed among mallard ducklings administered this dose.

Features that support the use of this study include:

- Although survivorship can be directly related to fitness and the persistence of populations, it is considered a less sensitive endpoint compared to reproductive and developmental endpoints. Growth is individual-level endpoint from which fitness and persistence of populations may be indirectly inferred.

- Effects to a sensitive life stage (ducklings) were examined.
- A serial dosing regime was administered (e.g., control, 176 ppm, 774 ppm, and 1,069 ppm[Ni] in diet).
- Both a NOAEL and LOAEL were reported, permitting a limited characterization of dose-response relationship.
- 36 individuals per treatment were examined.
- Independent reviews by the U.S. Navy (1997) and U.S. DOE (Sample et al.1996) support the use of this study to derive toxicity benchmarks for wildlife species.

The dose of 14 mg[Ni]/mg-day is considered a chronic dose because it was administered to a sensitive life stage (hatchlings through fledglings). An independent toxicological review by the University of California (UC Davis 2004) supports the use of this value to derive TRVs for wildlife species.

C6.2.2 Other Related Toxicity Studies

Five toxicity studies examining growth/survivorship and scatological endpoints were considered for birds ingesting nickel. For perspective, the selected dose and doses from other related toxicity studies are plotted in Figure C5-2.

C7.0 SELENIUM

Selenium is an essential micronutrient in animals and is required in low concentrations. Either deficiency or excess may be associated with serious disease in livestock. Elemental selenium has low acute systemic toxicity. Inorganic selenium compounds may cause dermatitis, loss of appetite, deformation and loss of hooves and hair, and erosion of joints in livestock. Organoselenium compounds may exhibit high toxicity similar to their organometals (Lewis 1992). Selenium may biomagnify in aquatic food chains; however, biomagnification has not been demonstrated conclusively in terrestrial systems (Ohlendorf 1989).

C7.1 Mammalian Toxicity – Ingestion

No mammalian toxicity benchmark for selenium is proposed for the baseline ERA.

C7.2 Avian Toxicity – Ingestion

The BTAG TRV-Low of 0.23 mg[Se]/kg-day was obtained from a study by Heinz et al. (1989) wherein female mallard adults were administered selenium as seleno-DL-methionine in their food for 40 to 50 days. BTAG reported that at a dose of 0.23 mg[Se]/kg-day, no effects were reported on hatchling body weights, survival, and reproductive parameters (no calculations of dose were provided by BTAG). In addition, at a dose of 0.93 mg[Se]/kg-day, a decrease in hatching success was reported. Consequently, the BTAG TRV-High value was set at 0.93 mg[Se]/kg-day.

Mallards are a reasonable test species on which to base the TRV value because dabbling ducks are cited as among the more sensitive birds to embryonic effects from *in ovo* selenium exposure (Skorupa et al. 1991).

C7.2.1 Selected Toxicity Study

A similar study by the same authors used to derive the BTAG TRV-Low was selected (Heinz et al. 1987). In this study, female mallards were administered 1 ppm, 5 ppm, 10 ppm, 25 ppm, or 100 ppm[Se] as sodium selenite in their diet for 78 days during reproduction (Heinz et al. 1987). No adverse effects on growth, adult survival, duckling survival, and deformed embryos were observed among mallards administered concentrations of up to 5 ppm[Se] as sodium selenite in their diet (up to 0.5 mg[Se]/kg-day).

Test Spp: Mallard; Body weight = 1.0 kg (Heinz et al. 1987); Food Intake = 100 g/day (Heinz et al. 1987)

Dosage: 5 ppm[Se] in food = 5 mg[Se]/kg_{food}

NOAEL = (5 mg[Se]/kg_{food} • 100 g/day • 1 kg/1,000 g) / 1.0 kg = 0.5 mg[Se]/kg-day

Increased incidence of deformed embryos was observed among mallards administered concentrations of 10 ppm[Se] or greater in their diet (= 1.0 mg[Se]/kg-day or greater). Reduced duckling survival was observed among mallards administered concentrations of 25 ppm[Se] or greater in their diet (2.5 mg[Se]/kg-day or greater). Reduced adult survival was observed among mallards administered a concentration of 100 ppm[Se] in their diet (= 10 mg[Se]/kg-day).

A dose of 0.5 mg[Se]/kg-day was selected to derive baseline ERA TRVs for avian wildlife and is considered to be an ecologically relevant chronic NOAEL because:

- The study considered exposure over 78 days through reproduction.

- No adverse effects on growth, adult survival, duckling survival, and deformed embryos were observed among mallards administered this dose.

Features that support the use of this study include the fact that

- Growth, adult survival, duckling survival, and deformed embryos can be directly related to reproductive success, from which population-related endpoints (e.g., persistence) may be inferred.
- Effects to a sensitive life stage (ducklings) were examined.
- A serial dosing regime was administered (e.g., control, 1 ppm, 5 ppm, 10 ppm, 25 ppm, and 100 ppm[Se] in diet).
- Both a NOAEL and LOAEL were reported, permitting a limited characterization of a dose-response relationship.
- 10 to 13 pairs per treatment were examined (except 5 pairs were fed a diet of 100 ppm[Se]).
- An independent review by U.S. DOE (Sample et al.1996) supports the use of this study to derive toxicity benchmarks for wildlife species.

NOAEL doses are similar between the two studies—however, selenite, the form of selenium administered by Heinz *et al.* (1987), is the form of selenium likely to be detected in the environment (ATSDR 2002). Selenomethionine is generated and bioconcentrated by algae and aquatic invertebrates. Thus, the BTAG TRV-Low may be more appropriately used for waterfowl and shorebirds in wetland habitats.

C7.2.2 Other Related Toxicity Studies

Five toxicity studies examining reproductive endpoints were obtained for birds ingesting selenium. For perspective, the selected dose and doses from other related toxicity studies are plotted in Figure C5-2.

C8.0 SILVER

Silver is highly immobile in soils when pH is greater than 4 (Kabata-Pendias and Pendias 1992) and sorption of silver by soil components is strong. Ingested silver salts are poorly absorbed and chronic symptoms include changes in blood cells and the gray or blue-gray discoloration of the skin seen in argyria (Venugopal and Luckey 1978). Very little information exists on the effects of dermal or inhalation exposure to silver in animals,

however, these routes are not expected to be significant sources of silver exposure (ATSDR 1997). No studies of cancer or birth defects in animals from eating, drinking, or breathing in silver compounds were found.

No BTAG TRVs for silver were provided by DTSC (2003).

C8.1 Mammalian Toxicity – Ingestion

The toxicity benchmark was based on a survivorship and clinical condition study on rats (Walker 1971). A dose of 65 mg[Ag]/kg-day was selected to derive baseline ERA TRVs for mammalian wildlife and is considered to be an ecologically relevant chronic NOAEL because:

- The study considered exposure over 12 weeks.
- No adverse effects on survivorship, clinical condition, behavior, and fluid consumption were observed among rats administered this dose.

Features that support the use of this study include:

- Survivorship can be directly related to reproductive success, from which the persistence of populations may be inferred.
- A serial dosing regime was administered (e.g., control, 6 mM, 12 mM, and 24 mM[Ag] in drinking water);
- Both a NOAEL and LOAEL were reported, permitting a limited characterization of a dose-response relationship; and
- 12 rats per treatment were examined (except six rats were examined for the 12 mM[Ag] treatment administered over 81 weeks).

A limitation of the data set was that only three relevant studies were obtained.

C8.1.1 Selected Toxicity Study

Male rats were administered 6 mM, 12 mM, and 24 mM[Ag] as silver nitrate in their drinking water for 12 weeks (Walker 1971). Brown- stained muzzles and teeth were observed among male rats administered a concentration of 6 mM[Ag] as silver nitrate in their drinking water (= 65 mg[Ag]/kg-day).

Test Spp: Rat; Body weight = 0.25 kg (Lewis 1992); Water Intake = 25 g/day (Lewis 1992)
Ag molecular wt = 108 g/mole

Dosage: 6 mM[Ag] in water • 108 g/mole = 648 mg[Ag]/L

NOAEL = (648 mg[Ag]/L • 25 ml/day • 1 L/1,000 ml) / 0.25 kg = 65 mg[Ag]/kg-day

No adverse effects on survivorship, clinical condition, behavior, and fluid consumption were observed among these rats (Walker 1971). In a related study, male rats were administered silver nitrate in their drinking water for 81 weeks (Walker 1971). "Excellent clinical condition" for up to 60 weeks was reported among male rats administered a concentration of 12 mM[Ag] as silver nitrate in their drinking water (= 130 mg[Ag]/kg-day). At this dose male rats initially drank less than controls and had a slight decrease in weight (no weights reported); fluid consumption returned to normal levels by 5 days. Between week 76 and week 81, all rats exhibited a rapid deterioration in their clinical condition. Five of six rats recovered slowly when restored to ordinary drinking water; the sixth was killed and examined. In a 2-week study, decreased fluid intake and 25 percent mortality were observed within 5 days among rats administered a concentration of 24 mM[Ag] as silver nitrate in their drinking water (= 260 mg[Ag]/kg-day).

C8.1.2 Other Related Toxicity Studies

Three toxicity studies examining reproductive, survivorship, or behavior were obtained for mammals ingesting silver. For perspective, the selected dose and doses from other related toxicity studies are plotted in Figure C5-1.

C8.2 Avian Toxicity – Ingestion

No avian toxicity benchmark for silver is proposed for the baseline ERA.

C9.0 ZINC

Zinc is a micronutrient essential for the synthesis of DNA and RNA and is required for over 200 enzymes (Eisler 1993). Zinc metabolism and regulation are complex. At low concentrations, zinc deficiencies may be noted, while at higher concentrations, zinc may result in toxic effects. Because of its metabolic role, zinc is actively accumulated by organisms from the environment. However, the uptake of zinc from the environment may differ widely among even closely related species. Additionally, organisms are able to regulate zinc concentrations within their tissues over a range of environmental concentrations (Eisler 1993).

Zinc may interact with other chemicals to either ameliorate or enhance the combined effects. In terrestrial animals, zinc may protect against lead toxicity by reducing assimilation of lead,

reducing lead-induced developmental abnormalities, or protecting against lead-induced testicular effects (Eisler 1993).

C9.1 Mammalian Toxicity – Ingestion

The BTAG TRV-Low of 96 mg[Zn]/kg-day was obtained from Aughey et al. (1977) wherein zinc sulfate was administered to mice in their drinking water for up to 14 months. BTAG reported that a dose of 96 mg[Zn]/kg-day resulted in hypertrophy (enlargement) and vacuolation (formation of cavities in cell protoplasm) of pancreatic islet cells and fasciculata cells in the adrenal cortex (no calculations of dose were provided by BTAG). This chronic histological study was the basis for the BTAG TRV-Low value.

The BTAG TRV-High of 411 mg[Zn]/kg-day was obtained from Schlicker and Cox (1968) wherein zinc oxide was administered to female rats in their feed for up to 36 days. BTAG reported that a dose of 411 mg[Zn]/kg-day resulted in fetal resorption and decreases in fetal weight and fetal liver weight (no calculations of dose were provided by BTAG).

C9.1.1 Selected Toxicity Study

The same study used to derive the BTAG TRV-High was selected (Schlicker and Cox 1968). Rats were administered 2% or 4% [Zn] as zinc oxide in their diet for 16 days (from Day 1 to Day 16 of gestation) (Schlicker and Cox 1968). No adverse effects on mating, fertilization, implantation, and fetal development (malformations) were observed among rats administered a concentration of 0.2 percent[Zn] as zinc oxide in their diet (=120 mg[Zn]/kg-day).

Test Spp: Rat; Body weight = 0.25 kg (Lewis 1992); Food Intake = 15 g/day (Lewis 1992)

Dosage: 0.2% Zn in diet = 2,000 mg[Zn]/kg_{food}

NOAEL = (2,000 mg[Zn]/kg_{food} • 15 g/day • 1 kg/1,000 g) / 0.25 kg = 120 mg[Zn]/kg-day

Decreased fetal growth and 100 percent resorption of 15- and 16-day-old fetuses were observed among rats administered a concentration of 0.4 percent[Zn] (= 240 mg[Zn]/kg-day) as zinc oxide in their diet. This reproductive study was considered more directly related to SSFL assessment endpoints as compared to the histopathological study (Aughey et al. 1977).

A dose of 120 mg[Zn]/kg-day was selected to derive baseline ERA TRVs for mammalian wildlife and is considered to be a chronic NOAEL because:

- The study considered exposure over 16 days during a critical and sensitive developmental period (i.e., from day 1 to day 16 of gestation).

- No adverse effects on fetal development was observed among rats administered zinc at this dose.

Features that support the use of this study include:

- Fetal development and fetal resorption can be directly related to reproductive success, from which the persistence of population may be inferred.
- Effects to a sensitive life stage (fetus) were examined.
- A serial dosing regime was administered (e.g., control, 2% and 4% [Zn] in diet).
- Both a NOAEL and LOAEL were reported, permitting a limited characterization of a dose-response relationship.
- A minimum of 10 females per treatment were examined.
- An independent review by the U.S. DOE (Sample et al. 1996) supports the use of this study to derive toxicity benchmarks for wildlife species.
- An independent toxicological review by the University of California (UC Davis 2004) supports the use of this value to derive TRVs for wildlife species.

C9.1.2 Other Related Toxicity Studies

Seven toxicity studies examining reproductive, developmental/growth, or mortality endpoints were obtained for mammals ingesting zinc. For perspective, the selected dose and doses from other related toxicity studies are plotted in Figure C5-1.

C9.2 Avian Toxicity – Ingestion

No avian toxicity benchmark for zinc is proposed for the baseline ERA.

C10.0 POLYCHLORINATED BIPHENYLS (PCBs)

Polychlorinated biphenyls (PCBs) are a class of 209 possible compounds that consist of a biphenyl molecule to which two or more chlorine atoms are substituted for hydrogen atoms. PCBs strongly absorb to soils and sediments; they are stable, are slow to degrade in the environment, and may biomagnify in higher trophic levels. Most of the congeners that are toxic or persist in the environment contain between four and six chlorine atoms per molecule. Coplanar forms are more directly toxic, whereas noncoplanar forms tend to bioaccumulate

more readily as they are less easily metabolized (Eisler 1986b). Aroclors are mixtures of PCB congeners having different numbers of chlorine atoms.

Aroclors may elicit reproductive, mutagenic, carcinogenic, and systemic effects in mammals. Signs of Aroclor poisoning in mammals include anorexia, fatty liver, kidney degeneration, gastric ulcers, nasal and ocular secretions, muscular incoordination, and morbidity. Birds tend to be more resistant to PCBs than mammals. Signs of Aroclor poisoning in birds include morbidity, tremors, muscular incoordination, eggshell thinning, and effects on reproduction, growth, and behavior.

Although toxicity data for Aroclor 1254 and 1260 were found, few reproductive and developmental toxicity data were found for other Aroclors or total PCBs. However, an abundance of research on QSARs suggests that chemicals with similar molecular structures or physicochemical properties have similar biological activity and toxicity (Donkin 1994; Nirmalakhandan and Speece 1988). Therefore, TRVs for total PCBs were developed based on toxicity data for Aroclors 1254 and 1260.

C10.1 Mammalian Toxicity – Ingestion

The BTAG TRV-Low of 0.36 mg[Aroclor 1254]/kg-day was obtained from a study by Simmons and McKee (1992) wherein Aroclor 1254 was administered to 90-day-old white-footed mice in their feed for 21 days. BTAG reported that a dose of 0.36 mg[Aroclor 1254]/kg-day had no effect on liver weight, enzyme activity, or pentobarbitol-induced sleep time (no calculations of dose were provided by BTAG). Reproductive effects were observed at the next highest dose of 0.71 [Aroclor 1254]/kg-day (in McCoy et al. 1995). Simmons and McKee (1992) did report that 0.36 mg[Aroclor 1254]/kg-day caused an increase in the activity of a specific enzyme (ethoxyresorufin-O-dealkylase). However, this enzymatic effect was not associated with adverse effects or histological changes in choroid epithelial cells. A limitation of the study is that examined endpoints that are not directly related to SSFL assessment endpoints as compared to a reproductive impairment study.

The BTAG TRV-High of 1.28 mg[Aroclor 1254]/kg-day was obtained from a study by Linzey (1987) wherein Aroclor 1254 was administered to white-footed mice in their feed for up to 18 months. BTAG reported that a dose of 1.28 mg[Aroclor 1254]/kg-day resulted in decreased survival of pups to 28 days of age, increased birth intervals, and decreased numbers of young per litter (no calculations of dose were provided by BTAG). Linzey (1988) confirmed impaired reproduction at this dose in a later multigenerational study showing reduced reproductive success in the second generation. A limitation of the study

was that only a single dose treatment was studied, prohibiting a characterization of a dose-response relationship.

C10.1.1 Selected Toxicity Study

The BTAG TRV-Low selected to derive baseline ERA TRVs for mammalian wildlife.

C10.1.2 Other Related Toxicity Studies

Seventeen toxicity studies for mammals were found that included ingestion of Aroclor: seven acute mortality and ten reproductive/developmental studies. For perspective, the selected dose and doses from other related toxicity studies are plotted in Figure C5-1.

C10.2 Avian Toxicity – Ingestion

The BTAG TRV-Low of 0.09 mg[Aroclor 1254]/kg-day was obtained from a study by Platonow and Reinhart (1973) wherein Aroclor 1254 was administered to chickens in their feed for 39 weeks. This study reported that PCBs accumulated in tissues are transferred to the egg during laying. A dose of 0.88 mg[Aroclor 1254]/kg-day resulted in reduced egg production (no calculations of dose were provided by BTAG). The dose of 0.88 [Aroclor 1254]/kg-day was divided by an effect-to-NOAEL UF of 10, resulting in the BTAG TRV-Low of 0.09 [Aroclor 1254]/kg-day.

The BTAG TRV-High of 1.27 mg[Aroclor 1242]/kg-day was obtained from a study by Britton and Huston (1973) wherein Aroclor 1242 was administered to chickens in their feed for 6 weeks. BTAG reported that at a dose of 1.27 mg/kg-day, a decrease in hatchability was observed. BTAG noted that adverse effects were also reported at this dose in Harris et al. (1976), including a decrease in the weight of the bursa of Fabricus in the progeny of hens fed a variety of Aroclors. The bursa of Fabricus is a thymus-like organ with immunologic functions.

BTAG reported that concentrations passed to the egg reach a maximum after several months of ingestion by the hen and concluded that longer exposure durations may more accurately predict reproductive effects caused by PCBs.

C10.2.1 Selected Toxicity Study

Breeding pairs of screech owls (*Otus asio*) were administered oral doses of Aroclor 1242 in their diet for two generations (McLane and Hughes 1980). No adverse effects on fertility and

hatching success were observed among owls administered a dose of 3 ppm[Aroclor 1248] in their diet (= 0.42 mg[Aroclor 1248]/kg-day).

Test Spp: Screech owl; Body weight = 0.18 kg (Dunning 1984); Food intake = 25 g/day (Pattee et al. 1988, as cited in Sample et al. 1996

Dosage: 3 ppm[Aroclor 1248] in diet = 3 mg[Aroclor 1248]/kg_{food}

NOAEL = (3 mg[Aroclor 1248]/kg_{food} • 25 g/day • 1 kg/1,000 g) / 0.18 kg

= 0.42 mg[Aroclor 1248]/kg-day

A limitation of this study is the fact that only one dose level was administered, prohibiting a characterization of a dose-response relationship. However, use of the value from this study may overestimate risks since no adverse effects were reported at the only dose administered.

A dose of 0.42 mg[PCB]/kg-day was selected to derive baseline ERA TRVs for avian wildlife and is considered to be an ecologically relevant chronic NOAEL because:

- The study considered exposure over two generations, including during reproduction.
- No adverse effects on fertility and hatching success were observed among birds administered this dose.

Features that support the use of this study include:

- Fertility and hatching success can be related to reproductive success.
- A sensitive life stage was examined (e.g., embryo).
- A wildlife species was examined.

In the study selected by BTAG, effects were observed at the lowest dose administered—i.e., a NOAEL-equivalent value was estimated by applying an effects-to-NOAEL UF. Rather than estimating a NOAEL, the McLane and Hughes (1980) study documented an observable NOAEL that was less than the LOAEL dose administered by Planatov and Reinhardt (1973)—an actual NOAEL that was less than the reported LOAEL was considered to be preferable over a calculated NOAEL.

C10.2.2 Other Related Toxicity Studies

Twenty-two mortality and reproductive toxicity studies for birds were found for the ingestion of PCBs. For perspective, the selected dose and doses from other related toxicity studies are plotted in Figure C5-2.

C11.0 ETHYLBENZENE

Ethylbenzene is an aromatic and volatile compound that occurs naturally in coal tar and petroleum and is found in many anthropogenic substances such as paints, inks, insecticides, and gasoline. Ethylbenzene moves easily into air from water and soil where some organisms may be exposed via inhalation. The inhalation of ethylbenzene can result in death, fetal resorption, skeletal development retardation, malformations (i.e., supernumerary ribs), hematological changes, liver and kidney toxicity, eye irritation, and central nervous system depression. Oral exposure to ethylbenzene can result in death, liver and kidney toxicity, and possible carcinogenesis.

No BTAG TRVs for ethylbenzene were provided by DTSC (2003).

C11.1 Mammalian Toxicity – Inhalation

The toxicity benchmark for mammals was based on a reproductive study on rats (Ungvary and Tatrai 1985). A concentration of 150 mg[ethylbenzene]/m^3 in air was selected to derive baseline ERA TRVs for mammalian wildlife and is considered to be an ecologically relevant chronic NOAEL because:

- The study considered exposure over 9 days during a significant portion of the reproductive period.
- Increased fetal resorption, percent skeletal retarded fetuses, and percent fetuses with any malformation were observed among rats that were administered this concentration for 24 hours per day.

Features that support the use of this study include:

- Fetal resorption, fetus weight, retardation of skeletal development, and malformations can be directly related to reproductive success.
- Effects to a sensitive life stage (e.g., fetus) were examined.
- A serial dosing regime was administered (e.g., control, 600, 1,200, and 2,400 mg[ethylbenzene]/m^3 in air).
- Both a NOAEL and LOAEL were reported, permitting a limited characterization of a dose-response relationship.
- At least 17 females per treatment were examined.

C11.1.1 Selected Toxicity Study

Rats were administered 600, 1,200, or 2,400 mg[ethylbenzene]/m^3 in air for 24 hours per day for 9 days during reproduction (from day 7 to day 15 of gestation) (Ungvary and Tatrai 1985). No adverse effects on fetal resorption, fetus weight, and retardation of skeletal development were observed among fetuses born to rats that were administered a concentration of 600 mg[ethylbenzene]/m^3 in air for 6 hours per day (= 107 mg[ethylbenzene]/m^3, corrected for 24 hour/day).

Dosage: 600 mg[ethylbenzene]/m^3

NOAEL = 600 mg[ethylbenzene]/m^3 • 6 hrs/24 hrs

= 150 mg[ethylbenzene]/m^3 for 24 hrs/day

Increased fetal resorption, percent skeletal retarded fetuses, and percent fetuses with any malformation were observed among fetuses born to rats that were administered concentrations as low as 600 mg[ethylbenzene]/m^3 in air for 24 hours per day. In a related 10-day study (from day 6 to day 15 of gestation), no adverse effects on fetal resorption, fetus weight, retardation of skeletal development, and malformations were observed among fetuses born to mice that were administered a concentration of 500 mg[ethylbenzene]/m^3 in air for 12 hours per day (= 250 mg[ethylbenzene]/m^3, corrected for 24 hour/day) and among fetuses born to rabbits that were administered a concentration of 500 mg[ethylbenzene]/m^3 in air for 24 hours per day (Ungvary and Tatrai 1985).

C11.1.2 Other Related Toxicity Studies

Five toxicity studies examining reproductive endpoints were obtained for mammals inhaling ethylbenzene. No reproductive studies over one or more generations of mammals were found for inhalation exposures to ethylbenzene. For perspective, the selected dose and doses from other related toxicity studies are plotted in Figure C5-3 (see also Table C5-5).

C11.2 Avian Toxicity – Inhalation

No avian inhalation toxicity benchmark for ethylbenzene is proposed for the baseline ERA.

C12.0 TETRACHLORETHENE

Tetrachloroethylene or perchloroethylene (PCE) is a synthetic chemical that is widely used for metal-degreasing operations. It is also used as a starting material (building block) for making other chemicals and is used in some consumer products. Tetrachloroethylene is a

nonflammable liquid at room temperature. It evaporates easily into the air and has a sharp, sweet odor. The chemical is found most frequently in air and, less often, in water.

No BTAG TRVs for PCE were provided by DTSC (2003).

C12.1 Mammalian Toxicity – Inhalation

The toxicity benchmark for mammals was based on a developmental study on rats (Nelson et al. 1980). A concentration of 198 mg[PCE]/m^3 in air was selected to derive baseline ERA TRVs for mammalian wildlife and is considered to be an ecologically relevant chronic NOAEL because:

- The study considered exposure over 7 days including a significant portion of the reproductive period.
- No adverse effect on number of offspring, proportion of offspring born alive, or offspring birth weights were observed among rats administered this concentration.

Features that support the use of this study include:

- Number of offspring, proportion of offspring born alive, and offspring birth weights can be directly related to reproductive success.
- Effects to a sensitive life stage (e.g., fetus) were examined.
- A serial dosing regime was administered (i.e., control, 100, 900 ppm[PCE]).
- 15-19 dams per treatment were examined.
- Use of this concentration is supported by the results of Schwetz et al. (1975) and Hardin et al. (1981).

C12.1.1 Selected Toxicity Study

Pregnant Sprague-Dawley rats were exposed to 0, 100, or 900 ppm[PCE] from day 14 to day 20 of gestation or to 0 or 900 ppm[PCE] from day 7 to day 13 of gestation (Nelson et al. 1980). All exposures were for 7 hours per day. No adverse effects on the number of offspring, proportion of offspring born alive, offspring birth weights, and behavioral changes were observed among rats administered 100 ppm[PCE] in air (= 198 mg[PCE]/m^3, corrected for 24 hrs/day).

Test Spp: Rat; Molecular wt PCE = 166 mg/mM; Molar volume = 24.45 m^3/mM

Dosage: 100 ppm[PCE] in air

NOAEL = 100 ppm[PCE] • 166 mg/mM / 24.45 m^3/mM = 679 mg[PCE]/m3

NOAEL = 679 mg[PCE]/m3 • 7 hrs/24 hrs

= 198 mg[PCE]/m3 for 24 hrs/day

No adverse effects on the number of offspring, proportion of offspring born alive, offspring birth weights, and behavioral changes were observed among rats administered 900 ppm[PCE] in air. Effects occurred after exposure to 900 ppm[PCE] for both exposure periods. Pups of dams exposed to 900 ppm from day 7 to day 13 of gestation had decreased performance during tests of neuromuscular ability (ascent on a wire mesh screen and rotarod balancing) on certain days. Offspring (before weaning) from dams exposed to 900 ppm from day 14 to day 20 of gestation performed poorly on the ascent test on test day 14 only, but later in development their performance in the rotarod balancing test was superior to the controls, and they were more active in an open-field test.

C12.1.2 Other Related Toxicity Studies

Four reproductive and two growth studies for mammals were found for the inhalation of PCE. For perspective, the selected dose and doses from other related toxicity studies are plotted in Figure C5-3.

C12.2 Avian Toxicity – Inhalation

No avian inhalation toxicity benchmark for tetrachloroethene is proposed for the baseline ERA.

C13.0 TOLUENE

Toluene is an aromatic and volatile compound that is utilized as an intermediate chemical process constituent, a paint and coating solvent, and a gasoline additive. Animals are exposed to toluene primarily via inhalation of vapor or the ingestion of tainted foods, soils, and drinking water. A principal effect of toluene through acute exposure is respiratory irritation and depression of the central nervous system, which can result in death at high level but is reversible following exposure at moderate levels. Chronic inhalation of toluene has caused body and liver weight changes and hematocrit decreases. Sufficiently excessive levels of inhaled toluene can result in toxic effects to the heart. In spite of such toxic hazards following acute exposure to toluene, it appears to be limited in producing permanent effects to organs and physiological systems. Toluene does not have a high potential for biomagnification through the food chain based on its chemical properties.

No BTAG TRVs for toluene were provided by DTSC (2003).

C13.1 Mammalian Toxicity – Inhalation

The toxicity benchmark for mammals was based on a reproductive study on mice (National Toxicology Program [NTP] 1990). A concentration of 218 mg[toluene]/m^3 in was selected to derive baseline ERA TRVs for mammalian wildlife and is considered to be an ecologically relevant chronic NOAEL because:

- The study considered exposure over 2 years.
- No histopathological lesions in ovaries or testes were observed among mice that were administered this concentration.

Features that support the use of this study include:

- Lesions in ovaries and testes were considered a reproductive endpoint, but are difficult to relate to reproductive success.
- Effects to a sensitive life stage (e.g., fetus) were examined.
- A serial dosing regime was administered (e.g., control, 600, and 1,200 ppm[toluene] in air).
- 120 individuals per treatment were examined.

The data set was limited because no adverse effects were observed at the highest administered dose and the use of this concentration as the toxicity benchmark may overestimate risks to mammalian wildlife receptors.

C13.1.1 Selected Toxicity Study

Rats and mice were administered 600 or 1,200 ppm[toluene] in air for 6.5 hours per day, 5 days per week for 24 months (NTP 1990). No histopathological lesions in ovaries or testes were observed among rats that were administered concentrations of up to 300 ppm[toluene] (up to 218 mg[toluene]/m^3, corrected for a 24 hours/day, 7 days/week duration) in air or among mice that were administered concentrations of up to 1,200 ppm[toluene] (up to 873 mg[toluene]/m^3, corrected for a 24 hours/day, 7 days/week duration) in air.

Test Spp: Rat; Molecular wt toluene = 92 mg/mM; Molar volume = 24.45 m3/mM

Dosage: 300 ppm[toluene] in air

NOAEL = 300 ppm[toluene] • 92 mg/mM / 24.45 m^3/mM

= 1,129 µg[toluene]/L = 1,130 mg[toluene]/m^3

NOAEL = 1,129 mg[toluene]/m^3 • 6.5 hrs/24 hrs • 5 days/7 days

= 218 mg[toluene]/m^3 for 24 hrs/day, 7 days/week

Test Spp: Mouse; Molecular wt toluene = 92 mg/mM; Molar volume = 24.45 m^3/mM

Dosage: 1,200 ppm[toluene] in air

NOAEL = 1,200 ppm[toluene] • 92 mg/mM / 24.45 m^3/mM

= 4,515 µg[toluene]/L = 4,515 mg[toluene]/m^3

NOAEL = 4,515 mg[toluene]/m^3 • 6.5 hrs/24 hrs • 5 days/7 $days^3$

= 873 mg[toluene]/m^3 for 24 hrs/day, 7 days/week

The effects of histopathological changes on reproductive performance or reproductive success were not discussed by the authors. Because no adverse effects were observed at the highest administered dose, a thorough evaluation and characterization of a dose-response relationship are prohibited.

C13.1.2 Other Related Toxicity Studies

Eight toxicity studies examining reproductive, developmental/growth, or mortality endpoints were obtained for mammals inhaling toluene. For perspective, the selected dose and doses from other related toxicity studies are plotted in Figure C5-3.

C13.2 Avian Toxicity – Inhalation

No avian inhalation toxicity benchmark for toluene is proposed for the baseline ERA.

C14.0 TRICHLOROETHENE

Trichloroethene (TCE) is a nonflammable, colorless liquid at room temperature with a somewhat sweet odor and a sweet, burning taste. This man-made chemical does not occur naturally in the environment. TCE is now mainly used as a solvent to remove grease from metal parts; it is also used as a solvent in other ways and is used to make other chemicals. TCE can also be found in household products, including typewriter correction fluid, paint removers, adhesives, and spot removers. It evaporates easily but can stay in soils and groundwater. Once it is in the air, it has a half-life of approximately one week; it takes weeks to break down in surface water. Very little TCE breaks down in the soil, and therefore it can pass through the soil into groundwater. In groundwater, the breakdown process is much slower because of the much slower evaporation rate. In the body, TCE may break down into dichloroacetic acid, trichloroacetic acid, chloral hydrate, and 2-

chloroacetaldehyde. These metabolic breakdown products may be toxic to animals (ATSDR 1997).

No BTAG TRVs for TCE were provided by DTSC (2003).

C14.1 Mammalian Toxicity – Inhalation

The toxicity benchmark for mammals was based on a reproductive study on rats (Dorfmueller et al. 1979). A concentration of 1,735 mg[TCE]/m^3 in air was selected to derive baseline ERA TRVs for mammalian wildlife and is considered to be an ecologically relevant chronic NOAEL because:

- The study considered exposure over 5 weeks including a significant portion of the reproductive period.
- No adverse effects on growth, number of implantations, fetal resorptions, live/dead fetuses per litter, skeletal and soft tissue anomalies, and activity were observed among rats administered this concentration.

Features that support the use of this study include:

- Number of implantations, fetal resorptions, live/dead fetuses per litter, and skeletal and soft tissue anomalies can be directly related to reproductive success.
- Effects to a sensitive life stage (e.g., fetus) were examined.
- A serial dosing regime was administered (e.g., control, 1,800 ppm[TCE] in air prior to mating only, 1,800 ppm[TCE] in air during pregnancy only, and 1,800 ppm[TCE] in air prior to mating and during pregnancy).
- Both a NOAEL and LOAEL were reported, permitting a limited characterization of a dose-response relationship.
- 30 individuals per treatment were examined.

C14.1.1 Selected Toxicity Study

Rats were administered filtered air during the entire experiment, or 1,800 ppm[TCE] in air two weeks prior to mating, or 1,800 ppm[TCE] in air from day 1 to day 20 of pregnancy, or 1,800 ppm[TCE] in air two weeks prior to mating and from day 1 to day 20 of pregnancy (Dorfmueller et al. 1979). During the two-week period prior to mating, rats were administered TCE in air for 6 hours per day, 5 days per week and during the period from

Day 1 to Day 20 of pregnancy, rats were administered TCE in air for 6 hours per day, 7 days per week. No treatment-related adverse effects on maternal toxicity, growth, number of implantations, fetal resorptions, live/dead fetuses per litter, skeletal and soft tissue anomalies, and activity were observed among rats administered a concentration of 1,800 ppm[TCE] (= 1,735 mg[TCE]/m^3, corrected for 24 hrs/day, 7 days/week) in air prior to mating and during reproduction.

Test Spp: Rat; Molecular wt. TCE = 132 mg/mM; Molar volume = 24.45 m^3/mM

Dosage: 1,800 ppm[TCE] in air;

NOAEL = 1,800 ppm[TCE] • 132 mg/mM / 24.45 m^3/mM
= 9,718 µg[TCE]/L = 9,718 mg[TCE]/m^3

NOAEL = 9,718 mg[TCE]/m^3 • 6 hrs/24 hrs • 5 days/7 days
= 1,735 mg[TCE]/m^3 for 24 hrs/day, 7 days/week

The data set was limited because no adverse effects were observed at the highest administered dose, and the use of this concentration as the toxicity benchmark may overestimate risks to mammalian wildlife receptors.

C14.1.2 Other Related Toxicity Studies

No studies have been found that conclusively indicate teratogenic effects due to exposures to TCE (ATSDR 1997). Three reproductive and developmental toxicity studies for mammals were found for the inhalation of TCE. For perspective, the selected dose and doses from other related toxicity studies are plotted Figure C5-3.

C14.2 Avian Toxicity – Inhalation

No avian inhalation toxicity benchmark for trichloroethene is proposed for the baseline ERA.

C15.0 XYLENE

Xylene generally occurs as a man-made VOC that is produced from petroleum and coal. It exists naturally in petroleum and coal tar, and is also released by forest fires. Xylene is used in solvents, thinners, coatings, cleaning agents, airplane fuels and gasoline, and in other capacities in the chemical industry. Three distinct isomers of xylene exist (m-, o-, and p-xylene); xylene encountered is usually a mixture of the three isomers. Xylene evaporates rapidly into the air. Inhalation of xylene may result in restricted breathing, respiratory irritation, possible adverse cardiovascular effects, increased liver and kidney weights, liver and kidney chemistry perturbations, neurotoxic effects (e.g., tremors), and death by

respiratory failure and/or sudden ventricular fibrillation. Developmental effects include fetotoxic effects such as skeletal variations, fetal resorptions, and decreased fetal weights. Oral ingestion of xylene can induce increased liver and kidney weights, liver enzymatic changes, lowered food consumption, reduced body weight gain, impaired visual function, hyperactivity, and mortality. Xylenes do not have a high potential for biomagnification through the food chain based on their chemical properties.

No BTAG TRVs for xylenes were provided by DTSC (2003).

C15.1 Mammalian Toxicity – Inhalation

The toxicity benchmark for mammals was based on a reproductive study on rats (Ungvary et al. 1980). A concentration of 150 mg[xylene]/m^3 in air was selected to derive baseline ERA TRVs for mammalian wildlife and is considered to be an ecologically relevant chronic LOAEL because:

- The study considered exposure over 8 days including a significant portion of the reproductive period.
- Increased incidence of skeletal retardation (unspecified) was observed among rats that were administered this concentration.
- No adverse effects on maternal weight gain, number of litters, number of live fetuses, number of fetal resorption, and fetal loss in implantations, mean fetal weight, hepatic an renal histology, and hepatic an renal histochemistry were observed among rats that were administered this concentration.

Features that support the use of this study include:

- Maternal weight gain, number of litters, number of live fetuses, number of fetal resorption, fetal loss in implantations, and mean fetal weight can be directly related to reproductive success.
- Increased incidence of skeletal retardation (unspecified) may be used to indirectly infer fitness and persistence of populations.
- Effects to a sensitive life stage (e.g., fetus) were examined.
- A serial dosing regime was administered (e.g., control, 150, 1,500, and 3,000 mg[xylene]/m^3 in air).
- Both a NOAEL and LOAEL were reported, permitting a limited characterization of a dose-response relationship.

- Adverse reproductive effects at concentrations greater than 1,000 mg[xylene]/m^3 is consistent with other studies, in particular Balogh *et al.* (1982, as reported in ATSDR 2002).
- 20 to 30 individuals per treatment were examined.

C15.1.1 Selected Toxicity Study

Rats were administered 150, 1,500, and 3,000 mg[xylene]/m^3 in air (m-, o-, or p-xylene) for 24 hours per day for 8 days during reproduction (from Day 7 to Day 14 of gestation) (Ungvary et al. 1980). No adverse effects on maternal weight gain, number of litters, number of live fetuses, number of fetal resorption, and fetal loss in implantations were observed among rats that were administered concentrations of up to 1,500 mg[m-, o-, or p-xylene]/m^3 in air for 24 hours per day.

Reduced mean fetal weight was observed among rats that were administered 1,500 mg[o-xylene]/m^3 and 3,000 mg[m- or p-xylene]/m^3. Increased incidence of fetal skeletal retardation (unspecified) was not observed among rats administered m-xylene, was observed among rats that were administered a concentration of 3,000 mg[o-xylene]/m^3, and was observed among rats that were administered a concentration of 150 mg[p-xylene]/m^3. Note that no changes in histology, histochemistry, or ultrastructure of organs that could be indicative of retardation were observed at a concentration of 150 mg[o-, m-, or p-xylene]/m^3—changes in renal histochemistry that may be indicative of the retardation of the enzyme system related to maturity were observed at 3,000 mg[o-, m-, or p-xylene]/m^3.

Though the authors concluded that skeletal retardation was likely due to the "…relative starvation of the mothers…", no effects on maternal weight were observed at all administered concentrations and no effect on caloric intake during gestation specific to p-xylene relative to other isomers could be discerned. Further, the authors concluded that "…teratogenicity of o-, m-, and p-xylene can be excluded in rats."

C15.1.2 Other Related Toxicity Studies

Six toxicity studies examining reproductive endpoints were obtained for mammals inhaling xylene. For perspective, the selected dose and doses from other related toxicity studies are plotted in Figure C5-3.

C15.2 Avian Toxicity – Inhalation

No avian inhalation toxicity benchmark for xylene is proposed for the baseline ERA.

C16.0 LITERATURE CITED

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TABLES

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Table C5-1
Mammalian BERA TRVs — Toxicity Study Background Information

Chemical	Test Species	Age	Observed Effect	Effect Level	Exposure Duration	Food Conc. (mg/kg)	Water Conc. (mg/L)	Expo Freq	Ingest. Rate (g/d)	Drink Rate (mL/d)	Body Weight (kg)	Toxicity Benchmark (mg/kg-d)	Reference	Uncertainty Factor: Subchronic-to-Chronic	Uncertainty Factor: Endpoint-to-NOAEL
Inorganics															
Antimony	Mouse	Not given	• No adverse effect on survivorship, and no histopathological changes and only minor reductions in growth at 540 days and median life span	NOAEL	Lifetime		5			5	0.025	1.0	Schroeder *et al.* 1968	—	—
Cadmium	Rat	Adult	• No adverse effects on number of copulating females, number of pregnant females, total implants, live fetuses, average fetal weight, and male fertility	NOAEL	12 weeks						0.25	1.0	Sutou *et al*. 1980b	—	—
Copper	Mice	6-week-old	• No adverse effects on number of cells in the thymus, food ingestion rate, body weight, or mortality	NOAEL	10 weeks		No calculations of dose were provided by UC Davis (2004)					102	Hebert *et al.* 1993	10	—
Molybdenum	• No BERA toxicity benchmark is proposed •														
Nickel	Rat	Adult & Weanling	• At 15 mg/kg-day, no adverse effects on fertility, gestation, offspring viability, and lactation indices(Ambrose *et al.* 1976) • 3.0 mg/kg-day = dietary requirement (USPHS 1993)	NOAEL	3 generations		Dose is the geometric mean of the values provide in Ambrose *et al.* 1975 and USPHS 1993 (UC Davis 2004)					6.7	Ambrose *et al*. 1976; USPHS 1993	—	—
Selenium	• No BERA toxicity benchmark is proposed •														
Silver	Rat	Adult	• "Excellent clinical condition" was reported and no adverse effect on behavior and fluid consumption	NOAEL	12 weeks		648			25	0.25	65	Walker 1971	—	—
Zinc	Rat	Adult	• No adverse effect on fetal development	NOAEL	16 days (gestation)	2,000			15		0.25	120	Schlicker & Cox 1968	—	—
Volatile Organic Compounds -- Inhalation Only															
BTEX															
Toluene	Rat	Adult	• No histopathological lesions in ovaries or testes	NOAEL	2 years			6.5 hrs/day, 5 days/week			0.025	218 mg/m^3	NTP 1990	—	—
Ethylbenzene	Rat	Adult	• Increased fetal resorption, percent skeletal retarded fetuses, and percent fetuses with any malformation	LOAEL	9 days (gestation)			24 hrs/day			0.25	150 mg/m^3	Ungvary & Tatrai 1985	—	10
Xylene	Rat	Adult	• No adverse effects on maternal weight gain, number of litters, number of live fetuses, number of fetal resorption, fetal loss in implantations, and mean fetal weight	NOAEL	8 days (gestation)			24 hrs/day			0.25	1,500 mg/m^3	Ungvary *et al.* 1980	—	—
Trichloroethene-Related VOCs															
Tetrachloroethene	Rat	Adult	• No adverse effect on number of offspring, proportion of offspring born alive, offspring birth weights	NOAEL	7 days (gestation)			7 hrs/day			0.25	198 mg/m^3	Nelson *et al.* 1980	—	—
Trichloroethene	Rat	Adult	• No adverse effects on growth, number of implantations, fetal resorptions, live/dead fetuses per litter, and skeletal and soft tissue anomalies	NOAEL	5 weeks (gestation)			6 hrs/day, 5 days/week			0.25	1,735 mg/m^3	Dorfmueller *et al.* 1979	—	—
Polychlorinated Biphenyls															
Total PCBs	White-footed mouse	90-day-old	• No adverse effect on liver weight, enzyme activity, or pentobarbitol-induced sleep time	NOAEL	21 days		No calculations of dose were provided by BTAG					0.36	Simmons and McKee 1992	—	—

Definitions:

g/d - Grams per day.
kg - Kilogram.
mg/kg - Milligrams per kilogram.
mg/kg-d - Milligrams per kilogram per day.
mg/L - Milligrams per liter.
mg/m^3 - Milligrams per meter cubed.
mL/d - Milliliters per day.
NOAEL - No observed adverse effect level.
LOAEL - Low observed adverse effect level.
PCBs - Polychlorinated biphenyls.
TRV - Toxicity reference value.
VOCs - Volatile organic chemicals.

Table C5-2
Avian BERA TRVs — Toxicity Study Background Information

Chemical	Test Species	Age	Observed Effect	Effect Level	Exposure Duration	Food Conc. (mg/kg)	Water Conc. (mg/L)	Ingest. Rate (g/d)	Drink Rate (ml/d)	Body Weight (kg)	Toxicity Benchmark (mg/kg-d)	Reference	Uncertainty Factor: Subchronic-to-Chronic	Uncertainty Factor: Endpoint-to-NOAEL
Inorganics														
Antimony	• No BERA toxicity benchmark is proposed •													
Cadmium	Mallard	1-day-old ducklings	• No effects on blood chemistry, serum chemistry, body or liver weight, and no degenerative effects in gizzard, intestine, liver, kidney, heart, lung, spleen, or skeletal muscle	NOAEL	12 weeks	9.2	No calcuations of dose were provided by BTAG				0.80	Cain *et al*. 1983	—	—
Copper	Chicks	1- day-old chicks	• No adverse effects on growth (weight gain)	NOAEL	8 weeks	496		41		0.70	29	Norvell *et al.* 1975	—	—
Molybdenum	Chicken	7 months	• Fewer eggs were laid and embryo viability was reduced	LOAEL	21 days	500		140		0.80	88	Lepore & Miller 1965	—	10
Nickel	Mallard	1-day-old ducklings	• No adverse effects on survivorship and growth	NOAEL	90 days	No calculations of dose were provided by BTAG					14	Cain & Pafford 1981	—	—
Selenium	Mallard	Adult	• No adverse effects on growth, adult survival, duckling survival, and deformed embryos	NOAEL	78 days	5		100		1.0	0.5	Heinz et al. 1987	—	—
Silver	• No BERA toxicity benchmark is proposed •													
Zinc	• No BERA toxicity benchmark is proposed •													
Volatile Organic Compounds														
BTEX														
Toluene	• No BERA toxicity benchmark is proposed •													
Ethylbenzene	• No BERA toxicity benchmark is proposed •													
Xylene	• No BERA toxicity benchmark is proposed •													
Trichloroethene-Related VOCs														
Tetrachloroethene	• No BERA toxicity benchmark is proposed •													
Trichloroethene	• No BERA toxicity benchmark is proposed •													
Polychlorinated Biphenyls														
Total PCBs	Screech owl	Adult	• No adverse effects on fertility and hatchability	NOAEL	2 generations	3		25		0.2	0.42	McLane & Hughes 1980	—	—

Definitions:

g/d - Grams per day.
kg - Kilogram.
mg/kg - Milligrams per kilogram.
mg/kg-d - Milligrams per kilogram per day.
mg/L - Milligrams per liter.
mL/d - Milliliters per day.
NOAEL - No observed adverse effect level.
LOAEL - Low observed adverse effect level.
PCBs - Polychlorinated biphenyls.
TRV - Toxicity reference value.
VOCs - Volatile organic chemicals.

Table C5-3.
Selected Mammalian Ingestion Toxicity Data

Chemical	Reference	Dose (mg/kg-day)	Endpoint	Study Type
Antimony	Bradley and Fredrick 1941	894	LD	Survivorship
Antimony	Environ. Qual. Saf. Suppl. 1975	7000	LD	Survivorship
Antimony	Schroeder et al. 1968	1.0	NOAEL	Growth
Cadmium	Eisler 1985, HSDB 1994, RTECS 1994	37	LD	Survivorship
Cadmium	Eisler 1985, HSDB 1994, RTECS 1994	890	LD	Survivorship
Cadmium	Schroeder and Mitchener 1971	2.6	LOAEL	Reproductive
Cadmium	Venugopal 1978	40	LOAEL	Reproductive
Cadmium	Webster 1988	10	LOAEL	Developmental
Cadmium	Hastings et al. 1978	12	LOAEL	Developmental
Cadmium	Sutou et al. 1980	10	LOAEL	Reproductive
Cadmium	Pond and Walker 1976	12	LOAEL	Growth
Cadmium	Koller and Roan 1977	110	LOAEL	Growth
Cadmium	Valois and Webster 1989	1.9	LOAEL	Histopath
Cadmium	Webster 1988	0.06	NOAEL	Develop
Cadmium	Pond and Walker 1975	12	NOAEL	Reproductive
Cadmium	Sutou et al. 1980	10	NOAEL	Reproductive
Cadmium	Kelman et al. 1978	2.5	NOAEL	Reproductive
Cadmium	Sutou et al. 1980	1.0	NOAEL	Reproductive
Copper	Boyden et al. 1938	240	LD	Survivorship
Copper	Lecyk 1980	144	LOAEL	Developmental
Copper	Aulerich et al. 1982	15	LOAEL	Reproductive
Copper	Hebert et al. 1993	3087	LOAEL	Growth
Copper	Hebert et al. 1993	632	LOAEL	Growth
Copper	Massie and Aiello 1984	65	LOAEL	Lifespan
Copper	Lecyk 1980	96	NOAEL	Develop
Copper	Aulerich et al. 1982	12	NOAEL	Reproductive
Copper	Pocino et al. 1991	2.7	NOAEL	Growth
Copper	Hebert et al. 1993	4157	NOAEL	Reproductive
Copper	Hebert et al. 1993	102	NOAEL	Growth
Copper	Hebert et al. 1993	10	NOAEL	Growth
Copper	Pocino et al. 1991	27	NOAEL	Growth
Copper	Boyden et al. 1938	30	NOAEL	Growth
Copper	Massie and Aiello 1984	13	NOAEL	Lifespan
Copper	Murthy et al. 1981	13	NOAEL	Neuro/Behav
Copper	Llewellyn et al. 1985	156	NOAEL	Systemic
Nickel	Smith et al. 1993	32	LOAEL	Reproductive
Nickel	RTI 1987	52	LOAEL	Reproductive
Nickel	Vyskocil et al. 1994	6.9	LOAEL	Systemic
Nickel	Ambrose et al. 1976	15	LOAEL	Reproductive
Nickel	Dieter et al. 1988	396	LOAEL	Growth
Nickel	USPHS 1993	3.0	MDR	Dietary
Nickel	Smith et al. 1993	1.3	NOAEL	Reproductive
Nickel	Ambrose et al. 1976	60	NOAEL	Reproductive
Nickel	UC Davis 2004	6.7	NOAEL	
Nickel	Vyskocil et al. 1994	6.9	NOAEL	Growth
Silver	Walker 1971	130	LOAEL	Growth
Silver	Walker 1971	65	NOAEL	Growth
Silver	Olcott 1948	89	NOAEL	Reproductive
Silver	Rungby and Danscher 1984	30	NOAEL	Growth
Zinc	Eisler 1993	680	LD	Survivorship
Zinc	Eisler 1993	1194	LD	Survivorship
Zinc	Schlicker and Cox 1968	411	LOAEL	Reproductive
Zinc	Schlicker and Cox 1968	240	LOAEL	Reproductive
Zinc	Ketcheson et al. 1969	300	LOAEL	Growth
Zinc	Aughey et al. 1977	96	LOAEL	Histopath

Table C5-3.
Selected Mammalian Ingestion Toxicity Data

Chemical	Reference	Dose (mg/kg-day)	Endpoint	Study Type
Zinc	Straube et al. 1980	390	LOAEL	Survivorship
Zinc	Aughey et al. 1977	96	NOAEL	Reproductive
Zinc	Schlicker and Cox 1968	120	NOAEL	Reproductive
Zinc	Uriu-Hare el al. 1989	39	NOAEL	Reproductive
Zinc	Ketcheson et al. 1969	120	NOAEL	Reproductive
Zinc	Maita et al. 1981	180	NOAEL	Growth
Zinc	Aughey et al. 1977	100	NOAEL	Growth
Zinc	Bleavins et al. 1983	21	NOAEL	Reproductive
PCB	Eisler 1986; Sanders & Kirkpatrick 1977; Talcott & Koller 1983	5.6	LD	Survivorship
PCB	Eisler 1986; Sanders & Kirkpatrick 1977; Talcott & Koller 1983	30	LD	Survivorship
PCB	IARC 1978; NAS 1979; USEPA 1980	1300	LD	Survivorship
PCB	IARC 1978; NAS 1979; USEPA 1980	4000	LD	Survivorship
PCB	McCoy et al. 1995	0.71	LOAEL	Systemic
PCB	Linzey 1987	1.3	LOAEL	Reproductive
PCB	Bleavins et al. 1980	0.70	LOAEL	Reproductive
PCB	Welsch 1985	13	LOAEL	Reproductive
PCB	Sanders et al. 1974	140	LOAEL	Systemic
PCB	Gray et al. 1993	25	LOAEL	Reproductive
PCB	RTECS 1994	1.0	LOAEL	Reproductive
PCB	Aulerich and Ringer 1977	0.7	LOAEL	Reproductive
PCB	Simmons and McKee 1992	0.36	NOAEL	Systemic
PCB	Aulerich and Ringer 1980	1.4	NOAEL	Developmental
PCB	Welsch 1985	1.3	NOAEL	Reproductive
PCB	Sanders et al. 1974	140	NOAEL	Reproductive
PCB	Villenueve et al. 1971	10	NOAEL	Reproductive
PCB	Eisler 1986	126	NOAEL	Reproductive
PCB	HSDB 1994	30	NOAEL	Reproductive
PCB	Aulerich and Ringer 1977	0.14	NOAEL	Reproductive

Notes:

LOAEL	Lowest observable adverse effect level
NOAEL	No observable adverse effect level
LD	Lethal dose
MDR	Minimum dietary requirement

Table C5-4.
Selected Avian Ingestion Toxicity Data

Chemical	Reference	Dose (mg/kg-day)	Endpoint	Study Type
Cadmium	Hill et al. 1975	47	LD	Survivorship
Cadmium	Hill et al. 1975	385	LD	Survivorship
Cadmium	Di Giulio and Scanlon	52	LOAEL	Systemic
Cadmium	Hill et al. 1975	500	LOAEL	Survivorship
Cadmium	Leach et al. 1979	8.4	LOAEL	Reproductive
Cadmium	Richardson et al. 1974	10	LOAEL	Developmental
Cadmium	White and Finley 1978	20	LOAEL	Reproductive
Cadmium	White et al. 1978	20	LOAEL	Systemic
Cadmium	Cain et al. 1983	0.8	NOAEL	Systemic
Cadmium	Hill et al. 1975	224	NOAEL	Survivorship
Cadmium	Leach et al. 1979	2.1	NOAEL	Reproductive
Cadmium	White and Finley 1978	1.5	NOAEL	Reproductive
Copper	Shivanandappa et al. 1983	693	LD	Survivorship
Copper	Bakalli et al. 1995	22	LOAEL	Growth
Copper	Jensen and Maurice 1978	52	LOAEL	Growth
Copper	Jensen and Maurice 1978	26	LOAEL	Growth
Copper	Jensen and Maurice 1978	52	LOAEL	Systemic
Copper	Mayo et al. 1956	27	LOAEL	Growth
Copper	Mayo et al. 1956	103	LOAEL	Survivorship
Copper	Mehring et al. 1960	62	LOAEL	Growth
Copper	Norvell et al. 1975	43	LOAEL	Growth
Copper	Van Vleet et al. 1981	149	LOAEL	Systemic
Copper	Shivanandappa et al. 1983	200	LOAEL	Systemic
Copper	Association of Avian Veterinarians	1.7	MDR	Not specified
Copper	Arthur et al. 1958	41	NOAEL	Ill effects
Copper	Humphreys 1989	21	NOAEL	Safe diet
Copper	Humphreys 1989	50	NOAEL	Safe diet
Copper	Mehring et al. 1960	33	NOAEL	Growth
Copper	Norvell et al. 1975	26	NOAEL	Growth
Copper	Underwood et al. 1956	69	NOAEL	Growth
Molybdenum	Friberg 1975	1080	LD	Survivorship
Molybdenum	Lepore and Miller 1965	88	LOAEL	Reproductive
Molybdenum	Davies et al. 1960	18	NOAEL	Growth
Molybdenum	Davies et al. 1960	90	NOAEL	Growth
Molybdenum	Friberg 1975	90	NOAEL	Growth
Nickel	Cain and Pafford 1981	52	LOAEL	Systemic
Nickel	NAS 1975, Nielsen 1977, Weber & Reid 1968, Eisler 1998	98	LOAEL	Growth
Nickel	Cain and Pafford 1981	14	NOAEL	Systemic
Nickel	Eastin and O'Shea 1981	121	NOAEL	Systemic
Nickel	NAS 1975, Nielsen 1977, Weber & Reid 1968, Eisler 1999	54	NOAEL	Growth
Selenium	El-Begearmi et al. 1977	1.4	LOAEL	Reproductive
Selenium	Heinz et al. 1987	1.0	LOAEL	Developmental
Selenium	Heinz et al. 1987	2.5	LOAEL	Juv Survivorship
Selenium	Heinz et al. 1987	10	LOAEL	Survivorship
Selenium	Heinz et al. 1989	0.93	LOAEL	Reproductive
Selenium	Ort and Latshaw 1978	0.88	LOAEL	Developmental
Selenium	Ort and Latshaw 1978	1.2	LOAEL	Developmental
Selenium	Hoffman et al. 1992	11	LOAEL	Growth
Selenium	El-Begearmi et al. 1977	0.68	NOAEL	Growth
Selenium	Heinz et al. 1987	0.5	NOAEL	Developmental
Selenium	Heinz et al. 1989	0.23	NOAEL	Reproductive
Selenium	Ort and Latshaw 1978	0.88	NOAEL	Reproductive
PCB	Eisler 1986b; Heath et al. 1972; NAS 1979; Stickel et al. 1984	66	LD	Survivorship
PCB	Eisler 1986b; Heath et al. 1972; NAS 1979; Stickel et al. 1984	414	LD	Survivorship
PCB	Heath et al. 1972; Hill 1986; Eisler 1986b; HSDB 1994; NAS 1979	77	LD	Survivorship
PCB	Heath et al. 1972; Hill 1986; Eisler 1986b; HSDB 1994; NAS 1979	313	LD	Survivorship
PCB	Platonow and Reinhart 1973	0.88	LOAEL	Reproductive

Table C5-4.
Selected Avian Ingestion Toxicity Data

Chemical	Reference	Dose (mg/kg-day)	Endpoint	Study Type
PCB	Britton and Huston 1973	1.3	LOAEL	Reproductive
PCB	Dahlgren et al. 1972	1.8	LOAEL	Reproductive
PCB	Scott 1971	1.8	LOAEL	Reproductive
PCB	Call & Harrell 1974	643	LOAEL	Reproductive
PCB	Harris et al. 1976	1.3	LOAEL	Systemic/Immuno
PCB	McLane and Hughes 1980	0.42	NOAEL	Reproductive
PCB	Scott 1971	0.18	NOAEL	Reproductive
PCB	Custer and Heinz 1980; NAS 1979	0.25	NOAEL	Reproductive
PCB	Custer and Heinz 1980; NAS 1979	7.2	NOAEL	Reproductive
PCB	Elliot et al. 1991	0.05	NOAEL	Cytological

Notes:

LOAEL	Lowest observable adverse effect level
NOAEL	No observable adverse effect level
LD	Lethal dose
MDR	Minimum dietary requirement

Table C5-5.
Selected Mammalian Inhalation Toxicity Data

Chemical	Reference	Conc. 24hr/d (mg/m^3)	Endpoint	Study Type
Ethylbenzene	Andrew et al. 1981	866	LOAEL	Reproductive
Ethylbenzene	Cragg et al. 1989	1301	LOAEL	Survivorship
Ethylbenzene	Ungvary and Tatrai 1985	600	LOAEL	Reproductive
Ethylbenzene	Wolf et al. 1956	542	LOAEL	Reproductive
Ethylbenzene	Andrew et al. 1981	88	NOAEL	Reproductive
Ethylbenzene	Cragg et al. 1989	605	NOAEL	Survivorship
Ethylbenzene	Cragg et al. 1989	1246	NOAEL	Survivorship
Ethylbenzene	Cragg et al. 1989	605	NOAEL	Repro Histopath
Ethylbenzene	Cragg et al. 1989	1246	NOAEL	Repro Histopath
Ethylbenzene	Ungvary and Tatrai 1985	150	NOAEL	Reproductive
Ethylbenzene	Ungvary and Tatrai 1985	250	NOAEL	Reproductive
Ethylbenzene	Ungvary and Tatrai 1985	500	NOAEL	Reproductive
Tetrachloroethene	Nelson et al. 1980	1782	LOAEL	Reproductive
Tetrachloroethene	NTP 1986	10863	LOAEL	Growth
Tetrachloroethene	NTP 1986	2716	LOAEL	Survivorship
Tetrachloroethene	NTP 1986	1358	LOAEL	Survivorship
Tetrachloroethene	Rowe et al. 1952	1358	LOAEL	Growth
Tetrachloroethene	Schwetz et al. 1975	2037	LOAEL	Reproductive
Tetrachloroethene	Carpenter 1937	3191	NOAEL	Reproductive
Tetrachloroethene	Hardin et al. 1981	3395	NOAEL	Reproductive
Tetrachloroethene	Nelson et al. 1980	198	NOAEL	Reproductive
Tetrachloroethene	NTP 1986	2716	NOAEL	Growth
Tetrachloroethene	NTP 1986	1358	NOAEL	Growth
Tetrachloroethene	NTP 1986	5431	NOAEL	Survivorship
Tetrachloroethene	Schwetz et al. 1975	2037	NOAEL	Reproductive
Toluene	Carpenter et al. 1976	33112	LD	Survivorship
Toluene	Svirbely et al. 1943	20018	LD	Survivorship
Toluene	Ungvary and Tatrai 1985	3763	LOAEL	Reproductive
Toluene	NTP 1990	455	LOAEL	Survivorship
Toluene	API 1981	1505	NOAEL	Reproductive
Toluene	API 1985	7526	NOAEL	Reproductive
Toluene	NTP 1990	218	NOAEL	Repro Histopath
Toluene	NTP 1990	873	NOAEL	Repro Histopath
Toluene	NTP 1990	2184	NOAEL	Reproductive
Toluene	NTP 1990	1820	NOAEL	Survivorship
Trichloroethene	Land et al. 1981	1800	LOAEL	Reproductive
Trichloroethene	Adams et al. 1951	360	NOAEL	Growth
Trichloroethene	Allen et al. 1994	675	NOAEL	Reproductive
Trichloroethene	Beliles et al. 1980; Dorfmueller et al. 1979; Hardin et al. 1981; Healy et al. 1982; Schwetz et al. 1975	540	NOAEL	Systemic
Trichloroethene	Beliles et al. 1980; Dorfmueller et al. 1979; Hardin et al. 1981; Healy et al. 1982; Schwetz et al. 1975	9718	NOAEL	Systemic
Trichloroethene	Dorfmueller et al. 1979	1735	NOAEL	Reproductive
Trichloroethene	Land et al. 1981	129	NOAEL	Reproductive
Xylene	Balogh et al. 1982	3360	LOAEL	Reproductive
Xylene	Ungvary et al. 1980	150	LOAEL	Developmental
Xylene	Ungvary et al. 1980	3000	LOAEL	Reproductive
Xylene	Balogh et al. 1982	1900	NOAEL	Reproductive
Xylene	Bio/Dynamics 1983	542	NOAEL	Reproductive
Xylene	Bio/Dynamics 1983; Hass and Jakobsen 1993; Hudak and Ungvary 1978; Litton Bionetics 1978	434	NOAEL	Reproductive
Xylene	Nylen et al. 1989	4335	NOAEL	Reproductive
Xylene	Ungvary et al. 1980	1500	NOAEL	Reproductive

Notes:

LOAEL	Lowest observable adverse effect level
NOAEL	No observable adverse effect level
LD	Lethal dose
MDR	Minimum dietary requirement

FIGURES

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Figure C5-1
Summary of Selected Mammalian Ingestion Toxicity Data

Figure C5-2
Summary of Selected Avian Ingestion Toxicity Data

Figure C5-3
Summary of Selected Mammalian Inhalation Toxicity Data

LIST OF ACRONYMNS AND ABBREVIATIONS (continued)

PC Permit	Post-Closure Permit
PCE	tetrachloroethene
PEF	particulate emission factor
RCRA	Resource Conservation and Recovery Act
RfD	reference dose
RFI	RCRA facility investigation
RME	reasonable maximum exposure
Rocketdyne	Rocketdyne Propulsion and Power Division
SQL	sample quantitation limit
SRAM	Standardized Risk Assessment Methodology
SSFL	Santa Susana Field Laboratory
SVOC	semivolatile organic compound
SWMU	Solid Waste Management Unit
SWRCB	State Water Resources Control Board
TCA	trichloroethane
TCE	trichloroethene
TDS	total dissolved solids
TPH	total petroleum hydrocarbons
TRV	toxicity reference value
UCL	upper confidence limit
USEPA	United States Environmental Protection Agency
VOC	volatile organic compound
µg/L	micrograms per liter

C1.0 INTRODUCTION

The ecological screening level (ESL) phase of the ecological risk assessment (ERA) provides a conservative evaluation so that clearly insignificant exposures can be removed from further evaluation. In the ESL ERA phase, BTAG Toxicity Reference Value-Low[1] (TRV-Low) values were used, where available, to derive ESL risk estimates for representative birds and mammals selected for RFI sites at the Santa Susana Field Laboratory (SSFL).

As presented in the SRAM (MWH 2005), the next phase, the baseline ERA, is intended to advance the ERA process using information that is more relevant to site-specific conditions and assessment endpoints. Just as BTAG TRV-Low values were used in the ESL ERA, baseline ERA TRVs (chronic no-observable-adverse-effect-levels [NOAELs]) are used in the baseline ERA. If the resultant baseline ERA HQs are less than one, it can be concluded that ecological risk is *de minimus*.

DTSC (2003) allows:

> "Alternative TRVs to be proposed and supported; however they must be evaluated in conjunction with the BTAG values."

As stipulated in the SRAM, TRVs for a baseline ERA were not presented in the SRAM, but "…were to be derived on a case-by-case basis…" as required. Both ESL TRV- and baseline ERA TRV-based risk estimates are presented in RFI site-specific risk tables (see Appendices C1 through C4).

Consistent with guidance (DTSC 1996, 2003; U.S. EPA 1992) and in accordance with the SRAM, this attachment to Appendix C identifies and provides rationale for selecting doses

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[1] The BTAG TRV-Low represents the lowest credible no-observable-adverse-effect-level (NOAEL) (DTSC 2003). Consequently, a BTAG TRV-Low dose would not be expected to produce an adverse effect and is protective of an individual or population of organisms. Using a BTAG TRV-Low value, a hazard quotient (HQ) less than one would suggest *de minimus* ecological risk (DTSC 2003).

A BTAG TRV-High represents the mid-point of a variety of adverse effects levels and, therefore, is not necessarily a lowest-observable-adverse-effect-level (LOAEL). A BTAG TRV-High dose would be expected to produce an adverse effect to an individual or population of organisms (DTSC 2003). Using a BTAG TRV-High value, a HQ greater than one suggests unacceptable ecological risk, which can be confirmed or determined to be not applicable to the specific site by a validation study.

A chemical with a BTAG TRV-Low-based HQ greater than one and a BTAG TRV-High-based HQ less than one would suggest that further site-specific information should be collected to reduce the uncertainty and obtain a more site-specific estimate of the potential for ecological risk.

reported in the toxicological literature that were used to derive avian and mammalian[2] baseline ERA TRVs for Group 6 RFI Sites.

C1.1 Preferred Toxicity Data

Toxicological studies and doses proposed for baseline ERA TRVs were selected based on their scientific merit. Only toxicological studies that reported all of the following data were selected:

- Chemical administered
- Test organism
- Administered dose(s)
- Exposure duration
- Exposure route
- Effect or response
- Sample size
- Full citation or full citation of source

Study features that were used to select among several germane studies include, but were not limited to, the following:

- Study responses are directly related (to the extent possible) to assessment endpoints that have been established for wildlife at SSFL—i.e., protection of avian and mammalian wildlife populations.
- Doses were administered via a route likely to be experienced in the field (i.e., ingestion of food, ingestion of drinking water, and inhalation as opposed to interperitoneal injection, gavage, etc.).
- Doses were administered during critical or sensitive periods (e.g., during gestation, early life stage) and/or effects were examined for sensitive life stage (e.g., effects on fetuses, embryos, juveniles).
- Chronic exposures or doses that were administered through most of the critical or sensitive periods (e.g., gestation).
- Use of a serial dosing regime—especially a serial dosing regime designed (divided finely enough) to characterize both a NOAEL and LOAEL.
- Wildlife species were examined in the study.
- A description and the results of statistical analyses were provided.

[2] At this time, baseline ERA TRVs are only proposed for avian and mammalian representative species.

Where available, affirmation of the scientific merit of the selected study and dose by an independent toxicological review for use at other sites was noted. Precedent as "used at another site" was not considered when selecting studies and doses.

C1.2 Scope of Toxicity Profile

Baseline ERA TRVs are proposed for the following constituents at Group 6 RFI sites:

- Antimony
- Cadmium
- Copper
- Molybdenum
- Nickel
- Selenium
- Silver
- Zinc
- PCBs
- Ethylbenzene
- Tetrachloroethene
- Toluene
- Trichlorethene
- Xylene

Summary information for toxicity studies selected to derive baseline ERA TRVs is provided in Tables C5-1 and C5-2.

If available, the BTAG TRV-Low and TRV-High values are also presented. A table listing BTAG TRVs was obtained from DTSC's website[3] (http://www.dtsc.ca.gov/ Assessing Risk/eco.cfm).

C2.0 ANTIMONY

Venugopal and Luckey (1978) report that soluble antimony salts are more toxic than similar lead or arsenic compounds. Symptoms of acute and chronic antimony poisoning occur more readily via ingestion than by other exposure routes. Nonetheless, animals are rarely poisoned with antimony or its compounds (Clarke et al. 1981).

No BTAG TRVs for antimony were provided by DTSC (2003).

C2.1 Mammalian Toxicity – Ingestion

The single administered dose of 1.0 mg[Sb]/kg-day was selected for use in deriving baseline TRVs for mammalian wildlife and was considered to be an ecologically relevant chronic NOAEL because:

- Antimony was administered throughout the lifetime of the mice.

[3] The documentation describing the toxicity studies and rationale for selecting individual BTAG TRVs was not available at DTSC's website.

- No adverse effect on survivorship and only minor reductions in growth and median life span at 540 days were observed among female mice at this administered dose.

Features that support the use of this study include:

- Although survivorship can be directly related to fitness and the persistence of populations, it is considered a less sensitive endpoint compared to reproductive and developmental endpoints. Growth is individual-level endpoint from which fitness and persistence of populations may be indirectly inferred.
- Reductions in life span and growth appear to be minor (less than 10% relative to the control group).
- A large sample size was used (54 females and 54 males per treatment).
- An independent review by the U.S. Department of Energy (U.S. DOE) (Sample *et al.* 1996) supports the use of this study to derive toxicity benchmarks for wildlife species.

Limitations of the data set include the fact that only three relevant studies were obtained; only growth and acute mortality data were obtained; and only one concentration was administered in the selected study, prohibiting an evaluation and characterization of a dose-response relationship.

C2.1.1 Selected Toxicity Study

Weanling mice were administered antimony potassium tartrate in their drinking water until natural death (Schroeder *et al.* 1968). No adverse effect on survivorship and no histopathological changes were observed in mice administered a concentration of 5 parts per million (ppm) [Sb] as antimony potassium tartrate in their drinking water (=1.0mg[Sb]/kg-day).

Test Spp: Mouse; Body weight = 0.025 kg (Schroeder *et al.* 1968); Water Intake = 5 ml/day (Lewis 1992)

Dosage: 5 ppm[Sb] in water = 5 mg[Sb]/L

NOAEL = (5 mg[Sb]/L • 5 ml/day • 1 L/1,000 ml) / 0.025 kg = 1.0 mg[Sb]/kg-day

However, reduced median life spans and some suppression of growth of older females were observed at this dose. The decrease in median life spans compared to the control group was less than 8 percent (569 days compared to 625 days in control group) and the decrease in growth of animals at 540 days of age compared to the control group was less than 9 percent (50.5 grams [g] average body weight compared to 55.2 [g] in control group). No difference

in the weight of female mice was observed at 30, 60, 90, 120, and 180 days of age. The biological significance of these effects on fitness and/or the persistence of populations was not discussed by the authors. However, the minor decrease in growth at 540 days of age is likely to be biologically insignificant since the effect occurs well past reproductive maturity and the life span of small mammals in the field is unlikely to be significantly longer than 540 days. Furthermore, no adverse effects on survivorship, growth, median life span, or longevity were observed in male mice administered the same dosing regime (Schroeder *et al.* 1968). Therefore, the use of this dose to develop toxicity benchmarks for wildlife appears to be protective relative to effects on reproductive success.

C2.1.2 Other Related Toxicity Studies

Two toxicity studies examining mortality endpoints were obtained for mammals ingesting antimony. These LD_{50} values are considerably greater than 1.0 mg[Sb]/kg-day. For perspective, the selected dose and doses from other related toxicity studies are plotted in Figure C5-1 (see also Table C5-3).

C2.2 Avian Toxicity – Ingestion

No avian toxicity benchmark for antimony is proposed for the baseline ERA.

C3.0 CADMIUM

Cadmium is a naturally occurring metal that is neither required by nor beneficial to biota. Birds and mammals are comparatively resistant to acute oral exposures to cadmium (Venugopal and Luckey 1978). The presence of metallothioneins in cells, which bind metals, may increase tolerance for cadmium.

C3.1 Mammalian Toxicity – Ingestion

The BTAG TRV-Low of 0.06 mg[Cd]/kg-day was derived based on a study by Webster (1988, as reported in USN 1998) wherein a serial dosing regime of 0.00038, 0.06, and 10 mg[Cd]/kg-day as cadmium chloride was administered to laboratory mice in their drinking water for 8 weeks. BTAG reported that no effects were reported on mean fetal weight at a dose of 0.06 mg/kg-day (no calculations of dose were provided by BTAG). Decreased mean fetal weight was observed at a dose of 10 mg/kg-day. The no effect dose of 0.06 mg/kg-day was chosen for the low TRV because it measured reproductive endpoints that may have population-level effects.

The BTAG TRV-High of 2.64 mg[Cd]/kg-day was obtained from a study by Schroeder and Mitchener (1971) wherein cadmium salts were administered to laboratory mice in their drinking water for three generations. BTAG reported that increased young deaths and runts in the second and third generation were observed among mice administered a dose of 2.64 mg[Cd]/kg-day (no calculations of dose were provided by BTAG). This dose was chosen for the BTAG TRV-High because it was a multigenerational study with significant reproductive effects and the dose was in the mid-range of other reproductive effects.

C3.1.1 Selected Toxicity Study

In a similar reproductive study, Sutou et al. (1980) exposed four groups of 14 female and 14 male rats to 0.1, 1, or 10 mg[Cd]/kg-day as cadmium chloride in their diet for 12 weeks throughout the reproductive period (6 weeks pre-mating, 3 weeks of mating, and day 1 to day 20 of gestation). The stated objective of this study was to investigate the toxicity, fertility, teratogenicity, and dominant lethality of cadmium. No adverse effects on number of copulating females, number of pregnant females, total implants, live fetuses, and average fetal weight were observed among rats administered dietary doses of up to 1.0 mg[Cd]/kg-day as cadmium chloride. Decreased numbers of implantations, live fetuses, and average fetal body weight were observed among rats given dietary exposures of 10 mg[Cd]/kg-day. Exposures to cadmium at the administered concentrations did not induce teratogenicity or dominant lethality.

In a related study, rats were administered cadmium chloride in their diet for 9 weeks (Sutou et al. 1980). No adverse effects on male fertility (as measured by copulating ability, impregnating ability, copulation ratio, pregnancy ratio, and pregnancy efficiency) were observed among rats administered doses of up to 10 mg[Cd]/kg-day in their diet.

The dose of 1.0 mg[Cd]/kg-day was selected to derive baseline ERA TRVs for mammalian wildlife and is considered to be an ecologically relevant chronic NOAEL because:

- The study considered exposure over12 weeks pre- and post-mating.
- No adverse effects on number of copulating females, number of pregnant females, total implants, live fetuses, average fetal weight, and male fertility were observed among rats administered this dose.

Features that support the use of this study include:

- Number of copulating females, number of pregnant females, total implants, live fetuses, average fetal weight, and male fertility can be directly related to reproductive success from which the persistence of populations may be inferred.
- Effects to a sensitive life stage (developing fetuses) were examined.
- A serial dosing regime was administered.
- Both a NOAEL and LOAEL were reported, thereby permitting a limited characterization of the dose-response relationship.
- Studies by Kelman et al. (1978), Pond and Walker (1975), and Webster (1988) support the results of this study that no adverse reproductive effects are likely to occur at doses comparable to 1.0 mg[Cd]/kg-day.
- An independent review of the selected study by U.S. DOE (Sample et al. 1996) supports the use of this study to derive toxicity benchmarks for wildlife species.
- An independent toxicological review by the University of California (UC Davis 2004) supports the use of this value to derive TRVs for wildlife species.

Sutou et al. (1980) used a less severe serial dosing regime (i.e., 0 [control], 0.1, 1,0, and 10 mg[Cd]/kg-day) compared to Webster's (1988) dosing regime (i.e., 0.00038, 0.06, and 10 mg[Cd]/kg-day). Sutou et al.'s (1980) next lowest dose was 1.0 mg[Cd]/kg-day compared to 0.06 mg[Cd]/kg-day of Webster (1988). Accordingly, given the extreme differences between serial doses, the value of the BTAG TRV-Low may simply be an artifact of Webster's (1988) study's design.

C3.1.2 Other Related Toxicity Studies

Twelve toxicity studies examining reproductive, developmental, growth, or mortality endpoints were obtained for mammals ingesting cadmium. For perspective, the selected dose and doses from other related toxicity studies are plotted in Figure C5-1.

C3.2 Avian Toxicity – Ingestion

The BTAG TRV-Low of 0.08 mg[Cd]/kg-day was obtained from a study by Cain et al. (1983) wherein administered cadmium chloride to mallards in their feed for 12 weeks. BTAG reported that at a dose of 0.78 mg/kg-day, no effects were observed on hematological or systemic endpoints (no calculations of dose were provided). At the same dose, the BTAG

stated that kidney degeneration was observed in 4 out of 12 ducklings. BTAG divided the reported dose by an effects level (EL)-to-NOAEL uncertainty factor[4] (UF) of 10 to render a BTAG TRV-Low of 0.08 mg[Cd]/kg-day. BTAG reported that this dose was selected over other doses because the endpoint tested in the study was the kidney, which is the target organ of cadmium and the test organism (mallard) appeared to be more sensitive to cadmium toxicity than are other test organisms given the suite of studies they reviewed.

The BTAG TRV-High of 10.4 mg[Cd]/kg-day was obtained from a study by Richardson et al. (1974) wherein cadmium chloride was administered to Japanese quail hatchlings in their feed for six weeks. BTAG reported that dose of 10.4 mg/kg-day resulted in decreases in body weight and testis weight, and altered hematological (e.g., hematocrit and hemoglobin) functions (no calculations of dose were provided). This dose was chosen for the high TRV because the systemic/histological study was considered to test ecologically significant endpoints and was in the mid-range of reproductive effects.

C3.2.1 Selected Toxicity Study

The same study used to derive the BTAG TRV-Low was selected (Cain *et al*. 1983). Cain et al. (1983) exposed mallard ducklings to cadmium in their diet for 12 weeks at nominal dietary concentrations of 0, 5, 10, and 20 ppm[Cd] (averaged 0.1, 4.3, 9.2, and 14.6 ppm[Cd], respectively, as reported by the authors,). No effects on blood chemistry, serum chemistry, body or liver weight, and no degenerative effects in gizzard, intestine, liver, kidney, heart, lung, spleen, or skeletal muscle were observed among mallard ducklings administered a dietary concentration of 9.2 ppm[Cd] (nominal 10 ppm = 0.87 mg[Cd]/kg-day) for 12 weeks).

Test Spp:	Mallard; Body weight = 1160 kg (Cain et al. 1983); Food Intake = 110 g/day (White & Finley 1978, as cited in Cain et al. 1983 for similarly sized adult mallards)
Dosage:	9.2 ppm[Cd] in diet = 9.2 mg[Cd]/kg
NOAEL	= (9.2 mg[Cd]/kg • 110 g/day • 1 kg/1,000 g) / 1.160 kg = 0.87 mg[Cd]/kg-day ≈ 0.80 mg[Cd]/kg-day (for consistency with BTAG TRV-Low) (minor difference from BTAG TRV-Low is likely due to small differences in body weight and ingestion rate used to calculate NOAEL)

It appears that BTAG inadvertently divided the NOAEL by an EL-to-NOAEL UF to obtain the BTAG TRV-Low of 0.08 mg[Cd]/kg-day. Comparable studies cited by the authors

[4] Note that BTAG UFs used to convert study-based values to chronic NOAEL-equivalent TRVs are different than toxicity UFs presented in the SRAM. For consistency, UFs used in this toxicity profile are consistent with BTAG (USN 1997).

reported kidney damage in young wood ducks and adult mallards at dietary concentrations 5 and 10 times higher, respectively.

The dose of 0.80 mg[Cd]/kg-day was selected to derive baseline ERA TRVs for avian wildlife and is considered to be an ecologically relevant chronic NOAEL because:

- The study considered exposure over 12 weeks to a sensitive life stage (ducklings).
- No effects on blood chemistry, serum chemistry, body or liver weight, and no degenerative effects in gizzard, intestine, liver, kidney, heart, lung, spleen, or skeletal muscle were observed among mallard ducklings administered this dose.

Features that support the use of this study include:

- Growth and systemic effects are individual-level endpoints from which fitness and persistence of populations may be indirectly inferred.
- A serial dosing regime was administered (e.g., control, 0, 5, 10, and 20 ppm[Cd] in their diet).
- Both a NOAEL and LOAEL were reported, thereby permitting a limited characterization of the dose-response relationship.
- Results are consistent with Mehring *et al.* (1960).
- An independent toxicological review by the University of California (UC Davis 2004) supports the use of this value to derive TRVs for wildlife species.

The value used to derive baseline ERA TRVs is derived from the same study as the BTAG TRV-Low, but the dose of 0.80 mg[Cd]/kg-day was not divided by an uncertainty factor because no adverse effects were observed at this dose. It appears that BTAG inadvertently divided the same dose by an effects-to-NOAEL UF of 10 to render a TRV of 0.08 mg[Cd]/kg-day. Further review of the paper revealed that adverse effects (i.e., "mild to severe kidney degeneration") were observed at the next highest dietary concentration 14.6 ppm[Cd] (nominal 20 ppm[Cd] = approximately 1.5 mg[Cd]/kg-day).

C3.2.2 Other Related Toxicity Studies

Five toxicity studies examining reproductive, developmental, growth, mortality, or physiological endpoints were obtained for birds ingesting cadmium. For perspective, the selected dose and doses from other related toxicity studies are plotted in Figure C5-2 (see also Table C5-4).

C4.0 COPPER

Copper is a required micronutrient for both plant and animals and is required for the proper functioning of many enzymes. In many macroinvertebrates, copper is the essential component of the oxygen-carrying protein hemocyanin. Copper is readily accumulated by aquatic organisms. In fish, exposures to elevated copper may result in effects on swimming, growth, and reproduction. In mammals, copper toxicity can be greater with low dietary intake of iron, molybdenum, sulfate, and zinc; molybdenum and sulfate reduce copper absorption and enhance its excretion. The influence of these minerals is less clear with avian species.

C4.1 Mammalian Toxicity – Ingestion

The BTAG TRV-Low of 2.7 mg[Cu]/kg-day was obtained from a study Pocino *et al.* (1991) wherein copper sulfate was administered to 8- to 10-week-old laboratory mice in drinking water for 10 weeks. BTAG reported that a dose of 26.7 mg[Cu]/kg-day had no adverse effects on number of cells in the thymus, food ingestion rate, body weight, or mortality (no calculations of dose were provided by BTAG). Further BTAG reported that several effects were reported from immune response experiments at doses below the no effect dose of 26.7 mg[Cd]/kg-day. In the immune response studies the test organisms were injected with antigens and exposed to diseases. Such circumstances do not occur in the field and so were considered of questionable ecological importance. Therefore, the reported dose of 26.7 mg[Cd]/kg-day was divided by a subchronic-to-chronic UF of 10 and considered the most appropriate ecologically relevant no effect level in the data set to derive the BTAG TRV-Low.

The BTAG TRV-high of 632 mg[Cu]/kg-day was obtained from Hebert et al. (1993) wherein six-week-old mice were administered copper as copper sulfate pentahydrate in drinking water for 2 weeks. BTAG reported that no adverse effects on food consumption, water consumption, body weight, and survival were observed among rats administered a dose of 211 mg[Cu]/kg-day (no calculations of dose were provided by BTAG). Decreased water consumption, body weight, and survival were observed among mice administered a dose of 632 mg[Cu]/kg-day. Decreased food consumption was observed among mice administered a dose of 1,421 mg[Cu]/kg-day.

C4.1.1 Selected Toxicity Study

An independent toxicological review by the University of California recommended the study by Hebert (1993) to derive chronic NOAEL-equivalent TRVs. University of California toxicologists (UC Davis 2004) reported that no adverse effects on food consumption, water consumption, body weight, and survival were observed among female rats administered a dose of 102 mg[Cu]/kg-day in their drinking water (no calculations of dose were provided by UC Davis). A subchronic-to-chronic UF was applied to 102 mg[Cu]/kg-day to obtain a chronic NOAEL-equivalent dose of 10 mg[Cu]/kg-day.

Subchronic-to-Chronic UF = 10

Chronic NOAEL-equivalent = 102 mg[Cu]/kg-day / 10

= 10 mg[Cu]/kg-day

The dose of 10 mg[Cu]/kg-day (Hebert et al. 1993) was selected for use in deriving baseline ERA TRVs for mammalian wildlife and is considered to be a chronic NOAEL because:

- A subchronic-to-chronic UF was applied to the administered dose to account for a subchronic exposure duration of 2 weeks.
- No adverse effects on food consumption, water consumption, body weight, and survival were observed among rats administered this dose.

Features that support the use of this study include:

- Growth is an individual-level endpoint from which fitness and persistence of populations may be indirectly inferred.
- A serial dosing regime was administered.
- Both a NOAEL and LOAEL were reported, permitting a limited characterization of a dose-response relationship.
- An independent toxicological review by the University of California (UC Davis 2004) supports the use of this value to derive TRVs for wildlife species.
- This study was selected by BTAG to derive the BTAG TRV-High.

C4.1.2 Other Related Toxicity Studies

Seven toxicity studies examining reproductive, developmental/growth, or mortality endpoints were considered for mammals ingesting copper. For perspective, the selected dose and doses from other related toxicity studies are plotted in Figure C5-1.

C4.2 Avian Toxicity – Ingestion

The BTAG TRV-Low of 2.3 mg[Cu]/kg-day was obtained from Norvell et al. (1975) wherein one-day old chicks administered copper as copper sulfate in their diet for 8 weeks. BTAG reported that no effects were observed on weight gain at a dose of 23 mg[Cu]/kg-day (no calculations of dose were provided by BTAG). A decrease in weight gain was reported at a dose of day 46 mg[Cu]/kg-day. The dose at 23 mg/kg-day was the lowest ecologically significant no effect dose and was administered to the sensitive life stage of the test organism; thus, it was used in deriving the low TRV. The reported dose of 23 mg[Cu]/kg-day was divided by a subchronic-subchronic-subchronic-subchronic-to-chronic UF of 10 to render a BTAG TRV-Low of 2.3 mg[Cu]/kg-day.

The BTAG TRV-High of 52 mg[Cu]/kg-day was obtained from Jensen and Maurice (1978) wherein broiler chicks were administered daily doses of cupric sulfate pentahydrate in their feed for 4 weeks. A dose of 26 mg[Cu]/kg-day caused a decrease in body weight, but caused no effect on the gizzard or feed-to-weight gain ratio (no calculations of dose were provided by BTAG). At a dose of 52 mg[Cu]/kg-day, gizzard erosion was reported—gizzard erosion affects feed consumption.

Note that the Association of Avian Veterinarians has established a minimum daily requirement of 8 ppm[Cu] for passerines.

Test Spp: Robin; Body weight = 0.079 kg (mean; U.S. EPA 1993b); Food Intake = 16 g/day (U.S. EPA 1993)

Dosage: 8 ppm[Cu] in diet = 8 mg[Cu]/kg_{food}

Min. Daily Requirement = (8 mg[Cu]/ kgf_{ood} • 16 g/day • 1 kg/1,000 g) / 0.079 kg

= 1.7 mg[Cu]/kg-day

Thus, daily doses less than or equal to approximately 1.7 mg[Cu]/kg-day may result in copper deficiency in similarly sized passerines (i.e., body weight approximately 79 g). An independent toxicological review by the University of California (UC Davis 2004) considered the BTAG TRV-Low of 2.3 mg[Cu]/kg-day to be almost at the dietary requirement and “too low” a value.

C4.2.1 Selected Toxicity Study

The same study used to derive the BTAG TRV-Low was selected (Norvell *et al*. 1975). A basal diet containing 16 ppm[Cu] was considered to be nutritionally adequate by the authors.

No copper-related effect on weight gain was observed among chicks administered dietary concentrations of up to 496 ppm[Cu] (up to 29 mg[Cu]/kg-day[5]).

Test Spp: Chick; Body weight = 0.702 kg (mean of control group at 4 wks, Norvell et al. 1975); Food Intake = 41 g/day (derived from U.S. EPA 1993)

Dosage: 496 ppm[Cu] in diet 496 mg[Cu]/kg_{food}

NOAEL = (496 mg[Cu]/ kg_{food} • 41 g/day • 1 kg/1,000 g) / 0.702 kg = 29 mg[Cu]/kg-day

A decrease in weight was observed among chicks administered a dietary concentration of 736 ppm[Cu] (= 43 mg[Cu]/kg-day).

The dose of 29 mg[Cu]/kg-day was selected for use in deriving baseline ERA TRVs for avian wildlife and is considered to be a chronic NOAEL because:

- The study considered exposure over 8 weeks to an early life stage (1-day-old chicks).
- No adverse effect on growth was observed in 1-day-old chicks administered this dose.

Features that support the use of this study include:

- Growth is an individual-level developmental endpoint from which fitness and persistence of populations may be indirectly inferred.
- Effects to a sensitive life stage (1-day-old chicks) were examined.
- A serial dosing regime was administered.
- Both a NOAEL and LOAEL were reported, permitting a limited characterization of a dose-response relationship.
- An independent toxicological review by the University of California (UC Davis 2004) supports the use of this value to derive TRVs for wildlife species.

The value used to derive baseline ERA TRVs is derived from the same study as the BTAG TRV-Low, but the dose of 29 mg[Cd]/kg-day was not divided by an UF because a the dose was administered to a sensitive life stage (hatching to 56 days of age).

[5] Using the same study, BTAG calculated a dose of 23 mg[Cu]/kg-day—however, calculations were not presented and could not be replicated.

C4.2.2 Other Related Toxicity Studies

Seven toxicity studies examining reproductive, developmental/growth, or mortality endpoints were considered for birds ingesting copper. For perspective, the selected dose and doses from other related toxicity studies are plotted in Figure C5-2.

C5.0 MOLYBDENUM

Molybdenum is an essential micronutrient for most living organisms. The general symptoms of chronic molybdenum intoxication in animals are loss of body weight, anorexia, anemia, deficient lactation, male sterility owing to testicular degeneration, osteoporosis, and bone-joint abnormalities. Molybdenum intoxication may be influenced by sulfate, copper, lead, zinc, and protein intake (Venugopal and Luckey 1978).

No BTAG TRVs for molybdenum were provided by DTSC (2003).

C5.1 Mammalian Toxicity – Ingestion

No mammalian toxicity benchmark for molybdenum is proposed for the baseline ERA.

C5.2 Avian Toxicity – Ingestion

The toxicity benchmark for birds was based on a reproductive study on chickens (Lepore and Miller 1965). A dose of 88 mg[Mo]/kg-day was selected to derive baseline ERA TRVs for avian wildlife and is considered to be an ecologically relevant chronic LOAEL because:

- The study considered exposure over 21 days during a critical and sensitive developmental period (e.g., reproduction).
- Fewer eggs were laid and embryo viability was reduced to zero among chickens administered this dose.

Features that support the use of this study include:

- Egg production and viability of embryos can be directly related to reproductive success.
- Effects to a sensitive life stage (embryos) were examined.
- A serial dosing regime was administered (e.g., control, 500 ppm, 1,000 ppm, and 2,000 ppm[Mo] in diet).

- 6 individuals per treatment were examined.
- An independent review by the U.S. DOE (Sample et al. 1996) supports the use of this study to derive toxicity benchmarks for wildlife species.

Limitations of the data set include the fact that only two relevant studies were obtained and effects were observed at the lowest administered dose. Because adverse effects were observed at the lowest treatment dose, a NOAEL value could not be identified.

C5.2.1 Selected Toxicity Study

Chickens were administered 500 ppm, 1,000 ppm, or 2,000 ppm[Mo] as sodium molybdate in the diet for 21 days (Lepore and Miller 1965). Fewer eggs were laid (15% reduction) and embryo viability was reduced to zero among chickens administered a concentration of 500 ppm[Mo] as sodium molybdate in the diet (= 88 mg[Mo]/kg-day).

Test Spp: Chicken; Body weight = 0.8 kg (Lewis 1992); Food Intake = 140 g/day (Lewis 1992)

Dosage: 500 ppm[Mo] in food = 500 mg[Mo]/kgfood

Effects Level = (500 mg[Mo]/kgfood • 140 g/day • 1 kg/1,000 g) / 0.8 kg = 88 mg[Mo]/kg-day

In the same study, 50 and 80 percent reductions in egg production were observed among birds administered concentrations of 1,000 ppm[Mo] and 2,000 ppm[Mo] as sodium molybdate in their diet, respectively (= 175 and 350 mg[Mo]/kg-day). Because adverse effects were observed at the lowest administered dose, a thorough evaluation of whether the response is dose-related and a characterization of a dose-response relationship are prohibited.

C5.2.2 Other Related Toxicity Studies

Two toxicity studies examining reproductive and/or developmental endpoints were obtained for birds ingesting molybdenum. For perspective, the selected dose and doses from other related toxicity studies are plotted in Figure C5-2.

C6.0 NICKEL

Nickel is an essential micronutrient and is typically found in low concentrations in animal tissue (Hoar 1975). Nickel compounds can be grouped according to their solubility in water: soluble compounds (e.g., nickel chloride, nickel sulfate, nickel nitrate) and insoluble compounds (e.g., nickel oxide, nickel subsulfide). Both the soluble and insoluble nickel compounds are important with regard to all relevant routes of exposure. Generally, the

soluble compounds are considered more toxic than the insoluble compounds. Ingestion of nickel compounds may cause intestinal disorders, convulsions, and asphyxia (Lewis 1992).

C6.1 Mammalian Toxicity – Ingestion

The BTAG TRV-Low of 1.3 mg[Ni]/kg-day was obtained from Smith et al. (1993) wherein nickel chloride was administered to female laboratory rats in their drinking water for 4 months. BTAG reported that at a dose of 1.3 mg/kg-day, no effects were observed on the first litter of pups, but pup mortality increased in the second litter (no calculations of dose were provided by BTAG). This was the lowest effect level in the data set.

The BTAG TRV-High of 32 mg[Ni]/kg-day was obtained from the same study. BTAG reported that a dose of 31.6 mg/kg-day caused an increase in pups born dead or dying shortly after birth. These doses were the only reproductive effect levels in the data set.

Note that a 50 mg[Ni]/kg (3.0 mg[Ni]/kg-day) of ration of nickel is necessary to prevent deficiency in rats (USPHS 1993).

Test Spp: Rat; Body weight = 0.25 kg (Lewis 1992); Food Intake = 15 g/day (Lewis 1992)

Dosage: 50 ppm[Ni] in food = 50 mg[Ni]/kg_{food}

Dietary Requirement = (50 mg[Ni]/kg_{food} • 15 g/day • 1 kg/1,000 g) / 0.25 kg = 1.5 mg[Ni]/kg-day

The BTAG TRV-Low is less than the dietary requirement identified by USPHS (1993). In addition, note that US EPA (IRIS 1999) concluded that “it is hard to define a NOAEL and LOAEL” from the Smith et al. (1993) study “due to the lack of a clear dose-response trend at the lower doses”.

C6.1.1 Selected Toxicity Study

Rats were administered a concentration of 250 ppm, 500 ppm, or 1,000 ppm[Ni] as nickel sulfate hexahydrate in their diet for three generations (Ambrose et al. 1976). Seventeen to twenty female rats and 89 to 211 weanling rats per treatment were examined. No adverse effects on fertility (pregnancies/matings), gestation (litters cast/pregnancies), offspring viability (live pups at Day 5/live pups born), and lactation (weaned/live pups at Day 5) indices were observed among rats administered concentrations of up to 1000 ppm[Ni] as nickel sulfate hexahydrate in their diet (up to 60 mg[Ni]/kg-day).

Test Spp: Rat; Body weight = 0.25 kg (Lewis 1992); Food Intake = 15 g/day (Lewis 1992)

Dosage: 1000 ppm[Ni] in food = 1000 mg[Ni]/kg_{food}

NOAEL = (1000 mg[Ni]/kg_{food} • 15 g/day • 1 kg/1,000 g) / 0.25 kg = 60 mg[Ni]/kg-day

A higher incidence of stillborns was observed only in the first generation among rats administered concentrations of 250 ppm[Ni] or greater as nickel sulfate hexahydrate in their diet (=15mg[Ni]/kg-day or greater). The authors considered this effect to be transitory since no effect on the incidence of stillborns was observed in second or third generations (Ambrose et al. 1976). Reduced weight was observed among weanlings born from rats administered a concentration of 1,000 ppm[Ni] as nickel sulfate hexahydrate in their diet (= 60 mg[Ni]/kg-day); however, from weanling to mating, offspring recovered from this deficit, averaging 92 percent of controls.

This study was selected to derive baseline ERA TRVs for mammalian wildlife because:

- The study considered exposure over three generations.
- No adverse effects on fertility, gestation, offspring viability, and lactation indices were observed among rats administered this dose.
- Observed effects on the incidence of stillborns were considered to be transitory since no effects on stillborns were observed in subsequent generations.

Features that support the use of this study include:

- Fertility, gestation, offspring viability, and lactation were assessed and can be related to the fitness (reproductive success) of individuals and the persistence of populations.
- A serial dosing regime was administered (e.g., control, 250 ppm, 500 ppm, and 1,000 ppm[Ni] in diet).
- Both a NOAEL and LOAEL were reported, permitting a limited characterization of dose-response relationship.
- 17 to 20 females per treatment in each generation and 89 to 211 weanling rats per treatment were examined.
- An independent review by the U.S. DOE (Sample et al. 1996) supports the use of this study to derive toxicity benchmarks for wildlife species.

An independent toxicological review by the University of California (UC Davis 2004) recommended the toxicity benchmark of 6.7 mg[Ni]/kg-day for mammals, which is the geometric mean of a LOAEL of 15 mg[Ni]/kg-day (Ambrose et al. 1976) and the USPHS (1993) dietary value.

C6.1.2 Other Related Toxicity Studies

Six toxicity studies examining reproductive, developmental, or growth endpoints were considered for mammals ingesting nickel. The data for adverse reproductive effects do not demonstrate consistent dose-response relationships. For perspective, the selected dose and doses from other related toxicity studies are plotted in Figure C5-1.

C6.2 Avian Toxicity – Ingestion

The BTAG TRV-Low of 1.4 mg[Ni]/kg-day was obtained from Cain and Pafford (1981) wherein mallard ducklings were administered nickel sulfate in their feed for 90 days. BTAG reported that at a dose of 13.8 mg/kg-day, no effects were observed on tremors or edema in toe and leg joints (no calculations of dose were provided by BTAG). However, tremors or edema in toe and leg joints were observed at 55.2 mg[Ni]/kg-day. A dose of 56.26 mg/kg-day caused a decrease in length to weight ratio of the humerus at 30 days—note that reduced humerus weight:length ratios was not observed at 90 days. BTAG noted that this transient change in bone density may be considered to be of limited ecological relevance. Reduced humerus weight:length ratios did not occur at 14.1 mg[Ni]/kg-day. The reported dose of 13.8 mg/kg-day was divided by an UF of 10 for a subchronic-to-chronic conversion, resulting in a BTAG TRV-Low of 1.4 mg[Ni]/kg-day. The dose of 55.2 mg/kg-day was chosen for the BTAG TRV-High.

C6.2.1 Selected Toxicity Study

The same study used to derive the BTAG TRV-Low was selected (Cain and Pafford 1981). A dose of 14 mg[Ni]/kg-day was selected to derive baseline ERA TRVs for avian wildlife and is considered to be an ecologically relevant chronic NOAEL because:

- The study considered exposure over 90 days during a critical and sensitive developmental period (i.e., from hatching to 90 days of age [through fledging]).
- No adverse effects on survivorship and growth were observed among mallard ducklings administered this dose.

Features that support the use of this study include:

- Although survivorship can be directly related to fitness and the persistence of populations, it is considered a less sensitive endpoint compared to reproductive and developmental endpoints. Growth is individual-level endpoint from which fitness and persistence of populations may be indirectly inferred.

- Effects to a sensitive life stage (ducklings) were examined.
- A serial dosing regime was administered (e.g., control, 176 ppm, 774 ppm, and 1,069 ppm[Ni] in diet).
- Both a NOAEL and LOAEL were reported, permitting a limited characterization of dose-response relationship.
- 36 individuals per treatment were examined.
- Independent reviews by the U.S. Navy (1997) and U.S. DOE (Sample et al.1996) support the use of this study to derive toxicity benchmarks for wildlife species.

The dose of 14 mg[Ni]/mg-day is considered a chronic dose because it was administered to a sensitive life stage (hatchlings through fledglings). An independent toxicological review by the University of California (UC Davis 2004) supports the use of this value to derive TRVs for wildlife species.

C6.2.2 Other Related Toxicity Studies

Five toxicity studies examining growth/survivorship and scatological endpoints were considered for birds ingesting nickel. For perspective, the selected dose and doses from other related toxicity studies are plotted in Figure C5-2.

C7.0 SELENIUM

Selenium is an essential micronutrient in animals and is required in low concentrations. Either deficiency or excess may be associated with serious disease in livestock. Elemental selenium has low acute systemic toxicity. Inorganic selenium compounds may cause dermatitis, loss of appetite, deformation and loss of hooves and hair, and erosion of joints in livestock. Organoselenium compounds may exhibit high toxicity similar to their organometals (Lewis 1992). Selenium may biomagnify in aquatic food chains; however, biomagnification has not been demonstrated conclusively in terrestrial systems (Ohlendorf 1989).

C7.1 Mammalian Toxicity – Ingestion

No mammalian toxicity benchmark for selenium is proposed for the baseline ERA.

C7.2 Avian Toxicity – Ingestion

The BTAG TRV-Low of 0.23 mg[Se]/kg-day was obtained from a study by Heinz et al. (1989) wherein female mallard adults were administered selenium as seleno-DL-methionine in their food for 40 to 50 days. BTAG reported that at a dose of 0.23 mg[Se]/kg-day, no effects were reported on hatchling body weights, survival, and reproductive parameters (no calculations of dose were provided by BTAG). In addition, at a dose of 0.93 mg[Se]/kg-day, a decrease in hatching success was reported. Consequently, the BTAG TRV-High value was set at 0.93 mg[Se]/kg-day.

Mallards are a reasonable test species on which to base the TRV value because dabbling ducks are cited as among the more sensitive birds to embryonic effects from *in ovo* selenium exposure (Skorupa et al. 1991).

C7.2.1 Selected Toxicity Study

A similar study by the same authors used to derive the BTAG TRV-Low was selected (Heinz et al. 1987). In this study, female mallards were administered 1 ppm, 5 ppm, 10 ppm, 25 ppm, or 100 ppm[Se] as sodium selenite in their diet for 78 days during reproduction (Heinz et al. 1987). No adverse effects on growth, adult survival, duckling survival, and deformed embryos were observed among mallards administered concentrations of up to 5 ppm[Se] as sodium selenite in their diet (up to 0.5 mg[Se]/kg-day).

Test Spp: Mallard; Body weight = 1.0 kg (Heinz et al. 1987); Food Intake = 100 g/day (Heinz et al. 1987)

Dosage: 5 ppm[Se] in food = 5 mg[Se]/kg_{food}

NOAEL = (5 mg[Se]/kg_{food} • 100 g/day • 1 kg/1,000 g) / 1.0 kg = 0.5 mg[Se]/kg-day

Increased incidence of deformed embryos was observed among mallards administered concentrations of 10 ppm[Se] or greater in their diet (= 1.0 mg[Se]/kg-day or greater). Reduced duckling survival was observed among mallards administered concentrations of 25 ppm[Se] or greater in their diet (2.5 mg[Se]/kg-day or greater). Reduced adult survival was observed among mallards administered a concentration of 100 ppm[Se] in their diet (= 10 mg[Se]/kg-day).

A dose of 0.5 mg[Se]/kg-day was selected to derive baseline ERA TRVs for avian wildlife and is considered to be an ecologically relevant chronic NOAEL because:

- The study considered exposure over 78 days through reproduction.

- No adverse effects on growth, adult survival, duckling survival, and deformed embryos were observed among mallards administered this dose.

Features that support the use of this study include the fact that

- Growth, adult survival, duckling survival, and deformed embryos can be directly related to reproductive success, from which population-related endpoints (e.g., persistence) may be inferred.
- Effects to a sensitive life stage (ducklings) were examined.
- A serial dosing regime was administered (e.g., control, 1 ppm, 5 ppm, 10 ppm, 25 ppm, and 100 ppm[Se] in diet).
- Both a NOAEL and LOAEL were reported, permitting a limited characterization of a dose-response relationship.
- 10 to 13 pairs per treatment were examined (except 5 pairs were fed a diet of 100 ppm[Se]).
- An independent review by U.S. DOE (Sample et al.1996) supports the use of this study to derive toxicity benchmarks for wildlife species.

NOAEL doses are similar between the two studies—however, selenite, the form of selenium administered by Heinz *et al.* (1987), is the form of selenium likely to be detected in the environment (ATSDR 2002). Selenomethionine is generated and bioconcentrated by algae and aquatic invertebrates. Thus, the BTAG TRV-Low may be more appropriately used for waterfowl and shorebirds in wetland habitats.

C7.2.2 Other Related Toxicity Studies

Five toxicity studies examining reproductive endpoints were obtained for birds ingesting selenium. For perspective, the selected dose and doses from other related toxicity studies are plotted in Figure C5-2.

C8.0 SILVER

Silver is highly immobile in soils when pH is greater than 4 (Kabata-Pendias and Pendias 1992) and sorption of silver by soil components is strong. Ingested silver salts are poorly absorbed and chronic symptoms include changes in blood cells and the gray or blue-gray discoloration of the skin seen in argyria (Venugopal and Luckey 1978). Very little information exists on the effects of dermal or inhalation exposure to silver in animals,

however, these routes are not expected to be significant sources of silver exposure (ATSDR 1997). No studies of cancer or birth defects in animals from eating, drinking, or breathing in silver compounds were found.

No BTAG TRVs for silver were provided by DTSC (2003).

C8.1 Mammalian Toxicity – Ingestion

The toxicity benchmark was based on a survivorship and clinical condition study on rats (Walker 1971). A dose of 65 mg[Ag]/kg-day was selected to derive baseline ERA TRVs for mammalian wildlife and is considered to be an ecologically relevant chronic NOAEL because:

- The study considered exposure over 12 weeks.
- No adverse effects on survivorship, clinical condition, behavior, and fluid consumption were observed among rats administered this dose.

Features that support the use of this study include:

- Survivorship can be directly related to reproductive success, from which the persistence of populations may be inferred.
- A serial dosing regime was administered (e.g., control, 6 mM, 12 mM, and 24 mM[Ag] in drinking water);
- Both a NOAEL and LOAEL were reported, permitting a limited characterization of a dose-response relationship; and
- 12 rats per treatment were examined (except six rats were examined for the 12 mM[Ag] treatment administered over 81 weeks).

A limitation of the data set was that only three relevant studies were obtained.

C8.1.1 Selected Toxicity Study

Male rats were administered 6 mM, 12 mM, and 24 mM[Ag] as silver nitrate in their drinking water for 12 weeks (Walker 1971). Brown- stained muzzles and teeth were observed among male rats administered a concentration of 6 mM[Ag] as silver nitrate in their drinking water (= 65 mg[Ag]/kg-day).

Test Spp: Rat; Body weight = 0.25 kg (Lewis 1992); Water Intake = 25 g/day (Lewis 1992)
Ag molecular wt = 108 g/mole

Dosage: 6 mM[Ag] in water • 108 g/mole = 648 mg[Ag]/L

NOAEL = (648 mg[Ag]/L • 25 ml/day • 1 L/1,000 ml) / 0.25 kg = 65 mg[Ag]/kg-day

No adverse effects on survivorship, clinical condition, behavior, and fluid consumption were observed among these rats (Walker 1971). In a related study, male rats were administered silver nitrate in their drinking water for 81 weeks (Walker 1971). "Excellent clinical condition" for up to 60 weeks was reported among male rats administered a concentration of 12 mM[Ag] as silver nitrate in their drinking water (= 130 mg[Ag]/kg-day). At this dose male rats initially drank less than controls and had a slight decrease in weight (no weights reported); fluid consumption returned to normal levels by 5 days. Between week 76 and week 81, all rats exhibited a rapid deterioration in their clinical condition. Five of six rats recovered slowly when restored to ordinary drinking water; the sixth was killed and examined. In a 2-week study, decreased fluid intake and 25 percent mortality were observed within 5 days among rats administered a concentration of 24 mM[Ag] as silver nitrate in their drinking water (= 260 mg[Ag]/kg-day).

C8.1.2 Other Related Toxicity Studies

Three toxicity studies examining reproductive, survivorship, or behavior were obtained for mammals ingesting silver. For perspective, the selected dose and doses from other related toxicity studies are plotted in Figure C5-1.

C8.2 Avian Toxicity – Ingestion

No avian toxicity benchmark for silver is proposed for the baseline ERA.

C9.0 ZINC

Zinc is a micronutrient essential for the synthesis of DNA and RNA and is required for over 200 enzymes (Eisler 1993). Zinc metabolism and regulation are complex. At low concentrations, zinc deficiencies may be noted, while at higher concentrations, zinc may result in toxic effects. Because of its metabolic role, zinc is actively accumulated by organisms from the environment. However, the uptake of zinc from the environment may differ widely among even closely related species. Additionally, organisms are able to regulate zinc concentrations within their tissues over a range of environmental concentrations (Eisler 1993).

Zinc may interact with other chemicals to either ameliorate or enhance the combined effects. In terrestrial animals, zinc may protect against lead toxicity by reducing assimilation of lead,

reducing lead-induced developmental abnormalities, or protecting against lead-induced testicular effects (Eisler 1993).

C9.1 Mammalian Toxicity – Ingestion

The BTAG TRV-Low of 96 mg[Zn]/kg-day was obtained from Aughey et al. (1977) wherein zinc sulfate was administered to mice in their drinking water for up to 14 months. BTAG reported that a dose of 96 mg[Zn]/kg-day resulted in hypertrophy (enlargement) and vacuolation (formation of cavities in cell protoplasm) of pancreatic islet cells and fasciculata cells in the adrenal cortex (no calculations of dose were provided by BTAG). This chronic histological study was the basis for the BTAG TRV-Low value.

The BTAG TRV-High of 411 mg[Zn]/kg-day was obtained from Schlicker and Cox (1968) wherein zinc oxide was administered to female rats in their feed for up to 36 days. BTAG reported that a dose of 411 mg[Zn]/kg-day resulted in fetal resorption and decreases in fetal weight and fetal liver weight (no calculations of dose were provided by BTAG).

C9.1.1 Selected Toxicity Study

The same study used to derive the BTAG TRV-High was selected (Schlicker and Cox 1968). Rats were administered 2% or 4% [Zn] as zinc oxide in their diet for 16 days (from Day 1 to Day 16 of gestation) (Schlicker and Cox 1968). No adverse effects on mating, fertilization, implantation, and fetal development (malformations) were observed among rats administered a concentration of 0.2 percent[Zn] as zinc oxide in their diet (=120 mg[Zn]/kg-day).

Test Spp: Rat; Body weight = 0.25 kg (Lewis 1992); Food Intake = 15 g/day (Lewis 1992)

Dosage: 0.2% Zn in diet = 2,000 mg[Zn]/kg_{food}

NOAEL = (2,000 mg[Zn]/kg_{food} • 15 g/day • 1 kg/1,000 g) / 0.25 kg = 120 mg[Zn]/kg-day

Decreased fetal growth and 100 percent resorption of 15- and 16-day-old fetuses were observed among rats administered a concentration of 0.4 percent[Zn] (= 240 mg[Zn]/kg-day) as zinc oxide in their diet. This reproductive study was considered more directly related to SSFL assessment endpoints as compared to the histopathological study (Aughey et al. 1977).

A dose of 120 mg[Zn]/kg-day was selected to derive baseline ERA TRVs for mammalian wildlife and is considered to be a chronic NOAEL because:

- The study considered exposure over 16 days during a critical and sensitive developmental period (i.e., from day 1 to day 16 of gestation).

- No adverse effects on fetal development was observed among rats administered zinc at this dose.

Features that support the use of this study include:

- Fetal development and fetal resorption can be directly related to reproductive success, from which the persistence of population may be inferred.
- Effects to a sensitive life stage (fetus) were examined.
- A serial dosing regime was administered (e.g., control, 2% and 4% [Zn] in diet).
- Both a NOAEL and LOAEL were reported, permitting a limited characterization of a dose-response relationship.
- A minimum of 10 females per treatment were examined.
- An independent review by the U.S. DOE (Sample et al. 1996) supports the use of this study to derive toxicity benchmarks for wildlife species.
- An independent toxicological review by the University of California (UC Davis 2004) supports the use of this value to derive TRVs for wildlife species.

C9.1.2 Other Related Toxicity Studies

Seven toxicity studies examining reproductive, developmental/growth, or mortality endpoints were obtained for mammals ingesting zinc. For perspective, the selected dose and doses from other related toxicity studies are plotted in Figure C5-1.

C9.2 Avian Toxicity – Ingestion

No avian toxicity benchmark for zinc is proposed for the baseline ERA.

C10.0 POLYCHLORINATED BIPHENYLS (PCBs)

Polychlorinated biphenyls (PCBs) are a class of 209 possible compounds that consist of a biphenyl molecule to which two or more chlorine atoms are substituted for hydrogen atoms. PCBs strongly absorb to soils and sediments; they are stable, are slow to degrade in the environment, and may biomagnify in higher trophic levels. Most of the congeners that are toxic or persist in the environment contain between four and six chlorine atoms per molecule. Coplanar forms are more directly toxic, whereas noncoplanar forms tend to bioaccumulate

more readily as they are less easily metabolized (Eisler 1986b). Aroclors are mixtures of PCB congeners having different numbers of chlorine atoms.

Aroclors may elicit reproductive, mutagenic, carcinogenic, and systemic effects in mammals. Signs of Aroclor poisoning in mammals include anorexia, fatty liver, kidney degeneration, gastric ulcers, nasal and ocular secretions, muscular incoordination, and morbidity. Birds tend to be more resistant to PCBs than mammals. Signs of Aroclor poisoning in birds include morbidity, tremors, muscular incoordination, eggshell thinning, and effects on reproduction, growth, and behavior.

Although toxicity data for Aroclor 1254 and 1260 were found, few reproductive and developmental toxicity data were found for other Aroclors or total PCBs. However, an abundance of research on QSARs suggests that chemicals with similar molecular structures or physicochemical properties have similar biological activity and toxicity (Donkin 1994; Nirmalakhandan and Speece 1988). Therefore, TRVs for total PCBs were developed based on toxicity data for Aroclors 1254 and 1260.

C10.1 Mammalian Toxicity – Ingestion

The BTAG TRV-Low of 0.36 mg[Aroclor 1254]/kg-day was obtained from a study by Simmons and McKee (1992) wherein Aroclor 1254 was administered to 90-day-old white-footed mice in their feed for 21 days. BTAG reported that a dose of 0.36 mg[Aroclor 1254]/kg-day had no effect on liver weight, enzyme activity, or pentobarbitol-induced sleep time (no calculations of dose were provided by BTAG). Reproductive effects were observed at the next highest dose of 0.71 [Aroclor 1254]/kg-day (in McCoy et al. 1995). Simmons and McKee (1992) did report that 0.36 mg[Aroclor 1254]/kg-day caused an increase in the activity of a specific enzyme (ethoxyresorufin-O-dealkylase). However, this enzymatic effect was not associated with adverse effects or histological changes in choroid epithelial cells. A limitation of the study is that examined endpoints that are not directly related to SSFL assessment endpoints as compared to a reproductive impairment study.

The BTAG TRV-High of 1.28 mg[Aroclor 1254]/kg-day was obtained from a study by Linzey (1987) wherein Aroclor 1254 was administered to white-footed mice in their feed for up to 18 months. BTAG reported that a dose of 1.28 mg[Aroclor 1254]/kg-day resulted in decreased survival of pups to 28 days of age, increased birth intervals, and decreased numbers of young per litter (no calculations of dose were provided by BTAG). Linzey (1988) confirmed impaired reproduction at this dose in a later multigenerational study showing reduced reproductive success in the second generation. A limitation of the study

was that only a single dose treatment was studied, prohibiting a characterization of a dose-response relationship.

C10.1.1 Selected Toxicity Study

The BTAG TRV-Low selected to derive baseline ERA TRVs for mammalian wildlife.

C10.1.2 Other Related Toxicity Studies

Seventeen toxicity studies for mammals were found that included ingestion of Aroclor: seven acute mortality and ten reproductive/developmental studies. For perspective, the selected dose and doses from other related toxicity studies are plotted in Figure C5-1.

C10.2 Avian Toxicity – Ingestion

The BTAG TRV-Low of 0.09 mg[Aroclor 1254]/kg-day was obtained from a study by Platonow and Reinhart (1973) wherein Aroclor 1254 was administered to chickens in their feed for 39 weeks. This study reported that PCBs accumulated in tissues are transferred to the egg during laying. A dose of 0.88 mg[Aroclor 1254]/kg-day resulted in reduced egg production (no calculations of dose were provided by BTAG). The dose of 0.88 [Aroclor 1254]/kg-day was divided by an effect-to-NOAEL UF of 10, resulting in the BTAG TRV-Low of 0.09 [Aroclor 1254]/kg-day.

The BTAG TRV-High of 1.27 mg[Aroclor 1242]/kg-day was obtained from a study by Britton and Huston (1973) wherein Aroclor 1242 was administered to chickens in their feed for 6 weeks. BTAG reported that at a dose of 1.27 mg/kg-day, a decrease in hatchability was observed. BTAG noted that adverse effects were also reported at this dose in Harris et al. (1976), including a decrease in the weight of the bursa of Fabricus in the progeny of hens fed a variety of Aroclors. The bursa of Fabricus is a thymus-like organ with immunologic functions.

BTAG reported that concentrations passed to the egg reach a maximum after several months of ingestion by the hen and concluded that longer exposure durations may more accurately predict reproductive effects caused by PCBs.

C10.2.1 Selected Toxicity Study

Breeding pairs of screech owls (*Otus asio*) were administered oral doses of Aroclor 1242 in their diet for two generations (McLane and Hughes 1980). No adverse effects on fertility and

hatching success were observed among owls administered a dose of 3 ppm[Aroclor 1248] in their diet (= 0.42 mg[Aroclor 1248]/kg-day).

Test Spp: Screech owl; Body weight = 0.18 kg (Dunning 1984); Food intake = 25 g/day (Pattee et al. 1988, as cited in Sample et al. 1996

Dosage: 3 ppm[Aroclor 1248] in diet = 3 mg[Aroclor 1248]/kg_{food}

NOAEL = (3 mg[Aroclor 1248]/kg_{food} • 25 g/day • 1 kg/1,000 g) / 0.18 kg

= 0.42 mg[Aroclor 1248]/kg-day

A limitation of this study is the fact that only one dose level was administered, prohibiting a characterization of a dose-response relationship. However, use of the value from this study may overestimate risks since no adverse effects were reported at the only dose administered.

A dose of 0.42 mg[PCB]/kg-day was selected to derive baseline ERA TRVs for avian wildlife and is considered to be an ecologically relevant chronic NOAEL because:

- The study considered exposure over two generations, including during reproduction.
- No adverse effects on fertility and hatching success were observed among birds administered this dose.

Features that support the use of this study include:

- Fertility and hatching success can be related to reproductive success.
- A sensitive life stage was examined (e.g., embryo).
- A wildlife species was examined.

In the study selected by BTAG, effects were observed at the lowest dose administered—i.e., a NOAEL-equivalent value was estimated by applying an effects-to-NOAEL UF. Rather than estimating a NOAEL, the McLane and Hughes (1980) study documented an observable NOAEL that was less than the LOAEL dose administered by Planatov and Reinhardt (1973)—an actual NOAEL that was less than the reported LOAEL was considered to be preferable over a calculated NOAEL.

C10.2.2 Other Related Toxicity Studies

Twenty-two mortality and reproductive toxicity studies for birds were found for the ingestion of PCBs. For perspective, the selected dose and doses from other related toxicity studies are plotted in Figure C5-2.

C11.0 ETHYLBENZENE

Ethylbenzene is an aromatic and volatile compound that occurs naturally in coal tar and petroleum and is found in many anthropogenic substances such as paints, inks, insecticides, and gasoline. Ethylbenzene moves easily into air from water and soil where some organisms may be exposed via inhalation. The inhalation of ethylbenzene can result in death, fetal resorption, skeletal development retardation, malformations (i.e., supernumerary ribs), hematological changes, liver and kidney toxicity, eye irritation, and central nervous system depression. Oral exposure to ethylbenzene can result in death, liver and kidney toxicity, and possible carcinogenesis.

No BTAG TRVs for ethylbenzene were provided by DTSC (2003).

C11.1 Mammalian Toxicity – Inhalation

The toxicity benchmark for mammals was based on a reproductive study on rats (Ungvary and Tatrai 1985). A concentration of 150 mg[ethylbenzene]/m^3 in air was selected to derive baseline ERA TRVs for mammalian wildlife and is considered to be an ecologically relevant chronic NOAEL because:

- The study considered exposure over 9 days during a significant portion of the reproductive period.
- Increased fetal resorption, percent skeletal retarded fetuses, and percent fetuses with any malformation were observed among rats that were administered this concentration for 24 hours per day.

Features that support the use of this study include:

- Fetal resorption, fetus weight, retardation of skeletal development, and malformations can be directly related to reproductive success.
- Effects to a sensitive life stage (e.g., fetus) were examined.
- A serial dosing regime was administered (e.g., control, 600, 1,200, and 2,400 mg[ethylbenzene]/m^3 in air).
- Both a NOAEL and LOAEL were reported, permitting a limited characterization of a dose-response relationship.
- At least 17 females per treatment were examined.

C11.1.1 Selected Toxicity Study

Rats were administered 600, 1,200, or 2,400 mg[ethylbenzene]/m^3 in air for 24 hours per day for 9 days during reproduction (from day 7 to day 15 of gestation) (Ungvary and Tatrai 1985). No adverse effects on fetal resorption, fetus weight, and retardation of skeletal development were observed among fetuses born to rats that were administered a concentration of 600 mg[ethylbenzene]/m^3 in air for 6 hours per day (= 107 mg[ethylbenzene]/m^3, corrected for 24 hour/day).

Dosage: 600 mg[ethylbenzene]/m^3

NOAEL = 600 mg[ethylbenzene]/m^3 • 6 hrs/24 hrs

= 150 mg[ethylbenzene]/m^3 for 24 hrs/day

Increased fetal resorption, percent skeletal retarded fetuses, and percent fetuses with any malformation were observed among fetuses born to rats that were administered concentrations as low as 600 mg[ethylbenzene]/m^3 in air for 24 hours per day. In a related 10-day study (from day 6 to day 15 of gestation), no adverse effects on fetal resorption, fetus weight, retardation of skeletal development, and malformations were observed among fetuses born to mice that were administered a concentration of 500 mg[ethylbenzene]/m^3 in air for 12 hours per day (= 250 mg[ethylbenzene]/m^3, corrected for 24 hour/day) and among fetuses born to rabbits that were administered a concentration of 500 mg[ethylbenzene]/m^3 in air for 24 hours per day (Ungvary and Tatrai 1985).

C11.1.2 Other Related Toxicity Studies

Five toxicity studies examining reproductive endpoints were obtained for mammals inhaling ethylbenzene. No reproductive studies over one or more generations of mammals were found for inhalation exposures to ethylbenzene. For perspective, the selected dose and doses from other related toxicity studies are plotted in Figure C5-3 (see also Table C5-5).

C11.2 Avian Toxicity – Inhalation

No avian inhalation toxicity benchmark for ethylbenzene is proposed for the baseline ERA.

C12.0 TETRACHLORETHENE

Tetrachloroethylene or perchloroethylene (PCE) is a synthetic chemical that is widely used for metal-degreasing operations. It is also used as a starting material (building block) for making other chemicals and is used in some consumer products. Tetrachloroethylene is a

nonflammable liquid at room temperature. It evaporates easily into the air and has a sharp, sweet odor. The chemical is found most frequently in air and, less often, in water.

No BTAG TRVs for PCE were provided by DTSC (2003).

C12.1 Mammalian Toxicity – Inhalation

The toxicity benchmark for mammals was based on a developmental study on rats (Nelson et al. 1980). A concentration of 198 mg[PCE]/m^3 in air was selected to derive baseline ERA TRVs for mammalian wildlife and is considered to be an ecologically relevant chronic NOAEL because:

- The study considered exposure over 7 days including a significant portion of the reproductive period.
- No adverse effect on number of offspring, proportion of offspring born alive, or offspring birth weights were observed among rats administered this concentration.

Features that support the use of this study include:

- Number of offspring, proportion of offspring born alive, and offspring birth weights can be directly related to reproductive success.
- Effects to a sensitive life stage (e.g., fetus) were examined.
- A serial dosing regime was administered (i.e., control, 100, 900 ppm[PCE]).
- 15-19 dams per treatment were examined.
- Use of this concentration is supported by the results of Schwetz et al. (1975) and Hardin et al. (1981).

C12.1.1 Selected Toxicity Study

Pregnant Sprague-Dawley rats were exposed to 0, 100, or 900 ppm[PCE] from day 14 to day 20 of gestation or to 0 or 900 ppm[PCE] from day 7 to day 13 of gestation (Nelson et al. 1980). All exposures were for 7 hours per day. No adverse effects on the number of offspring, proportion of offspring born alive, offspring birth weights, and behavioral changes were observed among rats administered 100 ppm[PCE] in air (= 198 mg[PCE]/m^3, corrected for 24 hrs/day).

Test Spp: Rat; Molecular wt PCE = 166 mg/mM; Molar volume = 24.45 m^3/mM

Dosage: 100 ppm[PCE] in air

NOAEL = 100 ppm[PCE] • 166 mg/mM / 24.45 m^3/mM = 679 mg[PCE]/m3

NOAEL = 679 mg[PCE]/m3 • 7 hrs/24 hrs

= 198 mg[PCE]/m3 for 24 hrs/day

No adverse effects on the number of offspring, proportion of offspring born alive, offspring birth weights, and behavioral changes were observed among rats administered 900 ppm[PCE] in air. Effects occurred after exposure to 900 ppm[PCE] for both exposure periods. Pups of dams exposed to 900 ppm from day 7 to day 13 of gestation had decreased performance during tests of neuromuscular ability (ascent on a wire mesh screen and rotarod balancing) on certain days. Offspring (before weaning) from dams exposed to 900 ppm from day 14 to day 20 of gestation performed poorly on the ascent test on test day 14 only, but later in development their performance in the rotarod balancing test was superior to the controls, and they were more active in an open-field test.

C12.1.2 Other Related Toxicity Studies

Four reproductive and two growth studies for mammals were found for the inhalation of PCE. For perspective, the selected dose and doses from other related toxicity studies are plotted in Figure C5-3.

C12.2 Avian Toxicity – Inhalation

No avian inhalation toxicity benchmark for tetrachloroethene is proposed for the baseline ERA.

C13.0 TOLUENE

Toluene is an aromatic and volatile compound that is utilized as an intermediate chemical process constituent, a paint and coating solvent, and a gasoline additive. Animals are exposed to toluene primarily via inhalation of vapor or the ingestion of tainted foods, soils, and drinking water. A principal effect of toluene through acute exposure is respiratory irritation and depression of the central nervous system, which can result in death at high level but is reversible following exposure at moderate levels. Chronic inhalation of toluene has caused body and liver weight changes and hematocrit decreases. Sufficiently excessive levels of inhaled toluene can result in toxic effects to the heart. In spite of such toxic hazards following acute exposure to toluene, it appears to be limited in producing permanent effects to organs and physiological systems. Toluene does not have a high potential for biomagnification through the food chain based on its chemical properties.

No BTAG TRVs for toluene were provided by DTSC (2003).

C13.1 Mammalian Toxicity – Inhalation

The toxicity benchmark for mammals was based on a reproductive study on mice (National Toxicology Program [NTP] 1990). A concentration of 218 mg[toluene]/m^3 in was selected to derive baseline ERA TRVs for mammalian wildlife and is considered to be an ecologically relevant chronic NOAEL because:

- The study considered exposure over 2 years.
- No histopathological lesions in ovaries or testes were observed among mice that were administered this concentration.

Features that support the use of this study include:

- Lesions in ovaries and testes were considered a reproductive endpoint, but are difficult to relate to reproductive success.
- Effects to a sensitive life stage (e.g., fetus) were examined.
- A serial dosing regime was administered (e.g., control, 600, and 1,200 ppm[toluene] in air).
- 120 individuals per treatment were examined.

The data set was limited because no adverse effects were observed at the highest administered dose and the use of this concentration as the toxicity benchmark may overestimate risks to mammalian wildlife receptors.

C13.1.1 Selected Toxicity Study

Rats and mice were administered 600 or 1,200 ppm[toluene] in air for 6.5 hours per day, 5 days per week for 24 months (NTP 1990). No histopathological lesions in ovaries or testes were observed among rats that were administered concentrations of up to 300 ppm[toluene] (up to 218 mg[toluene]/m^3, corrected for a 24 hours/day, 7 days/week duration) in air or among mice that were administered concentrations of up to 1,200 ppm[toluene] (up to 873 mg[toluene]/m^3, corrected for a 24 hours/day, 7 days/week duration) in air.

Test Spp: Rat; Molecular wt toluene = 92 mg/mM; Molar volume = 24.45 m3/mM

Dosage: 300 ppm[toluene] in air

NOAEL = 300 ppm[toluene] • 92 mg/mM / 24.45 m^3/mM

= 1,129 µg[toluene]/L = 1,130 mg[toluene]/m^3

NOAEL = 1,129 mg[toluene]/m^3 • 6.5 hrs/24 hrs • 5 days/7 days

= 218 mg[toluene]/m^3 for 24 hrs/day, 7 days/week

Test Spp: Mouse; Molecular wt toluene = 92 mg/mM; Molar volume = 24.45 m^3/mM

Dosage: 1,200 ppm[toluene] in air

NOAEL = 1,200 ppm[toluene] • 92 mg/mM / 24.45 m^3/mM

= 4,515 µg[toluene]/L = 4,515 mg[toluene]/m^3

NOAEL = 4,515 mg[toluene]/m^3 • 6.5 hrs/24 hrs • 5 days/7 $days^3$

= 873 mg[toluene]/m^3 for 24 hrs/day, 7 days/week

The effects of histopathological changes on reproductive performance or reproductive success were not discussed by the authors. Because no adverse effects were observed at the highest administered dose, a thorough evaluation and characterization of a dose-response relationship are prohibited.

C13.1.2 Other Related Toxicity Studies

Eight toxicity studies examining reproductive, developmental/growth, or mortality endpoints were obtained for mammals inhaling toluene. For perspective, the selected dose and doses from other related toxicity studies are plotted in Figure C5-3.

C13.2 Avian Toxicity – Inhalation

No avian inhalation toxicity benchmark for toluene is proposed for the baseline ERA.

C14.0 TRICHLOROETHENE

Trichloroethene (TCE) is a nonflammable, colorless liquid at room temperature with a somewhat sweet odor and a sweet, burning taste. This man-made chemical does not occur naturally in the environment. TCE is now mainly used as a solvent to remove grease from metal parts; it is also used as a solvent in other ways and is used to make other chemicals. TCE can also be found in household products, including typewriter correction fluid, paint removers, adhesives, and spot removers. It evaporates easily but can stay in soils and groundwater. Once it is in the air, it has a half-life of approximately one week; it takes weeks to break down in surface water. Very little TCE breaks down in the soil, and therefore it can pass through the soil into groundwater. In groundwater, the breakdown process is much slower because of the much slower evaporation rate. In the body, TCE may break down into dichloroacetic acid, trichloroacetic acid, chloral hydrate, and 2-

chloroacetaldehyde. These metabolic breakdown products may be toxic to animals (ATSDR 1997).

No BTAG TRVs for TCE were provided by DTSC (2003).

C14.1 Mammalian Toxicity – Inhalation

The toxicity benchmark for mammals was based on a reproductive study on rats (Dorfmueller et al. 1979). A concentration of 1,735 mg[TCE]/m^3 in air was selected to derive baseline ERA TRVs for mammalian wildlife and is considered to be an ecologically relevant chronic NOAEL because:

- The study considered exposure over 5 weeks including a significant portion of the reproductive period.
- No adverse effects on growth, number of implantations, fetal resorptions, live/dead fetuses per litter, skeletal and soft tissue anomalies, and activity were observed among rats administered this concentration.

Features that support the use of this study include:

- Number of implantations, fetal resorptions, live/dead fetuses per litter, and skeletal and soft tissue anomalies can be directly related to reproductive success.
- Effects to a sensitive life stage (e.g., fetus) were examined.
- A serial dosing regime was administered (e.g., control, 1,800 ppm[TCE] in air prior to mating only, 1,800 ppm[TCE] in air during pregnancy only, and 1,800 ppm[TCE] in air prior to mating and during pregnancy).
- Both a NOAEL and LOAEL were reported, permitting a limited characterization of a dose-response relationship.
- 30 individuals per treatment were examined.

C14.1.1 Selected Toxicity Study

Rats were administered filtered air during the entire experiment, or 1,800 ppm[TCE] in air two weeks prior to mating, or 1,800 ppm[TCE] in air from day 1 to day 20 of pregnancy, or 1,800 ppm[TCE] in air two weeks prior to mating and from day 1 to day 20 of pregnancy (Dorfmueller et al. 1979). During the two-week period prior to mating, rats were administered TCE in air for 6 hours per day, 5 days per week and during the period from

Day 1 to Day 20 of pregnancy, rats were administered TCE in air for 6 hours per day, 7 days per week. No treatment-related adverse effects on maternal toxicity, growth, number of implantations, fetal resorptions, live/dead fetuses per litter, skeletal and soft tissue anomalies, and activity were observed among rats administered a concentration of 1,800 ppm[TCE] (= 1,735 mg[TCE]/m^3, corrected for 24 hrs/day, 7 days/week) in air prior to mating and during reproduction.

Test Spp: Rat; Molecular wt. TCE = 132 mg/mM; Molar volume = 24.45 m^3/mM

Dosage: 1,800 ppm[TCE] in air;

NOAEL = 1,800 ppm[TCE] • 132 mg/mM / 24.45 m^3/mM
= 9,718 µg[TCE]/L = 9,718 mg[TCE]/m^3

NOAEL = 9,718 mg[TCE]/m^3 • 6 hrs/24 hrs • 5 days/7 days
= 1,735 mg[TCE]/m^3 for 24 hrs/day, 7 days/week

The data set was limited because no adverse effects were observed at the highest administered dose, and the use of this concentration as the toxicity benchmark may overestimate risks to mammalian wildlife receptors.

C14.1.2 Other Related Toxicity Studies

No studies have been found that conclusively indicate teratogenic effects due to exposures to TCE (ATSDR 1997). Three reproductive and developmental toxicity studies for mammals were found for the inhalation of TCE. For perspective, the selected dose and doses from other related toxicity studies are plotted Figure C5-3.

C14.2 Avian Toxicity – Inhalation

No avian inhalation toxicity benchmark for trichloroethene is proposed for the baseline ERA.

C15.0 XYLENE

Xylene generally occurs as a man-made VOC that is produced from petroleum and coal. It exists naturally in petroleum and coal tar, and is also released by forest fires. Xylene is used in solvents, thinners, coatings, cleaning agents, airplane fuels and gasoline, and in other capacities in the chemical industry. Three distinct isomers of xylene exist (m-, o-, and p-xylene); xylene encountered is usually a mixture of the three isomers. Xylene evaporates rapidly into the air. Inhalation of xylene may result in restricted breathing, respiratory irritation, possible adverse cardiovascular effects, increased liver and kidney weights, liver and kidney chemistry perturbations, neurotoxic effects (e.g., tremors), and death by

respiratory failure and/or sudden ventricular fibrillation. Developmental effects include fetotoxic effects such as skeletal variations, fetal resorptions, and decreased fetal weights. Oral ingestion of xylene can induce increased liver and kidney weights, liver enzymatic changes, lowered food consumption, reduced body weight gain, impaired visual function, hyperactivity, and mortality. Xylenes do not have a high potential for biomagnification through the food chain based on their chemical properties.

No BTAG TRVs for xylenes were provided by DTSC (2003).

C15.1 Mammalian Toxicity – Inhalation

The toxicity benchmark for mammals was based on a reproductive study on rats (Ungvary et al. 1980). A concentration of 150 mg[xylene]/m^3 in air was selected to derive baseline ERA TRVs for mammalian wildlife and is considered to be an ecologically relevant chronic LOAEL because:

- The study considered exposure over 8 days including a significant portion of the reproductive period.
- Increased incidence of skeletal retardation (unspecified) was observed among rats that were administered this concentration.
- No adverse effects on maternal weight gain, number of litters, number of live fetuses, number of fetal resorption, and fetal loss in implantations, mean fetal weight, hepatic an renal histology, and hepatic an renal histochemistry were observed among rats that were administered this concentration.

Features that support the use of this study include:

- Maternal weight gain, number of litters, number of live fetuses, number of fetal resorption, fetal loss in implantations, and mean fetal weight can be directly related to reproductive success.
- Increased incidence of skeletal retardation (unspecified) may be used to indirectly infer fitness and persistence of populations.
- Effects to a sensitive life stage (e.g., fetus) were examined.
- A serial dosing regime was administered (e.g., control, 150, 1,500, and 3,000 mg[xylene]/m^3 in air).
- Both a NOAEL and LOAEL were reported, permitting a limited characterization of a dose-response relationship.

- Adverse reproductive effects at concentrations greater than 1,000 mg[xylene]/m^3 is consistent with other studies, in particular Balogh *et al.* (1982, as reported in ATSDR 2002).
- 20 to 30 individuals per treatment were examined.

C15.1.1 Selected Toxicity Study

Rats were administered 150, 1,500, and 3,000 mg[xylene]/m^3 in air (m-, o-, or p-xylene) for 24 hours per day for 8 days during reproduction (from Day 7 to Day 14 of gestation) (Ungvary et al. 1980). No adverse effects on maternal weight gain, number of litters, number of live fetuses, number of fetal resorption, and fetal loss in implantations were observed among rats that were administered concentrations of up to 1,500 mg[m-, o-, or p-xylene]/m^3 in air for 24 hours per day.

Reduced mean fetal weight was observed among rats that were administered 1,500 mg[o-xylene]/m^3 and 3,000 mg[m- or p-xylene]/m^3. Increased incidence of fetal skeletal retardation (unspecified) was not observed among rats administered m-xylene, was observed among rats that were administered a concentration of 3,000 mg[o-xylene]/m^3, and was observed among rats that were administered a concentration of 150 mg[p-xylene]/m^3. Note that no changes in histology, histochemistry, or ultrastructure of organs that could be indicative of retardation were observed at a concentration of 150 mg[o-, m-, or p-xylene]/m^3—changes in renal histochemistry that may be indicative of the retardation of the enzyme system related to maturity were observed at 3,000 mg[o-, m-, or p-xylene]/m^3.

Though the authors concluded that skeletal retardation was likely due to the "…relative starvation of the mothers…", no effects on maternal weight were observed at all administered concentrations and no effect on caloric intake during gestation specific to p-xylene relative to other isomers could be discerned. Further, the authors concluded that "…teratogenicity of o-, m-, and p-xylene can be excluded in rats."

C15.1.2 Other Related Toxicity Studies

Six toxicity studies examining reproductive endpoints were obtained for mammals inhaling xylene. For perspective, the selected dose and doses from other related toxicity studies are plotted in Figure C5-3.

C15.2 Avian Toxicity – Inhalation

No avian inhalation toxicity benchmark for xylene is proposed for the baseline ERA.

C16.0 LITERATURE CITED

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TABLES

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Table C5-1
Mammalian BERA TRVs — Toxicity Study Background Information

Chemical	Test Species	Age	Observed Effect	Effect Level	Exposure Duration	Food Conc. (mg/kg)	Water Conc. (mg/L)	Expo Freq	Ingest. Rate (g/d)	Drink Rate (mL/d)	Body Weight (kg)	Toxicity Benchmark (mg/kg-d)	Reference	Uncertainty Factor: Subchronic-to-Chronic	Uncertainty Factor: Endpoint-to-NOAEL
Inorganics															
Antimony	Mouse	Not given	• No adverse effect on survivorship, and no histopathological changes and only minor reductions in growth at 540 days and median life span	NOAEL	Lifetime		5			5	0.025	1.0	Schroeder *et al.* 1968	—	—
Cadmium	Rat	Adult	• No adverse effects on number of copulating females, number of pregnant females, total implants, live fetuses, average fetal weight, and male fertility	NOAEL	12 weeks						0.25	1.0	Sutou *et al*. 1980b	—	—
Copper	Mice	6-week-old	• No adverse effects on number of cells in the thymus, food ingestion rate, body weight, or mortality	NOAEL	10 weeks		No calculations of dose were provided by UC Davis (2004)					102	Hebert *et al.* 1993	10	—
Molybdenum	• No BERA toxicity benchmark is proposed •														
Nickel	Rat	Adult & Weanling	• At 15 mg/kg-day, no adverse effects on fertility, gestation, offspring viability, and lactation indices(Ambrose *et al.* 1976) • 3.0 mg/kg-day = dietary requirement (USPHS 1993)	NOAEL	3 generations		Dose is the geometric mean of the values provide in Ambrose *et al.* 1975 and USPHS 1993 (UC Davis 2004)					6.7	Ambrose *et al*. 1976; USPHS 1993	—	—
Selenium	• No BERA toxicity benchmark is proposed •														
Silver	Rat	Adult	• "Excellent clinical condition" was reported and no adverse effect on behavior and fluid consumption	NOAEL	12 weeks		648			25	0.25	65	Walker 1971	—	—
Zinc	Rat	Adult	• No adverse effect on fetal development	NOAEL	16 days (gestation)	2,000			15		0.25	120	Schlicker & Cox 1968	—	—
Volatile Organic Compounds -- Inhalation Only															
BTEX															
Toluene	Rat	Adult	• No histopathological lesions in ovaries or testes	NOAEL	2 years			6.5 hrs/day, 5 days/week			0.025	218 mg/m^3	NTP 1990	—	—
Ethylbenzene	Rat	Adult	• Increased fetal resorption, percent skeletal retarded fetuses, and percent fetuses with any malformation	LOAEL	9 days (gestation)			24 hrs/day			0.25	150 mg/m^3	Ungvary & Tatrai 1985	—	10
Xylene	Rat	Adult	• No adverse effects on maternal weight gain, number of litters, number of live fetuses, number of fetal resorption, fetal loss in implantations, and mean fetal weight	NOAEL	8 days (gestation)			24 hrs/day			0.25	1,500 mg/m^3	Ungvary *et al.* 1980	—	—
Trichloroethene-Related VOCs															
Tetrachloroethene	Rat	Adult	• No adverse effect on number of offspring, proportion of offspring born alive, offspring birth weights	NOAEL	7 days (gestation)			7 hrs/day			0.25	198 mg/m^3	Nelson *et al.* 1980	—	—
Trichloroethene	Rat	Adult	• No adverse effects on growth, number of implantations, fetal resorptions, live/dead fetuses per litter, and skeletal and soft tissue anomalies	NOAEL	5 weeks (gestation)			6 hrs/day, 5 days/week			0.25	1,735 mg/m^3	Dorfmueller *et al.* 1979	—	—
Polychlorinated Biphenyls															
Total PCBs	White-footed mouse	90-day-old	• No adverse effect on liver weight, enzyme activity, or pentobarbitol-induced sleep time	NOAEL	21 days		No calculations of dose were provided by BTAG					0.36	Simmons and McKee 1992	—	—

Definitions:

g/d - Grams per day.
kg - Kilogram.
mg/kg - Milligrams per kilogram.
mg/kg-d - Milligrams per kilogram per day.
mg/L - Milligrams per liter.
mg/m^3 - Milligrams per meter cubed.
mL/d - Milliliters per day.
NOAEL - No observed adverse effect level.
LOAEL - Low observed adverse effect level.
PCBs - Polychlorinated biphenyls.
TRV - Toxicity reference value.
VOCs - Volatile organic chemicals.

Table C5-2
Avian BERA TRVs — Toxicity Study Background Information

Chemical	Test Species	Age	Observed Effect	Effect Level	Exposure Duration	Food Conc. (mg/kg)	Water Conc. (mg/L)	Ingest. Rate (g/d)	Drink Rate (ml/d)	Body Weight (kg)	Toxicity Benchmark (mg/kg-d)	Reference	Uncertainty Factor: Subchronic-to-Chronic	Uncertainty Factor: Endpoint-to-NOAEL
Inorganics														
Antimony	• No BERA toxicity benchmark is proposed •													
Cadmium	Mallard	1-day-old ducklings	• No effects on blood chemistry, serum chemistry, body or liver weight, and no degenerative effects in gizzard, intestine, liver, kidney, heart, lung, spleen, or skeletal muscle	NOAEL	12 weeks	9.2	No calcuations of dose were provided by BTAG				0.80	Cain *et al*. 1983	—	—
Copper	Chicks	1- day-old chicks	• No adverse effects on growth (weight gain)	NOAEL	8 weeks	496		41		0.70	29	Norvell *et al.* 1975	—	—
Molybdenum	Chicken	7 months	• Fewer eggs were laid and embryo viability was reduced	LOAEL	21 days	500		140		0.80	88	Lepore & Miller 1965	—	10
Nickel	Mallard	1-day-old ducklings	• No adverse effects on survivorship and growth	NOAEL	90 days	No calculations of dose were provided by BTAG					14	Cain & Pafford 1981	—	—
Selenium	Mallard	Adult	• No adverse effects on growth, adult survival, duckling survival, and deformed embryos	NOAEL	78 days	5		100		1.0	0.5	Heinz et al. 1987	—	—
Silver	• No BERA toxicity benchmark is proposed •													
Zinc	• No BERA toxicity benchmark is proposed •													
Volatile Organic Compounds														
BTEX														
Toluene	• No BERA toxicity benchmark is proposed •													
Ethylbenzene	• No BERA toxicity benchmark is proposed •													
Xylene	• No BERA toxicity benchmark is proposed •													
Trichloroethene-Related VOCs														
Tetrachloroethene	• No BERA toxicity benchmark is proposed •													
Trichloroethene	• No BERA toxicity benchmark is proposed •													
Polychlorinated Biphenyls														
Total PCBs	Screech owl	Adult	• No adverse effects on fertility and hatchability	NOAEL	2 generations	3		25		0.2	0.42	McLane & Hughes 1980	—	—

Definitions:

g/d - Grams per day.
kg - Kilogram.
mg/kg - Milligrams per kilogram.
mg/kg-d - Milligrams per kilogram per day.
mg/L - Milligrams per liter.
mL/d - Milliliters per day.
NOAEL - No observed adverse effect level.
LOAEL - Low observed adverse effect level.
PCBs - Polychlorinated biphenyls.
TRV - Toxicity reference value.
VOCs - Volatile organic chemicals.

Table C5-3.
Selected Mammalian Ingestion Toxicity Data

Chemical	Reference	Dose (mg/kg-day)	Endpoint	Study Type
Antimony	Bradley and Fredrick 1941	894	LD	Survivorship
Antimony	Environ. Qual. Saf. Suppl. 1975	7000	LD	Survivorship
Antimony	Schroeder et al. 1968	1.0	NOAEL	Growth
Cadmium	Eisler 1985, HSDB 1994, RTECS 1994	37	LD	Survivorship
Cadmium	Eisler 1985, HSDB 1994, RTECS 1994	890	LD	Survivorship
Cadmium	Schroeder and Mitchener 1971	2.6	LOAEL	Reproductive
Cadmium	Venugopal 1978	40	LOAEL	Reproductive
Cadmium	Webster 1988	10	LOAEL	Developmental
Cadmium	Hastings et al. 1978	12	LOAEL	Developmental
Cadmium	Sutou et al. 1980	10	LOAEL	Reproductive
Cadmium	Pond and Walker 1976	12	LOAEL	Growth
Cadmium	Koller and Roan 1977	110	LOAEL	Growth
Cadmium	Valois and Webster 1989	1.9	LOAEL	Histopath
Cadmium	Webster 1988	0.06	NOAEL	Develop
Cadmium	Pond and Walker 1975	12	NOAEL	Reproductive
Cadmium	Sutou et al. 1980	10	NOAEL	Reproductive
Cadmium	Kelman et al. 1978	2.5	NOAEL	Reproductive
Cadmium	Sutou et al. 1980	1.0	NOAEL	Reproductive
Copper	Boyden et al. 1938	240	LD	Survivorship
Copper	Lecyk 1980	144	LOAEL	Developmental
Copper	Aulerich et al. 1982	15	LOAEL	Reproductive
Copper	Hebert et al. 1993	3087	LOAEL	Growth
Copper	Hebert et al. 1993	632	LOAEL	Growth
Copper	Massie and Aiello 1984	65	LOAEL	Lifespan
Copper	Lecyk 1980	96	NOAEL	Develop
Copper	Aulerich et al. 1982	12	NOAEL	Reproductive
Copper	Pocino et al. 1991	2.7	NOAEL	Growth
Copper	Hebert et al. 1993	4157	NOAEL	Reproductive
Copper	Hebert et al. 1993	102	NOAEL	Growth
Copper	Hebert et al. 1993	10	NOAEL	Growth
Copper	Pocino et al. 1991	27	NOAEL	Growth
Copper	Boyden et al. 1938	30	NOAEL	Growth
Copper	Massie and Aiello 1984	13	NOAEL	Lifespan
Copper	Murthy et al. 1981	13	NOAEL	Neuro/Behav
Copper	Llewellyn et al. 1985	156	NOAEL	Systemic
Nickel	Smith et al. 1993	32	LOAEL	Reproductive
Nickel	RTI 1987	52	LOAEL	Reproductive
Nickel	Vyskocil et al. 1994	6.9	LOAEL	Systemic
Nickel	Ambrose et al. 1976	15	LOAEL	Reproductive
Nickel	Dieter et al. 1988	396	LOAEL	Growth
Nickel	USPHS 1993	3.0	MDR	Dietary
Nickel	Smith et al. 1993	1.3	NOAEL	Reproductive
Nickel	Ambrose et al. 1976	60	NOAEL	Reproductive
Nickel	UC Davis 2004	6.7	NOAEL	
Nickel	Vyskocil et al. 1994	6.9	NOAEL	Growth
Silver	Walker 1971	130	LOAEL	Growth
Silver	Walker 1971	65	NOAEL	Growth
Silver	Olcott 1948	89	NOAEL	Reproductive
Silver	Rungby and Danscher 1984	30	NOAEL	Growth
Zinc	Eisler 1993	680	LD	Survivorship
Zinc	Eisler 1993	1194	LD	Survivorship
Zinc	Schlicker and Cox 1968	411	LOAEL	Reproductive
Zinc	Schlicker and Cox 1968	240	LOAEL	Reproductive
Zinc	Ketcheson et al. 1969	300	LOAEL	Growth
Zinc	Aughey et al. 1977	96	LOAEL	Histopath

Table C5-3.
Selected Mammalian Ingestion Toxicity Data

Chemical	Reference	Dose (mg/kg-day)	Endpoint	Study Type
Zinc	Straube et al. 1980	390	LOAEL	Survivorship
Zinc	Aughey et al. 1977	96	NOAEL	Reproductive
Zinc	Schlicker and Cox 1968	120	NOAEL	Reproductive
Zinc	Uriu-Hare el al. 1989	39	NOAEL	Reproductive
Zinc	Ketcheson et al. 1969	120	NOAEL	Reproductive
Zinc	Maita et al. 1981	180	NOAEL	Growth
Zinc	Aughey et al. 1977	100	NOAEL	Growth
Zinc	Bleavins et al. 1983	21	NOAEL	Reproductive
PCB	Eisler 1986; Sanders & Kirkpatrick 1977; Talcott & Koller 1983	5.6	LD	Survivorship
PCB	Eisler 1986; Sanders & Kirkpatrick 1977; Talcott & Koller 1983	30	LD	Survivorship
PCB	IARC 1978; NAS 1979; USEPA 1980	1300	LD	Survivorship
PCB	IARC 1978; NAS 1979; USEPA 1980	4000	LD	Survivorship
PCB	McCoy et al. 1995	0.71	LOAEL	Systemic
PCB	Linzey 1987	1.3	LOAEL	Reproductive
PCB	Bleavins et al. 1980	0.70	LOAEL	Reproductive
PCB	Welsch 1985	13	LOAEL	Reproductive
PCB	Sanders et al. 1974	140	LOAEL	Systemic
PCB	Gray et al. 1993	25	LOAEL	Reproductive
PCB	RTECS 1994	1.0	LOAEL	Reproductive
PCB	Aulerich and Ringer 1977	0.7	LOAEL	Reproductive
PCB	Simmons and McKee 1992	0.36	NOAEL	Systemic
PCB	Aulerich and Ringer 1980	1.4	NOAEL	Developmental
PCB	Welsch 1985	1.3	NOAEL	Reproductive
PCB	Sanders et al. 1974	140	NOAEL	Reproductive
PCB	Villenueve et al. 1971	10	NOAEL	Reproductive
PCB	Eisler 1986	126	NOAEL	Reproductive
PCB	HSDB 1994	30	NOAEL	Reproductive
PCB	Aulerich and Ringer 1977	0.14	NOAEL	Reproductive

Notes:

LOAEL	Lowest observable adverse effect level
NOAEL	No observable adverse effect level
LD	Lethal dose
MDR	Minimum dietary requirement

Table C5-4.
Selected Avian Ingestion Toxicity Data

Chemical	Reference	Dose (mg/kg-day)	Endpoint	Study Type
Cadmium	Hill et al. 1975	47	LD	Survivorship
Cadmium	Hill et al. 1975	385	LD	Survivorship
Cadmium	Di Giulio and Scanlon	52	LOAEL	Systemic
Cadmium	Hill et al. 1975	500	LOAEL	Survivorship
Cadmium	Leach et al. 1979	8.4	LOAEL	Reproductive
Cadmium	Richardson et al. 1974	10	LOAEL	Developmental
Cadmium	White and Finley 1978	20	LOAEL	Reproductive
Cadmium	White et al. 1978	20	LOAEL	Systemic
Cadmium	Cain et al. 1983	0.8	NOAEL	Systemic
Cadmium	Hill et al. 1975	224	NOAEL	Survivorship
Cadmium	Leach et al. 1979	2.1	NOAEL	Reproductive
Cadmium	White and Finley 1978	1.5	NOAEL	Reproductive
Copper	Shivanandappa et al. 1983	693	LD	Survivorship
Copper	Bakalli et al. 1995	22	LOAEL	Growth
Copper	Jensen and Maurice 1978	52	LOAEL	Growth
Copper	Jensen and Maurice 1978	26	LOAEL	Growth
Copper	Jensen and Maurice 1978	52	LOAEL	Systemic
Copper	Mayo et al. 1956	27	LOAEL	Growth
Copper	Mayo et al. 1956	103	LOAEL	Survivorship
Copper	Mehring et al. 1960	62	LOAEL	Growth
Copper	Norvell et al. 1975	43	LOAEL	Growth
Copper	Van Vleet et al. 1981	149	LOAEL	Systemic
Copper	Shivanandappa et al. 1983	200	LOAEL	Systemic
Copper	Association of Avian Veterinarians	1.7	MDR	Not specified
Copper	Arthur et al. 1958	41	NOAEL	Ill effects
Copper	Humphreys 1989	21	NOAEL	Safe diet
Copper	Humphreys 1989	50	NOAEL	Safe diet
Copper	Mehring et al. 1960	33	NOAEL	Growth
Copper	Norvell et al. 1975	26	NOAEL	Growth
Copper	Underwood et al. 1956	69	NOAEL	Growth
Molybdenum	Friberg 1975	1080	LD	Survivorship
Molybdenum	Lepore and Miller 1965	88	LOAEL	Reproductive
Molybdenum	Davies et al. 1960	18	NOAEL	Growth
Molybdenum	Davies et al. 1960	90	NOAEL	Growth
Molybdenum	Friberg 1975	90	NOAEL	Growth
Nickel	Cain and Pafford 1981	52	LOAEL	Systemic
Nickel	NAS 1975, Nielsen 1977, Weber & Reid 1968, Eisler 1998	98	LOAEL	Growth
Nickel	Cain and Pafford 1981	14	NOAEL	Systemic
Nickel	Eastin and O'Shea 1981	121	NOAEL	Systemic
Nickel	NAS 1975, Nielsen 1977, Weber & Reid 1968, Eisler 1999	54	NOAEL	Growth
Selenium	El-Begearmi et al. 1977	1.4	LOAEL	Reproductive
Selenium	Heinz et al. 1987	1.0	LOAEL	Developmental
Selenium	Heinz et al. 1987	2.5	LOAEL	Juv Survivorship
Selenium	Heinz et al. 1987	10	LOAEL	Survivorship
Selenium	Heinz et al. 1989	0.93	LOAEL	Reproductive
Selenium	Ort and Latshaw 1978	0.88	LOAEL	Developmental
Selenium	Ort and Latshaw 1978	1.2	LOAEL	Developmental
Selenium	Hoffman et al. 1992	11	LOAEL	Growth
Selenium	El-Begearmi et al. 1977	0.68	NOAEL	Growth
Selenium	Heinz et al. 1987	0.5	NOAEL	Developmental
Selenium	Heinz et al. 1989	0.23	NOAEL	Reproductive
Selenium	Ort and Latshaw 1978	0.88	NOAEL	Reproductive
PCB	Eisler 1986b; Heath et al. 1972; NAS 1979; Stickel et al. 1984	66	LD	Survivorship
PCB	Eisler 1986b; Heath et al. 1972; NAS 1979; Stickel et al. 1984	414	LD	Survivorship
PCB	Heath et al. 1972; Hill 1986; Eisler 1986b; HSDB 1994; NAS 1979	77	LD	Survivorship
PCB	Heath et al. 1972; Hill 1986; Eisler 1986b; HSDB 1994; NAS 1979	313	LD	Survivorship
PCB	Platonow and Reinhart 1973	0.88	LOAEL	Reproductive

Table C5-4.
Selected Avian Ingestion Toxicity Data

Chemical	Reference	Dose (mg/kg-day)	Endpoint	Study Type
PCB	Britton and Huston 1973	1.3	LOAEL	Reproductive
PCB	Dahlgren et al. 1972	1.8	LOAEL	Reproductive
PCB	Scott 1971	1.8	LOAEL	Reproductive
PCB	Call & Harrell 1974	643	LOAEL	Reproductive
PCB	Harris et al. 1976	1.3	LOAEL	Systemic/Immuno
PCB	McLane and Hughes 1980	0.42	NOAEL	Reproductive
PCB	Scott 1971	0.18	NOAEL	Reproductive
PCB	Custer and Heinz 1980; NAS 1979	0.25	NOAEL	Reproductive
PCB	Custer and Heinz 1980; NAS 1979	7.2	NOAEL	Reproductive
PCB	Elliot et al. 1991	0.05	NOAEL	Cytological

Notes:

LOAEL	Lowest observable adverse effect level
NOAEL	No observable adverse effect level
LD	Lethal dose
MDR	Minimum dietary requirement

Table C5-5.
Selected Mammalian Inhalation Toxicity Data

Chemical	Reference	Conc. 24hr/d (mg/m^3)	Endpoint	Study Type
Ethylbenzene	Andrew et al. 1981	866	LOAEL	Reproductive
Ethylbenzene	Cragg et al. 1989	1301	LOAEL	Survivorship
Ethylbenzene	Ungvary and Tatrai 1985	600	LOAEL	Reproductive
Ethylbenzene	Wolf et al. 1956	542	LOAEL	Reproductive
Ethylbenzene	Andrew et al. 1981	88	NOAEL	Reproductive
Ethylbenzene	Cragg et al. 1989	605	NOAEL	Survivorship
Ethylbenzene	Cragg et al. 1989	1246	NOAEL	Survivorship
Ethylbenzene	Cragg et al. 1989	605	NOAEL	Repro Histopath
Ethylbenzene	Cragg et al. 1989	1246	NOAEL	Repro Histopath
Ethylbenzene	Ungvary and Tatrai 1985	150	NOAEL	Reproductive
Ethylbenzene	Ungvary and Tatrai 1985	250	NOAEL	Reproductive
Ethylbenzene	Ungvary and Tatrai 1985	500	NOAEL	Reproductive
Tetrachloroethene	Nelson et al. 1980	1782	LOAEL	Reproductive
Tetrachloroethene	NTP 1986	10863	LOAEL	Growth
Tetrachloroethene	NTP 1986	2716	LOAEL	Survivorship
Tetrachloroethene	NTP 1986	1358	LOAEL	Survivorship
Tetrachloroethene	Rowe et al. 1952	1358	LOAEL	Growth
Tetrachloroethene	Schwetz et al. 1975	2037	LOAEL	Reproductive
Tetrachloroethene	Carpenter 1937	3191	NOAEL	Reproductive
Tetrachloroethene	Hardin et al. 1981	3395	NOAEL	Reproductive
Tetrachloroethene	Nelson et al. 1980	198	NOAEL	Reproductive
Tetrachloroethene	NTP 1986	2716	NOAEL	Growth
Tetrachloroethene	NTP 1986	1358	NOAEL	Growth
Tetrachloroethene	NTP 1986	5431	NOAEL	Survivorship
Tetrachloroethene	Schwetz et al. 1975	2037	NOAEL	Reproductive
Toluene	Carpenter et al. 1976	33112	LD	Survivorship
Toluene	Svirbely et al. 1943	20018	LD	Survivorship
Toluene	Ungvary and Tatrai 1985	3763	LOAEL	Reproductive
Toluene	NTP 1990	455	LOAEL	Survivorship
Toluene	API 1981	1505	NOAEL	Reproductive
Toluene	API 1985	7526	NOAEL	Reproductive
Toluene	NTP 1990	218	NOAEL	Repro Histopath
Toluene	NTP 1990	873	NOAEL	Repro Histopath
Toluene	NTP 1990	2184	NOAEL	Reproductive
Toluene	NTP 1990	1820	NOAEL	Survivorship
Trichloroethene	Land et al. 1981	1800	LOAEL	Reproductive
Trichloroethene	Adams et al. 1951	360	NOAEL	Growth
Trichloroethene	Allen et al. 1994	675	NOAEL	Reproductive
Trichloroethene	Beliles et al. 1980; Dorfmueller et al. 1979; Hardin et al. 1981; Healy et al. 1982; Schwetz et al. 1975	540	NOAEL	Systemic
Trichloroethene	Beliles et al. 1980; Dorfmueller et al. 1979; Hardin et al. 1981; Healy et al. 1982; Schwetz et al. 1975	9718	NOAEL	Systemic
Trichloroethene	Dorfmueller et al. 1979	1735	NOAEL	Reproductive
Trichloroethene	Land et al. 1981	129	NOAEL	Reproductive
Xylene	Balogh et al. 1982	3360	LOAEL	Reproductive
Xylene	Ungvary et al. 1980	150	LOAEL	Developmental
Xylene	Ungvary et al. 1980	3000	LOAEL	Reproductive
Xylene	Balogh et al. 1982	1900	NOAEL	Reproductive
Xylene	Bio/Dynamics 1983	542	NOAEL	Reproductive
Xylene	Bio/Dynamics 1983; Hass and Jakobsen 1993; Hudak and Ungvary 1978; Litton Bionetics 1978	434	NOAEL	Reproductive
Xylene	Nylen et al. 1989	4335	NOAEL	Reproductive
Xylene	Ungvary et al. 1980	1500	NOAEL	Reproductive

Notes:

LOAEL	Lowest observable adverse effect level
NOAEL	No observable adverse effect level
LD	Lethal dose
MDR	Minimum dietary requirement

FIGURES

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Figure C5-1
Summary of Selected Mammalian Ingestion Toxicity Data

Figure C5-2
Summary of Selected Avian Ingestion Toxicity Data

Figure C5-3
Summary of Selected Mammalian Inhalation Toxicity Data

APPENDIX C6

PLANT HEALTH STUDIES FOR RFI ECOLOGICAL RISK ASSESSMENTS OF GROUP 6 REPORT AREA (ELECTRONIC COPY)

GROUP 6 – NORTHEASTERN AREA IV
RCRA FACILITY INVESTIGATION RISK ASSESSMENT REPORT
SANTA SUSANA FIELD LABORATORY
VENTURA COUNTY, CALIFORNIA

APPENDIX C, ATTACHMENT C6

PLANT HEALTH STUDY FOR GROUP 6 REPORT AREA

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September 2006

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C6.1 PLANT HEALTH STUDIES FOR GROUP 6 REPORT AREA

C6.2 VEGETATION MAP FOR GROUP 6 REPORT AREA
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C6.1 PLANT HEALTH STUDIES FOR GROUP 6 REPORT AREA

This report provides the results of a field evaluation of the health of the plant communities in the Group 6 RFI report area. The evaluation reports on observations made in the field in areas where chemicals have been detected and reference areas where there is no contamination. This report refers to contaminated areas as “Chemical Use Areas” and the background areas as “Reference Areas”. The term Chemical Uses Areas is also used in the main text of this RFI report and although there is complete overlap between those areas in this plant evaluation and those of the main report (i.e., all areas of contamination have been included in this evaluation), there are differences in the descriptions of these chemical use areas between this plant evaluation and the main text. Therefore, the reader should interpret the areas described in this plant evaluation as general descriptions that often include larger areas than described in the main RFI report text.

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PLANT HEALTH STUDIES FOR RFI ECOLOGICAL RISK ASSESSMENTS OF GROUP 6 RCRA FACILITY INVESTIGATION SITES AT THE SANTA SUSANA FIELD LABORATORY, VENTURA COUNTY, CALIFORNIA

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August 25, 2006

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RFI Assessment Datasheets

INTRODUCTION

This document details the results of an assessment of plant health conducted on July 18-19 and July 27, 2006 at various chemical use areas within the Old Conservation Yard (OCY), the New Conservation Yard (NCY), the Sodium Reactor Experiment (SRE), and the B064 Leach Field sites at Santa Susana Field Laboratory (SSFL), collectively known as the Group 6 Resource Conservation Recovery Act (RCRA) Facility Investigation (RFI) sites. As part of the RCRA investigation, an ecological assessment was required for 30 identified chemical use areas at the Group 6 RFI sites. A portion of the ecological assessment includes investigations of native plant health to determine whether native plants exhibited evidence of chemical uptake. The Department of Toxic Substances Control (DTSC) approved a Standard Risk Assessment Methodology (SRAM) for assessing native plant health on SSFL, which included primarily collection and analysis of qualitative data (see Methods for detailed SRAM). The following report documents the results of the assessment of the Group 6 RFI sites.

SETTING

ENVIRONMENTAL SETTING

The Group 6 RFI sites are situated within the eastern extent of Burro Flats, a mountain valley within the Simi Hills. The Simi Hills are generally situated within the eastern extent of the Santa Susana Mountains, a range included within the Transverse Ranges. The area in the vicinity of the Group 6 RFI sites includes numerous sandstone rock outcrops, seasonal drains, and terrain that varies from generally flat to steep and rugged. Vegetation communities in the vicinity of the Group 6 sites include grassland, coastal scrub, chaparral, open woodland, and riparian forest (Attachment C6.2).

Soils within the vicinity of the Group 6 RFI sites were mapped as Saugus sandy loams and Sedimentary Rock Land. Saugus sandy loams, which occur over the majority of the Group 6 RFI site area along Burro Flats, consist of well drained, sandy loams to a depth of 120–140 cm, over a soft layer of sandstone or shale. Sedimentary Rock Land, which occurs in the northern portion of the Group 6 RFI site area, consists of steep mountainous areas of sandstone and shale covered with a thin mantle of relatively stable soil material. More than 25 percent of the sedimentary rock land consists of rocky outcrops and areas that erode very easily (Edwards et al. 1970:52-53).

METHODS

VEGETATION MAPPING

SWCA conducted a reconnaissance-level survey for vegetation mapping. During the field visit the entire Group 6 RFI site area was walked and plant communities were mapped, including those located adjacent to and down slope from the study area. The purpose of this survey was to identify vegetation and land cover types on and adjacent to the Group 6 site areas.

Vegetation types and land cover types were recorded on aerial photographs and described in field notes. Natural vegetation communities were described using the California List of Terrestrial Natural Communities (CDFG 2003). When possible, Holland (1986) and Sawyer and Keeler-Wolf (1995) equivalents were assigned. Plant nomenclature followed *The Jepson Manual of Higher Plants of California* (Hickman 1993).

PLANT HEALTH ASSESSMENT

The plant health assessment was conducted according to protocol approved by the DTSC (September 2005). The protocol essentially includes assessing the vegetation in chemical use areas where chemicals of potential ecological concern (CPEC) have been identified during soil sampling efforts, and comparison of these assessment areas with reference areas containing similar topographical, hydrological, and vegetation community features. The methods, entitled Standardized Risk Assessment Methodology Manual (SRAM), recommend the following three guidelines for use in evaluating the potential effects of chemical concentrations in surface soils on vegetation:

1. For those investigational units (assessment areas) with relatively highly disturbed and patchy distributions of vegetation types, specific vegetation communities associated with soil sampling efforts will be identified and an attempt will be made to find similar vegetation communities at locations within the investigational unit that have not been impacted by soil chemical concentrations. A semi-quantitative comparison will be made between these two areas to document changes, if any, that may be attributable to the presence of chemical concentrations in soil.
2. For those investigational units with relatively large or continuous stands of vegetation, a semi-quantitative, visual comparison will be made between vegetation communities occurring in known areas of CPEC concentrations (based on soil sampling results) and similar vegetation communities in areas where soil sampling has not occurred. This approach is based on the assumption that soil sampling efforts at an investigational unit targeted areas where chemical impacts were possible based on historical practices and operations.
3. For those investigational units with relatively highly disturbed areas (e.g., pavement) and no complete exposure pathways, areas with similar chemical concentrations and relatively undisturbed vegetation will be located. As above, these areas will be compared to areas of lower chemical concentrations or areas with no history of chemical use or presence. A semi-quantitative comparison (e.g., dominant species, number of species, abundance, percent cover, etc.) will be made between these two areas to document changes, if any, that may be attributable to the presence of chemical concentrations in soil.

The assessment and reference areas were surveyed intensely for 100 percent visual coverage of each area. Within each area, a suite of descriptive ecological data was collected, including physical (topography, soils, hydrology, etc.) and vegetation (community, percent plant cover, plant vigor, etc.) features, disturbances (to soils or vegetation), and plant species lists. Datasheets used in collecting data from each area are presented in Appendix A. Overview photographs were taken of each area, as well as of plants that exhibited visual evidence of stress. Each assessment area was arbitrarily numbered by MWH personnel; the reference areas were arbitrarily numbered by SWCA personnel.

When assessing plant health, it was important to distinguish between environmental and non-natural plant stressors. Typically, plants found in vegetation communities within coastal southern California are highly adapted to stressful environmental conditions that allow them to survive through varying conditions such as long, hot, and dry summers, and wildfire events. Adaptations to coping with natural environmental stress include drought-evading leaves, annual lifecycles, bulbs, and the ability to survive wildfires (Dallman 1998). Perennial plants that drop all or most of their leaves during summer (drought-deciduous) thereby reducing water loss during the driest parts of the year are commonly found in the coastal sage scrub vegetation community. Grasses and wildflowers that have an annual lifecycle typically germinate in the spring and complete their lifecycle after seeds have been produced during mid-summer. Thereafter, the plant begins to die; this dying off or aging process is commonly referred to as senescing. Annual plants that senesce before seed production typically experience environmental stress beyond their natural range; most often, drought stress is the cause of premature senescence in annual plants. Bulbs also have an annual lifecycle, but instead of dying, the vegetation that emerges in the spring dies back to the ground

in mid-summer and returns the following spring. Assessing stress for bulb-producing plants typically involves examining the bulb structure as opposed to the aboveground vegetation. Fires are common throughout the project site and the recent Topanga Fire of October 2005 was addressed when assessing plant health. While it may appear that fire-damaged plants experienced high levels of plant stress, the ability to resprout from the crown or the base of a shrub following a fire actually promotes growth in some species. Differentiating between stress from fire and stress from artificial means requires an understanding of this process and of the species that exhibit crown-sprouting. Species that exhibit crown-sprouting following damage by fire include California sagebrush (*Artemesia californica*), thickleaf yerba santa (*Eriodictyon crassifolium*), coast live oak (*Quercus agrifolia*), sugarbush (*Rhus ovata*), chamise (*Adenostoma fasciculatum*), and laurel sumac (*Malosma laurina*). When assessing plant health, SWCA biologists determined which of these natural categories of plant stress occurred within each of the assessment and reference areas.

RESULTS

VEGETATION MAPPING

Vegetation communities in the vicinity of the Group 6 RFI sites included non-native grassland, coastal scrub coast live oak woodland, coast live oak riparian forest, and chaparral. A map showing the distribution of vegetation communities is presented in Attachment C6.2. The vegetation communities are described below.

Grassland

Grassland occurred over a significant portion of Unit 1D, and included disturbed areas dominated by non-native grasses and comparatively less disturbed areas dominated by native grasses. Non-native grassland were dominated by soft brome (*Bromus hordeaceus*), rip-gut brome (*Bromus diandrus*), red brome (*Bromus madritensis* ssp. *rubens*), wild oats (*Avena* sp.), smilo grass (*Piptatherum miliaceum*), black mustard (*Brassica nigra*), tocalote (*Centaurea melitensis*), bull thistle (*Cirsium vulgare*), milk thistle (*Silybum marianum*), and foothill needlegrass (*Nassella lepida*). The non-native grassland varied considerably in composition over the Group 6 RFI site area, which appeared to be dependent on the degree of disturbance. This community most closely matched the non-native grassland (42200, Holland 1986, 42.000.00, CDFG 2003) and California annual grassland series (Sawyer and Keeler-Wolf 1995).

Portions of the grassland community appeared to have been planted, likely through hydroseeding, as part of a revegetation effort. Species observed in these revegetated areas included mulefat (*Baccharis salicifolia*), red brome, soft brome, rip-gut brome, Spanish clover (*Lotus purshianus*), winter vetch (*Vicia villosa*), and foothill needlegrass. These revegetated areas occurred in disturbed areas where buildings once stood; the hydroseed mix was likely applied following demolition of the buildings and/or grading of the site.

Coastal Scrub

Small areas of vegetation within the Group 6 RFI site area included coastal scrub community, which was characterized by a predominance of shrubs, including thickleaf yerba santa, California sagebrush, sticky monkeyflower (*Mimulus aurantiacus*), coyote brush (*Baccharis pilularis*), sawtooth goldenbush (*Hazardia squarrosa*), California buckwheat (*Eriogonum fasciculatum*), and deerweed (*Lotus scoparius*). The coastal scrub community in the vicinity of the Group 6 RFI sites is not as well developed as stands of this community type located closer to the coast. Areas on SSFL containing stands of coastal scrub are

typically disturbed areas, or open areas within chaparral or grasslands. The coastal scrub areas, though not well developed, most closely match coastal scrub (32000; Holland 1986).

Coast Live Oak Woodland

Significant portions of the Group 6 RFI site area were vegetated in oak woodland, which was dominated by coast live oak. Common associates included Mexican elderberry (*Sambucus mexicanus*), laurel sumac, and poison oak (*Toxicodendron diversilobum*). The understory in more open areas included both chaparral and grassland species. This community most closely matched the coast live oak woodland (71160, Holland 1986; 71.060.19, CDFG 2003), and coast live oak series (Sawyer and Keeler-Wolf 1995).

Coast Live Oak Riparian Forest

A riparian forest dominated by coast live oak was located along some of the drainages within the Burro Flats area, particularly along the drainages south of NCY. The dominant species include coast live oak in the overstory and poison oak, wild cucumber (*Marah fabaceus*), and Mexican elderberry in the understory. Other species in the understory of this area include bull thistle, caterpillar phacelia (*Phacelia cicutaria* var. *cicutaria*), laurel sumac, and a variety of non-native annual grasses. This community was denser than Coast Live Oak Woodland, and occurred in more mesic areas. This riparian community is characterized as Southern Coast Live Oak Riparian Forest (Holland 1986).

Chaparral

The chaparral community in the vicinity of the Group 6 RFI sites was characterized as southern mixed chaparral. It had recently burned in the Topanga Fire of October 2005, and percent cover of the various dominant shrub species could not be accurately assessed. Dominant shrubs identified in this community included chamise, hollyleaf redberry (*Rhamnus ilicifolia*), sugarbush, toyon (*Heteromeles arbutifolia*), laurel sumac, and hoaryleaf ceanothus (*Ceanothus crassifolius*). This description most closely matched that of the southern mixed chaparral (37120; Holland 1986). Chaparral occurred over much of the Group 6 RFI site area, though it was disturbed in many areas, particularly within the Burro Flats area.

PLANT HEALTH ASSESSMENT

A total of 28 assessment areas were identified by MWH for plant health studies. A total of 26 areas containing CPECs were assessed. Two assessment areas (20 and 26) were not assessed, and were, therefore, not compared to a reference area. These areas were covered in a black plastic tarp that covered a significant area within SRE. A portion of another site, Assessment Area 19, was also covered by this plastic tarp. The other portion of Assessment Area 19, the SRE Pond, was not covered in plastic tarp and was assessed. However, it was not compared to a reference area, as an appropriate area containing marshland community was not identified on the SSFL facility. The locations of the assessment areas are shown in Figure 1. A summary of data collected at each assessment and reference area is presented in Table 1.

Table 1: Summary of plant health observations within the assessment and reference areas.

Assessment Area	Vegetation Communities Present	Stressors Observed	Natural Causes?	Compare to Reference Area	Other Notable Features
ASSESSMENT AREAS					
Old Conservation Yard (OCY)					
1	Non-native grassland; chaparral; mixed oak woodland	Senescence of annual species; fire damage	Yes	Reference Area 6	
2	Non-native grassland; chaparral	Senescence of annual species; fire damage	Yes	Reference Area 4	
3	Non-native grassland; chaparral; coastal scrub	Senescence of annual species; fire damage	Yes	Reference Area 4	
4	Grassland (revegetated)	Senescence of annual species; fire damage	Yes	Reference Area 7	
5	Grassland (revegetated); Coast live oak woodland	Senescence of annual species; fire damage	Yes	Reference Area 7	
6	Non-native grassland; grassland (revegetated)	Senescence of annual species; fire damage	Yes	Reference Area 11	
7	Non-native grassland; grassland (revegetated)	Senescence of annual species; fire damage	Yes	Reference Area 11	
8	Non-native grassland; grassland (revegetated)	Senescence of annual species	Yes	Reference Area 11	
9	Non-native grassland	Senescence of annual species	Yes	Reference Area 9	
10	Non-native grassland; coastal scrub	Senescence of annual species; fire damage	Yes	Reference Area 9	
11	Perennial grassland	Senescence of annual species; fire damage	Yes	Reference Area 11	
12	Non-native grassland; oak live oak woodland; grassland (revegetated)	Senescence of annual species; fire damage	Yes	Reference Area 10	

Table 1: Summary of plant health observations within the assessment and reference areas.

Assessment Area	Vegetation Communities Present	Stressors Observed	Natural Causes?	Compare to Reference Area	Other Notable Features
16	Non-native grassland	Senescence of annual species; drought stress	Yes	Reference Area 11	
Sodium Reactor Experiment Area (SRE)					
21, 24, 25, 27	Grassland (revegetated)	Senescence of annual species; drought stress; fire damage	Yes	Reference Area 1	
20, 26	N/A	N/A	N/A	N/A	Not assessed (covered with tarp)
22	Non-native grassland; coastal scrub	Senescence of annual species; fire damage	Yes	Reference Area 4	
23, 28	Grassland (revegetated)	Senescence of annual species; fire damage	Yes	Reference Area 2	
30	Chaparral	Senescence of annual species; fire damage	Yes	Reference Area 6	
19	Marshland, coastal scrub	Senescence of annual species	Yes	No Reference	
New Conservation Yard (NCY)					
17	Non-native grassland; coastal scrub; chaparral; coast live oak woodland	Senescence of annual species; fire damage	Yes	Reference Area 8	
18	Non-native grassland; coast live oak woodland	Senescence of annual species; fire damage	Yes	Reference Area 5	
31	Coast live oak riparian forest	Senescence of annual species; fire damage	Yes	Reference Area 10	
Building 064					
29	Coastal scrub	Senescence of annual species, drought stress; fire damage; unknown stressor	Yes; Unknown	Reference Area 3	
REFERENCE AREAS					
1	Grassland (revegetated)	Senescence of annual species; fire damage	Yes	Assessment Areas 21, 24, 25, 27	
2	Grassland (revegetated)	Senescence of annual species; fire damage	Yes	Assessment Areas 23, 28	

Table 1: Summary of plant health observations within the assessment and reference areas.

Assessment Area	Vegetation Communities Present	Stressors Observed	Natural Causes?	Compare to Reference Area	Other Notable Features
3	Coastal scrub	Senescence of annual species; drought stress; fire damage	Yes	Assessment Area 29	
4	Chaparral	Senescence of annual species; fire damage	Yes	Assessment Areas 2, 3, 22	
5	Non-native grassland	Senescence of annual species	Yes	Assessment Area 18	
6	Chaparral; coast live oak woodland	Senescence of annual species; fire damage	Yes	Assessment Areas 1, 30	
7	Non-native grassland; chaparral; coast live oak woodland	Senescence of annual species; fire damage	Yes	Assessment Areas 4, 5	
8	Non-native grassland; coastal scrub	Senescence of annual species; fire damage	Yes	Assessment Area 17	
9	Non-native grassland; oak woodland; coastal scrub	Senescence of annual species; fire damage	Yes	Assessment Areas 9, 10	
10	Oak woodland; non-native grassland	Senescence of annual species; fire damage	Yes	Assessment Areas 12, 17, 31	
11	Grassland (revegetated)	Senescence of annual species; fire damage	Yes	Assessment Areas 6, 7, 8, 11, 16	

Old Conservation Yard (OCY)

Assessment Area 1: North Slope Debris Area A

This area is located in the northeast area of OCY. It is situated within a seasonal drain along a north-facing slope. The area contained debris; soil testing detected PCBs and metals.

The vegetation communities in this area consisted of non-native grassland and chaparral mix up on the ridge top and continuing down the face of the slope, and mixed oak woodland along the lower portions of the slope. Dominant species in the chaparral community included thickleaf yerba santa, Fremont's Star Lily (*Zigadenus fremontii*), laurel sumac, bleeding hearts (*Dicentra ochroleuca*), and caterpillar phacelia. Coast live oak was the dominant species in the oak woodland. Plant stressors observed in the area were the senescence of annual species and fire damage to perennial shrubs and trees (evident in post-fire crown sprouting by oaks and shrubs).

Assessment Area 2: North Slope Storage

This area is located adjacent to and southwest of Assessment Area 1. This site is located on a fairly flat area overlooking the seasonal drain and hillside. Soil testing in the area detected concentrations of PCBs and metals (greater than background).

The vegetation communities in this area consisted of non-native grasslands with sparse occurrences of coast live oak and laurel sumac on the east side; the west side consisted of chaparral community. Dominant species in these vegetation communities included thickleaf yerba santa, coat live oak, laurel sumac, tocalote, and black mustard. Plant stressors observed in the area were the senescence of annual species and fire damage to perennial shrubs and trees (evident in post-fire crown sprouting by oaks and shrubs).

Assessment Area 3: North Slope Debris Area B

This area is located on the edge of a north-facing slope, in the northwest corner of OCY. This area contains concrete and metal debris. Previous testing of soils in the area detected concentrations of PCBs and metals (greater than background).

The vegetation communities in this area included chaparral and coastal scrub on the slope, and non-native grassland on the flat area in the southern portion of the site. Dominant species in these vegetation communities included laurel sumac, tocalote, Canadian horseweed (*Conyza canadensis*) and black mustard. Plant stressors observed in the area were the senescence of annual species and fire damage to perennial shrubs and trees (evident in post-fire crown sprouting by oaks and shrubs).

Assessment Area 4: Northeast AST 731-TPH

This area is located southeast of Assessment Area 3. An above ground diesel fuel oil was located in this area and was removed prior to this survey. Soil testing in this area detected total petroleum hydrocarbons (TPH).

This area appeared to have been revegetated with a mix of annual and perennial grassland species as well as mulefat. Several coast live oaks had been planted in the area as well. Dominant species in these vegetation communities included mulefat, red brome, soft brome, rip-gut brome, tocalote, Spanish lotus, Canadian horseweed, and black mustard. Plant stressors observed in the area were the senescence of annual species and fire damage to perennial shrubs and trees (evident in post-fire crown sprouting by oaks and shrubs).

Assessment Area 5: Southwest AST 732-TPH

This area is located adjacent to Assessment Area 4. Similar to Assessment Area 4, an above ground diesel fuel oil tank was located in this area and was removed prior to this survey. Soil testing in this area detected TPH.

This area appeared to have been revegetated with a mix of annual and perennial grassland species as well as mulefat. There was also a component of coast live oak woodland in the western portion of the site. Similar to Assessment Area 4, the dominant species in revegetation area included mulefat, red brome, soft brome, rip-gut brome, tocalote, Spanish lotus, Canadian horseweed, and black mustard. Coast live oak was the dominant overstory species in the oak woodland. Plant stressors observed in the area were the

senescence of annual species and fire damage to perennial shrubs and trees (evident in post-fire crown sprouting by oaks and shrubs).

Assessment Area 6: Atomics International Conservation Yard

Located in the middle of the OCY area, Assessment Area 6 was historically a storage yard with an asphalt-like surface coating. Soil testing of the area detected PCBs.

The vegetation communities in this area were characterized by non-native grassland in the western portion of the site, an area of revegetation with mulefat and grassland species in the eastern portion of the site, and coastal scrub in the southeastern portion in a disturbed area along the side of a road. Dominant species within the grassland included red brome, soft brome, rip-gut brome, Canadian horseweed, black mustard, and tocalote. Dominant species within the revegetated area included mulefat, red brome, soft brome, rip-gut brome, and foothill needlegrass. The coastal scrub was dominated by thickleaf yerba santa, laurel sumac, sticky monkeyflower, and California sagebrush. In addition, two Santa Susana tarplants (*Hemizonia minthornii*) were found in the coastal scrub area (Figure 1). Plant stressors observed in the area were the senescence of annual species and fire damage to perennial shrubs and trees (evident in post-fire crown sprouting by oaks and shrubs).

Assessment Area 7: Rocketdyne Conservation Yard

This area is located in the southeast corner of OCY. Like Assessment Area 6, it was an open storage yard. Soil testing in this area detected PCBs and various metals.

The vegetation communities in this area consisted of a mixed transition area between non-native grassland and an area that was revegetated using mulefat and grassland species. Dominant species in the grassland included red brome, soft brome, sour clover (*Melilotus indica*), Canadian horseweed, black mustard, and tocalote. Within the revegetated area, dominant species included mulefat, red brome, soft brome, rip-gut brome, and foothill needlegrass. Plant stressors observed in the area were the senescence of annual species and fire damage to perennial shrubs and trees (evident in post-fire crown sprouting by oaks and shrubs).

Assessment Area 8: Telephone Pole Storage Area

This area is located directly north of Assessment Area 7 and was part of a multiple use site. Soil testing detected dioxin in this area.

The vegetation communities in this area included non-native grassland in the northern portion of the site and an area to the south that was revegetated with mulefat and grassland species. A dirt road bisected the site. Dominant species in the grassland included red brome, soft brome, sour clover, Canadian horseweed, black mustard, and tocalote. The revegetated area included mulefat, red brome, soft brome, rip-gut brome, and foothill needlegrass. Plant stressors observed in the area were the senescence of annual species.

Assessment Area 9: Southern Debris Area

This area is located in the southeastern portion of OCY. Soils testing in the area detected dioxins, metals, and polynuclear aromatic hydrocarbons (PAHs).

The vegetation communities in this area consisted of non-native grassland. Dominant species included bull thistle, tocalote, red brome, soft brome, Canadian horseweed, and black mustard. Plant stressors observed in the area were the senescence of annual species.

Assessment Area 10: North Debris Area

This area is located in the southeastern portion of OCY just north of Assessment Area 9. It consists of the northern half of the debris area. Soils testing in the area detected dioxins, metals, and polynuclear aromatic hydrocarbons (PAHs).

The vegetation communities in this area were characterized as a transitional zone between non-native grassland and coastal scrub. Dominant species within the grassland included red brome, soft brome, tocalote, black mustard, and Canadian horseweed. Dominant species observed within the coastal scrub included thickleaf yerba santa and California sagebrush. In addition, approximately 40 Santa Susana tarplants were located on an area of exposed bedrock in the middle of the site (Figure 1). Plant stressors observed in the area were the senescence of annual species and fire damage to perennial shrubs and trees (evident in post-fire crown sprouting by oaks and shrubs).

Assessment Area 11: Topographic Low Spot

This area is located in the southwestern portion of OCY and consists of a pad and an asphalt-lined drainage ditch. Soils testing in this area detected TPH and RD-14.

The vegetation communities in this area included grassland with scattered oaks throughout. The grassland was dominated by foothill needlegrass. The southeastern portion of this site included a previous revegetation effort that included mulefat, red brome, soft brome, and foothill needlegrass. Other common species in these vegetation communities included tocalote, Canadian horseweed, and black mustard. Plant stressors observed in the area were the senescence of annual species and fire damage to perennial shrubs and trees (evident in post-fire crown sprouting by oaks and shrubs).

Assessment Area 12: Downslope Discharge Area

This area is located just south of Assessment Area 11 and consists of an asphalt-lined swale and adjacent areas along the drain. Soils testing in the area detected metals, TPH, and PCBs.

The vegetation communities in this area were characterized as a mix of non-native grassland, oak woodland, and areas that were revegetated in mulefat and grassland species. Dominant species in the grassland community included red brome, soft brome, rip-gut brome, tocalote, Canadian horseweed, black mustard, and bull thistle. The oak woodland included a non-native grassland understory with scattered coast live oaks. The revegetated area was dominated by mulefat, red brome, soft brome, rip-gut brome, and foothill needlegrass. Plant stressors observed in the area were the senescence of annual species and fire damage to perennial shrubs and trees (evident in post-fire crown sprouting by oaks and shrubs).

Assessment Area 16: Transformer in Southeast OCY

This small area is located directly east of the Rockedyne Conservation Yard. Transformers were removed from this area, and soils testing detected PCBs.

The vegetation community in this area consisted of non-native grassland. Dominant species included tocalote, Spanish lotus, Canadian horseweed, and black mustard. Plant stressors observed in the area were the senescence of annual species and drought stress (observed in several dead Canadian horseweed plants that had not produced seeds).

Sodium Reactor Experiment Area (SRE)

Assessment Areas 21, 24, 25, 27: Transformers

These small areas are located in the western portion of SRE. Transformers were removed from these areas; soils testing detected PCBs at several of the transformers.

These areas appeared to have been revegetated with a mixture of mulefat and grassland species. Dominant species in these vegetation communities included mulefat, red brome, soft brome, tocalote, Spanish lotus, Canadian horseweed, and black mustard. In addition, many (30+) Santa Susana tarplants were found on the rock faces and near drainage pipes in the vicinity of Assessments Area 24 (Figure 1). Plant stressors observed in the area were the senescence of annual species, drought stress (evident in several dead Canadian horseweed plants that had not produced seeds), and fire damage to perennial shrubs and trees (evident in post-fire crown sprouting by oaks and shrubs).

Assessment Areas 20 and 26: Southern California Edison Power Plant Area and Pond

These areas are located on the northern side of SRE. Soils testing at these locations detected mercury (Hg).

Plant assessments for these assessment areas could not be accomplished because the area was covered with a large black tarp surrounded by erosion control and sand bags.

Assessment Area 22: Sodium Component Cleaning Area

This area is located in the eastern portion of SRE. Soils testing in this area detected mercury (Hg) and silver (Ag).

The vegetation communities in this area included non-native grassland, and a transition area between grassland and coastal scrub. Dominant species in the grassland community included tocalote, turkey mullein (*Eremocarpus setigerus*), foothill needlegrass, smilo grass, and black mustard. Vegetation within the transition area included similar species along with thickleaf yerba santa. Several coast live oak trees were also scattered in the vicinity. Plant stressors observed in the area were the senescence of annual species and fire damage to perennial shrubs and trees (evident in post-fire crown sprouting by oaks and shrubs).

Assessment Areas 23 and 28: Underground Storage Tanks (USTs)

These areas are located in the central portion of SRE where underground storage tanks (USTs) were located. TPH was not detected in soil samples collected at the USTs.

Assessment Area 23 appeared to have been revegetated with a combination of mulefat and grassland species, including red brome, soft brome, foothill needlegrass, and winter vetch. Assessment Area 28 was located adjacent to a parking lot, and its substrate consisted mostly of asphalt. The site was vegetated with

scattered non-native grasses and weeds, including red brome, tocalote, Spanish lotus, black mustard, and Canadian horseweed. In addition, several coast live oak trees were scattered in the vicinity, and many (approximately 20) Santa Susana tarplants were observed in the vicinity of the water pipe near both assessment areas (Figure 1). Plant stressors observed in the area were the senescence of annual species and fire damage to perennial shrubs and trees (evident in post-fire crown sprouting by oaks and shrubs).

Assessment Area 30: Drainage Downslope at SRE

This area is located on the northern side of SRE. It is a natural runoff area downslope from the SRE Pond. Soils testing detected a variety of metals including Hg, SVOCs, and VOCs.

The vegetation community within this area consisted of chaparral. Dominant species included chamise, laurel sumac, hollyleaf redberry, thickleaf yerba santa, coast live oak, and canyon sunflower (*Venegasia carpesioides*). Plant stressors observed in the area were the senescence of annual species and fire damage to perennial shrubs and trees (evident in post-fire crown sprouting by oaks and shrubs).

Assessment Areas 19: SRE Pond

This area is located in the northern portion of SRE. The SRE Pond serves as a catch basin to collect surface runoff from the SRE developed areas. Soils testing there detected a variety of metals including Hg and Ag, SVOCs, and VOCs. A portion of Assessment Area 19 was not assessed, as it was covered with black plastic tarp.

The vegetation community in the pond included marshland, whereas coastal scrub surrounded the pond. Dominant species within the pond included narrow-leafed cattail (*Typha domingensis*); dominant species lining the edge of the pond included sour clover, rabbitsfoot grass (*Polypogon monspeliensis*), and thickleaf yerba santa. Plant stressors observed in the area were the senescence of annual species.

New Conservation Yard (NCY)

Assessment Area 17: NCY

This area covers the eastern portion of NCY. Soils testing efforts there detected metals. Along the same area in NCY, there is a drainage ditch that flows south from OCY, though NCY, and east from the southern NCY border. Soils testing along the drainage detected dioxins.

The vegetation communities in Assessment Area 17 included coastal scrub in the northern portion, and non-native grassland in the southern portion of the site. Dominant species in the coastal scrub included thickleaf yerba santa, coyote brush, and sticky monkeyflower. The non-native grassland was dominated by tocalote, Spanish lotus, sour clover, Canadian horseweed, and black mustard. Several coyote brush shrubs and one coast live oak were scattered in this area. Plant stressors observed in the area were the senescence of annual species and fire damage to perennial shrubs and trees (evident in post-fire crown sprouting by oaks and shrubs).

The vegetation communities along the drainage south and west of Assessment Area 17 included non-native grassland, chaparral, and coast live oak woodland. The grassland was dominated by red brome, rip-gut brome, black mustard, and bull thistle. Chaparral species included chamise, coyote brush, and laurel sumac. Oak woodland species included coast live oak, Mexican elderberry, and poison oak. Plant

stressors observed in the area of the drain were the senescence of annual species and fire damage to perennial shrubs and trees (evident in post-fire crown sprouting by oaks and shrubs).

Assessment Area 18: Ash Pile

This area is located in the western portion of NCY. Soils testing there detected dioxins, barium (Ba), lead (Pb), silver (Ag), and zinc (Zn).

This small area was characterized by a non-grassland community with numerous coast live oaks scattered in the vicinity, representing a transition between grassland and open oak woodland. Non-native grasses (bromes, tocalote, Spanish lotus, and black mustard) dominated the understory of the vegetation community in this area and the overstory consisted of oak woodland with laurel sumac, poison oak and coast live oak. Plant stressors observed in the area were the senescence of annual species and fire damage to perennial shrubs and trees (evident in post-fire crown sprouting by oaks and shrubs).

Assessment Area 31: Drainage at the Confluence with Alfa/Bravo Drainage

This small area is located at the confluence of streams that drain OCY and NCY, and an adjacent area to the east that also contains assessment areas. It is not known whether soil sampling had been undertaken at this location.

The vegetation community in the vicinity of this area was coast live oak riparian forest. Dominant species included coast live oak, California honeysuckle (*Lonicera hispidula*), poison oak, and Canadian horseweed. Plant stressors observed in the area were the senescence of annual species and fire damage to perennial shrubs and trees (evident in post-fire crown sprouting by oaks and shrubs).

Building 064 Leach Field

Assessment Area 29: Leach Field (B064)

This area is located southwest of NCY. It was used as a leach field; soil sampling was conducted there; however, no CPECs were identified for this area.

The vegetation community in this area included coastal scrub. Dominant species included sawtooth goldenbush, tocalote, California sagebrush, Canadian horseweed, telegraph weed (*Heterotheca grandiflora*) and black mustard. Plant stressors observed in the area were the senescence of annual species, drought stress (evident in several Canadian horseweed plants), fire damage to perennial shrubs and trees (evident in post-fire crown sprouting by oaks and shrubs), and an unidentified source that affected a California sagebrush plant. This individual California sagebrush plant had died as a result of the unidentified stressor (see photograph in Appendix A). Other sagebrush plants in the immediate area were alive and did not exhibit similar signs of stress, appearing otherwise normal.

Reference Areas

A total of 11 reference areas were chosen for comparison with assessment areas. The primary criteria for selection of reference areas included, in order of importance, vegetation community, level of disturbance, hydrology, topographic situation, and size of assessment area. Assessment areas were assigned a reference area that most closely matched it in terms of these selection criteria. A map showing the locations of the reference areas is shown in Figure 1.

Reference Area 1

This area is located on the western side of SRE in an area that had been disturbed, but had not been identified as having soils containing CPECs. This area was chosen as a reference to Assessment Areas 21, 24, 25, and 27.

This area appeared to have been revegetated with a mixture of grassland species and mulefat. Dominant species included mulefat, soft brome, red brome, tocalote, and black mustard. The plant stressors observed in the area were senescence of annual species and fire damage to perennial shrubs (evident in post-fire crown sprouting). The observations of these stressors were similar in cause and symptoms to the same plant stressors observed in Assessment Areas 21, 24, 25, and 27.

Reference Area 2

This area is located on the western side of SRE in an area that had been disturbed, but had not been identified as having soils containing CPECs. This area was chosen as a reference to Assessment Areas 23 and 28.

This area appeared to have been revegetated with a mixture of grassland species and mulefat. Dominant species included mulefat, soft brome, red brome, rip-gut brome, tocalote, telegraph weed, and black mustard. In addition, one Santa Susana tarplants was observed within the area (Figure 1). Plant stressors observed in the area were the senescence of annual species and fire damage to perennial shrubs (evident in post-fire crown sprouting). The observations of these stressors were similar in cause and symptoms to the same plant stressors observed in Assessment Areas 23 and 28.

Reference Area 3

This area is located west of Assessment Area 29 and the former location of Building 64. This area was chosen as a reference to Assessment Area 29.

The vegetation community in this area consisted of coastal scrub. Dominant species included sawtooth goldenbush, tocalote, California sagebrush, Canadian horseweed, telegraph weed and black mustard. In addition, one Santa Susana tarplant was observed at the base of a rock outcrop located along the northern edge of the reference area (Figure 1). Plant stressors observed in the area were the senescesence of annual species, drought stress (evident in several Canadian horseweed plants), and fire damage to perennial shrubs (evident in post-fire crown sprouting). These plant stressors were also observed in Assessment Area 29; however, signs of an additional unknown plant stressor that killed a California sagebrush plant were observed in the assessment area that was not seen in the reference area.

Reference Area 4

This reference area is located in the northeast portion of OCY. Because of its similarity in vegetation and topography, it was chosen as a reference area to Assessment Areas 2, 3, and 22.

The vegetation community in this area consisted of chaparral. Dominant species included chamise, laurel sumac, thickleaf yerba santa, chaparral yucca, chaparral bush mallow (*Malacothamnus fasciculatus*), birch-leaf mountain mahogany (*Cercocarpus betuloides*), and coast live oak. Plant stressors observed in the area were the senescence of annual species and fire damage to perennial shrubs and trees (evident in post-fire crown sprouting by oaks and shrubs). These were similar to the plant stressors observed in Assessment Areas 2, 3, and 22.

Reference Area 5

This area was located just south of, and adjacent to, Assessment Area 18 in NCY. It was chosen as a reference area to Assessment Area 18.

The vegetation community in this area was characterized by non-native grassland. Dominant species included wild oats, soft brome, red brome, tocalote, Spanish clover, sour clover, and black mustard. Plant stressors observed in the area were the senescence of annual species. This plant stressor was also observed in Assessment Area 18.

Reference Area 6

This area was located along a seasonal drain on a relatively steep hillside in the northern portion of OCY. Because of similarities in vegetation, topography, and hydrology, this area was compared to Assessment Areas 1 and 30.

The vegetation community within this area consisted of chaparral, with coast live oak woodland located towards the lower reaches of the drain. Dominant species included chamise, laurel sumac, hollyleaf redberry, thickleaf yerba santa, coast live oak, and sugarbush (*Rhus ovata*). Plant stressors observed in the area were the senescence of annual species and fire damage to perennial shrubs and trees (evident in post-fire crown sprouting by oaks and shrubs). These were similar to the plant stressors observed in Assessment Areas 1 and 30.

Reference Area 7

This area was located just south of NCY in a relatively flat area. Because of similarities in vegetation and topography, it was chosen as a reference area for Assessment Areas 4 and 5.

The vegetation community within this area consisted primarily of non-native grassland, with areas that transitioned into chaparral and coast live oak woodland. Dominant species included tocalote, bull thistle, red brome, soft brome, wild oats, and black mustard. Scattered shrubs and trees in transition areas included coast live oak, chamise, and coyote brush. In addition, a Santa Susana tarplant was observed on an exposed rock outcrop located south of and adjacent to the reference area (Figure 1). Plant stressors observed in the area were the senescence of annual species and fire damage to perennial shrubs and trees (evident in post-fire crown sprouting by oaks and shrubs). These were similar to the plant stressors observed in Assessment Areas 4 and 5.

Reference Area 8

This area is located just east of and adjacent to NCY. Because of similarities in vegetation and topography, it was chosen as a reference area for Assessment Area 17.

Two vegetation communities were observed in this area, including non-native grassland in the southern portion and coastal scrub in the northern portion. Dominant species in the non-native grassland included tocalote, red brome, soft brome, Canadian horseweed, common California aster, and black mustard. Within the coastal scrub, dominant species included thickleaf yerba santa, deerweed, sticky monkeyflower, and coyote brush. Plant stressors observed in the area were the senescence of annual species and fire damage to perennial shrubs (evident in post-fire crown sprouting). These were similar to the plant stressors observed in Assessment Area 17.

Reference Area 9

This area was located in the east-central portion of OCY. It was located on a hillside that contained rock outcrops. It was chosen as a reference area for Assessment Areas 9 and 10.

This area was predominantly characterized by non-native grassland that bordered an open oak woodland, and transitioned with coastal scrub. Dominant species included red brome, soft brome, tocalote, black mustard, wild oats, bull thistle, and stands of thickleaf yerba santa. In addition, one Santa Susana tarplant was observed on a rock outcrop (Figure 1). Plant stressors observed in the area were the senescence of annual species and fire damage to perennial shrubs and trees (evident in post-fire crown sprouting by oaks and shrubs). These were similar to the plant stressors observed in Assessment Areas 9 and 10.

Reference Area 10

This area occurred along a drainage located east of NCY. Because of similarities with vegetation, topography, and hydrology, it was selected as a reference area for the drainage within and south of NCY near Assessment Area 17, and Assessment Areas 12 and 31.

The vegetation community along the drainage was characterized as open oak woodland with a non-native grassland understory. Dominant species included coast live oak, tocalote, red brome, soft brome, bull thistle, black mustard, and Canadian horseweed. Plant stressors observed in the area were the senescence of annual species and fire damage to perennial shrubs and trees (evident in post-fire crown sprouting by oaks and shrubs). These were similar to the plant stressors observed in the drain near Assessment Area 17, and Assessment Areas 12 and 31.

Reference Area 11

This area is located east of OCY in an area that had been revegetated with mulefat and grassland species. Because of the use of these species in the revegetation, it was chosen for comparison with assessment areas that also contained this revegetation component, including Assessment Areas 6, 7, 8, 11, and 16.

Dominant species in this revegetated area included mulefat, red brome, soft brome, Spanish clover, winter vetch, black mustard, bull thistle, and sour clover. Scattered coast live oaks were located within and adjacent to this area. Plant stressors observed in the area were the senescence of annual species and fire damage to perennial shrubs and trees (evident in post-fire crown sprouting by oaks and shrubs). These were similar to the plant stressors observed in the drain near Assessment Areas 6, 7, 8, 11, and 16.

DISCUSSION

The purpose of the plant health assessment was to aid in identifying whether CPECs discovered during soil testing efforts had a visible impact on vegetation growing within these areas. The SRAM approved for the project posits that observations of plants provides a more robust basis for assessing potential impacts than using the available phytotoxicity, which would suggest that plants are adversely affected at background concentrations (MWH 2005).

A number of plant stressors were identified during the assessments that affected plant vigor. Three of these stressors, annual senescence, drought stress, and fire damage, are caused by natural phenomena. One dead California sagebrush was observed at the B064 Leachfield (the cause of death could not be ascertained)—other California sagebrushes in the immediate area did not exhibit any signs of stress. However, most areas that were assessed contained plants that exhibited annual senescence, and crown

sprouting in response to the Topanga Fire that burned nearly all of the Group 6 RFI area in October 2005. A few sites contained plants that exhibited drought stress, which is a response to extended dry conditions. Because the assessments were conducted during the summer months, it is expected that drought stress was identified as one of the plant stressors at SSFL.

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Base Map Legend

- Administrative Boundary
- SSFL Property Boundary
- RFI Sites
- A/C Curbing
- Dirt Road
- Drainage
- Elevation Contour

Legend

- Reference Area
- Assessment Area

Vegetation Communities

- HM Santa Susana Mountain Tarplant
- Chaparral
- Coastal Live Oak Riparian Forest
- Venturan Coastal Sage Scrub
- Non-Native Grassland
- Coastal Live Oak Woodland

Survey conducted on July 18, 19 and 27, 2006.

Date: Sep 26, 2006 (MKJ)

Document: SSFL/Grp 6 Report_Ref-Assess Figure.mxd

1 inch equals 300 feet

0 300 600 Feet

SANTA SUSANA FIELD LABORATORY

MWH

Map Showing Assessment Areas and Reference Areas

FIGURE 1

APPENDIX A

RFI Assessment Datasheets

Assessment Areas

SWMU/AOC: Group 6- OCY **DATE:** July 19, 2006 **PERSONNEL:** Cy Fernandez/ Lina Ng

ASSESSMENT AREA NUMBER: 1- North slope debris area A

Relates to Reference/Assessment/Surrogate Area (s) Number(s): REF 6

Photo: Northern view of reference site, fire-related ash runoff on rockfaces in drainage (see below).

EXISTING CONDITIONS:

A. PHYSICAL FEATURES

Rock outcroppings: Large sandstone rock and outcropping at the south end, sandstone located up along the drainage in the middle.

Soils: Sandy loam.

Ponds and Drainages: Drainage within assessment area down slope from the road and continuing beyond the extent of the assessment area.

Slopes/Aspects: Steep slope face to the north.

Other:

B. VEGETATIVE FEATURES

Vegetation Community and Dominant Species: Chaparral community on the slope with oak woodland at slope base. Non-native grassland along road at southern extent of assessment area.

Species Diversity: 26 species.

Visual estimate of percent vegetative cover: 95% vegetation cover within chaparral; 5% cover along the road in the southern area of site.

Plant Vigor: Plant stressors observed in the area were the senecesence of annual species and fire damage to perennial shrubs and trees (evident in post-fire crown sprouting by oaks and shrubs).

Non-native Plant Component: Annual grasses and forbs including *Bromus* spp., *Brassica nigra*, and *Centaurea melitensis* (see below)

Other:

C. ON SITE DISTURBANCE (Natural and Anthropogenic)

Soils:

Paved: N/A

Compacted: Dirt road with high vehicle traffic runs east-west through southern half of site.

Topsoil Disturbance: Burrowing rodent activity observed throughout the site.

Cut/fill: N/A

Oily/encrusted/stained: Fire-related ash runoff on sandstone rocks halfway down the drainage area (Photo 2).

Soil erosion/loss: N/A

Other: Towards the upper part of the slope where plants have not fully repopulated burned area, metal debris along the drain that probably belong to 50 gallon drums.

Vegetation:

Clearing/mowing: N/A

Herbicides: N/A

Burning: Affected by Topanga fire of October 2005.

Irrigation/hydrology: N/A

Revegetation: N/A

Other:

D. CHEMICAL SAMPLING POINTS:

Justification: The area was used as a debris storage area; previous soil testing efforts there detected PCBs and metals.

NOTES:

Plant Species List

Common	Scientific
Chamise	*Adenostoma fasciculatum*
Red Skinned Onion	*Allium haematochiton*
Bigberry manzanita	*Arctostaphylos glauca*
California sagebrush	*Artemisia californica*
Wild oats	*Avena sp.*
Black mustard	*Brassica nigra*
Rip-gut brome	*Bromus diandrus*
Soft brome	*Bromus hordeaceus*
Red brome	*Bromus madritensis ssp. rubens*
Coast morning glory	*Calystegia macrostegia*
Wedgeleaf ceanothus	*Ceanothus cuneatus*
Birchleaf mountain mohogany	*Cercocarpus betuloides var. betuloides*
Turkish rugging	*Chorizanthe staticoides*
Bull thistle	*Cirsium vulgare*
Canadian horseweed	*Conyza canadensis*
Bleeding heart	*Dicentra ochroleuca*
Whispering bells	*Emmenanthe penduliflora*
Thickleaf yerba santa	*Eriodictyon crassifolium*

Golden yarrow	*Eriophyllum confertiflorum*
Sawtooth goldenbush	*Hazardia squarrosa*
Prickly lettuce	*Lactuca serriola*
Common California aster	*Lessingia filaginifolia*
Shiny biscuitroot	*Lomatium lucidum*
Bird's-foot trefoil	*Lotus corniculatus*
Cliff desertdandelion	*Malacothrix saxatilis*
Laurel sumac	*Malosma laurina*
Wild cucumber	*Marah macrocarpus*
Foothill needlegrass	*Nassella lepida*
Scarlet bugler	*Penstemon centranthifolius*
Caterpillar phacelia	*Phacelia cicutaria var. cicutaria*
Coast live oak	*Quercus agrifolia*
Poison oak	*Toxicodendron diversilobum*
Canyon sunflower	*Venegasia carpesioides*
Chaparral yucca	*Yucca whipplei*
Fremont's Star Lily	*Zigadenus fremontii*

PHOTOS:

Photo 1. Overview of site facing north.

Photo 2. Evidence of fire-related ash runoff on rock faces within wash.

SWMU/AOC: Group 6- OCY **DATE:** July 19, 2006 **PERSONNEL:** Cy Fernandez/ Lina Ng

ASSESSMENT AREA NUMBER: 2- North Slope Storage PCBs, M

Relates to Reference/Assessment/Surrogate Area (s) Number(s): REF 4

Photo: Overview of site facing north, overview of site facing south (see below).

EXISTING CONDITIONS:

A. PHYSICAL FEATURES

Rock outcroppings: Rocky outcrops adjacent to the site on the north and south sides.

Soils: Sandy loam.

Ponds and Drainages:

Slopes/Aspects: Edge of a north-facing slope.

Other:

B. VEGETATIVE FEATURES

Vegetation Community and Dominant Species: Non-native grasslands with scattered coast live oak and laurel sumac on the east side transitioning to chaparral on the west side.

Species Diversity: 27 species.

Visual estimate of percent vegetative cover: 95% vegetation cover with 5% cover in roadways.

Plant Vigor: Plant stressors observed in the area were the senescence of annual species and fire damage to perennial shrubs and trees (evident in post-fire crown sprouting by oaks and shrubs).

Non-native Plant Component: Annual grasses and forbs including *Bromus* spp., *Brassica nigra*, and *Centaurea melitensis* (see below)

Other:

C. ON SITE DISTURBANCE (Natural and Anthropogenic)

Soils:

Paved: N/A

Compacted: From road and vehicle use

Topsoil Disturbance: Burrowing rodent activity observed throughout the site.

Cut/fill: Graded along road.

Oily/encrusted/stained: N/A

Soil erosion/loss: N/A

Other:

Vegetation:

Clearing/mowing: N/A

Herbicides: N/A

Burning: Affected by Topanga fire of October 2005.

Irrigation/hydrology: N/A

Revegetation: N/A

Other:

D. CHEMICAL SAMPLING POINTS:

Justification: Previous soil testing in the area detected concentrations of PCBs and metals.

Plant Species List

Common	**Scientific**
California sagebrush	*Artemisia californica*
Narrow-leaved milkweed	*Asclepias fascicularis*
Black mustard	*Brassica nigra*
Soft brome	*Bromus hordeaceus*
Red brome	*Bromus madritensis ssp. rubens*
Tocolate	*Centaurea melitensis*
Elegant clarkia	*Clarkia unguiculata*
Canadian horseweed	*Conyza canadensis*
Thickleaf yerba santa	*Eriodictyon crassifolium*
Common California aster	*Lessingia filaginifolia*
Shiny biscuitroot	*Lomatium lucidum*
Deerweed	*Lotus scoparius*
Cliff desertdandelion	*Malacothrix saxatilis*
Laurel sumac	*Malosma laurina*
Sticky monkeyflower	*Mimulus aurantiacus*
Caterpillar phacelia	*Phacelia cicutaria var. cicutaria*
Coast live oak	*Quercus agrifolia*
Prickly sow thistle	*Sonchus asper ssp. asper*
Chaparral yucca	*Yucca whipplei*
Overstory	
Laurel sumac	*Malosma laurina*
Coast live oak	*Quercus agrifolia*
Road	
California sagebrush	*Artemisia californica*
Golden yarrow	*Eriophyllum confertiflorum*
Spanish Lotus	*Lotus purshianus*
Deerweed	*Lotus scoparius*
Cliff desertdandelion	*Malacothrix saxatilis*

Chaparral yucca	*Yucca whipplei*

PHOTOS:

Photo 1. Overview of site facing south.

Photo 2. Overview of site facing north.

SWMU/AOC: Group 6- OCY **DATE:** July 19, 2006 **PERSONNEL:** Cy Fernandez/ Lina Ng

ASSESSMENT AREA NUMBER: 3- North Slope Debris B, PCBs, M

Relates to Reference/Assessment/Surrogate Area (s) Number(s): REF 4

Photo: Overview of site facing west (see below).

EXISTING CONDITIONS:

A. PHYSICAL FEATURES

Rock outcroppings: Rocky outcrops on edge of northern slope.

Soils: Sandy loam.

Ponds and Drainages: None.

Slopes/Aspects: Flat on southern part of site, but a north-facing slope on the edge of the site.

Other:

B. VEGETATIVE FEATURES

Vegetation Community and Dominant Species: Chaparral and coastal scrub on the slope, non-native grasslands on the flat top southern part of the site.

Species Diversity: 18 species (3 in rocky outcrop, 2 in overstory).

Visual estimate of percent vegetative cover: 90% vegetation cover on slope, 10% on the south flat area due to debris and signs of fire damage.

Plant Vigor: Plant stressors observed in the area were the senescence of annual species and fire damage to perennial shrubs and trees (evident in post-fire crown sprouting by oaks and shrubs).

Non-native Plant Component: Annual grasses and forbs including *Bromus* spp., *Brassica nigra*, and *Centaurea melitensis* (see below)

Other:

C. ON SITE DISTURBANCE (Natural and Anthropogenic)

Soils:

Paved: N/A

Compacted: N/A

Topsoil Disturbance: Concrete and metal debris buried throughout the site.

Cut/fill: Filled with scrap metal and concrete

Oily/encrusted/stained: N/A

Soil erosion/loss: N/A

Other:

Vegetation:

Clearing/mowing: N/A

Herbicides: N/A

Burning: Affected by Topanga fire of October 2005.

Irrigation/hydrology: Irrigation pipes and sprinkler are on site.

Revegetation: N/A

Other:

D. CHEMICAL SAMPLING POINTS:

Justification: Previous testing of soils in the area detected concentrations of PCBs and metals.

NOTES:

Plant Species List

Common	**Scientific**
Black mustard	*Brassica nigra*
Rip-gut brome	*Bromus diandrus*
Tocalote	*Centaurea melitensis*
Bull thistle	*Cirsium vulgare*
Canadian horseweed	*Conyza canadensis*
Golden yarrow	*Eriophyllum confertiflorum*
Heart-leaf penstemon	*Keckiella cordifolia*
Cliff desertdandelion	*Malacothrix saxatilis*
Wild cucumber	*Marah macrocarpus*
Sticky monkeyflower	*Mimulus aurantiacus*
Tree tobacco	*Nicotiana glauca*
Caterpillar phacelia	*Phacelia cicutaria var. cicutaria*
Chaparral yucca	*Yucca whipplei*
Rocky outcrop	
Wedgeleaf ceanothus	*Ceanothus cuneatus*
Birchleaf mountain mohogany	*Cercocarpus betuloides var. betuloides*
Thickleaf yerba santa	*Eriodictyon crassifolium*
Overstory	
Chamise	*Adenostoma fasciculatum*
Laurel sumac	*Malosma laurina*

PHOTOS:

Photo 1. Overview of site facing west.

SWMU/AOC: Group 6- OCY **DATE:** July 19, 2006 **PERSONNEL:** Cy Fernandez/ Lina Ng

ASSESSMENT AREA NUMBER: 4- NE Diesel AST-TPH

Relates to Reference/Assessment/Surrogate Area (s) Number(s): REF 7

Photo: Overview of site facing west (see below).

EXISTING CONDITIONS:

A. PHYSICAL FEATURES

Rock outcroppings: Rocky outcrops adjacent to the site on the north and south sides.

Soils: Sandy loam.

Ponds and Drainages: None.

Slopes/Aspects: None.

Other:

B. VEGETATIVE FEATURES

Vegetation Community and Dominant Species: Non-native grassland, with a mix of revegetated species including mulefat. Young coast live oaks surrounded with wire cages were apparently planted.

Species Diversity: 16 species (11 in understory, 4 in overstory, and 2 in oak woodland).

Visual estimate of percent vegetative cover: 95% vegetation cover, 5% cover on the road and roadsides.

Plant Vigor: Plant stressors observed in the area were the senescence of annual species and fire damage to perennial shrubs and trees (evident in post-fire crown sprouting by oaks and shrubs).

Non-native Plant Component: Annual grasses and forbs including *Bromus* spp., *Brassica nigra*, and *Centaurea melitensis* (see below)

Other:

C. ON SITE DISTURBANCE (Natural and Anthropogenic)

Soils:

Paved: Asphalt pavement only located in the drain.

Compacted: N/A

Topsoil Disturbance: Burrowing rodent activity observed throughout the site.

Cut/fill: N/A

Oily/encrusted/stained: N/A

Soil erosion/loss: N/A

Other:

Vegetation:

Clearing/mowing: N/A

Herbicides: N/A

Burning: Affected by Topanga fire of October 2005.

Irrigation/hydrology:

Revegetation: Mulefat/grassland revegetation and the coast live oak trees.

Other:

D. CHEMICAL SAMPLING POINTS:

Justification: Previous soil testing in this area detected total petroleum hydrocarbons (TPHs).

NOTES:

Plant Species List

Common	**Scientific**
Understory	
Narrow-leaved milkweed	*Asclepias fascicularis*
Coyote brush	*Baccharis pilularis*
Black mustard	*Brassica nigra*
Rip-gut brome	*Bromus diandrus*
Soft brome	*Bromus hordeaceus*
Red brome	*Bromus madritensis ssp. rubens*
Tocolate	*Centaurea melitensis*
Canadian horseweed	*Conyza canadensis*
Cryptantha	*Cryptantha sp.*
Prickly lettuce	*Lactuca serriola*
Spanish Lotus	*Lotus purshianus*
Overstory	
Mulefat	*Baccharis salicifolia*
Laurel sumac	*Malosma laurina*
Tree tobacco	*Nicotiana glauca*
Coast live oak	*Quercus agrifolia*
Oak Woodland	
Coast live oak	*Quercus agrifolia*
Poison oak	*Toxicodendron diversilobum*

PHOTOS:

Photo 1. Overview of site facing west.

SWMU/AOC: Group 6- OCY **DATE:** July 19, 2006 **PERSONNEL:** Cy Fernandez/ Lina Ng

ASSESSMENT AREA NUMBER: 5- SW Diesel AST-TPH

Relates to Reference/Assessment/Surrogate Area (s) Number(s): REF 7

Photo: Overview of site facing west (see below).

EXISTING CONDITIONS:

A. PHYSICAL FEATURES

Rock outcroppings: Rocky outcrops adjacent to the site on the north and south sides.

Soils: Sandy loam.

Ponds and Drainages: None

Slopes/Aspects: Fairly flat

Other:

B. VEGETATIVE FEATURES

Vegetation Community and Dominant Species: Non-native grassland, with a mix of revegetated species including mulefat. Coast live oak woodland is present on the west of the site.

Species Diversity: 22 species.

Visual estimate of percent vegetative cover: 100% vegetation cover.

Plant Vigor: Plant stressors observed in the area were the senescence of annual species and fire damage to perennial shrubs and trees (evident in post-fire crown sprouting by oaks and shrubs).

Non-native Plant Component: Annual grasses and forbs including *Bromus* spp., *Brassica nigra,* and *Centaurea melitensis* (see below)

Other:

C. ON SITE DISTURBANCE (Natural and Anthropogenic)

Soils:

Paved: N/A

Compacted: N/A

Topsoil Disturbance: Burrowing rodent activity observed throughout the site and old vehicle tracks observed on the site.

Cut/fill: Graded

Oily/encrusted/stained: N/A

Soil erosion/loss: N/A

Other:

Vegetation:

Clearing/mowing: N/A

Herbicides: N/A

Burning: Affected by Topanga fire of October 2005.

Irrigation/hydrology: N/A

Revegetation: Mulefat/grassland; planted coast live oaks.

Other:

D. CHEMICAL SAMPLING POINTS:

Justification: Previous soil testing in this area detected total petroleum hydrocarbons (TPHs).

NOTES:

Plant Species List

Common	Scientific
Chamise	*Adenostoma fasciculatum*
Narrow-leaved milkweed	*Asclepias fascicularis*
Wild oats	*Avena sp.*
Coyote brush	*Baccharis pilularis*
Coyote brush	*Baccharis pilularis*
Black mustard	*Brassica nigra*
Rip-gut brome	*Bromus diandrus*
Soft brome	*Bromus hordeaceus*
Tocolate	*Centaurea melitensis*
Bull thistle	*Cirsium vulgare*
Canadian horseweed	*Conyza canadensis*
Cryptantha	*Cryptantha sp.*
Chaparral yucca	*Yucca whipplei*
Prickly lettuce	*Lactuca serriola*
Common California aster	*Lessingia filaginifolia*
Spanish Lotus	*Lotus purshianus*
Foothill needlegrass	*Nassella lepida*
Caterpillar phacelia	*Phacelia cicutaria var. cicutaria*
Bristly ox tongue	*Picris echioides*
Coast live oak	*Quercus agrifolia*
Poison oak	*Toxicodendron diversilobum*
Sour clover	*Trifolium fucatum*

PHOTOS:

Photo 1. Overview of site facing west.

SWMU/AOC: Group 6, OCY **DATE:** July 18, 2006 **PERSONNEL:** Michael Tuma/ Lina Ng

ASSESSMENT AREA NUMBER: 6 – AI Conservation Yard

Relates to Reference/Assessment/Surrogate Area (s) Number(s): REF 11

Photo: Overview of site facing southwest (see below).

EXISTING CONDITIONS:

A. PHYSICAL FEATURES

Rock outcroppings: Rocky outcrops occur to the northeast and the southeast of the site.

Soils: Sandy loam.

Ponds and Drainages: None.

Slopes/Aspects: None.

Other: None.

B. VEGETATIVE FEATURES

Vegetation Community and Dominant Species: Area mainly characterized with non-native grassland in the western portion of the site, an area of revegetation with mulefat/grassland species in the eastern portion of the site, and coastal scrub in the southeastern portion in a disturbed area along the side of a road. In addition, two Santa Susana tarplant individuals were located in the costal scrub habitat.

Species Diversity: 24 species.

Visual estimate of percent vegetative cover: Coverage is 100% in pad area around non-native grassland and 10% in eastern half and paved areas near the coastal scrub community.

Plant Vigor: Plant stressors observed in the area were the senescence of annual species and fire damage to perennial shrubs and trees (evident in post-fire crown sprouting by oaks and shrubs).

Non-native Plant Component: Annual grasses and forbs including *Bromus* spp., *Centaurea melitensis*, and *Brassica nigra.*

Other:

C. ON SITE DISTURBANCE (Natural and Anthropogenic)

Soils:

Paved: N/A

Compacted: Soils on road compacted due to vehicle traffic, NE area gravely and paved and recently graded.

Topsoil Disturbance: N/A

Cut/fill: Graded near road and within revegetated area

Oily/encrusted/stained: N/A

Soil erosion/loss: N/A

Other: Scrap metal and concrete debris located on southern end of site.

Vegetation:

Clearing/mowing: Grated south of the road.

Herbicides: N/A

Burning: N/A

Irrigation/hydrology: N/A

Revegetation: Some eastern areas of the site have been revegetated with non-native grasses and mulefat.

Other:

D. CHEMICAL SAMPLING POINTS:

Justification: Previous soil testing of the area detected PCBs.

PLANT SPECIES LIST

Common	Scientific
Prickly poppy	*Argemone munita*
California sagebrush	*Artemisia californica*
Coyote brush	*Baccharis pilularis*
Mulefat	*Baccharis salicifolia*
Black mustard	*Brassica nigra*
Rip-gut brome	*Bromus diandrus*
Soft brome	*Bromus hordeaceus*
Red brome	*Bromus madritensis ssp. rubens*
Coast morning glory	*Calystegia macrostegia*
Tocalote	*Centaurea melitensis*
Bull thistle	*Cirsium vulgare*
Canadian horseweed	*Conyza canadensis*
California encelia	*Encelia californica*
Turkey mullein	*Eremocarpus setigerus*
Thickleaf yerba santa	*Eriodictyon crassifolium*
Golden yarrow	*Eriophyllum confertiflorum*
California everlasting	*Gnaphalium californicum*
Santa Susana tarplant	*Hemizonia minthornii*
Telegraph weed	*Heterotheca grandiflora*
Prickly lettuce	*Lactuca serriola*
Common California aster	*Lessingia filaginifolia*
Bird's-foot trefoil	*Lotus corniculatus*
Spanish Lotus	*Lotus purshianus*

Deerweed	*Lotus scoparius*
Cliff desertdandelion	*Malacothrix saxatilis*
Cliff desertdandelion	*Malacothrix saxatilis*
Laurel sumac	*Malosma laurina*
Sour clover	*Melilotus indica*
Sticky monkeyflower	*Mimulus aurantiacus*
Foothill needlegrass	*Nassella lepida*
Crimson fountain grass	*Pennisetum setaceum*
Caterpillar phacelia	*Phacelia cicutaria var. cicutaria*
Smilo grass	*Piptatherum miliaceum*
Rabbit foot grass	*Polypogon monspeliensis*
Wintervetch	*Vicia villosa*

PHOTOS:

Photo 1. Overview of site facing southeast.

SWMU/AOC: Group 6, OCY **DATE:** July 18, 2006 **PERSONNEL:** Michael Tuma/ Lina Ng

ASSESSMENT AREA NUMBER: 7 – Rocketdyne conservation yard

Relates to Reference/Assessment/Surrogate Area (s) Number(s): REF 11

Photo: Overview of site facing east (see below).

EXISTING CONDITIONS:

A. PHYSICAL FEATURES

Rock outcroppings: Located to the northwest and to the east of site.

Soils: Sandy loam.

Ponds and Drainages: Small seasonal drainage located offsite to the east.

Slopes/Aspects: None.

Other:

B. VEGETATIVE FEATURES

Vegetation Community and Dominant Species: Mixed transition area between revegetated area of mulefat/grassland and non-native grassland.

Species Diversity: 14 species.

Visual estimate of percent vegetative cover: Approximately 55% in the mulefat/grassland revegetation areas, 2% on the roadsides, and close to no coverage on the road due to sparse vegetation.

Plant Vigor: Plant stressors observed in the area were the senescence of annual species and fire damage to perennial shrubs and trees (evident in post-fire crown sprouting by oaks and shrubs).

Non-native Plant Component: Annual grasses and forbs including *Bromus* spp., *Centaurea melitensis*, and *Brassica nigra.*

Other:

C. ON SITE DISTURBANCE (Natural and Anthropogenic)

Soils:

Paved: N/A

Compacted: Compacted on roadsides and main road due to vehicle traffic.

Topsoil Disturbance: N/A

Cut/fill: Graded recently on north, west, and south side.

Oily/encrusted/stained: N/A

Soil erosion/loss: N/A

Other:

Vegetation:

Clearing/mowing: Cleared and graded recently.

Herbicides: N/A

Burning: N/A

Irrigation/hydrology: N/A

Revegetation: Revegetation area dominated by mulefat and non-native grasses.

Other:

D. CHEMICAL SAMPLING POINTS:

Justification: Previous soil testing in this area detected PCBs and various metals.

NOTES:

PLANT SPECIES LIST

Common	Scientific
Pigweed amaranth	*Amaranthus albus*
Scarlet pimpernel	*Anagallis arvensis*
Coyote brush	*Baccharis pilularis*
Mulefat	*Baccharis salicifolia*
Black mustard	*Brassica nigra*
Soft brome	*Bromus hordeaceus*
Red brome	*Bromus madritensis ssp. rubens*
Tocalote	*Centaurea melitensis*
Canadian horseweed	*Conyza canadensis*
Telegraph weed	*Heterotheca grandiflora*
Cliff desertdandelion	*Malacothrix saxatilis*
Sour clover	*Melilotus indica*
Foothill needlegrass	*Nassella lepida*
Rabbit foot grass	*Polypogon monspeliensis*

PHOTOS:

Photo 1. Overview of site facing east.

SWMU/AOC: Group 6, OCY **DATE:** July 18, 2006 **PERSONNEL:** Michael Tuma/ Lina Ng

ASSESSMENT AREA NUMBER: 8 – Telephone Pole Street Area- Dioxins

Relates to Reference/Assessment/Surrogate Area (s) Number(s): REF 11

Photo: Overview of site facing west.

EXISTING CONDITIONS:

A. PHYSICAL FEATURES

Rock outcroppings: Located to the north and to the east of site.

Soils: Sandy loam that has been recently graded and compacted.

Ponds and Drainages: None.

Slopes/Aspects: None.

Other:

B. VEGETATIVE FEATURES

Vegetation Community and Dominant Species: To the north, comprised of non-native grassland, across the street and to the south is a revegetated area dominated by mulefat/grassland.

Species Diversity: 16 species (14 species north of road, 8 south of road).

Visual estimate of percent vegetative cover: 5% overall, 20% in road, 50% in mulefat, 60% north of road.

Plant Vigor: Plant stressors observed in the area were the senescence of annual species.

Non-native Plant Component: Annual grasses and forbs including *Bromus* spp., *Centaurea melitensis*, and *Brassica nigra*.

Other:

C. ON SITE DISTURBANCE (Natural and Anthropogenic)

Soils:

Paved: N/A

Compacted: Soils compacted due to vehicle road use.

Topsoil Disturbance: N/A

Cut/fill: Graded near road and south of road.

Oily/encrusted/stained: N/A

Soil erosion/loss: N/A

Other:

Vegetation:

Clearing/mowing: Graded south of the road.

Herbicides: N/A

Burning: Affected by Topanga fire of October 2005.

Irrigation/hydrology: N/A

Revegetation: South of road has been revegetated with non-native grasses and mulefat.

Other:

D. CHEMICAL SAMPLING POINTS:

Justification: Previous soil testing detected dioxin in this area.

NOTES:

PLANT SPECIES LIST

Common	**Scientific**
Non-native grassland (North of road)	
Wild oats	*Avena sp.*
Mulefat	*Baccharis salicifolia*
Black mustard	*Brassica nigra*
Soft brome	*Bromus hordeaceus*
Red brome	*Bromus madritensis ssp. rubens*
Tocalote	*Centaurea melitensis*
Canadian horseweed	*Conyza canadensis*
Turkey mullein	*Eremocarpus setigerus*
Telegraph weed	*Heterotheca grandiflora*
Prickly lettuce	*Lactuca serriola*
Spanish Lotus	*Lotus purshianus*
Deerweed	*Lotus scoparius*
Foothill needlegrass	*Nassella lepida*
Winter vetch	*Vicia villosa*
Mulefat revegetation area (South of road)	
Soft brome	*Bromus hordeaceus*
Red brome	*Bromus madritensis ssp. rubens*
Tocalote	*Centaurea melitensis*
Canadian horseweed	*Conyza canadensis*
Telegraph weed	*Heterotheca grandiflora*
Common California aster	*Lessingia filaginifolia*
Spanish Lotus	*Lotus purshianus*
Sour clover	*Melilotus indica*

PHOTOS:

Photo 1. Overview of site facing west.

SWMU/AOC: Group 6, OCY **DATE:** July 18, 2006 **PERSONNEL:** Michael Tuma/ Lina Ng

ASSESSMENT AREA NUMBER: 9 – South Debris Area

Relates to Reference/Assessment/Surrogate Area (s) Number(s): REF 9

Photo: Overview of site facing southeast (see below).

EXISTING CONDITIONS:

A. PHYSICAL FEATURES

Rock outcroppings: Located to the north and east of site.

Soils: Sandy loam.

Ponds and Drainages: Pipe containing water running through the middle of the site on the south end.

Slopes/Aspects: None.

Other:

B. VEGETATIVE FEATURES

Vegetation Community and Dominant Species: Non-native grassland with dense patches of thistle.

Species Diversity: 17 species.

Visual estimate of percent vegetative cover: Approximately 85% overall (5% near the pipe, 90% in the grassland).

Plant Vigor: Plant stressors observed in the area were the senescence of annual species.

Non-native Plant Component: Annual grasses and forbs including *Bromus* spp., *Brassica nigra*, and *Centaurea melitensis* (see below)

Other:

C. ON SITE DISTURBANCE (Natural and Anthropogenic)

Soils:

Paved: N/A

Compacted: N/A

Topsoil Disturbance: Burrowing rodent activity around water pipe area.

Cut/fill: N/A

Oily/encrusted/stained: N/A

Soil erosion/loss: N/A

Other: Erosion wattles and hay bales running through middle of site, asphalt debris scattered about in patches.

Vegetation:

Clearing/mowing: Graded south of the road.

Herbicides: N/A

Burning: Affected by Topanga fire of October 2005.

Irrigation/hydrology: N/A

Revegetation: South of road has been revegetated with grasses and mulefat.

Other: Area around water pipe mowed recently.

D. CHEMICAL SAMPLING POINTS:

Justification: Previous soils testing in the area detected dioxins, metals, and polynuclear aromatic hydrocarbons (PAHs).

NOTES:

PLANT SPECIES LIST

Common	Scientific
Black mustard	*Brassica nigra*
Rip-gut brome	*Bromus diandrus*
Soft brome	*Bromus hordeaceus*
Red brome	*Bromus madritensis ssp. rubens*
Hairy ceanothus	*Ceanothus oliganthus*
Tocalote	*Centaurea melitensis*
Bull thistle	*Cirsium vulgare*
Canadian horseweed	*Conyza canadensis*
Turkey mullein	*Eremocarpus setigerus*
Thickleaf yerba santa	*Eriodictyon crassifolium*
Golden yarrow	*Eriophyllum confertiflorum*
Prickly lettuce	*Lactuca serriola*
Common California aster	*Lessingia filaginifolia*
Cliff desertdandelion	*Malacothrix saxatilis*
Horehound	*Marrubium vulgare*
Caterpillar phacelia	*Phacelia cicutaria var. cicutaria*
Winter vetch	*Vicia villosa*

PHOTOS:

Photo 1. Overview of site facing southeast.

SWMU/AOC: Group 6, OCY **DATE:** July 18, 2006 **PERSONNEL:** Michael Tuma/ Lina Ng

ASSESSMENT AREA NUMBER: 10 - North Debris Area

Relates to Reference/Assessment/Surrogate Area (s) Number(s): REF 9

Photo: Overview of site facing west (see below).

EXISTING CONDITIONS:

A. PHYSICAL FEATURES

Rock outcroppings: Surround the site on all sides; rock outcrop in the center of the site supporting a Santa Susana tarplant population.

Soils: Sandy loam, also patches of ash and metal debris.

Ponds and Drainages: None.

Slopes/Aspects: Gently sloping facing south.

B. VEGETATIVE FEATURES

Vegetation Community and Dominant Species: Transitional zone between non-native grassland and coastal scrub.

Species Diversity: 30 species.

Visual estimate of percent vegetative cover: 70% in grassland (sparse patches approximately 20% in some areas), and 60 % in coastal scrub.

Plant Vigor: Plant stressors observed in the area were the senescence of annual species and fire damage to perennial shrubs and trees (evident in post-fire crown sprouting by oaks and shrubs).

Non-native Plant Component: many non-native species observed including annual grasses and forbs (see species list below)

Other:

C. ON SITE DISTURBANCE (Natural and Anthropogenic)

Soils:

Paved: NA

Compacted: NA

Topsoil Disturbance: Burrowing rodent activity observed throughout the site.

Cut/fill: N/A

Oily/encrusted/stained: N/A

Soil erosion/loss: N/A

Other: Scrap metal and concrete debris located on southern end of site.

Vegetation:

Clearing/mowing: Graded south of the road.

Herbicides: Cannot be determined.

Burning: Affected by Topanga Fire of October 2005

Irrigation/hydrology: N/A

Revegetation: South of road has been revegetated with non-native grasses and mulefat.

Other:

D. CHEMICAL SAMPLING POINTS:

Justification: Previous soils testing has detected dioxins, metals, and polynuclear aromatic hydrocarbons (PAHs).

PLANT SPECIES LIST

Common	Scientific
Wild oats	*Avena spp.*
Coyote brush	*Baccharis pilularis*
Mulefat	*Baccharis salicifolia*
Black mustard	*Brassica nigra*
Soft brome	*Bromus hordeaceus*
Red brome	*Bromus madritensis ssp. rubens*
Tocalote	*Centaurea melitensis*
Bull thistle	*Cirsium vulgare*
Canadian horseweed	*Conyza canadensis*
Cryptantha	*Cryptantha spp.*
African daisy	*Dimorphotheca sinuata*
California fuchia	*Epilobium canum*
Turkey mullein	*Eremocarpus setigerus*
Thickleaf yerba santa	*Eriodictyon crassifolium*
Golden yarrow	*Eriophyllum confertiflorum*
Santa Susana tarplant (40)	*Hemizonia minthornii*
Prickly lettuce	*Lactuca serriola*
Common California aster	*Lessingia filaginifolia*
Spanish Lotus	*Lotus purshianus*
Deerweed	*Lotus scoparius*
Cliff desertdandelion	*Malacothrix saxatilis*
Laurel sumac	*Malosma laurina*
Fountain grass	*Pennisetum setaceum*
Caterpillar phacelia	*Phacelia cicutaria var. cicutaria*
Wild radish	*Raphanus sativus*
Curly dock	*Rumex crispus*
Milk thistle	*Silybum marianum*

Poison oak	*Toxicodendron diversilobum*
Vinegar weed	*Trichostema lanceolatum*
Chaparral yucca	*Yucca whipplei*

PHOTOS:

Photo 1. Overview of site facing west.

SWMU/AOC: Group 6- OCY **DATE:** July 18, 2006 **PERSONNEL:** Michael Tuma/ Lina Ng

ASSESSMENT AREA NUMBER: 11- PCBs/TPH

Relates to Reference/Assessment/Surrogate Area (s) Number(s): REF 11

Photo: Overview of site facing south (see below).

EXISTING CONDITIONS:

A. PHYSICAL FEATURES

Rock outcroppings: Rock outcrops adjacent to the site to the northwest.

Soils: Sandy loam.

Ponds and Drainages: North-south seasonal drainage running through site.

Slopes/Aspects: Fairly flat.

Other:

B. VEGETATIVE FEATURES

Vegetation Community and Dominant Species: Non-native grassland, with a mix of revegetated species including mulefat. Coast live oaks are present on the edges of the site.

Species Diversity: 23 species.

Visual estimate of percent vegetative cover: 85-90% vegetation cover.

Plant Vigor: Plant stressors observed in the area were the senescence of annual species and fire damage to perennial shrubs and trees (evident in post-fire crown sprouting by oaks and shrubs).

Non-native Plant Component: Annual grasses and forbs including *Bromus* spp., *Brassica nigra,* and *Centaurea melitensis* (see below)

Other:

C. ON SITE DISTURBANCE (Natural and Anthropogenic)

Soils:

Paved: N/A

Compacted: N/A

Topsoil Disturbance: Burrowing rodent activity observed throughout the site and old vehicle tracks observed on the site.

Cut/fill: N/A

Oily/encrusted/stained: N/A

Soil erosion/loss: N/A

Other:

Vegetation:

Clearing/mowing: N/A

Herbicides: N/A

Burning: Affected by Topanga fire of October 2005.

Irrigation/hydrology: N/A

Revegetation: Mulefat/grassland species

Other:

D. CHEMICAL SAMPLING POINTS:

Justification: Previous soil testing in this area detected PCBs and total petroleum hydrocarbons (TPHs).

NOTES:

Plant Species List

Common	**Scientific**
Drain area	
Narrow-leaved milkweed	*Asclepias fascicularis*
Coyote brush	*Baccharis pilularis*
Mulefat	*Baccharis salicifolia*
Black mustard	*Brassica nigra*
Soft brome	*Bromus hordeaceus*
Red brome	*Bromus madritensis ssp. rubens*
Tocalote	*Centaurea melitensis*
Bull thistle	*Cirsium vulgare*
Canadian horseweed	*Conyza canadensis*
Prickly lettuce	*Lactuca serriola*
Spanish Lotus	*Lotus purshianus*
Foothill needlegrass	*Nassella lepida*
Bristly ox tongue	*Picris echioides*
Rabbit foot grass	*Polypogon monspeliensis*
Coast live oak	*Quercus agrifolia*
Arroyo willow	*Salix lasiolepis*
Milk thistle	*Silybum marianum*
Poison oak	*Toxicodendron diversilobum*
Sour clover	*Trifolium fucatum*
Winter vetch	*Vicia villosa*
Pad	
Mulefat	*Baccharis salicifolia*

Black mustard	*Brassica nigra*
Soft chess brome	*Bromus hordeaceus*
Tocalote	*Centaurea melitensis*
Prickly lettuce	*Lactuca serriola*
Foothill needlegrass	*Nassella lepida*
Milk thistle	*Silybum marianum*

PHOTOS:

Photo 1. Overview of site facing south.

SWMU/AOC: Group 6- OCY **DATE:** July 18, 2006 **PERSONNEL:** Michael Tuma/ Lina Ng

ASSESSMENT AREA NUMBER: REF 12- Low Spot, M, TPH, PCB

Relates to Reference/Assessment/Surrogate Area (s) Number(s): 10

Photo: Overview of site facing north (see photo).

EXISTING CONDITIONS:

A. PHYSICAL FEATURES

Rock outcroppings: Rock outcrops adjacent to the site on the west side.

Soils: Sandy loam.

Ponds and Drainages: Asphalt paved drain running north-south through the middle of the site.

Slopes/Aspects: None.

Other:

B. VEGETATIVE FEATURES

Vegetation Community and Dominant Species: Non-native grassland, mulefat/grassland revegetation, and oak woodland.

Species Diversity: 23 species.

Visual estimate of percent vegetative cover: 85% coverage on both sides of the drain, 0% coverage in the drainage ditch area.

Plant Vigor: Plant stressors observed in the area were the senescence of annual species and fire damage to perennial shrubs and trees (evident in post-fire crown sprouting by oaks and shrubs).

Non-native Plant Component: Annual grasses and forbs including *Bromus* spp., *Brassica nigra*, and *Centaurea melitensis* (see below)

Other:

C. ON SITE DISTURBANCE (Natural and Anthropogenic)

Soils:

Paved: Asphalt pavement only located in the drain.

Compacted: N/A

Topsoil Disturbance: Burrowing rodent activity observed throughout the site.

Cut/fill: Graded near road, and east of drain

Oily/encrusted/stained: N/A

Soil erosion/loss: N/A

Other: South end of site near the main road has been possibly graded and cleared recently.

Vegetation:

Clearing/mowing: N/A

Herbicides: N/A

Burning: Affected by Topanga fire of October 2005.

Irrigation/hydrology: N/A

Revegetation: East of road has been revegetated with non-native grasses and mulefat.

Other:

D. CHEMICAL SAMPLING POINTS:

Justification: Previous soils testing in the area detected metals, TPH, and PCBs.

NOTES:

PLANT SPECIES LIST

Common	Scientific
Scarlet pimpernel	*Anagallis arvensis*
Prickly poppy	*Argemone munita*
Narrow-leaved milkweed	*Asclepias fascicularis*
Mulefat	*Baccharis salicifolia*
Black mustard	*Brassica nigra*
Soft brome	*Bromus hordeaceus*
Red brome	*Bromus madritensis ssp. rubens*
Tocalote	*Centaurea melitensis*
Bull thistle	*Cirsium vulgare*
Canadian horseweed	*Conyza canadensis*
Umbrella sedge	*Cyperus squarrosus*
Turkey mullein	*Eremocarpus setigerus*
California everlasting	*Gnaphalium californicum*
Telegraph weed	*Heterotheca grandiflora*
Prickly lettuce	*Lactuca serriola*
Common California aster	*Lessingia filaginifolia*
Spanish Lotus	*Lotus purshianus*
Deerweed	*Lotus scoparius*
Bristly ox tongue	*Picris echioides*
Smilo grass	*Piptatherum miliaceum*
Rabbit foot grass	*Polypogon monspeliensis*
Coast live oak	*Quercus agrifolia*
Sour clover	*Trifolium fucatum*

PHOTOS:

Photo 1. Overview of site facing north.

SWMU/AOC: Group 6, OCY **DATE:** July 18, 2006 **PERSONNEL:** Michael Tuma/ Lina Ng

ASSESSMENT AREA NUMBER: 16 – Transformer, PCB's

Relates to Reference/Assessment/Surrogate Area (s) Number(s): REF 11

Photo: Overview of site facing north (see below).

EXISTING CONDITIONS:

A. PHYSICAL FEATURES

Rock outcroppings: Outcrops located to the north and to the east of site.

Soils: Sandy loam.

Ponds and Drainages: Small drainage located offsite to the east.

Slopes/Aspects: None.

Other:

B. VEGETATIVE FEATURES

Vegetation Community and Dominant Species: Low-lying non-native grassland species located at the side of the road as well as tall dense areas of thistle and mustard.

Species Diversity: 14 species.

Visual estimate of percent vegetative cover: Approximately 90% near the sampling stakes, and sparse patches of 2% coverage closer to the road.

Plant Vigor: Plant stressors observed in the area were the senescence of annual species and drought stress (observed in several Canadian horseweed plants).

Non-native Plant Component: Annual grasses and forbs including *Bromus* spp., *Brassica nigra*, and *Centaurea melitensis* (see below)

Other:

C. ON SITE DISTURBANCE (Natural and Anthropogenic)

Soils:

Paved: N/A

Compacted: N/A

Topsoil Disturbance: Burrowing rodent activity around entire area.

Cut/fill: N/A

Oily/encrusted/stained: N/A

Soil erosion/loss: N/A

Other: Graded areas and scrapes done recently to the east as well as an excavated telephone pole in the middle of the site.

Vegetation:

Clearing/mowing: N/A

Herbicides: N/A

Burning: Affected by Topanga Fire of October 2005.

Irrigation/hydrology: N/A

Revegetation: N/A

Other:

D. CHEMICAL SAMPLING POINTS:

Justification: Transformers were removed from this area, and previous soils testing detected PCBs.

NOTES:

PLANT SPECIES LIST

Common	Scientific
Black mustard	*Brassica nigra*
Rip-gut brome	*Bromus diandrus*
Soft brome	*Bromus hordeaceus*
Red brome	*Bromus madritensis ssp. rubens*
Tocalote	*Centaurea melitensis*
Bull thistle	*Cirsium vulgare*
Canadian horseweed	*Conyza canadensis*
Turkey mullein	*Eremocarpus setigerus*
California poppy	*Eschscholzia californica*
Telegraph weed	*Heterotheca grandiflora*
Common California aster	*Lessingia filaginifolia*
Spanish Lotus	*Lotus purshianus*
Horehound	*Marrubium vulgare*
Winter vetch	*Vicia villosa*

PHOTOS:

Photo 1. Overview of site facing north.

SWMU/AOC: Group 6- NCY **DATE:** July 27, 2006 **PERSONNEL:** Michael Tuma/ Lina Ng

ASSESSMENT AREA NUMBER: 17 - Metals

Relates to Reference/Assessment/Surrogate Area (s) Number(s): REF 8

Photo: Overview coastal scrub and road, facing west; overview of non-native grassland and road, facing west (see below).

EXISTING CONDITIONS:

A. PHYSICAL FEATURES

Rock outcroppings: N/A

Soils: Sandy loam.

Ponds and Drainages: Drainage located to the west and south of the site, assessed separately.

Slopes/Aspects: Gentle slopes throughout facing southwest

Other:

B. VEGETATIVE FEATURES

Vegetation Community and Dominant Species: Non-native grassland and coastal scrub.

Species Diversity: 27 species.

Visual estimate of percent vegetative cover: 70% vegetation cover.

Plant Vigor: Plant stressors observed in the area were the senecesence of annual species and fire damage to perennial shrubs and trees (evident in post-fire crown sprouting by oaks and shrubs).

Non-native Plant Component: Annual grasses and forbs including *Bromus* spp., *Brassica nigra*, and *Centaurea melitensis* (see below)

Other:

C. ON SITE DISTURBANCE (Natural and Anthropogenic)

Soils:

Paved: N/A

Compacted: Road though center of site has compacted the soils.

Topsoil Disturbance: Burrowing rodent activity observed throughout the site.

Cut/fill: Graded.

Oily/encrusted/stained: N/A

Soil erosion/loss: N/A

Other:

Vegetation:

Clearing/mowing: N/A

Herbicides: N/A

Burning: Affected by Topanga fire of October 2005.

Irrigation/hydrology: N/A

Revegetation: N/A

Other:

D. CHEMICAL SAMPLING POINTS:

Justification: Previous soils testing efforts there detected metals.

NOTES:

PLANT SPECIES LIST

Common	**Scientific**
Coastal scrub	
California sagebrush	*Artemisia californica*
Thickleaf yerba santa	*Eriodictyon crassifolium*
Deerweed	*Lotus scoparius*
Tocalote	*Centaurea melitensis*
Black mustard	*Brassica nigra*
Canadian horseweed	*Conyza canadensis*
Cliff desertdandelion	*Malacothrix saxatilis*
California everlasting	*Gnaphalium californicum*
Sour clover	*Melilotus indica*
Common California aster	*Lessingia filaginifolia*
Coyote brush	*Baccharis pilularis*
Grassland	
Black mustard	*Brassica nigra*
Curly dock	*Rumex crispus*
Common California aster	*Lessingia filaginifolia*
California sagebrush	*Artemisia californica*
Coyote brush	*Baccharis pilularis*
Sticky monkeyflower	*Mimulus aurantiacus*
Tocalote	*Centaurea melitensis*
Spanish Lotus	*Lotus purshianus*
Canadian horseweed	*Conyza canadensis*
Cliff desertdandelion	*Malacothrix saxatilis*
Coast live oak	*Quercus agrifolia*
Prickly sow thistle	*Sonchus asper ssp. asper*
Prickly lettuce	*Lactuca serriola*
Red brome	*Bromus madritensis ssp. rubens*
Bull thistle	*Cirsium vulgare*

Sour clover	*Melilotus indica*

PHOTOS:

Photo 1. Overview of coastal scrub and road, facing west.

Photo 1. Overview of non-native grassland and road, facing west.

SWMU/AOC: Group 6- NCY **DATE:** July 18, 2006 **PERSONNEL:** Michael Tuma/ Lina Ng

ASSESSMENT AREA NUMBER: 17 Drain- Metals

Relates to Reference/Assessment/Surrogate Area (s) Number(s): REF 8

Photo: Overview of western portion of drainage facing west, asphalt paved area of drainage, re-sprouting and crown sprouting coast live oak resulting from fire damage (see below).

EXISTING CONDITIONS:

A. PHYSICAL FEATURES

Rock outcroppings: One outcrop located on south side of drain.

Soils: Sandy loam and bare bedrock

Ponds and Drainages: Drain on site.

Slopes/Aspects: None.

B. VEGETATIVE FEATURES

Vegetation Community and Dominant Species: Chaparral, oak woodland, and non-native grassland.

Species Diversity: 41 species (19 inside drain, 35 outside of drain)

Visual estimate of percent vegetative cover: 65-70% in areas surrounding the drain, sparse (2%) inside the drain.

Plant Vigor: Plant stressors observed in the area were the senescence of annual species and fire damage to perennial shrubs and trees (evident in post-fire crown sprouting by oaks and shrubs).

Non-native Plant Component: Annual grasses and forbs including *Bromus* spp., *Brassica nigra*, and *Centaurea melitensis* (see below)

Other:

C. ON SITE DISTURBANCE (Natural and Anthropogenic)

Soils:

Paved: N/A

Compacted: N/A

Topsoil Disturbance: Burrowing rodent activity observed throughout the site.

Cut/fill: N/A

Oily/encrusted/stained: N/A

Soil erosion/loss: N/A

Other: Drainage was scooped with mechanical equipment during soils sampling.

Vegetation:

Clearing/mowing: Mowed vegetation on the edges of drain.

Herbicides: N/A

Burning: Affected by Topanga fire of October 2005.

Irrigation/hydrology: N/A

Revegetation: N/A

Other:

D. CHEMICAL SAMPLING POINTS:

Justification: Previous soils testing along the drainage detected high levels of dioxins and lead (Pb).

PLANT SPECIES LIST

Common	**Scientific**
Inside Drain	
Pigweed amaranth	*Amaranthus albus*
Scarlet pimpernel	*Anagallis arvensis*
Narrow-leaved milkweed	*Asclepias fascicularis*
Mulefat	*Baccharis salicifolia*
Black mustard	*Brassica nigra*
Rattlesnake weed	*Chamaesyce albomarginata*
Bull thistle	*Cirsium vulgare*
Clarkia	*Clarkia* sp.
Canadian horseweed	*Conyza canadensis*
Umbrella sedge	*Cyperus squarrosus*
Prickly lettuce	*Lactuca serriola*
Common California aster	*Lessingia filaginifolia*
Italian ryegrass	*Lolium multiflorum*
Spanish Lotus	*Lotus purshianus*
Horehound	*Marrubium vulgare*
Curly dock	*Rumex crispus*
Mexican elderberry	*Sambucus mexicana*
Prickly sow thistle	*Sonchus asper ssp. asper*
Poison oak	*Toxicodendron diversilobum*
Outside Drain	
Chamise	*Adenostoma fasciculatum*
Pigweed amaranth	*Amaranthus albus*
Prickly poppy	*Argemone munita*
Wild oats	*Avena sp.*
Coyote brush	*Baccharis pilularis*
Mulefat	*Baccharis salicifolia*

Black mustard	*Brassica nigra*
Rip-gut brome	*Bromus diandrus*
Red brome	*Bromus madritensis ssp. rubens*
Bull thistle	*Cirsium vulgare*
Umbrella sedge	*Cyperus squarrosus*
Turkey mullein	*Eremocarpus setigerus*
Golden yarrow	*Eriophyllum confertiflorum*
Santa Susana tarplant	*Hemizonia minthornii*
Telegraph weed	*Heterotheca grandiflora*
Prickly lettuce	*Lactuca serriola*
Italian ryegrass	*Lolium multiflorum*
Spanish Lotus	*Lotus purshianus*
Chaparral bush mallow	*Malacothamnus fasciculatus*
Cliff desertdandelion	*Malacothrix saxatilis*
Laurel sumac	*Malosma laurina*
Horehound	*Marrubium vulgare*
Sour clover	*Melilotus indica*
Sticky monkeyflower	*Mimulus aurantiacus*
Foothill needlegrass	*Nassella lepida*
Smilo grass	*Piptatherum miliaceum*
Rabbit foot grass	*Polypogon monspeliensis*
Coast live oak	*Quercus agrifolia*
Curly dock	*Rumex crispus*
Mexican elderberry	*Sambucus mexicana*
Blue eyed grass	*Sisyrinchium bellum*
Purple nightshade	*Solanum xanti*
Prickly sow thistle	*Sonchus asper ssp. asper*
Poison oak	*Toxicodendron diversilobum*
Chaparral yucca	*Yucca whipplei*

PHOTOS:

Photo 1. Overview of western portion of drainage facing west.

Photo 2. Asphalt paved area of drainage.

Photo 3. Re-sprouting and crown sprouting coast live oak resulting from fire damage.

SWMU/AOC: Group 6- NCY **DATE:** July 18, 2006 **PERSONNEL:** Michael Tuma/ Lina Ng

ASSESSMENT AREA NUMBER: 18- Ashpile, dioxins, and metals

Relates to Reference/Assessment/Surrogate Area (s) Number(s): REF 5

Photo: Overview of site facing west (see below).

EXISTING CONDITIONS:

A. PHYSICAL FEATURES

Rock outcroppings: None.

Soils: Sandy loam with high ash content.

Ponds and Drainages: None.

Slopes/Aspects: Gentle slope towards the east.

Other:

B. VEGETATIVE FEATURES

Vegetation Community and Dominant Species: Non-native grassland and oak woodland.

Species Diversity: 14 species.

Visual estimate of percent vegetative cover: 95% vegetation cover.

Plant Vigor: Plant stressors observed in the area were the senecesence of annual species and fire damage to perennial shrubs and trees (evident in post-fire crown sprouting by oaks and shrubs).

Non-native Plant Component: Annual grasses and forbs including *Bromus* spp., *Brassica nigra*, and *Centaurea melitensis* (see below)

Other:

C. ON SITE DISTURBANCE (Natural and Anthropogenic)

Soils:

Paved: N/A

Compacted: N/A

Topsoil Disturbance: Burrowing rodent activity observed throughout the site.

Cut/fill: N/A

Oily/encrusted/stained: N/A

Soil erosion/loss: Erosion control (straw wattles) in place

Other:

Vegetation:

Clearing/mowing: N/A

Herbicides: N/A

Burning: Affected by Topanga fire of October 2005.

Irrigation/hydrology: N/A

Revegetation: N/A

Other: Vegetation damaged by human traffic.

D. CHEMICAL SAMPLING POINTS:

Justification: Previous soils testing there detected dioxins, barium (Ba), lead (Pb), silver (Ag), and zinc (Zn).

NOTES:

Plant Species List

Common	**Scientific**
Oak woodland	
Laurel sumac	*Malosma laurina*
Coast live oak	*Quercus agrifolia*
Poison oak	*Toxicodendron diversilobum*
Non-native grassland	
Scarlet pimpernel	*Anagallis arvensis*
Narrow-leaved milkweed	*Asclepias fascicularis*
Black mustard	*Brassica nigra*
Rip-gut brome	*Bromus diandrus*
Soft brome	*Bromus hordeaceus*
Red brome	*Bromus madritensis ssp. rubens*
Tocalote	*Centaurea melitensis*
Bull thistle	*Cirsium vulgare*
Bird's-foot trefoil	*Lotus corniculatus*
Foothill needlegrass	*Nassella lepida*
Milk thistle	*Silybum marianum*

PHOTOS:

Photo 1. Overview of site facing west.

SWMU/AOC: Group 6- SRE **DATE:** July 19, 2006 **PERSONNEL:** Cy Fernandez/ Lina Ng

ASSESSMENT AREA NUMBER: 19- SRE Pond

Relates to Reference/Assessment/Surrogate Area (s) Number(s): NONE

Photo: Overview of site facing south (see below).

EXISTING CONDITIONS:

A. PHYSICAL FEATURES

Rock outcroppings: Rock outcrops surround the edge of the pond basin.

Soils: Sandy loam.

Ponds and Drainages: Pond in basin that leads to drainage (SRE 30).

Slopes/Aspects: Fairly flat.

Other:

B. VEGETATIVE FEATURES

Vegetation Community and Dominant Species: Non-native grassland at pond edges; marshland within pond.

Species Diversity: 19 species.

Visual estimate of percent vegetative cover: 70% vegetation cover near pond and 30% vegetation cover dominated by grasses and thistle at southern edge of the site.

Plant Vigor: Plant stressors observed in the area were the senescence of annual species.

Non-native Plant Component: Annual grasses and forbs including *Bromus* spp., *Brassica nigra*, and *Centaurea melitensis* (see below)

Other:

C. ON SITE DISTURBANCE (Natural and Anthropogenic)

Soils:

Paved: NA

Compacted: NA

Topsoil Disturbance: Concrete and tarp lining on the south side of area.

Cut/fill: NA

Oily/encrusted/stained: NA

Soil erosion/loss: NA

Other:

Vegetation:

Clearing/mowing: NA

Herbicides:

Burning: Trees and shrubs in vicinity showed signs of having been burned in Topanga Fire.

Irrigation/hydrology: Sprinkler heads, pipes and drains observed onsite.

Revegetation:

Other:

D. CHEMICAL SAMPLING POINTS:

Justification: Previous soils testing there detected a variety of metals including Hg and Ag, SVOCs, and VOCs.

Plant Species List

Common	Scientific
Chamise	*Adenostoma fasciculatum*
Wild oats	*Avena sp.*
Coyote brush	*Baccharis pilularis*
Black mustard	*Brassica nigra*
Tocalote	*Centaurea melitensis*
California goosefoot	*Chenopodium californicum*
Bull thistle	*Cirsium vulgare*
Canadian horseweed	*Conyza canadensis*
Thickleaf yerba santa	*Eriodictyon crassifolium*
Common California aster	*Lessingia filaginifolia*
Giant ryegrass	*Leymus condensatus*
Deerweed	*Lotus scoparius*
Laurel sumac	*Malosma laurina*
Sticky monkeyflower	*Mimulus aurantiacus*
Foothill needlegrass	*Nassella lepida*
Rabbit foot grass	*Polypogon monspeliensis*
Sour clover	*Trifolium fucatum*
Common wheat	*Triticum aestivum*
Narrow-leaved cattail	*Typha domingensis*

PHOTOS:

Photo 1. Overview of site facing south.

SWMU/AOC: Group 6- SRE **DATE:** July 19, 2006 **PERSONNEL:** Cy Fernandez/ Lina Ng

ASSESSMENT AREA NUMBER: 20- SW Diesel AST-TPH and 26- Transformer PCBs

Relates to Reference/Assessment/Surrogate Area (s) Number(s): N/A

Photo: Overview of tarped area facing northwest (see below).

EXISTING CONDITIONS:

A. PHYSICAL FEATURES

Rock outcroppings: Rock outcrops adjacent to the site on the north and south sides.

Soils: Sandy loam.

Ponds and Drainages: None

Slopes/Aspects: Flat.

Other:

B. VEGETATIVE FEATURES

Vegetation Community and Dominant Species:

Species Diversity: NONE

Visual estimate of percent vegetative cover: NONE

Plant Vigor: NONE

Non-native Plant Component:

Other: Covered in black tarp and sandbags.

C. ON SITE DISTURBANCE (Natural and Anthropogenic)

Soils:

Paved: N/A

Compacted: N/A

Topsoil Disturbance: Likely

Cut/fill: Probably graded and filled

Oily/encrusted/stained: N/A

Soil erosion/loss: N/A

Other: Covered in black tarp with sandbags surrounding the area.

Vegetation:

Clearing/mowing: N/A

Herbicides: N/A

Burning: N/A

Irrigation/hydrology: N/A

Revegetation: N/A

Other:

D. CHEMICAL SAMPLING POINTS:

Justification: Previous soils testing at these locations detected mercury (Hg).

NOTES:

Plant Species List

N/A

PHOTOS:

Photo 1. Overview of tarped area facing northwest.

SWMU/AOC: Group 6- SRE **DATE:** July 19, 2006 **PERSONNEL:** Cy Fernandez/ Lina Ng

ASSESSMENT AREA NUMBER: 21- Hg relse area, to pond

Relates to Reference/Assessment/Surrogate Area (s) Number(s): REF 1

Photo: Overview of site facing north (see below).

EXISTING CONDITIONS:

A. PHYSICAL FEATURES

Rock outcroppings: Rock outcrops adjacent to the site on the west side.

Soils: Sandy loam.

Ponds and Drainages: None

Slopes/Aspects: East facing slope.

Other:

B. VEGETATIVE FEATURES

Vegetation Community and Dominant Species: Non-native grassland on flat area and chaparral on slope.

Species Diversity: 8 species.

Visual estimate of percent vegetative cover: 90% vegetation cover, 10% in the roadway.

Plant Vigor: Plant stressors observed in the area were the senescence of annual species, drought stress (evident in several Canadian horseweed plants), and fire damage to perennial shrubs and trees (evident in post-fire crown sprouting by oaks and shrubs).

Non-native Plant Component: Annual grasses and forbs including *Bromus* spp., *Brassica nigra*, and *Centaurea melitensis* (see below)

Other:

C. ON SITE DISTURBANCE (Natural and Anthropogenic)

Soils:

Paved: N/A

Compacted: Dirt road compaction due to vehicle traffic.

Topsoil Disturbance: Concrete was dumped in spots around the site.

Cut/fill: Graded.

Oily/encrusted/stained: N/A

Soil erosion/loss: N/A

Other: Monitoring well in place.

Vegetation:

Clearing/mowing: N/A

Herbicides: N/A

Burning: Affected by Topanga fire of October 2005.

Irrigation/hydrology: N/A

Revegetation: N/A

Other:

D. CHEMICAL SAMPLING POINTS:

Justification: Previous soils testing detected PCBs

NOTES:

Plant Species List

Common	Scientific
Mulefat	*Baccharis salicifolia*
Rip-gut brome	*Bromus diandrus*
Red brome	*Bromus madritensis ssp. rubens*
Tocalote	*Centaurea melitensis*
Canadian horseweed	*Conyza canadensis*
Turkey mullein	*Eremocarpus setigerus*
Santa Susana tarplant	*Hemizonia minthornii*
Deerweed	*Lotus scoparius*

PHOTOS:

Photo 1. Overview of site facing north.

SWMU/AOC: Group 6- SRE **DATE:** July 19, 2006 **PERSONNEL:** Cy Fernandez/ Lina Ng

ASSESSMENT AREA NUMBER: 22- Sodium fac- Hg, Ag

Relates to Reference/Assessment/Surrogate Area (s) Number(s): REF 4

Photo: Overview of site facing north (see below).

EXISTING CONDITIONS:

A. PHYSICAL FEATURES

Rock outcroppings: Rock outcrops adjacently surrounding the site.

Soils: Sandy loam.

Ponds and Drainages: Seasonal drainage to the west of site.

Slopes/Aspects: Fairly flat.

Other:

B. VEGETATIVE FEATURES

Vegetation Community and Dominant Species: Non-native grassland.

Species Diversity: 17 species.

Visual estimate of percent vegetative cover: 90% vegetation cover, 5% in roadways.

Plant Vigor: Plant stressors observed in the area were the senescence of annual species and fire damage to perennial shrubs and trees (evident in post-fire crown sprouting by oaks and shrubs).

Non-native Plant Component: Annual grasses and forbs including *Bromus* spp., *Brassica nigra*, and *Centaurea melitensis* (see below)

Other:

C. ON SITE DISTURBANCE (Natural and Anthropogenic)

Soils:

Paved: N/A

Compacted: Surrounding dirt roads compacted due to vehicle traffic.

Topsoil Disturbance: N/A

Cut/fill: Graded.

Oily/encrusted/stained: N/A

Soil erosion/loss: N/A

Other:

Vegetation:

Clearing/mowing: N/A

Herbicides: N/A

Burning: Affected by Topanga fire of October 2005.

Irrigation/hydrology: Swales put up to divert water drainage.

Revegetation: N/A

Other:

D. CHEMICAL SAMPLING POINTS:

Justification: Previous soils testing there detected mercury (Hg) and silver (Ag).

NOTES:

Plant Species List

Common	Scientific
Chamise	*Adenostoma fasciculatum*
California sagebrush	*Artemisia californica*
Wild oats	*Avena sp.*
Mulefat	*Baccharis salicifolia*
Soft brome	*Bromus hordeaceus*
Tocalote	*Centaurea melitensis*
Canadian horseweed	*Conyza canadensis*
Turkey mullein	*Eremocarpus setigerus*
Prickly lettuce	*Lactuca serriola*
Common California aster	*Lessingia filaginifolia*
Spanish Lotus	*Lotus purshianus*
Sticky monkeyflower	*Mimulus aurantiacus*
Foothill needlegrass	*Nassella lepida*
Rabbit foot grass	*Polypogon monspeliensis*
Coast live oak	*Quercus agrifolia*
Hollyleaf redberry	*Rhamnus ilicifolia*
Poison oak	*Toxicodendron diversilobum*

PHOTOS:

Photo 1. Overview of site facing north.

SWMU/AOC: Group 6- SRE **DATE:** July 19, 2006 **PERSONNEL:** Cy Fernandez/ Lina Ng

ASSESSMENT AREA NUMBER: 23- UST- TPH

Relates to Reference/Assessment/Surrogate Area (s) Number(s): REF 2

Photo: Overview of site facing southwest (see below).

EXISTING CONDITIONS:

A. PHYSICAL FEATURES

Rock outcroppings: Rock outcrops adjacent to the site on the north and south sides.

Soils: Part paved concrete and sandy loam.

Ponds and Drainages: N/A

Slopes/Aspects: Fairly flat.

Other:

B. VEGETATIVE FEATURES

Vegetation Community and Dominant Species: Area mainly a non-native grassland, with a mix of revegetated species such as mulefat. Area is adjacent to a parking lot and on mostly concrete substrate. Approximately 20 Santa Susana tarplant individuals are in vicinity of the water pipe.

Species Diversity: 11 species.

Visual estimate of percent vegetative cover: 30% vegetation cover

Plant Vigor: Plant stressors observed in the area were the senecesence of annual species and fire damage to perennial shrubs and trees (evident in post-fire crown sprouting by oaks and shrubs).

Non-native Plant Component: Annual grasses and forbs including *Bromus* spp., *Brassica nigra*, and *Centaurea melitensis* (see below)

Other:

C. ON SITE DISTURBANCE (Natural and Anthropogenic)

Soils:

Paved: N/A

Compacted: N/A

Topsoil Disturbance: Pipes installed in the site.

Cut/fill: Graded.

Oily/encrusted/stained: N/A

Soil erosion/loss: N/A

Other:

Vegetation:

Clearing/mowing: N/A

Herbicides: N/A

Burning: Affected by Topanga fire of October 2005.

Irrigation/hydrology: N/A

Revegetation: N/A

Other: Population of Santa Susana tarplant (n= 20) near water pipe.

D. CHEMICAL SAMPLING POINTS:

Justification: Previous soils testing there detected TPHs.

NOTES:

Plant Species List

Common	Scientific
Chamise	*Adenostoma fasciculatum*
Prickly poppy	*Argemone munita*
Narrow-leaved milkweed	*Asclepias fascicularis*
Mulefat	*Baccharis salicifolia*
Black mustard	*Brassica nigra*
Canadian horseweed	*Conyza canadensis*
Santa Susana tarplant	*Hemizonia minthornii*
Telegraph weed	*Heterotheca grandiflora*
Prickly lettuce	*Lactuca serriola*
Deerweed	*Lotus scoparius*
Caterpillar phacelia	*Phacelia cicutaria var. cicutaria*

PHOTOS:

Photo 1. Overview of site facing southwest.

SWMU/AOC: Group 6- SRE **DATE:** July 19, 2006 **PERSONNEL:** Cy Fernandez/ Lina Ng

ASSESSMENT AREA NUMBER: 24- Transformer PCBs

Relates to Reference/Assessment/Surrogate Area (s) Number(s): REF 1

Photo: Overview of site facing southwest (see below).

EXISTING CONDITIONS:

A. PHYSICAL FEATURES

Rock outcroppings: Rock outcrops adjacent to the site on the north and south sides.

Soils: Sandy loam.

Ponds and Drainages: N/A

Slopes/Aspects: West facing slope.

Other:

B. VEGETATIVE FEATURES

Vegetation Community and Dominant Species: Non-native grassland, with a mix of revegetated species including mulefat. A population of Santa Susana tarplant (n=25) is present.

Species Diversity: 19 species.

Visual estimate of percent vegetative cover: 50% vegetation cover.

Plant Vigor: Plant stressors observed in the area were the senescence of annual species, drought stress (evident in several Canadian horseweed plants), and fire damage to perennial shrubs and trees (evident in post-fire crown sprouting by oaks and shrubs).

Non-native Plant Component: Annual grasses and forbs including *Bromus* spp., *Brassica nigra*, and *Centaurea melitensis* (see below)

Other:

C. ON SITE DISTURBANCE (Natural and Anthropogenic)

Soils:

Paved: Located adjacent to the road and parking lot.

Compacted: N/A

Topsoil Disturbance: N/A

Cut/fill: Graded.

Oily/encrusted/stained: N/A

Soil erosion/loss: N/A

Other:

Vegetation:

Clearing/mowing: N/A

Herbicides: N/A

Burning: Affected by Topanga fire of October 2005

Irrigation/hydrology: Santa Susanna tarplant population (n= 25) located around pipes.

Revegetation: N/A

Other:

D. CHEMICAL SAMPLING POINTS:

Justification: Previous soils testing detected PCBs

NOTES:

Plant Species List

Common	Scientific
Chamise	*Adenostoma fasciculatum*
California sagebrush	*Artemisia californica*
Wild oats	*Avena sp.*
Mulefat	*Baccharis salicifolia*
Bull thistle	*Cirsium vulgare*
Canadian horseweed	*Conyza canadensis*
Umbrella sedge	*Cyperus squarrosus*
Chalk dudleya	*Dudleya pulverulenta*
Turkey mullein	*Eremocarpus setigerus*
Thickleaf yerba santa	*Eriodictyon crassifolium*
California everlasting	*Gnaphalium californicum*
Santa Susana tarplant	*Hemizonia minthornii*
Telegraph weed	*Heterotheca grandiflora*
Spanish Lotus	*Lotus purshianus*
Foothill needlegrass	*Nassella lepida*
Rabbit foot grass	*Polypogon monspeliensis*
Coast live oak	*Quercus agrifolia*
Poison oak	*Toxicodendron diversilobum*
Chaparral yucca	*Yucca whipplei*

PHOTOS:

Photo 1. Overview of site facing southwest.

SWMU/AOC: Group 6- SRE **DATE:** July 19, 2006 **PERSONNEL:** Cy Fernandez/ Lina Ng

ASSESSMENT AREA NUMBER: 25- Transformers PCBs

Relates to Reference/Assessment/Surrogate Area (s) Number(s): REF 1

Photo: Overview of site facing southwest (see below).

EXISTING CONDITIONS:

A. PHYSICAL FEATURES

Rock outcroppings: The site partially occurs on a sandstone outcrop.

Soils: Sandy loam.

Ponds and Drainages: None

Slopes/Aspects: North facing slope.

Other:

B. VEGETATIVE FEATURES

Vegetation Community and Dominant Species: Non-native grassland adjacent to a parking lot.

Species Diversity: 10 species.

Visual estimate of percent vegetative cover: 55% vegetation cover at base of rocks, and 15% on top of rock outcrops.

Plant Vigor: Plant stressors observed in the area were the senescence of annual species, drought stress (evident in several Canadian horseweed plants), and fire damage to perennial shrubs and trees (evident in post-fire crown sprouting by oaks and shrubs).

Non-native Plant Component: Annual grasses and forbs including *Bromus* spp., *Brassica nigra*, and *Centaurea melitensis* (see below)

Other:

C. ON SITE DISTURBANCE (Natural and Anthropogenic)

Soils:

Paved: N/A

Compacted: N/A

Topsoil Disturbance: Pipes installed in the site.

Cut/fill: Graded.

Oily/encrusted/stained: N/A

Soil erosion/loss: N/A

Other: Light post on edge of the road adjacent to pipes.

Vegetation:

Clearing/mowing: N/A

Herbicides: N/A

Burning: Affected by Topanga fire of October 2005.

Irrigation/hydrology: Pipes for water valve down below on ground.

Revegetation: N/A

Other:

D. CHEMICAL SAMPLING POINTS:

Justification: Previous soils testing detected PCBs

NOTES:

Plant Species List

Common	Scientific
Mulefat	*Baccharis salicifolia*
Soft brome	*Bromus hordeaceus*
Tocalote	*Centaurea melitensis*
Bull thistle	*Cirsium vulgare*
Golden yarrow	*Eriophyllum confertiflorum*
Heart leaved penstemon	*Keckiella cordifolia*
Spanish Lotus	*Lotus purshianus*
Foothill needlegrass	*Nassella lepida*
Rabbit foot grass	*Polypogon monspeliensis*
Poison oak	*Toxicodendron diversilobum*

PHOTOS:

Photo 1. Overview of site facing southwest.

SWMU/AOC: Group 6, SRE **DATE:** July 19, 2006 **PERSONNEL:** Cy Fernandez/ Lina Ng

ASSESSMENT AREA NUMBER: 27- Transformer/ PCBs

Relates to Reference/Assessment/Surrogate Area (s) Number(s): REF 1

Photo: Overview of site facing northwest.

EXISTING CONDITIONS:

A. PHYSICAL FEATURES

Rock outcroppings: Rock outcrops surrounding the entire site.

Soils: Sandy loam.

Ponds and Drainages: N/A

Slopes/Aspects: Fairly flat.

Other:

B. VEGETATIVE FEATURES

Vegetation Community and Dominant Species: Non-native grassland – mulefat/grassland species revegetation.

Species Diversity: 9 species.

Visual estimate of percent vegetative cover: 85% vegetation cover

Plant Vigor: Plant stressors observed in the area were the senescence of annual species, drought stress (evident in several Canadian horseweed plants), and fire damage to perennial shrubs and trees (evident in post-fire crown sprouting by oaks and shrubs).

Non-native Plant Component: Annual grasses and forbs including *Bromus* spp., *Brassica nigra*, and *Centaurea melitensis* (see below).

Other:

C. ON SITE DISTURBANCE (Natural and Anthropogenic)

Soils:

Paved: N/A

Compacted: Surrounding dirt roads compacted due to vehicle traffic.

Topsoil Disturbance: N/A

Cut/fill: Graded.

Oily/encrusted/stained: N/A

Soil erosion/loss: N/A

Other:

Vegetation:

Clearing/mowing: N/A

Herbicides: N/A

Burning: Affected by Topanga fire of October 2005.

Irrigation/hydrology: Swales put up to divert water drainage.

Revegetation: Revegetated with mulefat/grassland species mix.

Other:

D. CHEMICAL SAMPLING POINTS:

Justification: Previous soils testing detected PCBs.

NOTES:

Species List

Common	Scientific
California sagebrush	*Artemisia californica*
Wild oats	*Avena* sp.
Mulefat	*Baccharis salicifolia*
Black mustard	*Brassica nigra*
Canadian horseweed	*Conyza canadensis*
Santa Susana tarplant	*Hemizonia minthornii*
Telegraph weed	*Heterotheca grandiflora*
Deerweed	*Lotus scoparius*
Foothill needlegrass	*Nassella lepida*

PHOTOS:

Photo 1. Overview of site facing northwest.

SWMU/AOC: Group 6- SRE **DATE:** July 19, 2006 **PERSONNEL:** Cy Fernandez/ Lina Ng

ASSESSMENT AREA NUMBER: 28- UST- TPH

Relates to Reference/Assessment/Surrogate Area (s) Number(s): REF 2

Photo: Overview of site facing north (see below).

EXISTING CONDITIONS:

A. PHYSICAL FEATURES

Rock outcroppings: Rock outcrops adjacent to the site on the north and south sides.

Soils: Sandy loam.

Ponds and Drainages: None

Slopes/Aspects: Flat.

Other:

B. VEGETATIVE FEATURES

Vegetation Community and Dominant Species: Non-native grassland adjacent to road containing revegetated species (mulefat/grassland). The site is adjacent to a road.

Species Diversity: 10 species.

Visual estimate of percent vegetative cover: 85% vegetation cover.

Plant Vigor: Plant stressors observed in the area were the senescence of annual species and fire damage to perennial shrubs and trees (evident in post-fire crown sprouting by oaks and shrubs).

Non-native Plant Component: Annual grasses and forbs including *Bromus* spp., *Brassica nigra*, and *Centaurea melitensis* (see below).

Other:

C. ON SITE DISTURBANCE (Natural and Anthropogenic)

Soils:

Paved: N/A

Compacted: Compacted near the side of the road.

Topsoil Disturbance: N/A

Cut/fill: Graded.

Oily/encrusted/stained: N/A

Soil erosion/loss: N/A

Other:

Vegetation:

Clearing/mowing: N/A

Herbicides: N/A

Burning: Affected by Topanga fire of October 2005.

Irrigation/hydrology: N/A

Revegetation: Revegetated with mulefat/grassland species mix.

Other:

D. CHEMICAL SAMPLING POINTS:

Justification: Previous soils testing there detected TPHs.

NOTES:

Plant Species List

Common	Scientific
Wild oats	*Avena sp.*
Coyote brush	*Baccharis pilularis*
Black mustard	*Brassica nigra*
Red brome	*Bromus madritensis ssp. rubens*
Tocalote	*Centaurea melitensis*
Bull thistle	*Cirsium vulgare*
Canadian horseweed	*Conyza canadensis*
Cryptantha	*Cryptantha sp.*
Common sunflower	*Helianthus annuus*
Telegraph weed	*Heterotheca grandiflora*
Foothill needlegrass	*Nassella lepida*

PHOTOS:

Photo 1. Overview of site facing north.

SWMU/AOC: Group 6- B064 **DATE:** July 18, 2006 **PERSONNEL:** Michael Tuma/ Lina Ng

ASSESSMENT AREA NUMBER: 29 - B064 Leachfield

Relates to Reference/Assessment/Surrogate Area (s) Number(s): REF 3

Photo: Overview of site facing northeast; dead California sagebrush affected by unknown stressor; healthy California sagebrush on the site (see below).

EXISTING CONDITIONS:

A. PHYSICAL FEATURES

Rock outcroppings: Large rock outcrops adjacent to the site on the north side. Smaller outcrop to the south.

Soils: Sandy loam.

Ponds and Drainages: Concrete-lined drainage ditch running in a northwest-southeast direction along the northern edge of the site.

Slopes/Aspects: Gentle east-facing slope.

Other:

B. VEGETATIVE FEATURES

Vegetation Community and Dominant Species: Area mainly characterized as a costal sage scrub community dominated by sawtooth goldenbush California sagebrush, and grassland species.

Species Diversity: 23 species.

Visual estimate of percent vegetative cover: 60% vegetation cover.

Plant Vigor: Plant stressors observed in the area were the senescence of annual species, drought stress (evident in several Canadian horseweed plants), fire damage to perennial shrubs and trees (evident in post-fire crown sprouting by oaks and shrubs), and an unidentified source that affected a California sagebrush plant.

Non-native Plant Component: Annual grasses and forbs including *Bromus* spp., *Brassica nigra*, and *Centaurea melitensis* (see below).

Other:

C. ON SITE DISTURBANCE (Natural and Anthropogenic)

Soils:

Paved: Concrete pavement located in the drain at base of large rock outcrop.

Compacted: N/A

Topsoil Disturbance: Burrowing rodent activity observed throughout the site.

Cut/fill: Graded.

Oily/encrusted/stained: N/A

Soil erosion/loss: N/A

Other: N/A

Vegetation:

Clearing/mowing: N/A

Herbicides: N/A

Burning: Affected by Topanga fire of October 2005.

Irrigation/hydrology: N/A

Revegetation: N/A

Other:

D. CHEMICAL SAMPLING POINTS:

Justification: This area is located southwest of NCY. It was used as a leach field; soil sampling was conducted there, but it is not known what CPECs were identified there.

NOTES:

PLANT SPECIES LIST

Common	Scientific
Wild oats	*Avena sp.*
Coyote brush	*Baccharis pilularis*
Black mustard	*Brassica nigra*
Soft brome	*Bromus hordeaceus*
Red brome	*Bromus madritensis ssp. rubens*
Tocalote	*Centaurea melitensis*
Canadian horseweed	*Conyza canadensis*
California buckwheat	*Eriogonum fasciculatum*
Golden yarrow	*Eriophyllum confertiflorum*
Sawtooth goldenbush	*Hazardia squarrosa*
Santa Susana tarplant (1)	*Hemizonia minthornii*
Telegraph weed	*Heterotheca grandiflora*
Common California aster	*Lessingia filaginifolia*
Spanish Lotus	*Lotus purshianus*
Deerweed	*Lotus scoparius*
Cliff desertdandelion	*Malacothrix saxatilis*
Sour clover	*Melilotus indica*
Foothill needlegrass	*Nassella lepida*
Caterpillar phacelia	*Phacelia cicutaria var. cicutaria*
Black sage	*Salvia mellifera*

Blue eyed grass	*Sisyrinchium bellum*
Prickly sow thistle	*Sonchus asper ssp. asper*
Winter vetch	*Vicia villosa*

PHOTOS:

Photo 1. Overview of site facing northeast.

Photo 2. Dead California sagebrush affected by unknown stressor.

Photo 4. Healthy California sagebrush on the site.

SWMU/AOC: Group 6, SRE **DATE:** July 19, 2006 **PERSONNEL:** Cy Fernandez/ Lina Ng

ASSESSMENT AREA NUMBER: 30 - Drainage dioxins

Relates to Reference/Assessment/Surrogate Area (s) Number(s): REF 6

Photos:

EXISTING CONDITIONS:

A. PHYSICAL FEATURES

Rock outcroppings: Rock outcrops adjacent to the site on the east and west side of drainage.

Soils: Sandy loam.

Ponds and Drainages: Entire area is within a seasonal drainage.

Slopes/Aspects: Gentle, north facing slope.

Other:

B. VEGETATIVE FEATURES

Vegetation Community and Dominant Species: Chaparral.

Species Diversity: 35 species.

Visual estimate of percent vegetative cover: 80% coverage overall, 20% near the end of base of rocks.

Plant Vigor: Plant stressors observed in the area were the senescence of annual species and fire damage to perennial shrubs and trees (evident in post-fire crown sprouting by oaks and shrubs).

Non-native Plant Component: Annual grasses and forbs including *Bromus* spp., *Brassica nigra*, and *Centaurea melitensis* (see below).

Other:

C. ON SITE DISTURBANCE (Natural and Anthropogenic)

Soils:

Paved: N/A

Compacted: N/A

Topsoil Disturbance: Signs of concrete debris, swales in place, steel drainage pipe running north and south through area.

Cut/fill: N/A

Oily/encrusted/stained: N/A

Soil erosion/loss: N/A

Other:

Vegetation:

Clearing/mowing: N/A

Herbicides: N/A

Burning: Affected by Topanga fire of October 2005.

Irrigation/hydrology: Sprinkler heads and pipes dispersed throughout site.

Revegetation: N/A

Other:

D. CHEMICAL SAMPLING POINTS:

Justification: Previous soils testing detected a variety of metals including Hg and Ag, SVOCs and VOCs.

NOTES:

Plant Species List

Common	Scientific
Chamise	*Adenostoma fasciculatum*
California sagebrush	*Artemisia californica*
Wild oats	*Avena sp.*
Black mustard	*Brassica nigra*
Ripgut brome	*Bromus diandrus*
Soft brome	*Bromus hordeaceus*
Red brome	*Bromus madritensis ssp. rubens*
Tocalote	*Centaurea melitensis*
Bull thistle	*Cirsium vulgare*
Canadian horseweed	*Conyza canadensis*
Cryptantha	*Cryptantha sp.*
Umbrella sedge	*Cyperus squarrosus*
Bleeding hearts	*Dicentra ochroleuca*
Thickleaf yerba santa	*Eriodictyon crassifolium*
California buckwheat	*Eriogonum fasciculatum*
Golden yarrow	*Eriophyllum confertiflorum*
Sawtooth goldenbush	*Hazardia squarrosa*
Bird's-foot trefoil	*Lotus corniculatus*
Spanish Lotus	*Lotus purshianus*
Deerweed	*Lotus scoparius*
Cliff desertdandelion	*Malacothrix saxatilis*
Laurel sumac	*Malosma laurina*
Horehound	*Marrubium vulgare*
Purple needlegrass	*Nasella pulchra*

Caterpillar phacelia	*Phacelia cicutaria var. cicutaria*
Distant phacelia	*Phacelia distans*
Rabbit foot grass	*Polypogon monspeliensis*
Coast live oak	*Quercus agrifolia*
White sage	*Salvia apiana*
Black sage	*Salvia mellifera*
Black nightshade	*Solanum nigrum*
Poison oak	*Toxicodendron diversilobum*
Canyon sunflower	*Venegasia carpesioides*
Chaparral yucca	*Yucca whipplei*
Fremont's Star Lily	*Zigadenus fremontii*

PHOTOS:

Photo 1. Overview of site facing northeast.

Reference Areas

SWMU/AOC: Group 6 **DATE:** July 27, 2006 **PERSONNEL:** Michael Tuma/ Lina Ng

REFERENCE AREA NUMBER: 1

Relates to Reference/Assessment/Surrogate Area (s) Number(s): 21, 27, 28

Photo: N/A

EXISTING CONDITIONS:

A. PHYSICAL FEATURES

Rock outcroppings: Located to the north and southwest of the site.

Soils: Sandy loam.

Ponds and Drainages: None.

Slopes/Aspects: Generally flat.

Other:

B. VEGETATIVE FEATURES

Vegetation Community and Dominant Species: Non-native grassland (mulefat/grassland revegetation).

Species Diversity: 13 species.

Visual estimate of percent vegetative cover: 75% overall vegetation.

Plant Vigor: Plant stressors observed in the area were the senescence of annual species and fire damage to perennial shrubs (evident in post-fire crown sprouting).

Non-native Plant Component: Many non-native species observed including annual grasses and forbs (see species list below).

Other:

C. ON SITE DISTURBANCE (Natural and Anthropogenic)

Soils:

Paved: N/A

Compacted: N/A

Topsoil Disturbance: N/A

Cut/fill: Graded

Oily/encrusted/stained: N/A

Soil erosion/loss: N/A

Other:

Vegetation:

Clearing/mowing: N/A

Herbicides: N/A

Irrigation/hydrology: Pipeline through site and manmade drainages throughout.

Revegetation: Revegetated with mixture of mulefat/grassland species.

Other:

D. CHEMICAL SAMPLING POINTS:

Justification: No constituents known for this area, therefore used as reference.

NOTES:

PLANT SPECIES LIST

Common	Scientific
California sagebrush	*Artemisia californica*
Coyote brush	*Baccharis pilularis*
Mulefat	*Baccharis salicifolia*
Black mustard	*Brassica nigra*
Rip-gut brome	*Bromus diandrus*
Soft brome	*Bromus hordeaceus*
Red brome	*Bromus madritensis ssp. rubens*
Canadian horseweed	*Conyza canadensis*
Santa Susana tarplant	*Hemizonia minthornii*
Telegraph weed	*Heterotheca grandiflora*
Common California aster	*Lessingia filaginifolia*
Sour clover	*Melilotus indica*
Foothill needlegrass	*Nassella lepida*

SWMU/AOC: Group 6 **DATE:** July 27, 2006 **PERSONNEL:** Michael Tuma/ Lina Ng

REFERENCE AREA NUMBER: 2

Relates to Reference/Assessment/Surrogate Area (s) Number(s): 23, 28

Photo: N/A

EXISTING CONDITIONS:

A. PHYSICAL FEATURES

Rock outcroppings: Located on eastern edge of site.

Soils: Sandy loam.

Ponds and Drainages: None.

Slopes/Aspects: Generally flat.

Other:

B. VEGETATIVE FEATURES

Vegetation Community and Dominant Species: Non-native grassland (mulefat/grassland revegetation).

Species Diversity: 12 species.

Visual estimate of percent vegetative cover: 50% overall vegetation cover, sparse (approximately 2%) coverage on roadside.

Plant Vigor: Plant stressors observed in the area were the senescence of annual species and fire damage to perennial shrubs (evident in post-fire crown sprouting).

Non-native Plant Component: Many non-native species observed including annual grasses and forbs (see species list below).

Other:

C. ON SITE DISTURBANCE (Natural and Anthropogenic)

Soils:

Paved: N/A

Compacted: N/A

Topsoil Disturbance: N/A

Cut/fill: Graded

Oily/encrusted/stained: N/A

Soil erosion/loss: N/A

Other: Soils compacted due to grading activity.

Vegetation:

Clearing/mowing: N/A

Herbicides: N/A

Burning: N/A

Irrigation/hydrology: N/A

Revegetation: Revegetated with mixture of mulefat/grassland species.

Other:

D. CHEMICAL SAMPLING POINTS:

Justification: No constituents known for this area, therefore used as reference.

NOTES:

Plant Species List

Common	Scientific
Coyote brush	*Baccharis pilularis*
Mulefat	*Baccharis salicifolia*
Black mustard	*Brassica nigra*
Soft brome	*Bromus hordeaceus*
Red brome	*Bromus madritensis ssp. rubens*
Tocalote	*Centaurea melitensis*
Canadian horseweed	*Conyza canadensis*
Telegraph weed	*Heterotheca grandiflora*
Prickly lettuce	*Lactuca serriola*
Cliff desertdandelion	*Malacothrix saxatilis*
Sour clover	*Melilotus indica*
Foothill needlegrass	*Nassella lepida*

SWMU/AOC: Group 6 **DATE:** July 27, 2006 **PERSONNEL:** Michael Tuma/ Lina Ng

REFERENCE AREA NUMBER: 3

Relates to Reference/Assessment/Surrogate Area (s) Number(s): 29

Photo: Overview of site facing west (see below).

EXISTING CONDITIONS:

A. PHYSICAL FEATURES

Rock outcroppings: Outcropping adjacent to site on north side.

Soils: Sandy/gravelly loam.

Ponds and Drainages: None.

Slopes/Aspects: Gently slope, facing south.

Other:

B. VEGETATIVE FEATURES

Vegetation Community and Dominant Species: Coastal scrub.

Species Diversity: 15 species.

Visual estimate of percent vegetative cover: 50% overall vegetation cover.

Plant Vigor: Plant stressors observed in the area were the senescence of annual species, drought stress (evident in several Canadian horseweed plants), and fire damage to perennial shrubs (evident in post-fire crown sprouting).

Non-native Plant Component: Many non-native species observed including annual grasses and forbs (see species list below).

Other:

C. ON SITE DISTURBANCE (Natural and Anthropogenic)

Soils:

Paved: N/A

Compacted: Very compacted with gravel inclusions.

Topsoil Disturbance: Burrowing rodent activity observed.

Cut/fill: Graded.

Oily/encrusted/stained: N/A

Soil erosion/loss: N/A

Other:

Vegetation:

Clearing/mowing: N/A

Herbicides: N/A

Burning: Affected by Topanga Fire of October 2005.

Irrigation/hydrology: N/A

Revegetation: N/A

Other: Santa Susana tarplant (n=1) observed at base of rock outcrop.

D. CHEMICAL SAMPLING POINTS:

Justification: No constituents known for this area, therefore used as reference.

NOTES:

PLANT SPECIES LIST

Common	**Scientific**
Hazardia Coastal Scrub	
California sagebrush	*Artemisia californica*
Black mustard	*Brassica nigra*
Red brome	*Bromus madritensis ssp. rubens*
Tocalote	*Centaurea melitensis*
Bull thistle	*Cirsium vulgare*
Canadian horseweed	*Conyza canadensis*
Sawtooth goldenbush	*Hazardia squarrosa*
Santa Susana tarplant	*Hemizonia minthornii*
Telegraph weed	*Heterotheca grandiflora*
Common California aster	*Lessingia filaginifolia*
Bird's-foot trefoil	*Lotus corniculatus*
Deerweed	*Lotus scoparius*
Sour clover	*Melilotus indica*
Caterpillar phacelia	*Phacelia cicutaria var. cicutaria*
Purple nightshade	*Solanum xanti*

Photo 1. Overview of site facing west.

SWMU/AOC: Group 6 **DATE:** July 27, 2006 **PERSONNEL:** Michael Tuma/ Lina Ng

REFERENCE AREA NUMBER: 4

Relates to Reference/Assessment/Surrogate Area (s) Number(s): 2, 3, 22

Photo: Overview of site facing north (see below).

EXISTING CONDITIONS:

A. PHYSICAL FEATURES

Rock outcroppings: Outcrops located throughout site.

Soils: Sandy loam.

Ponds and Drainages: None.

Slopes/Aspects: Slope faces north.

Other:

B. VEGETATIVE FEATURES

Vegetation Community and Dominant Species: Chaparral.

Species Diversity: 42 species.

Visual estimate of percent vegetative cover: 85% vegetation cover on the top of hill, 90% vegetation cover on the hillside.

Plant Vigor: Plant stressors observed in the area were the senescence of annual species and fire damage to perennial shrubs and trees (evident in post-fire crown sprouting by oaks and shrubs).

Non-native Plant Component: Many non-native species observed including annual grasses and forbs (see species list below).

Other:

C. ON SITE DISTURBANCE (Natural and Anthropogenic)

Soils:

Paved: N/A

Compacted: Areas compacted where debris is located.

Topsoil Disturbance: N/A

Cut/fill: N/A

Oily/encrusted/stained: N/A

Soil erosion/loss: N/A

Other: Scattered concrete and metal debris evident throughout the site.

Vegetation:

Clearing/mowing: N/A

Herbicides: N/A

Burning: Affected by Topanga Fire of October 2005.

Irrigation/hydrology: Sprinkler pipes and heads are located at the top of the hillside along a flat plateau overlooking site.

Revegetation: N/A

Other: N/A

D. CHEMICAL SAMPLING POINTS:

Justification: No constituents known for this area, therefore used as reference.

Plant Species List

Chaparral	
Chamise	*Adenostoma fasciculatum*
Coulter's snapdragon	*Antirrhinum coulterianum*
Kellog's snapdragon	*Antirrhinum kelloggii*
California sagebrush	*Artemisia californica*
Wild oats	*Avena sp.*
Black mustard	*Brassica nigra*
Red brome	*Bromus madritensis ssp. rubens*
Tocalote	*Centaurea melitensis*
Mountain mahogany	*Cercocarpus betuloides*
Cobwebby thistle	*Cirsium occidentale*
Canadian horseweed	*Conyza canadensis*
Bleeding heart	*Dicentra ochroleuca*
Thickleaf yerba santa	*Eriodictyon crassifolium*
Golden yarrow	*Eriophyllum confertiflorum*
Sawtooth goldenbush	*Hazardia squarrosa*
Toyon	*Heteromeles arbutifolia*
Telegraph weed	*Heterotheca grandiflora*
Prickly lettuce	*Lactuca serriola*
Common California aster	*Lessingia filaginifolia*
Giant wild rye	*Leymus cinereus*
California honeysuckle	*Lonicera hispidula*
Deerweed	*Lotus scoparius*
Chaparral bush mallow	*Malacothamnus fasciculatus*
Cliff desertdandelion	*Malacothrix saxatilis*
Laurel sumac	*Malosma laurina*
Wild cucumber	*Marah macrocarpus*
Horehound	*Marrubium vulgare*

Sticky monkeyflower	*Mimulus aurantiacus*
Scarlet bugler	*Penstemon centranthifolius*
Caterpillar phacelia	*Phacelia cicutaria var. cicutaria*
Smilo grass	*Piptatherum miliaceum*
Rabbit foot grass	*Polypogon monspeliensis*
Coast live oak	*Quercus agrifolia*
Sugarbush	*Rhus ovata*
Black sage	*Salvia mellifera*
Mexican elderberry	*Sambucus mexicana*
Indian pink	*Silene laciniata ssp. major*
Purple nightshade	*Solanum xanti*
Poison oak	*Toxicodendron diversilobum*
Canyon sunflower	*Venegasia carpesioides*
Chaparral yucca	*Yucca whipplei*
Fremont's Star Lily	*Zigadenus fremontii*

PHOTOS:

Photo 1. Overview of site facing north.

SWMU/AOC: Group 6 **DATE:** July 27, 2006 **PERSONNEL:** Michael Tuma/ Lina Ng

REFERENCE AREA NUMBER: 5

Relates to Reference/Assessment/Surrogate Area (s) Number(s): 18

Photo: Overview of site facing southeast (see below).

EXISTING CONDITIONS:

A. PHYSICAL FEATURES

Rock outcroppings: None.

Soils: Sandy loam.

Ponds and Drainages: None.

Slopes/Aspects: Slopes gently to the east.

Other:

B. VEGETATIVE FEATURES

Vegetation Community and Dominant Species: Non-native grassland.

Species Diversity: 17 species.

Visual estimate of percent vegetative cover: 100% overall vegetation cover in the area.

Plant Vigor: Plant stressors observed in the area were the senescence of annual species.

Non-native Plant Component: Many non-native species observed including annual grasses and forbs (see species list below).

Other:

C. ON SITE DISTURBANCE (Natural and Anthropogenic)

Soils:

Paved: N/A

Compacted: N/A

Topsoil Disturbance: N/A

Cut/fill: Graded?

Oily/encrusted/stained: N/A

Soil erosion/loss: N/A

Other:

Vegetation:

Clearing/mowing: N/A

Herbicides: N/A

Burning: Affected by Topanga Fire of October 2005.

Irrigation/hydrology: Pipe running along inside of area with manmade drainages throughout.

Revegetation: Unknown.

Other:

D. CHEMICAL SAMPLING POINTS:

Justification: No constituents known for this area, therefore used as reference.

NOTES:

PLANT SPECIES LIST

Common	Scientific
Narrow-leaved milkweed	*Asclepias fascicularis*
Wild oats	*Avena sp.*
Black mustard	*Brassica nigra*
Soft brome	*Bromus hordeaceus*
Red brome	*Bromus madritensis ssp. rubens*
Tocalote	*Centaurea melitensis*
Bull thistle	*Cirsium vulgare*
Telegraph weed	*Heterotheca grandiflora*
Prickly lettuce	*Lactuca serriola*
Common California aster	*Lessingia filaginifolia*
Spanish clover	*Lotus purshianus*
Cliff desertdandelion	*Malacothrix saxatilis*
Sour clover	*Melilotus indica*
Foothill needlegrass	*Nassella lepida*
Smilo grass	*Piptatherum miliaceum*
Curly dock	*Rumex crispus*
Winter vetch	*Vicia villosa*

Photo 1. Overview of site facing southeast.

SWMU/AOC: Group 6 **DATE:** July 27, 2006 **PERSONNEL:** Michael Tuma/ Lina Ng

REFERENCE AREA NUMBER: 6

Relates to Reference/Assessment/Surrogate Area (s) Number(s): 1, 30

Photo: Overview of site facing north (see below).

EXISTING CONDITIONS:

A. PHYSICAL FEATURES

Rock outcroppings: Outcrops located throughout site area.

Soils: Sandy loam.

Ponds and Drainages: Seasonal drainage through center of site.

Slopes/Aspects: North facing slope.

Other:

B. VEGETATIVE FEATURES

Vegetation Community and Dominant Species: Chaparral predominates, with oak woodland toward the lower reaches of the drain.

Species Diversity: 20 species.

Visual estimate of percent vegetative cover: 85-90% overall vegetation cover at the top of slope and 95% coverage on the hillside.

Plant Vigor: Plant stressors observed in the area were the senescence of annual species and fire damage to perennial shrubs and trees (evident in post-fire crown sprouting by oaks and shrubs).

Non-native Plant Component: Non-native annual grasses and forbs (see below).

Other:

C. ON SITE DISTURBANCE (Natural and Anthropogenic)

Soils:

Paved: N/A

Compacted: N/A

Topsoil Disturbance: N/A

Cut/fill: N/A

Oily/encrusted/stained: N/A

Soil erosion/loss: N/A

Other:

Vegetation:

Clearing/mowing: N/A

Herbicides: N/A

Burning: Affected by Topanga Fire of October 2005.

Irrigation/hydrology: N/A

Revegetation: N/A

Other:

D. CHEMICAL SAMPLING POINTS:

Justification: No constituents known for this area, therefore used as reference.

NOTES:

Plant Species List

Common	**Scientific**
Chaparral	
Chamise	*Adenostoma fasciculatum*
Black mustard	*Brassica nigra*
Red brome	*Bromus madritensis ssp. rubens*
Hoaryleaf ceanothus	*Ceanothus crassifolius*
Canadian horseweed	*Conyza canadensis*
Bleeding heart	*Dicentra ochroleuca*
Thickleaf yerba santa	*Eriodictyon crassifolium*
Golden yarrow	*Eriophyllum confertiflorum*
Prickly lettuce	*Lactuca serriola*
California honeysuckle	*Lonicera hispidula*
Chaparral bush mallow	*Malacothamnus fasciculatus*
Cliff desertdandelion	*Malacothrix saxatilis*
Sticky monkeyflower	*Mimulus aurantiacus*
Caterpillar phacelia	*Phacelia cicutaria var. cicutaria*
Smilo grass	*Piptatherum miliaceum*
Hollyleaf redberry	*Rhamnus ilicifolia*
Sugarbush	*Rhus ovata*
Black sage	*Salvia mellifera*
Purple nightshade	*Solanum xanti*

PHOTOS:

Photo 1. Overview of site facing north.

SWMU/AOC: Group 6 **DATE:** July 27, 2006 **PERSONNEL:** Michael Tuma/ Lina Ng

REFERENCE AREA NUMBER: 7

Relates to Reference/Assessment/Surrogate Area (s) Number(s): 4, 5

Photo: Overview of site facing west (see below).

EXISTING CONDITIONS:

A. PHYSICAL FEATURES

Rock outcroppings: Outcropping along southern border of site.

Soils: Sandy loam.

Ponds and Drainages: None.

Slopes/Aspects: Generally flat.

Other:

B. VEGETATIVE FEATURES

Vegetation Community and Dominant Species: Non-native grassland with scattered oaks and an area of transition to chaparral.

Species Diversity: 24 species.

Visual estimate of percent vegetative cover: 85-90% overall vegetation cover in the area.

Plant Vigor: Plant stressors observed in the area were the senescence of annual species and fire damage to perennial shrubs and trees.

Non-native Plant Component: Many non-native species observed including annual grasses and forbs (see species list below).

Other:

C. ON SITE DISTURBANCE (Natural and Anthropogenic)

Soils:

Paved: N/A

Compacted: N/A

Topsoil Disturbance: N/A

Cut/fill: N/A

Oily/encrusted/stained: N/A

Soil erosion/loss: N/A

Other:

Vegetation:

Clearing/mowing: N/A

Herbicides: N/A

Burning: Affected by Topanga Fire of October 2005.

Irrigation/hydrology: N/A

Revegetation: N/A

Other: Santa Susana tarplant located just offsite on rock outcrop along the southern border of the site.

D. CHEMICAL SAMPLING POINTS:

Justification: No constituents known for this area, therefore used as reference.

NOTES:

PLANT SPECIES LIST

Common	Scientific
Chamise	*Adenostoma fasciculatum*
Narrow-leaved milkweed	*Asclepias fascicularis*
Wild oats	*Avena sp.*
Coyote brush	*Baccharis pilularis*
Black mustard	*Brassica nigra*
Rip-gut brome	*Bromus diandrus*
Soft brome	*Bromus hordeaceus*
Red brome	*Bromus madritensis ssp. rubens*
Tocalote	*Centaurea melitensis*
Bull thistle	*Cirsium vulgare*
Canadian horseweed	*Conyza canadensis*
Turkey mullein	*Eremocarpus setigerus*
Telegraph weed	*Heterotheca grandiflora*
Prickly lettuce	*Lactuca serriola*
Common California aster	*Lessingia filaginifolia*
Bird's-foot trefoil	*Lotus corniculatus*
Cliff desertdandelion	*Malacothrix saxatilis*
Deer grass	*Muhlenbergia rigens*
Foothill needlegrass	*Nassella lepida*
Rabbit foot grass	*Polypogon monspeliensis*
Coast live oak	*Quercus agrifolia*
Purple nightshade	*Solanum xanti*
Vinegar weed	*Trichostema lanceolatum*

Winter vetch	*Vicia villosa*

PHOTOS:

Photo 1. Overview of site facing west.

SWMU/AOC: **DATE:** July 27, 2006 **PERSONNEL:** Michael Tuma/ Lina Ng

REFERENCE AREA NUMBER: 8

Relates to Reference/Assessment/Surrogate Area (s) Number(s): 17

Photo: Overview of site facing northwest (see below).

EXISTING CONDITIONS:

A. PHYSICAL FEATURES

Rock outcroppings: None.

Soils: Sandy loam.

Ponds and Drainages: None.

Slopes/Aspects: Gentle slope, facing south.

Other:

B. VEGETATIVE FEATURES

Vegetation Community and Dominant Species: Non-native grassland and coastal scrub.

Species Diversity: 20 species (14 non-native grassland, 13 coastal scrub).

Visual estimate of percent vegetative cover: 95% vegetation cover in the northeast area of coastal scrub, 85% in the area of non-native grassland, and 2% in the road area.

Plant Vigor: Plant stressors observed in the area were the senescence of annual species and fire damage to perennial shrubs (evident in post-fire crown sprouting).

Non-native Plant Component: Many non-native species observed including annual grasses and forbs (see species list below).

Other:

C. ON SITE DISTURBANCE (Natural and Anthropogenic)

Soils:

Paved: N/A

Compacted: Road running northwest/ southeast through middle of the site.

Topsoil Disturbance: Burrowing rodent activity observed throughout the site.

Cut/fill: N/A

Oily/encrusted/stained: N/A

Soil erosion/loss: N/A

Other: Pipes and drainages, fences and telephone poles and power lines running throughout site.

Vegetation:

Clearing/mowing: N/A

Herbicides: N/A

Burning: N/A

Irrigation/hydrology: Pipe running through area.

Revegetation: N/A

Other: Vegetation flattened and compacted due to human activity.

D. CHEMICAL SAMPLING POINTS:

Justification: No constituents known for this area, therefore used as reference.

Notes:

Plant Species List

Common	**Scientific**
Non-native Grassland	
California sagebrush	*Artemisia californica*
Coyote brush	*Baccharis pilularis*
Mulefat	*Baccharis salicifolia*
Black mustard	*Brassica nigra*
Rip-gut brome	*Bromus diandrus*
Soft brome	*Bromus hordeaceus*
Red brome	*Bromus madritensis ssp. rubens*
Canadian horseweed	*Conyza canadensis*
Telegraph weed	*Heterotheca grandiflora*
Common California aster	*Lessingia filaginifolia*
Deerweed	*Lotus scoparius*
Horehound	*Marrubium vulgare*
Sour clover	*Melilotus indica*
Foothill needlegrass	*Nassella lepida*
Coastal scrub	
Narrow-leaved milkweed	*Asclepias fascicularis*
Coyote brush	*Baccharis pilularis*
Black mustard	*Brassica nigra*
Red brome	*Bromus madritensis ssp. rubens*
Tocolate	*Centaurea melitensis*
Turkey mullein	*Eremocarpus setigerus*
Thickleaf yerba santa	*Eriodictyon crassifolium*

Common California aster	*Lessingia filaginifolia*
Deerweed	*Lotus scoparius*
Cliff desertdandelion	*Malacothrix saxatilis*
Sour clover	*Melilotus indica*
Sticky monkeyflower	*Mimulus aurantiacus*
Caterpillar phacelia	*Phacelia cicutaria var. cicutaria*

Photo 1. Overview of site facing northwest.

SWMU/AOC: Group 6 **DATE:** July 27, 2006 **PERSONNEL:** Michael Tuma/ Lina Ng

REFERENCE AREA NUMBER: 9

Relates to Reference/Assessment/Surrogate Area (s) Number(s): 9, 10

Photo: Overview of site facing east (see below).

EXISTING CONDITIONS:

A. PHYSICAL FEATURES

Rock outcroppings: Located along northern portion of the site.

Soils: Sandy loam.

Ponds and Drainages: None.

Slopes/Aspects: The area slopes gently to the southeast.

B. VEGETATIVE FEATURES

Vegetation Community and Dominant Species: Non-native grassland with scattered oaks and stands of yerba santa.

Species Diversity: 27 species.

Visual estimate of percent vegetative cover: 75% overall in the southern understory area dominated by nonnative grasses, approximately 90-95% vegetation coverage in the mixed oak woodland in the northern part of the site.

Plant Vigor: Plant stressors observed in the area were the senescence of annual species and fire damage to perennial shrubs and trees (evident in post-fire crown sprouting by oaks and shrubs).

Non-native Plant Component: Many non-native species observed including annual grasses and forbs (see species list below).

Other:

C. ON SITE DISTURBANCE (Natural and Anthropogenic)

Soils:

Paved: N/A

Compacted: N/A

Topsoil Disturbance: Burrowing rodent activity observed throughout the site.

Cut/fill: N/A

Oily/encrusted/stained: N/A

Soil erosion/loss: N/A

Other: N/A

Vegetation:

Clearing/mowing: N/A

Herbicides: N/A

Burning: Affected by Topanga Fire of October 2005.

Irrigation/hydrology: N/A

Revegetation: N/A

Other:

D. CHEMICAL SAMPLING POINTS:

Justification: No constituents known for this area, therefore used as reference.

NOTES:

Plant Species List

Common	Scientific
Wild oats	*Avena sp.*
Coyote brush	*Baccharis pilularis*
Mulefat	*Baccharis salicifolia*
Black mustard	*Brassica nigra*
Soft brome	*Bromus hordeaceus*
Red brome	*Bromus madritensis ssp. rubens*
Tocalote	*Centaurea melitensis*
Bull thistle	*Cirsium vulgare*
Canadian horseweed	*Conyza canadensis*
Turkey mullein	*Eremocarpus setigerus*
Thickleaf yerba santa	*Eriodictyon crassifolium*
Santa Susana tarplant	*Hemizonia minthornii*
Prickly lettuce	*Lactuca serriola*
Common California aster	*Lessingia filaginifolia*
Giant wild rye	*Leymus condensatus*
Bird's-foot trefoil	*Lotus corniculatus*
Cliff desertdandelion	*Malacothrix saxatilis*
Laurel sumac	*Malosma laurina*
Horehound	*Marrubium vulgare*
Sticky monkeyflower	*Mimulus aurantiacus*
Foothill needlegrass	*Nassella lepida*
Caterpillar phacelia	*Phacelia cicutaria var. cicutaria*
Coast live oak	*Quercus agrifolia*
Black nightshade	*Solanum americanum*
Purple nightshade	*Solanum xanti*
Poison oak	*Toxicodendron diversilobum*
Winter vetch	*Vicia villosa*

PHOTOS:

Photo 1. Overview of site facing east.

SWMU/AOC: Group 6 **DATE:** July 27, 2006 **PERSONNEL:** Michael Tuma/ Lina Ng

REFERENCE AREA NUMBER: 10

Relates to Reference/Assessment/Surrogate Area (s) Number(s): 12, 31

Photo: Overview of site facing north.

EXISTING CONDITIONS:

A. PHYSICAL FEATURES

Rock outcroppings: None.

Soils: Sandy loam.

Ponds and Drainages: Area consists of a seasonal drain.

Slopes/Aspects: Generally flat.

Other:

B. VEGETATIVE FEATURES

Vegetation Community and Dominant Species: Non-native grassland surrounded by open oak woodland.

Species Diversity: 30 species.

Visual estimate of percent vegetative cover: 90-95% overall vegetation cover in the area farther from the ditch, 55% on mowed areas closer to the sides of drain, 2-5% coverage in the drainage.

Plant Vigor: Plant stressors observed in the area were the senescence of annual species and fire damage to perennial shrubs and trees (evident in post-fire crown sprouting by oaks and shrubs).

Non-native Plant Component: Many non-native species observed including annual grasses and forbs (see species list below).

Other:

C. ON SITE DISTURBANCE (Natural and Anthropogenic)

Soils:

Paved: N/A

Compacted: N/A

Topsoil Disturbance: Burrowing rodent activity observed throughout the site.

Cut/fill: Areas scooped with mechanical equipment during soils sampling.

Oily/encrusted/stained: N/A

Soil erosion/loss: N/A

Other:

Vegetation:

Clearing/mowing: Vegetation mowed on the side of drainage.

Herbicides: N/A

Burning: Affected by Topanga Fire in October 2005.

Irrigation/hydrology: Area located within seasonal drainage.

Revegetation: N/A

Other:

D. CHEMICAL SAMPLING POINTS:

Justification: No constituents known for this area, therefore used as reference.

Plant Species List

Common	**Scientific**
Outside drain	
Prickly poppy	*Argemone munita*
Narrow-leaved milkweed	*Asclepias fascicularis*
Black mustard	*Brassica nigra*
Rip-gut brome	*Bromus diandrus*
Soft brome	*Bromus hordeaceus*
Tocalote	*Centaurea melitensis*
Rattlesnake weed	*Chamaesyce albomarginata*
Bull thistle	*Cirsium vulgare*
Canadian horseweed	*Conyza canadensis*
Turkey mullein	*Eremocarpus setigerus*
Thickleaf yerba santa	*Eriodictyon crassifolium*
Telegraph weed	*Heterotheca grandiflora*
Prickly lettuce	*Lactuca serriola*
Common California aster	*Lessingia filaginifolia*
Bird's-foot trefoil	*Lotus corniculatus*
Cliff desertdandelion	*Malacothrix saxatilis*
Horehound	*Marrubium vulgare*
Fountain grass	*Pennisetum setaceum*
Prickly sow thistle	*Sonchus asper ssp. asper*
Poison oak	*Toxicodendron diversilobum*
Winter vetch	*Vicia villosa*
Inside drain	
Narrow-leaved milkweed	*Asclepias fascicularis*
Mulefat	*Baccharis salicifolia*
Black mustard	*Brassica nigra*
Prickly lettuce	*Lactuca serriola*
Common California aster	*Lessingia filaginifolia*

Cliff desertdandelion	*Malacothrix saxatilis*
Horehound	*Marrubium vulgare*
Caterpillar phacelia	*Phacelia cicutaria var. cicutaria*
Coast live oak	*Quercus agrifolia*
Curly dock	*Rumex crispus*
Milk thistle	*Silybum marianum*
Poison oak	*Toxicodendron diversilobum*

PHOTOS:

Photo 1. Overview of site facing northwest.

SWMU/AOC: Group 6 **DATE:** July 27, 2006 **PERSONNEL:** Michael Tuma/ Lina Ng

REFERENCE AREA NUMBER: 11

Relates to Reference/Assessment/Surrogate Area (s) Number(s): 6, 7, 8, 11, 16

Photo: Overview of site facing east; drought-stressed Canadian horseweed (see below).

EXISTING CONDITIONS:

A. PHYSICAL FEATURES

Rock outcroppings: Located along eastern edge of site.

Soils: Sandy loam.

Ponds and Drainages: None.

Slopes/Aspects: None.

Other:

B. VEGETATIVE FEATURES

Vegetation Community and Dominant Species: Mulefat/ grassland species revegetation area.

Species Diversity: 24 species.

Visual estimate of percent vegetative cover: 75% overall vegetation cover in the center of area, sparse (approximately 2%) coverage on roadside and near paved areas.

Plant Vigor: Plant stressors observed in the area were the senescence of annual species and fire damage to perennial shrubs and trees (evident in post-fire crown sprouting by oaks and shrubs).

Non-native Plant Component: Many non-native species observed including annual grasses and forbs (see species list below).

Other:

C. ON SITE DISTURBANCE (Natural and Anthropogenic)

Soils:

Paved: N/A

Compacted: Areas compacted on the sides of the road due to heavy traffic.

Topsoil Disturbance: Burrowing rodent activity observed throughout the site.

Cut/fill: Graded.

Oily/encrusted/stained: N/A

Soil erosion/loss: N/A

Other:

Vegetation:

Clearing/mowing: Vegetation mowed and compacted on the side main road.

Herbicides: N/A

Burning: Affected by Topanga Fire in October 2005

Irrigation/hydrology: Pipeline running along northern end of the area.

Revegetation: Revegetated with ulefat/grassland species.

Other:

D. CHEMICAL SAMPLING POINTS:

Justification: No constituents known for this area, therefore used as reference.

Plant Species List

Common	**Scientific**
Mulefat and Grassland	
Pigweed amaranth	*Amaranthus albus*
Narrow-leaved milkweed	*Asclepias fascicularis*
Wild oats	*Avena sp.*
Coyote brush	*Baccharis pilularis*
Mulefat	*Baccharis salicifolia*
Black mustard	*Brassica nigra*
Soft brome	*Bromus hordeaceus*
Red brome	*Bromus madritensis ssp. rubens*
Rattlesnake weed	*Chamaesyce albomarginata*
Bull thistle	*Cirsium vulgare*
Canadian horseweed	*Conyza canadensis*
Telegraph weed	*Heterotheca grandiflora*
Common California aster	*Lessingia filaginifolia*
Spanish clover	*Lotus purshianus*
Cliff desertdandelion	*Malacothrix saxatilis*
Horehound	*Marrubium vulgare*
Sour clover	*Melilotus indica*
Caterpillar phacelia	*Phacelia cicutaria var. cicutaria*
Smilo grass	*Piptatherum miliaceum*
Rabbit foot grass	*Polypogon monspeliensis*
Coast live oak	*Quercus agrifolia*
Curly dock	*Rumex crispus*
Milk thistle	*Silybum marianum*
Winter vetch	*Vicia villosa*

PHOTOS:

Photo 1. Overview of site facing east.

Photo 2. Drought-stressed Canadian horseweed.

C6.2 VEGETATION MAP FOR GROUP 6 REPORT AREA

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Base Map Legend

- Administrative Boundary
- SSFL Property Boundary
- RFI Sites
- A/C Curbing
- Dirt Road
- Drainage
- Elevation Contour

Legend

- HM Santa Susana Mountain Tarplant
- Chaparral
- Coastal Live Oak Riparian Forest
- Venturan Coastal Sage Scrub
- Non-Native Grassland
- Coastal Live Oak Woodland

Survey conducted on July 18, 19 and 27, 2006.

Date: Sep 26, 2006 (MKJ)

Document: SSFL/Grp 6 Report_Veg Figure.mxd

1 inch equals 300 feet

0 300 600 Feet

SANTA SUSANA FIELD LABORATORY

Vegetation Map for Group 6 Report Area

MWH

APPENDIX C6.2

APPENDIX C7

EXTRAPOLATED DATA FOR RISK ASSESSMENT
(ELECTRONIC COPY)

Table C7-1
Extrapolated Data
New Conservation Yard RFI Site
(Page 1 of 3)

EPA_NO	SAMPLE_ID	LAB_METHOD	ANALYTE	STD_ANALYT	CONCENTRAT	UNITS	REV_QUAL	Q_CODE	D_LIMIT	MATRIX	DATE_SAMP	DEPTH	SAMPLE_TYP	UNIT
RJ011	NCSS03S01	EXTRAPOLATED	Total Tetra	Total Tetra	2.55E-06	mg/kg				S	6/29/2000	0.00000	EXTRAPOLATED	SWMU 7.8 - New Conservation Yard
RJ011	NCSS03S01	EXTRAPOLATED	Total Penta	Total Penta	4.43E-06	mg/kg				S	6/29/2000	0.00000	EXTRAPOLATED	SWMU 7.8 - New Conservation Yard
RJ011	NCSS03S01	EXTRAPOLATED	Total Hexa	Total Hexa	3.66E-05	mg/kg				S	6/29/2000	0.00000	EXTRAPOLATED	SWMU 7.8 - New Conservation Yard
RJ011	NCSS03S01	EXTRAPOLATED	Total Hepta	Total Hepta	3.85E-04	mg/kg				S	6/29/2000	0.00000	EXTRAPOLATED	SWMU 7.8 - New Conservation Yard
RJ011	NCSS03S01	EXTRAPOLATED	Total Octa	Total Octa	4.02E-03	mg/kg				S	6/29/2000	0.00000	EXTRAPOLATED	SWMU 7.8 - New Conservation Yard
RJ012	NCSS04S01	EXTRAPOLATED	Total Tetra	Total Tetra	6.25E-07	mg/kg				S	6/29/2000	0.00000	EXTRAPOLATED	SWMU 7.8 - New Conservation Yard
RJ012	NCSS04S01	EXTRAPOLATED	Total Penta	Total Penta	9.40E-07	mg/kg				S	6/29/2000	0.00000	EXTRAPOLATED	SWMU 7.8 - New Conservation Yard
RJ012	NCSS04S01	EXTRAPOLATED	Total Hexa	Total Hexa	3.37E-06	mg/kg				S	6/29/2000	0.00000	EXTRAPOLATED	SWMU 7.8 - New Conservation Yard
RJ012	NCSS04S01	EXTRAPOLATED	Total Hepta	Total Hepta	2.55E-05	mg/kg				S	6/29/2000	0.00000	EXTRAPOLATED	SWMU 7.8 - New Conservation Yard
RJ012	NCSS04S01	EXTRAPOLATED	Total Octa	Total Octa	2.50E-04	mg/kg				S	6/29/2000	0.00000	EXTRAPOLATED	SWMU 7.8 - New Conservation Yard
RJ014	NCBS11S01	EXTRAPOLATED	Total Tetra	Total Tetra	1.07E-05	mg/kg				S	6/29/2000	0.50000	EXTRAPOLATED	SWMU 7.8 - New Conservation Yard
RJ014	NCBS11S01	EXTRAPOLATED	Total Penta	Total Penta	3.05E-05	mg/kg				S	6/29/2000	0.50000	EXTRAPOLATED	SWMU 7.8 - New Conservation Yard
RJ014	NCBS11S01	EXTRAPOLATED	Total Hexa	Total Hexa	7.91E-05	mg/kg				S	6/29/2000	0.50000	EXTRAPOLATED	SWMU 7.8 - New Conservation Yard
RJ014	NCBS11S01	EXTRAPOLATED	Total Hepta	Total Hepta	7.20E-04	mg/kg				S	6/29/2000	0.50000	EXTRAPOLATED	SWMU 7.8 - New Conservation Yard
RJ014	NCBS11S01	EXTRAPOLATED	Total Octa	Total Octa	7.17E-03	mg/kg				S	6/29/2000	0.50000	EXTRAPOLATED	SWMU 7.8 - New Conservation Yard
RS888	NCSS01S02	EXTRAPOLATED	Total Tetra	Total Tetra	1.05E-05	mg/kg				S	9/22/1999	0.00000	EXTRAPOLATED	SWMU 7.8 - New Conservation Yard
RS888	NCSS01S02	EXTRAPOLATED	Total Penta	Total Penta	3.24E-05	mg/kg				S	9/22/1999	0.00000	EXTRAPOLATED	SWMU 7.8 - New Conservation Yard
RS888	NCSS01S02	EXTRAPOLATED	Total Hexa	Total Hexa	1.90E-04	mg/kg				S	9/22/1999	0.00000	EXTRAPOLATED	SWMU 7.8 - New Conservation Yard
RS888	NCSS01S02	EXTRAPOLATED	Total Hepta	Total Hepta	3.64E-03	mg/kg				S	9/22/1999	0.00000	EXTRAPOLATED	SWMU 7.8 - New Conservation Yard
RS888	NCSS01S02	EXTRAPOLATED	Total Octa	Total Octa	4.08E-02	mg/kg				S	9/22/1999	0.00000	EXTRAPOLATED	SWMU 7.8 - New Conservation Yard
MJ610	NCBS07S01	EXTRAPOLATED	Total Tetra	Total Tetra	2.51E-07	mg/kg				S	2/13/2006	5.00000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ610	NCBS07S01	EXTRAPOLATED	Total Penta	Total Penta	4.18E-07	mg/kg				S	2/13/2006	5.00000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ610	NCBS07S01	EXTRAPOLATED	Total Hexa	Total Hexa	1.55E-06	mg/kg				S	2/13/2006	5.00000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ610	NCBS07S01	EXTRAPOLATED	Total Hepta	Total Hepta	1.20E-05	mg/kg				S	2/13/2006	5.00000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ610	NCBS07S01	EXTRAPOLATED	Total Octa	Total Octa	1.53E-04	mg/kg				S	2/13/2006	5.00000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ618	NCBS10S01	extrapolated	Total Tetra	Total Tetra	1.61E-06	mg/kg				S	2/14/2006	0.50000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ618	NCBS10S01	extrapolated	Total Penta	Total Penta	2.76E-06	mg/kg				S	2/14/2006	0.50000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ618	NCBS10S01	extrapolated	Total Hexa	Total Hexa	1.22E-05	mg/kg				S	2/14/2006	0.50000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ618	NCBS10S01	extrapolated	Total Hepta	Total Hepta	1.42E-04	mg/kg				S	2/14/2006	0.50000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ618	NCBS10S01	extrapolated	Total Octa	Total Octa	1.56E-03	mg/kg				S	2/14/2006	0.50000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ617	NCBS12S01	EXTRAPOLATED	Total Tetra	Total Tetra	2.41E-07	mg/kg				S	2/14/2006	0.50000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ617	NCBS12S01	EXTRAPOLATED	Total Penta	Total Penta	1.10E-06	mg/kg				S	2/14/2006	0.50000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ617	NCBS12S01	EXTRAPOLATED	Total Hexa	Total Hexa	6.98E-06	mg/kg				S	2/14/2006	0.50000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ617	NCBS12S01	EXTRAPOLATED	Total Hepta	Total Hepta	8.12E-05	mg/kg				S	2/14/2006	0.50000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ617	NCBS12S01	EXTRAPOLATED	Total Octa	Total Octa	1.04E-03	mg/kg				S	2/14/2006	0.50000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ775	NCBS18S01	EXTRAPOLATED	Total Tetra	Total Tetra	4.48E-05	mg/kg				S	4/10/2006	0.50000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ775	NCBS18S01	EXTRAPOLATED	Total Penta	Total Penta	1.30E-04	mg/kg				S	4/10/2006	0.50000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ775	NCBS18S01	EXTRAPOLATED	Total Hexa	Total Hexa	1.93E-03	mg/kg				S	4/10/2006	0.50000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ775	NCBS18S01	EXTRAPOLATED	Total Hepta	Total Hepta	2.92E-02	mg/kg				S	4/10/2006	0.50000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ775	NCBS18S01	EXTRAPOLATED	Total Octa	Total Octa	2.82E-01	mg/kg				S	4/10/2006	0.50000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ775	NCBS18S01	EXTRAPOLATED	PCB-105	PCB-105	1.18E-05	mg/kg				S	4/10/2006	0.50000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ775	NCBS18S01	EXTRAPOLATED	PCB-114	PCB-114	4.31E-07	mg/kg				S	4/10/2006	0.50000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ775	NCBS18S01	EXTRAPOLATED	PCB-118	PCB-118	2.55E-05	mg/kg				S	4/10/2006	0.50000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ775	NCBS18S01	EXTRAPOLATED	PCB-123	PCB-123	2.84E-07	mg/kg				S	4/10/2006	0.50000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ775	NCBS18S01	EXTRAPOLATED	PCB-126	PCB-126	7.15E-07	mg/kg				S	4/10/2006	0.50000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ775	NCBS18S01	EXTRAPOLATED	PCB-156	PCB-156	5.97E-06	mg/kg				S	4/10/2006	0.50000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ775	NCBS18S01	EXTRAPOLATED	PCB-157	PCB-157	2.33E-06	mg/kg				S	4/10/2006	0.50000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ775	NCBS18S01	EXTRAPOLATED	PCB-167	PCB-167	4.06E-06	mg/kg				S	4/10/2006	0.50000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ775	NCBS18S01	EXTRAPOLATED	PCB-169	PCB-169	6.05E-08	mg/kg				S	4/10/2006	0.50000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ775	NCBS18S01	EXTRAPOLATED	PCB-189	PCB-189	6.05E-07	mg/kg				S	4/10/2006	0.50000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ775	NCBS18S01	EXTRAPOLATED	PCB-77	PCB-77	1.47E-06	mg/kg				S	4/10/2006	0.50000	Primary Sample	SWMU 7.8 - New Conservation Yard

Table C7-1
Extrapolated Data
New Conservation Yard RFI Site
(Page 2 of 3)

EPA_NO	SAMPLE_ID	LAB_METHOD	ANALYTE	STD_ANALYT	CONCENTRAT	UNITS	REV_QUAL	Q_CODE	D_LIMIT	MATRIX	DATE_SAMP	DEPTH	SAMPLE_TYP	UNIT
MJ775	NCBS18S01	EXTRAPOLATED	PCB-81	PCB-81	2.84E-07	mg/kg				S	4/10/2006	0.50000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ724	NCBS19S01	EXTRAPOLATED	Total Tetra	Total Tetra	1.49E-05	mg/kg				S	4/10/2006	0.50000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ724	NCBS19S01	EXTRAPOLATED	Total Penta	Total Penta	8.00E-05	mg/kg				S	4/10/2006	0.50000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ724	NCBS19S01	EXTRAPOLATED	Total Hexa	Total Hexa	1.20E-03	mg/kg				S	4/10/2006	0.50000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ724	NCBS19S01	EXTRAPOLATED	Total Hepta	Total Hepta	1.38E-02	mg/kg				S	4/10/2006	0.50000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ724	NCBS19S01	EXTRAPOLATED	Total Octa	Total Octa	1.28E-01	mg/kg				S	4/10/2006	0.50000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ724	NCBS19S01	EXTRAPOLATED	PCB-105	PCB-105	1.24E-05	mg/kg				S	4/10/2006	0.50000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ724	NCBS19S01	EXTRAPOLATED	PCB-114	PCB-114	4.54E-07	mg/kg				S	4/10/2006	0.50000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ724	NCBS19S01	EXTRAPOLATED	PCB-118	PCB-118	2.68E-05	mg/kg				S	4/10/2006	0.50000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ724	NCBS19S01	EXTRAPOLATED	PCB-123	PCB-123	2.99E-07	mg/kg				S	4/10/2006	0.50000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ724	NCBS19S01	EXTRAPOLATED	PCB-126	PCB-126	7.53E-07	mg/kg				S	4/10/2006	0.50000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ724	NCBS19S01	EXTRAPOLATED	PCB-156	PCB-156	6.29E-06	mg/kg				S	4/10/2006	0.50000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ724	NCBS19S01	EXTRAPOLATED	PCB-157	PCB-157	2.45E-06	mg/kg				S	4/10/2006	0.50000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ724	NCBS19S01	EXTRAPOLATED	PCB-167	PCB-167	4.27E-06	mg/kg				S	4/10/2006	0.50000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ724	NCBS19S01	EXTRAPOLATED	PCB-169	PCB-169	6.36E-08	mg/kg				S	4/10/2006	0.50000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ724	NCBS19S01	EXTRAPOLATED	PCB-189	PCB-189	6.36E-07	mg/kg				S	4/10/2006	0.50000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ724	NCBS19S01	EXTRAPOLATED	PCB-77	PCB-77	1.55E-06	mg/kg				S	4/10/2006	0.50000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ724	NCBS19S01	EXTRAPOLATED	PCB-81	PCB-81	2.99E-07	mg/kg				S	4/10/2006	0.50000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ727	NCBS19S02	EXTRAPOLATED	Total Tetra	Total Tetra	2.17E-07	mg/kg				S	4/10/2006	2.50000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ727	NCBS19S02	EXTRAPOLATED	Total Penta	Total Penta	2.47E-06	mg/kg				S	4/10/2006	2.50000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ727	NCBS19S02	EXTRAPOLATED	Total Hexa	Total Hexa	4.99E-05	mg/kg				S	4/10/2006	2.50000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ727	NCBS19S02	EXTRAPOLATED	Total Hepta	Total Hepta	7.60E-04	mg/kg				S	4/10/2006	2.50000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ727	NCBS19S02	EXTRAPOLATED	Total Octa	Total Octa	6.67E-03	mg/kg				S	4/10/2006	2.50000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ725	NCBS20S01	EXTRAPOLATED	Total Tetra	Total Tetra	5.06E-07	mg/kg				S	4/10/2006	0.50000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ725	NCBS20S01	EXTRAPOLATED	Total Penta	Total Penta	1.04E-06	mg/kg				S	4/10/2006	0.50000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ725	NCBS20S01	EXTRAPOLATED	Total Hexa	Total Hexa	1.71E-05	mg/kg				S	4/10/2006	0.50000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ725	NCBS20S01	EXTRAPOLATED	Total Hepta	Total Hepta	2.32E-04	mg/kg				S	4/10/2006	0.50000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ725	NCBS20S01	EXTRAPOLATED	Total Octa	Total Octa	2.38E-03	mg/kg				S	4/10/2006	0.50000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ726	NCBS21S01	EXTRAPOLATED	Total Tetra	Total Tetra	3.00E-05	mg/kg				S	4/10/2006	0.50000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ726	NCBS21S01	EXTRAPOLATED	Total Penta	Total Penta	1.20E-04	mg/kg				S	4/10/2006	0.50000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ726	NCBS21S01	EXTRAPOLATED	Total Hexa	Total Hexa	2.24E-03	mg/kg				S	4/10/2006	0.50000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ726	NCBS21S01	EXTRAPOLATED	Total Hepta	Total Hepta	2.83E-02	mg/kg				S	4/10/2006	0.50000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ726	NCBS21S01	EXTRAPOLATED	Total Octa	Total Octa	3.10E-01	mg/kg				S	4/10/2006	0.50000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ729	NCBS22S01	EXTRAPOLATED	Total Tetra	Total Tetra	1.10E-05	mg/kg				S	4/10/2006	0.50000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ729	NCBS22S01	EXTRAPOLATED	Total Penta	Total Penta	1.53E-05	mg/kg				S	4/10/2006	0.50000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ729	NCBS22S01	EXTRAPOLATED	Total Hexa	Total Hexa	3.23E-04	mg/kg				S	4/10/2006	0.50000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ729	NCBS22S01	EXTRAPOLATED	Total Hepta	Total Hepta	5.10E-03	mg/kg				S	4/10/2006	0.50000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ729	NCBS22S01	EXTRAPOLATED	Total Octa	Total Octa	5.42E-02	mg/kg				S	4/10/2006	0.50000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ730	NCBS23S01	EXTRAPOLATED	Total Tetra	Total Tetra	9.56E-07	mg/kg				S	4/10/2006	0.50000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ730	NCBS23S01	EXTRAPOLATED	Total Penta	Total Penta	3.60E-06	mg/kg				S	4/10/2006	0.50000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ730	NCBS23S01	EXTRAPOLATED	Total Hexa	Total Hexa	6.74E-05	mg/kg				S	4/10/2006	0.50000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ730	NCBS23S01	EXTRAPOLATED	Total Hepta	Total Hepta	1.07E-03	mg/kg				S	4/10/2006	0.50000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ730	NCBS23S01	EXTRAPOLATED	Total Octa	Total Octa	1.10E-02	mg/kg				S	4/10/2006	0.50000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ732	NCBS24S01	EXTRAPOLATED	Total Tetra	Total Tetra	6.31E-07	mg/kg				S	4/10/2006	0.50000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ732	NCBS24S01	EXTRAPOLATED	Total Penta	Total Penta	1.86E-06	mg/kg				S	4/10/2006	0.50000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ732	NCBS24S01	EXTRAPOLATED	Total Hexa	Total Hexa	2.91E-05	mg/kg				S	4/10/2006	0.50000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ732	NCBS24S01	EXTRAPOLATED	Total Hepta	Total Hepta	4.54E-04	mg/kg				S	4/10/2006	0.50000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ732	NCBS24S01	EXTRAPOLATED	Total Octa	Total Octa	4.72E-03	mg/kg				S	4/10/2006	0.50000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ620	NCSS06S01	EXTRAPOLATED	Total Tetra	Total Tetra	3.86E-06	mg/kg				S	2/14/2006	0.50000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ620	NCSS06S01	EXTRAPOLATED	Total Penta	Total Penta	1.42E-05	mg/kg				S	2/14/2006	0.50000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ620	NCSS06S01	EXTRAPOLATED	Total Hexa	Total Hexa	1.82E-04	mg/kg				S	2/14/2006	0.50000	Primary Sample	SWMU 7.8 - New Conservation Yard

Table C7-1
Extrapolated Data
New Conservation Yard RFI Site
(Page 3 of 3)

EPA_NO	SAMPLE_ID	LAB_METHOD	ANALYTE	STD_ANALYT	CONCENTRAT	UNITS	REV_QUAL	Q_CODE	D_LIMIT	MATRIX	DATE_SAMP	DEPTH	SAMPLE_TYP	UNIT
MJ620	NCSS06S01	EXTRAPOLATED	Total Hepta	Total Hepta	2.21E-03	mg/kg				S	2/14/2006	0.50000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ620	NCSS06S01	EXTRAPOLATED	Total Octa	Total Octa	2.09E-02	mg/kg				S	2/14/2006	0.50000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ734	NCSS06S01	EXTRAPOLATED	PCB-105	PCB-105	1.30E-05	mg/kg				S	4/10/2006	0.00000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ734	NCSS06S01	EXTRAPOLATED	PCB-114	PCB-114	4.76E-07	mg/kg				S	4/10/2006	0.00000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ734	NCSS06S01	EXTRAPOLATED	PCB-118	PCB-118	2.81E-05	mg/kg				S	4/10/2006	0.00000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ734	NCSS06S01	EXTRAPOLATED	PCB-123	PCB-123	3.14E-07	mg/kg				S	4/10/2006	0.00000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ734	NCSS06S01	EXTRAPOLATED	PCB-126	PCB-126	7.90E-07	mg/kg				S	4/10/2006	0.00000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ734	NCSS06S01	EXTRAPOLATED	PCB-156	PCB-156	6.60E-06	mg/kg				S	4/10/2006	0.00000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ734	NCSS06S01	EXTRAPOLATED	PCB-157	PCB-157	2.58E-06	mg/kg				S	4/10/2006	0.00000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ734	NCSS06S01	EXTRAPOLATED	PCB-167	PCB-167	4.49E-06	mg/kg				S	4/10/2006	0.00000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ734	NCSS06S01	EXTRAPOLATED	PCB-169	PCB-169	6.68E-08	mg/kg				S	4/10/2006	0.00000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ734	NCSS06S01	EXTRAPOLATED	PCB-189	PCB-189	6.68E-07	mg/kg				S	4/10/2006	0.00000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ734	NCSS06S01	EXTRAPOLATED	PCB-77	PCB-77	1.62E-06	mg/kg				S	4/10/2006	0.00000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ734	NCSS06S01	EXTRAPOLATED	PCB-81	PCB-81	3.14E-07	mg/kg				S	4/10/2006	0.00000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ619	NCSS07S01	EXTRAPOLATED	Total Tetra	Total Tetra	5.12E-06	mg/kg				S	2/14/2006	0.50000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ619	NCSS07S01	EXTRAPOLATED	Total Penta	Total Penta	1.58E-05	mg/kg				S	2/14/2006	0.50000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ619	NCSS07S01	EXTRAPOLATED	Total Hexa	Total Hexa	2.03E-04	mg/kg				S	2/14/2006	0.50000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ619	NCSS07S01	EXTRAPOLATED	Total Hepta	Total Hepta	2.84E-03	mg/kg				S	2/14/2006	0.50000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ619	NCSS07S01	EXTRAPOLATED	Total Octa	Total Octa	2.90E-02	mg/kg				S	2/14/2006	0.50000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ619	NCSS07S01	EXTRAPOLATED	PCB-105	PCB-105	2.60E-05	mg/kg				S	2/14/2006	0.50000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ619	NCSS07S01	EXTRAPOLATED	PCB-114	PCB-114	9.53E-07	mg/kg				S	2/14/2006	0.50000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ619	NCSS07S01	EXTRAPOLATED	PCB-118	PCB-118	5.63E-05	mg/kg				S	2/14/2006	0.50000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ619	NCSS07S01	EXTRAPOLATED	PCB-123	PCB-123	6.28E-07	mg/kg				S	2/14/2006	0.50000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ619	NCSS07S01	EXTRAPOLATED	PCB-126	PCB-126	1.58E-06	mg/kg				S	2/14/2006	0.50000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ619	NCSS07S01	EXTRAPOLATED	PCB-156	PCB-156	1.32E-05	mg/kg				S	2/14/2006	0.50000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ619	NCSS07S01	EXTRAPOLATED	PCB-157	PCB-157	2.60E-06	mg/kg				S	2/14/2006	0.50000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ619	NCSS07S01	EXTRAPOLATED	PCB-167	PCB-167	4.33E-06	mg/kg				S	2/14/2006	0.50000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ619	NCSS07S01	EXTRAPOLATED	PCB-169	PCB-169	7.69E-08	mg/kg				S	2/14/2006	0.50000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ619	NCSS07S01	EXTRAPOLATED	PCB-189	PCB-189	6.28E-07	mg/kg				S	2/14/2006	0.50000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ619	NCSS07S01	EXTRAPOLATED	PCB-77	PCB-77	3.25E-06	mg/kg				S	2/14/2006	0.50000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ619	NCSS07S01	EXTRAPOLATED	PCB-81	PCB-81	6.28E-07	mg/kg				S	2/14/2006	0.50000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ728	NCSS07S01	EXTRAPOLATED	PCB-105	PCB-105	1.42E-05	mg/kg				S	4/10/2006	0.00000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ728	NCSS07S01	EXTRAPOLATED	PCB-114	PCB-114	5.22E-07	mg/kg				S	4/10/2006	0.00000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ728	NCSS07S01	EXTRAPOLATED	PCB-118	PCB-118	3.08E-05	mg/kg				S	4/10/2006	0.00000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ728	NCSS07S01	EXTRAPOLATED	PCB-123	PCB-123	3.44E-07	mg/kg				S	4/10/2006	0.00000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ728	NCSS07S01	EXTRAPOLATED	PCB-126	PCB-126	8.65E-07	mg/kg				S	4/10/2006	0.00000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ728	NCSS07S01	EXTRAPOLATED	PCB-156	PCB-156	7.23E-06	mg/kg				S	4/10/2006	0.00000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ728	NCSS07S01	EXTRAPOLATED	PCB-157	PCB-157	2.82E-06	mg/kg				S	4/10/2006	0.00000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ728	NCSS07S01	EXTRAPOLATED	PCB-167	PCB-167	4.91E-06	mg/kg				S	4/10/2006	0.00000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ728	NCSS07S01	EXTRAPOLATED	PCB-169	PCB-169	7.32E-08	mg/kg				S	4/10/2006	0.00000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ728	NCSS07S01	EXTRAPOLATED	PCB-189	PCB-189	7.32E-07	mg/kg				S	4/10/2006	0.00000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ728	NCSS07S01	EXTRAPOLATED	PCB-77	PCB-77	1.78E-06	mg/kg				S	4/10/2006	0.00000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ728	NCSS07S01	EXTRAPOLATED	PCB-81	PCB-81	3.44E-07	mg/kg				S	4/10/2006	0.00000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ621	NCSS08S01	EXTRAPOLATED	Total Tetra	Total Tetra	1.53E-06	mg/kg				S	2/14/2006	0.50000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ621	NCSS08S01	EXTRAPOLATED	Total Penta	Total Penta	3.94E-06	mg/kg				S	2/14/2006	0.50000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ621	NCSS08S01	EXTRAPOLATED	Total Hexa	Total Hexa	5.69E-05	mg/kg				S	2/14/2006	0.50000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ621	NCSS08S01	EXTRAPOLATED	Total Hepta	Total Hepta	5.50E-04	mg/kg				S	2/14/2006	0.50000	Primary Sample	SWMU 7.8 - New Conservation Yard
MJ621	NCSS08S01	EXTRAPOLATED	Total Octa	Total Octa	5.39E-03	mg/kg				S	2/14/2006	0.50000	Primary Sample	SWMU 7.8 - New Conservation Yard

Table C7-2
Extrapolated Data
Old Conservation Yard RFI Site

EPA_NO	SAMPLE_ID	LAB_METHOD	ANALYTE	STD_ANALYT	CONCENTRAT	UNITS	REV_QUAL	Q_CODE	D_LIMIT	MATRIX	DATE_SAMP	DEPTH	SAMPLE_TYP	UNIT
MJ031	OCBS27S02	summation	Total Tetra	Total Tetra	2.16E-06	mg/kg				S	11/19/2001	3.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ031	OCBS27S02	summation	Total Penta	Total Penta	1.63E-05	mg/kg				S	11/19/2001	3.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ031	OCBS27S02	summation	Total Hexa	Total Hexa	1.28E-04	mg/kg				S	11/19/2001	3.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ031	OCBS27S02	summation	Total Hepta	Total Hepta	6.20E-04	mg/kg				S	11/19/2001	3.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ031	OCBS27S02	summation	Total Octa	Total Octa	2.66E-03	mg/kg				S	11/19/2001	3.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ032	OCBS28S01	summation	Total Tetra	Total Tetra	5.40E-07	mg/kg				S	11/19/2001	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ032	OCBS28S01	summation	Total Penta	Total Penta	3.59E-06	mg/kg				S	11/19/2001	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ032	OCBS28S01	summation	Total Hexa	Total Hexa	4.66E-05	mg/kg				S	11/19/2001	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ032	OCBS28S01	summation	Total Hepta	Total Hepta	4.55E-04	mg/kg				S	11/19/2001	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ032	OCBS28S01	summation	Total Octa	Total Octa	2.89E-03	mg/kg				S	11/19/2001	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ110	OCBS06S01	extrapolated	Benzene	Benzene	8.40E-03	mg/kg				S	12/12/2002	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ110	OCBS06S01	extrapolated	Ethylbenzene	Ethylbenzene	8.40E-03	mg/kg				S	12/12/2002	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ110	OCBS06S01	extrapolated	Toluene	Toluene	8.40E-03	mg/kg				S	12/12/2002	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ110	OCBS06S01	extrapolated	m,p-Xylene	m,p-Xylene	2.52E-02	mg/kg				S	12/12/2002	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ110	OCBS06S01	extrapolated	o-Xylene	o-Xylene	5.60E-03	mg/kg				S	12/12/2002	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ110	OCBS06S01	extrapolated	Xylene (total)	Xylenes (total)	3.08E-02	mg/kg				S	12/12/2002	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ665	OCBS32S01	summation	Total Tetra	Total Tetra	9.85E-07	mg/kg				S	2/16/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ665	OCBS32S01	summation	Total Penta	Total Penta	2.52E-06	mg/kg				S	2/16/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ665	OCBS32S01	summation	Total Hexa	Total Hexa	1.13E-05	mg/kg				S	2/16/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ665	OCBS32S01	summation	Total Hepta	Total Hepta	1.01E-04	mg/kg				S	2/16/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ665	OCBS32S01	summation	Total Octa	Total Octa	1.74E-03	mg/kg				S	2/16/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ669	OCBS34S01	extrapolated	PCB-105	PCB-105	9.28E-06	mg/kg				S	2/16/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ669	OCBS34S01	extrapolated	PCB-114	PCB-114	3.40E-07	mg/kg				S	2/16/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ669	OCBS34S01	extrapolated	PCB-118	PCB-118	2.01E-05	mg/kg				S	2/16/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ669	OCBS34S01	extrapolated	PCB-123	PCB-123	2.24E-07	mg/kg				S	2/16/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ669	OCBS34S01	extrapolated	PCB-126	PCB-126	5.64E-07	mg/kg				S	2/16/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ669	OCBS34S01	extrapolated	PCB-156	PCB-156	4.72E-06	mg/kg				S	2/16/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ669	OCBS34S01	extrapolated	PCB-157	PCB-157	1.06E-06	mg/kg				S	2/16/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ669	OCBS34S01	extrapolated	PCB-167	PCB-167	1.84E-06	mg/kg				S	2/16/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ669	OCBS34S01	extrapolated	PCB-169	PCB-169	2.74E-08	mg/kg				S	2/16/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ669	OCBS34S01	extrapolated	PCB-189	PCB-189	2.74E-07	mg/kg				S	2/16/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ669	OCBS34S01	extrapolated	PCB-77	PCB-77	1.16E-06	mg/kg				S	2/16/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ669	OCBS34S01	extrapolated	PCB-81	PCB-81	2.24E-07	mg/kg				S	2/16/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ670	OCBS34S02	extrapolated	PCB-105	PCB-105	4.58E-06	mg/kg				S	2/16/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ670	OCBS34S02	extrapolated	PCB-114	PCB-114	1.68E-07	mg/kg				S	2/16/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ670	OCBS34S02	extrapolated	PCB-118	PCB-118	9.92E-06	mg/kg				S	2/16/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ670	OCBS34S02	extrapolated	PCB-123	PCB-123	1.11E-07	mg/kg				S	2/16/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ670	OCBS34S02	extrapolated	PCB-126	PCB-126	2.93E-07	mg/kg				S	2/16/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ670	OCBS34S02	extrapolated	PCB-156	PCB-156	2.51E-06	mg/kg				S	2/16/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ670	OCBS34S02	extrapolated	PCB-157	PCB-157	1.13E-06	mg/kg				S	2/16/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ670	OCBS34S02	extrapolated	PCB-167	PCB-167	1.97E-06	mg/kg				S	2/16/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ670	OCBS34S02	extrapolated	PCB-169	PCB-169	2.93E-08	mg/kg				S	2/16/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ670	OCBS34S02	extrapolated	PCB-189	PCB-189	2.93E-07	mg/kg				S	2/16/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ670	OCBS34S02	extrapolated	PCB-77	PCB-77	5.85E-07	mg/kg				S	2/16/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ670	OCBS34S02	extrapolated	PCB-81	PCB-81	1.11E-07	mg/kg				S	2/16/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ671	OCBS34S03	extrapolated	PCB-105	PCB-105	1.48E-05	mg/kg				S	2/16/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ671	OCBS34S03	extrapolated	PCB-114	PCB-114	5.44E-07	mg/kg				S	2/16/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ671	OCBS34S03	extrapolated	PCB-118	PCB-118	3.22E-05	mg/kg				S	2/16/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ671	OCBS34S03	extrapolated	PCB-123	PCB-123	3.59E-07	mg/kg				S	2/16/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ671	OCBS34S03	extrapolated	PCB-126	PCB-126	9.03E-07	mg/kg				S	2/16/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ671	OCBS34S03	extrapolated	PCB-156	PCB-156	7.55E-06	mg/kg				S	2/16/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation

Table C7-2
Extrapolated Data
Old Conservation Yard RFI Site

EPA_NO	SAMPLE_ID	LAB_METHOD	ANALYTE	STD_ANALYT	CONCENTRAT	UNITS	REV_QUAL	Q_CODE	D_LIMIT	MATRIX	DATE_SAMP	DEPTH	SAMPLE_TYP	UNIT
MJ671	OCBS34S03	extrapolated	PCB-157	PCB-157	2.09E-06	mg/kg				S	2/16/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ671	OCBS34S03	extrapolated	PCB-167	PCB-167	3.63E-06	mg/kg				S	2/16/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ671	OCBS34S03	extrapolated	PCB-169	PCB-169	5.41E-08	mg/kg				S	2/16/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ671	OCBS34S03	extrapolated	PCB-189	PCB-189	5.41E-07	mg/kg				S	2/16/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ671	OCBS34S03	extrapolated	PCB-77	PCB-77	1.86E-06	mg/kg				S	2/16/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ671	OCBS34S03	extrapolated	PCB-81	PCB-81	3.59E-07	mg/kg				S	2/16/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ677	OCBS35S01	summation	Total Tetra	Total Tetra	5.25E-07	mg/kg				S	2/16/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ677	OCBS35S01	summation	Total Penta	Total Penta	1.27E-06	mg/kg				S	2/16/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ677	OCBS35S01	summation	Total Hexa	Total Hexa	7.83E-06	mg/kg				S	2/16/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ677	OCBS35S01	summation	Total Hepta	Total Hepta	1.11E-04	mg/kg				S	2/16/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ677	OCBS35S01	summation	Total Octa	Total Octa	1.00E-03	mg/kg				S	2/16/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ678	OCBS36S01	summation	Total Tetra	Total Tetra	9.39E-07	mg/kg				S	2/16/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ678	OCBS36S01	summation	Total Penta	Total Penta	2.41E-06	mg/kg				S	2/16/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ678	OCBS36S01	summation	Total Hexa	Total Hexa	8.73E-06	mg/kg				S	2/16/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ678	OCBS36S01	summation	Total Hepta	Total Hepta	7.08E-05	mg/kg				S	2/16/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ678	OCBS36S01	summation	Total Octa	Total Octa	6.40E-04	mg/kg				S	2/16/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ679	OCBS37S01	summation	Total Tetra	Total Tetra	1.33E-06	mg/kg				S	2/16/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ679	OCBS37S01	summation	Total Penta	Total Penta	1.31E-05	mg/kg				S	2/16/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ679	OCBS37S01	summation	Total Hexa	Total Hexa	4.00E-05	mg/kg				S	2/16/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ679	OCBS37S01	summation	Total Hepta	Total Hepta	1.22E-04	mg/kg				S	2/16/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ679	OCBS37S01	summation	Total Octa	Total Octa	8.30E-04	mg/kg				S	2/16/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ680	OCBS38S01	summation	Total Tetra	Total Tetra	3.13E-07	mg/kg				S	2/16/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ680	OCBS38S01	summation	Total Penta	Total Penta	6.40E-07	mg/kg				S	2/16/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ680	OCBS38S01	summation	Total Hexa	Total Hexa	2.67E-06	mg/kg				S	2/16/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ680	OCBS38S01	summation	Total Hepta	Total Hepta	3.50E-05	mg/kg				S	2/16/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ680	OCBS38S01	summation	Total Octa	Total Octa	3.70E-04	mg/kg				S	2/16/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ683	OCBS10S01	extrapolated	PCB-105	PCB-105	2.47E-05	mg/kg				S	2/16/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ683	OCBS10S01	extrapolated	PCB-114	PCB-114	9.07E-07	mg/kg				S	2/16/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ683	OCBS10S01	extrapolated	PCB-118	PCB-118	5.36E-05	mg/kg				S	2/16/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ683	OCBS10S01	extrapolated	PCB-123	PCB-123	5.98E-07	mg/kg				S	2/16/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ683	OCBS10S01	extrapolated	PCB-126	PCB-126	1.51E-06	mg/kg				S	2/16/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ683	OCBS10S01	extrapolated	PCB-156	PCB-156	1.26E-05	mg/kg				S	2/16/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ683	OCBS10S01	extrapolated	PCB-157	PCB-157	2.47E-06	mg/kg				S	2/16/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ683	OCBS10S01	extrapolated	PCB-167	PCB-167	4.12E-06	mg/kg				S	2/16/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ683	OCBS10S01	extrapolated	PCB-169	PCB-169	7.32E-08	mg/kg				S	2/16/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ683	OCBS10S01	extrapolated	PCB-189	PCB-189	6.05E-07	mg/kg				S	2/16/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ683	OCBS10S01	extrapolated	PCB-77	PCB-77	3.09E-06	mg/kg				S	2/16/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ683	OCBS10S01	extrapolated	PCB-81	PCB-81	5.98E-07	mg/kg				S	2/16/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ683	OCBS10S01	extrapolated	Benzene	Benzene	6.60E-04	mg/kg				S	2/16/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ683	OCBS10S01	extrapolated	Ethylbenzene	Ethylbenzene	6.60E-04	mg/kg				S	2/16/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ683	OCBS10S01	extrapolated	Toluene	Toluene	6.60E-04	mg/kg				S	2/16/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ683	OCBS10S01	extrapolated	m,p-Xylene	m,p-Xylene	1.98E-03	mg/kg				S	2/16/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ683	OCBS10S01	extrapolated	o-Xylene	o-Xylene	4.40E-04	mg/kg				S	2/16/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ683	OCBS10S01	extrapolated	Xylene (total)	Xylenes (total)	2.42E-03	mg/kg				S	2/16/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ683	OCBS10S01	extrapolated	Acenaphthylene	Acenaphthylene	4.65E-03	mg/kg				S	2/16/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ683	OCBS10S01	extrapolated	Benzo(e)pyrene	Benzo(e)pyrene	1.37E-02	mg/kg				S	2/16/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ683	OCBS10S01	extrapolated	Perylene	Perylene	7.82E-03	mg/kg				S	2/16/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ688	OCBS40S01	extrapolated	PCB-105	PCB-105	3.34E-06	mg/kg				S	2/17/2006	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ688	OCBS40S01	extrapolated	PCB-114	PCB-114	1.22E-07	mg/kg				S	2/17/2006	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ688	OCBS40S01	extrapolated	PCB-118	PCB-118	7.24E-06	mg/kg				S	2/17/2006	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ688	OCBS40S01	extrapolated	PCB-123	PCB-123	8.07E-08	mg/kg				S	2/17/2006	4.50000	Primary Sample	SWMU 7.4 - Old Conservation

Table C7-2
Extrapolated Data
Old Conservation Yard RFI Site

EPA_NO	SAMPLE_ID	LAB_METHOD	ANALYTE	STD_ANALYT	CONCENTRAT	UNITS	REV_QUAL	Q_CODE	D_LIMIT	MATRIX	DATE_SAMP	DEPTH	SAMPLE_TYP	UNIT
MJ688	OCBS40S01	extrapolated	PCB-126	PCB-126	2.03E-07	mg/kg				S	2/17/2006	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ688	OCBS40S01	extrapolated	PCB-156	PCB-156	1.70E-06	mg/kg				S	2/17/2006	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ688	OCBS40S01	extrapolated	PCB-157	PCB-157	6.63E-07	mg/kg				S	2/17/2006	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ688	OCBS40S01	extrapolated	PCB-167	PCB-167	1.15E-06	mg/kg				S	2/17/2006	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ688	OCBS40S01	extrapolated	PCB-169	PCB-169	1.72E-08	mg/kg				S	2/17/2006	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ688	OCBS40S01	extrapolated	PCB-189	PCB-189	1.72E-07	mg/kg				S	2/17/2006	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ688	OCBS40S01	extrapolated	PCB-77	PCB-77	4.18E-07	mg/kg				S	2/17/2006	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ688	OCBS40S01	extrapolated	PCB-81	PCB-81	8.07E-08	mg/kg				S	2/17/2006	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ689	OCBS40S02	extrapolated	PCB-105	PCB-105	3.40E-06	mg/kg				S	2/17/2006	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ689	OCBS40S02	extrapolated	PCB-114	PCB-114	1.25E-07	mg/kg				S	2/17/2006	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ689	OCBS40S02	extrapolated	PCB-118	PCB-118	7.37E-06	mg/kg				S	2/17/2006	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ689	OCBS40S02	extrapolated	PCB-123	PCB-123	8.22E-08	mg/kg				S	2/17/2006	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ689	OCBS40S02	extrapolated	PCB-126	PCB-126	2.07E-07	mg/kg				S	2/17/2006	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ689	OCBS40S02	extrapolated	PCB-156	PCB-156	1.73E-06	mg/kg				S	2/17/2006	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ689	OCBS40S02	extrapolated	PCB-157	PCB-157	6.75E-07	mg/kg				S	2/17/2006	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ689	OCBS40S02	extrapolated	PCB-167	PCB-167	1.18E-06	mg/kg				S	2/17/2006	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ689	OCBS40S02	extrapolated	PCB-169	PCB-169	1.75E-08	mg/kg				S	2/17/2006	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ689	OCBS40S02	extrapolated	PCB-189	PCB-189	1.75E-07	mg/kg				S	2/17/2006	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ689	OCBS40S02	extrapolated	PCB-77	PCB-77	4.25E-07	mg/kg				S	2/17/2006	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ689	OCBS40S02	extrapolated	PCB-81	PCB-81	8.22E-08	mg/kg				S	2/17/2006	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ690	OCBS40S03	extrapolated	PCB-105	PCB-105	3.40E-06	mg/kg				S	2/17/2006	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ690	OCBS40S03	extrapolated	PCB-114	PCB-114	1.25E-07	mg/kg				S	2/17/2006	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ690	OCBS40S03	extrapolated	PCB-118	PCB-118	7.37E-06	mg/kg				S	2/17/2006	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ690	OCBS40S03	extrapolated	PCB-123	PCB-123	8.22E-08	mg/kg				S	2/17/2006	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ690	OCBS40S03	extrapolated	PCB-126	PCB-126	2.07E-07	mg/kg				S	2/17/2006	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ690	OCBS40S03	extrapolated	PCB-156	PCB-156	1.75E-06	mg/kg				S	2/17/2006	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ690	OCBS40S03	extrapolated	PCB-157	PCB-157	7.85E-07	mg/kg				S	2/17/2006	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ690	OCBS40S03	extrapolated	PCB-167	PCB-167	1.37E-06	mg/kg				S	2/17/2006	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ690	OCBS40S03	extrapolated	PCB-169	PCB-169	2.04E-08	mg/kg				S	2/17/2006	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ690	OCBS40S03	extrapolated	PCB-189	PCB-189	2.04E-07	mg/kg				S	2/17/2006	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ690	OCBS40S03	extrapolated	PCB-77	PCB-77	4.25E-07	mg/kg				S	2/17/2006	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ690	OCBS40S03	extrapolated	PCB-81	PCB-81	8.22E-08	mg/kg				S	2/17/2006	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ696	OCBS42S01	extrapolated	Benzene	Benzene	3.36E-04	mg/kg				S	2/17/2006	6.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ696	OCBS42S01	extrapolated	Ethylbenzene	Ethylbenzene	3.36E-04	mg/kg				S	2/17/2006	6.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ696	OCBS42S01	extrapolated	Toluene	Toluene	3.36E-04	mg/kg				S	2/17/2006	6.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ696	OCBS42S01	extrapolated	m,p-Xylene	m,p-Xylene	1.01E-03	mg/kg				S	2/17/2006	6.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ696	OCBS42S01	extrapolated	o-Xylene	o-Xylene	2.24E-04	mg/kg				S	2/17/2006	6.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ696	OCBS42S01	extrapolated	Xylene (total)	Xylenes (total)	1.23E-03	mg/kg				S	2/17/2006	6.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ696	OCBS42S01	extrapolated	2-Methylnaphthalene	2-Methylnaphthalene	7.71E-02	mg/kg				S	2/17/2006	6.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ696	OCBS42S01	extrapolated	Acenaphthene	Acenaphthene	4.81E-03	mg/kg				S	2/17/2006	6.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ696	OCBS42S01	extrapolated	Acenaphthylene	Acenaphthylene	5.89E-04	mg/kg				S	2/17/2006	6.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ696	OCBS42S01	extrapolated	Anthracene	Anthracene	3.14E-03	mg/kg				S	2/17/2006	6.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ696	OCBS42S01	extrapolated	Benzo(a)anthracene	Benzo(a)anthracene	2.27E-04	mg/kg				S	2/17/2006	6.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ696	OCBS42S01	extrapolated	Benzo(a)pyrene	Benzo(a)pyrene	2.29E-04	mg/kg				S	2/17/2006	6.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ696	OCBS42S01	extrapolated	Benzo(b)fluoranthene	Benzo(b)fluoranthene	3.64E-04	mg/kg				S	2/17/2006	6.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ696	OCBS42S01	extrapolated	Benzo(e)pyrene	Benzo(e)pyrene	1.74E-03	mg/kg				S	2/17/2006	6.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ696	OCBS42S01	extrapolated	Benzo(g,h,i)perylene	Benzo(g,h,i)perylene	1.86E-03	mg/kg				S	2/17/2006	6.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ696	OCBS42S01	extrapolated	Benzo(k)fluoranthene	Benzo(k)fluoranthene	1.72E-04	mg/kg				S	2/17/2006	6.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ696	OCBS42S01	extrapolated	Chrysene	Chrysene	4.93E-04	mg/kg				S	2/17/2006	6.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ696	OCBS42S01	extrapolated	Dibenz(a,h)anthracene	Dibenz(a,h)anthracene	9.30E-05	mg/kg				S	2/17/2006	6.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ696	OCBS42S01	extrapolated	Fluoranthene	Fluoranthene	6.28E-04	mg/kg				S	2/17/2006	6.50000	Primary Sample	SWMU 7.4 - Old Conservation

Table C7-2
Extrapolated Data
Old Conservation Yard RFI Site

EPA_NO	SAMPLE_ID	LAB_METHOD	ANALYTE	STD_ANALYT	CONCENTRAT	UNITS	REV_QUAL	Q_CODE	D_LIMIT	MATRIX	DATE_SAMP	DEPTH	SAMPLE_TYP	UNIT
MJ696	OCBS42S01	extrapolated	Fluorene	Fluorene	4.77E-03	mg/kg				S	2/17/2006	6.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ696	OCBS42S01	extrapolated	Indeno(1,2,3-cd)pyrene	Indeno(1,2,3-cd)pyrene	2.02E-04	mg/kg				S	2/17/2006	6.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ696	OCBS42S01	extrapolated	Naphthalene	Naphthalene	1.95E-02	mg/kg				S	2/17/2006	6.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ696	OCBS42S01	extrapolated	Perylene	Perylene	9.90E-04	mg/kg				S	2/17/2006	6.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ696	OCBS42S01	extrapolated	Phenanthrene	Phenanthrene	1.29E-02	mg/kg				S	2/17/2006	6.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ696	OCBS42S01	extrapolated	Pyrene	Pyrene	1.15E-03	mg/kg				S	2/17/2006	6.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ697	OCBS43S01	extrapolated	Benzene	Benzene	6.60E-04	mg/kg				S	2/17/2006	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ697	OCBS43S01	extrapolated	Ethylbenzene	Ethylbenzene	6.60E-04	mg/kg				S	2/17/2006	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ697	OCBS43S01	extrapolated	Toluene	Toluene	6.60E-04	mg/kg				S	2/17/2006	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ697	OCBS43S01	extrapolated	m,p-Xylene	m,p-Xylene	1.98E-03	mg/kg				S	2/17/2006	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ697	OCBS43S01	extrapolated	o-Xylene	o-Xylene	4.40E-04	mg/kg				S	2/17/2006	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ697	OCBS43S01	extrapolated	Xylene (total)	Xylenes (total)	2.42E-03	mg/kg				S	2/17/2006	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ697	OCBS43S01	extrapolated	2-Methylnaphthalene	2-Methylnaphthalene	1.51E-01	mg/kg				S	2/17/2006	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ697	OCBS43S01	extrapolated	Acenaphthene	Acenaphthene	7.56E-02	mg/kg				S	2/17/2006	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ697	OCBS43S01	extrapolated	Acenaphthylene	Acenaphthylene	9.25E-03	mg/kg				S	2/17/2006	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ697	OCBS43S01	extrapolated	Anthracene	Anthracene	4.93E-02	mg/kg				S	2/17/2006	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ697	OCBS43S01	extrapolated	Benzo(a)anthracene	Benzo(a)anthracene	3.56E-03	mg/kg				S	2/17/2006	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ697	OCBS43S01	extrapolated	Benzo(a)pyrene	Benzo(a)pyrene	3.59E-03	mg/kg				S	2/17/2006	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ697	OCBS43S01	extrapolated	Benzo(b)fluoranthene	Benzo(b)fluoranthene	5.72E-03	mg/kg				S	2/17/2006	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ697	OCBS43S01	extrapolated	Benzo(e)pyrene	Benzo(e)pyrene	2.73E-02	mg/kg				S	2/17/2006	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ697	OCBS43S01	extrapolated	Benzo(g,h,i)perylene	Benzo(g,h,i)perylene	2.92E-02	mg/kg				S	2/17/2006	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ697	OCBS43S01	extrapolated	Benzo(k)fluoranthene	Benzo(k)fluoranthene	2.71E-03	mg/kg				S	2/17/2006	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ697	OCBS43S01	extrapolated	Chrysene	Chrysene	7.74E-03	mg/kg				S	2/17/2006	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ697	OCBS43S01	extrapolated	Dibenz(a,h)anthracene	Dibenz(a,h)anthracene	1.46E-03	mg/kg				S	2/17/2006	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ697	OCBS43S01	extrapolated	Fluoranthene	Fluoranthene	9.87E-03	mg/kg				S	2/17/2006	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ697	OCBS43S01	extrapolated	Fluorene	Fluorene	7.49E-02	mg/kg				S	2/17/2006	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ697	OCBS43S01	extrapolated	Indeno(1,2,3-cd)pyrene	Indeno(1,2,3-cd)pyrene	3.18E-03	mg/kg				S	2/17/2006	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ697	OCBS43S01	extrapolated	Naphthalene	Naphthalene	3.82E-02	mg/kg				S	2/17/2006	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ697	OCBS43S01	extrapolated	Perylene	Perylene	1.56E-02	mg/kg				S	2/17/2006	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ697	OCBS43S01	extrapolated	Phenanthrene	Phenanthrene	2.02E-01	mg/kg				S	2/17/2006	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ697	OCBS43S01	extrapolated	Pyrene	Pyrene	1.80E-02	mg/kg				S	2/17/2006	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ698	OCBS44S01	extrapolated	Benzene	Benzene	3.36E-04	mg/kg				S	2/17/2006	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ698	OCBS44S01	extrapolated	Ethylbenzene	Ethylbenzene	3.36E-04	mg/kg				S	2/17/2006	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ698	OCBS44S01	extrapolated	Toluene	Toluene	3.36E-04	mg/kg				S	2/17/2006	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ698	OCBS44S01	extrapolated	m,p-Xylene	m,p-Xylene	1.01E-03	mg/kg				S	2/17/2006	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ698	OCBS44S01	extrapolated	o-Xylene	o-Xylene	2.24E-04	mg/kg				S	2/17/2006	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ698	OCBS44S01	extrapolated	Xylene (total)	Xylenes (total)	1.23E-03	mg/kg				S	2/17/2006	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ698	OCBS44S01	extrapolated	2-Methylnaphthalene	2-Methylnaphthalene	7.71E-02	mg/kg				S	2/17/2006	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ698	OCBS44S01	extrapolated	Acenaphthene	Acenaphthene	4.81E-03	mg/kg				S	2/17/2006	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ698	OCBS44S01	extrapolated	Acenaphthylene	Acenaphthylene	5.89E-04	mg/kg				S	2/17/2006	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ698	OCBS44S01	extrapolated	Anthracene	Anthracene	3.14E-03	mg/kg				S	2/17/2006	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ698	OCBS44S01	extrapolated	Benzo(a)anthracene	Benzo(a)anthracene	2.27E-04	mg/kg				S	2/17/2006	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ698	OCBS44S01	extrapolated	Benzo(a)pyrene	Benzo(a)pyrene	2.29E-04	mg/kg				S	2/17/2006	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ698	OCBS44S01	extrapolated	Benzo(b)fluoranthene	Benzo(b)fluoranthene	3.64E-04	mg/kg				S	2/17/2006	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ698	OCBS44S01	extrapolated	Benzo(e)pyrene	Benzo(e)pyrene	1.74E-03	mg/kg				S	2/17/2006	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ698	OCBS44S01	extrapolated	Benzo(g,h,i)perylene	Benzo(g,h,i)perylene	1.86E-03	mg/kg				S	2/17/2006	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ698	OCBS44S01	extrapolated	Benzo(k)fluoranthene	Benzo(k)fluoranthene	1.72E-04	mg/kg				S	2/17/2006	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ698	OCBS44S01	extrapolated	Chrysene	Chrysene	4.93E-04	mg/kg				S	2/17/2006	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ698	OCBS44S01	extrapolated	Dibenz(a,h)anthracene	Dibenz(a,h)anthracene	9.30E-05	mg/kg				S	2/17/2006	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ698	OCBS44S01	extrapolated	Fluoranthene	Fluoranthene	6.28E-04	mg/kg				S	2/17/2006	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ698	OCBS44S01	extrapolated	Fluorene	Fluorene	4.77E-03	mg/kg				S	2/17/2006	7.00000	Primary Sample	SWMU 7.4 - Old Conservation

Table C7-2
Extrapolated Data
Old Conservation Yard RFI Site

EPA_NO	SAMPLE_ID	LAB_METHOD	ANALYTE	STD_ANALYT	CONCENTRAT	UNITS	REV_QUAL	Q_CODE	D_LIMIT	MATRIX	DATE_SAMP	DEPTH	SAMPLE_TYP	UNIT
MJ698	OCBS44S01	extrapolated	Indeno(1,2,3-cd)pyrene	Indeno(1,2,3-cd)pyrene	2.02E-04	mg/kg				S	2/17/2006	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ698	OCBS44S01	extrapolated	Naphthalene	Naphthalene	1.95E-02	mg/kg				S	2/17/2006	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ698	OCBS44S01	extrapolated	Perylene	Perylene	9.90E-04	mg/kg				S	2/17/2006	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ698	OCBS44S01	extrapolated	Phenanthrene	Phenanthrene	1.29E-02	mg/kg				S	2/17/2006	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ698	OCBS44S01	extrapolated	Pyrene	Pyrene	1.15E-03	mg/kg				S	2/17/2006	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ704	OCBS50S01	extrapolated	PCB-105	PCB-105	3.22E-06	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ704	OCBS50S01	extrapolated	PCB-114	PCB-114	1.18E-07	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ704	OCBS50S01	extrapolated	PCB-118	PCB-118	6.97E-06	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ704	OCBS50S01	extrapolated	PCB-123	PCB-123	7.77E-08	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ704	OCBS50S01	extrapolated	PCB-126	PCB-126	1.96E-07	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ704	OCBS50S01	extrapolated	PCB-156	PCB-156	1.64E-06	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ704	OCBS50S01	extrapolated	PCB-157	PCB-157	6.38E-07	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ704	OCBS50S01	extrapolated	PCB-167	PCB-167	1.11E-06	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ704	OCBS50S01	extrapolated	PCB-169	PCB-169	1.65E-08	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ704	OCBS50S01	extrapolated	PCB-189	PCB-189	1.65E-07	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ704	OCBS50S01	extrapolated	PCB-77	PCB-77	4.02E-07	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ704	OCBS50S01	extrapolated	PCB-81	PCB-81	7.77E-08	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ704	OCBS50S01	extrapolated	Benzene	Benzene	3.12E-04	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ704	OCBS50S01	extrapolated	Ethylbenzene	Ethylbenzene	3.12E-04	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ704	OCBS50S01	extrapolated	Toluene	Toluene	3.12E-04	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ704	OCBS50S01	extrapolated	m,p-Xylene	m,p-Xylene	9.36E-04	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ704	OCBS50S01	extrapolated	o-Xylene	o-Xylene	2.08E-04	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ704	OCBS50S01	extrapolated	Xylene (total)	Xylenes (total)	1.14E-03	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ704	OCBS50S01	extrapolated	Acenaphthene	Acenaphthene	4.47E-03	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ704	OCBS50S01	extrapolated	Acenaphthylene	Acenaphthylene	5.47E-04	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ704	OCBS50S01	extrapolated	Benzo(e)pyrene	Benzo(e)pyrene	1.61E-03	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ704	OCBS50S01	extrapolated	Fluorene	Fluorene	4.43E-03	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ704	OCBS50S01	extrapolated	Perylene	Perylene	9.20E-04	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ705	OCBS51S01	extrapolated	PCB-105	PCB-105	5.01E-06	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ705	OCBS51S01	extrapolated	PCB-114	PCB-114	1.84E-07	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ705	OCBS51S01	extrapolated	PCB-118	PCB-118	1.09E-05	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ705	OCBS51S01	extrapolated	PCB-123	PCB-123	1.21E-07	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ705	OCBS51S01	extrapolated	PCB-126	PCB-126	3.05E-07	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ705	OCBS51S01	extrapolated	PCB-156	PCB-156	2.55E-06	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ705	OCBS51S01	extrapolated	PCB-157	PCB-157	9.94E-07	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ705	OCBS51S01	extrapolated	PCB-167	PCB-167	1.73E-06	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ705	OCBS51S01	extrapolated	PCB-169	PCB-169	2.58E-08	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ705	OCBS51S01	extrapolated	PCB-189	PCB-189	2.58E-07	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ705	OCBS51S01	extrapolated	PCB-77	PCB-77	6.26E-07	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ705	OCBS51S01	extrapolated	PCB-81	PCB-81	1.21E-07	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ705	OCBS51S01	extrapolated	Benzene	Benzene	3.24E-04	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ705	OCBS51S01	extrapolated	Ethylbenzene	Ethylbenzene	3.24E-04	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ705	OCBS51S01	extrapolated	Toluene	Toluene	3.24E-04	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ705	OCBS51S01	extrapolated	m,p-Xylene	m,p-Xylene	9.72E-04	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ705	OCBS51S01	extrapolated	o-Xylene	o-Xylene	2.16E-04	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ705	OCBS51S01	extrapolated	Xylene (total)	Xylenes (total)	1.19E-03	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ705	OCBS51S01	extrapolated	Acenaphthene	Acenaphthene	4.64E-03	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ705	OCBS51S01	extrapolated	Acenaphthylene	Acenaphthylene	5.68E-04	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ705	OCBS51S01	extrapolated	Anthracene	Anthracene	3.02E-03	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ705	OCBS51S01	extrapolated	Benzo(a)anthracene	Benzo(a)anthracene	2.18E-04	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ705	OCBS51S01	extrapolated	Benzo(a)pyrene	Benzo(a)pyrene	2.20E-04	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation

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Extrapolated Data
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EPA_NO	SAMPLE_ID	LAB_METHOD	ANALYTE	STD_ANALYT	CONCENTRAT	UNITS	REV_QUAL	Q_CODE	D_LIMIT	MATRIX	DATE_SAMP	DEPTH	SAMPLE_TYP	UNIT
MJ705	OCBS51S01	extrapolated	Benzo(b)fluoranthene	Benzo(b)fluoranthene	3.51E-04	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ705	OCBS51S01	extrapolated	Benzo(e)pyrene	Benzo(e)pyrene	1.67E-03	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ705	OCBS51S01	extrapolated	Benzo(g,h,i)perylene	Benzo(g,h,i)perylene	1.79E-03	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ705	OCBS51S01	extrapolated	Benzo(k)fluoranthene	Benzo(k)fluoranthene	1.66E-04	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ705	OCBS51S01	extrapolated	Chrysene	Chrysene	4.75E-04	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ705	OCBS51S01	extrapolated	Dibenzo(a,h)anthracene	Dibenz(a,h)anthracene	8.97E-05	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ705	OCBS51S01	extrapolated	Fluoranthene	Fluoranthene	6.06E-04	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ705	OCBS51S01	extrapolated	Fluorene	Fluorene	4.60E-03	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ705	OCBS51S01	extrapolated	Indeno(1,2,3-cd)pyrene	Indeno(1,2,3-cd)pyrene	1.95E-04	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ705	OCBS51S01	extrapolated	Perylene	Perylene	9.55E-04	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ705	OCBS51S01	extrapolated	Pyrene	Pyrene	1.10E-03	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ707	OCBS52S01	extrapolated	PCB-105	PCB-105	3.15E-06	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ707	OCBS52S01	extrapolated	PCB-114	PCB-114	1.16E-07	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ707	OCBS52S01	extrapolated	PCB-118	PCB-118	6.84E-06	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ707	OCBS52S01	extrapolated	PCB-123	PCB-123	7.62E-08	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ707	OCBS52S01	extrapolated	PCB-126	PCB-126	1.92E-07	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ707	OCBS52S01	extrapolated	PCB-156	PCB-156	1.60E-06	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ707	OCBS52S01	extrapolated	PCB-157	PCB-157	6.26E-07	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ707	OCBS52S01	extrapolated	PCB-167	PCB-167	1.09E-06	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ707	OCBS52S01	extrapolated	PCB-169	PCB-169	1.62E-08	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ707	OCBS52S01	extrapolated	PCB-189	PCB-189	1.62E-07	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ707	OCBS52S01	extrapolated	PCB-77	PCB-77	3.94E-07	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ707	OCBS52S01	extrapolated	PCB-81	PCB-81	7.62E-08	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ707	OCBS52S01	extrapolated	Benzene	Benzene	6.00E-04	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ707	OCBS52S01	extrapolated	Ethylbenzene	Ethylbenzene	6.00E-04	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ707	OCBS52S01	extrapolated	Toluene	Toluene	6.00E-04	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ707	OCBS52S01	extrapolated	m,p-Xylene	m,p-Xylene	1.80E-03	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ707	OCBS52S01	extrapolated	o-Xylene	o-Xylene	4.00E-04	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ707	OCBS52S01	extrapolated	Xylene (total)	Xylenes (total)	2.20E-03	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ707	OCBS52S01	extrapolated	Acenaphthene	Acenaphthene	8.59E-03	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ707	OCBS52S01	extrapolated	Acenaphthylene	Acenaphthylene	1.05E-03	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ707	OCBS52S01	extrapolated	Anthracene	Anthracene	5.60E-03	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ707	OCBS52S01	extrapolated	Benzo(a)anthracene	Benzo(a)anthracene	4.05E-04	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ707	OCBS52S01	extrapolated	Benzo(a)pyrene	Benzo(a)pyrene	4.08E-04	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ707	OCBS52S01	extrapolated	Benzo(b)fluoranthene	Benzo(b)fluoranthene	6.50E-04	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ707	OCBS52S01	extrapolated	Benzo(e)pyrene	Benzo(e)pyrene	3.10E-03	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ707	OCBS52S01	extrapolated	Benzo(g,h,i)perylene	Benzo(g,h,i)perylene	3.32E-03	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ707	OCBS52S01	extrapolated	Benzo(k)fluoranthene	Benzo(k)fluoranthene	3.08E-04	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ707	OCBS52S01	extrapolated	Chrysene	Chrysene	8.80E-04	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ707	OCBS52S01	extrapolated	Dibenzo(a,h)anthracene	Dibenz(a,h)anthracene	1.66E-04	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ707	OCBS52S01	extrapolated	Fluoranthene	Fluoranthene	1.12E-03	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ707	OCBS52S01	extrapolated	Fluorene	Fluorene	8.52E-03	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ707	OCBS52S01	extrapolated	Indeno(1,2,3-cd)pyrene	Indeno(1,2,3-cd)pyrene	3.61E-04	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ707	OCBS52S01	extrapolated	Perylene	Perylene	1.77E-03	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ707	OCBS52S01	extrapolated	Pyrene	Pyrene	2.04E-03	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ708	OCBS53S01	extrapolated	PCB-105	PCB-105	4.89E-06	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ708	OCBS53S01	extrapolated	PCB-114	PCB-114	1.79E-07	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ708	OCBS53S01	extrapolated	PCB-118	PCB-118	1.06E-05	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ708	OCBS53S01	extrapolated	PCB-123	PCB-123	1.18E-07	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ708	OCBS53S01	extrapolated	PCB-126	PCB-126	2.97E-07	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ708	OCBS53S01	extrapolated	PCB-156	PCB-156	2.48E-06	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation

Table C7-2
Extrapolated Data
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EPA_NO	SAMPLE_ID	LAB_METHOD	ANALYTE	STD_ANALYT	CONCENTRAT	UNITS	REV_QUAL	Q_CODE	D_LIMIT	MATRIX	DATE_SAMP	DEPTH	SAMPLE_TYP	UNIT
MJ708	OCBS53S01	extrapolated	PCB-157	PCB-157	9.70E-07	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ708	OCBS53S01	extrapolated	PCB-167	PCB-167	1.69E-06	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ708	OCBS53S01	extrapolated	PCB-169	PCB-169	2.51E-08	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ708	OCBS53S01	extrapolated	PCB-189	PCB-189	2.51E-07	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ708	OCBS53S01	extrapolated	PCB-77	PCB-77	6.11E-07	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ708	OCBS53S01	extrapolated	PCB-81	PCB-81	1.18E-07	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ708	OCBS53S01	extrapolated	Benzene	Benzene	6.60E-04	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ708	OCBS53S01	extrapolated	Ethylbenzene	Ethylbenzene	6.60E-04	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ708	OCBS53S01	extrapolated	Toluene	Toluene	6.60E-04	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ708	OCBS53S01	extrapolated	m,p-Xylene	m,p-Xylene	1.98E-03	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ708	OCBS53S01	extrapolated	o-Xylene	o-Xylene	4.40E-04	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ708	OCBS53S01	extrapolated	Xylene (total)	Xylenes (total)	2.42E-03	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ708	OCBS53S01	extrapolated	Acenaphthene	Acenaphthene	8.88E-03	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ708	OCBS53S01	extrapolated	Acenaphthylene	Acenaphthylene	1.09E-03	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ708	OCBS53S01	extrapolated	Anthracene	Anthracene	5.79E-03	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ708	OCBS53S01	extrapolated	Benzo(a)anthracene	Benzo(a)anthracene	4.18E-04	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ708	OCBS53S01	extrapolated	Benzo(a)pyrene	Benzo(a)pyrene	4.22E-04	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ708	OCBS53S01	extrapolated	Benzo(b)fluoranthene	Benzo(b)fluoranthene	6.71E-04	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ708	OCBS53S01	extrapolated	Benzo(e)pyrene	Benzo(e)pyrene	3.20E-03	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ708	OCBS53S01	extrapolated	Benzo(g,h,i)perylene	Benzo(g,h,i)perylene	3.43E-03	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ708	OCBS53S01	extrapolated	Benzo(k)fluoranthene	Benzo(k)fluoranthene	3.18E-04	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ708	OCBS53S01	extrapolated	Chrysene	Chrysene	9.09E-04	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ708	OCBS53S01	extrapolated	Dibenzo(a,h)anthracene	Dibenz(a,h)anthracene	1.72E-04	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ708	OCBS53S01	extrapolated	Fluoranthene	Fluoranthene	1.16E-03	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ708	OCBS53S01	extrapolated	Fluorene	Fluorene	8.80E-03	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ708	OCBS53S01	extrapolated	Indeno(1,2,3-cd)pyrene	Indeno(1,2,3-cd)pyrene	3.73E-04	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ708	OCBS53S01	extrapolated	Perylene	Perylene	1.83E-03	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ708	OCBS53S01	extrapolated	Pyrene	Pyrene	2.11E-03	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ709	OCBS54S01	extrapolated	PCB-105	PCB-105	3.34E-06	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ709	OCBS54S01	extrapolated	PCB-114	PCB-114	1.22E-07	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ709	OCBS54S01	extrapolated	PCB-118	PCB-118	7.24E-06	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ709	OCBS54S01	extrapolated	PCB-123	PCB-123	8.07E-08	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ709	OCBS54S01	extrapolated	PCB-126	PCB-126	2.03E-07	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ709	OCBS54S01	extrapolated	PCB-156	PCB-156	1.70E-06	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ709	OCBS54S01	extrapolated	PCB-157	PCB-157	6.63E-07	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ709	OCBS54S01	extrapolated	PCB-167	PCB-167	1.15E-06	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ709	OCBS54S01	extrapolated	PCB-169	PCB-169	1.72E-08	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ709	OCBS54S01	extrapolated	PCB-189	PCB-189	1.72E-07	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ709	OCBS54S01	extrapolated	PCB-77	PCB-77	4.18E-07	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ709	OCBS54S01	extrapolated	PCB-81	PCB-81	8.07E-08	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ710	OCBS55S01	extrapolated	PCB-105	PCB-105	1.88E-05	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ710	OCBS55S01	extrapolated	PCB-114	PCB-114	3.35E-07	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ710	OCBS55S01	extrapolated	PCB-118	PCB-118	3.76E-05	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ710	OCBS55S01	extrapolated	PCB-123	PCB-123	5.33E-07	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ710	OCBS55S01	extrapolated	PCB-126	PCB-126	1.46E-06	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ710	OCBS55S01	extrapolated	PCB-156	PCB-156	1.25E-05	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ710	OCBS55S01	extrapolated	PCB-157	PCB-157	5.65E-06	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ710	OCBS55S01	extrapolated	PCB-167	PCB-167	9.83E-06	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ710	OCBS55S01	extrapolated	PCB-169	PCB-169	1.46E-07	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ710	OCBS55S01	extrapolated	PCB-189	PCB-189	1.46E-06	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ710	OCBS55S01	extrapolated	PCB-77	PCB-77	2.93E-06	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation

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Extrapolated Data
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EPA_NO	SAMPLE_ID	LAB_METHOD	ANALYTE	STD_ANALYT	CONCENTRAT	UNITS	REV_QUAL	Q_CODE	D_LIMIT	MATRIX	DATE_SAMP	DEPTH	SAMPLE_TYP	UNIT
MJ710	OCBS55S01	extrapolated	PCB-81	PCB-81	5.18E-07	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ710	OCBS55S01	extrapolated	Benzene	Benzene	3.18E-04	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ710	OCBS55S01	extrapolated	Ethylbenzene	Ethylbenzene	3.18E-04	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ710	OCBS55S01	extrapolated	Toluene	Toluene	3.18E-04	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ710	OCBS55S01	extrapolated	m,p-Xylene	m,p-Xylene	9.54E-04	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ710	OCBS55S01	extrapolated	o-Xylene	o-Xylene	2.12E-04	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ710	OCBS55S01	extrapolated	Xylene (total)	Xylenes (total)	1.17E-03	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ710	OCBS55S01	extrapolated	Acenaphthene	Acenaphthene	4.30E-03	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ710	OCBS55S01	extrapolated	Acenaphthylene	Acenaphthylene	5.26E-04	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ710	OCBS55S01	extrapolated	Anthracene	Anthracene	2.80E-03	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ710	OCBS55S01	extrapolated	Benzo(a)anthracene	Benzo(a)anthracene	2.02E-04	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ710	OCBS55S01	extrapolated	Benzo(a)pyrene	Benzo(a)pyrene	2.04E-04	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ710	OCBS55S01	extrapolated	Benzo(b)fluoranthene	Benzo(b)fluoranthene	3.25E-04	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ710	OCBS55S01	extrapolated	Benzo(e)pyrene	Benzo(e)pyrene	1.55E-03	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ710	OCBS55S01	extrapolated	Benzo(g,h,i)perylene	Benzo(g,h,i)perylene	1.66E-03	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ710	OCBS55S01	extrapolated	Benzo(k)fluoranthene	Benzo(k)fluoranthene	1.54E-04	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ710	OCBS55S01	extrapolated	Chrysene	Chrysene	4.40E-04	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ710	OCBS55S01	extrapolated	Dibenzo(a,h)anthracene	Dibenz(a,h)anthracene	8.30E-05	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ710	OCBS55S01	extrapolated	Fluoranthene	Fluoranthene	5.61E-04	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ710	OCBS55S01	extrapolated	Fluorene	Fluorene	4.26E-03	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ710	OCBS55S01	extrapolated	Indeno(1,2,3-cd)pyrene	Indeno(1,2,3-cd)pyrene	1.80E-04	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ710	OCBS55S01	extrapolated	Perylene	Perylene	8.84E-04	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ710	OCBS55S01	extrapolated	Pyrene	Pyrene	1.02E-03	mg/kg				S	2/17/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ720	OCBS43S01	extrapolated	Benzene	Benzene	3.60E-04	mg/kg				S	2/21/2006	3.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ720	OCBS43S01	extrapolated	Ethylbenzene	Ethylbenzene	3.60E-04	mg/kg				S	2/21/2006	3.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ720	OCBS43S01	extrapolated	Toluene	Toluene	3.60E-04	mg/kg				S	2/21/2006	3.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ720	OCBS43S01	extrapolated	m,p-Xylene	m,p-Xylene	1.08E-03	mg/kg				S	2/21/2006	3.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ720	OCBS43S01	extrapolated	o-Xylene	o-Xylene	2.40E-04	mg/kg				S	2/21/2006	3.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ720	OCBS43S01	extrapolated	Xylene (total)	Xylenes (total)	1.32E-03	mg/kg				S	2/21/2006	3.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ720	OCBS43S01	extrapolated	2-Methylnaphthalene	2-Methylnaphthalene	8.26E-02	mg/kg				S	2/21/2006	3.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ720	OCBS43S01	extrapolated	Acenaphthene	Acenaphthene	5.16E-03	mg/kg				S	2/21/2006	3.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ720	OCBS43S01	extrapolated	Acenaphthylene	Acenaphthylene	6.31E-04	mg/kg				S	2/21/2006	3.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ720	OCBS43S01	extrapolated	Anthracene	Anthracene	3.36E-03	mg/kg				S	2/21/2006	3.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ720	OCBS43S01	extrapolated	Benzo(a)anthracene	Benzo(a)anthracene	2.43E-04	mg/kg				S	2/21/2006	3.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ720	OCBS43S01	extrapolated	Benzo(a)pyrene	Benzo(a)pyrene	2.45E-04	mg/kg				S	2/21/2006	3.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ720	OCBS43S01	extrapolated	Benzo(b)fluoranthene	Benzo(b)fluoranthene	3.90E-04	mg/kg				S	2/21/2006	3.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ720	OCBS43S01	extrapolated	Benzo(e)pyrene	Benzo(e)pyrene	1.86E-03	mg/kg				S	2/21/2006	3.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ720	OCBS43S01	extrapolated	Benzo(g,h,i)perylene	Benzo(g,h,i)perylene	1.99E-03	mg/kg				S	2/21/2006	3.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ720	OCBS43S01	extrapolated	Benzo(k)fluoranthene	Benzo(k)fluoranthene	1.85E-04	mg/kg				S	2/21/2006	3.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ720	OCBS43S01	extrapolated	Chrysene	Chrysene	5.28E-04	mg/kg				S	2/21/2006	3.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ720	OCBS43S01	extrapolated	Dibenz(a,h)anthracene	Dibenz(a,h)anthracene	9.96E-05	mg/kg				S	2/21/2006	3.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ720	OCBS43S01	extrapolated	Fluoranthene	Fluoranthene	6.73E-04	mg/kg				S	2/21/2006	3.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ720	OCBS43S01	extrapolated	Fluorene	Fluorene	5.11E-03	mg/kg				S	2/21/2006	3.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ720	OCBS43S01	extrapolated	Indeno(1,2,3-cd)pyrene	Indeno(1,2,3-cd)pyrene	2.16E-04	mg/kg				S	2/21/2006	3.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ720	OCBS43S01	extrapolated	Naphthalene	Naphthalene	2.08E-02	mg/kg				S	2/21/2006	3.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ720	OCBS43S01	extrapolated	Perylene	Perylene	1.06E-03	mg/kg				S	2/21/2006	3.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ720	OCBS43S01	extrapolated	Phenanthrene	Phenanthrene	1.38E-02	mg/kg				S	2/21/2006	3.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ720	OCBS43S01	extrapolated	Pyrene	Pyrene	1.23E-03	mg/kg				S	2/21/2006	3.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ721	OCBS57S01	extrapolated	Benzene	Benzene	3.42E-04	mg/kg				S	2/21/2006	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ721	OCBS57S01	extrapolated	Ethylbenzene	Ethylbenzene	3.42E-04	mg/kg				S	2/21/2006	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ721	OCBS57S01	extrapolated	Toluene	Toluene	3.42E-04	mg/kg				S	2/21/2006	7.00000	Primary Sample	SWMU 7.4 - Old Conservation

Table C7-2
Extrapolated Data
Old Conservation Yard RFI Site

EPA_NO	SAMPLE_ID	LAB_METHOD	ANALYTE	STD_ANALYT	CONCENTRAT	UNITS	REV_QUAL	Q_CODE	D_LIMIT	MATRIX	DATE_SAMP	DEPTH	SAMPLE_TYP	UNIT
MJ721	OCBS57S01	extrapolated	m,p-Xylene	m,p-Xylene	1.03E-03	mg/kg				S	2/21/2006	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ721	OCBS57S01	extrapolated	o-Xylene	o-Xylene	2.28E-04	mg/kg				S	2/21/2006	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ721	OCBS57S01	extrapolated	Xylene (total)	Xylenes (total)	1.25E-03	mg/kg				S	2/21/2006	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ721	OCBS57S01	extrapolated	2-Methylnaphthalene	2-Methylnaphthalene	7.85E-02	mg/kg				S	2/21/2006	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ721	OCBS57S01	extrapolated	Acenaphthene	Acenaphthene	4.90E-03	mg/kg				S	2/21/2006	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ721	OCBS57S01	extrapolated	Acenaphthylene	Acenaphthylene	5.99E-04	mg/kg				S	2/21/2006	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ721	OCBS57S01	extrapolated	Anthracene	Anthracene	3.19E-03	mg/kg				S	2/21/2006	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ721	OCBS57S01	extrapolated	Benzo(a)anthracene	Benzo(a)anthracene	2.31E-04	mg/kg				S	2/21/2006	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ721	OCBS57S01	extrapolated	Benzo(a)pyrene	Benzo(a)pyrene	2.33E-04	mg/kg				S	2/21/2006	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ721	OCBS57S01	extrapolated	Benzo(b)fluoranthene	Benzo(b)fluoranthene	3.70E-04	mg/kg				S	2/21/2006	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ721	OCBS57S01	extrapolated	Benzo(e)pyrene	Benzo(e)pyrene	1.77E-03	mg/kg				S	2/21/2006	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ721	OCBS57S01	extrapolated	Benzo(g,h,i)perylene	Benzo(g,h,i)perylene	1.89E-03	mg/kg				S	2/21/2006	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ721	OCBS57S01	extrapolated	Benzo(k)fluoranthene	Benzo(k)fluoranthene	1.75E-04	mg/kg				S	2/21/2006	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ721	OCBS57S01	extrapolated	Chrysene	Chrysene	5.02E-04	mg/kg				S	2/21/2006	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ721	OCBS57S01	extrapolated	Dibenz(a,h)anthracene	Dibenz(a,h)anthracene	9.46E-05	mg/kg				S	2/21/2006	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ721	OCBS57S01	extrapolated	Fluoranthene	Fluoranthene	6.40E-04	mg/kg				S	2/21/2006	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ721	OCBS57S01	extrapolated	Fluorene	Fluorene	4.85E-03	mg/kg				S	2/21/2006	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ721	OCBS57S01	extrapolated	Indeno(1,2,3-cd)pyrene	Indeno(1,2,3-cd)pyrene	2.06E-04	mg/kg				S	2/21/2006	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ721	OCBS57S01	extrapolated	Naphthalene	Naphthalene	1.98E-02	mg/kg				S	2/21/2006	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ721	OCBS57S01	extrapolated	Perylene	Perylene	1.01E-03	mg/kg				S	2/21/2006	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ721	OCBS57S01	extrapolated	Phenanthrene	Phenanthrene	1.31E-02	mg/kg				S	2/21/2006	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ721	OCBS57S01	extrapolated	Pyrene	Pyrene	1.17E-03	mg/kg				S	2/21/2006	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ722	OCBS58S01	extrapolated	Benzene	Benzene	3.36E-04	mg/kg				S	2/21/2006	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ722	OCBS58S01	extrapolated	Ethylbenzene	Ethylbenzene	3.36E-04	mg/kg				S	2/21/2006	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ722	OCBS58S01	extrapolated	Toluene	Toluene	3.36E-04	mg/kg				S	2/21/2006	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ722	OCBS58S01	extrapolated	m,p-Xylene	m,p-Xylene	1.01E-03	mg/kg				S	2/21/2006	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ722	OCBS58S01	extrapolated	o-Xylene	o-Xylene	2.24E-04	mg/kg				S	2/21/2006	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ722	OCBS58S01	extrapolated	Xylene (total)	Xylenes (total)	1.23E-03	mg/kg				S	2/21/2006	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ722	OCBS58S01	extrapolated	2-Methylnaphthalene	2-Methylnaphthalene	7.71E-02	mg/kg				S	2/21/2006	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ722	OCBS58S01	extrapolated	Acenaphthene	Acenaphthene	4.81E-03	mg/kg				S	2/21/2006	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ722	OCBS58S01	extrapolated	Acenaphthylene	Acenaphthylene	5.89E-04	mg/kg				S	2/21/2006	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ722	OCBS58S01	extrapolated	Anthracene	Anthracene	3.14E-03	mg/kg				S	2/21/2006	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ722	OCBS58S01	extrapolated	Benzo(a)anthracene	Benzo(a)anthracene	2.27E-04	mg/kg				S	2/21/2006	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ722	OCBS58S01	extrapolated	Benzo(a)pyrene	Benzo(a)pyrene	2.29E-04	mg/kg				S	2/21/2006	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ722	OCBS58S01	extrapolated	Benzo(b)fluoranthene	Benzo(b)fluoranthene	3.64E-04	mg/kg				S	2/21/2006	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ722	OCBS58S01	extrapolated	Benzo(e)pyrene	Benzo(e)pyrene	1.74E-03	mg/kg				S	2/21/2006	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ722	OCBS58S01	extrapolated	Benzo(g,h,i)perylene	Benzo(g,h,i)perylene	1.86E-03	mg/kg				S	2/21/2006	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ722	OCBS58S01	extrapolated	Benzo(k)fluoranthene	Benzo(k)fluoranthene	1.72E-04	mg/kg				S	2/21/2006	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ722	OCBS58S01	extrapolated	Chrysene	Chrysene	4.93E-04	mg/kg				S	2/21/2006	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ722	OCBS58S01	extrapolated	Dibenz(a,h)anthracene	Dibenz(a,h)anthracene	9.30E-05	mg/kg				S	2/21/2006	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ722	OCBS58S01	extrapolated	Fluoranthene	Fluoranthene	6.28E-04	mg/kg				S	2/21/2006	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ722	OCBS58S01	extrapolated	Fluorene	Fluorene	4.77E-03	mg/kg				S	2/21/2006	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ722	OCBS58S01	extrapolated	Indeno(1,2,3-cd)pyrene	Indeno(1,2,3-cd)pyrene	2.02E-04	mg/kg				S	2/21/2006	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ722	OCBS58S01	extrapolated	Naphthalene	Naphthalene	1.95E-02	mg/kg				S	2/21/2006	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ722	OCBS58S01	extrapolated	Perylene	Perylene	9.90E-04	mg/kg				S	2/21/2006	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ722	OCBS58S01	extrapolated	Phenanthrene	Phenanthrene	1.29E-02	mg/kg				S	2/21/2006	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ722	OCBS58S01	extrapolated	Pyrene	Pyrene	1.15E-03	mg/kg				S	2/21/2006	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ735	OCBS10S01	summation	Total Tetra	Total Tetra	1.06E-05	mg/kg				S	4/10/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ735	OCBS10S01	summation	Total Penta	Total Penta	2.37E-05	mg/kg				S	4/10/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ735	OCBS10S01	summation	Total Hexa	Total Hexa	9.23E-05	mg/kg				S	4/10/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ735	OCBS10S01	summation	Total Hepta	Total Hepta	1.25E-03	mg/kg				S	4/10/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation

Table C7-2
Extrapolated Data
Old Conservation Yard RFI Site

EPA_NO	SAMPLE_ID	LAB_METHOD	ANALYTE	STD_ANALYT	CONCENTRAT	UNITS	REV_QUAL	Q_CODE	D_LIMIT	MATRIX	DATE_SAMP	DEPTH	SAMPLE_TYP	UNIT
MJ735	OCBS10S01	summation	Total Octa	Total Octa	1.39E-02	mg/kg				S	4/10/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ736	OCBS24S01	summation	Total Tetra	Total Tetra	1.10E-05	mg/kg				S	4/10/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ736	OCBS24S01	summation	Total Penta	Total Penta	2.50E-05	mg/kg				S	4/10/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ736	OCBS24S01	summation	Total Hexa	Total Hexa	1.03E-04	mg/kg				S	4/10/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ736	OCBS24S01	summation	Total Hepta	Total Hepta	1.20E-03	mg/kg				S	4/10/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ736	OCBS24S01	summation	Total Octa	Total Octa	1.12E-02	mg/kg				S	4/10/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ739	OCBS65S01	extrapolated	Benzene	Benzene	3.36E-04	mg/kg				S	4/11/2006	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ739	OCBS65S01	extrapolated	Ethylbenzene	Ethylbenzene	3.36E-04	mg/kg				S	4/11/2006	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ739	OCBS65S01	extrapolated	Toluene	Toluene	3.36E-04	mg/kg				S	4/11/2006	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ739	OCBS65S01	extrapolated	m,p-Xylene	m,p-Xylene	1.01E-03	mg/kg				S	4/11/2006	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ739	OCBS65S01	extrapolated	o-Xylene	o-Xylene	2.24E-04	mg/kg				S	4/11/2006	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ739	OCBS65S01	extrapolated	Xylene (total)	Xylenes (total)	1.23E-03	mg/kg				S	4/11/2006	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ739	OCBS65S01	extrapolated	2-Methylnaphthalene	2-Methylnaphthalene	7.71E-02	mg/kg				S	4/11/2006	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ739	OCBS65S01	extrapolated	Acenaphthene	Acenaphthene	4.81E-03	mg/kg				S	4/11/2006	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ739	OCBS65S01	extrapolated	Acenaphthylene	Acenaphthylene	5.89E-04	mg/kg				S	4/11/2006	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ739	OCBS65S01	extrapolated	Anthracene	Anthracene	3.14E-03	mg/kg				S	4/11/2006	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ739	OCBS65S01	extrapolated	Benzo(a)anthracene	Benzo(a)anthracene	2.27E-04	mg/kg				S	4/11/2006	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ739	OCBS65S01	extrapolated	Benzo(a)pyrene	Benzo(a)pyrene	2.29E-04	mg/kg				S	4/11/2006	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ739	OCBS65S01	extrapolated	Benzo(b)fluoranthene	Benzo(b)fluoranthene	3.64E-04	mg/kg				S	4/11/2006	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ739	OCBS65S01	extrapolated	Benzo(e)pyrene	Benzo(e)pyrene	1.74E-03	mg/kg				S	4/11/2006	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ739	OCBS65S01	extrapolated	Benzo(g,h,i)perylene	Benzo(g,h,i)perylene	1.86E-03	mg/kg				S	4/11/2006	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ739	OCBS65S01	extrapolated	Benzo(k)fluoranthene	Benzo(k)fluoranthene	1.72E-04	mg/kg				S	4/11/2006	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ739	OCBS65S01	extrapolated	Chrysene	Chrysene	4.93E-04	mg/kg				S	4/11/2006	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ739	OCBS65S01	extrapolated	Dibenz(a,h)anthracene	Dibenz(a,h)anthracene	9.30E-05	mg/kg				S	4/11/2006	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ739	OCBS65S01	extrapolated	Fluoranthene	Fluoranthene	6.28E-04	mg/kg				S	4/11/2006	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ739	OCBS65S01	extrapolated	Fluorene	Fluorene	4.77E-03	mg/kg				S	4/11/2006	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ739	OCBS65S01	extrapolated	Indeno(1,2,3-cd)pyrene	Indeno(1,2,3-cd)pyrene	2.02E-04	mg/kg				S	4/11/2006	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ739	OCBS65S01	extrapolated	Naphthalene	Naphthalene	1.95E-02	mg/kg				S	4/11/2006	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ739	OCBS65S01	extrapolated	Perylene	Perylene	9.90E-04	mg/kg				S	4/11/2006	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ739	OCBS65S01	extrapolated	Phenanthrene	Phenanthrene	1.29E-02	mg/kg				S	4/11/2006	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ739	OCBS65S01	extrapolated	Pyrene	Pyrene	1.15E-03	mg/kg				S	4/11/2006	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ739	OCBS65S01	extrapolated	PCB-105	PCB-105	5.20E-06	mg/kg				S	4/11/2006	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ739	OCBS65S01	extrapolated	PCB-114	PCB-114	1.91E-07	mg/kg				S	4/11/2006	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ739	OCBS65S01	extrapolated	PCB-118	PCB-118	1.13E-05	mg/kg				S	4/11/2006	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ739	OCBS65S01	extrapolated	PCB-123	PCB-123	1.26E-07	mg/kg				S	4/11/2006	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ739	OCBS65S01	extrapolated	PCB-126	PCB-126	3.16E-07	mg/kg				S	4/11/2006	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ739	OCBS65S01	extrapolated	PCB-156	PCB-156	2.64E-06	mg/kg				S	4/11/2006	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ739	OCBS65S01	extrapolated	PCB-157	PCB-157	1.03E-06	mg/kg				S	4/11/2006	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ739	OCBS65S01	extrapolated	PCB-167	PCB-167	1.79E-06	mg/kg				S	4/11/2006	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ739	OCBS65S01	extrapolated	PCB-169	PCB-169	2.67E-08	mg/kg				S	4/11/2006	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ739	OCBS65S01	extrapolated	PCB-189	PCB-189	2.67E-07	mg/kg				S	4/11/2006	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ739	OCBS65S01	extrapolated	PCB-77	PCB-77	6.49E-07	mg/kg				S	4/11/2006	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ739	OCBS65S01	extrapolated	PCB-81	PCB-81	1.26E-07	mg/kg				S	4/11/2006	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ744	OCBS66S01	extrapolated	PCB-105	PCB-105	3.22E-05	mg/kg				S	4/11/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ744	OCBS66S01	extrapolated	PCB-114	PCB-114	1.18E-06	mg/kg				S	4/11/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ744	OCBS66S01	extrapolated	PCB-118	PCB-118	6.97E-05	mg/kg				S	4/11/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ744	OCBS66S01	extrapolated	PCB-123	PCB-123	7.77E-07	mg/kg				S	4/11/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ744	OCBS66S01	extrapolated	PCB-126	PCB-126	1.96E-06	mg/kg				S	4/11/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ744	OCBS66S01	extrapolated	PCB-156	PCB-156	1.64E-05	mg/kg				S	4/11/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ744	OCBS66S01	extrapolated	PCB-157	PCB-157	3.22E-06	mg/kg				S	4/11/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ744	OCBS66S01	extrapolated	PCB-167	PCB-167	5.36E-06	mg/kg				S	4/11/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation

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Extrapolated Data
Old Conservation Yard RFI Site

EPA_NO	SAMPLE_ID	LAB_METHOD	ANALYTE	STD_ANALYT	CONCENTRAT	UNITS	REV_QUAL	Q_CODE	D_LIMIT	MATRIX	DATE_SAMP	DEPTH	SAMPLE_TYP	UNIT
MJ744	OCBS66S01	extrapolated	PCB-169	PCB-169	9.52E-08	mg/kg				S	4/11/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ744	OCBS66S01	extrapolated	PCB-189	PCB-189	7.77E-07	mg/kg				S	4/11/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ744	OCBS66S01	extrapolated	PCB-77	PCB-77	4.02E-06	mg/kg				S	4/11/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ744	OCBS66S01	extrapolated	PCB-81	PCB-81	7.77E-07	mg/kg				S	4/11/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ745	OCBS68S01	extrapolated	PCB-105	PCB-105	4.33E-05	mg/kg				S	4/11/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ745	OCBS68S01	extrapolated	PCB-114	PCB-114	1.59E-06	mg/kg				S	4/11/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ745	OCBS68S01	extrapolated	PCB-118	PCB-118	9.38E-05	mg/kg				S	4/11/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ745	OCBS68S01	extrapolated	PCB-123	PCB-123	1.05E-06	mg/kg				S	4/11/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ745	OCBS68S01	extrapolated	PCB-126	PCB-126	2.63E-06	mg/kg				S	4/11/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ745	OCBS68S01	extrapolated	PCB-156	PCB-156	2.20E-05	mg/kg				S	4/11/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ745	OCBS68S01	extrapolated	PCB-157	PCB-157	4.33E-06	mg/kg				S	4/11/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ745	OCBS68S01	extrapolated	PCB-167	PCB-167	7.22E-06	mg/kg				S	4/11/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ745	OCBS68S01	extrapolated	PCB-169	PCB-169	1.28E-07	mg/kg				S	4/11/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ745	OCBS68S01	extrapolated	PCB-189	PCB-189	1.05E-06	mg/kg				S	4/11/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ745	OCBS68S01	extrapolated	PCB-77	PCB-77	5.41E-06	mg/kg				S	4/11/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ745	OCBS68S01	extrapolated	PCB-81	PCB-81	1.05E-06	mg/kg				S	4/11/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ746	OCBS66S02	extrapolated	PCB-105	PCB-105	1.11E-05	mg/kg				S	4/11/2006	3.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ746	OCBS66S02	extrapolated	PCB-114	PCB-114	4.08E-07	mg/kg				S	4/11/2006	3.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ746	OCBS66S02	extrapolated	PCB-118	PCB-118	2.41E-05	mg/kg				S	4/11/2006	3.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ746	OCBS66S02	extrapolated	PCB-123	PCB-123	2.69E-07	mg/kg				S	4/11/2006	3.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ746	OCBS66S02	extrapolated	PCB-126	PCB-126	6.77E-07	mg/kg				S	4/11/2006	3.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ746	OCBS66S02	extrapolated	PCB-156	PCB-156	5.66E-06	mg/kg				S	4/11/2006	3.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ746	OCBS66S02	extrapolated	PCB-157	PCB-157	2.21E-06	mg/kg				S	4/11/2006	3.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ746	OCBS66S02	extrapolated	PCB-167	PCB-167	3.85E-06	mg/kg				S	4/11/2006	3.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ746	OCBS66S02	extrapolated	PCB-169	PCB-169	5.73E-08	mg/kg				S	4/11/2006	3.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ746	OCBS66S02	extrapolated	PCB-189	PCB-189	5.73E-07	mg/kg				S	4/11/2006	3.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ746	OCBS66S02	extrapolated	PCB-77	PCB-77	1.39E-06	mg/kg				S	4/11/2006	3.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ746	OCBS66S02	extrapolated	PCB-81	PCB-81	2.69E-07	mg/kg				S	4/11/2006	3.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ747	OCBS68S02	extrapolated	PCB-105	PCB-105	1.11E-05	mg/kg				S	4/11/2006	3.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ747	OCBS68S02	extrapolated	PCB-114	PCB-114	4.08E-07	mg/kg				S	4/11/2006	3.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ747	OCBS68S02	extrapolated	PCB-118	PCB-118	2.41E-05	mg/kg				S	4/11/2006	3.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ747	OCBS68S02	extrapolated	PCB-123	PCB-123	2.69E-07	mg/kg				S	4/11/2006	3.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ747	OCBS68S02	extrapolated	PCB-126	PCB-126	6.77E-07	mg/kg				S	4/11/2006	3.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ747	OCBS68S02	extrapolated	PCB-156	PCB-156	5.66E-06	mg/kg				S	4/11/2006	3.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ747	OCBS68S02	extrapolated	PCB-157	PCB-157	2.21E-06	mg/kg				S	4/11/2006	3.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ747	OCBS68S02	extrapolated	PCB-167	PCB-167	3.85E-06	mg/kg				S	4/11/2006	3.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ747	OCBS68S02	extrapolated	PCB-169	PCB-169	5.73E-08	mg/kg				S	4/11/2006	3.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ747	OCBS68S02	extrapolated	PCB-189	PCB-189	5.73E-07	mg/kg				S	4/11/2006	3.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ747	OCBS68S02	extrapolated	PCB-77	PCB-77	1.39E-06	mg/kg				S	4/11/2006	3.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ747	OCBS68S02	extrapolated	PCB-81	PCB-81	2.69E-07	mg/kg				S	4/11/2006	3.00000	Primary Sample	SWMU 7.4 - Old Conservation
MJ748	OCBS67S01	extrapolated	PCB-105	PCB-105	2.72E-05	mg/kg				S	4/11/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ748	OCBS67S01	extrapolated	PCB-114	PCB-114	9.98E-07	mg/kg				S	4/11/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ748	OCBS67S01	extrapolated	PCB-118	PCB-118	5.90E-05	mg/kg				S	4/11/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ748	OCBS67S01	extrapolated	PCB-123	PCB-123	6.58E-07	mg/kg				S	4/11/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ748	OCBS67S01	extrapolated	PCB-126	PCB-126	1.66E-06	mg/kg				S	4/11/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ748	OCBS67S01	extrapolated	PCB-156	PCB-156	1.38E-05	mg/kg				S	4/11/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ748	OCBS67S01	extrapolated	PCB-157	PCB-157	4.91E-06	mg/kg				S	4/11/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ748	OCBS67S01	extrapolated	PCB-167	PCB-167	8.55E-06	mg/kg				S	4/11/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ748	OCBS67S01	extrapolated	PCB-169	PCB-169	1.27E-07	mg/kg				S	4/11/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ748	OCBS67S01	extrapolated	PCB-189	PCB-189	1.27E-06	mg/kg				S	4/11/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ748	OCBS67S01	extrapolated	PCB-77	PCB-77	3.40E-06	mg/kg				S	4/11/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation

Table C7-2
Extrapolated Data
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EPA_NO	SAMPLE_ID	LAB_METHOD	ANALYTE	STD_ANALYT	CONCENTRAT	UNITS	REV_QUAL	Q_CODE	D_LIMIT	MATRIX	DATE_SAMP	DEPTH	SAMPLE_TYP	UNIT
MJ748	OCBS67S01	extrapolated	PCB-81	PCB-81	6.58E-07	mg/kg				S	4/11/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ750	OCBS69S01	extrapolated	PCB-105	PCB-105	5.69E-05	mg/kg				S	4/11/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ750	OCBS69S01	extrapolated	PCB-114	PCB-114	2.09E-06	mg/kg				S	4/11/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ750	OCBS69S01	extrapolated	PCB-118	PCB-118	1.23E-04	mg/kg				S	4/11/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ750	OCBS69S01	extrapolated	PCB-123	PCB-123	1.38E-06	mg/kg				S	4/11/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ750	OCBS69S01	extrapolated	PCB-126	PCB-126	3.46E-06	mg/kg				S	4/11/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ750	OCBS69S01	extrapolated	PCB-156	PCB-156	2.89E-05	mg/kg				S	4/11/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ750	OCBS69S01	extrapolated	PCB-157	PCB-157	5.69E-06	mg/kg				S	4/11/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ750	OCBS69S01	extrapolated	PCB-167	PCB-167	9.48E-06	mg/kg				S	4/11/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ750	OCBS69S01	extrapolated	PCB-169	PCB-169	1.68E-07	mg/kg				S	4/11/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ750	OCBS69S01	extrapolated	PCB-189	PCB-189	1.38E-06	mg/kg				S	4/11/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ750	OCBS69S01	extrapolated	PCB-77	PCB-77	7.11E-06	mg/kg				S	4/11/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ750	OCBS69S01	extrapolated	PCB-81	PCB-81	1.38E-06	mg/kg				S	4/11/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ752	OCBS70S01	extrapolated	PCB-105	PCB-105	5.51E-06	mg/kg				S	4/11/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ752	OCBS70S01	extrapolated	PCB-114	PCB-114	2.02E-07	mg/kg				S	4/11/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ752	OCBS70S01	extrapolated	PCB-118	PCB-118	1.19E-05	mg/kg				S	4/11/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ752	OCBS70S01	extrapolated	PCB-123	PCB-123	1.33E-07	mg/kg				S	4/11/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ752	OCBS70S01	extrapolated	PCB-126	PCB-126	3.35E-07	mg/kg				S	4/11/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ752	OCBS70S01	extrapolated	PCB-156	PCB-156	2.80E-06	mg/kg				S	4/11/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ752	OCBS70S01	extrapolated	PCB-157	PCB-157	1.09E-06	mg/kg				S	4/11/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ752	OCBS70S01	extrapolated	PCB-167	PCB-167	1.90E-06	mg/kg				S	4/11/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ752	OCBS70S01	extrapolated	PCB-169	PCB-169	2.83E-08	mg/kg				S	4/11/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ752	OCBS70S01	extrapolated	PCB-189	PCB-189	2.83E-07	mg/kg				S	4/11/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ752	OCBS70S01	extrapolated	PCB-77	PCB-77	6.88E-07	mg/kg				S	4/11/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ752	OCBS70S01	extrapolated	PCB-81	PCB-81	1.33E-07	mg/kg				S	4/11/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ754	OCBS71S01	extrapolated	PCB-105	PCB-105	2.97E-05	mg/kg				S	4/11/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ754	OCBS71S01	extrapolated	PCB-114	PCB-114	1.09E-06	mg/kg				S	4/11/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ754	OCBS71S01	extrapolated	PCB-118	PCB-118	6.43E-05	mg/kg				S	4/11/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ754	OCBS71S01	extrapolated	PCB-123	PCB-123	7.18E-07	mg/kg				S	4/11/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ754	OCBS71S01	extrapolated	PCB-126	PCB-126	1.81E-06	mg/kg				S	4/11/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ754	OCBS71S01	extrapolated	PCB-156	PCB-156	1.51E-05	mg/kg				S	4/11/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ754	OCBS71S01	extrapolated	PCB-157	PCB-157	2.97E-06	mg/kg				S	4/11/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ754	OCBS71S01	extrapolated	PCB-167	PCB-167	4.95E-06	mg/kg				S	4/11/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ754	OCBS71S01	extrapolated	PCB-169	PCB-169	8.78E-08	mg/kg				S	4/11/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ754	OCBS71S01	extrapolated	PCB-189	PCB-189	7.18E-07	mg/kg				S	4/11/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ754	OCBS71S01	extrapolated	PCB-77	PCB-77	3.71E-06	mg/kg				S	4/11/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ754	OCBS71S01	extrapolated	PCB-81	PCB-81	7.18E-07	mg/kg				S	4/11/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ756	OCBS72S01	extrapolated	PCB-105	PCB-105	7.42E-06	mg/kg				S	4/11/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ756	OCBS72S01	extrapolated	PCB-114	PCB-114	2.72E-07	mg/kg				S	4/11/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ756	OCBS72S01	extrapolated	PCB-118	PCB-118	1.61E-05	mg/kg				S	4/11/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ756	OCBS72S01	extrapolated	PCB-123	PCB-123	1.79E-07	mg/kg				S	4/11/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ756	OCBS72S01	extrapolated	PCB-126	PCB-126	4.52E-07	mg/kg				S	4/11/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ756	OCBS72S01	extrapolated	PCB-156	PCB-156	3.77E-06	mg/kg				S	4/11/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ756	OCBS72S01	extrapolated	PCB-157	PCB-157	1.03E-06	mg/kg				S	4/11/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ756	OCBS72S01	extrapolated	PCB-167	PCB-167	1.79E-06	mg/kg				S	4/11/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ756	OCBS72S01	extrapolated	PCB-169	PCB-169	2.67E-08	mg/kg				S	4/11/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ756	OCBS72S01	extrapolated	PCB-189	PCB-189	2.67E-07	mg/kg				S	4/11/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ756	OCBS72S01	extrapolated	PCB-77	PCB-77	9.28E-07	mg/kg				S	4/11/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ756	OCBS72S01	extrapolated	PCB-81	PCB-81	1.79E-07	mg/kg				S	4/11/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ759	OCBS73S01	extrapolated	PCB-105	PCB-105	5.94E-05	mg/kg				S	4/11/2006	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ759	OCBS73S01	extrapolated	PCB-114	PCB-114	2.18E-06	mg/kg				S	4/11/2006	4.50000	Primary Sample	SWMU 7.4 - Old Conservation

Table C7-2
Extrapolated Data
Old Conservation Yard RFI Site

EPA_NO	SAMPLE_ID	LAB_METHOD	ANALYTE	STD_ANALYT	CONCENTRAT	UNITS	REV_QUAL	Q_CODE	D_LIMIT	MATRIX	DATE_SAMP	DEPTH	SAMPLE_TYP	UNIT
MJ759	OCBS73S01	extrapolated	PCB-118	PCB-118	1.29E-04	mg/kg				S	4/11/2006	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ759	OCBS73S01	extrapolated	PCB-123	PCB-123	1.44E-06	mg/kg				S	4/11/2006	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ759	OCBS73S01	extrapolated	PCB-126	PCB-126	3.61E-06	mg/kg				S	4/11/2006	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ759	OCBS73S01	extrapolated	PCB-156	PCB-156	3.02E-05	mg/kg				S	4/11/2006	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ759	OCBS73S01	extrapolated	PCB-157	PCB-157	5.94E-06	mg/kg				S	4/11/2006	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ759	OCBS73S01	extrapolated	PCB-167	PCB-167	9.90E-06	mg/kg				S	4/11/2006	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ759	OCBS73S01	extrapolated	PCB-169	PCB-169	1.76E-07	mg/kg				S	4/11/2006	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ759	OCBS73S01	extrapolated	PCB-189	PCB-189	1.44E-06	mg/kg				S	4/11/2006	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ759	OCBS73S01	extrapolated	PCB-77	PCB-77	7.42E-06	mg/kg				S	4/11/2006	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ759	OCBS73S01	extrapolated	PCB-81	PCB-81	1.44E-06	mg/kg				S	4/11/2006	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ761	OCBS74S01	extrapolated	PCB-105	PCB-105	8.16E-05	mg/kg				S	4/11/2006	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ761	OCBS74S01	extrapolated	PCB-114	PCB-114	2.99E-06	mg/kg				S	4/11/2006	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ761	OCBS74S01	extrapolated	PCB-118	PCB-118	1.77E-04	mg/kg				S	4/11/2006	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ761	OCBS74S01	extrapolated	PCB-123	PCB-123	1.97E-06	mg/kg				S	4/11/2006	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ761	OCBS74S01	extrapolated	PCB-126	PCB-126	4.97E-06	mg/kg				S	4/11/2006	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ761	OCBS74S01	extrapolated	PCB-156	PCB-156	4.15E-05	mg/kg				S	4/11/2006	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ761	OCBS74S01	extrapolated	PCB-157	PCB-157	8.16E-06	mg/kg				S	4/11/2006	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ761	OCBS74S01	extrapolated	PCB-167	PCB-167	1.36E-05	mg/kg				S	4/11/2006	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ761	OCBS74S01	extrapolated	PCB-169	PCB-169	2.42E-07	mg/kg				S	4/11/2006	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ761	OCBS74S01	extrapolated	PCB-189	PCB-189	1.97E-06	mg/kg				S	4/11/2006	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ761	OCBS74S01	extrapolated	PCB-77	PCB-77	1.02E-05	mg/kg				S	4/11/2006	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ761	OCBS74S01	extrapolated	PCB-81	PCB-81	1.97E-06	mg/kg				S	4/11/2006	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ763	OCBS75S01	extrapolated	PCB-105	PCB-105	1.18E-05	mg/kg				S	4/11/2006	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ763	OCBS75S01	extrapolated	PCB-114	PCB-114	4.31E-07	mg/kg				S	4/11/2006	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ763	OCBS75S01	extrapolated	PCB-118	PCB-118	2.55E-05	mg/kg				S	4/11/2006	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ763	OCBS75S01	extrapolated	PCB-123	PCB-123	2.84E-07	mg/kg				S	4/11/2006	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ763	OCBS75S01	extrapolated	PCB-126	PCB-126	7.15E-07	mg/kg				S	4/11/2006	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ763	OCBS75S01	extrapolated	PCB-156	PCB-156	5.97E-06	mg/kg				S	4/11/2006	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ763	OCBS75S01	extrapolated	PCB-157	PCB-157	2.33E-06	mg/kg				S	4/11/2006	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ763	OCBS75S01	extrapolated	PCB-167	PCB-167	4.06E-06	mg/kg				S	4/11/2006	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ763	OCBS75S01	extrapolated	PCB-169	PCB-169	6.05E-08	mg/kg				S	4/11/2006	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ763	OCBS75S01	extrapolated	PCB-189	PCB-189	6.05E-07	mg/kg				S	4/11/2006	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ763	OCBS75S01	extrapolated	PCB-77	PCB-77	1.47E-06	mg/kg				S	4/11/2006	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ763	OCBS75S01	extrapolated	PCB-81	PCB-81	2.84E-07	mg/kg				S	4/11/2006	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ781	OCBS76S01	extrapolated	PCB-105	PCB-105	5.51E-06	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ781	OCBS76S01	extrapolated	PCB-114	PCB-114	2.02E-07	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ781	OCBS76S01	extrapolated	PCB-118	PCB-118	1.19E-05	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ781	OCBS76S01	extrapolated	PCB-123	PCB-123	1.33E-07	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ781	OCBS76S01	extrapolated	PCB-126	PCB-126	3.35E-07	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ781	OCBS76S01	extrapolated	PCB-156	PCB-156	2.80E-06	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ781	OCBS76S01	extrapolated	PCB-157	PCB-157	1.09E-06	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ781	OCBS76S01	extrapolated	PCB-167	PCB-167	1.90E-06	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ781	OCBS76S01	extrapolated	PCB-169	PCB-169	2.83E-08	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ781	OCBS76S01	extrapolated	PCB-189	PCB-189	2.83E-07	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ781	OCBS76S01	extrapolated	PCB-77	PCB-77	6.88E-07	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ781	OCBS76S01	extrapolated	PCB-81	PCB-81	1.33E-07	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ782RE	OCBS77S01	extrapolated	PCB-105	PCB-105	6.68E-04	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ782RE	OCBS77S01	extrapolated	PCB-114	PCB-114	2.45E-05	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ782RE	OCBS77S01	extrapolated	PCB-118	PCB-118	1.45E-03	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ782RE	OCBS77S01	extrapolated	PCB-123	PCB-123	1.61E-05	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ782RE	OCBS77S01	extrapolated	PCB-126	PCB-126	4.06E-05	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation

Table C7-2
Extrapolated Data
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EPA_NO	SAMPLE_ID	LAB_METHOD	ANALYTE	STD_ANALYT	CONCENTRAT	UNITS	REV_QUAL	Q_CODE	D_LIMIT	MATRIX	DATE_SAMP	DEPTH	SAMPLE_TYP	UNIT
MJ782RE	OCBS77S01	extrapolated	PCB-156	PCB-156	3.40E-04	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ782RE	OCBS77S01	extrapolated	PCB-157	PCB-157	6.68E-05	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ782RE	OCBS77S01	extrapolated	PCB-167	PCB-167	1.11E-04	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ782RE	OCBS77S01	extrapolated	PCB-169	PCB-169	1.98E-06	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ782RE	OCBS77S01	extrapolated	PCB-189	PCB-189	1.61E-05	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ782RE	OCBS77S01	extrapolated	PCB-77	PCB-77	8.35E-05	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ782RE	OCBS77S01	extrapolated	PCB-81	PCB-81	1.61E-05	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ783	OCBS78S01	extrapolated	PCB-105	PCB-105	5.51E-06	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ783	OCBS78S01	extrapolated	PCB-114	PCB-114	2.02E-07	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ783	OCBS78S01	extrapolated	PCB-118	PCB-118	1.19E-05	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ783	OCBS78S01	extrapolated	PCB-123	PCB-123	1.33E-07	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ783	OCBS78S01	extrapolated	PCB-126	PCB-126	3.35E-07	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ783	OCBS78S01	extrapolated	PCB-156	PCB-156	2.80E-06	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ783	OCBS78S01	extrapolated	PCB-157	PCB-157	1.09E-06	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ783	OCBS78S01	extrapolated	PCB-167	PCB-167	1.90E-06	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ783	OCBS78S01	extrapolated	PCB-169	PCB-169	2.83E-08	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ783	OCBS78S01	extrapolated	PCB-189	PCB-189	2.83E-07	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ783	OCBS78S01	extrapolated	PCB-77	PCB-77	6.88E-07	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ783	OCBS78S01	extrapolated	PCB-81	PCB-81	1.33E-07	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ784	OCBS79S01	extrapolated	PCB-105	PCB-105	5.15E-02	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ784	OCBS79S01	extrapolated	PCB-114	PCB-114	9.16E-04	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ784	OCBS79S01	extrapolated	PCB-118	PCB-118	1.03E-01	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ784	OCBS79S01	extrapolated	PCB-123	PCB-123	1.46E-03	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ784	OCBS79S01	extrapolated	PCB-126	PCB-126	4.01E-03	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ784	OCBS79S01	extrapolated	PCB-156	PCB-156	3.44E-02	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ784	OCBS79S01	extrapolated	PCB-157	PCB-157	1.55E-02	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ784	OCBS79S01	extrapolated	PCB-167	PCB-167	2.69E-02	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ784	OCBS79S01	extrapolated	PCB-169	PCB-169	4.01E-04	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ784	OCBS79S01	extrapolated	PCB-189	PCB-189	4.01E-03	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ784	OCBS79S01	extrapolated	PCB-77	PCB-77	8.02E-03	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ784	OCBS79S01	extrapolated	PCB-81	PCB-81	1.42E-03	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ786	OCBS80S01	extrapolated	PCB-105	PCB-105	5.81E-06	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ786	OCBS80S01	extrapolated	PCB-114	PCB-114	2.13E-07	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ786	OCBS80S01	extrapolated	PCB-118	PCB-118	1.26E-05	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ786	OCBS80S01	extrapolated	PCB-123	PCB-123	1.41E-07	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ786	OCBS80S01	extrapolated	PCB-126	PCB-126	3.54E-07	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ786	OCBS80S01	extrapolated	PCB-156	PCB-156	2.96E-06	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ786	OCBS80S01	extrapolated	PCB-157	PCB-157	1.15E-06	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ786	OCBS80S01	extrapolated	PCB-167	PCB-167	2.01E-06	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ786	OCBS80S01	extrapolated	PCB-169	PCB-169	2.99E-08	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ786	OCBS80S01	extrapolated	PCB-189	PCB-189	2.99E-07	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ786	OCBS80S01	extrapolated	PCB-77	PCB-77	7.27E-07	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ786	OCBS80S01	extrapolated	PCB-81	PCB-81	1.41E-07	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ787	OCBS81S01	extrapolated	PCB-105	PCB-105	3.09E-05	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ787	OCBS81S01	extrapolated	PCB-114	PCB-114	1.13E-06	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ787	OCBS81S01	extrapolated	PCB-118	PCB-118	6.70E-05	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ787	OCBS81S01	extrapolated	PCB-123	PCB-123	7.47E-07	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ787	OCBS81S01	extrapolated	PCB-126	PCB-126	1.88E-06	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ787	OCBS81S01	extrapolated	PCB-156	PCB-156	1.57E-05	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ787	OCBS81S01	extrapolated	PCB-157	PCB-157	3.09E-06	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ787	OCBS81S01	extrapolated	PCB-167	PCB-167	5.15E-06	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation

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Extrapolated Data
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EPA_NO	SAMPLE_ID	LAB_METHOD	ANALYTE	STD_ANALYT	CONCENTRAT	UNITS	REV_QUAL	Q_CODE	D_LIMIT	MATRIX	DATE_SAMP	DEPTH	SAMPLE_TYP	UNIT
MJ787	OCBS81S01	extrapolated	PCB-169	PCB-169	9.15E-08	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ787	OCBS81S01	extrapolated	PCB-189	PCB-189	7.47E-07	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ787	OCBS81S01	extrapolated	PCB-77	PCB-77	3.87E-06	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ787	OCBS81S01	extrapolated	PCB-81	PCB-81	7.47E-07	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ787	OCBS81S01	extrapolated	Benzene	Benzene	3.60E-04	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ787	OCBS81S01	extrapolated	Ethylbenzene	Ethylbenzene	3.60E-04	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ787	OCBS81S01	extrapolated	Toluene	Toluene	3.60E-04	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ787	OCBS81S01	extrapolated	m,p-Xylene	m,p-Xylene	1.08E-03	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ787	OCBS81S01	extrapolated	o-Xylene	o-Xylene	2.40E-04	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ787	OCBS81S01	extrapolated	Xylene (total)	Xylenes (total)	1.32E-03	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ787	OCBS81S01	extrapolated	Acenaphthylene	Acenaphthylene	2.19E-03	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ787	OCBS81S01	extrapolated	Anthracene	Anthracene	1.17E-02	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ787	OCBS81S01	extrapolated	Benzo(e)pyrene	Benzo(e)pyrene	6.45E-03	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ787	OCBS81S01	extrapolated	Benzo(k)fluoranthene	Benzo(k)fluoranthene	6.40E-04	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ787	OCBS81S01	extrapolated	Dibenzo(a,h)anthracene	Dibenz(a,h)anthracene	3.45E-04	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ787	OCBS81S01	extrapolated	Indeno(1,2,3-cd)pyrene	Indeno(1,2,3-cd)pyrene	7.51E-04	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ787	OCBS81S01	extrapolated	Perylene	Perylene	3.68E-03	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ788	OCBS82S01	extrapolated	PCB-105	PCB-105	5.63E-06	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ788	OCBS82S01	extrapolated	PCB-114	PCB-114	2.06E-07	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ788	OCBS82S01	extrapolated	PCB-118	PCB-118	1.22E-05	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ788	OCBS82S01	extrapolated	PCB-123	PCB-123	1.36E-07	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ788	OCBS82S01	extrapolated	PCB-126	PCB-126	3.42E-07	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ788	OCBS82S01	extrapolated	PCB-156	PCB-156	2.86E-06	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ788	OCBS82S01	extrapolated	PCB-157	PCB-157	1.12E-06	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ788	OCBS82S01	extrapolated	PCB-167	PCB-167	1.94E-06	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ788	OCBS82S01	extrapolated	PCB-169	PCB-169	2.90E-08	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ788	OCBS82S01	extrapolated	PCB-189	PCB-189	2.90E-07	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ788	OCBS82S01	extrapolated	PCB-77	PCB-77	7.04E-07	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ788	OCBS82S01	extrapolated	PCB-81	PCB-81	1.36E-07	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ788	OCBS82S01	extrapolated	Benzene	Benzene	3.66E-04	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ788	OCBS82S01	extrapolated	Ethylbenzene	Ethylbenzene	3.66E-04	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ788	OCBS82S01	extrapolated	Toluene	Toluene	3.66E-04	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ788	OCBS82S01	extrapolated	m,p-Xylene	m,p-Xylene	1.10E-03	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ788	OCBS82S01	extrapolated	o-Xylene	o-Xylene	2.44E-04	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ788	OCBS82S01	extrapolated	Xylene (total)	Xylenes (total)	1.34E-03	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ788	OCBS82S01	extrapolated	Acenaphthene	Acenaphthene	4.93E-03	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ788	OCBS82S01	extrapolated	Acenaphthylene	Acenaphthylene	6.03E-04	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ788	OCBS82S01	extrapolated	Anthracene	Anthracene	3.21E-03	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ788	OCBS82S01	extrapolated	Benzo(a)pyrene	Benzo(a)pyrene	2.34E-04	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ788	OCBS82S01	extrapolated	Benzo(b)fluoranthene	Benzo(b)fluoranthene	3.72E-04	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ788	OCBS82S01	extrapolated	Benzo(e)pyrene	Benzo(e)pyrene	1.78E-03	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ788	OCBS82S01	extrapolated	Benzo(g,h,i)perylene	Benzo(g,h,i)perylene	1.90E-03	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ788	OCBS82S01	extrapolated	Benzo(k)fluoranthene	Benzo(k)fluoranthene	1.76E-04	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ788	OCBS82S01	extrapolated	Chrysene	Chrysene	5.04E-04	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ788	OCBS82S01	extrapolated	Dibenzo(a,h)anthracene	Dibenz(a,h)anthracene	9.52E-05	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ788	OCBS82S01	extrapolated	Fluoranthene	Fluoranthene	6.43E-04	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ788	OCBS82S01	extrapolated	Fluorene	Fluorene	4.88E-03	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ788	OCBS82S01	extrapolated	Indeno(1,2,3-cd)pyrene	Indeno(1,2,3-cd)pyrene	2.07E-04	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ788	OCBS82S01	extrapolated	Perylene	Perylene	1.01E-03	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ788	OCBS82S01	extrapolated	Pyrene	Pyrene	1.17E-03	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ789	OCBS83S01	extrapolated	PCB-105	PCB-105	3.46E-06	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation

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Extrapolated Data
Old Conservation Yard RFI Site

EPA_NO	SAMPLE_ID	LAB_METHOD	ANALYTE	STD_ANALYT	CONCENTRAT	UNITS	REV_QUAL	Q_CODE	D_LIMIT	MATRIX	DATE_SAMP	DEPTH	SAMPLE_TYP	UNIT
MJ789	OCBS83S01	extrapolated	PCB-114	PCB-114	1.27E-07	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ789	OCBS83S01	extrapolated	PCB-118	PCB-118	7.51E-06	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ789	OCBS83S01	extrapolated	PCB-123	PCB-123	8.37E-08	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ789	OCBS83S01	extrapolated	PCB-126	PCB-126	2.11E-07	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ789	OCBS83S01	extrapolated	PCB-156	PCB-156	1.76E-06	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ789	OCBS83S01	extrapolated	PCB-157	PCB-157	6.87E-07	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ789	OCBS83S01	extrapolated	PCB-167	PCB-167	1.20E-06	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ789	OCBS83S01	extrapolated	PCB-169	PCB-169	1.78E-08	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ789	OCBS83S01	extrapolated	PCB-189	PCB-189	1.78E-07	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ789	OCBS83S01	extrapolated	PCB-77	PCB-77	4.33E-07	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ789	OCBS83S01	extrapolated	PCB-81	PCB-81	8.37E-08	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ789	OCBS83S01	extrapolated	Benzene	Benzene	2.76E-04	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ789	OCBS83S01	extrapolated	Ethylbenzene	Ethylbenzene	2.76E-04	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ789	OCBS83S01	extrapolated	Toluene	Toluene	2.76E-04	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ789	OCBS83S01	extrapolated	m,p-Xylene	m,p-Xylene	8.28E-04	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ789	OCBS83S01	extrapolated	o-Xylene	o-Xylene	1.84E-04	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ789	OCBS83S01	extrapolated	Xylene (total)	Xylenes (total)	1.01E-03	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ789	OCBS83S01	extrapolated	Acenaphthylene	Acenaphthylene	1.41E-03	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ789	OCBS83S01	extrapolated	Anthracene	Anthracene	7.51E-03	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ789	OCBS83S01	extrapolated	Benzo(a)anthracene	Benzo(a)anthracene	5.42E-04	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ789	OCBS83S01	extrapolated	Benzo(a)pyrene	Benzo(a)pyrene	5.47E-04	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ789	OCBS83S01	extrapolated	Benzo(b)fluoranthene	Benzo(b)fluoranthene	8.70E-04	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ789	OCBS83S01	extrapolated	Benzo(e)pyrene	Benzo(e)pyrene	4.16E-03	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ789	OCBS83S01	extrapolated	Benzo(g,h,i)perylene	Benzo(g,h,i)perylene	4.45E-03	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ789	OCBS83S01	extrapolated	Benzo(k)fluoranthene	Benzo(k)fluoranthene	4.12E-04	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ789	OCBS83S01	extrapolated	Chrysene	Chrysene	1.18E-03	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ789	OCBS83S01	extrapolated	Dibenzo(a,h)anthracene	Dibenz(a,h)anthracene	2.23E-04	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ789	OCBS83S01	extrapolated	Fluoranthene	Fluoranthene	1.50E-03	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ789	OCBS83S01	extrapolated	Indeno(1,2,3-cd)pyrene	Indeno(1,2,3-cd)pyrene	4.84E-04	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ789	OCBS83S01	extrapolated	Perylene	Perylene	2.37E-03	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ789	OCBS83S01	extrapolated	Pyrene	Pyrene	2.74E-03	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ790	OCBS84S01	extrapolated	PCB-105	PCB-105	5.63E-06	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ790	OCBS84S01	extrapolated	PCB-114	PCB-114	2.06E-07	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ790	OCBS84S01	extrapolated	PCB-118	PCB-118	1.22E-05	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ790	OCBS84S01	extrapolated	PCB-123	PCB-123	1.36E-07	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ790	OCBS84S01	extrapolated	PCB-126	PCB-126	3.42E-07	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ790	OCBS84S01	extrapolated	PCB-156	PCB-156	2.86E-06	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ790	OCBS84S01	extrapolated	PCB-157	PCB-157	1.12E-06	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ790	OCBS84S01	extrapolated	PCB-167	PCB-167	1.94E-06	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ790	OCBS84S01	extrapolated	PCB-169	PCB-169	2.90E-08	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ790	OCBS84S01	extrapolated	PCB-189	PCB-189	2.90E-07	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ790	OCBS84S01	extrapolated	PCB-77	PCB-77	7.04E-07	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ790	OCBS84S01	extrapolated	PCB-81	PCB-81	1.36E-07	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ790	OCBS84S01	extrapolated	Benzene	Benzene	3.24E-04	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ790	OCBS84S01	extrapolated	Ethylbenzene	Ethylbenzene	3.24E-04	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ790	OCBS84S01	extrapolated	Toluene	Toluene	3.24E-04	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ790	OCBS84S01	extrapolated	m,p-Xylene	m,p-Xylene	9.72E-04	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ790	OCBS84S01	extrapolated	o-Xylene	o-Xylene	2.16E-04	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ790	OCBS84S01	extrapolated	Xylene (total)	Xylenes (total)	1.19E-03	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ790	OCBS84S01	extrapolated	Acenaphthene	Acenaphthene	9.25E-03	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ790	OCBS84S01	extrapolated	Acenaphthylene	Acenaphthylene	1.13E-03	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation

Table C7-2
Extrapolated Data
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EPA_NO	SAMPLE_ID	LAB_METHOD	ANALYTE	STD_ANALYT	CONCENTRAT	UNITS	REV_QUAL	Q_CODE	D_LIMIT	MATRIX	DATE_SAMP	DEPTH	SAMPLE_TYP	UNIT
MJ790	OCBS84S01	extrapolated	Anthracene	Anthracene	6.03E-03	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ790	OCBS84S01	extrapolated	Benzo(a)anthracene	Benzo(a)anthracene	4.36E-04	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ790	OCBS84S01	extrapolated	Benzo(a)pyrene	Benzo(a)pyrene	4.39E-04	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ790	OCBS84S01	extrapolated	Benzo(b)fluoranthene	Benzo(b)fluoranthene	6.99E-04	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ790	OCBS84S01	extrapolated	Benzo(e)pyrene	Benzo(e)pyrene	3.34E-03	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ790	OCBS84S01	extrapolated	Benzo(g,h,i)perylene	Benzo(g,h,i)perylene	3.57E-03	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ790	OCBS84S01	extrapolated	Benzo(k)fluoranthene	Benzo(k)fluoranthene	3.31E-04	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ790	OCBS84S01	extrapolated	Chrysene	Chrysene	9.47E-04	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ790	OCBS84S01	extrapolated	Dibenzo(a,h)anthracene	Dibenz(a,h)anthracene	1.79E-04	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ790	OCBS84S01	extrapolated	Fluoranthene	Fluoranthene	1.21E-03	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ790	OCBS84S01	extrapolated	Fluorene	Fluorene	9.17E-03	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ790	OCBS84S01	extrapolated	Indeno(1,2,3-cd)pyrene	Indeno(1,2,3-cd)pyrene	3.88E-04	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ790	OCBS84S01	extrapolated	Perylene	Perylene	1.90E-03	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ790	OCBS84S01	extrapolated	Pyrene	Pyrene	2.20E-03	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ791	OCBS85S01	extrapolated	PCB-105	PCB-105	5.32E-06	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ791	OCBS85S01	extrapolated	PCB-114	PCB-114	1.95E-07	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ791	OCBS85S01	extrapolated	PCB-118	PCB-118	1.15E-05	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ791	OCBS85S01	extrapolated	PCB-123	PCB-123	1.29E-07	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ791	OCBS85S01	extrapolated	PCB-126	PCB-126	3.24E-07	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ791	OCBS85S01	extrapolated	PCB-156	PCB-156	2.70E-06	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ791	OCBS85S01	extrapolated	PCB-157	PCB-157	1.06E-06	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ791	OCBS85S01	extrapolated	PCB-167	PCB-167	1.84E-06	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ791	OCBS85S01	extrapolated	PCB-169	PCB-169	2.74E-08	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ791	OCBS85S01	extrapolated	PCB-189	PCB-189	2.74E-07	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ791	OCBS85S01	extrapolated	PCB-77	PCB-77	6.65E-07	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ791	OCBS85S01	extrapolated	PCB-81	PCB-81	1.29E-07	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ791	OCBS85S01	extrapolated	Benzene	Benzene	3.48E-04	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ791	OCBS85S01	extrapolated	Ethylbenzene	Ethylbenzene	3.48E-04	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ791	OCBS85S01	extrapolated	Toluene	Toluene	3.48E-04	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ791	OCBS85S01	extrapolated	m,p-Xylene	m,p-Xylene	1.04E-03	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ791	OCBS85S01	extrapolated	o-Xylene	o-Xylene	2.32E-04	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ791	OCBS85S01	extrapolated	Xylene (total)	Xylenes (total)	1.28E-03	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ791	OCBS85S01	extrapolated	Acenaphthene	Acenaphthene	4.98E-03	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ791	OCBS85S01	extrapolated	Acenaphthylene	Acenaphthylene	6.10E-04	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ791	OCBS85S01	extrapolated	Anthracene	Anthracene	3.25E-03	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ791	OCBS85S01	extrapolated	Benzo(a)pyrene	Benzo(a)pyrene	2.37E-04	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ791	OCBS85S01	extrapolated	Benzo(b)fluoranthene	Benzo(b)fluoranthene	3.77E-04	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ791	OCBS85S01	extrapolated	Benzo(e)pyrene	Benzo(e)pyrene	1.80E-03	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ791	OCBS85S01	extrapolated	Benzo(g,h,i)perylene	Benzo(g,h,i)perylene	1.92E-03	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ791	OCBS85S01	extrapolated	Benzo(k)fluoranthene	Benzo(k)fluoranthene	1.78E-04	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ791	OCBS85S01	extrapolated	Chrysene	Chrysene	5.10E-04	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ791	OCBS85S01	extrapolated	Dibenzo(a,h)anthracene	Dibenz(a,h)anthracene	9.63E-05	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ791	OCBS85S01	extrapolated	Fluoranthene	Fluoranthene	6.51E-04	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ791	OCBS85S01	extrapolated	Fluorene	Fluorene	4.94E-03	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ791	OCBS85S01	extrapolated	Indeno(1,2,3-cd)pyrene	Indeno(1,2,3-cd)pyrene	2.09E-04	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ791	OCBS85S01	extrapolated	Perylene	Perylene	1.03E-03	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ791	OCBS85S01	extrapolated	Pyrene	Pyrene	1.19E-03	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ794	OCBS88S01	extrapolated	PCB-105	PCB-105	5.57E-06	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ794	OCBS88S01	extrapolated	PCB-114	PCB-114	2.04E-07	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ794	OCBS88S01	extrapolated	PCB-118	PCB-118	1.21E-05	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ794	OCBS88S01	extrapolated	PCB-123	PCB-123	1.35E-07	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation

Table C7-2
Extrapolated Data
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EPA_NO	SAMPLE_ID	LAB_METHOD	ANALYTE	STD_ANALYT	CONCENTRAT	UNITS	REV_QUAL	Q_CODE	D_LIMIT	MATRIX	DATE_SAMP	DEPTH	SAMPLE_TYP	UNIT
MJ794	OCBS88S01	extrapolated	PCB-126	PCB-126	3.39E-07	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ794	OCBS88S01	extrapolated	PCB-156	PCB-156	2.83E-06	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ794	OCBS88S01	extrapolated	PCB-157	PCB-157	1.10E-06	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ794	OCBS88S01	extrapolated	PCB-167	PCB-167	1.92E-06	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ794	OCBS88S01	extrapolated	PCB-169	PCB-169	2.86E-08	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ794	OCBS88S01	extrapolated	PCB-189	PCB-189	2.86E-07	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ794	OCBS88S01	extrapolated	PCB-77	PCB-77	6.96E-07	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ794	OCBS88S01	extrapolated	PCB-81	PCB-81	1.35E-07	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ794	OCBS88S01	extrapolated	Benzene	Benzene	3.60E-04	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ794	OCBS88S01	extrapolated	Ethylbenzene	Ethylbenzene	3.60E-04	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ794	OCBS88S01	extrapolated	Toluene	Toluene	3.60E-04	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ794	OCBS88S01	extrapolated	m,p-Xylene	m,p-Xylene	1.08E-03	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ794	OCBS88S01	extrapolated	o-Xylene	o-Xylene	2.40E-04	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ794	OCBS88S01	extrapolated	Xylene (total)	Xylenes (total)	1.32E-03	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ794	OCBS88S01	extrapolated	Acenaphthene	Acenaphthene	7.85E-03	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ794	OCBS88S01	extrapolated	Acenaphthylene	Acenaphthylene	9.60E-04	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ794	OCBS88S01	extrapolated	Anthracene	Anthracene	5.12E-03	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ794	OCBS88S01	extrapolated	Benzo(a)pyrene	Benzo(a)pyrene	3.73E-04	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ794	OCBS88S01	extrapolated	Benzo(b)fluoranthene	Benzo(b)fluoranthene	5.93E-04	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ794	OCBS88S01	extrapolated	Benzo(e)pyrene	Benzo(e)pyrene	2.83E-03	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ794	OCBS88S01	extrapolated	Benzo(g,h,i)perylene	Benzo(g,h,i)perylene	3.03E-03	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ794	OCBS88S01	extrapolated	Benzo(k)fluoranthene	Benzo(k)fluoranthene	2.81E-04	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ794	OCBS88S01	extrapolated	Chrysene	Chrysene	8.04E-04	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ794	OCBS88S01	extrapolated	Dibenzo(a,h)anthracene	Dibenz(a,h)anthracene	1.52E-04	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ794	OCBS88S01	extrapolated	Fluoranthene	Fluoranthene	1.02E-03	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ794	OCBS88S01	extrapolated	Fluorene	Fluorene	7.78E-03	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ794	OCBS88S01	extrapolated	Indeno(1,2,3-cd)pyrene	Indeno(1,2,3-cd)pyrene	3.30E-04	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ794	OCBS88S01	extrapolated	Perylene	Perylene	1.62E-03	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ794	OCBS88S01	extrapolated	Pyrene	Pyrene	1.87E-03	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ795	OCBS89S01	extrapolated	PCB-105	PCB-105	6.19E-06	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ795	OCBS89S01	extrapolated	PCB-114	PCB-114	2.27E-07	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ795	OCBS89S01	extrapolated	PCB-118	PCB-118	1.34E-05	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ795	OCBS89S01	extrapolated	PCB-123	PCB-123	1.49E-07	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ795	OCBS89S01	extrapolated	PCB-126	PCB-126	3.76E-07	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ795	OCBS89S01	extrapolated	PCB-156	PCB-156	3.14E-06	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ795	OCBS89S01	extrapolated	PCB-157	PCB-157	1.23E-06	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ795	OCBS89S01	extrapolated	PCB-167	PCB-167	2.14E-06	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ795	OCBS89S01	extrapolated	PCB-169	PCB-169	3.18E-08	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ795	OCBS89S01	extrapolated	PCB-189	PCB-189	3.18E-07	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ795	OCBS89S01	extrapolated	PCB-77	PCB-77	7.73E-07	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ795	OCBS89S01	extrapolated	PCB-81	PCB-81	1.49E-07	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ795	OCBS89S01	extrapolated	Benzene	Benzene	1.26E-03	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ795	OCBS89S01	extrapolated	Ethylbenzene	Ethylbenzene	1.26E-03	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ795	OCBS89S01	extrapolated	Toluene	Toluene	1.26E-03	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ795	OCBS89S01	extrapolated	m,p-Xylene	m,p-Xylene	3.78E-03	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ795	OCBS89S01	extrapolated	o-Xylene	o-Xylene	8.40E-04	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ795	OCBS89S01	extrapolated	Xylene (total)	Xylenes (total)	4.62E-03	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ795	OCBS89S01	extrapolated	Acenaphthylene	Acenaphthylene	3.43E-03	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ795	OCBS89S01	extrapolated	Benzo(a)pyrene	Benzo(a)pyrene	1.33E-03	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ795	OCBS89S01	extrapolated	Benzo(b)fluoranthene	Benzo(b)fluoranthene	2.12E-03	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ795	OCBS89S01	extrapolated	Benzo(e)pyrene	Benzo(e)pyrene	1.01E-02	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation

Table C7-2
Extrapolated Data
Old Conservation Yard RFI Site

EPA_NO	SAMPLE_ID	LAB_METHOD	ANALYTE	STD_ANALYT	CONCENTRAT	UNITS	REV_QUAL	Q_CODE	D_LIMIT	MATRIX	DATE_SAMP	DEPTH	SAMPLE_TYP	UNIT
MJ795	OCBS89S01	extrapolated	Benzo(g,h,i)perylene	Benzo(g,h,i)perylene	1.08E-02	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ795	OCBS89S01	extrapolated	Benzo(k)fluoranthene	Benzo(k)fluoranthene	1.01E-03	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ795	OCBS89S01	extrapolated	Chrysene	Chrysene	2.87E-03	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ795	OCBS89S01	extrapolated	Dibenzo(a,h)anthracene	Dibenz(a,h)anthracene	5.42E-04	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ795	OCBS89S01	extrapolated	Indeno(1,2,3-cd)pyrene	Indeno(1,2,3-cd)pyrene	1.18E-03	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ795	OCBS89S01	extrapolated	Perylene	Perylene	5.78E-03	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ796	OCBS90S01	extrapolated	PCB-105	PCB-105	1.18E-05	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ796	OCBS90S01	extrapolated	PCB-114	PCB-114	4.31E-07	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ796	OCBS90S01	extrapolated	PCB-118	PCB-118	2.55E-05	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ796	OCBS90S01	extrapolated	PCB-123	PCB-123	2.84E-07	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ796	OCBS90S01	extrapolated	PCB-126	PCB-126	7.15E-07	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ796	OCBS90S01	extrapolated	PCB-156	PCB-156	5.97E-06	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ796	OCBS90S01	extrapolated	PCB-157	PCB-157	2.33E-06	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ796	OCBS90S01	extrapolated	PCB-167	PCB-167	4.06E-06	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ796	OCBS90S01	extrapolated	PCB-169	PCB-169	6.05E-08	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ796	OCBS90S01	extrapolated	PCB-189	PCB-189	6.05E-07	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ796	OCBS90S01	extrapolated	PCB-77	PCB-77	1.47E-06	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ796	OCBS90S01	extrapolated	PCB-81	PCB-81	2.84E-07	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ796	OCBS90S01	extrapolated	Benzene	Benzene	7.80E-04	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ796	OCBS90S01	extrapolated	Ethylbenzene	Ethylbenzene	7.80E-04	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ796	OCBS90S01	extrapolated	Toluene	Toluene	7.80E-04	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ796	OCBS90S01	extrapolated	m,p-Xylene	m,p-Xylene	2.34E-03	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ796	OCBS90S01	extrapolated	o-Xylene	o-Xylene	5.20E-04	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ796	OCBS90S01	extrapolated	Xylene (total)	Xylenes (total)	2.86E-03	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ796	OCBS90S01	extrapolated	Acenaphthylene	Acenaphthylene	2.52E-03	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ796	OCBS90S01	extrapolated	Benzo(a)pyrene	Benzo(a)pyrene	9.79E-04	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ796	OCBS90S01	extrapolated	Benzo(b)fluoranthene	Benzo(b)fluoranthene	1.56E-03	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ796	OCBS90S01	extrapolated	Benzo(e)pyrene	Benzo(e)pyrene	7.44E-03	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ796	OCBS90S01	extrapolated	Benzo(g,h,i)perylene	Benzo(g,h,i)perylene	7.96E-03	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ796	OCBS90S01	extrapolated	Benzo(k)fluoranthene	Benzo(k)fluoranthene	7.38E-04	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ796	OCBS90S01	extrapolated	Dibenzo(a,h)anthracene	Dibenz(a,h)anthracene	3.99E-04	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ796	OCBS90S01	extrapolated	Indeno(1,2,3-cd)pyrene	Indeno(1,2,3-cd)pyrene	8.66E-04	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ796	OCBS90S01	extrapolated	Perylene	Perylene	4.24E-03	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ798	OCBS92S01	extrapolated	PCB-105	PCB-105	5.20E-06	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ798	OCBS92S01	extrapolated	PCB-114	PCB-114	1.91E-07	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ798	OCBS92S01	extrapolated	PCB-118	PCB-118	1.13E-05	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ798	OCBS92S01	extrapolated	PCB-123	PCB-123	1.26E-07	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ798	OCBS92S01	extrapolated	PCB-126	PCB-126	3.16E-07	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ798	OCBS92S01	extrapolated	PCB-156	PCB-156	2.64E-06	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ798	OCBS92S01	extrapolated	PCB-157	PCB-157	1.03E-06	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ798	OCBS92S01	extrapolated	PCB-167	PCB-167	1.79E-06	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ798	OCBS92S01	extrapolated	PCB-169	PCB-169	2.67E-08	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ798	OCBS92S01	extrapolated	PCB-189	PCB-189	2.67E-07	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ798	OCBS92S01	extrapolated	PCB-77	PCB-77	6.49E-07	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ798	OCBS92S01	extrapolated	PCB-81	PCB-81	1.26E-07	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ798	OCBS92S01	extrapolated	Benzene	Benzene	8.76E-04	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ798	OCBS92S01	extrapolated	Ethylbenzene	Ethylbenzene	8.76E-04	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ798	OCBS92S01	extrapolated	Toluene	Toluene	8.76E-04	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ798	OCBS92S01	extrapolated	m,p-Xylene	m,p-Xylene	2.63E-03	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ798	OCBS92S01	extrapolated	o-Xylene	o-Xylene	5.84E-04	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ798	OCBS92S01	extrapolated	Xylene (total)	Xylenes (total)	3.21E-03	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation

Table C7-2
Extrapolated Data
Old Conservation Yard RFI Site

EPA_NO	SAMPLE_ID	LAB_METHOD	ANALYTE	STD_ANALYT	CONCENTRAT	UNITS	REV_QUAL	Q_CODE	D_LIMIT	MATRIX	DATE_SAMP	DEPTH	SAMPLE_TYP	UNIT
MJ798	OCBS92S01	extrapolated	Acenaphthylene	Acenaphthylene	5.49E-03	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ798	OCBS92S01	extrapolated	Benzo(a)anthracene	Benzo(a)anthracene	2.11E-03	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ798	OCBS92S01	extrapolated	Benzo(b)fluoranthene	Benzo(b)fluoranthene	3.39E-03	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ798	OCBS92S01	extrapolated	Benzo(e)pyrene	Benzo(e)pyrene	1.62E-02	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ798	OCBS92S01	extrapolated	Dibenzo(a,h)anthracene	Dibenz(a,h)anthracene	8.67E-04	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ798	OCBS92S01	extrapolated	Indeno(1,2,3-cd)pyrene	Indeno(1,2,3-cd)pyrene	1.88E-03	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ798	OCBS92S01	extrapolated	Perylene	Perylene	9.23E-03	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ799	OCBS93S01	extrapolated	PCB-105	PCB-105	5.07E-06	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ799	OCBS93S01	extrapolated	PCB-114	PCB-114	1.86E-07	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ799	OCBS93S01	extrapolated	PCB-118	PCB-118	1.10E-05	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ799	OCBS93S01	extrapolated	PCB-123	PCB-123	1.23E-07	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ799	OCBS93S01	extrapolated	PCB-126	PCB-126	3.09E-07	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ799	OCBS93S01	extrapolated	PCB-156	PCB-156	2.58E-06	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ799	OCBS93S01	extrapolated	PCB-157	PCB-157	1.01E-06	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ799	OCBS93S01	extrapolated	PCB-167	PCB-167	1.75E-06	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ799	OCBS93S01	extrapolated	PCB-169	PCB-169	2.61E-08	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ799	OCBS93S01	extrapolated	PCB-189	PCB-189	2.61E-07	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ799	OCBS93S01	extrapolated	PCB-77	PCB-77	6.34E-07	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ799	OCBS93S01	extrapolated	PCB-81	PCB-81	1.23E-07	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ799	OCBS93S01	extrapolated	Benzene	Benzene	3.24E-04	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ799	OCBS93S01	extrapolated	Ethylbenzene	Ethylbenzene	3.24E-04	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ799	OCBS93S01	extrapolated	Toluene	Toluene	3.24E-04	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ799	OCBS93S01	extrapolated	m,p-Xylene	m,p-Xylene	9.72E-04	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ799	OCBS93S01	extrapolated	o-Xylene	o-Xylene	2.16E-04	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ799	OCBS93S01	extrapolated	Xylene (total)	Xylenes (total)	1.19E-03	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ799	OCBS93S01	extrapolated	Acenaphthylene	Acenaphthylene	1.50E-03	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ799	OCBS93S01	extrapolated	Anthracene	Anthracene	7.99E-03	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ799	OCBS93S01	extrapolated	Benzo(a)pyrene	Benzo(a)pyrene	5.82E-04	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ799	OCBS93S01	extrapolated	Benzo(b)fluoranthene	Benzo(b)fluoranthene	9.27E-04	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ799	OCBS93S01	extrapolated	Benzo(e)pyrene	Benzo(e)pyrene	4.42E-03	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ799	OCBS93S01	extrapolated	Benzo(g,h,i)perylene	Benzo(g,h,i)perylene	4.73E-03	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ799	OCBS93S01	extrapolated	Benzo(k)fluoranthene	Benzo(k)fluoranthene	4.39E-04	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ799	OCBS93S01	extrapolated	Chrysene	Chrysene	1.26E-03	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ799	OCBS93S01	extrapolated	Dibenzo(a,h)anthracene	Dibenz(a,h)anthracene	2.37E-04	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ799	OCBS93S01	extrapolated	Fluoranthene	Fluoranthene	1.60E-03	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ799	OCBS93S01	extrapolated	Indeno(1,2,3-cd)pyrene	Indeno(1,2,3-cd)pyrene	5.15E-04	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ799	OCBS93S01	extrapolated	Perylene	Perylene	2.52E-03	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ799	OCBS93S01	extrapolated	Pyrene	Pyrene	2.92E-03	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ800	OCBS94S01	extrapolated	PCB-105	PCB-105	5.01E-06	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ800	OCBS94S01	extrapolated	PCB-114	PCB-114	1.84E-07	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ800	OCBS94S01	extrapolated	PCB-118	PCB-118	1.09E-05	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ800	OCBS94S01	extrapolated	PCB-123	PCB-123	1.21E-07	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ800	OCBS94S01	extrapolated	PCB-126	PCB-126	3.05E-07	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ800	OCBS94S01	extrapolated	PCB-156	PCB-156	2.55E-06	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ800	OCBS94S01	extrapolated	PCB-157	PCB-157	9.94E-07	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ800	OCBS94S01	extrapolated	PCB-167	PCB-167	1.73E-06	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ800	OCBS94S01	extrapolated	PCB-169	PCB-169	2.58E-08	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ800	OCBS94S01	extrapolated	PCB-189	PCB-189	2.58E-07	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ800	OCBS94S01	extrapolated	PCB-77	PCB-77	6.26E-07	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ800	OCBS94S01	extrapolated	PCB-81	PCB-81	1.21E-07	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ800	OCBS94S01	extrapolated	Benzene	Benzene	6.60E-04	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation

Table C7-2
Extrapolated Data
Old Conservation Yard RFI Site

EPA_NO	SAMPLE_ID	LAB_METHOD	ANALYTE	STD_ANALYT	CONCENTRAT	UNITS	REV_QUAL	Q_CODE	D_LIMIT	MATRIX	DATE_SAMP	DEPTH	SAMPLE_TYP	UNIT
MJ800	OCBS94S01	extrapolated	Ethylbenzene	Ethylbenzene	6.60E-04	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ800	OCBS94S01	extrapolated	Toluene	Toluene	6.60E-04	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ800	OCBS94S01	extrapolated	m,p-Xylene	m,p-Xylene	1.98E-03	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ800	OCBS94S01	extrapolated	o-Xylene	o-Xylene	4.40E-04	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ800	OCBS94S01	extrapolated	Xylene (total)	Xylenes (total)	2.42E-03	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ800	OCBS94S01	extrapolated	Acenaphthene	Acenaphthene	9.28E-03	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ800	OCBS94S01	extrapolated	Acenaphthylene	Acenaphthylene	1.14E-03	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ800	OCBS94S01	extrapolated	Anthracene	Anthracene	6.05E-03	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ800	OCBS94S01	extrapolated	Benzo(a)anthracene	Benzo(a)anthracene	4.37E-04	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ800	OCBS94S01	extrapolated	Benzo(a)pyrene	Benzo(a)pyrene	4.41E-04	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ800	OCBS94S01	extrapolated	Benzo(b)fluoranthene	Benzo(b)fluoranthene	7.02E-04	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ800	OCBS94S01	extrapolated	Benzo(e)pyrene	Benzo(e)pyrene	3.35E-03	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ800	OCBS94S01	extrapolated	Benzo(g,h,i)perylene	Benzo(g,h,i)perylene	3.58E-03	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ800	OCBS94S01	extrapolated	Benzo(k)fluoranthene	Benzo(k)fluoranthene	3.32E-04	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ800	OCBS94S01	extrapolated	Chrysene	Chrysene	9.50E-04	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ800	OCBS94S01	extrapolated	Dibenzo(a,h)anthracene	Dibenz(a,h)anthracene	1.79E-04	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ800	OCBS94S01	extrapolated	Fluoranthene	Fluoranthene	1.21E-03	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ800	OCBS94S01	extrapolated	Fluorene	Fluorene	9.20E-03	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ800	OCBS94S01	extrapolated	Indeno(1,2,3-cd)pyrene	Indeno(1,2,3-cd)pyrene	3.90E-04	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ800	OCBS94S01	extrapolated	Perylene	Perylene	1.91E-03	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ800	OCBS94S01	extrapolated	Pyrene	Pyrene	2.21E-03	mg/kg				S	4/12/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ803	OCBS95S01	extrapolated	PCB-105	PCB-105	5.94E-06	mg/kg				S	4/13/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ803	OCBS95S01	extrapolated	PCB-114	PCB-114	2.18E-07	mg/kg				S	4/13/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ803	OCBS95S01	extrapolated	PCB-118	PCB-118	1.29E-05	mg/kg				S	4/13/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ803	OCBS95S01	extrapolated	PCB-123	PCB-123	1.44E-07	mg/kg				S	4/13/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ803	OCBS95S01	extrapolated	PCB-126	PCB-126	3.61E-07	mg/kg				S	4/13/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ803	OCBS95S01	extrapolated	PCB-156	PCB-156	3.02E-06	mg/kg				S	4/13/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ803	OCBS95S01	extrapolated	PCB-157	PCB-157	1.18E-06	mg/kg				S	4/13/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ803	OCBS95S01	extrapolated	PCB-167	PCB-167	2.05E-06	mg/kg				S	4/13/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ803	OCBS95S01	extrapolated	PCB-169	PCB-169	3.05E-08	mg/kg				S	4/13/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ803	OCBS95S01	extrapolated	PCB-189	PCB-189	3.05E-07	mg/kg				S	4/13/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ803	OCBS95S01	extrapolated	PCB-77	PCB-77	7.42E-07	mg/kg				S	4/13/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ803	OCBS95S01	extrapolated	PCB-81	PCB-81	1.44E-07	mg/kg				S	4/13/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ805	OCBS96S01	extrapolated	PCB-105	PCB-105	5.81E-06	mg/kg				S	4/13/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ805	OCBS96S01	extrapolated	PCB-114	PCB-114	2.13E-07	mg/kg				S	4/13/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ805	OCBS96S01	extrapolated	PCB-118	PCB-118	1.26E-05	mg/kg				S	4/13/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ805	OCBS96S01	extrapolated	PCB-123	PCB-123	1.41E-07	mg/kg				S	4/13/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ805	OCBS96S01	extrapolated	PCB-126	PCB-126	3.54E-07	mg/kg				S	4/13/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ805	OCBS96S01	extrapolated	PCB-156	PCB-156	2.96E-06	mg/kg				S	4/13/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ805	OCBS96S01	extrapolated	PCB-157	PCB-157	1.15E-06	mg/kg				S	4/13/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ805	OCBS96S01	extrapolated	PCB-167	PCB-167	2.01E-06	mg/kg				S	4/13/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ805	OCBS96S01	extrapolated	PCB-169	PCB-169	2.99E-08	mg/kg				S	4/13/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ805	OCBS96S01	extrapolated	PCB-189	PCB-189	2.99E-07	mg/kg				S	4/13/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ805	OCBS96S01	extrapolated	PCB-77	PCB-77	7.27E-07	mg/kg				S	4/13/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ805	OCBS96S01	extrapolated	PCB-81	PCB-81	1.41E-07	mg/kg				S	4/13/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ806	OCBS97S01	extrapolated	PCB-105	PCB-105	5.32E-06	mg/kg				S	4/13/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ806	OCBS97S01	extrapolated	PCB-114	PCB-114	1.95E-07	mg/kg				S	4/13/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ806	OCBS97S01	extrapolated	PCB-118	PCB-118	1.15E-05	mg/kg				S	4/13/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ806	OCBS97S01	extrapolated	PCB-123	PCB-123	1.29E-07	mg/kg				S	4/13/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ806	OCBS97S01	extrapolated	PCB-126	PCB-126	3.24E-07	mg/kg				S	4/13/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ806	OCBS97S01	extrapolated	PCB-156	PCB-156	2.70E-06	mg/kg				S	4/13/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation

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Extrapolated Data
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EPA_NO	SAMPLE_ID	LAB_METHOD	ANALYTE	STD_ANALYT	CONCENTRAT	UNITS	REV_QUAL	Q_CODE	D_LIMIT	MATRIX	DATE_SAMP	DEPTH	SAMPLE_TYP	UNIT
MJ806	OCBS97S01	extrapolated	PCB-157	PCB-157	1.06E-06	mg/kg				S	4/13/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ806	OCBS97S01	extrapolated	PCB-167	PCB-167	1.84E-06	mg/kg				S	4/13/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ806	OCBS97S01	extrapolated	PCB-169	PCB-169	2.74E-08	mg/kg				S	4/13/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ806	OCBS97S01	extrapolated	PCB-189	PCB-189	2.74E-07	mg/kg				S	4/13/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ806	OCBS97S01	extrapolated	PCB-77	PCB-77	6.65E-07	mg/kg				S	4/13/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ806	OCBS97S01	extrapolated	PCB-81	PCB-81	1.29E-07	mg/kg				S	4/13/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ806	OCBS97S01	extrapolated	Benzene	Benzene	3.42E-04	mg/kg				S	4/13/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ806	OCBS97S01	extrapolated	Ethylbenzene	Ethylbenzene	3.42E-04	mg/kg				S	4/13/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ806	OCBS97S01	extrapolated	Toluene	Toluene	3.42E-04	mg/kg				S	4/13/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ806	OCBS97S01	extrapolated	m,p-Xylene	m,p-Xylene	1.03E-03	mg/kg				S	4/13/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ806	OCBS97S01	extrapolated	o-Xylene	o-Xylene	2.28E-04	mg/kg				S	4/13/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ806	OCBS97S01	extrapolated	Xylene (total)	Xylenes (total)	1.25E-03	mg/kg				S	4/13/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ806	OCBS97S01	extrapolated	Acenaphthylene	Acenaphthylene	1.66E-03	mg/kg				S	4/13/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ806	OCBS97S01	extrapolated	Anthracene	Anthracene	8.85E-03	mg/kg				S	4/13/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ806	OCBS97S01	extrapolated	Benzo(a)anthracene	Benzo(a)anthracene	6.39E-04	mg/kg				S	4/13/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ806	OCBS97S01	extrapolated	Benzo(e)pyrene	Benzo(e)pyrene	4.90E-03	mg/kg				S	4/13/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ806	OCBS97S01	extrapolated	Benzo(g,h,i)perylene	Benzo(g,h,i)perylene	5.24E-03	mg/kg				S	4/13/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ806	OCBS97S01	extrapolated	Benzo(k)fluoranthene	Benzo(k)fluoranthene	4.86E-04	mg/kg				S	4/13/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ806	OCBS97S01	extrapolated	Dibenzo(a,h)anthracene	Dibenz(a,h)anthracene	2.62E-04	mg/kg				S	4/13/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ806	OCBS97S01	extrapolated	Indeno(1,2,3-cd)pyrene	Indeno(1,2,3-cd)pyrene	5.70E-04	mg/kg				S	4/13/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ806	OCBS97S01	extrapolated	Perylene	Perylene	2.79E-03	mg/kg				S	4/13/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ808	OCBS98S01	extrapolated	PCB-105	PCB-105	5.51E-04	mg/kg				S	4/13/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ808	OCBS98S01	extrapolated	PCB-114	PCB-114	2.02E-05	mg/kg				S	4/13/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ808	OCBS98S01	extrapolated	PCB-118	PCB-118	1.19E-03	mg/kg				S	4/13/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ808	OCBS98S01	extrapolated	PCB-123	PCB-123	1.33E-05	mg/kg				S	4/13/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ808	OCBS98S01	extrapolated	PCB-126	PCB-126	3.35E-05	mg/kg				S	4/13/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ808	OCBS98S01	extrapolated	PCB-156	PCB-156	2.80E-04	mg/kg				S	4/13/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ808	OCBS98S01	extrapolated	PCB-157	PCB-157	1.09E-04	mg/kg				S	4/13/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ808	OCBS98S01	extrapolated	PCB-167	PCB-167	1.90E-04	mg/kg				S	4/13/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ808	OCBS98S01	extrapolated	PCB-169	PCB-169	2.83E-06	mg/kg				S	4/13/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ808	OCBS98S01	extrapolated	PCB-189	PCB-189	2.83E-05	mg/kg				S	4/13/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ808	OCBS98S01	extrapolated	PCB-77	PCB-77	6.88E-05	mg/kg				S	4/13/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ808	OCBS98S01	extrapolated	PCB-81	PCB-81	1.33E-05	mg/kg				S	4/13/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ808	OCBS98S01	extrapolated	Benzene	Benzene	3.54E-04	mg/kg				S	4/13/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ808	OCBS98S01	extrapolated	Ethylbenzene	Ethylbenzene	3.54E-04	mg/kg				S	4/13/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ808	OCBS98S01	extrapolated	Toluene	Toluene	3.54E-04	mg/kg				S	4/13/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ808	OCBS98S01	extrapolated	m,p-Xylene	m,p-Xylene	1.06E-03	mg/kg				S	4/13/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ808	OCBS98S01	extrapolated	o-Xylene	o-Xylene	2.36E-04	mg/kg				S	4/13/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ808	OCBS98S01	extrapolated	Xylene (total)	Xylenes (total)	1.30E-03	mg/kg				S	4/13/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ808	OCBS98S01	extrapolated	Acenaphthene	Acenaphthene	1.07E-02	mg/kg				S	4/13/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ808	OCBS98S01	extrapolated	Acenaphthylene	Acenaphthylene	1.31E-03	mg/kg				S	4/13/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ808	OCBS98S01	extrapolated	Anthracene	Anthracene	7.00E-03	mg/kg				S	4/13/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ808	OCBS98S01	extrapolated	Benzo(a)pyrene	Benzo(a)pyrene	5.10E-04	mg/kg				S	4/13/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ808	OCBS98S01	extrapolated	Benzo(e)pyrene	Benzo(e)pyrene	3.88E-03	mg/kg				S	4/13/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ808	OCBS98S01	extrapolated	Benzo(g,h,i)perylene	Benzo(g,h,i)perylene	4.15E-03	mg/kg				S	4/13/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ808	OCBS98S01	extrapolated	Benzo(k)fluoranthene	Benzo(k)fluoranthene	3.85E-04	mg/kg				S	4/13/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ808	OCBS98S01	extrapolated	Dibenzo(a,h)anthracene	Dibenz(a,h)anthracene	2.08E-04	mg/kg				S	4/13/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ808	OCBS98S01	extrapolated	Fluorene	Fluorene	1.06E-02	mg/kg				S	4/13/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ808	OCBS98S01	extrapolated	Indeno(1,2,3-cd)pyrene	Indeno(1,2,3-cd)pyrene	4.51E-04	mg/kg				S	4/13/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ808	OCBS98S01	extrapolated	Perylene	Perylene	2.21E-03	mg/kg				S	4/13/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ814	OCBS37S01	extrapolated	PCB-105	PCB-105	3.46E-06	mg/kg				S	4/13/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation

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Extrapolated Data
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EPA_NO	SAMPLE_ID	LAB_METHOD	ANALYTE	STD_ANALYT	CONCENTRAT	UNITS	REV_QUAL	Q_CODE	D_LIMIT	MATRIX	DATE_SAMP	DEPTH	SAMPLE_TYP	UNIT
MJ814	OCBS37S01	extrapolated	PCB-114	PCB-114	1.27E-07	mg/kg				S	4/13/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ814	OCBS37S01	extrapolated	PCB-118	PCB-118	7.51E-06	mg/kg				S	4/13/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ814	OCBS37S01	extrapolated	PCB-123	PCB-123	8.37E-08	mg/kg				S	4/13/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ814	OCBS37S01	extrapolated	PCB-126	PCB-126	2.11E-07	mg/kg				S	4/13/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ814	OCBS37S01	extrapolated	PCB-156	PCB-156	1.76E-06	mg/kg				S	4/13/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ814	OCBS37S01	extrapolated	PCB-157	PCB-157	6.87E-07	mg/kg				S	4/13/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ814	OCBS37S01	extrapolated	PCB-167	PCB-167	1.20E-06	mg/kg				S	4/13/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ814	OCBS37S01	extrapolated	PCB-169	PCB-169	1.78E-08	mg/kg				S	4/13/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ814	OCBS37S01	extrapolated	PCB-189	PCB-189	1.78E-07	mg/kg				S	4/13/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ814	OCBS37S01	extrapolated	PCB-77	PCB-77	4.33E-07	mg/kg				S	4/13/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MJ814	OCBS37S01	extrapolated	PCB-81	PCB-81	8.37E-08	mg/kg				S	4/13/2006	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MT801	OCBS30S01	extrapolated	PCB-105	PCB-105	3.15E-06	mg/kg				S	9/10/2003	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MT801	OCBS30S01	extrapolated	PCB-114	PCB-114	1.16E-07	mg/kg				S	9/10/2003	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MT801	OCBS30S01	extrapolated	PCB-118	PCB-118	6.84E-06	mg/kg				S	9/10/2003	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MT801	OCBS30S01	extrapolated	PCB-123	PCB-123	7.62E-08	mg/kg				S	9/10/2003	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MT801	OCBS30S01	extrapolated	PCB-126	PCB-126	1.92E-07	mg/kg				S	9/10/2003	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MT801	OCBS30S01	extrapolated	PCB-156	PCB-156	1.60E-06	mg/kg				S	9/10/2003	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MT801	OCBS30S01	extrapolated	PCB-157	PCB-157	6.26E-07	mg/kg				S	9/10/2003	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MT801	OCBS30S01	extrapolated	PCB-167	PCB-167	1.09E-06	mg/kg				S	9/10/2003	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MT801	OCBS30S01	extrapolated	PCB-169	PCB-169	1.62E-08	mg/kg				S	9/10/2003	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MT801	OCBS30S01	extrapolated	PCB-189	PCB-189	1.62E-07	mg/kg				S	9/10/2003	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MT801	OCBS30S01	extrapolated	PCB-77	PCB-77	3.94E-07	mg/kg				S	9/10/2003	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MT801	OCBS30S01	extrapolated	PCB-81	PCB-81	7.62E-08	mg/kg				S	9/10/2003	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MT802	OCBS31S01	extrapolated	PCB-105	PCB-105	3.15E-06	mg/kg				S	9/10/2003	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MT802	OCBS31S01	extrapolated	PCB-114	PCB-114	1.16E-07	mg/kg				S	9/10/2003	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MT802	OCBS31S01	extrapolated	PCB-118	PCB-118	6.84E-06	mg/kg				S	9/10/2003	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MT802	OCBS31S01	extrapolated	PCB-123	PCB-123	7.62E-08	mg/kg				S	9/10/2003	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MT802	OCBS31S01	extrapolated	PCB-126	PCB-126	1.92E-07	mg/kg				S	9/10/2003	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MT802	OCBS31S01	extrapolated	PCB-156	PCB-156	1.60E-06	mg/kg				S	9/10/2003	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MT802	OCBS31S01	extrapolated	PCB-157	PCB-157	6.26E-07	mg/kg				S	9/10/2003	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MT802	OCBS31S01	extrapolated	PCB-167	PCB-167	1.09E-06	mg/kg				S	9/10/2003	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MT802	OCBS31S01	extrapolated	PCB-169	PCB-169	1.62E-08	mg/kg				S	9/10/2003	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MT802	OCBS31S01	extrapolated	PCB-189	PCB-189	1.62E-07	mg/kg				S	9/10/2003	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MT802	OCBS31S01	extrapolated	PCB-77	PCB-77	3.94E-07	mg/kg				S	9/10/2003	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
MT802	OCBS31S01	extrapolated	PCB-81	PCB-81	7.62E-08	mg/kg				S	9/10/2003	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS1	extrapolated	Benzene	Benzene	6.00E-06	mg/kg				S	8/25/1988	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS1	extrapolated	Ethylbenzene	Ethylbenzene	6.00E-06	mg/kg				S	8/25/1988	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS1	extrapolated	m,p-Xylene	m,p-Xylene	1.80E-05	mg/kg				S	8/25/1988	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS1	extrapolated	o-Xylene	o-Xylene	4.00E-06	mg/kg				S	8/25/1988	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS1	extrapolated	Xylenes (total)	Xylenes (total)	2.20E-05	mg/kg				S	8/25/1988	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS1	extrapolated	2-Methylnaphthalene	2-Methylnaphthalene	1.38E-03	mg/kg				S	8/25/1988	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS1	extrapolated	Acenaphthene	Acenaphthene	3.67E-02	mg/kg				S	8/25/1988	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS1	extrapolated	Acenaphthylene	Acenaphthylene	4.49E-03	mg/kg				S	8/25/1988	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS1	extrapolated	Anthracene	Anthracene	2.39E-02	mg/kg				S	8/25/1988	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS1	extrapolated	Benzo(a)anthracene	Benzo(a)anthracene	1.73E-03	mg/kg				S	8/25/1988	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS1	extrapolated	Benzo(a)pyrene	Benzo(a)pyrene	1.74E-03	mg/kg				S	8/25/1988	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS1	extrapolated	Benzo(b)fluoranthene	Benzo(b)fluoranthene	2.78E-03	mg/kg				S	8/25/1988	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS1	extrapolated	Benzo(e)pyrene	Benzo(e)pyrene	1.33E-02	mg/kg				S	8/25/1988	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS1	extrapolated	Benzo(g,h,i)perylene	Benzo(g,h,i)perylene	1.42E-02	mg/kg				S	8/25/1988	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS1	extrapolated	Benzo(k)fluoranthene	Benzo(k)fluoranthene	1.31E-03	mg/kg				S	8/25/1988	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS1	extrapolated	Dibenzo(a,h)anthracene	Dibenz(a,h)anthracene	7.10E-04	mg/kg				S	8/25/1988	0.50000	Primary Sample	SWMU 7.4 - Old Conservation

Table C7-2
Extrapolated Data
Old Conservation Yard RFI Site

EPA_NO	SAMPLE_ID	LAB_METHOD	ANALYTE	STD_ANALYT	CONCENTRAT	UNITS	REV_QUAL	Q_CODE	D_LIMIT	MATRIX	DATE_SAMP	DEPTH	SAMPLE_TYP	UNIT
OLDCONS	OLDCONS1	extrapolated	Fluorene	Fluorene	3.64E-02	mg/kg				S	8/25/1988	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS1	extrapolated	Indeno(1,2,3-cd)pyrene	Indeno(1,2,3-cd)pyrene	1.54E-03	mg/kg				S	8/25/1988	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS1	extrapolated	Naphthalene	Naphthalene	3.47E-04	mg/kg				S	8/25/1988	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS1	extrapolated	Perylene	Perylene	7.56E-03	mg/kg				S	8/25/1988	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS2	extrapolated	Benzene	Benzene	6.00E-06	mg/kg				S	8/25/1988	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS2	extrapolated	Ethylbenzene	Ethylbenzene	6.00E-06	mg/kg				S	8/25/1988	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS2	extrapolated	m,p-Xylene	m,p-Xylene	1.80E-05	mg/kg				S	8/25/1988	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS2	extrapolated	o-Xylene	o-Xylene	4.00E-06	mg/kg				S	8/25/1988	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS2	extrapolated	2-Methylnaphthalene	2-Methylnaphthalene	1.38E-03	mg/kg				S	8/25/1988	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS2	extrapolated	Acenaphthene	Acenaphthene	2.32E-03	mg/kg				S	8/25/1988	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS2	extrapolated	Acenaphthylene	Acenaphthylene	2.84E-04	mg/kg				S	8/25/1988	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS2	extrapolated	Anthracene	Anthracene	1.51E-03	mg/kg				S	8/25/1988	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS2	extrapolated	Benzo(a)anthracene	Benzo(a)anthracene	1.09E-04	mg/kg				S	8/25/1988	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS2	extrapolated	Benzo(a)pyrene	Benzo(a)pyrene	1.10E-04	mg/kg				S	8/25/1988	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS2	extrapolated	Benzo(b)fluoranthene	Benzo(b)fluoranthene	1.75E-04	mg/kg				S	8/25/1988	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS2	extrapolated	Benzo(e)pyrene	Benzo(e)pyrene	8.37E-04	mg/kg				S	8/25/1988	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS2	extrapolated	Benzo(g,h,i)perylene	Benzo(g,h,i)perylene	8.96E-04	mg/kg				S	8/25/1988	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS2	extrapolated	Benzo(k)fluoranthene	Benzo(k)fluoranthene	8.31E-05	mg/kg				S	8/25/1988	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS2	extrapolated	Chrysene	Chrysene	2.38E-04	mg/kg				S	8/25/1988	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS2	extrapolated	Dibenzo(a,h)anthracene	Dibenz(a,h)anthracene	4.48E-05	mg/kg				S	8/25/1988	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS2	extrapolated	Fluoranthene	Fluoranthene	3.03E-04	mg/kg				S	8/25/1988	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS2	extrapolated	Fluorene	Fluorene	2.30E-03	mg/kg				S	8/25/1988	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS2	extrapolated	Indeno(1,2,3-cd)pyrene	Indeno(1,2,3-cd)pyrene	9.74E-05	mg/kg				S	8/25/1988	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS2	extrapolated	Naphthalene	Naphthalene	3.47E-04	mg/kg				S	8/25/1988	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS2	extrapolated	Perylene	Perylene	4.78E-04	mg/kg				S	8/25/1988	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS2	extrapolated	Phenanthrene	Phenanthrene	6.20E-03	mg/kg				S	8/25/1988	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS2	extrapolated	Pyrene	Pyrene	5.52E-04	mg/kg				S	8/25/1988	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS3	extrapolated	Benzene	Benzene	6.00E-06	mg/kg				S	8/25/1988	3.50000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS3	extrapolated	Ethylbenzene	Ethylbenzene	6.00E-06	mg/kg				S	8/25/1988	3.50000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS3	extrapolated	Toluene	Toluene	6.00E-06	mg/kg				S	8/25/1988	3.50000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS3	extrapolated	m,p-Xylene	m,p-Xylene	1.80E-05	mg/kg				S	8/25/1988	3.50000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS3	extrapolated	o-Xylene	o-Xylene	4.00E-06	mg/kg				S	8/25/1988	3.50000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS3	extrapolated	2-Methylnaphthalene	2-Methylnaphthalene	1.38E-03	mg/kg				S	8/25/1988	3.50000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS3	extrapolated	Acenaphthylene	Acenaphthylene	2.80E-01	mg/kg				S	8/25/1988	3.50000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS3	extrapolated	Anthracene	Anthracene	1.49E+00	mg/kg				S	8/25/1988	3.50000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS3	extrapolated	Benzo(a)anthracene	Benzo(a)anthracene	1.08E-01	mg/kg				S	8/25/1988	3.50000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS3	extrapolated	Benzo(a)pyrene	Benzo(a)pyrene	1.09E-01	mg/kg				S	8/25/1988	3.50000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS3	extrapolated	Benzo(b)fluoranthene	Benzo(b)fluoranthene	1.73E-01	mg/kg				S	8/25/1988	3.50000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS3	extrapolated	Benzo(e)pyrene	Benzo(e)pyrene	8.27E-01	mg/kg				S	8/25/1988	3.50000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS3	extrapolated	Benzo(g,h,i)perylene	Benzo(g,h,i)perylene	8.85E-01	mg/kg				S	8/25/1988	3.50000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS3	extrapolated	Benzo(k)fluoranthene	Benzo(k)fluoranthene	8.20E-02	mg/kg				S	8/25/1988	3.50000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS3	extrapolated	Chrysene	Chrysene	2.35E-01	mg/kg				S	8/25/1988	3.50000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS3	extrapolated	Dibenzo(a,h)anthracene	Dibenz(a,h)anthracene	4.43E-02	mg/kg				S	8/25/1988	3.50000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS3	extrapolated	Fluoranthene	Fluoranthene	2.99E-01	mg/kg				S	8/25/1988	3.50000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS3	extrapolated	Indeno(1,2,3-cd)pyrene	Indeno(1,2,3-cd)pyrene	9.62E-02	mg/kg				S	8/25/1988	3.50000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS3	extrapolated	Naphthalene	Naphthalene	3.47E-04	mg/kg				S	8/25/1988	3.50000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS3	extrapolated	Perylene	Perylene	4.72E-01	mg/kg				S	8/25/1988	3.50000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS3	extrapolated	Pyrene	Pyrene	5.45E-01	mg/kg				S	8/25/1988	3.50000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS4	extrapolated	Benzene	Benzene	6.00E-06	mg/kg				S	8/25/1988	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS4	extrapolated	Ethylbenzene	Ethylbenzene	6.00E-06	mg/kg				S	8/25/1988	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS4	extrapolated	Toluene	Toluene	6.00E-06	mg/kg				S	8/25/1988	0.50000	Primary Sample	SWMU 7.4 - Old Conservation

Table C7-2
Extrapolated Data
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EPA_NO	SAMPLE_ID	LAB_METHOD	ANALYTE	STD_ANALYT	CONCENTRAT	UNITS	REV_QUAL	Q_CODE	D_LIMIT	MATRIX	DATE_SAMP	DEPTH	SAMPLE_TYP	UNIT
OLDCONS	OLDCONS4	extrapolated	m,p-Xylene	m,p-Xylene	1.80E-05	mg/kg				S	8/25/1988	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS4	extrapolated	o-Xylene	o-Xylene	4.00E-06	mg/kg				S	8/25/1988	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS4	extrapolated	Xylenes (total)	Xylenes (total)	2.20E-05	mg/kg				S	8/25/1988	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS4	extrapolated	2-Methylnaphthalene	2-Methylnaphthalene	1.38E-03	mg/kg				S	8/25/1988	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS4	extrapolated	Acenaphthene	Acenaphthene	1.17E-03	mg/kg				S	8/25/1988	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS4	extrapolated	Acenaphthylene	Acenaphthylene	1.44E-04	mg/kg				S	8/25/1988	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS4	extrapolated	Anthracene	Anthracene	7.65E-04	mg/kg				S	8/25/1988	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS4	extrapolated	Benzo(a)anthracene	Benzo(a)anthracene	5.53E-05	mg/kg				S	8/25/1988	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS4	extrapolated	Benzo(a)pyrene	Benzo(a)pyrene	5.58E-05	mg/kg				S	8/25/1988	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS4	extrapolated	Benzo(b)fluoranthene	Benzo(b)fluoranthene	8.88E-05	mg/kg				S	8/25/1988	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS4	extrapolated	Benzo(e)pyrene	Benzo(e)pyrene	4.24E-04	mg/kg				S	8/25/1988	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS4	extrapolated	Benzo(g,h,i)perylene	Benzo(g,h,i)perylene	4.53E-04	mg/kg				S	8/25/1988	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS4	extrapolated	Benzo(k)fluoranthene	Benzo(k)fluoranthene	4.20E-05	mg/kg				S	8/25/1988	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS4	extrapolated	Chrysene	Chrysene	1.20E-04	mg/kg				S	8/25/1988	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS4	extrapolated	Dibenzo(a,h)anthracene	Dibenz(a,h)anthracene	2.27E-05	mg/kg				S	8/25/1988	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS4	extrapolated	Fluoranthene	Fluoranthene	1.53E-04	mg/kg				S	8/25/1988	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS4	extrapolated	Fluorene	Fluorene	1.16E-03	mg/kg				S	8/25/1988	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS4	extrapolated	Indeno(1,2,3-cd)pyrene	Indeno(1,2,3-cd)pyrene	4.93E-05	mg/kg				S	8/25/1988	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS4	extrapolated	Naphthalene	Naphthalene	3.47E-04	mg/kg				S	8/25/1988	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS4	extrapolated	Perylene	Perylene	2.42E-04	mg/kg				S	8/25/1988	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS4	extrapolated	Phenanthrene	Phenanthrene	3.14E-03	mg/kg				S	8/25/1988	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS4	extrapolated	Pyrene	Pyrene	2.79E-04	mg/kg				S	8/25/1988	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS5	extrapolated	Benzene	Benzene	6.00E-06	mg/kg				S	8/25/1988	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS5	extrapolated	Ethylbenzene	Ethylbenzene	6.00E-06	mg/kg				S	8/25/1988	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS5	extrapolated	m,p-Xylene	m,p-Xylene	1.80E-05	mg/kg				S	8/25/1988	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS5	extrapolated	o-Xylene	o-Xylene	4.00E-06	mg/kg				S	8/25/1988	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS5	extrapolated	2-Methylnaphthalene	2-Methylnaphthalene	1.38E-03	mg/kg				S	8/25/1988	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS5	extrapolated	Acenaphthene	Acenaphthene	2.01E-04	mg/kg				S	8/25/1988	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS5	extrapolated	Acenaphthylene	Acenaphthylene	2.45E-05	mg/kg				S	8/25/1988	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS5	extrapolated	Anthracene	Anthracene	1.31E-04	mg/kg				S	8/25/1988	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS5	extrapolated	Benzo(a)anthracene	Benzo(a)anthracene	9.44E-06	mg/kg				S	8/25/1988	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS5	extrapolated	Benzo(a)pyrene	Benzo(a)pyrene	9.52E-06	mg/kg				S	8/25/1988	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS5	extrapolated	Benzo(b)fluoranthene	Benzo(b)fluoranthene	1.52E-05	mg/kg				S	8/25/1988	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS5	extrapolated	Benzo(e)pyrene	Benzo(e)pyrene	7.24E-05	mg/kg				S	8/25/1988	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS5	extrapolated	Benzo(g,h,i)perylene	Benzo(g,h,i)perylene	7.74E-05	mg/kg				S	8/25/1988	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS5	extrapolated	Benzo(k)fluoranthene	Benzo(k)fluoranthene	7.18E-06	mg/kg				S	8/25/1988	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS5	extrapolated	Chrysene	Chrysene	2.05E-05	mg/kg				S	8/25/1988	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS5	extrapolated	Dibenzo(a,h)anthracene	Dibenz(a,h)anthracene	3.87E-06	mg/kg				S	8/25/1988	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS5	extrapolated	Fluoranthene	Fluoranthene	2.62E-05	mg/kg				S	8/25/1988	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS5	extrapolated	Fluorene	Fluorene	1.99E-04	mg/kg				S	8/25/1988	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS5	extrapolated	Indeno(1,2,3-cd)pyrene	Indeno(1,2,3-cd)pyrene	8.42E-06	mg/kg				S	8/25/1988	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS5	extrapolated	Naphthalene	Naphthalene	3.47E-04	mg/kg				S	8/25/1988	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS5	extrapolated	Phenanthrene	Phenanthrene	5.36E-04	mg/kg				S	8/25/1988	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS5	extrapolated	Perylene	Perylene	4.13E-05	mg/kg				S	8/25/1988	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS5	extrapolated	Pyrene	Pyrene	4.77E-05	mg/kg				S	8/25/1988	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS6	extrapolated	Benzene	Benzene	6.00E-06	mg/kg				S	8/25/1988	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS6	extrapolated	Ethylbenzene	Ethylbenzene	6.00E-06	mg/kg				S	8/25/1988	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS6	extrapolated	Toluene	Toluene	6.00E-06	mg/kg				S	8/25/1988	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS6	extrapolated	m,p-Xylene	m,p-Xylene	1.80E-05	mg/kg				S	8/25/1988	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS6	extrapolated	o-Xylene	o-Xylene	4.00E-06	mg/kg				S	8/25/1988	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS6	extrapolated	Xylenes (total)	Xylenes (total)	2.20E-05	mg/kg				S	8/25/1988	0.50000	Primary Sample	SWMU 7.4 - Old Conservation

Table C7-2
Extrapolated Data
Old Conservation Yard RFI Site

EPA_NO	SAMPLE_ID	LAB_METHOD	ANALYTE	STD_ANALYT	CONCENTRAT	UNITS	REV_QUAL	Q_CODE	D_LIMIT	MATRIX	DATE_SAMP	DEPTH	SAMPLE_TYP	UNIT
OLDCONS	OLDCONS6	extrapolated	2-Methylnaphthalene	2-Methylnaphthalene	1.38E-03	mg/kg				S	8/25/1988	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS6	extrapolated	Acenaphthene	Acenaphthene	2.92E-03	mg/kg				S	8/25/1988	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS6	extrapolated	Acenaphthylene	Acenaphthylene	3.57E-04	mg/kg				S	8/25/1988	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS6	extrapolated	Anthracene	Anthracene	1.90E-03	mg/kg				S	8/25/1988	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS6	extrapolated	Benzo(a)anthracene	Benzo(a)anthracene	1.38E-04	mg/kg				S	8/25/1988	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS6	extrapolated	Benzo(a)pyrene	Benzo(a)pyrene	1.39E-04	mg/kg				S	8/25/1988	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS6	extrapolated	Benzo(b)fluoranthene	Benzo(b)fluoranthene	2.21E-04	mg/kg				S	8/25/1988	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS6	extrapolated	Benzo(e)pyrene	Benzo(e)pyrene	1.05E-03	mg/kg				S	8/25/1988	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS6	extrapolated	Benzo(g,h,i)perylene	Benzo(g,h,i)perylene	1.13E-03	mg/kg				S	8/25/1988	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS6	extrapolated	Benzo(k)fluoranthene	Benzo(k)fluoranthene	1.05E-04	mg/kg				S	8/25/1988	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS6	extrapolated	Chrysene	Chrysene	2.99E-04	mg/kg				S	8/25/1988	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS6	extrapolated	Dibenzo(a,h)anthracene	Dibenz(a,h)anthracene	5.65E-05	mg/kg				S	8/25/1988	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS6	extrapolated	Fluoranthene	Fluoranthene	3.81E-04	mg/kg				S	8/25/1988	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS6	extrapolated	Fluorene	Fluorene	2.90E-03	mg/kg				S	8/25/1988	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS6	extrapolated	Indeno(1,2,3-cd)pyrene	Indeno(1,2,3-cd)pyrene	1.23E-04	mg/kg				S	8/25/1988	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS6	extrapolated	Naphthalene	Naphthalene	3.47E-04	mg/kg				S	8/25/1988	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS6	extrapolated	Perylene	Perylene	6.01E-04	mg/kg				S	8/25/1988	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS6	extrapolated	Phenanthrene	Phenanthrene	7.81E-03	mg/kg				S	8/25/1988	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
OLDCONS	OLDCONS6	extrapolated	Pyrene	Pyrene	6.95E-04	mg/kg				S	8/25/1988	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD033	OCBS01S01	extrapolated	Benzene	Benzene	6.60E-04	mg/kg				S	10/15/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD033	OCBS01S01	extrapolated	Ethylbenzene	Ethylbenzene	6.60E-04	mg/kg				S	10/15/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD033	OCBS01S01	extrapolated	m,p-Xylene	m,p-Xylene	1.98E-03	mg/kg				S	10/15/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD033	OCBS01S01	extrapolated	o-Xylene	o-Xylene	4.40E-04	mg/kg				S	10/15/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD033	OCBS01S01	extrapolated	Toluene	Toluene	6.60E-04	mg/kg				S	10/15/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD033	OCBS01S01	extrapolated	Xylene (total)	Xylenes (total)	2.42E-03	mg/kg				S	10/15/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD033	OCBS01S01	extrapolated	2-Methylnaphthalene	2-Methylnaphthalene	1.51E-01	mg/kg				S	10/15/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD033	OCBS01S01	extrapolated	Acenaphthene	Acenaphthene	9.45E-03	mg/kg				S	10/15/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD033	OCBS01S01	extrapolated	Acenaphthylene	Acenaphthylene	1.16E-03	mg/kg				S	10/15/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD033	OCBS01S01	extrapolated	Anthracene	Anthracene	6.16E-03	mg/kg				S	10/15/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD033	OCBS01S01	extrapolated	Benzo(a)anthracene	Benzo(a)anthracene	4.45E-04	mg/kg				S	10/15/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD033	OCBS01S01	extrapolated	Benzo(a)pyrene	Benzo(a)pyrene	4.49E-04	mg/kg				S	10/15/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD033	OCBS01S01	extrapolated	Benzo(b)fluoranthene	Benzo(b)fluoranthene	7.15E-04	mg/kg				S	10/15/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD033	OCBS01S01	extrapolated	Benzo(e)pyrene	Benzo(e)pyrene	3.41E-03	mg/kg				S	10/15/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD033	OCBS01S01	extrapolated	Benzo(g,h,i)perylene	Benzo(g,h,i)perylene	3.65E-03	mg/kg				S	10/15/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD033	OCBS01S01	extrapolated	Benzo(k)fluoranthene	Benzo(k)fluoranthene	3.38E-04	mg/kg				S	10/15/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD033	OCBS01S01	extrapolated	Chrysene	Chrysene	9.68E-04	mg/kg				S	10/15/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD033	OCBS01S01	extrapolated	Dibenzo(a,h)anthracene	Dibenz(a,h)anthracene	1.83E-04	mg/kg				S	10/15/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD033	OCBS01S01	extrapolated	Fluoranthene	Fluoranthene	1.23E-03	mg/kg				S	10/15/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD033	OCBS01S01	extrapolated	Fluorene	Fluorene	9.37E-03	mg/kg				S	10/15/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD033	OCBS01S01	extrapolated	Indeno(1,2,3-cd)pyrene	Indeno(1,2,3-cd)pyrene	3.97E-04	mg/kg				S	10/15/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD033	OCBS01S01	extrapolated	Naphthalene	Naphthalene	3.82E-02	mg/kg				S	10/15/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD033	OCBS01S01	extrapolated	Perylene	Perylene	1.95E-03	mg/kg				S	10/15/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD033	OCBS01S01	extrapolated	Phenanthrene	Phenanthrene	2.53E-02	mg/kg				S	10/15/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD033	OCBS01S01	extrapolated	Pyrene	Pyrene	2.25E-03	mg/kg				S	10/15/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD035RE	OCBS01S02	extrapolated	Benzene	Benzene	6.60E-04	mg/kg				S	10/15/1997	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD035RE	OCBS01S02	extrapolated	Ethylbenzene	Ethylbenzene	6.60E-04	mg/kg				S	10/15/1997	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD035RE	OCBS01S02	extrapolated	m,p-Xylene	m,p-Xylene	1.98E-03	mg/kg				S	10/15/1997	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD035RE	OCBS01S02	extrapolated	o-Xylene	o-Xylene	4.40E-04	mg/kg				S	10/15/1997	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD035RE	OCBS01S02	extrapolated	Toluene	Toluene	6.60E-04	mg/kg				S	10/15/1997	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD035RE	OCBS01S02	extrapolated	Xylene (total)	Xylenes (total)	2.42E-03	mg/kg				S	10/15/1997	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD035RE	OCBS01S02	extrapolated	2-Methylnaphthalene	2-Methylnaphthalene	1.51E-01	mg/kg				S	10/15/1997	4.50000	Primary Sample	SWMU 7.4 - Old Conservation

Table C7-2
Extrapolated Data
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EPA_NO	SAMPLE_ID	LAB_METHOD	ANALYTE	STD_ANALYT	CONCENTRAT	UNITS	REV_QUAL	Q_CODE	D_LIMIT	MATRIX	DATE_SAMP	DEPTH	SAMPLE_TYP	UNIT
RD035RE	OCBS01S02	extrapolated	Acenaphthene	Acenaphthene	9.45E-03	mg/kg				S	10/15/1997	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD035RE	OCBS01S02	extrapolated	Acenaphthylene	Acenaphthylene	1.16E-03	mg/kg				S	10/15/1997	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD035RE	OCBS01S02	extrapolated	Anthracene	Anthracene	6.16E-03	mg/kg				S	10/15/1997	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD035RE	OCBS01S02	extrapolated	Benzo(a)anthracene	Benzo(a)anthracene	4.45E-04	mg/kg				S	10/15/1997	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD035RE	OCBS01S02	extrapolated	Benzo(a)pyrene	Benzo(a)pyrene	4.49E-04	mg/kg				S	10/15/1997	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD035RE	OCBS01S02	extrapolated	Benzo(b)fluoranthene	Benzo(b)fluoranthene	7.15E-04	mg/kg				S	10/15/1997	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD035RE	OCBS01S02	extrapolated	Benzo(e)pyrene	Benzo(e)pyrene	3.41E-03	mg/kg				S	10/15/1997	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD035RE	OCBS01S02	extrapolated	Benzo(g,h,i)perylene	Benzo(g,h,i)perylene	3.65E-03	mg/kg				S	10/15/1997	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD035RE	OCBS01S02	extrapolated	Benzo(k)fluoranthene	Benzo(k)fluoranthene	3.38E-04	mg/kg				S	10/15/1997	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD035RE	OCBS01S02	extrapolated	Chrysene	Chrysene	9.68E-04	mg/kg				S	10/15/1997	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD035RE	OCBS01S02	extrapolated	Dibenzo(a,h)anthracene	Dibenz(a,h)anthracene	1.83E-04	mg/kg				S	10/15/1997	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD035RE	OCBS01S02	extrapolated	Fluoranthene	Fluoranthene	1.23E-03	mg/kg				S	10/15/1997	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD035RE	OCBS01S02	extrapolated	Fluorene	Fluorene	9.37E-03	mg/kg				S	10/15/1997	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD035RE	OCBS01S02	extrapolated	Indeno(1,2,3-cd)pyrene	Indeno(1,2,3-cd)pyrene	3.97E-04	mg/kg				S	10/15/1997	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD035RE	OCBS01S02	extrapolated	Naphthalene	Naphthalene	3.82E-02	mg/kg				S	10/15/1997	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD035RE	OCBS01S02	extrapolated	Perylene	Perylene	1.95E-03	mg/kg				S	10/15/1997	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD035RE	OCBS01S02	extrapolated	Phenanthrene	Phenanthrene	2.53E-02	mg/kg				S	10/15/1997	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD035RE	OCBS01S02	extrapolated	Pyrene	Pyrene	2.25E-03	mg/kg				S	10/15/1997	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD037	OCBS02S01	extrapolated	Benzene	Benzene	6.60E-04	mg/kg				S	10/15/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD037	OCBS02S01	extrapolated	Ethylbenzene	Ethylbenzene	6.60E-04	mg/kg				S	10/15/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD037	OCBS02S01	extrapolated	m,p-Xylene	m,p-Xylene	1.98E-03	mg/kg				S	10/15/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD037	OCBS02S01	extrapolated	o-Xylene	o-Xylene	4.40E-04	mg/kg				S	10/15/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD037	OCBS02S01	extrapolated	Xylene (total)	Xylenes (total)	2.42E-03	mg/kg				S	10/15/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD037	OCBS02S01	extrapolated	Toluene	Toluene	6.60E-04	mg/kg				S	10/15/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD037	OCBS02S01	extrapolated	2-Methylnaphthalene	2-Methylnaphthalene	1.51E-01	mg/kg				S	10/15/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD037	OCBS02S01	extrapolated	Acenaphthene	Acenaphthene	9.45E-03	mg/kg				S	10/15/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD037	OCBS02S01	extrapolated	Acenaphthylene	Acenaphthylene	1.16E-03	mg/kg				S	10/15/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD037	OCBS02S01	extrapolated	Anthracene	Anthracene	6.16E-03	mg/kg				S	10/15/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD037	OCBS02S01	extrapolated	Benzo(a)anthracene	Benzo(a)anthracene	4.45E-04	mg/kg				S	10/15/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD037	OCBS02S01	extrapolated	Benzo(a)pyrene	Benzo(a)pyrene	4.49E-04	mg/kg				S	10/15/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD037	OCBS02S01	extrapolated	Benzo(b)fluoranthene	Benzo(b)fluoranthene	7.15E-04	mg/kg				S	10/15/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD037	OCBS02S01	extrapolated	Benzo(e)pyrene	Benzo(e)pyrene	3.41E-03	mg/kg				S	10/15/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD037	OCBS02S01	extrapolated	Benzo(g,h,i)perylene	Benzo(g,h,i)perylene	3.65E-03	mg/kg				S	10/15/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD037	OCBS02S01	extrapolated	Benzo(k)fluoranthene	Benzo(k)fluoranthene	3.38E-04	mg/kg				S	10/15/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD037	OCBS02S01	extrapolated	Chrysene	Chrysene	9.68E-04	mg/kg				S	10/15/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD037	OCBS02S01	extrapolated	Dibenzo(a,h)anthracene	Dibenz(a,h)anthracene	1.83E-04	mg/kg				S	10/15/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD037	OCBS02S01	extrapolated	Fluoranthene	Fluoranthene	1.23E-03	mg/kg				S	10/15/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD037	OCBS02S01	extrapolated	Fluorene	Fluorene	9.37E-03	mg/kg				S	10/15/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD037	OCBS02S01	extrapolated	Indeno(1,2,3-cd)pyrene	Indeno(1,2,3-cd)pyrene	3.97E-04	mg/kg				S	10/15/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD037	OCBS02S01	extrapolated	Naphthalene	Naphthalene	3.82E-02	mg/kg				S	10/15/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD037	OCBS02S01	extrapolated	Perylene	Perylene	1.95E-03	mg/kg				S	10/15/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD037	OCBS02S01	extrapolated	Phenanthrene	Phenanthrene	2.53E-02	mg/kg				S	10/15/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD037	OCBS02S01	extrapolated	Pyrene	Pyrene	2.25E-03	mg/kg				S	10/15/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD038RE	OCBS02S02	extrapolated	Benzene	Benzene	6.60E-04	mg/kg				S	10/15/1997	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD038RE	OCBS02S02	extrapolated	Ethylbenzene	Ethylbenzene	6.60E-04	mg/kg				S	10/15/1997	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD038RE	OCBS02S02	extrapolated	m,p-Xylene	m,p-Xylene	1.98E-03	mg/kg				S	10/15/1997	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD038RE	OCBS02S02	extrapolated	o-Xylene	o-Xylene	4.40E-04	mg/kg				S	10/15/1997	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD038RE	OCBS02S02	extrapolated	Xylene (total)	Xylenes (total)	2.42E-03	mg/kg				S	10/15/1997	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD038RE	OCBS02S02	extrapolated	Toluene	Toluene	6.60E-04	mg/kg				S	10/15/1997	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD038RE	OCBS02S02	extrapolated	2-Methylnaphthalene	2-Methylnaphthalene	1.51E-01	mg/kg				S	10/15/1997	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD038RE	OCBS02S02	extrapolated	Acenaphthene	Acenaphthene	9.45E-03	mg/kg				S	10/15/1997	5.00000	Primary Sample	SWMU 7.4 - Old Conservation

Table C7-2
Extrapolated Data
Old Conservation Yard RFI Site

EPA_NO	SAMPLE_ID	LAB_METHOD	ANALYTE	STD_ANALYT	CONCENTRAT	UNITS	REV_QUAL	Q_CODE	D_LIMIT	MATRIX	DATE_SAMP	DEPTH	SAMPLE_TYP	UNIT
RD038RE	OCBS02S02	extrapolated	Acenaphthylene	Acenaphthylene	1.16E-03	mg/kg				S	10/15/1997	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD038RE	OCBS02S02	extrapolated	Anthracene	Anthracene	6.16E-03	mg/kg				S	10/15/1997	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD038RE	OCBS02S02	extrapolated	Benzo(a)anthracene	Benzo(a)anthracene	4.45E-04	mg/kg				S	10/15/1997	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD038RE	OCBS02S02	extrapolated	Benzo(a)pyrene	Benzo(a)pyrene	4.49E-04	mg/kg				S	10/15/1997	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD038RE	OCBS02S02	extrapolated	Benzo(b)fluoranthene	Benzo(b)fluoranthene	7.15E-04	mg/kg				S	10/15/1997	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD038RE	OCBS02S02	extrapolated	Benzo(e)pyrene	Benzo(e)pyrene	3.41E-03	mg/kg				S	10/15/1997	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD038RE	OCBS02S02	extrapolated	Benzo(g,h,i)perylene	Benzo(g,h,i)perylene	3.65E-03	mg/kg				S	10/15/1997	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD038RE	OCBS02S02	extrapolated	Benzo(k)fluoranthene	Benzo(k)fluoranthene	3.38E-04	mg/kg				S	10/15/1997	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD038RE	OCBS02S02	extrapolated	Chrysene	Chrysene	9.68E-04	mg/kg				S	10/15/1997	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD038RE	OCBS02S02	extrapolated	Dibenz(a,h)anthracene	Dibenz(a,h)anthracene	1.83E-04	mg/kg				S	10/15/1997	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD038RE	OCBS02S02	extrapolated	Fluoranthene	Fluoranthene	1.23E-03	mg/kg				S	10/15/1997	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD038RE	OCBS02S02	extrapolated	Fluorene	Fluorene	9.37E-03	mg/kg				S	10/15/1997	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD038RE	OCBS02S02	extrapolated	Indeno(1,2,3-cd)pyrene	Indeno(1,2,3-cd)pyrene	3.97E-04	mg/kg				S	10/15/1997	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD038RE	OCBS02S02	extrapolated	Naphthalene	Naphthalene	3.82E-02	mg/kg				S	10/15/1997	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD038RE	OCBS02S02	extrapolated	Perylene	Perylene	1.95E-03	mg/kg				S	10/15/1997	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD038RE	OCBS02S02	extrapolated	Phenanthrene	Phenanthrene	2.53E-02	mg/kg				S	10/15/1997	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD038RE	OCBS02S02	extrapolated	Pyrene	Pyrene	2.25E-03	mg/kg				S	10/15/1997	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD063	OCBS03S01	extrapolated	Xylene (total)	Xylenes (total)	1.85E-02	mg/kg				S	10/20/1997	1.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD063	OCBS03S01	extrapolated	2-Methylnaphthalene	2-Methylnaphthalene	1.16E+00	mg/kg				S	10/20/1997	1.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD063	OCBS03S01	extrapolated	Acenaphthene	Acenaphthene	9.45E-03	mg/kg				S	10/20/1997	1.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD063	OCBS03S01	extrapolated	Acenaphthylene	Acenaphthylene	1.16E-03	mg/kg				S	10/20/1997	1.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD063	OCBS03S01	extrapolated	Anthracene	Anthracene	6.16E-03	mg/kg				S	10/20/1997	1.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD063	OCBS03S01	extrapolated	Benzo(a)anthracene	Benzo(a)anthracene	4.45E-04	mg/kg				S	10/20/1997	1.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD063	OCBS03S01	extrapolated	Benzo(a)pyrene	Benzo(a)pyrene	4.49E-04	mg/kg				S	10/20/1997	1.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD063	OCBS03S01	extrapolated	Benzo(b)fluoranthene	Benzo(b)fluoranthene	7.15E-04	mg/kg				S	10/20/1997	1.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD063	OCBS03S01	extrapolated	Benzo(e)pyrene	Benzo(e)pyrene	3.41E-03	mg/kg				S	10/20/1997	1.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD063	OCBS03S01	extrapolated	Benzo(g,h,i)perylene	Benzo(g,h,i)perylene	3.65E-03	mg/kg				S	10/20/1997	1.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD063	OCBS03S01	extrapolated	Benzo(k)fluoranthene	Benzo(k)fluoranthene	3.38E-04	mg/kg				S	10/20/1997	1.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD063	OCBS03S01	extrapolated	Chrysene	Chrysene	9.68E-04	mg/kg				S	10/20/1997	1.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD063	OCBS03S01	extrapolated	Dibenz(a,h)anthracene	Dibenz(a,h)anthracene	1.83E-04	mg/kg				S	10/20/1997	1.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD063	OCBS03S01	extrapolated	Fluoranthene	Fluoranthene	1.23E-03	mg/kg				S	10/20/1997	1.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD063	OCBS03S01	extrapolated	Fluorene	Fluorene	9.37E-03	mg/kg				S	10/20/1997	1.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD063	OCBS03S01	extrapolated	Indeno(1,2,3-cd)pyrene	Indeno(1,2,3-cd)pyrene	3.97E-04	mg/kg				S	10/20/1997	1.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD063	OCBS03S01	extrapolated	Naphthalene	Naphthalene	2.92E-01	mg/kg				S	10/20/1997	1.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD063	OCBS03S01	extrapolated	Perylene	Perylene	1.95E-03	mg/kg				S	10/20/1997	1.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD063	OCBS03S01	extrapolated	Phenanthrene	Phenanthrene	2.53E-02	mg/kg				S	10/20/1997	1.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD063	OCBS03S01	extrapolated	Pyrene	Pyrene	2.25E-03	mg/kg				S	10/20/1997	1.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD064	OCBS03S02	extrapolated	Benzene	Benzene	6.60E-04	mg/kg				S	10/20/1997	6.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD064	OCBS03S02	extrapolated	Ethylbenzene	Ethylbenzene	6.60E-04	mg/kg				S	10/20/1997	6.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD064	OCBS03S02	extrapolated	m,p-Xylene	m,p-Xylene	1.98E-03	mg/kg				S	10/20/1997	6.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD064	OCBS03S02	extrapolated	o-Xylene	o-Xylene	4.40E-04	mg/kg				S	10/20/1997	6.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD064	OCBS03S02	extrapolated	Xylene (total)	Xylenes (total)	2.42E-03	mg/kg				S	10/20/1997	6.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD064	OCBS03S02	extrapolated	Toluene	Toluene	6.60E-04	mg/kg				S	10/20/1997	6.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD064	OCBS03S02	extrapolated	2-Methylnaphthalene	2-Methylnaphthalene	1.51E-01	mg/kg				S	10/20/1997	6.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD064	OCBS03S02	extrapolated	Acenaphthene	Acenaphthene	1.42E-01	mg/kg				S	10/20/1997	6.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD064	OCBS03S02	extrapolated	Acenaphthylene	Acenaphthylene	1.74E-02	mg/kg				S	10/20/1997	6.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD064	OCBS03S02	extrapolated	Anthracene	Anthracene	9.28E-02	mg/kg				S	10/20/1997	6.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD064	OCBS03S02	extrapolated	Benzo(a)anthracene	Benzo(a)anthracene	6.70E-03	mg/kg				S	10/20/1997	6.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD064	OCBS03S02	extrapolated	Benzo(a)pyrene	Benzo(a)pyrene	6.76E-03	mg/kg				S	10/20/1997	6.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD064	OCBS03S02	extrapolated	Benzo(b)fluoranthene	Benzo(b)fluoranthene	1.08E-02	mg/kg				S	10/20/1997	6.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD064	OCBS03S02	extrapolated	Benzo(e)pyrene	Benzo(e)pyrene	5.14E-02	mg/kg				S	10/20/1997	6.00000	Primary Sample	SWMU 7.4 - Old Conservation

Table C7-2
Extrapolated Data
Old Conservation Yard RFI Site

EPA_NO	SAMPLE_ID	LAB_METHOD	ANALYTE	STD_ANALYT	CONCENTRAT	UNITS	REV_QUAL	Q_CODE	D_LIMIT	MATRIX	DATE_SAMP	DEPTH	SAMPLE_TYP	UNIT
RD064	OCBS03S02	extrapolated	Benzo(g,h,i)perylene	Benzo(g,h,i)perylene	5.50E-02	mg/kg				S	10/20/1997	6.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD064	OCBS03S02	extrapolated	Benzo(k)fluoranthene	Benzo(k)fluoranthene	5.10E-03	mg/kg				S	10/20/1997	6.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD064	OCBS03S02	extrapolated	Chrysene	Chrysene	1.46E-02	mg/kg				S	10/20/1997	6.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD064	OCBS03S02	extrapolated	Dibenz(a,h)anthracene	Dibenz(a,h)anthracene	2.75E-03	mg/kg				S	10/20/1997	6.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD064	OCBS03S02	extrapolated	Fluoranthene	Fluoranthene	1.86E-02	mg/kg				S	10/20/1997	6.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD064	OCBS03S02	extrapolated	Fluorene	Fluorene	1.41E-01	mg/kg				S	10/20/1997	6.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD064	OCBS03S02	extrapolated	Indeno(1,2,3-cd)pyrene	Indeno(1,2,3-cd)pyrene	5.98E-03	mg/kg				S	10/20/1997	6.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD064	OCBS03S02	extrapolated	Naphthalene	Naphthalene	3.82E-02	mg/kg				S	10/20/1997	6.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD064	OCBS03S02	extrapolated	Perylene	Perylene	2.93E-02	mg/kg				S	10/20/1997	6.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD064	OCBS03S02	extrapolated	Phenanthrene	Phenanthrene	3.81E-01	mg/kg				S	10/20/1997	6.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD064	OCBS03S02	extrapolated	Pyrene	Pyrene	3.39E-02	mg/kg				S	10/20/1997	6.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD065	OCBS04S01	extrapolated	Benzene	Benzene	6.60E-04	mg/kg				S	10/20/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD065	OCBS04S01	extrapolated	Ethylbenzene	Ethylbenzene	6.60E-04	mg/kg				S	10/20/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD065	OCBS04S01	extrapolated	Toluene	Toluene	6.60E-04	mg/kg				S	10/20/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD065	OCBS04S01	extrapolated	m,p-Xylene	m,p-Xylene	1.98E-03	mg/kg				S	10/20/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD065	OCBS04S01	extrapolated	o-Xylene	o-Xylene	4.40E-04	mg/kg				S	10/20/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD065	OCBS04S01	extrapolated	Xylene (total)	Xylenes (total)	2.42E-03	mg/kg				S	10/20/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD065	OCBS04S01	extrapolated	2-Methylnaphthalene	2-Methylnaphthalene	1.51E-01	mg/kg				S	10/20/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD065	OCBS04S01	extrapolated	Acenaphthene	Acenaphthene	5.50E-02	mg/kg				S	10/20/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD065	OCBS04S01	extrapolated	Acenaphthylene	Acenaphthylene	6.73E-03	mg/kg				S	10/20/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD065	OCBS04S01	extrapolated	Anthracene	Anthracene	3.58E-02	mg/kg				S	10/20/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD065	OCBS04S01	extrapolated	Benzo(a)anthracene	Benzo(a)anthracene	2.59E-03	mg/kg				S	10/20/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD065	OCBS04S01	extrapolated	Benzo(a)pyrene	Benzo(a)pyrene	2.61E-03	mg/kg				S	10/20/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD065	OCBS04S01	extrapolated	Benzo(b)fluoranthene	Benzo(b)fluoranthene	4.16E-03	mg/kg				S	10/20/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD065	OCBS04S01	extrapolated	Benzo(e)pyrene	Benzo(e)pyrene	1.98E-02	mg/kg				S	10/20/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD065	OCBS04S01	extrapolated	Benzo(g,h,i)perylene	Benzo(g,h,i)perylene	2.12E-02	mg/kg				S	10/20/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD065	OCBS04S01	extrapolated	Benzo(k)fluoranthene	Benzo(k)fluoranthene	1.97E-03	mg/kg				S	10/20/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD065	OCBS04S01	extrapolated	Chrysene	Chrysene	5.63E-03	mg/kg				S	10/20/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD065	OCBS04S01	extrapolated	Dibenz(a,h)anthracene	Dibenz(a,h)anthracene	1.06E-03	mg/kg				S	10/20/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD065	OCBS04S01	extrapolated	Fluoranthene	Fluoranthene	7.18E-03	mg/kg				S	10/20/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD065	OCBS04S01	extrapolated	Fluorene	Fluorene	5.45E-02	mg/kg				S	10/20/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD065	OCBS04S01	extrapolated	Indeno(1,2,3-cd)pyrene	Indeno(1,2,3-cd)pyrene	2.31E-03	mg/kg				S	10/20/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD065	OCBS04S01	extrapolated	Naphthalene	Naphthalene	3.82E-02	mg/kg				S	10/20/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD065	OCBS04S01	extrapolated	Perylene	Perylene	1.13E-02	mg/kg				S	10/20/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD065	OCBS04S01	extrapolated	Phenanthrene	Phenanthrene	1.47E-01	mg/kg				S	10/20/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD065	OCBS04S01	extrapolated	Pyrene	Pyrene	1.31E-02	mg/kg				S	10/20/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD066	OCBS04S02	extrapolated	Benzene	Benzene	7.20E-04	mg/kg				S	10/20/1997	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD066	OCBS04S02	extrapolated	Ethylbenzene	Ethylbenzene	7.20E-04	mg/kg				S	10/20/1997	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD066	OCBS04S02	extrapolated	Toluene	Toluene	7.20E-04	mg/kg				S	10/20/1997	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD066	OCBS04S02	extrapolated	m,p-Xylene	m,p-Xylene	2.16E-03	mg/kg				S	10/20/1997	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD066	OCBS04S02	extrapolated	o-Xylene	o-Xylene	4.80E-04	mg/kg				S	10/20/1997	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD066	OCBS04S02	extrapolated	Xylene (total)	Xylenes (total)	2.64E-03	mg/kg				S	10/20/1997	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD066	OCBS04S02	extrapolated	2-Methylnaphthalene	2-Methylnaphthalene	1.65E-01	mg/kg				S	10/20/1997	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD066	OCBS04S02	extrapolated	Acenaphthene	Acenaphthene	1.03E-02	mg/kg				S	10/20/1997	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD066	OCBS04S02	extrapolated	Acenaphthylene	Acenaphthylene	1.26E-03	mg/kg				S	10/20/1997	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD066	OCBS04S02	extrapolated	Anthracene	Anthracene	6.72E-03	mg/kg				S	10/20/1997	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD066	OCBS04S02	extrapolated	Benzo(a)anthracene	Benzo(a)anthracene	4.85E-04	mg/kg				S	10/20/1997	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD066	OCBS04S02	extrapolated	Benzo(a)pyrene	Benzo(a)pyrene	4.90E-04	mg/kg				S	10/20/1997	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD066	OCBS04S02	extrapolated	Benzo(b)fluoranthene	Benzo(b)fluoranthene	7.80E-04	mg/kg				S	10/20/1997	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD066	OCBS04S02	extrapolated	Benzo(e)pyrene	Benzo(e)pyrene	3.72E-03	mg/kg				S	10/20/1997	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD066	OCBS04S02	extrapolated	Benzo(g,h,i)perylene	Benzo(g,h,i)perylene	3.98E-03	mg/kg				S	10/20/1997	4.50000	Primary Sample	SWMU 7.4 - Old Conservation

Table C7-2
Extrapolated Data
Old Conservation Yard RFI Site

EPA_NO	SAMPLE_ID	LAB_METHOD	ANALYTE	STD_ANALYT	CONCENTRAT	UNITS	REV_QUAL	Q_CODE	D_LIMIT	MATRIX	DATE_SAMP	DEPTH	SAMPLE_TYP	UNIT
RD066	OCBS04S02	extrapolated	Benzo(k)fluoranthene	Benzo(k)fluoranthene	3.69E-04	mg/kg				S	10/20/1997	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD066	OCBS04S02	extrapolated	Chrysene	Chrysene	1.06E-03	mg/kg				S	10/20/1997	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD066	OCBS04S02	extrapolated	Dibenz(a,h)anthracene	Dibenz(a,h)anthracene	1.99E-04	mg/kg				S	10/20/1997	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD066	OCBS04S02	extrapolated	Fluoranthene	Fluoranthene	1.35E-03	mg/kg				S	10/20/1997	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD066	OCBS04S02	extrapolated	Fluorene	Fluorene	1.02E-02	mg/kg				S	10/20/1997	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD066	OCBS04S02	extrapolated	Indeno(1,2,3-cd)pyrene	Indeno(1,2,3-cd)pyrene	4.33E-04	mg/kg				S	10/20/1997	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD066	OCBS04S02	extrapolated	Naphthalene	Naphthalene	4.17E-02	mg/kg				S	10/20/1997	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD066	OCBS04S02	extrapolated	Perylene	Perylene	2.12E-03	mg/kg				S	10/20/1997	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD066	OCBS04S02	extrapolated	Phenanthrene	Phenanthrene	2.76E-02	mg/kg				S	10/20/1997	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD066	OCBS04S02	extrapolated	Pyrene	Pyrene	2.45E-03	mg/kg				S	10/20/1997	4.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD067	OCBS05S01	extrapolated	Benzene	Benzene	7.20E-04	mg/kg				S	10/20/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD067	OCBS05S01	extrapolated	Ethylbenzene	Ethylbenzene	7.20E-04	mg/kg				S	10/20/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD067	OCBS05S01	extrapolated	Toluene	Toluene	7.20E-04	mg/kg				S	10/20/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD067	OCBS05S01	extrapolated	m,p-Xylene	m,p-Xylene	2.16E-03	mg/kg				S	10/20/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD067	OCBS05S01	extrapolated	o-Xylene	o-Xylene	4.80E-04	mg/kg				S	10/20/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD067	OCBS05S01	extrapolated	Xylene (total)	Xylenes (total)	2.64E-03	mg/kg				S	10/20/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD067	OCBS05S01	extrapolated	2-Methylnaphthalene	2-Methylnaphthalene	1.65E-01	mg/kg				S	10/20/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD067	OCBS05S01	extrapolated	Acenaphthene	Acenaphthene	6.99E-02	mg/kg				S	10/20/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD067	OCBS05S01	extrapolated	Acenaphthylene	Acenaphthylene	8.55E-03	mg/kg				S	10/20/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD067	OCBS05S01	extrapolated	Anthracene	Anthracene	4.56E-02	mg/kg				S	10/20/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD067	OCBS05S01	extrapolated	Benzo(a)anthracene	Benzo(a)anthracene	3.29E-03	mg/kg				S	10/20/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD067	OCBS05S01	extrapolated	Benzo(a)pyrene	Benzo(a)pyrene	3.32E-03	mg/kg				S	10/20/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD067	OCBS05S01	extrapolated	Benzo(b)fluoranthene	Benzo(b)fluoranthene	5.28E-03	mg/kg				S	10/20/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD067	OCBS05S01	extrapolated	Benzo(e)pyrene	Benzo(e)pyrene	2.52E-02	mg/kg				S	10/20/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD067	OCBS05S01	extrapolated	Benzo(g,h,i)perylene	Benzo(g,h,i)perylene	2.70E-02	mg/kg				S	10/20/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD067	OCBS05S01	extrapolated	Benzo(k)fluoranthene	Benzo(k)fluoranthene	2.50E-03	mg/kg				S	10/20/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD067	OCBS05S01	extrapolated	Chrysene	Chrysene	7.16E-03	mg/kg				S	10/20/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD067	OCBS05S01	extrapolated	Dibenz(a,h)anthracene	Dibenz(a,h)anthracene	1.35E-03	mg/kg				S	10/20/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD067	OCBS05S01	extrapolated	Fluoranthene	Fluoranthene	9.13E-03	mg/kg				S	10/20/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD067	OCBS05S01	extrapolated	Fluorene	Fluorene	6.93E-02	mg/kg				S	10/20/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD067	OCBS05S01	extrapolated	Indeno(1,2,3-cd)pyrene	Indeno(1,2,3-cd)pyrene	2.93E-03	mg/kg				S	10/20/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD067	OCBS05S01	extrapolated	Naphthalene	Naphthalene	4.17E-02	mg/kg				S	10/20/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD067	OCBS05S01	extrapolated	Perylene	Perylene	1.44E-02	mg/kg				S	10/20/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD067	OCBS05S01	extrapolated	Phenanthrene	Phenanthrene	1.87E-01	mg/kg				S	10/20/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD067	OCBS05S01	extrapolated	Pyrene	Pyrene	1.66E-02	mg/kg				S	10/20/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD068	OCBS06S01	extrapolated	Benzene	Benzene	6.54E-03	mg/kg				S	10/20/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD068	OCBS06S01	extrapolated	Ethylbenzene	Ethylbenzene	6.54E-03	mg/kg				S	10/20/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD068	OCBS06S01	extrapolated	Toluene	Toluene	6.54E-03	mg/kg				S	10/20/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD068	OCBS06S01	extrapolated	m,p-Xylene	m,p-Xylene	1.96E-02	mg/kg				S	10/20/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD068	OCBS06S01	extrapolated	o-Xylene	o-Xylene	4.36E-03	mg/kg				S	10/20/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD068	OCBS06S01	extrapolated	Xylene (total)	Xylenes (total)	2.40E-02	mg/kg				S	10/20/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD068	OCBS06S01	extrapolated	2-Methylnaphthalene	2-Methylnaphthalene	1.50E+00	mg/kg				S	10/20/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD068	OCBS06S01	extrapolated	Acenaphthene	Acenaphthene	2.72E+00	mg/kg				S	10/20/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD068	OCBS06S01	extrapolated	Acenaphthylene	Acenaphthylene	3.33E-01	mg/kg				S	10/20/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD068	OCBS06S01	extrapolated	Anthracene	Anthracene	1.78E+00	mg/kg				S	10/20/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD068	OCBS06S01	extrapolated	Benzo(a)anthracene	Benzo(a)anthracene	1.28E-01	mg/kg				S	10/20/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD068	OCBS06S01	extrapolated	Benzo(a)pyrene	Benzo(a)pyrene	1.29E-01	mg/kg				S	10/20/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD068	OCBS06S01	extrapolated	Benzo(b)fluoranthene	Benzo(b)fluoranthene	2.06E-01	mg/kg				S	10/20/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD068	OCBS06S01	extrapolated	Benzo(e)pyrene	Benzo(e)pyrene	9.83E-01	mg/kg				S	10/20/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD068	OCBS06S01	extrapolated	Benzo(g,h,i)perylene	Benzo(g,h,i)perylene	1.05E+00	mg/kg				S	10/20/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD068	OCBS06S01	extrapolated	Benzo(k)fluoranthene	Benzo(k)fluoranthene	9.75E-02	mg/kg				S	10/20/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation

Table C7-2
Extrapolated Data
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EPA_NO	SAMPLE_ID	LAB_METHOD	ANALYTE	STD_ANALYT	CONCENTRAT	UNITS	REV_QUAL	Q_CODE	D_LIMIT	MATRIX	DATE_SAMP	DEPTH	SAMPLE_TYP	UNIT
RD068	OCBS06S01	extrapolated	Chrysene	Chrysene	2.79E-01	mg/kg				S	10/20/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD068	OCBS06S01	extrapolated	Dibenz(a,h)anthracene	Dibenz(a,h)anthracene	5.26E-02	mg/kg				S	10/20/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD068	OCBS06S01	extrapolated	Fluoranthene	Fluoranthene	3.56E-01	mg/kg				S	10/20/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD068	OCBS06S01	extrapolated	Fluorene	Fluorene	2.70E+00	mg/kg				S	10/20/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD068	OCBS06S01	extrapolated	Indeno(1,2,3-cd)pyrene	Indeno(1,2,3-cd)pyrene	1.14E-01	mg/kg				S	10/20/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD068	OCBS06S01	extrapolated	Naphthalene	Naphthalene	3.79E-01	mg/kg				S	10/20/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD068	OCBS06S01	extrapolated	Perylene	Perylene	5.61E-01	mg/kg				S	10/20/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD068	OCBS06S01	extrapolated	Phenanthrene	Phenanthrene	7.28E+00	mg/kg				S	10/20/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD068	OCBS06S01	extrapolated	Pyrene	Pyrene	6.48E-01	mg/kg				S	10/20/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD069	OCBS07S01	extrapolated	Benzene	Benzene	6.60E-04	mg/kg				S	10/20/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD069	OCBS07S01	extrapolated	Ethylbenzene	Ethylbenzene	6.60E-04	mg/kg				S	10/20/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD069	OCBS07S01	extrapolated	Toluene	Toluene	6.60E-04	mg/kg				S	10/20/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD069	OCBS07S01	extrapolated	m,p-Xylene	m,p-Xylene	1.98E-03	mg/kg				S	10/20/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD069	OCBS07S01	extrapolated	o-Xylene	o-Xylene	4.40E-04	mg/kg				S	10/20/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD069	OCBS07S01	extrapolated	Xylene (total)	Xylenes (total)	2.42E-03	mg/kg				S	10/20/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD069	OCBS07S01	extrapolated	2-Methylnaphthalene	2-Methylnaphthalene	1.51E-01	mg/kg				S	10/20/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD069	OCBS07S01	extrapolated	Acenaphthene	Acenaphthene	9.45E-03	mg/kg				S	10/20/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD069	OCBS07S01	extrapolated	Acenaphthylene	Acenaphthylene	1.16E-03	mg/kg				S	10/20/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD069	OCBS07S01	extrapolated	Anthracene	Anthracene	6.16E-03	mg/kg				S	10/20/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD069	OCBS07S01	extrapolated	Benzo(a)anthracene	Benzo(a)anthracene	4.45E-04	mg/kg				S	10/20/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD069	OCBS07S01	extrapolated	Benzo(a)pyrene	Benzo(a)pyrene	4.49E-04	mg/kg				S	10/20/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD069	OCBS07S01	extrapolated	Benzo(b)fluoranthene	Benzo(b)fluoranthene	7.15E-04	mg/kg				S	10/20/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD069	OCBS07S01	extrapolated	Benzo(e)pyrene	Benzo(e)pyrene	3.41E-03	mg/kg				S	10/20/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD069	OCBS07S01	extrapolated	Benzo(g,h,i)perylene	Benzo(g,h,i)perylene	3.65E-03	mg/kg				S	10/20/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD069	OCBS07S01	extrapolated	Benzo(k)fluoranthene	Benzo(k)fluoranthene	3.38E-04	mg/kg				S	10/20/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD069	OCBS07S01	extrapolated	Chrysene	Chrysene	9.68E-04	mg/kg				S	10/20/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD069	OCBS07S01	extrapolated	Dibenz(a,h)anthracene	Dibenz(a,h)anthracene	1.83E-04	mg/kg				S	10/20/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD069	OCBS07S01	extrapolated	Fluoranthene	Fluoranthene	1.23E-03	mg/kg				S	10/20/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD069	OCBS07S01	extrapolated	Fluorene	Fluorene	9.37E-03	mg/kg				S	10/20/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD069	OCBS07S01	extrapolated	Indeno(1,2,3-cd)pyrene	Indeno(1,2,3-cd)pyrene	3.97E-04	mg/kg				S	10/20/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD069	OCBS07S01	extrapolated	Naphthalene	Naphthalene	3.82E-02	mg/kg				S	10/20/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD069	OCBS07S01	extrapolated	Perylene	Perylene	1.95E-03	mg/kg				S	10/20/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD069	OCBS07S01	extrapolated	Phenanthrene	Phenanthrene	2.53E-02	mg/kg				S	10/20/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD069	OCBS07S01	extrapolated	Pyrene	Pyrene	2.25E-03	mg/kg				S	10/20/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD070	OCBS07S02	extrapolated	Benzene	Benzene	6.60E-04	mg/kg				S	10/20/1997	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD070	OCBS07S02	extrapolated	Ethylbenzene	Ethylbenzene	6.60E-04	mg/kg				S	10/20/1997	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD070	OCBS07S02	extrapolated	Toluene	Toluene	6.60E-04	mg/kg				S	10/20/1997	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD070	OCBS07S02	extrapolated	m,p-Xylene	m,p-Xylene	1.98E-03	mg/kg				S	10/20/1997	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD070	OCBS07S02	extrapolated	o-Xylene	o-Xylene	4.40E-04	mg/kg				S	10/20/1997	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD070	OCBS07S02	extrapolated	Xylene (total)	Xylenes (total)	2.42E-03	mg/kg				S	10/20/1997	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD070	OCBS07S02	extrapolated	2-Methylnaphthalene	2-Methylnaphthalene	1.51E-01	mg/kg				S	10/20/1997	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD070	OCBS07S02	extrapolated	Acenaphthene	Acenaphthene	9.45E-03	mg/kg				S	10/20/1997	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD070	OCBS07S02	extrapolated	Acenaphthylene	Acenaphthylene	1.16E-03	mg/kg				S	10/20/1997	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD070	OCBS07S02	extrapolated	Anthracene	Anthracene	6.16E-03	mg/kg				S	10/20/1997	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD070	OCBS07S02	extrapolated	Benzo(a)anthracene	Benzo(a)anthracene	4.45E-04	mg/kg				S	10/20/1997	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD070	OCBS07S02	extrapolated	Benzo(a)pyrene	Benzo(a)pyrene	4.49E-04	mg/kg				S	10/20/1997	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD070	OCBS07S02	extrapolated	Benzo(b)fluoranthene	Benzo(b)fluoranthene	7.15E-04	mg/kg				S	10/20/1997	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD070	OCBS07S02	extrapolated	Benzo(e)pyrene	Benzo(e)pyrene	3.41E-03	mg/kg				S	10/20/1997	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD070	OCBS07S02	extrapolated	Benzo(g,h,i)perylene	Benzo(g,h,i)perylene	3.65E-03	mg/kg				S	10/20/1997	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD070	OCBS07S02	extrapolated	Benzo(k)fluoranthene	Benzo(k)fluoranthene	3.38E-04	mg/kg				S	10/20/1997	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD070	OCBS07S02	extrapolated	Chrysene	Chrysene	9.68E-04	mg/kg				S	10/20/1997	5.00000	Primary Sample	SWMU 7.4 - Old Conservation

Table C7-2
Extrapolated Data
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EPA_NO	SAMPLE_ID	LAB_METHOD	ANALYTE	STD_ANALYT	CONCENTRAT	UNITS	REV_QUAL	Q_CODE	D_LIMIT	MATRIX	DATE_SAMP	DEPTH	SAMPLE_TYP	UNIT
RD070	OCBS07S02	extrapolated	Dibenz(a,h)anthracene	Dibenz(a,h)anthracene	1.83E-04	mg/kg				S	10/20/1997	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD070	OCBS07S02	extrapolated	Fluoranthene	Fluoranthene	1.23E-03	mg/kg				S	10/20/1997	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD070	OCBS07S02	extrapolated	Fluorene	Fluorene	9.37E-03	mg/kg				S	10/20/1997	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD070	OCBS07S02	extrapolated	Indeno(1,2,3-cd)pyrene	Indeno(1,2,3-cd)pyrene	3.97E-04	mg/kg				S	10/20/1997	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD070	OCBS07S02	extrapolated	Naphthalene	Naphthalene	3.82E-02	mg/kg				S	10/20/1997	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD070	OCBS07S02	extrapolated	Perylene	Perylene	1.95E-03	mg/kg				S	10/20/1997	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD070	OCBS07S02	extrapolated	Phenanthrene	Phenanthrene	2.53E-02	mg/kg				S	10/20/1997	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD070	OCBS07S02	extrapolated	Pyrene	Pyrene	2.25E-03	mg/kg				S	10/20/1997	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD071	OCBS08S01	extrapolated	Benzene	Benzene	6.60E-04	mg/kg				S	10/20/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD071	OCBS08S01	extrapolated	Ethylbenzene	Ethylbenzene	6.60E-04	mg/kg				S	10/20/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD071	OCBS08S01	extrapolated	Toluene	Toluene	6.60E-04	mg/kg				S	10/20/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD071	OCBS08S01	extrapolated	m,p-Xylene	m,p-Xylene	1.98E-03	mg/kg				S	10/20/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD071	OCBS08S01	extrapolated	o-Xylene	o-Xylene	4.40E-04	mg/kg				S	10/20/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD071	OCBS08S01	extrapolated	Xylene (total)	Xylenes (total)	2.42E-03	mg/kg				S	10/20/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD071	OCBS08S01	extrapolated	2-Methylnaphthalene	2-Methylnaphthalene	1.51E-01	mg/kg				S	10/20/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD071	OCBS08S01	extrapolated	Acenaphthene	Acenaphthene	9.45E-03	mg/kg				S	10/20/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD071	OCBS08S01	extrapolated	Acenaphthylene	Acenaphthylene	1.16E-03	mg/kg				S	10/20/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD071	OCBS08S01	extrapolated	Anthracene	Anthracene	6.16E-03	mg/kg				S	10/20/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD071	OCBS08S01	extrapolated	Benzo(a)anthracene	Benzo(a)anthracene	4.45E-04	mg/kg				S	10/20/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD071	OCBS08S01	extrapolated	Benzo(a)pyrene	Benzo(a)pyrene	4.49E-04	mg/kg				S	10/20/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD071	OCBS08S01	extrapolated	Benzo(b)fluoranthene	Benzo(b)fluoranthene	7.15E-04	mg/kg				S	10/20/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD071	OCBS08S01	extrapolated	Benzo(e)pyrene	Benzo(e)pyrene	3.41E-03	mg/kg				S	10/20/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD071	OCBS08S01	extrapolated	Benzo(g,h,i)perylene	Benzo(g,h,i)perylene	3.65E-03	mg/kg				S	10/20/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD071	OCBS08S01	extrapolated	Benzo(k)fluoranthene	Benzo(k)fluoranthene	3.38E-04	mg/kg				S	10/20/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD071	OCBS08S01	extrapolated	Chrysene	Chrysene	9.68E-04	mg/kg				S	10/20/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD071	OCBS08S01	extrapolated	Dibenz(a,h)anthracene	Dibenz(a,h)anthracene	1.83E-04	mg/kg				S	10/20/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD071	OCBS08S01	extrapolated	Fluoranthene	Fluoranthene	1.23E-03	mg/kg				S	10/20/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD071	OCBS08S01	extrapolated	Fluorene	Fluorene	9.37E-03	mg/kg				S	10/20/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD071	OCBS08S01	extrapolated	Indeno(1,2,3-cd)pyrene	Indeno(1,2,3-cd)pyrene	3.97E-04	mg/kg				S	10/20/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD071	OCBS08S01	extrapolated	Naphthalene	Naphthalene	3.82E-02	mg/kg				S	10/20/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD071	OCBS08S01	extrapolated	Perylene	Perylene	1.95E-03	mg/kg				S	10/20/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD071	OCBS08S01	extrapolated	Phenanthrene	Phenanthrene	2.53E-02	mg/kg				S	10/20/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD071	OCBS08S01	extrapolated	Pyrene	Pyrene	2.25E-03	mg/kg				S	10/20/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD072	OCBS08S02	extrapolated	Benzene	Benzene	6.60E-04	mg/kg				S	10/20/1997	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD072	OCBS08S02	extrapolated	Ethylbenzene	Ethylbenzene	6.60E-04	mg/kg				S	10/20/1997	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD072	OCBS08S02	extrapolated	Toluene	Toluene	6.60E-04	mg/kg				S	10/20/1997	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD072	OCBS08S02	extrapolated	m,p-Xylene	m,p-Xylene	1.98E-03	mg/kg				S	10/20/1997	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD072	OCBS08S02	extrapolated	o-Xylene	o-Xylene	4.40E-04	mg/kg				S	10/20/1997	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD072	OCBS08S02	extrapolated	Xylene (total)	Xylenes (total)	2.42E-03	mg/kg				S	10/20/1997	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD072	OCBS08S02	extrapolated	2-Methylnaphthalene	2-Methylnaphthalene	1.51E-01	mg/kg				S	10/20/1997	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD072	OCBS08S02	extrapolated	Acenaphthene	Acenaphthene	9.45E-03	mg/kg				S	10/20/1997	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD072	OCBS08S02	extrapolated	Acenaphthylene	Acenaphthylene	1.16E-03	mg/kg				S	10/20/1997	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD072	OCBS08S02	extrapolated	Anthracene	Anthracene	6.16E-03	mg/kg				S	10/20/1997	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD072	OCBS08S02	extrapolated	Benzo(a)anthracene	Benzo(a)anthracene	4.45E-04	mg/kg				S	10/20/1997	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD072	OCBS08S02	extrapolated	Benzo(a)pyrene	Benzo(a)pyrene	4.49E-04	mg/kg				S	10/20/1997	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD072	OCBS08S02	extrapolated	Benzo(b)fluoranthene	Benzo(b)fluoranthene	7.15E-04	mg/kg				S	10/20/1997	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD072	OCBS08S02	extrapolated	Benzo(e)pyrene	Benzo(e)pyrene	3.41E-03	mg/kg				S	10/20/1997	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD072	OCBS08S02	extrapolated	Benzo(g,h,i)perylene	Benzo(g,h,i)perylene	3.65E-03	mg/kg				S	10/20/1997	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD072	OCBS08S02	extrapolated	Benzo(k)fluoranthene	Benzo(k)fluoranthene	3.38E-04	mg/kg				S	10/20/1997	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD072	OCBS08S02	extrapolated	Chrysene	Chrysene	9.68E-04	mg/kg				S	10/20/1997	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD072	OCBS08S02	extrapolated	Dibenz(a,h)anthracene	Dibenz(a,h)anthracene	1.83E-04	mg/kg				S	10/20/1997	5.00000	Primary Sample	SWMU 7.4 - Old Conservation

Table C7-2
Extrapolated Data
Old Conservation Yard RFI Site

EPA_NO	SAMPLE_ID	LAB_METHOD	ANALYTE	STD_ANALYT	CONCENTRAT	UNITS	REV_QUAL	Q_CODE	D_LIMIT	MATRIX	DATE_SAMP	DEPTH	SAMPLE_TYP	UNIT
RD072	OCBS08S02	extrapolated	Fluoranthene	Fluoranthene	1.23E-03	mg/kg				S	10/20/1997	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD072	OCBS08S02	extrapolated	Fluorene	Fluorene	9.37E-03	mg/kg				S	10/20/1997	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD072	OCBS08S02	extrapolated	Indeno(1,2,3-cd)pyrene	Indeno(1,2,3-cd)pyrene	3.97E-04	mg/kg				S	10/20/1997	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD072	OCBS08S02	extrapolated	Naphthalene	Naphthalene	3.82E-02	mg/kg				S	10/20/1997	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD072	OCBS08S02	extrapolated	Perylene	Perylene	1.95E-03	mg/kg				S	10/20/1997	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD072	OCBS08S02	extrapolated	Phenanthrene	Phenanthrene	2.53E-02	mg/kg				S	10/20/1997	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD072	OCBS08S02	extrapolated	Pyrene	Pyrene	2.25E-03	mg/kg				S	10/20/1997	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD176	OCBS15S01	extrapolated	Benzene	Benzene	7.20E-04	mg/kg				S	11/3/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD176	OCBS15S01	extrapolated	Ethylbenzene	Ethylbenzene	7.20E-04	mg/kg				S	11/3/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD176	OCBS15S01	extrapolated	Toluene	Toluene	7.20E-04	mg/kg				S	11/3/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD176	OCBS15S01	extrapolated	m,p-Xylene	m,p-Xylene	2.16E-03	mg/kg				S	11/3/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD176	OCBS15S01	extrapolated	o-Xylene	o-Xylene	4.80E-04	mg/kg				S	11/3/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD176	OCBS15S01	extrapolated	Xylene (total)	Xylenes (total)	2.64E-03	mg/kg				S	11/3/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD176	OCBS15S01	extrapolated	2-Methylnaphthalene	2-Methylnaphthalene	1.65E-01	mg/kg				S	11/3/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD176	OCBS15S01	extrapolated	Acenaphthene	Acenaphthene	1.03E-02	mg/kg				S	11/3/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD176	OCBS15S01	extrapolated	Acenaphthylene	Acenaphthylene	1.26E-03	mg/kg				S	11/3/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD176	OCBS15S01	extrapolated	Anthracene	Anthracene	6.72E-03	mg/kg				S	11/3/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD176	OCBS15S01	extrapolated	Benzo(a)anthracene	Benzo(a)anthracene	4.85E-04	mg/kg				S	11/3/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD176	OCBS15S01	extrapolated	Benzo(a)pyrene	Benzo(a)pyrene	4.90E-04	mg/kg				S	11/3/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD176	OCBS15S01	extrapolated	Benzo(b)fluoranthene	Benzo(b)fluoranthene	7.80E-04	mg/kg				S	11/3/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD176	OCBS15S01	extrapolated	Benzo(e)pyrene	Benzo(e)pyrene	3.72E-03	mg/kg				S	11/3/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD176	OCBS15S01	extrapolated	Benzo(g,h,i)perylene	Benzo(g,h,i)perylene	3.98E-03	mg/kg				S	11/3/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD176	OCBS15S01	extrapolated	Benzo(k)fluoranthene	Benzo(k)fluoranthene	3.69E-04	mg/kg				S	11/3/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD176	OCBS15S01	extrapolated	Chrysene	Chrysene	1.06E-03	mg/kg				S	11/3/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD176	OCBS15S01	extrapolated	Dibenz(a,h)anthracene	Dibenz(a,h)anthracene	1.99E-04	mg/kg				S	11/3/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD176	OCBS15S01	extrapolated	Fluoranthene	Fluoranthene	1.35E-03	mg/kg				S	11/3/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD176	OCBS15S01	extrapolated	Fluorene	Fluorene	1.02E-02	mg/kg				S	11/3/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD176	OCBS15S01	extrapolated	Indeno(1,2,3-cd)pyrene	Indeno(1,2,3-cd)pyrene	4.33E-04	mg/kg				S	11/3/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD176	OCBS15S01	extrapolated	Naphthalene	Naphthalene	4.17E-02	mg/kg				S	11/3/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD176	OCBS15S01	extrapolated	Perylene	Perylene	2.12E-03	mg/kg				S	11/3/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD176	OCBS15S01	extrapolated	Phenanthrene	Phenanthrene	2.76E-02	mg/kg				S	11/3/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD176	OCBS15S01	extrapolated	Pyrene	Pyrene	2.45E-03	mg/kg				S	11/3/1997	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RD266	OCBS06S02	extrapolated	Benzene	Benzene	6.60E-04	mg/kg				S	11/13/1997	5.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD266	OCBS06S02	extrapolated	Ethylbenzene	Ethylbenzene	6.60E-04	mg/kg				S	11/13/1997	5.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD266	OCBS06S02	extrapolated	Toluene	Toluene	6.60E-04	mg/kg				S	11/13/1997	5.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD266	OCBS06S02	extrapolated	m,p-Xylene	m,p-Xylene	1.98E-03	mg/kg				S	11/13/1997	5.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD266	OCBS06S02	extrapolated	o-Xylene	o-Xylene	4.40E-04	mg/kg				S	11/13/1997	5.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD266	OCBS06S02	extrapolated	Xylene (total)	Xylenes (total)	2.42E-03	mg/kg				S	11/13/1997	5.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD266	OCBS06S02	extrapolated	2-Methylnaphthalene	2-Methylnaphthalene	1.51E-01	mg/kg				S	11/13/1997	5.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD266	OCBS06S02	extrapolated	Acenaphthene	Acenaphthene	9.45E-03	mg/kg				S	11/13/1997	5.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD266	OCBS06S02	extrapolated	Acenaphthylene	Acenaphthylene	1.16E-03	mg/kg				S	11/13/1997	5.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD266	OCBS06S02	extrapolated	Anthracene	Anthracene	6.16E-03	mg/kg				S	11/13/1997	5.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD266	OCBS06S02	extrapolated	Benzo(a)anthracene	Benzo(a)anthracene	4.45E-04	mg/kg				S	11/13/1997	5.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD266	OCBS06S02	extrapolated	Benzo(a)pyrene	Benzo(a)pyrene	4.49E-04	mg/kg				S	11/13/1997	5.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD266	OCBS06S02	extrapolated	Benzo(b)fluoranthene	Benzo(b)fluoranthene	7.15E-04	mg/kg				S	11/13/1997	5.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD266	OCBS06S02	extrapolated	Benzo(e)pyrene	Benzo(e)pyrene	3.41E-03	mg/kg				S	11/13/1997	5.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD266	OCBS06S02	extrapolated	Benzo(g,h,i)perylene	Benzo(g,h,i)perylene	3.65E-03	mg/kg				S	11/13/1997	5.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD266	OCBS06S02	extrapolated	Benzo(k)fluoranthene	Benzo(k)fluoranthene	3.38E-04	mg/kg				S	11/13/1997	5.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD266	OCBS06S02	extrapolated	Chrysene	Chrysene	9.68E-04	mg/kg				S	11/13/1997	5.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD266	OCBS06S02	extrapolated	Dibenz(a,h)anthracene	Dibenz(a,h)anthracene	1.83E-04	mg/kg				S	11/13/1997	5.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD266	OCBS06S02	extrapolated	Fluoranthene	Fluoranthene	1.23E-03	mg/kg				S	11/13/1997	5.50000	Primary Sample	SWMU 7.4 - Old Conservation

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Extrapolated Data
Old Conservation Yard RFI Site

EPA_NO	SAMPLE_ID	LAB_METHOD	ANALYTE	STD_ANALYT	CONCENTRAT	UNITS	REV_QUAL	Q_CODE	D_LIMIT	MATRIX	DATE_SAMP	DEPTH	SAMPLE_TYP	UNIT
RD266	OCBS06S02	extrapolated	Fluorene	Fluorene	9.37E-03	mg/kg				S	11/13/1997	5.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD266	OCBS06S02	extrapolated	Indeno(1,2,3-cd)pyrene	Indeno(1,2,3-cd)pyrene	3.97E-04	mg/kg				S	11/13/1997	5.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD266	OCBS06S02	extrapolated	Naphthalene	Naphthalene	3.82E-02	mg/kg				S	11/13/1997	5.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD266	OCBS06S02	extrapolated	Perylene	Perylene	1.95E-03	mg/kg				S	11/13/1997	5.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD266	OCBS06S02	extrapolated	Phenanthrene	Phenanthrene	2.53E-02	mg/kg				S	11/13/1997	5.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD266	OCBS06S02	extrapolated	Pyrene	Pyrene	2.25E-03	mg/kg				S	11/13/1997	5.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD727	OCBS09S01	extrapolated	Benzene	Benzene	6.60E-04	mg/kg				S	10/29/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD727	OCBS09S01	extrapolated	Ethylbenzene	Ethylbenzene	6.60E-04	mg/kg				S	10/29/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD727	OCBS09S01	extrapolated	m,p-Xylene	m,p-Xylene	1.98E-03	mg/kg				S	10/29/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD727	OCBS09S01	extrapolated	o-Xylene	o-Xylene	4.40E-04	mg/kg				S	10/29/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD727	OCBS09S01	extrapolated	Toluene	Toluene	6.60E-04	mg/kg				S	10/29/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD727	OCBS09S01	extrapolated	Xylene (total)	Xylenes (total)	2.42E-03	mg/kg				S	10/29/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD727	OCBS09S01	extrapolated	2-Methylnaphthalene	2-Methylnaphthalene	1.51E-01	mg/kg				S	10/29/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD727	OCBS09S01	extrapolated	Acenaphthene	Acenaphthene	9.45E-03	mg/kg				S	10/29/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD727	OCBS09S01	extrapolated	Acenaphthylene	Acenaphthylene	1.16E-03	mg/kg				S	10/29/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD727	OCBS09S01	extrapolated	Anthracene	Anthracene	6.16E-03	mg/kg				S	10/29/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD727	OCBS09S01	extrapolated	Benzo(a)anthracene	Benzo(a)anthracene	4.45E-04	mg/kg				S	10/29/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD727	OCBS09S01	extrapolated	Benzo(a)pyrene	Benzo(a)pyrene	4.49E-04	mg/kg				S	10/29/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD727	OCBS09S01	extrapolated	Benzo(b)fluoranthene	Benzo(b)fluoranthene	7.15E-04	mg/kg				S	10/29/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD727	OCBS09S01	extrapolated	Benzo(e)pyrene	Benzo(e)pyrene	3.41E-03	mg/kg				S	10/29/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD727	OCBS09S01	extrapolated	Benzo(g,h,i)perylene	Benzo(g,h,i)perylene	3.65E-03	mg/kg				S	10/29/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD727	OCBS09S01	extrapolated	Benzo(k)fluoranthene	Benzo(k)fluoranthene	3.38E-04	mg/kg				S	10/29/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD727	OCBS09S01	extrapolated	Chrysene	Chrysene	9.68E-04	mg/kg				S	10/29/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD727	OCBS09S01	extrapolated	Dibenz(a,h)anthracene	Dibenz(a,h)anthracene	1.83E-04	mg/kg				S	10/29/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD727	OCBS09S01	extrapolated	Fluoranthene	Fluoranthene	1.23E-03	mg/kg				S	10/29/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD727	OCBS09S01	extrapolated	Fluorene	Fluorene	9.37E-03	mg/kg				S	10/29/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD727	OCBS09S01	extrapolated	Indeno(1,2,3-cd)pyrene	Indeno(1,2,3-cd)pyrene	3.97E-04	mg/kg				S	10/29/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD727	OCBS09S01	extrapolated	Naphthalene	Naphthalene	3.82E-02	mg/kg				S	10/29/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD727	OCBS09S01	extrapolated	Perylene	Perylene	1.95E-03	mg/kg				S	10/29/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD727	OCBS09S01	extrapolated	Phenanthrene	Phenanthrene	2.53E-02	mg/kg				S	10/29/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD727	OCBS09S01	extrapolated	Pyrene	Pyrene	2.25E-03	mg/kg				S	10/29/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD728	OCBS10S01	extrapolated	Benzene	Benzene	3.48E-03	mg/kg				S	10/29/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD728	OCBS10S01	extrapolated	Ethylbenzene	Ethylbenzene	3.48E-03	mg/kg				S	10/29/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD728	OCBS10S01	extrapolated	Toluene	Toluene	3.48E-03	mg/kg				S	10/29/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD728	OCBS10S01	extrapolated	m,p-Xylene	m,p-Xylene	1.04E-02	mg/kg				S	10/29/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD728	OCBS10S01	extrapolated	o-Xylene	o-Xylene	2.32E-03	mg/kg				S	10/29/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD728	OCBS10S01	extrapolated	Xylene (total)	Xylenes (total)	1.28E-02	mg/kg				S	10/29/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD728	OCBS10S01	extrapolated	2-Methylnaphthalene	2-Methylnaphthalene	7.99E-01	mg/kg				S	10/29/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD728	OCBS10S01	extrapolated	Acenaphthene	Acenaphthene	6.64E-01	mg/kg				S	10/29/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD728	OCBS10S01	extrapolated	Acenaphthylene	Acenaphthylene	8.12E-02	mg/kg				S	10/29/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD728	OCBS10S01	extrapolated	Anthracene	Anthracene	4.33E-01	mg/kg				S	10/29/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD728	OCBS10S01	extrapolated	Benzo(a)anthracene	Benzo(a)anthracene	3.13E-02	mg/kg				S	10/29/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD728	OCBS10S01	extrapolated	Benzo(a)pyrene	Benzo(a)pyrene	3.15E-02	mg/kg				S	10/29/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD728	OCBS10S01	extrapolated	Benzo(b)fluoranthene	Benzo(b)fluoranthene	5.02E-02	mg/kg				S	10/29/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD728	OCBS10S01	extrapolated	Benzo(e)pyrene	Benzo(e)pyrene	2.40E-01	mg/kg				S	10/29/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD728	OCBS10S01	extrapolated	Benzo(g,h,i)perylene	Benzo(g,h,i)perylene	2.56E-01	mg/kg				S	10/29/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD728	OCBS10S01	extrapolated	Benzo(k)fluoranthene	Benzo(k)fluoranthene	2.38E-02	mg/kg				S	10/29/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD728	OCBS10S01	extrapolated	Chrysene	Chrysene	6.80E-02	mg/kg				S	10/29/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD728	OCBS10S01	extrapolated	Dibenz(a,h)anthracene	Dibenz(a,h)anthracene	1.28E-02	mg/kg				S	10/29/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD728	OCBS10S01	extrapolated	Fluoranthene	Fluoranthene	8.67E-02	mg/kg				S	10/29/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD728	OCBS10S01	extrapolated	Fluorene	Fluorene	6.58E-01	mg/kg				S	10/29/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation

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Extrapolated Data
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EPA_NO	SAMPLE_ID	LAB_METHOD	ANALYTE	STD_ANALYT	CONCENTRAT	UNITS	REV_QUAL	Q_CODE	D_LIMIT	MATRIX	DATE_SAMP	DEPTH	SAMPLE_TYP	UNIT
RD728	OCBS10S01	extrapolated	Indeno(1,2,3-cd)pyrene	Indeno(1,2,3-cd)pyrene	2.79E-02	mg/kg				S	10/29/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD728	OCBS10S01	extrapolated	Naphthalene	Naphthalene	2.01E-01	mg/kg				S	10/29/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD728	OCBS10S01	extrapolated	Perylene	Perylene	1.37E-01	mg/kg				S	10/29/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD728	OCBS10S01	extrapolated	Phenanthrene	Phenanthrene	1.78E+00	mg/kg				S	10/29/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD728	OCBS10S01	extrapolated	Pyrene	Pyrene	1.58E-01	mg/kg				S	10/29/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD737	OCBS13S01	extrapolated	Benzene	Benzene	9.00E-04	mg/kg				S	10/30/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD737	OCBS13S01	extrapolated	Ethylbenzene	Ethylbenzene	9.00E-04	mg/kg				S	10/30/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD737	OCBS13S01	extrapolated	Toluene	Toluene	9.00E-04	mg/kg				S	10/30/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD737	OCBS13S01	extrapolated	m,p-Xylene	m,p-Xylene	2.70E-03	mg/kg				S	10/30/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD737	OCBS13S01	extrapolated	o-Xylene	o-Xylene	6.00E-04	mg/kg				S	10/30/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD737	OCBS13S01	extrapolated	Xylene (total)	Xylenes (total)	3.30E-03	mg/kg				S	10/30/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD737	OCBS13S01	extrapolated	2-Methylnaphthalene	2-Methylnaphthalene	2.07E-01	mg/kg				S	10/30/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD737	OCBS13S01	extrapolated	Acenaphthene	Acenaphthene	1.29E-02	mg/kg				S	10/30/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD737	OCBS13S01	extrapolated	Acenaphthylene	Acenaphthylene	1.58E-03	mg/kg				S	10/30/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD737	OCBS13S01	extrapolated	Anthracene	Anthracene	8.40E-03	mg/kg				S	10/30/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD737	OCBS13S01	extrapolated	Benzo(a)anthracene	Benzo(a)anthracene	6.07E-04	mg/kg				S	10/30/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD737	OCBS13S01	extrapolated	Benzo(a)pyrene	Benzo(a)pyrene	6.12E-04	mg/kg				S	10/30/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD737	OCBS13S01	extrapolated	Benzo(b)fluoranthene	Benzo(b)fluoranthene	9.74E-04	mg/kg				S	10/30/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD737	OCBS13S01	extrapolated	Benzo(e)pyrene	Benzo(e)pyrene	4.65E-03	mg/kg				S	10/30/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD737	OCBS13S01	extrapolated	Benzo(g,h,i)perylene	Benzo(g,h,i)perylene	4.98E-03	mg/kg				S	10/30/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD737	OCBS13S01	extrapolated	Benzo(k)fluoranthene	Benzo(k)fluoranthene	4.62E-04	mg/kg				S	10/30/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD737	OCBS13S01	extrapolated	Chrysene	Chrysene	1.32E-03	mg/kg				S	10/30/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD737	OCBS13S01	extrapolated	Dibenz(a,h)anthracene	Dibenz(a,h)anthracene	2.49E-04	mg/kg				S	10/30/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD737	OCBS13S01	extrapolated	Fluoranthene	Fluoranthene	1.68E-03	mg/kg				S	10/30/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD737	OCBS13S01	extrapolated	Fluorene	Fluorene	1.28E-02	mg/kg				S	10/30/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD737	OCBS13S01	extrapolated	Indeno(1,2,3-cd)pyrene	Indeno(1,2,3-cd)pyrene	5.41E-04	mg/kg				S	10/30/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD737	OCBS13S01	extrapolated	Naphthalene	Naphthalene	5.21E-02	mg/kg				S	10/30/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD737	OCBS13S01	extrapolated	Perylene	Perylene	2.65E-03	mg/kg				S	10/30/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD737	OCBS13S01	extrapolated	Phenanthrene	Phenanthrene	3.45E-02	mg/kg				S	10/30/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD737	OCBS13S01	extrapolated	Pyrene	Pyrene	3.07E-03	mg/kg				S	10/30/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD738	OCBS14S01	extrapolated	Benzene	Benzene	6.60E-04	mg/kg				S	10/30/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD738	OCBS14S01	extrapolated	Ethylbenzene	Ethylbenzene	6.60E-04	mg/kg				S	10/30/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD738	OCBS14S01	extrapolated	m,p-Xylene	m,p-Xylene	1.98E-03	mg/kg				S	10/30/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD738	OCBS14S01	extrapolated	o-Xylene	o-Xylene	4.40E-04	mg/kg				S	10/30/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD738	OCBS14S01	extrapolated	Xylene (total)	Xylenes (total)	2.42E-03	mg/kg				S	10/30/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD738	OCBS14S01	extrapolated	Toluene	Toluene	6.60E-04	mg/kg				S	10/30/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD738	OCBS14S01	extrapolated	2-Methylnaphthalene	2-Methylnaphthalene	1.51E-01	mg/kg				S	10/30/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD738	OCBS14S01	extrapolated	Acenaphthene	Acenaphthene	9.45E-03	mg/kg				S	10/30/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD738	OCBS14S01	extrapolated	Acenaphthylene	Acenaphthylene	1.16E-03	mg/kg				S	10/30/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD738	OCBS14S01	extrapolated	Anthracene	Anthracene	6.16E-03	mg/kg				S	10/30/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD738	OCBS14S01	extrapolated	Benzo(a)anthracene	Benzo(a)anthracene	4.45E-04	mg/kg				S	10/30/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD738	OCBS14S01	extrapolated	Benzo(a)pyrene	Benzo(a)pyrene	4.49E-04	mg/kg				S	10/30/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD738	OCBS14S01	extrapolated	Benzo(b)fluoranthene	Benzo(b)fluoranthene	7.15E-04	mg/kg				S	10/30/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD738	OCBS14S01	extrapolated	Benzo(e)pyrene	Benzo(e)pyrene	3.41E-03	mg/kg				S	10/30/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD738	OCBS14S01	extrapolated	Benzo(g,h,i)perylene	Benzo(g,h,i)perylene	3.65E-03	mg/kg				S	10/30/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD738	OCBS14S01	extrapolated	Benzo(k)fluoranthene	Benzo(k)fluoranthene	3.38E-04	mg/kg				S	10/30/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD738	OCBS14S01	extrapolated	Chrysene	Chrysene	9.68E-04	mg/kg				S	10/30/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD738	OCBS14S01	extrapolated	Dibenz(a,h)anthracene	Dibenz(a,h)anthracene	1.83E-04	mg/kg				S	10/30/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD738	OCBS14S01	extrapolated	Fluoranthene	Fluoranthene	1.23E-03	mg/kg				S	10/30/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD738	OCBS14S01	extrapolated	Fluorene	Fluorene	9.37E-03	mg/kg				S	10/30/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD738	OCBS14S01	extrapolated	Indeno(1,2,3-cd)pyrene	Indeno(1,2,3-cd)pyrene	3.97E-04	mg/kg				S	10/30/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation

Table C7-2
Extrapolated Data
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EPA_NO	SAMPLE_ID	LAB_METHOD	ANALYTE	STD_ANALYT	CONCENTRAT	UNITS	REV_QUAL	Q_CODE	D_LIMIT	MATRIX	DATE_SAMP	DEPTH	SAMPLE_TYP	UNIT
RD738	OCBS14S01	extrapolated	Naphthalene	Naphthalene	3.82E-02	mg/kg				S	10/30/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD738	OCBS14S01	extrapolated	Perylene	Perylene	1.95E-03	mg/kg				S	10/30/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD738	OCBS14S01	extrapolated	Phenanthrene	Phenanthrene	2.53E-02	mg/kg				S	10/30/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RD738	OCBS14S01	extrapolated	Pyrene	Pyrene	2.25E-03	mg/kg				S	10/30/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RJ772	OCTS23S01	extrapolated	PCB-105	PCB-105	1.16E-05	mg/kg				S	11/1/2000	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RJ772	OCTS23S01	extrapolated	PCB-114	PCB-114	4.26E-07	mg/kg				S	11/1/2000	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RJ772	OCTS23S01	extrapolated	PCB-118	PCB-118	2.52E-05	mg/kg				S	11/1/2000	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RJ772	OCTS23S01	extrapolated	PCB-123	PCB-123	2.81E-07	mg/kg				S	11/1/2000	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RJ772	OCTS23S01	extrapolated	PCB-126	PCB-126	7.07E-07	mg/kg				S	11/1/2000	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RJ772	OCTS23S01	extrapolated	PCB-156	PCB-156	5.91E-06	mg/kg				S	11/1/2000	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RJ772	OCTS23S01	extrapolated	PCB-157	PCB-157	1.16E-06	mg/kg				S	11/1/2000	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RJ772	OCTS23S01	extrapolated	PCB-167	PCB-167	1.94E-06	mg/kg				S	11/1/2000	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RJ772	OCTS23S01	extrapolated	PCB-169	PCB-169	3.44E-08	mg/kg				S	11/1/2000	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RJ772	OCTS23S01	extrapolated	PCB-189	PCB-189	2.81E-07	mg/kg				S	11/1/2000	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RJ772	OCTS23S01	extrapolated	PCB-77	PCB-77	1.45E-06	mg/kg				S	11/1/2000	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RJ772	OCTS23S01	extrapolated	PCB-81	PCB-81	2.81E-07	mg/kg				S	11/1/2000	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RJ772	OCTS23S01	extrapolated	Benzene	Benzene	2.04E-04	mg/kg				S	11/1/2000	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RJ772	OCTS23S01	extrapolated	Ethylbenzene	Ethylbenzene	2.04E-04	mg/kg				S	11/1/2000	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RJ772	OCTS23S01	extrapolated	Toluene	Toluene	2.04E-04	mg/kg				S	11/1/2000	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RJ772	OCTS23S01	extrapolated	m,p-Xylene	m,p-Xylene	6.12E-04	mg/kg				S	11/1/2000	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RJ772	OCTS23S01	extrapolated	o-Xylene	o-Xylene	1.36E-04	mg/kg				S	11/1/2000	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RJ772	OCTS23S01	extrapolated	Xylene (total)	Xylenes (total)	7.48E-04	mg/kg				S	11/1/2000	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RJ772	OCTS23S01	extrapolated	Acenaphthylene	Acenaphthylene	1.50E-03	mg/kg				S	11/1/2000	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RJ772	OCTS23S01	extrapolated	Benzo(e)pyrene	Benzo(e)pyrene	4.42E-03	mg/kg				S	11/1/2000	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RJ772	OCTS23S01	extrapolated	Dibenzo(a,h)anthracene	Dibenz(a,h)anthracene	2.37E-04	mg/kg				S	11/1/2000	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RJ772	OCTS23S01	extrapolated	Perylene	Perylene	2.52E-03	mg/kg				S	11/1/2000	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RJ772	OCTS23S01	summation	Total Tetra	Total Tetra	1.25E-05	mg/kg				S	11/1/2000	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RJ772	OCTS23S01	summation	Total Penta	Total Penta	4.00E-05	mg/kg				S	11/1/2000	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RJ772	OCTS23S01	summation	Total Hexa	Total Hexa	1.60E-04	mg/kg				S	11/1/2000	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RJ772	OCTS23S01	summation	Total Hepta	Total Hepta	1.02E-03	mg/kg				S	11/1/2000	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RJ772	OCTS23S01	summation	Total Octa	Total Octa	1.01E-02	mg/kg				S	11/1/2000	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RJ774	OCTS24S01	extrapolated	PCB-105	PCB-105	2.10E-06	mg/kg				S	11/1/2000	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RJ774	OCTS24S01	extrapolated	PCB-114	PCB-114	7.71E-08	mg/kg				S	11/1/2000	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RJ774	OCTS24S01	extrapolated	PCB-118	PCB-118	4.56E-06	mg/kg				S	11/1/2000	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RJ774	OCTS24S01	extrapolated	PCB-123	PCB-123	5.08E-08	mg/kg				S	11/1/2000	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RJ774	OCTS24S01	extrapolated	PCB-126	PCB-126	1.28E-07	mg/kg				S	11/1/2000	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RJ774	OCTS24S01	extrapolated	PCB-156	PCB-156	1.07E-06	mg/kg				S	11/1/2000	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RJ774	OCTS24S01	extrapolated	PCB-157	PCB-157	4.17E-07	mg/kg				S	11/1/2000	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RJ774	OCTS24S01	extrapolated	PCB-167	PCB-167	7.26E-07	mg/kg				S	11/1/2000	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RJ774	OCTS24S01	extrapolated	PCB-169	PCB-169	1.08E-08	mg/kg				S	11/1/2000	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RJ774	OCTS24S01	extrapolated	PCB-189	PCB-189	1.08E-07	mg/kg				S	11/1/2000	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RJ774	OCTS24S01	extrapolated	PCB-77	PCB-77	2.63E-07	mg/kg				S	11/1/2000	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RJ774	OCTS24S01	extrapolated	PCB-81	PCB-81	5.08E-08	mg/kg				S	11/1/2000	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RJ774	OCTS24S01	extrapolated	Benzene	Benzene	1.02E-03	mg/kg				S	11/1/2000	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RJ774	OCTS24S01	extrapolated	Ethylbenzene	Ethylbenzene	1.02E-03	mg/kg				S	11/1/2000	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RJ774	OCTS24S01	extrapolated	Toluene	Toluene	1.02E-03	mg/kg				S	11/1/2000	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RJ774	OCTS24S01	extrapolated	m,p-Xylene	m,p-Xylene	3.06E-03	mg/kg				S	11/1/2000	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RJ774	OCTS24S01	extrapolated	o-Xylene	o-Xylene	6.80E-04	mg/kg				S	11/1/2000	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RJ774	OCTS24S01	extrapolated	Xylene (total)	Xylenes (total)	3.74E-03	mg/kg				S	11/1/2000	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RJ774	OCTS24S01	extrapolated	Benzo(e)pyrene	Benzo(e)pyrene	1.17E-01	mg/kg				S	11/1/2000	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RJ774	OCTS24S01	extrapolated	Perylene	Perylene	6.66E-02	mg/kg				S	11/1/2000	5.00000	Primary Sample	SWMU 7.4 - Old Conservation

Table C7-2
Extrapolated Data
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EPA_NO	SAMPLE_ID	LAB_METHOD	ANALYTE	STD_ANALYT	CONCENTRAT	UNITS	REV_QUAL	Q_CODE	D_LIMIT	MATRIX	DATE_SAMP	DEPTH	SAMPLE_TYP	UNIT
RJ774	OCTS24S01	summation	Total Tetra	Total Tetra	2.66E-06	mg/kg				S	11/1/2000	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RJ774	OCTS24S01	summation	Total Penta	Total Penta	5.60E-06	mg/kg				S	11/1/2000	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RJ774	OCTS24S01	summation	Total Hexa	Total Hexa	3.73E-05	mg/kg				S	11/1/2000	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RJ774	OCTS24S01	summation	Total Hepta	Total Hepta	1.10E-04	mg/kg				S	11/1/2000	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RJ774	OCTS24S01	summation	Total Octa	Total Octa	8.10E-04	mg/kg				S	11/1/2000	5.00000	Primary Sample	SWMU 7.4 - Old Conservation
RJ776	OCTS23S02	extrapolated	PCB-105	PCB-105	2.16E-06	mg/kg				S	11/1/2000	6.50000	Primary Sample	SWMU 7.4 - Old Conservation
RJ776	OCTS23S02	extrapolated	PCB-114	PCB-114	7.94E-08	mg/kg				S	11/1/2000	6.50000	Primary Sample	SWMU 7.4 - Old Conservation
RJ776	OCTS23S02	extrapolated	PCB-118	PCB-118	4.69E-06	mg/kg				S	11/1/2000	6.50000	Primary Sample	SWMU 7.4 - Old Conservation
RJ776	OCTS23S02	extrapolated	PCB-123	PCB-123	5.23E-08	mg/kg				S	11/1/2000	6.50000	Primary Sample	SWMU 7.4 - Old Conservation
RJ776	OCTS23S02	extrapolated	PCB-126	PCB-126	1.32E-07	mg/kg				S	11/1/2000	6.50000	Primary Sample	SWMU 7.4 - Old Conservation
RJ776	OCTS23S02	extrapolated	PCB-156	PCB-156	1.10E-06	mg/kg				S	11/1/2000	6.50000	Primary Sample	SWMU 7.4 - Old Conservation
RJ776	OCTS23S02	extrapolated	PCB-157	PCB-157	4.30E-07	mg/kg				S	11/1/2000	6.50000	Primary Sample	SWMU 7.4 - Old Conservation
RJ776	OCTS23S02	extrapolated	PCB-167	PCB-167	7.48E-07	mg/kg				S	11/1/2000	6.50000	Primary Sample	SWMU 7.4 - Old Conservation
RJ776	OCTS23S02	extrapolated	PCB-169	PCB-169	1.11E-08	mg/kg				S	11/1/2000	6.50000	Primary Sample	SWMU 7.4 - Old Conservation
RJ776	OCTS23S02	extrapolated	PCB-189	PCB-189	1.11E-07	mg/kg				S	11/1/2000	6.50000	Primary Sample	SWMU 7.4 - Old Conservation
RJ776	OCTS23S02	extrapolated	PCB-77	PCB-77	2.71E-07	mg/kg				S	11/1/2000	6.50000	Primary Sample	SWMU 7.4 - Old Conservation
RJ776	OCTS23S02	extrapolated	PCB-81	PCB-81	5.23E-08	mg/kg				S	11/1/2000	6.50000	Primary Sample	SWMU 7.4 - Old Conservation
RJ776	OCTS23S02	extrapolated	Benzene	Benzene	2.16E-04	mg/kg				S	11/1/2000	6.50000	Primary Sample	SWMU 7.4 - Old Conservation
RJ776	OCTS23S02	extrapolated	Ethylbenzene	Ethylbenzene	2.16E-04	mg/kg				S	11/1/2000	6.50000	Primary Sample	SWMU 7.4 - Old Conservation
RJ776	OCTS23S02	extrapolated	Toluene	Toluene	2.16E-04	mg/kg				S	11/1/2000	6.50000	Primary Sample	SWMU 7.4 - Old Conservation
RJ776	OCTS23S02	extrapolated	m,p-Xylene	m,p-Xylene	6.48E-04	mg/kg				S	11/1/2000	6.50000	Primary Sample	SWMU 7.4 - Old Conservation
RJ776	OCTS23S02	extrapolated	o-Xylene	o-Xylene	1.44E-04	mg/kg				S	11/1/2000	6.50000	Primary Sample	SWMU 7.4 - Old Conservation
RJ776	OCTS23S02	extrapolated	Xylene (total)	Xylenes (total)	7.92E-04	mg/kg				S	11/1/2000	6.50000	Primary Sample	SWMU 7.4 - Old Conservation
RJ776	OCTS23S02	extrapolated	Acenaphthylene	Acenaphthylene	3.78E-04	mg/kg				S	11/1/2000	6.50000	Primary Sample	SWMU 7.4 - Old Conservation
RJ776	OCTS23S02	extrapolated	Benzo(a)anthracene	Benzo(a)anthracene	1.46E-04	mg/kg				S	11/1/2000	6.50000	Primary Sample	SWMU 7.4 - Old Conservation
RJ776	OCTS23S02	extrapolated	Benzo(a)pyrene	Benzo(a)pyrene	1.47E-04	mg/kg				S	11/1/2000	6.50000	Primary Sample	SWMU 7.4 - Old Conservation
RJ776	OCTS23S02	extrapolated	Benzo(b)fluoranthene	Benzo(b)fluoranthene	2.34E-04	mg/kg				S	11/1/2000	6.50000	Primary Sample	SWMU 7.4 - Old Conservation
RJ776	OCTS23S02	extrapolated	Benzo(e)pyrene	Benzo(e)pyrene	1.12E-03	mg/kg				S	11/1/2000	6.50000	Primary Sample	SWMU 7.4 - Old Conservation
RJ776	OCTS23S02	extrapolated	Benzo(g,h,i)perylene	Benzo(g,h,i)perylene	1.19E-03	mg/kg				S	11/1/2000	6.50000	Primary Sample	SWMU 7.4 - Old Conservation
RJ776	OCTS23S02	extrapolated	Benzo(k)fluoranthene	Benzo(k)fluoranthene	1.11E-04	mg/kg				S	11/1/2000	6.50000	Primary Sample	SWMU 7.4 - Old Conservation
RJ776	OCTS23S02	extrapolated	Chrysene	Chrysene	3.17E-04	mg/kg				S	11/1/2000	6.50000	Primary Sample	SWMU 7.4 - Old Conservation
RJ776	OCTS23S02	extrapolated	Dibenzo(a,h)anthracene	Dibenz(a,h)anthracene	5.98E-05	mg/kg				S	11/1/2000	6.50000	Primary Sample	SWMU 7.4 - Old Conservation
RJ776	OCTS23S02	extrapolated	Fluoranthene	Fluoranthene	4.04E-04	mg/kg				S	11/1/2000	6.50000	Primary Sample	SWMU 7.4 - Old Conservation
RJ776	OCTS23S02	extrapolated	Indeno(1,2,3-cd)pyrene	Indeno(1,2,3-cd)pyrene	1.30E-04	mg/kg				S	11/1/2000	6.50000	Primary Sample	SWMU 7.4 - Old Conservation
RJ776	OCTS23S02	extrapolated	Perylene	Perylene	6.37E-04	mg/kg				S	11/1/2000	6.50000	Primary Sample	SWMU 7.4 - Old Conservation
RJ776	OCTS23S02	extrapolated	Pyrene	Pyrene	7.36E-04	mg/kg				S	11/1/2000	6.50000	Primary Sample	SWMU 7.4 - Old Conservation
RJ776	OCTS23S02	summation	Total Tetra	Total Tetra	5.20E-07	mg/kg				S	11/1/2000	6.50000	Primary Sample	SWMU 7.4 - Old Conservation
RJ776	OCTS23S02	summation	Total Penta	Total Penta	1.01E-06	mg/kg				S	11/1/2000	6.50000	Primary Sample	SWMU 7.4 - Old Conservation
RJ776	OCTS23S02	summation	Total Hexa	Total Hexa	3.02E-06	mg/kg				S	11/1/2000	6.50000	Primary Sample	SWMU 7.4 - Old Conservation
RJ776	OCTS23S02	summation	Total Hepta	Total Hepta	1.22E-05	mg/kg				S	11/1/2000	6.50000	Primary Sample	SWMU 7.4 - Old Conservation
RJ776	OCTS23S02	summation	Total Octa	Total Octa	1.04E-04	mg/kg				S	11/1/2000	6.50000	Primary Sample	SWMU 7.4 - Old Conservation
RJ777	OCTS35S01	extrapolated	PCB-105	PCB-105	2.16E-06	mg/kg				S	11/1/2000	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RJ777	OCTS35S01	extrapolated	PCB-114	PCB-114	7.94E-08	mg/kg				S	11/1/2000	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RJ777	OCTS35S01	extrapolated	PCB-118	PCB-118	4.69E-06	mg/kg				S	11/1/2000	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RJ777	OCTS35S01	extrapolated	PCB-123	PCB-123	5.23E-08	mg/kg				S	11/1/2000	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RJ777	OCTS35S01	extrapolated	PCB-126	PCB-126	1.32E-07	mg/kg				S	11/1/2000	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RJ777	OCTS35S01	extrapolated	PCB-156	PCB-156	1.10E-06	mg/kg				S	11/1/2000	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RJ777	OCTS35S01	extrapolated	PCB-157	PCB-157	4.30E-07	mg/kg				S	11/1/2000	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RJ777	OCTS35S01	extrapolated	PCB-167	PCB-167	7.48E-07	mg/kg				S	11/1/2000	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RJ777	OCTS35S01	extrapolated	PCB-169	PCB-169	1.11E-08	mg/kg				S	11/1/2000	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RJ777	OCTS35S01	extrapolated	PCB-189	PCB-189	1.11E-07	mg/kg				S	11/1/2000	2.00000	Primary Sample	SWMU 7.4 - Old Conservation

Table C7-2
Extrapolated Data
Old Conservation Yard RFI Site

EPA_NO	SAMPLE_ID	LAB_METHOD	ANALYTE	STD_ANALYT	CONCENTRAT	UNITS	REV_QUAL	Q_CODE	D_LIMIT	MATRIX	DATE_SAMP	DEPTH	SAMPLE_TYP	UNIT
RJ777	OCTS35S01	extrapolated	PCB-77	PCB-77	2.71E-07	mg/kg				S	11/1/2000	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RJ777	OCTS35S01	extrapolated	PCB-81	PCB-81	5.23E-08	mg/kg				S	11/1/2000	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RJ777	OCTS35S01	summation	Total Tetra	Total Tetra	7.85E-07	mg/kg				S	11/1/2000	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RJ777	OCTS35S01	summation	Total Penta	Total Penta	1.32E-06	mg/kg				S	11/1/2000	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RJ777	OCTS35S01	summation	Total Hexa	Total Hexa	1.16E-05	mg/kg				S	11/1/2000	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RJ777	OCTS35S01	summation	Total Hepta	Total Hepta	1.11E-04	mg/kg				S	11/1/2000	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RJ777	OCTS35S01	summation	Total Octa	Total Octa	1.23E-03	mg/kg				S	11/1/2000	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RJ778	OCTS38S01	summation	Total Tetra	Total Tetra	7.35E-07	mg/kg				S	11/1/2000	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RJ778	OCTS38S01	summation	Total Penta	Total Penta	6.45E-07	mg/kg				S	11/1/2000	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RJ778	OCTS38S01	summation	Total Hexa	Total Hexa	2.05E-06	mg/kg				S	11/1/2000	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RJ778	OCTS38S01	summation	Total Hepta	Total Hepta	1.29E-05	mg/kg				S	11/1/2000	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RJ778	OCTS38S01	summation	Total Octa	Total Octa	1.03E-04	mg/kg				S	11/1/2000	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RJ779	OCTS39S01	summation	Total Tetra	Total Tetra	4.25E-07	mg/kg				S	11/1/2000	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RJ779	OCTS39S01	summation	Total Penta	Total Penta	4.50E-07	mg/kg				S	11/1/2000	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RJ779	OCTS39S01	summation	Total Hexa	Total Hexa	2.35E-06	mg/kg				S	11/1/2000	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RJ779	OCTS39S01	summation	Total Hepta	Total Hepta	1.31E-05	mg/kg				S	11/1/2000	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RJ779	OCTS39S01	summation	Total Octa	Total Octa	1.45E-04	mg/kg				S	11/1/2000	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RJ780	OCTS37S01	summation	Total Tetra	Total Tetra	3.90E-07	mg/kg				S	11/1/2000	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
RJ780	OCTS37S01	summation	Total Penta	Total Penta	4.60E-07	mg/kg				S	11/1/2000	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
RJ780	OCTS37S01	summation	Total Hexa	Total Hexa	1.61E-06	mg/kg				S	11/1/2000	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
RJ780	OCTS37S01	summation	Total Hepta	Total Hepta	1.10E-05	mg/kg				S	11/1/2000	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
RJ780	OCTS37S01	summation	Total Octa	Total Octa	5.15E-05	mg/kg				S	11/1/2000	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
RJ781	OCTS24S02	extrapolated	PCB-105	PCB-105	2.16E-06	mg/kg				S	11/1/2000	6.50000	Primary Sample	SWMU 7.4 - Old Conservation
RJ781	OCTS24S02	extrapolated	PCB-114	PCB-114	7.94E-08	mg/kg				S	11/1/2000	6.50000	Primary Sample	SWMU 7.4 - Old Conservation
RJ781	OCTS24S02	extrapolated	PCB-118	PCB-118	4.69E-06	mg/kg				S	11/1/2000	6.50000	Primary Sample	SWMU 7.4 - Old Conservation
RJ781	OCTS24S02	extrapolated	PCB-123	PCB-123	5.23E-08	mg/kg				S	11/1/2000	6.50000	Primary Sample	SWMU 7.4 - Old Conservation
RJ781	OCTS24S02	extrapolated	PCB-126	PCB-126	1.32E-07	mg/kg				S	11/1/2000	6.50000	Primary Sample	SWMU 7.4 - Old Conservation
RJ781	OCTS24S02	extrapolated	PCB-156	PCB-156	1.10E-06	mg/kg				S	11/1/2000	6.50000	Primary Sample	SWMU 7.4 - Old Conservation
RJ781	OCTS24S02	extrapolated	PCB-157	PCB-157	4.30E-07	mg/kg				S	11/1/2000	6.50000	Primary Sample	SWMU 7.4 - Old Conservation
RJ781	OCTS24S02	extrapolated	PCB-167	PCB-167	7.48E-07	mg/kg				S	11/1/2000	6.50000	Primary Sample	SWMU 7.4 - Old Conservation
RJ781	OCTS24S02	extrapolated	PCB-169	PCB-169	1.11E-08	mg/kg				S	11/1/2000	6.50000	Primary Sample	SWMU 7.4 - Old Conservation
RJ781	OCTS24S02	extrapolated	PCB-189	PCB-189	1.11E-07	mg/kg				S	11/1/2000	6.50000	Primary Sample	SWMU 7.4 - Old Conservation
RJ781	OCTS24S02	extrapolated	PCB-77	PCB-77	2.71E-07	mg/kg				S	11/1/2000	6.50000	Primary Sample	SWMU 7.4 - Old Conservation
RJ781	OCTS24S02	extrapolated	PCB-81	PCB-81	5.23E-08	mg/kg				S	11/1/2000	6.50000	Primary Sample	SWMU 7.4 - Old Conservation
RJ781	OCTS24S02	extrapolated	Benzene	Benzene	2.10E-04	mg/kg				S	11/1/2000	6.50000	Primary Sample	SWMU 7.4 - Old Conservation
RJ781	OCTS24S02	extrapolated	Ethylbenzene	Ethylbenzene	2.10E-04	mg/kg				S	11/1/2000	6.50000	Primary Sample	SWMU 7.4 - Old Conservation
RJ781	OCTS24S02	extrapolated	Toluene	Toluene	2.10E-04	mg/kg				S	11/1/2000	6.50000	Primary Sample	SWMU 7.4 - Old Conservation
RJ781	OCTS24S02	extrapolated	m,p-Xylene	m,p-Xylene	6.30E-04	mg/kg				S	11/1/2000	6.50000	Primary Sample	SWMU 7.4 - Old Conservation
RJ781	OCTS24S02	extrapolated	o-Xylene	o-Xylene	1.40E-04	mg/kg				S	11/1/2000	6.50000	Primary Sample	SWMU 7.4 - Old Conservation
RJ781	OCTS24S02	extrapolated	Xylene (total)	Xylenes (total)	7.70E-04	mg/kg				S	11/1/2000	6.50000	Primary Sample	SWMU 7.4 - Old Conservation
RJ781	OCTS24S02	extrapolated	Benzo(a)anthracene	Benzo(a)anthracene	5.80E-04	mg/kg				S	11/1/2000	6.50000	Primary Sample	SWMU 7.4 - Old Conservation
RJ781	OCTS24S02	extrapolated	Benzo(a)pyrene	Benzo(a)pyrene	5.85E-04	mg/kg				S	11/1/2000	6.50000	Primary Sample	SWMU 7.4 - Old Conservation
RJ781	OCTS24S02	extrapolated	Benzo(b)fluoranthene	Benzo(b)fluoranthene	9.31E-04	mg/kg				S	11/1/2000	6.50000	Primary Sample	SWMU 7.4 - Old Conservation
RJ781	OCTS24S02	extrapolated	Benzo(e)pyrene	Benzo(e)pyrene	4.44E-03	mg/kg				S	11/1/2000	6.50000	Primary Sample	SWMU 7.4 - Old Conservation
RJ781	OCTS24S02	extrapolated	Benzo(k)fluoranthene	Benzo(k)fluoranthene	4.41E-04	mg/kg				S	11/1/2000	6.50000	Primary Sample	SWMU 7.4 - Old Conservation
RJ781	OCTS24S02	extrapolated	Chrysene	Chrysene	1.26E-03	mg/kg				S	11/1/2000	6.50000	Primary Sample	SWMU 7.4 - Old Conservation
RJ781	OCTS24S02	extrapolated	Dibenzo(a,h)anthracene	Dibenz(a,h)anthracene	2.38E-04	mg/kg				S	11/1/2000	6.50000	Primary Sample	SWMU 7.4 - Old Conservation
RJ781	OCTS24S02	extrapolated	Indeno(1,2,3-cd)pyrene	Indeno(1,2,3-cd)pyrene	5.17E-04	mg/kg				S	11/1/2000	6.50000	Primary Sample	SWMU 7.4 - Old Conservation
RJ781	OCTS24S02	extrapolated	Perylene	Perylene	2.54E-03	mg/kg				S	11/1/2000	6.50000	Primary Sample	SWMU 7.4 - Old Conservation
RJ781	OCTS24S02	summation	Total Tetra	Total Tetra	9.45E-07	mg/kg				S	11/1/2000	6.50000	Primary Sample	SWMU 7.4 - Old Conservation
RJ781	OCTS24S02	summation	Total Penta	Total Penta	1.19E-06	mg/kg				S	11/1/2000	6.50000	Primary Sample	SWMU 7.4 - Old Conservation

Table C7-2
Extrapolated Data
Old Conservation Yard RFI Site

EPA_NO	SAMPLE_ID	LAB_METHOD	ANALYTE	STD_ANALYT	CONCENTRAT	UNITS	REV_QUAL	Q_CODE	D_LIMIT	MATRIX	DATE_SAMP	DEPTH	SAMPLE_TYP	UNIT
RJ781	OCTS24S02	summation	Total Hexa	Total Hexa	4.05E-06	mg/kg				S	11/1/2000	6.50000	Primary Sample	SWMU 7.4 - Old Conservation
RJ781	OCTS24S02	summation	Total Hepta	Total Hepta	2.47E-05	mg/kg				S	11/1/2000	6.50000	Primary Sample	SWMU 7.4 - Old Conservation
RJ781	OCTS24S02	summation	Total Octa	Total Octa	9.23E-05	mg/kg				S	11/1/2000	6.50000	Primary Sample	SWMU 7.4 - Old Conservation
RJ782	OCBS26S01	extrapolated	PCB-105	PCB-105	4.14E-06	mg/kg				S	11/2/2000	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RJ782	OCBS26S01	extrapolated	PCB-114	PCB-114	1.52E-07	mg/kg				S	11/2/2000	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RJ782	OCBS26S01	extrapolated	PCB-118	PCB-118	8.98E-06	mg/kg				S	11/2/2000	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RJ782	OCBS26S01	extrapolated	PCB-123	PCB-123	1.00E-07	mg/kg				S	11/2/2000	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RJ782	OCBS26S01	extrapolated	PCB-126	PCB-126	2.52E-07	mg/kg				S	11/2/2000	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RJ782	OCBS26S01	extrapolated	PCB-156	PCB-156	2.11E-06	mg/kg				S	11/2/2000	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RJ782	OCBS26S01	extrapolated	PCB-157	PCB-157	8.22E-07	mg/kg				S	11/2/2000	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RJ782	OCBS26S01	extrapolated	PCB-167	PCB-167	1.43E-06	mg/kg				S	11/2/2000	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RJ782	OCBS26S01	extrapolated	PCB-169	PCB-169	2.13E-08	mg/kg				S	11/2/2000	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RJ782	OCBS26S01	extrapolated	PCB-189	PCB-189	2.13E-07	mg/kg				S	11/2/2000	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RJ782	OCBS26S01	extrapolated	PCB-77	PCB-77	5.18E-07	mg/kg				S	11/2/2000	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RJ782	OCBS26S01	extrapolated	PCB-81	PCB-81	1.00E-07	mg/kg				S	11/2/2000	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RJ782	OCBS26S01	extrapolated	Benzene	Benzene	1.02E-03	mg/kg				S	11/2/2000	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RJ782	OCBS26S01	extrapolated	Ethylbenzene	Ethylbenzene	1.02E-03	mg/kg				S	11/2/2000	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RJ782	OCBS26S01	extrapolated	Toluene	Toluene	1.02E-03	mg/kg				S	11/2/2000	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RJ782	OCBS26S01	extrapolated	m,p-Xylene	m,p-Xylene	3.06E-03	mg/kg				S	11/2/2000	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RJ782	OCBS26S01	extrapolated	o-Xylene	o-Xylene	6.80E-04	mg/kg				S	11/2/2000	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RJ782	OCBS26S01	extrapolated	Xylene (total)	Xylenes (total)	3.74E-03	mg/kg				S	11/2/2000	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RJ782	OCBS26S01	extrapolated	Benzo(e)pyrene	Benzo(e)pyrene	2.69E-02	mg/kg				S	11/2/2000	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RJ782	OCBS26S01	extrapolated	Dibenzo(a,h)anthracene	Dibenz(a,h)anthracene	1.44E-03	mg/kg				S	11/2/2000	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RJ782	OCBS26S01	extrapolated	Perylene	Perylene	1.54E-02	mg/kg				S	11/2/2000	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RJ782	OCBS26S01	summation	Total Tetra	Total Tetra	7.10E-07	mg/kg				S	11/2/2000	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RJ782	OCBS26S01	summation	Total Penta	Total Penta	9.75E-07	mg/kg				S	11/2/2000	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RJ782	OCBS26S01	summation	Total Hexa	Total Hexa	8.71E-06	mg/kg				S	11/2/2000	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RJ782	OCBS26S01	summation	Total Hepta	Total Hepta	9.07E-05	mg/kg				S	11/2/2000	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RJ782	OCBS26S01	summation	Total Octa	Total Octa	6.70E-04	mg/kg				S	11/2/2000	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RJ783	OCBS27S01	summation	Total Tetra	Total Tetra	1.29E-05	mg/kg				S	11/2/2000	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RJ783	OCBS27S01	summation	Total Penta	Total Penta	1.00E-04	mg/kg				S	11/2/2000	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RJ783	OCBS27S01	summation	Total Hexa	Total Hexa	6.75E-04	mg/kg				S	11/2/2000	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RJ783	OCBS27S01	summation	Total Hepta	Total Hepta	3.59E-03	mg/kg				S	11/2/2000	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RJ783	OCBS27S01	summation	Total Octa	Total Octa	1.57E-02	mg/kg				S	11/2/2000	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS287	OCTS05S01	extrapolated	Benzene	Benzene	6.60E-04	mg/kg				S	6/17/1999	3.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS287	OCTS05S01	extrapolated	Ethylbenzene	Ethylbenzene	6.60E-04	mg/kg				S	6/17/1999	3.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS287	OCTS05S01	extrapolated	m,p-Xylene	m,p-Xylene	1.98E-03	mg/kg				S	6/17/1999	3.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS287	OCTS05S01	extrapolated	o-Xylene	o-Xylene	4.40E-04	mg/kg				S	6/17/1999	3.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS287	OCTS05S01	extrapolated	Xylene (total)	Xylenes (total)	2.42E-03	mg/kg				S	6/17/1999	3.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS287	OCTS05S01	extrapolated	Toluene	Toluene	6.60E-04	mg/kg				S	6/17/1999	3.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS287	OCTS05S01	extrapolated	2-Methylnaphthalene	2-Methylnaphthalene	1.51E-01	mg/kg				S	6/17/1999	3.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS287	OCTS05S01	extrapolated	Acenaphthene	Acenaphthene	9.45E-03	mg/kg				S	6/17/1999	3.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS287	OCTS05S01	extrapolated	Acenaphthylene	Acenaphthylene	1.16E-03	mg/kg				S	6/17/1999	3.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS287	OCTS05S01	extrapolated	Anthracene	Anthracene	6.16E-03	mg/kg				S	6/17/1999	3.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS287	OCTS05S01	extrapolated	Benzo(a)anthracene	Benzo(a)anthracene	4.45E-04	mg/kg				S	6/17/1999	3.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS287	OCTS05S01	extrapolated	Benzo(a)pyrene	Benzo(a)pyrene	4.49E-04	mg/kg				S	6/17/1999	3.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS287	OCTS05S01	extrapolated	Benzo(b)fluoranthene	Benzo(b)fluoranthene	7.15E-04	mg/kg				S	6/17/1999	3.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS287	OCTS05S01	extrapolated	Benzo(e)pyrene	Benzo(e)pyrene	3.41E-03	mg/kg				S	6/17/1999	3.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS287	OCTS05S01	extrapolated	Benzo(g,h,i)perylene	Benzo(g,h,i)perylene	3.65E-03	mg/kg				S	6/17/1999	3.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS287	OCTS05S01	extrapolated	Benzo(k)fluoranthene	Benzo(k)fluoranthene	3.38E-04	mg/kg				S	6/17/1999	3.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS287	OCTS05S01	extrapolated	Chrysene	Chrysene	9.68E-04	mg/kg				S	6/17/1999	3.00000	Primary Sample	SWMU 7.4 - Old Conservation

Table C7-2
Extrapolated Data
Old Conservation Yard RFI Site

EPA_NO	SAMPLE_ID	LAB_METHOD	ANALYTE	STD_ANALYT	CONCENTRAT	UNITS	REV_QUAL	Q_CODE	D_LIMIT	MATRIX	DATE_SAMP	DEPTH	SAMPLE_TYP	UNIT
RS287	OCTS05S01	extrapolated	Dibenzo(a,h)anthracene	Dibenz(a,h)anthracene	1.83E-04	mg/kg				S	6/17/1999	3.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS287	OCTS05S01	extrapolated	Fluoranthene	Fluoranthene	1.23E-03	mg/kg				S	6/17/1999	3.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS287	OCTS05S01	extrapolated	Fluorene	Fluorene	9.37E-03	mg/kg				S	6/17/1999	3.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS287	OCTS05S01	extrapolated	Indeno(1,2,3-cd)pyrene	Indeno(1,2,3-cd)pyrene	3.97E-04	mg/kg				S	6/17/1999	3.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS287	OCTS05S01	extrapolated	Perylene	Perylene	1.95E-03	mg/kg				S	6/17/1999	3.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS287	OCTS05S01	extrapolated	Pyrene	Pyrene	2.25E-03	mg/kg				S	6/17/1999	3.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS288	OCTS06S01	extrapolated	PCB-105	PCB-105	6.80E-06	mg/kg				S	6/17/1999	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS288	OCTS06S01	extrapolated	PCB-114	PCB-114	2.49E-07	mg/kg				S	6/17/1999	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS288	OCTS06S01	extrapolated	PCB-118	PCB-118	1.47E-05	mg/kg				S	6/17/1999	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS288	OCTS06S01	extrapolated	PCB-123	PCB-123	1.64E-07	mg/kg				S	6/17/1999	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS288	OCTS06S01	extrapolated	PCB-126	PCB-126	4.14E-07	mg/kg				S	6/17/1999	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS288	OCTS06S01	extrapolated	PCB-156	PCB-156	3.46E-06	mg/kg				S	6/17/1999	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS288	OCTS06S01	extrapolated	PCB-157	PCB-157	1.35E-06	mg/kg				S	6/17/1999	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS288	OCTS06S01	extrapolated	PCB-167	PCB-167	2.35E-06	mg/kg				S	6/17/1999	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS288	OCTS06S01	extrapolated	PCB-169	PCB-169	3.50E-08	mg/kg				S	6/17/1999	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS288	OCTS06S01	extrapolated	PCB-189	PCB-189	3.50E-07	mg/kg				S	6/17/1999	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS288	OCTS06S01	extrapolated	PCB-77	PCB-77	8.51E-07	mg/kg				S	6/17/1999	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS288	OCTS06S01	extrapolated	PCB-81	PCB-81	1.64E-07	mg/kg				S	6/17/1999	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS288	OCTS06S01	extrapolated	Benzene	Benzene	3.24E-03	mg/kg				S	6/17/1999	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS288	OCTS06S01	extrapolated	Ethylbenzene	Ethylbenzene	3.24E-03	mg/kg				S	6/17/1999	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS288	OCTS06S01	extrapolated	Toluene	Toluene	3.24E-03	mg/kg				S	6/17/1999	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS288	OCTS06S01	extrapolated	m,p-Xylene	m,p-Xylene	9.72E-03	mg/kg				S	6/17/1999	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS288	OCTS06S01	extrapolated	o-Xylene	o-Xylene	2.16E-03	mg/kg				S	6/17/1999	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS288	OCTS06S01	extrapolated	Xylene (total)	Xylenes (total)	1.19E-02	mg/kg				S	6/17/1999	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS288DL	OCTS06S01	extrapolated	2-Methylnaphthalene	2-Methylnaphthalene	7.44E-01	mg/kg				S	6/17/1999	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS288DL	OCTS06S01	extrapolated	Acenaphthene	Acenaphthene	2.02E-01	mg/kg				S	6/17/1999	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS288DL	OCTS06S01	extrapolated	Acenaphthylene	Acenaphthylene	2.47E-02	mg/kg				S	6/17/1999	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS288DL	OCTS06S01	extrapolated	Anthracene	Anthracene	1.32E-01	mg/kg				S	6/17/1999	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS288DL	OCTS06S01	extrapolated	Benzo(a)anthracene	Benzo(a)anthracene	9.52E-03	mg/kg				S	6/17/1999	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS288DL	OCTS06S01	extrapolated	Benzo(a)pyrene	Benzo(a)pyrene	9.60E-03	mg/kg				S	6/17/1999	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS288DL	OCTS06S01	extrapolated	Benzo(b)fluoranthene	Benzo(b)fluoranthene	1.53E-02	mg/kg				S	6/17/1999	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS288DL	OCTS06S01	extrapolated	Benzo(e)pyrene	Benzo(e)pyrene	7.30E-02	mg/kg				S	6/17/1999	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS288DL	OCTS06S01	extrapolated	Benzo(g,h,i)perylene	Benzo(g,h,i)perylene	7.81E-02	mg/kg				S	6/17/1999	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS288DL	OCTS06S01	extrapolated	Benzo(k)fluoranthene	Benzo(k)fluoranthene	7.24E-03	mg/kg				S	6/17/1999	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS288DL	OCTS06S01	extrapolated	Chrysene	Chrysene	2.07E-02	mg/kg				S	6/17/1999	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS288DL	OCTS06S01	extrapolated	Dibenzo(a,h)anthracene	Dibenz(a,h)anthracene	3.91E-03	mg/kg				S	6/17/1999	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS288DL	OCTS06S01	extrapolated	Fluoranthene	Fluoranthene	2.64E-02	mg/kg				S	6/17/1999	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS288DL	OCTS06S01	extrapolated	Fluorene	Fluorene	2.00E-01	mg/kg				S	6/17/1999	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS288DL	OCTS06S01	extrapolated	Indeno(1,2,3-cd)pyrene	Indeno(1,2,3-cd)pyrene	8.49E-03	mg/kg				S	6/17/1999	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS288DL	OCTS06S01	extrapolated	Naphthalene	Naphthalene	1.88E-01	mg/kg				S	6/17/1999	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS288DL	OCTS06S01	extrapolated	Perylene	Perylene	4.16E-02	mg/kg				S	6/17/1999	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS288DL	OCTS06S01	extrapolated	Phenanthrene	Phenanthrene	5.41E-01	mg/kg				S	6/17/1999	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS288DL	OCTS06S01	extrapolated	Pyrene	Pyrene	4.81E-02	mg/kg				S	6/17/1999	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS289	OCTS07S01	extrapolated	Benzene	Benzene	6.00E-04	mg/kg				S	6/17/1999	2.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS289	OCTS07S01	extrapolated	Ethylbenzene	Ethylbenzene	6.00E-04	mg/kg				S	6/17/1999	2.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS289	OCTS07S01	extrapolated	Toluene	Toluene	6.00E-04	mg/kg				S	6/17/1999	2.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS289	OCTS07S01	extrapolated	m,p-Xylene	m,p-Xylene	1.80E-03	mg/kg				S	6/17/1999	2.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS289	OCTS07S01	extrapolated	o-Xylene	o-Xylene	4.00E-04	mg/kg				S	6/17/1999	2.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS289	OCTS07S01	extrapolated	Xylene (total)	Xylenes (total)	2.20E-03	mg/kg				S	6/17/1999	2.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS289DL	OCTS07S01	extrapolated	2-Methylnaphthalene	2-Methylnaphthalene	1.38E-01	mg/kg				S	6/17/1999	2.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS289DL	OCTS07S01	extrapolated	Acenaphthene	Acenaphthene	2.81E-02	mg/kg				S	6/17/1999	2.50000	Primary Sample	SWMU 7.4 - Old Conservation

Table C7-2
Extrapolated Data
Old Conservation Yard RFI Site

EPA_NO	SAMPLE_ID	LAB_METHOD	ANALYTE	STD_ANALYT	CONCENTRAT	UNITS	REV_QUAL	Q_CODE	D_LIMIT	MATRIX	DATE_SAMP	DEPTH	SAMPLE_TYP	UNIT
RS289DL	OCTS07S01	extrapolated	Acenaphthylene	Acenaphthylene	3.43E-03	mg/kg				S	6/17/1999	2.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS289DL	OCTS07S01	extrapolated	Anthracene	Anthracene	1.83E-02	mg/kg				S	6/17/1999	2.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS289DL	OCTS07S01	extrapolated	Benzo(a)anthracene	Benzo(a)anthracene	1.32E-03	mg/kg				S	6/17/1999	2.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS289DL	OCTS07S01	extrapolated	Benzo(a)pyrene	Benzo(a)pyrene	1.33E-03	mg/kg				S	6/17/1999	2.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS289DL	OCTS07S01	extrapolated	Benzo(b)fluoranthene	Benzo(b)fluoranthene	2.12E-03	mg/kg				S	6/17/1999	2.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS289DL	OCTS07S01	extrapolated	Benzo(e)pyrene	Benzo(e)pyrene	1.01E-02	mg/kg				S	6/17/1999	2.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS289DL	OCTS07S01	extrapolated	Benzo(g,h,i)perylene	Benzo(g,h,i)perylene	1.08E-02	mg/kg				S	6/17/1999	2.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS289DL	OCTS07S01	extrapolated	Benzo(k)fluoranthene	Benzo(k)fluoranthene	1.01E-03	mg/kg				S	6/17/1999	2.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS289DL	OCTS07S01	extrapolated	Chrysene	Chrysene	2.87E-03	mg/kg				S	6/17/1999	2.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS289DL	OCTS07S01	extrapolated	Dibenzo(a,h)anthracene	Dibenz(a,h)anthracene	5.42E-04	mg/kg				S	6/17/1999	2.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS289DL	OCTS07S01	extrapolated	Fluoranthene	Fluoranthene	3.67E-03	mg/kg				S	6/17/1999	2.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS289DL	OCTS07S01	extrapolated	Fluorene	Fluorene	2.78E-02	mg/kg				S	6/17/1999	2.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS289DL	OCTS07S01	extrapolated	Indeno(1,2,3-cd)pyrene	Indeno(1,2,3-cd)pyrene	1.18E-03	mg/kg				S	6/17/1999	2.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS289DL	OCTS07S01	extrapolated	Naphthalene	Naphthalene	3.47E-02	mg/kg				S	6/17/1999	2.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS289DL	OCTS07S01	extrapolated	Perylene	Perylene	5.78E-03	mg/kg				S	6/17/1999	2.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS289DL	OCTS07S01	extrapolated	Phenanthrene	Phenanthrene	7.51E-02	mg/kg				S	6/17/1999	2.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS289DL	OCTS07S01	extrapolated	Pyrene	Pyrene	6.68E-03	mg/kg				S	6/17/1999	2.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS290	OCTS08S01	extrapolated	Benzene	Benzene	6.60E-04	mg/kg				S	6/17/1999	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS290	OCTS08S01	extrapolated	Ethylbenzene	Ethylbenzene	6.60E-04	mg/kg				S	6/17/1999	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS290	OCTS08S01	extrapolated	Toluene	Toluene	6.60E-04	mg/kg				S	6/17/1999	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS290	OCTS08S01	extrapolated	m,p-Xylene	m,p-Xylene	1.98E-03	mg/kg				S	6/17/1999	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS290	OCTS08S01	extrapolated	o-Xylene	o-Xylene	4.40E-04	mg/kg				S	6/17/1999	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS290	OCTS08S01	extrapolated	Xylene (total)	Xylenes (total)	2.42E-03	mg/kg				S	6/17/1999	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS290	OCTS08S01	extrapolated	2-Methylnaphthalene	2-Methylnaphthalene	1.51E-01	mg/kg				S	6/17/1999	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS290	OCTS08S01	extrapolated	Acenaphthylene	Acenaphthylene	3.71E-03	mg/kg				S	6/17/1999	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS290	OCTS08S01	extrapolated	Benzo(a)anthracene	Benzo(a)anthracene	1.43E-03	mg/kg				S	6/17/1999	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS290	OCTS08S01	extrapolated	Benzo(a)pyrene	Benzo(a)pyrene	1.44E-03	mg/kg				S	6/17/1999	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS290	OCTS08S01	extrapolated	Benzo(b)fluoranthene	Benzo(b)fluoranthene	2.30E-03	mg/kg				S	6/17/1999	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS290	OCTS08S01	extrapolated	Benzo(e)pyrene	Benzo(e)pyrene	1.10E-02	mg/kg				S	6/17/1999	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS290	OCTS08S01	extrapolated	Benzo(g,h,i)perylene	Benzo(g,h,i)perylene	1.17E-02	mg/kg				S	6/17/1999	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS290	OCTS08S01	extrapolated	Benzo(k)fluoranthene	Benzo(k)fluoranthene	1.09E-03	mg/kg				S	6/17/1999	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS290	OCTS08S01	extrapolated	Chrysene	Chrysene	3.11E-03	mg/kg				S	6/17/1999	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS290	OCTS08S01	extrapolated	Dibenzo(a,h)anthracene	Dibenz(a,h)anthracene	5.87E-04	mg/kg				S	6/17/1999	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS290	OCTS08S01	extrapolated	Fluoranthene	Fluoranthene	3.96E-03	mg/kg				S	6/17/1999	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS290	OCTS08S01	extrapolated	Indeno(1,2,3-cd)pyrene	Indeno(1,2,3-cd)pyrene	1.27E-03	mg/kg				S	6/17/1999	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS290	OCTS08S01	extrapolated	Perylene	Perylene	6.25E-03	mg/kg				S	6/17/1999	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS290	OCTS08S01	extrapolated	Pyrene	Pyrene	7.22E-03	mg/kg				S	6/17/1999	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS291	OCTS09S01	extrapolated	Benzene	Benzene	6.60E-04	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS291	OCTS09S01	extrapolated	Ethylbenzene	Ethylbenzene	6.60E-04	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS291	OCTS09S01	extrapolated	m,p-Xylene	m,p-Xylene	1.98E-03	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS291	OCTS09S01	extrapolated	o-Xylene	o-Xylene	4.40E-04	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS291	OCTS09S01	extrapolated	Xylene (total)	Xylenes (total)	2.42E-03	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS291	OCTS09S01	extrapolated	Toluene	Toluene	6.60E-04	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS291	OCTS09S01	extrapolated	2-Methylnaphthalene	2-Methylnaphthalene	1.51E-01	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS291	OCTS09S01	extrapolated	Acenaphthene	Acenaphthene	9.45E-03	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS291	OCTS09S01	extrapolated	Acenaphthylene	Acenaphthylene	1.16E-03	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS291	OCTS09S01	extrapolated	Anthracene	Anthracene	6.16E-03	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS291	OCTS09S01	extrapolated	Benzo(a)anthracene	Benzo(a)anthracene	4.45E-04	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS291	OCTS09S01	extrapolated	Benzo(a)pyrene	Benzo(a)pyrene	4.49E-04	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS291	OCTS09S01	extrapolated	Benzo(b)fluoranthene	Benzo(b)fluoranthene	7.15E-04	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS291	OCTS09S01	extrapolated	Benzo(e)pyrene	Benzo(e)pyrene	3.41E-03	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation

Table C7-2
Extrapolated Data
Old Conservation Yard RFI Site

EPA_NO	SAMPLE_ID	LAB_METHOD	ANALYTE	STD_ANALYT	CONCENTRAT	UNITS	REV_QUAL	Q_CODE	D_LIMIT	MATRIX	DATE_SAMP	DEPTH	SAMPLE_TYP	UNIT
RS291	OCTS09S01	extrapolated	Benzo(g,h,i)perylene	Benzo(g,h,i)perylene	3.65E-03	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS291	OCTS09S01	extrapolated	Benzo(k)fluoranthene	Benzo(k)fluoranthene	3.38E-04	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS291	OCTS09S01	extrapolated	Chrysene	Chrysene	9.68E-04	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS291	OCTS09S01	extrapolated	Dibenzo(a,h)anthracene	Dibenz(a,h)anthracene	1.83E-04	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS291	OCTS09S01	extrapolated	Fluoranthene	Fluoranthene	1.23E-03	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS291	OCTS09S01	extrapolated	Fluorene	Fluorene	9.37E-03	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS291	OCTS09S01	extrapolated	Indeno(1,2,3-cd)pyrene	Indeno(1,2,3-cd)pyrene	3.97E-04	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS291	OCTS09S01	extrapolated	Perylene	Perylene	1.95E-03	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS291	OCTS09S01	extrapolated	Pyrene	Pyrene	2.25E-03	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS292	OCTS10S01	extrapolated	Benzene	Benzene	6.60E-04	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS292	OCTS10S01	extrapolated	Ethylbenzene	Ethylbenzene	6.60E-04	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS292	OCTS10S01	extrapolated	Toluene	Toluene	6.60E-04	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS292	OCTS10S01	extrapolated	m,p-Xylene	m,p-Xylene	1.98E-03	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS292	OCTS10S01	extrapolated	o-Xylene	o-Xylene	4.40E-04	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS292	OCTS10S01	extrapolated	Xylene (total)	Xylenes (total)	2.42E-03	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS292	OCTS10S01	extrapolated	2-Methylnaphthalene	2-Methylnaphthalene	1.51E-01	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS292	OCTS10S01	extrapolated	Acenaphthene	Acenaphthene	9.45E-03	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS292	OCTS10S01	extrapolated	Acenaphthylene	Acenaphthylene	1.16E-03	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS292	OCTS10S01	extrapolated	Anthracene	Anthracene	6.16E-03	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS292	OCTS10S01	extrapolated	Benzo(a)anthracene	Benzo(a)anthracene	4.45E-04	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS292	OCTS10S01	extrapolated	Benzo(a)pyrene	Benzo(a)pyrene	4.49E-04	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS292	OCTS10S01	extrapolated	Benzo(b)fluoranthene	Benzo(b)fluoranthene	7.15E-04	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS292	OCTS10S01	extrapolated	Benzo(e)pyrene	Benzo(e)pyrene	3.41E-03	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS292	OCTS10S01	extrapolated	Benzo(g,h,i)perylene	Benzo(g,h,i)perylene	3.65E-03	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS292	OCTS10S01	extrapolated	Benzo(k)fluoranthene	Benzo(k)fluoranthene	3.38E-04	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS292	OCTS10S01	extrapolated	Chrysene	Chrysene	9.68E-04	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS292	OCTS10S01	extrapolated	Dibenzo(a,h)anthracene	Dibenz(a,h)anthracene	1.83E-04	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS292	OCTS10S01	extrapolated	Fluoranthene	Fluoranthene	1.23E-03	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS292	OCTS10S01	extrapolated	Fluorene	Fluorene	9.37E-03	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS292	OCTS10S01	extrapolated	Indeno(1,2,3-cd)pyrene	Indeno(1,2,3-cd)pyrene	3.97E-04	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS292	OCTS10S01	extrapolated	Perylene	Perylene	1.95E-03	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS292	OCTS10S01	extrapolated	Pyrene	Pyrene	2.25E-03	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS293	OCTS11S01	extrapolated	PCB-105	PCB-105	6.80E-06	mg/kg				S	6/17/1999	0.75000	Primary Sample	SWMU 7.4 - Old Conservation
RS293	OCTS11S01	extrapolated	PCB-114	PCB-114	2.49E-07	mg/kg				S	6/17/1999	0.75000	Primary Sample	SWMU 7.4 - Old Conservation
RS293	OCTS11S01	extrapolated	PCB-118	PCB-118	1.47E-05	mg/kg				S	6/17/1999	0.75000	Primary Sample	SWMU 7.4 - Old Conservation
RS293	OCTS11S01	extrapolated	PCB-123	PCB-123	1.64E-07	mg/kg				S	6/17/1999	0.75000	Primary Sample	SWMU 7.4 - Old Conservation
RS293	OCTS11S01	extrapolated	PCB-126	PCB-126	4.14E-07	mg/kg				S	6/17/1999	0.75000	Primary Sample	SWMU 7.4 - Old Conservation
RS293	OCTS11S01	extrapolated	PCB-156	PCB-156	3.46E-06	mg/kg				S	6/17/1999	0.75000	Primary Sample	SWMU 7.4 - Old Conservation
RS293	OCTS11S01	extrapolated	PCB-157	PCB-157	1.35E-06	mg/kg				S	6/17/1999	0.75000	Primary Sample	SWMU 7.4 - Old Conservation
RS293	OCTS11S01	extrapolated	PCB-167	PCB-167	2.35E-06	mg/kg				S	6/17/1999	0.75000	Primary Sample	SWMU 7.4 - Old Conservation
RS293	OCTS11S01	extrapolated	PCB-169	PCB-169	3.50E-08	mg/kg				S	6/17/1999	0.75000	Primary Sample	SWMU 7.4 - Old Conservation
RS293	OCTS11S01	extrapolated	PCB-189	PCB-189	3.50E-07	mg/kg				S	6/17/1999	0.75000	Primary Sample	SWMU 7.4 - Old Conservation
RS293	OCTS11S01	extrapolated	PCB-77	PCB-77	8.51E-07	mg/kg				S	6/17/1999	0.75000	Primary Sample	SWMU 7.4 - Old Conservation
RS293	OCTS11S01	extrapolated	PCB-81	PCB-81	1.64E-07	mg/kg				S	6/17/1999	0.75000	Primary Sample	SWMU 7.4 - Old Conservation
RS293	OCTS11S01	extrapolated	Benzene	Benzene	3.12E-03	mg/kg				S	6/17/1999	0.75000	Primary Sample	SWMU 7.4 - Old Conservation
RS293	OCTS11S01	extrapolated	Ethylbenzene	Ethylbenzene	3.12E-03	mg/kg				S	6/17/1999	0.75000	Primary Sample	SWMU 7.4 - Old Conservation
RS293	OCTS11S01	extrapolated	Toluene	Toluene	3.12E-03	mg/kg				S	6/17/1999	0.75000	Primary Sample	SWMU 7.4 - Old Conservation
RS293	OCTS11S01	extrapolated	m,p-Xylene	m,p-Xylene	9.36E-03	mg/kg				S	6/17/1999	0.75000	Primary Sample	SWMU 7.4 - Old Conservation
RS293	OCTS11S01	extrapolated	o-Xylene	o-Xylene	2.08E-03	mg/kg				S	6/17/1999	0.75000	Primary Sample	SWMU 7.4 - Old Conservation
RS293	OCTS11S01	extrapolated	Xylene (total)	Xylenes (total)	1.14E-02	mg/kg				S	6/17/1999	0.75000	Primary Sample	SWMU 7.4 - Old Conservation
RS293	OCTS11S01	extrapolated	2-Methylnaphthalene	2-Methylnaphthalene	7.16E-01	mg/kg				S	6/17/1999	0.75000	Primary Sample	SWMU 7.4 - Old Conservation

Table C7-2
Extrapolated Data
Old Conservation Yard RFI Site

EPA_NO	SAMPLE_ID	LAB_METHOD	ANALYTE	STD_ANALYT	CONCENTRAT	UNITS	REV_QUAL	Q_CODE	D_LIMIT	MATRIX	DATE_SAMP	DEPTH	SAMPLE_TYP	UNIT
RS293	OCTS11S01	extrapolated	Acenaphthene	Acenaphthene	8.64E-01	mg/kg				S	6/17/1999	0.75000	Primary Sample	SWMU 7.4 - Old Conservation
RS293	OCTS11S01	extrapolated	Acenaphthylene	Acenaphthylene	1.06E-01	mg/kg				S	6/17/1999	0.75000	Primary Sample	SWMU 7.4 - Old Conservation
RS293	OCTS11S01	extrapolated	Anthracene	Anthracene	5.63E-01	mg/kg				S	6/17/1999	0.75000	Primary Sample	SWMU 7.4 - Old Conservation
RS293	OCTS11S01	extrapolated	Benzo(a)anthracene	Benzo(a)anthracene	4.07E-02	mg/kg				S	6/17/1999	0.75000	Primary Sample	SWMU 7.4 - Old Conservation
RS293	OCTS11S01	extrapolated	Benzo(a)pyrene	Benzo(a)pyrene	4.11E-02	mg/kg				S	6/17/1999	0.75000	Primary Sample	SWMU 7.4 - Old Conservation
RS293	OCTS11S01	extrapolated	Benzo(b)fluoranthene	Benzo(b)fluoranthene	6.54E-02	mg/kg				S	6/17/1999	0.75000	Primary Sample	SWMU 7.4 - Old Conservation
RS293	OCTS11S01	extrapolated	Benzo(e)pyrene	Benzo(e)pyrene	3.12E-01	mg/kg				S	6/17/1999	0.75000	Primary Sample	SWMU 7.4 - Old Conservation
RS293	OCTS11S01	extrapolated	Benzo(g,h,i)perylene	Benzo(g,h,i)perylene	3.34E-01	mg/kg				S	6/17/1999	0.75000	Primary Sample	SWMU 7.4 - Old Conservation
RS293	OCTS11S01	extrapolated	Benzo(k)fluoranthene	Benzo(k)fluoranthene	3.10E-02	mg/kg				S	6/17/1999	0.75000	Primary Sample	SWMU 7.4 - Old Conservation
RS293	OCTS11S01	extrapolated	Chrysene	Chrysene	8.85E-02	mg/kg				S	6/17/1999	0.75000	Primary Sample	SWMU 7.4 - Old Conservation
RS293	OCTS11S01	extrapolated	Dibenz(a,h)anthracene	Dibenz(a,h)anthracene	1.67E-02	mg/kg				S	6/17/1999	0.75000	Primary Sample	SWMU 7.4 - Old Conservation
RS293	OCTS11S01	extrapolated	Fluoranthene	Fluoranthene	1.13E-01	mg/kg				S	6/17/1999	0.75000	Primary Sample	SWMU 7.4 - Old Conservation
RS293	OCTS11S01	extrapolated	Fluorene	Fluorene	8.57E-01	mg/kg				S	6/17/1999	0.75000	Primary Sample	SWMU 7.4 - Old Conservation
RS293	OCTS11S01	extrapolated	Indeno(1,2,3-cd)pyrene	Indeno(1,2,3-cd)pyrene	3.63E-02	mg/kg				S	6/17/1999	0.75000	Primary Sample	SWMU 7.4 - Old Conservation
RS293	OCTS11S01	extrapolated	Naphthalene	Naphthalene	1.81E-01	mg/kg				S	6/17/1999	0.75000	Primary Sample	SWMU 7.4 - Old Conservation
RS293	OCTS11S01	extrapolated	Perylene	Perylene	1.78E-01	mg/kg				S	6/17/1999	0.75000	Primary Sample	SWMU 7.4 - Old Conservation
RS293	OCTS11S01	extrapolated	Phenanthrene	Phenanthrene	2.31E+00	mg/kg				S	6/17/1999	0.75000	Primary Sample	SWMU 7.4 - Old Conservation
RS293	OCTS11S01	extrapolated	Pyrene	Pyrene	2.06E-01	mg/kg				S	6/17/1999	0.75000	Primary Sample	SWMU 7.4 - Old Conservation
RS294	OCTS12S01	extrapolated	PCB-105	PCB-105	6.80E-06	mg/kg				S	6/17/1999	1.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS294	OCTS12S01	extrapolated	PCB-114	PCB-114	2.49E-07	mg/kg				S	6/17/1999	1.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS294	OCTS12S01	extrapolated	PCB-118	PCB-118	1.47E-05	mg/kg				S	6/17/1999	1.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS294	OCTS12S01	extrapolated	PCB-123	PCB-123	1.64E-07	mg/kg				S	6/17/1999	1.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS294	OCTS12S01	extrapolated	PCB-126	PCB-126	4.14E-07	mg/kg				S	6/17/1999	1.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS294	OCTS12S01	extrapolated	PCB-156	PCB-156	3.46E-06	mg/kg				S	6/17/1999	1.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS294	OCTS12S01	extrapolated	PCB-157	PCB-157	1.35E-06	mg/kg				S	6/17/1999	1.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS294	OCTS12S01	extrapolated	PCB-167	PCB-167	2.35E-06	mg/kg				S	6/17/1999	1.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS294	OCTS12S01	extrapolated	PCB-169	PCB-169	3.50E-08	mg/kg				S	6/17/1999	1.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS294	OCTS12S01	extrapolated	PCB-189	PCB-189	3.50E-07	mg/kg				S	6/17/1999	1.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS294	OCTS12S01	extrapolated	PCB-77	PCB-77	8.51E-07	mg/kg				S	6/17/1999	1.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS294	OCTS12S01	extrapolated	PCB-81	PCB-81	1.64E-07	mg/kg				S	6/17/1999	1.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS294	OCTS12S01	extrapolated	Benzene	Benzene	6.60E-04	mg/kg				S	6/17/1999	1.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS294	OCTS12S01	extrapolated	Ethylbenzene	Ethylbenzene	6.60E-04	mg/kg				S	6/17/1999	1.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS294	OCTS12S01	extrapolated	Toluene	Toluene	6.60E-04	mg/kg				S	6/17/1999	1.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS294	OCTS12S01	extrapolated	m,p-Xylene	m,p-Xylene	1.98E-03	mg/kg				S	6/17/1999	1.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS294	OCTS12S01	extrapolated	o-Xylene	o-Xylene	4.40E-04	mg/kg				S	6/17/1999	1.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS294	OCTS12S01	extrapolated	Xylene (total)	Xylenes (total)	2.42E-03	mg/kg				S	6/17/1999	1.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS294	OCTS12S01	extrapolated	2-Methylnaphthalene	2-Methylnaphthalene	1.51E-01	mg/kg				S	6/17/1999	1.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS294	OCTS12S01	extrapolated	Acenaphthene	Acenaphthene	9.45E-03	mg/kg				S	6/17/1999	1.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS294	OCTS12S01	extrapolated	Acenaphthylene	Acenaphthylene	1.16E-03	mg/kg				S	6/17/1999	1.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS294	OCTS12S01	extrapolated	Anthracene	Anthracene	6.16E-03	mg/kg				S	6/17/1999	1.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS294	OCTS12S01	extrapolated	Benzo(a)anthracene	Benzo(a)anthracene	4.45E-04	mg/kg				S	6/17/1999	1.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS294	OCTS12S01	extrapolated	Benzo(a)pyrene	Benzo(a)pyrene	4.49E-04	mg/kg				S	6/17/1999	1.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS294	OCTS12S01	extrapolated	Benzo(b)fluoranthene	Benzo(b)fluoranthene	7.15E-04	mg/kg				S	6/17/1999	1.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS294	OCTS12S01	extrapolated	Benzo(e)pyrene	Benzo(e)pyrene	3.41E-03	mg/kg				S	6/17/1999	1.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS294	OCTS12S01	extrapolated	Benzo(g,h,i)perylene	Benzo(g,h,i)perylene	3.65E-03	mg/kg				S	6/17/1999	1.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS294	OCTS12S01	extrapolated	Benzo(k)fluoranthene	Benzo(k)fluoranthene	3.38E-04	mg/kg				S	6/17/1999	1.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS294	OCTS12S01	extrapolated	Chrysene	Chrysene	9.68E-04	mg/kg				S	6/17/1999	1.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS294	OCTS12S01	extrapolated	Dibenz(a,h)anthracene	Dibenz(a,h)anthracene	1.83E-04	mg/kg				S	6/17/1999	1.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS294	OCTS12S01	extrapolated	Fluoranthene	Fluoranthene	1.23E-03	mg/kg				S	6/17/1999	1.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS294	OCTS12S01	extrapolated	Fluorene	Fluorene	9.37E-03	mg/kg				S	6/17/1999	1.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS294	OCTS12S01	extrapolated	Indeno(1,2,3-cd)pyrene	Indeno(1,2,3-cd)pyrene	3.97E-04	mg/kg				S	6/17/1999	1.50000	Primary Sample	SWMU 7.4 - Old Conservation

Table C7-2
Extrapolated Data
Old Conservation Yard RFI Site

EPA_NO	SAMPLE_ID	LAB_METHOD	ANALYTE	STD_ANALYT	CONCENTRAT	UNITS	REV_QUAL	Q_CODE	D_LIMIT	MATRIX	DATE_SAMP	DEPTH	SAMPLE_TYP	UNIT
RS294	OCTS12S01	extrapolated	Naphthalene	Naphthalene	3.82E-02	mg/kg				S	6/17/1999	1.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS294	OCTS12S01	extrapolated	Perylene	Perylene	1.95E-03	mg/kg				S	6/17/1999	1.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS294	OCTS12S01	extrapolated	Phenanthrene	Phenanthrene	2.53E-02	mg/kg				S	6/17/1999	1.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS294	OCTS12S01	extrapolated	Pyrene	Pyrene	2.25E-03	mg/kg				S	6/17/1999	1.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS295	OCTS13S01	extrapolated	Benzene	Benzene	6.60E-04	mg/kg				S	6/17/1999	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS295	OCTS13S01	extrapolated	Ethylbenzene	Ethylbenzene	6.60E-04	mg/kg				S	6/17/1999	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS295	OCTS13S01	extrapolated	Toluene	Toluene	6.60E-04	mg/kg				S	6/17/1999	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS295	OCTS13S01	extrapolated	m,p-Xylene	m,p-Xylene	1.98E-03	mg/kg				S	6/17/1999	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS295	OCTS13S01	extrapolated	o-Xylene	o-Xylene	4.40E-04	mg/kg				S	6/17/1999	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS295	OCTS13S01	extrapolated	Xylene (total)	Xylenes (total)	2.42E-03	mg/kg				S	6/17/1999	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS295	OCTS13S01	extrapolated	2-Methylnaphthalene	2-Methylnaphthalene	1.51E-01	mg/kg				S	6/17/1999	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS295	OCTS13S01	extrapolated	Acenaphthene	Acenaphthene	9.45E-03	mg/kg				S	6/17/1999	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS295	OCTS13S01	extrapolated	Acenaphthylene	Acenaphthylene	1.16E-03	mg/kg				S	6/17/1999	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS295	OCTS13S01	extrapolated	Anthracene	Anthracene	6.16E-03	mg/kg				S	6/17/1999	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS295	OCTS13S01	extrapolated	Benzo(a)anthracene	Benzo(a)anthracene	4.45E-04	mg/kg				S	6/17/1999	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS295	OCTS13S01	extrapolated	Benzo(a)pyrene	Benzo(a)pyrene	4.49E-04	mg/kg				S	6/17/1999	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS295	OCTS13S01	extrapolated	Benzo(b)fluoranthene	Benzo(b)fluoranthene	7.15E-04	mg/kg				S	6/17/1999	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS295	OCTS13S01	extrapolated	Benzo(e)pyrene	Benzo(e)pyrene	3.41E-03	mg/kg				S	6/17/1999	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS295	OCTS13S01	extrapolated	Benzo(g,h,i)perylene	Benzo(g,h,i)perylene	3.65E-03	mg/kg				S	6/17/1999	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS295	OCTS13S01	extrapolated	Benzo(k)fluoranthene	Benzo(k)fluoranthene	3.38E-04	mg/kg				S	6/17/1999	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS295	OCTS13S01	extrapolated	Chrysene	Chrysene	9.68E-04	mg/kg				S	6/17/1999	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS295	OCTS13S01	extrapolated	Dibenz(a,h)anthracene	Dibenz(a,h)anthracene	1.83E-04	mg/kg				S	6/17/1999	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS295	OCTS13S01	extrapolated	Fluoranthene	Fluoranthene	1.23E-03	mg/kg				S	6/17/1999	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS295	OCTS13S01	extrapolated	Fluorene	Fluorene	9.37E-03	mg/kg				S	6/17/1999	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS295	OCTS13S01	extrapolated	Indeno(1,2,3-cd)pyrene	Indeno(1,2,3-cd)pyrene	3.97E-04	mg/kg				S	6/17/1999	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS295	OCTS13S01	extrapolated	Naphthalene	Naphthalene	3.82E-02	mg/kg				S	6/17/1999	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS295	OCTS13S01	extrapolated	Perylene	Perylene	1.95E-03	mg/kg				S	6/17/1999	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS295	OCTS13S01	extrapolated	Phenanthrene	Phenanthrene	2.53E-02	mg/kg				S	6/17/1999	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS295	OCTS13S01	extrapolated	Pyrene	Pyrene	2.25E-03	mg/kg				S	6/17/1999	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS296	OCTS14S01	extrapolated	Benzene	Benzene	6.60E-04	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS296	OCTS14S01	extrapolated	Ethylbenzene	Ethylbenzene	6.60E-04	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS296	OCTS14S01	extrapolated	Toluene	Toluene	6.60E-04	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS296	OCTS14S01	extrapolated	m,p-Xylene	m,p-Xylene	1.98E-03	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS296	OCTS14S01	extrapolated	o-Xylene	o-Xylene	4.40E-04	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS296	OCTS14S01	extrapolated	Xylene (total)	Xylenes (total)	2.42E-03	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS296	OCTS14S01	extrapolated	2-Methylnaphthalene	2-Methylnaphthalene	1.51E-01	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS296	OCTS14S01	extrapolated	Acenaphthene	Acenaphthene	9.45E-03	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS296	OCTS14S01	extrapolated	Acenaphthylene	Acenaphthylene	1.16E-03	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS296	OCTS14S01	extrapolated	Anthracene	Anthracene	6.16E-03	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS296	OCTS14S01	extrapolated	Benzo(a)anthracene	Benzo(a)anthracene	4.45E-04	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS296	OCTS14S01	extrapolated	Benzo(a)pyrene	Benzo(a)pyrene	4.49E-04	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS296	OCTS14S01	extrapolated	Benzo(b)fluoranthene	Benzo(b)fluoranthene	7.15E-04	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS296	OCTS14S01	extrapolated	Benzo(e)pyrene	Benzo(e)pyrene	3.41E-03	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS296	OCTS14S01	extrapolated	Benzo(g,h,i)perylene	Benzo(g,h,i)perylene	3.65E-03	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS296	OCTS14S01	extrapolated	Benzo(k)fluoranthene	Benzo(k)fluoranthene	3.38E-04	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS296	OCTS14S01	extrapolated	Chrysene	Chrysene	9.68E-04	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS296	OCTS14S01	extrapolated	Dibenz(a,h)anthracene	Dibenz(a,h)anthracene	1.83E-04	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS296	OCTS14S01	extrapolated	Fluoranthene	Fluoranthene	1.23E-03	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS296	OCTS14S01	extrapolated	Fluorene	Fluorene	9.37E-03	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS296	OCTS14S01	extrapolated	Indeno(1,2,3-cd)pyrene	Indeno(1,2,3-cd)pyrene	3.97E-04	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS296	OCTS14S01	extrapolated	Naphthalene	Naphthalene	3.82E-02	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation

Table C7-2
Extrapolated Data
Old Conservation Yard RFI Site

EPA_NO	SAMPLE_ID	LAB_METHOD	ANALYTE	STD_ANALYT	CONCENTRAT	UNITS	REV_QUAL	Q_CODE	D_LIMIT	MATRIX	DATE_SAMP	DEPTH	SAMPLE_TYP	UNIT
RS296	OCTS14S01	extrapolated	Perylene	Perylene	1.95E-03	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS296	OCTS14S01	extrapolated	Phenanthrene	Phenanthrene	2.53E-02	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS296	OCTS14S01	extrapolated	Pyrene	Pyrene	2.25E-03	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS297	OCTS15S01	extrapolated	Benzene	Benzene	7.20E-04	mg/kg				S	6/17/1999	4.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS297	OCTS15S01	extrapolated	Ethylbenzene	Ethylbenzene	7.20E-04	mg/kg				S	6/17/1999	4.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS297	OCTS15S01	extrapolated	Toluene	Toluene	7.20E-04	mg/kg				S	6/17/1999	4.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS297	OCTS15S01	extrapolated	m,p-Xylene	m,p-Xylene	2.16E-03	mg/kg				S	6/17/1999	4.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS297	OCTS15S01	extrapolated	o-Xylene	o-Xylene	4.80E-04	mg/kg				S	6/17/1999	4.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS297	OCTS15S01	extrapolated	Xylene (total)	Xylenes (total)	2.64E-03	mg/kg				S	6/17/1999	4.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS297	OCTS15S01	extrapolated	2-Methylnaphthalene	2-Methylnaphthalene	1.65E-01	mg/kg				S	6/17/1999	4.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS297	OCTS15S01	extrapolated	Acenaphthene	Acenaphthene	1.03E-02	mg/kg				S	6/17/1999	4.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS297	OCTS15S01	extrapolated	Acenaphthylene	Acenaphthylene	1.26E-03	mg/kg				S	6/17/1999	4.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS297	OCTS15S01	extrapolated	Anthracene	Anthracene	6.72E-03	mg/kg				S	6/17/1999	4.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS297	OCTS15S01	extrapolated	Benzo(a)anthracene	Benzo(a)anthracene	4.85E-04	mg/kg				S	6/17/1999	4.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS297	OCTS15S01	extrapolated	Benzo(a)pyrene	Benzo(a)pyrene	4.90E-04	mg/kg				S	6/17/1999	4.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS297	OCTS15S01	extrapolated	Benzo(b)fluoranthene	Benzo(b)fluoranthene	7.80E-04	mg/kg				S	6/17/1999	4.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS297	OCTS15S01	extrapolated	Benzo(e)pyrene	Benzo(e)pyrene	3.72E-03	mg/kg				S	6/17/1999	4.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS297	OCTS15S01	extrapolated	Benzo(g,h,i)perylene	Benzo(g,h,i)perylene	3.98E-03	mg/kg				S	6/17/1999	4.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS297	OCTS15S01	extrapolated	Benzo(k)fluoranthene	Benzo(k)fluoranthene	3.69E-04	mg/kg				S	6/17/1999	4.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS297	OCTS15S01	extrapolated	Chrysene	Chrysene	1.06E-03	mg/kg				S	6/17/1999	4.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS297	OCTS15S01	extrapolated	Dibenz(a,h)anthracene	Dibenz(a,h)anthracene	1.99E-04	mg/kg				S	6/17/1999	4.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS297	OCTS15S01	extrapolated	Fluoranthene	Fluoranthene	1.35E-03	mg/kg				S	6/17/1999	4.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS297	OCTS15S01	extrapolated	Fluorene	Fluorene	1.02E-02	mg/kg				S	6/17/1999	4.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS297	OCTS15S01	extrapolated	Indeno(1,2,3-cd)pyrene	Indeno(1,2,3-cd)pyrene	4.33E-04	mg/kg				S	6/17/1999	4.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS297	OCTS15S01	extrapolated	Naphthalene	Naphthalene	4.17E-02	mg/kg				S	6/17/1999	4.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS297	OCTS15S01	extrapolated	Perylene	Perylene	2.12E-03	mg/kg				S	6/17/1999	4.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS297	OCTS15S01	extrapolated	Phenanthrene	Phenanthrene	2.76E-02	mg/kg				S	6/17/1999	4.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS297	OCTS15S01	extrapolated	Pyrene	Pyrene	2.45E-03	mg/kg				S	6/17/1999	4.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS298	OCTS15S02	extrapolated	Benzene	Benzene	7.20E-04	mg/kg				S	6/17/1999	4.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS298	OCTS15S02	extrapolated	Ethylbenzene	Ethylbenzene	7.20E-04	mg/kg				S	6/17/1999	4.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS298	OCTS15S02	extrapolated	Toluene	Toluene	7.20E-04	mg/kg				S	6/17/1999	4.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS298	OCTS15S02	extrapolated	m,p-Xylene	m,p-Xylene	2.16E-03	mg/kg				S	6/17/1999	4.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS298	OCTS15S02	extrapolated	o-Xylene	o-Xylene	4.80E-04	mg/kg				S	6/17/1999	4.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS298	OCTS15S02	extrapolated	Xylene (total)	Xylenes (total)	2.64E-03	mg/kg				S	6/17/1999	4.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS298	OCTS15S02	extrapolated	2-Methylnaphthalene	2-Methylnaphthalene	1.65E-01	mg/kg				S	6/17/1999	4.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS298	OCTS15S02	extrapolated	Acenaphthene	Acenaphthene	1.03E-02	mg/kg				S	6/17/1999	4.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS298	OCTS15S02	extrapolated	Acenaphthylene	Acenaphthylene	1.26E-03	mg/kg				S	6/17/1999	4.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS298	OCTS15S02	extrapolated	Anthracene	Anthracene	6.72E-03	mg/kg				S	6/17/1999	4.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS298	OCTS15S02	extrapolated	Benzo(a)anthracene	Benzo(a)anthracene	4.85E-04	mg/kg				S	6/17/1999	4.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS298	OCTS15S02	extrapolated	Benzo(a)pyrene	Benzo(a)pyrene	4.90E-04	mg/kg				S	6/17/1999	4.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS298	OCTS15S02	extrapolated	Benzo(b)fluoranthene	Benzo(b)fluoranthene	7.80E-04	mg/kg				S	6/17/1999	4.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS298	OCTS15S02	extrapolated	Benzo(e)pyrene	Benzo(e)pyrene	3.72E-03	mg/kg				S	6/17/1999	4.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS298	OCTS15S02	extrapolated	Benzo(g,h,i)perylene	Benzo(g,h,i)perylene	3.98E-03	mg/kg				S	6/17/1999	4.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS298	OCTS15S02	extrapolated	Benzo(k)fluoranthene	Benzo(k)fluoranthene	3.69E-04	mg/kg				S	6/17/1999	4.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS298	OCTS15S02	extrapolated	Chrysene	Chrysene	1.06E-03	mg/kg				S	6/17/1999	4.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS298	OCTS15S02	extrapolated	Dibenz(a,h)anthracene	Dibenz(a,h)anthracene	1.99E-04	mg/kg				S	6/17/1999	4.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS298	OCTS15S02	extrapolated	Fluoranthene	Fluoranthene	1.35E-03	mg/kg				S	6/17/1999	4.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS298	OCTS15S02	extrapolated	Fluorene	Fluorene	1.02E-02	mg/kg				S	6/17/1999	4.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS298	OCTS15S02	extrapolated	Indeno(1,2,3-cd)pyrene	Indeno(1,2,3-cd)pyrene	4.33E-04	mg/kg				S	6/17/1999	4.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS298	OCTS15S02	extrapolated	Naphthalene	Naphthalene	4.17E-02	mg/kg				S	6/17/1999	4.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS298	OCTS15S02	extrapolated	Perylene	Perylene	2.12E-03	mg/kg				S	6/17/1999	4.00000	Primary Sample	SWMU 7.4 - Old Conservation

Table C7-2
Extrapolated Data
Old Conservation Yard RFI Site

EPA_NO	SAMPLE_ID	LAB_METHOD	ANALYTE	STD_ANALYT	CONCENTRAT	UNITS	REV_QUAL	Q_CODE	D_LIMIT	MATRIX	DATE_SAMP	DEPTH	SAMPLE_TYP	UNIT
RS298	OCTS15S02	extrapolated	Phenanthrene	Phenanthrene	2.76E-02	mg/kg				S	6/17/1999	4.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS298	OCTS15S02	extrapolated	Pyrene	Pyrene	2.45E-03	mg/kg				S	6/17/1999	4.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS302	OCTS18S01	extrapolated	Benzene	Benzene	7.20E-04	mg/kg				S	6/18/1999	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS302	OCTS18S01	extrapolated	Ethylbenzene	Ethylbenzene	7.20E-04	mg/kg				S	6/18/1999	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS302	OCTS18S01	extrapolated	m,p-Xylene	m,p-Xylene	2.16E-03	mg/kg				S	6/18/1999	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS302	OCTS18S01	extrapolated	o-Xylene	o-Xylene	4.80E-04	mg/kg				S	6/18/1999	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS302	OCTS18S01	extrapolated	Xylene (total)	Xylenes (total)	2.64E-03	mg/kg				S	6/18/1999	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS302	OCTS18S01	extrapolated	Toluene	Toluene	7.20E-04	mg/kg				S	6/18/1999	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS302	OCTS18S01	extrapolated	2-Methylnaphthalene	2-Methylnaphthalene	1.65E-01	mg/kg				S	6/18/1999	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS302	OCTS18S01	extrapolated	Acenaphthene	Acenaphthene	1.03E-02	mg/kg				S	6/18/1999	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS302	OCTS18S01	extrapolated	Acenaphthylene	Acenaphthylene	1.26E-03	mg/kg				S	6/18/1999	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS302	OCTS18S01	extrapolated	Anthracene	Anthracene	6.72E-03	mg/kg				S	6/18/1999	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS302	OCTS18S01	extrapolated	Benzo(a)anthracene	Benzo(a)anthracene	4.85E-04	mg/kg				S	6/18/1999	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS302	OCTS18S01	extrapolated	Benzo(a)pyrene	Benzo(a)pyrene	4.90E-04	mg/kg				S	6/18/1999	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS302	OCTS18S01	extrapolated	Benzo(b)fluoranthene	Benzo(b)fluoranthene	7.80E-04	mg/kg				S	6/18/1999	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS302	OCTS18S01	extrapolated	Benzo(e)pyrene	Benzo(e)pyrene	3.72E-03	mg/kg				S	6/18/1999	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS302	OCTS18S01	extrapolated	Benzo(g,h,i)perylene	Benzo(g,h,i)perylene	3.98E-03	mg/kg				S	6/18/1999	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS302	OCTS18S01	extrapolated	Benzo(k)fluoranthene	Benzo(k)fluoranthene	3.69E-04	mg/kg				S	6/18/1999	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS302	OCTS18S01	extrapolated	Chrysene	Chrysene	1.06E-03	mg/kg				S	6/18/1999	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS302	OCTS18S01	extrapolated	Dibenzo(a,h)anthracene	Dibenz(a,h)anthracene	1.99E-04	mg/kg				S	6/18/1999	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS302	OCTS18S01	extrapolated	Fluoranthene	Fluoranthene	1.35E-03	mg/kg				S	6/18/1999	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS302	OCTS18S01	extrapolated	Fluorene	Fluorene	1.02E-02	mg/kg				S	6/18/1999	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS302	OCTS18S01	extrapolated	Indeno(1,2,3-cd)pyrene	Indeno(1,2,3-cd)pyrene	4.33E-04	mg/kg				S	6/18/1999	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS302	OCTS18S01	extrapolated	Perylene	Perylene	2.12E-03	mg/kg				S	6/18/1999	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS302	OCTS18S01	extrapolated	Pyrene	Pyrene	2.45E-03	mg/kg				S	6/18/1999	2.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS303	OCTS04S01	extrapolated	Benzene	Benzene	6.60E-04	mg/kg				S	6/18/1999	5.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS303	OCTS04S01	extrapolated	Ethylbenzene	Ethylbenzene	6.60E-04	mg/kg				S	6/18/1999	5.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS303	OCTS04S01	extrapolated	Toluene	Toluene	6.60E-04	mg/kg				S	6/18/1999	5.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS303	OCTS04S01	extrapolated	m,p-Xylene	m,p-Xylene	1.98E-03	mg/kg				S	6/18/1999	5.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS303	OCTS04S01	extrapolated	o-Xylene	o-Xylene	4.40E-04	mg/kg				S	6/18/1999	5.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS303	OCTS04S01	extrapolated	Xylene (total)	Xylenes (total)	2.42E-03	mg/kg				S	6/18/1999	5.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS303	OCTS04S01	extrapolated	2-Methylnaphthalene	2-Methylnaphthalene	1.51E-01	mg/kg				S	6/18/1999	5.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS303	OCTS04S01	extrapolated	Acenaphthene	Acenaphthene	9.45E-03	mg/kg				S	6/18/1999	5.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS303	OCTS04S01	extrapolated	Acenaphthylene	Acenaphthylene	1.16E-03	mg/kg				S	6/18/1999	5.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS303	OCTS04S01	extrapolated	Anthracene	Anthracene	6.16E-03	mg/kg				S	6/18/1999	5.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS303	OCTS04S01	extrapolated	Benzo(a)anthracene	Benzo(a)anthracene	4.45E-04	mg/kg				S	6/18/1999	5.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS303	OCTS04S01	extrapolated	Benzo(a)pyrene	Benzo(a)pyrene	4.49E-04	mg/kg				S	6/18/1999	5.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS303	OCTS04S01	extrapolated	Benzo(b)fluoranthene	Benzo(b)fluoranthene	7.15E-04	mg/kg				S	6/18/1999	5.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS303	OCTS04S01	extrapolated	Benzo(e)pyrene	Benzo(e)pyrene	3.41E-03	mg/kg				S	6/18/1999	5.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS303	OCTS04S01	extrapolated	Benzo(g,h,i)perylene	Benzo(g,h,i)perylene	3.65E-03	mg/kg				S	6/18/1999	5.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS303	OCTS04S01	extrapolated	Benzo(k)fluoranthene	Benzo(k)fluoranthene	3.38E-04	mg/kg				S	6/18/1999	5.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS303	OCTS04S01	extrapolated	Chrysene	Chrysene	9.68E-04	mg/kg				S	6/18/1999	5.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS303	OCTS04S01	extrapolated	Dibenz(a,h)anthracene	Dibenz(a,h)anthracene	1.83E-04	mg/kg				S	6/18/1999	5.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS303	OCTS04S01	extrapolated	Fluoranthene	Fluoranthene	1.23E-03	mg/kg				S	6/18/1999	5.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS303	OCTS04S01	extrapolated	Fluorene	Fluorene	9.37E-03	mg/kg				S	6/18/1999	5.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS303	OCTS04S01	extrapolated	Indeno(1,2,3-cd)pyrene	Indeno(1,2,3-cd)pyrene	3.97E-04	mg/kg				S	6/18/1999	5.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS303	OCTS04S01	extrapolated	Naphthalene	Naphthalene	3.82E-02	mg/kg				S	6/18/1999	5.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS303	OCTS04S01	extrapolated	Perylene	Perylene	1.95E-03	mg/kg				S	6/18/1999	5.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS303	OCTS04S01	extrapolated	Phenanthrene	Phenanthrene	2.53E-02	mg/kg				S	6/18/1999	5.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS303	OCTS04S01	extrapolated	Pyrene	Pyrene	2.25E-03	mg/kg				S	6/18/1999	5.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS320	OCTS21S01	extrapolated	PCB-105	PCB-105	6.80E-06	mg/kg				S	9/21/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation

Table C7-2
Extrapolated Data
Old Conservation Yard RFI Site

EPA_NO	SAMPLE_ID	LAB_METHOD	ANALYTE	STD_ANALYT	CONCENTRAT	UNITS	REV_QUAL	Q_CODE	D_LIMIT	MATRIX	DATE_SAMP	DEPTH	SAMPLE_TYP	UNIT
RS320	OCTS21S01	extrapolated	PCB-114	PCB-114	2.49E-07	mg/kg				S	9/21/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS320	OCTS21S01	extrapolated	PCB-118	PCB-118	1.47E-05	mg/kg				S	9/21/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS320	OCTS21S01	extrapolated	PCB-123	PCB-123	1.64E-07	mg/kg				S	9/21/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS320	OCTS21S01	extrapolated	PCB-126	PCB-126	4.14E-07	mg/kg				S	9/21/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS320	OCTS21S01	extrapolated	PCB-156	PCB-156	3.46E-06	mg/kg				S	9/21/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS320	OCTS21S01	extrapolated	PCB-157	PCB-157	1.35E-06	mg/kg				S	9/21/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS320	OCTS21S01	extrapolated	PCB-167	PCB-167	2.35E-06	mg/kg				S	9/21/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS320	OCTS21S01	extrapolated	PCB-169	PCB-169	3.50E-08	mg/kg				S	9/21/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS320	OCTS21S01	extrapolated	PCB-189	PCB-189	3.50E-07	mg/kg				S	9/21/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS320	OCTS21S01	extrapolated	PCB-77	PCB-77	8.51E-07	mg/kg				S	9/21/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS320	OCTS21S01	extrapolated	PCB-81	PCB-81	1.64E-07	mg/kg				S	9/21/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS321	OCTS21S02	extrapolated	Benzene	Benzene	6.60E-04	mg/kg				S	9/21/1999	2.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS321	OCTS21S02	extrapolated	Ethylbenzene	Ethylbenzene	6.60E-04	mg/kg				S	9/21/1999	2.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS321	OCTS21S02	extrapolated	Toluene	Toluene	6.60E-04	mg/kg				S	9/21/1999	2.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS321	OCTS21S02	extrapolated	m,p-Xylene	m,p-Xylene	1.98E-03	mg/kg				S	9/21/1999	2.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS321	OCTS21S02	extrapolated	o-Xylene	o-Xylene	4.40E-04	mg/kg				S	9/21/1999	2.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS321	OCTS21S02	extrapolated	Xylene (total)	Xylenes (total)	2.42E-03	mg/kg				S	9/21/1999	2.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS321	OCTS21S02	extrapolated	2-Methylnaphthalene	2-Methylnaphthalene	1.51E-01	mg/kg				S	9/21/1999	2.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS321	OCTS21S02	extrapolated	Acenaphthene	Acenaphthene	9.45E-03	mg/kg				S	9/21/1999	2.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS321	OCTS21S02	extrapolated	Acenaphthylene	Acenaphthylene	1.16E-03	mg/kg				S	9/21/1999	2.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS321	OCTS21S02	extrapolated	Anthracene	Anthracene	6.16E-03	mg/kg				S	9/21/1999	2.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS321	OCTS21S02	extrapolated	Benzo(a)anthracene	Benzo(a)anthracene	4.45E-04	mg/kg				S	9/21/1999	2.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS321	OCTS21S02	extrapolated	Benzo(a)pyrene	Benzo(a)pyrene	4.49E-04	mg/kg				S	9/21/1999	2.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS321	OCTS21S02	extrapolated	Benzo(b)fluoranthene	Benzo(b)fluoranthene	7.15E-04	mg/kg				S	9/21/1999	2.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS321	OCTS21S02	extrapolated	Benzo(e)pyrene	Benzo(e)pyrene	3.41E-03	mg/kg				S	9/21/1999	2.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS321	OCTS21S02	extrapolated	Benzo(g,h,i)perylene	Benzo(g,h,i)perylene	3.65E-03	mg/kg				S	9/21/1999	2.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS321	OCTS21S02	extrapolated	Benzo(k)fluoranthene	Benzo(k)fluoranthene	3.38E-04	mg/kg				S	9/21/1999	2.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS321	OCTS21S02	extrapolated	Chrysene	Chrysene	9.68E-04	mg/kg				S	9/21/1999	2.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS321	OCTS21S02	extrapolated	Dibenz(a,h)anthracene	Dibenz(a,h)anthracene	1.83E-04	mg/kg				S	9/21/1999	2.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS321	OCTS21S02	extrapolated	Fluoranthene	Fluoranthene	1.23E-03	mg/kg				S	9/21/1999	2.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS321	OCTS21S02	extrapolated	Fluorene	Fluorene	9.37E-03	mg/kg				S	9/21/1999	2.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS321	OCTS21S02	extrapolated	Indeno(1,2,3-cd)pyrene	Indeno(1,2,3-cd)pyrene	3.97E-04	mg/kg				S	9/21/1999	2.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS321	OCTS21S02	extrapolated	Naphthalene	Naphthalene	3.82E-02	mg/kg				S	9/21/1999	2.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS321	OCTS21S02	extrapolated	Perylene	Perylene	1.95E-03	mg/kg				S	9/21/1999	2.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS321	OCTS21S02	extrapolated	Phenanthrene	Phenanthrene	2.53E-02	mg/kg				S	9/21/1999	2.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS321	OCTS21S02	extrapolated	Pyrene	Pyrene	2.25E-03	mg/kg				S	9/21/1999	2.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS323	OCTS22S01	extrapolated	PCB-105	PCB-105	2.72E-04	mg/kg				S	9/21/1999	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS323	OCTS22S01	extrapolated	PCB-114	PCB-114	9.98E-06	mg/kg				S	9/21/1999	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS323	OCTS22S01	extrapolated	PCB-118	PCB-118	5.90E-04	mg/kg				S	9/21/1999	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS323	OCTS22S01	extrapolated	PCB-123	PCB-123	6.58E-06	mg/kg				S	9/21/1999	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS323	OCTS22S01	extrapolated	PCB-126	PCB-126	1.66E-05	mg/kg				S	9/21/1999	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS323	OCTS22S01	extrapolated	PCB-156	PCB-156	1.38E-04	mg/kg				S	9/21/1999	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS323	OCTS22S01	extrapolated	PCB-157	PCB-157	2.72E-05	mg/kg				S	9/21/1999	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS323	OCTS22S01	extrapolated	PCB-167	PCB-167	4.54E-05	mg/kg				S	9/21/1999	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS323	OCTS22S01	extrapolated	PCB-169	PCB-169	8.05E-07	mg/kg				S	9/21/1999	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS323	OCTS22S01	extrapolated	PCB-189	PCB-189	6.58E-06	mg/kg				S	9/21/1999	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS323	OCTS22S01	extrapolated	PCB-77	PCB-77	3.40E-05	mg/kg				S	9/21/1999	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS323	OCTS22S01	extrapolated	PCB-81	PCB-81	6.58E-06	mg/kg				S	9/21/1999	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS324	OCTS22S02	extrapolated	PCB-105	PCB-105	6.80E-06	mg/kg				S	9/21/1999	4.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS324	OCTS22S02	extrapolated	PCB-114	PCB-114	2.49E-07	mg/kg				S	9/21/1999	4.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS324	OCTS22S02	extrapolated	PCB-118	PCB-118	1.47E-05	mg/kg				S	9/21/1999	4.00000	Primary Sample	SWMU 7.4 - Old Conservation

Table C7-2
Extrapolated Data
Old Conservation Yard RFI Site

EPA_NO	SAMPLE_ID	LAB_METHOD	ANALYTE	STD_ANALYT	CONCENTRAT	UNITS	REV_QUAL	Q_CODE	D_LIMIT	MATRIX	DATE_SAMP	DEPTH	SAMPLE_TYP	UNIT
RS324	OCTS22S02	extrapolated	PCB-123	PCB-123	1.64E-07	mg/kg				S	9/21/1999	4.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS324	OCTS22S02	extrapolated	PCB-126	PCB-126	4.14E-07	mg/kg				S	9/21/1999	4.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS324	OCTS22S02	extrapolated	PCB-156	PCB-156	3.46E-06	mg/kg				S	9/21/1999	4.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS324	OCTS22S02	extrapolated	PCB-157	PCB-157	1.35E-06	mg/kg				S	9/21/1999	4.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS324	OCTS22S02	extrapolated	PCB-167	PCB-167	2.35E-06	mg/kg				S	9/21/1999	4.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS324	OCTS22S02	extrapolated	PCB-169	PCB-169	3.50E-08	mg/kg				S	9/21/1999	4.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS324	OCTS22S02	extrapolated	PCB-189	PCB-189	3.50E-07	mg/kg				S	9/21/1999	4.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS324	OCTS22S02	extrapolated	PCB-77	PCB-77	8.51E-07	mg/kg				S	9/21/1999	4.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS324	OCTS22S02	extrapolated	PCB-81	PCB-81	1.64E-07	mg/kg				S	9/21/1999	4.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS581	OCBS16S01	extrapolated	Benzene	Benzene	8.40E-04	mg/kg				S	12/16/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS581	OCBS16S01	extrapolated	Ethylbenzene	Ethylbenzene	8.40E-04	mg/kg				S	12/16/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS581	OCBS16S01	extrapolated	Toluene	Toluene	8.40E-04	mg/kg				S	12/16/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS581	OCBS16S01	extrapolated	m,p-Xylene	m,p-Xylene	2.52E-03	mg/kg				S	12/16/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS581	OCBS16S01	extrapolated	o-Xylene	o-Xylene	5.60E-04	mg/kg				S	12/16/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS581	OCBS16S01	extrapolated	Xylene (total)	Xylenes (total)	3.08E-03	mg/kg				S	12/16/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS581	OCBS16S01	extrapolated	2-Methylnaphthalene	2-Methylnaphthalene	1.93E-01	mg/kg				S	12/16/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS581	OCBS16S01	extrapolated	Acenaphthene	Acenaphthene	1.20E-02	mg/kg				S	12/16/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS581	OCBS16S01	extrapolated	Acenaphthylene	Acenaphthylene	1.47E-03	mg/kg				S	12/16/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS581	OCBS16S01	extrapolated	Anthracene	Anthracene	7.84E-03	mg/kg				S	12/16/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS581	OCBS16S01	extrapolated	Benzo(a)anthracene	Benzo(a)anthracene	5.66E-04	mg/kg				S	12/16/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS581	OCBS16S01	extrapolated	Benzo(a)pyrene	Benzo(a)pyrene	5.71E-04	mg/kg				S	12/16/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS581	OCBS16S01	extrapolated	Benzo(b)fluoranthene	Benzo(b)fluoranthene	9.09E-04	mg/kg				S	12/16/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS581	OCBS16S01	extrapolated	Benzo(e)pyrene	Benzo(e)pyrene	4.34E-03	mg/kg				S	12/16/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS581	OCBS16S01	extrapolated	Benzo(g,h,i)perylene	Benzo(g,h,i)perylene	4.64E-03	mg/kg				S	12/16/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS581	OCBS16S01	extrapolated	Benzo(k)fluoranthene	Benzo(k)fluoranthene	4.31E-04	mg/kg				S	12/16/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS581	OCBS16S01	extrapolated	Chrysene	Chrysene	1.23E-03	mg/kg				S	12/16/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS581	OCBS16S01	extrapolated	Dibenz(a,h)anthracene	Dibenz(a,h)anthracene	2.32E-04	mg/kg				S	12/16/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS581	OCBS16S01	extrapolated	Fluoranthene	Fluoranthene	1.57E-03	mg/kg				S	12/16/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS581	OCBS16S01	extrapolated	Fluorene	Fluorene	1.19E-02	mg/kg				S	12/16/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS581	OCBS16S01	extrapolated	Indeno(1,2,3-cd)pyrene	Indeno(1,2,3-cd)pyrene	5.05E-04	mg/kg				S	12/16/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS581	OCBS16S01	extrapolated	Naphthalene	Naphthalene	4.86E-02	mg/kg				S	12/16/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS581	OCBS16S01	extrapolated	Perylene	Perylene	2.48E-03	mg/kg				S	12/16/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS581	OCBS16S01	extrapolated	Phenanthrene	Phenanthrene	3.22E-02	mg/kg				S	12/16/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS581	OCBS16S01	extrapolated	Pyrene	Pyrene	2.86E-03	mg/kg				S	12/16/1997	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS668	OCBS07S03	extrapolated	Benzene	Benzene	7.80E-04	mg/kg				S	1/27/1998	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS668	OCBS07S03	extrapolated	Ethylbenzene	Ethylbenzene	7.80E-04	mg/kg				S	1/27/1998	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS668	OCBS07S03	extrapolated	Toluene	Toluene	7.80E-04	mg/kg				S	1/27/1998	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS668	OCBS07S03	extrapolated	m,p-Xylene	m,p-Xylene	2.34E-03	mg/kg				S	1/27/1998	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS668	OCBS07S03	extrapolated	o-Xylene	o-Xylene	5.20E-04	mg/kg				S	1/27/1998	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS668	OCBS07S03	extrapolated	Xylene (total)	Xylenes (total)	2.86E-03	mg/kg				S	1/27/1998	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS668	OCBS07S03	extrapolated	2-Methylnaphthalene	2-Methylnaphthalene	1.79E-01	mg/kg				S	1/27/1998	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS668	OCBS07S03	extrapolated	Acenaphthene	Acenaphthene	1.12E-02	mg/kg				S	1/27/1998	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS668	OCBS07S03	extrapolated	Acenaphthylene	Acenaphthylene	1.37E-03	mg/kg				S	1/27/1998	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS668	OCBS07S03	extrapolated	Anthracene	Anthracene	7.28E-03	mg/kg				S	1/27/1998	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS668	OCBS07S03	extrapolated	Benzo(a)anthracene	Benzo(a)anthracene	5.26E-04	mg/kg				S	1/27/1998	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS668	OCBS07S03	extrapolated	Benzo(a)pyrene	Benzo(a)pyrene	5.30E-04	mg/kg				S	1/27/1998	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS668	OCBS07S03	extrapolated	Benzo(b)fluoranthene	Benzo(b)fluoranthene	8.44E-04	mg/kg				S	1/27/1998	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS668	OCBS07S03	extrapolated	Benzo(e)pyrene	Benzo(e)pyrene	4.03E-03	mg/kg				S	1/27/1998	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS668	OCBS07S03	extrapolated	Benzo(g,h,i)perylene	Benzo(g,h,i)perylene	4.31E-03	mg/kg				S	1/27/1998	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS668	OCBS07S03	extrapolated	Benzo(k)fluoranthene	Benzo(k)fluoranthene	4.00E-04	mg/kg				S	1/27/1998	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS668	OCBS07S03	extrapolated	Chrysene	Chrysene	1.14E-03	mg/kg				S	1/27/1998	0.50000	Primary Sample	SWMU 7.4 - Old Conservation

Table C7-2
Extrapolated Data
Old Conservation Yard RFI Site

EPA_NO	SAMPLE_ID	LAB_METHOD	ANALYTE	STD_ANALYT	CONCENTRAT	UNITS	REV_QUAL	Q_CODE	D_LIMIT	MATRIX	DATE_SAMP	DEPTH	SAMPLE_TYP	UNIT
RS668	OCBS07S03	extrapolated	Dibenz(a,h)anthracene	Dibenz(a,h)anthracene	2.16E-04	mg/kg				S	1/27/1998	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS668	OCBS07S03	extrapolated	Fluoranthene	Fluoranthene	1.46E-03	mg/kg				S	1/27/1998	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS668	OCBS07S03	extrapolated	Fluorene	Fluorene	1.11E-02	mg/kg				S	1/27/1998	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS668	OCBS07S03	extrapolated	Indeno(1,2,3-cd)pyrene	Indeno(1,2,3-cd)pyrene	4.69E-04	mg/kg				S	1/27/1998	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS668	OCBS07S03	extrapolated	Naphthalene	Naphthalene	4.52E-02	mg/kg				S	1/27/1998	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS668	OCBS07S03	extrapolated	Perylene	Perylene	2.30E-03	mg/kg				S	1/27/1998	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS668	OCBS07S03	extrapolated	Phenanthrene	Phenanthrene	2.99E-02	mg/kg				S	1/27/1998	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS668	OCBS07S03	extrapolated	Pyrene	Pyrene	2.66E-03	mg/kg				S	1/27/1998	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS669	OCBS10S02	extrapolated	Benzene	Benzene	7.20E-04	mg/kg				S	1/27/1998	4.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS669	OCBS10S02	extrapolated	Ethylbenzene	Ethylbenzene	7.20E-04	mg/kg				S	1/27/1998	4.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS669	OCBS10S02	extrapolated	Toluene	Toluene	7.20E-04	mg/kg				S	1/27/1998	4.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS669	OCBS10S02	extrapolated	m,p-Xylene	m,p-Xylene	2.16E-03	mg/kg				S	1/27/1998	4.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS669	OCBS10S02	extrapolated	o-Xylene	o-Xylene	4.80E-04	mg/kg				S	1/27/1998	4.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS669	OCBS10S02	extrapolated	Xylene (total)	Xylenes (total)	2.64E-03	mg/kg				S	1/27/1998	4.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS669	OCBS10S02	extrapolated	2-Methylnaphthalene	2-Methylnaphthalene	1.65E-01	mg/kg				S	1/27/1998	4.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS669	OCBS10S02	extrapolated	Acenaphthene	Acenaphthene	1.03E-02	mg/kg				S	1/27/1998	4.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS669	OCBS10S02	extrapolated	Acenaphthylene	Acenaphthylene	1.26E-03	mg/kg				S	1/27/1998	4.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS669	OCBS10S02	extrapolated	Anthracene	Anthracene	6.72E-03	mg/kg				S	1/27/1998	4.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS669	OCBS10S02	extrapolated	Benzo(a)anthracene	Benzo(a)anthracene	4.85E-04	mg/kg				S	1/27/1998	4.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS669	OCBS10S02	extrapolated	Benzo(a)pyrene	Benzo(a)pyrene	4.90E-04	mg/kg				S	1/27/1998	4.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS669	OCBS10S02	extrapolated	Benzo(b)fluoranthene	Benzo(b)fluoranthene	7.80E-04	mg/kg				S	1/27/1998	4.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS669	OCBS10S02	extrapolated	Benzo(e)pyrene	Benzo(e)pyrene	3.72E-03	mg/kg				S	1/27/1998	4.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS669	OCBS10S02	extrapolated	Benzo(g,h,i)perylene	Benzo(g,h,i)perylene	3.98E-03	mg/kg				S	1/27/1998	4.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS669	OCBS10S02	extrapolated	Benzo(k)fluoranthene	Benzo(k)fluoranthene	3.69E-04	mg/kg				S	1/27/1998	4.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS669	OCBS10S02	extrapolated	Chrysene	Chrysene	1.06E-03	mg/kg				S	1/27/1998	4.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS669	OCBS10S02	extrapolated	Dibenz(a,h)anthracene	Dibenz(a,h)anthracene	1.99E-04	mg/kg				S	1/27/1998	4.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS669	OCBS10S02	extrapolated	Fluoranthene	Fluoranthene	1.35E-03	mg/kg				S	1/27/1998	4.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS669	OCBS10S02	extrapolated	Fluorene	Fluorene	1.02E-02	mg/kg				S	1/27/1998	4.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS669	OCBS10S02	extrapolated	Indeno(1,2,3-cd)pyrene	Indeno(1,2,3-cd)pyrene	4.33E-04	mg/kg				S	1/27/1998	4.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS669	OCBS10S02	extrapolated	Naphthalene	Naphthalene	4.17E-02	mg/kg				S	1/27/1998	4.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS669	OCBS10S02	extrapolated	Perylene	Perylene	2.12E-03	mg/kg				S	1/27/1998	4.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS669	OCBS10S02	extrapolated	Phenanthrene	Phenanthrene	2.76E-02	mg/kg				S	1/27/1998	4.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS669	OCBS10S02	extrapolated	Pyrene	Pyrene	2.45E-03	mg/kg				S	1/27/1998	4.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS670	OCBS18S01	extrapolated	Benzene	Benzene	6.60E-04	mg/kg				S	1/27/1998	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS670	OCBS18S01	extrapolated	Ethylbenzene	Ethylbenzene	6.60E-04	mg/kg				S	1/27/1998	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS670	OCBS18S01	extrapolated	Toluene	Toluene	6.60E-04	mg/kg				S	1/27/1998	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS670	OCBS18S01	extrapolated	m,p-Xylene	m,p-Xylene	1.98E-03	mg/kg				S	1/27/1998	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS670	OCBS18S01	extrapolated	o-Xylene	o-Xylene	4.40E-04	mg/kg				S	1/27/1998	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS670	OCBS18S01	extrapolated	Xylene (total)	Xylenes (total)	2.42E-03	mg/kg				S	1/27/1998	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS670	OCBS18S01	extrapolated	2-Methylnaphthalene	2-Methylnaphthalene	1.51E-01	mg/kg				S	1/27/1998	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS670	OCBS18S01	extrapolated	Acenaphthene	Acenaphthene	9.45E-03	mg/kg				S	1/27/1998	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS670	OCBS18S01	extrapolated	Acenaphthylene	Acenaphthylene	1.16E-03	mg/kg				S	1/27/1998	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS670	OCBS18S01	extrapolated	Anthracene	Anthracene	6.16E-03	mg/kg				S	1/27/1998	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS670	OCBS18S01	extrapolated	Benzo(a)anthracene	Benzo(a)anthracene	4.45E-04	mg/kg				S	1/27/1998	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS670	OCBS18S01	extrapolated	Benzo(a)pyrene	Benzo(a)pyrene	4.49E-04	mg/kg				S	1/27/1998	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS670	OCBS18S01	extrapolated	Benzo(b)fluoranthene	Benzo(b)fluoranthene	7.15E-04	mg/kg				S	1/27/1998	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS670	OCBS18S01	extrapolated	Benzo(e)pyrene	Benzo(e)pyrene	3.41E-03	mg/kg				S	1/27/1998	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS670	OCBS18S01	extrapolated	Benzo(g,h,i)perylene	Benzo(g,h,i)perylene	3.65E-03	mg/kg				S	1/27/1998	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS670	OCBS18S01	extrapolated	Benzo(k)fluoranthene	Benzo(k)fluoranthene	3.38E-04	mg/kg				S	1/27/1998	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS670	OCBS18S01	extrapolated	Chrysene	Chrysene	9.68E-04	mg/kg				S	1/27/1998	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS670	OCBS18S01	extrapolated	Dibenz(a,h)anthracene	Dibenz(a,h)anthracene	1.83E-04	mg/kg				S	1/27/1998	0.50000	Primary Sample	SWMU 7.4 - Old Conservation

Table C7-2
Extrapolated Data
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EPA_NO	SAMPLE_ID	LAB_METHOD	ANALYTE	STD_ANALYT	CONCENTRAT	UNITS	REV_QUAL	Q_CODE	D_LIMIT	MATRIX	DATE_SAMP	DEPTH	SAMPLE_TYP	UNIT
RS670	OCBS18S01	extrapolated	Fluoranthene	Fluoranthene	1.23E-03	mg/kg				S	1/27/1998	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS670	OCBS18S01	extrapolated	Fluorene	Fluorene	9.37E-03	mg/kg				S	1/27/1998	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS670	OCBS18S01	extrapolated	Indeno(1,2,3-cd)pyrene	Indeno(1,2,3-cd)pyrene	3.97E-04	mg/kg				S	1/27/1998	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS670	OCBS18S01	extrapolated	Naphthalene	Naphthalene	3.82E-02	mg/kg				S	1/27/1998	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS670	OCBS18S01	extrapolated	Perylene	Perylene	1.95E-03	mg/kg				S	1/27/1998	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS670	OCBS18S01	extrapolated	Phenanthrene	Phenanthrene	2.53E-02	mg/kg				S	1/27/1998	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS670	OCBS18S01	extrapolated	Pyrene	Pyrene	2.25E-03	mg/kg				S	1/27/1998	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS671DL	OCSS01S01	extrapolated	Benzene	Benzene	6.54E-03	mg/kg				S	1/27/1998	0.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS671DL	OCSS01S01	extrapolated	Ethylbenzene	Ethylbenzene	6.54E-03	mg/kg				S	1/27/1998	0.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS671DL	OCSS01S01	extrapolated	Toluene	Toluene	6.54E-03	mg/kg				S	1/27/1998	0.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS671DL	OCSS01S01	extrapolated	m,p-Xylene	m,p-Xylene	1.96E-02	mg/kg				S	1/27/1998	0.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS671DL	OCSS01S01	extrapolated	o-Xylene	o-Xylene	4.36E-03	mg/kg				S	1/27/1998	0.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS671DL	OCSS01S01	extrapolated	Xylene (total)	Xylenes (total)	2.40E-02	mg/kg				S	1/27/1998	0.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS671DL	OCSS01S01	extrapolated	2-Methylnaphthalene	2-Methylnaphthalene	1.50E+00	mg/kg				S	1/27/1998	0.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS671DL	OCSS01S01	extrapolated	Acenaphthene	Acenaphthene	5.42E+00	mg/kg				S	1/27/1998	0.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS671DL	OCSS01S01	extrapolated	Acenaphthylene	Acenaphthylene	6.63E-01	mg/kg				S	1/27/1998	0.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS671DL	OCSS01S01	extrapolated	Anthracene	Anthracene	3.53E+00	mg/kg				S	1/27/1998	0.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS671DL	OCSS01S01	extrapolated	Benzo(a)anthracene	Benzo(a)anthracene	2.55E-01	mg/kg				S	1/27/1998	0.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS671DL	OCSS01S01	extrapolated	Benzo(a)pyrene	Benzo(a)pyrene	2.57E-01	mg/kg				S	1/27/1998	0.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS671DL	OCSS01S01	extrapolated	Benzo(b)fluoranthene	Benzo(b)fluoranthene	4.09E-01	mg/kg				S	1/27/1998	0.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS671DL	OCSS01S01	extrapolated	Benzo(e)pyrene	Benzo(e)pyrene	1.95E+00	mg/kg				S	1/27/1998	0.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS671DL	OCSS01S01	extrapolated	Benzo(g,h,i)perylene	Benzo(g,h,i)perylene	2.09E+00	mg/kg				S	1/27/1998	0.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS671DL	OCSS01S01	extrapolated	Benzo(k)fluoranthene	Benzo(k)fluoranthene	1.94E-01	mg/kg				S	1/27/1998	0.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS671DL	OCSS01S01	extrapolated	Chrysene	Chrysene	5.55E-01	mg/kg				S	1/27/1998	0.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS671DL	OCSS01S01	extrapolated	Dibenz(a,h)anthracene	Dibenz(a,h)anthracene	1.05E-01	mg/kg				S	1/27/1998	0.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS671DL	OCSS01S01	extrapolated	Fluoranthene	Fluoranthene	7.07E-01	mg/kg				S	1/27/1998	0.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS671DL	OCSS01S01	extrapolated	Fluorene	Fluorene	5.37E+00	mg/kg				S	1/27/1998	0.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS671DL	OCSS01S01	extrapolated	Indeno(1,2,3-cd)pyrene	Indeno(1,2,3-cd)pyrene	2.27E-01	mg/kg				S	1/27/1998	0.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS671DL	OCSS01S01	extrapolated	Naphthalene	Naphthalene	3.79E-01	mg/kg				S	1/27/1998	0.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS671DL	OCSS01S01	extrapolated	Perylene	Perylene	1.11E+00	mg/kg				S	1/27/1998	0.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS671DL	OCSS01S01	extrapolated	Phenanthrene	Phenanthrene	1.45E+01	mg/kg				S	1/27/1998	0.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS671DL	OCSS01S01	extrapolated	Pyrene	Pyrene	1.29E+00	mg/kg				S	1/27/1998	0.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS806	OCBS17S01	extrapolated	Benzene	Benzene	6.60E-04	mg/kg				S	10/8/1998	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS806	OCBS17S01	extrapolated	Ethylbenzene	Ethylbenzene	6.60E-04	mg/kg				S	10/8/1998	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS806	OCBS17S01	extrapolated	Toluene	Toluene	6.60E-04	mg/kg				S	10/8/1998	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS806	OCBS17S01	extrapolated	m,p-Xylene	m,p-Xylene	1.98E-03	mg/kg				S	10/8/1998	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS806	OCBS17S01	extrapolated	o-Xylene	o-Xylene	4.40E-04	mg/kg				S	10/8/1998	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS806	OCBS17S01	extrapolated	Xylene (total)	Xylenes (total)	2.42E-03	mg/kg				S	10/8/1998	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS806	OCBS17S01	extrapolated	2-Methylnaphthalene	2-Methylnaphthalene	1.51E-01	mg/kg				S	10/8/1998	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS806	OCBS17S01	extrapolated	Acenaphthene	Acenaphthene	9.45E-03	mg/kg				S	10/8/1998	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS806	OCBS17S01	extrapolated	Acenaphthylene	Acenaphthylene	1.16E-03	mg/kg				S	10/8/1998	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS806	OCBS17S01	extrapolated	Anthracene	Anthracene	6.16E-03	mg/kg				S	10/8/1998	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS806	OCBS17S01	extrapolated	Benzo(a)anthracene	Benzo(a)anthracene	4.45E-04	mg/kg				S	10/8/1998	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS806	OCBS17S01	extrapolated	Benzo(a)pyrene	Benzo(a)pyrene	4.49E-04	mg/kg				S	10/8/1998	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS806	OCBS17S01	extrapolated	Benzo(b)fluoranthene	Benzo(b)fluoranthene	7.15E-04	mg/kg				S	10/8/1998	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS806	OCBS17S01	extrapolated	Benzo(e)pyrene	Benzo(e)pyrene	3.41E-03	mg/kg				S	10/8/1998	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS806	OCBS17S01	extrapolated	Benzo(g,h,i)perylene	Benzo(g,h,i)perylene	3.65E-03	mg/kg				S	10/8/1998	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS806	OCBS17S01	extrapolated	Benzo(k)fluoranthene	Benzo(k)fluoranthene	3.38E-04	mg/kg				S	10/8/1998	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS806	OCBS17S01	extrapolated	Chrysene	Chrysene	9.68E-04	mg/kg				S	10/8/1998	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS806	OCBS17S01	extrapolated	Dibenz(a,h)anthracene	Dibenz(a,h)anthracene	1.83E-04	mg/kg				S	10/8/1998	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS806	OCBS17S01	extrapolated	Fluoranthene	Fluoranthene	1.23E-03	mg/kg				S	10/8/1998	7.00000	Primary Sample	SWMU 7.4 - Old Conservation

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Extrapolated Data
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EPA_NO	SAMPLE_ID	LAB_METHOD	ANALYTE	STD_ANALYT	CONCENTRAT	UNITS	REV_QUAL	Q_CODE	D_LIMIT	MATRIX	DATE_SAMP	DEPTH	SAMPLE_TYP	UNIT
RS806	OCBS17S01	extrapolated	Fluorene	Fluorene	9.37E-03	mg/kg				S	10/8/1998	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS806	OCBS17S01	extrapolated	Indeno(1,2,3-cd)pyrene	Indeno(1,2,3-cd)pyrene	3.97E-04	mg/kg				S	10/8/1998	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS806	OCBS17S01	extrapolated	Naphthalene	Naphthalene	3.82E-02	mg/kg				S	10/8/1998	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS806	OCBS17S01	extrapolated	Perylene	Perylene	1.95E-03	mg/kg				S	10/8/1998	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS806	OCBS17S01	extrapolated	Phenanthrene	Phenanthrene	2.53E-02	mg/kg				S	10/8/1998	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS806	OCBS17S01	extrapolated	Pyrene	Pyrene	2.25E-03	mg/kg				S	10/8/1998	7.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS878	OCSS02S01	extrapolated	Benzene	Benzene	6.00E-04	mg/kg				S	6/17/1999	0.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS878	OCSS02S01	extrapolated	Ethylbenzene	Ethylbenzene	6.00E-04	mg/kg				S	6/17/1999	0.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS878	OCSS02S01	extrapolated	Toluene	Toluene	6.00E-04	mg/kg				S	6/17/1999	0.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS878	OCSS02S01	extrapolated	m,p-Xylene	m,p-Xylene	1.80E-03	mg/kg				S	6/17/1999	0.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS878	OCSS02S01	extrapolated	o-Xylene	o-Xylene	4.00E-04	mg/kg				S	6/17/1999	0.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS878	OCSS02S01	extrapolated	Xylene (total)	Xylenes (total)	2.20E-03	mg/kg				S	6/17/1999	0.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS878	OCSS02S01	extrapolated	2-Methylnaphthalene	2-Methylnaphthalene	1.38E-01	mg/kg				S	6/17/1999	0.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS878	OCSS02S01	extrapolated	Acenaphthene	Acenaphthene	8.59E-03	mg/kg				S	6/17/1999	0.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS878	OCSS02S01	extrapolated	Acenaphthylene	Acenaphthylene	1.05E-03	mg/kg				S	6/17/1999	0.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS878	OCSS02S01	extrapolated	Anthracene	Anthracene	5.60E-03	mg/kg				S	6/17/1999	0.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS878	OCSS02S01	extrapolated	Benzo(a)anthracene	Benzo(a)anthracene	4.05E-04	mg/kg				S	6/17/1999	0.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS878	OCSS02S01	extrapolated	Benzo(a)pyrene	Benzo(a)pyrene	4.08E-04	mg/kg				S	6/17/1999	0.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS878	OCSS02S01	extrapolated	Benzo(b)fluoranthene	Benzo(b)fluoranthene	6.50E-04	mg/kg				S	6/17/1999	0.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS878	OCSS02S01	extrapolated	Benzo(e)pyrene	Benzo(e)pyrene	3.10E-03	mg/kg				S	6/17/1999	0.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS878	OCSS02S01	extrapolated	Benzo(g,h,i)perylene	Benzo(g,h,i)perylene	3.32E-03	mg/kg				S	6/17/1999	0.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS878	OCSS02S01	extrapolated	Benzo(k)fluoranthene	Benzo(k)fluoranthene	3.08E-04	mg/kg				S	6/17/1999	0.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS878	OCSS02S01	extrapolated	Chrysene	Chrysene	8.80E-04	mg/kg				S	6/17/1999	0.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS878	OCSS02S01	extrapolated	Dibenzo(a,h)anthracene	Dibenz(a,h)anthracene	1.66E-04	mg/kg				S	6/17/1999	0.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS878	OCSS02S01	extrapolated	Fluoranthene	Fluoranthene	1.12E-03	mg/kg				S	6/17/1999	0.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS878	OCSS02S01	extrapolated	Fluorene	Fluorene	8.52E-03	mg/kg				S	6/17/1999	0.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS878	OCSS02S01	extrapolated	Indeno(1,2,3-cd)pyrene	Indeno(1,2,3-cd)pyrene	3.61E-04	mg/kg				S	6/17/1999	0.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS878	OCSS02S01	extrapolated	Perylene	Perylene	1.77E-03	mg/kg				S	6/17/1999	0.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS878	OCSS02S01	extrapolated	Pyrene	Pyrene	2.04E-03	mg/kg				S	6/17/1999	0.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS879	OCBS23S01	extrapolated	Benzene	Benzene	6.00E-04	mg/kg				S	6/17/1999	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS879	OCBS23S01	extrapolated	Ethylbenzene	Ethylbenzene	6.00E-04	mg/kg				S	6/17/1999	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS879	OCBS23S01	extrapolated	m,p-Xylene	m,p-Xylene	1.80E-03	mg/kg				S	6/17/1999	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS879	OCBS23S01	extrapolated	o-Xylene	o-Xylene	4.00E-04	mg/kg				S	6/17/1999	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS879	OCBS23S01	extrapolated	Xylene (total)	Xylenes (total)	2.20E-03	mg/kg				S	6/17/1999	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS879	OCBS23S01	extrapolated	Toluene	Toluene	6.00E-04	mg/kg				S	6/17/1999	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS879	OCBS23S01	extrapolated	2-Methylnaphthalene	2-Methylnaphthalene	1.38E-01	mg/kg				S	6/17/1999	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS879	OCBS23S01	extrapolated	Acenaphthene	Acenaphthene	8.59E-03	mg/kg				S	6/17/1999	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS879	OCBS23S01	extrapolated	Acenaphthylene	Acenaphthylene	1.05E-03	mg/kg				S	6/17/1999	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS879	OCBS23S01	extrapolated	Anthracene	Anthracene	5.60E-03	mg/kg				S	6/17/1999	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS879	OCBS23S01	extrapolated	Benzo(a)anthracene	Benzo(a)anthracene	4.05E-04	mg/kg				S	6/17/1999	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS879	OCBS23S01	extrapolated	Benzo(a)pyrene	Benzo(a)pyrene	4.08E-04	mg/kg				S	6/17/1999	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS879	OCBS23S01	extrapolated	Benzo(b)fluoranthene	Benzo(b)fluoranthene	6.50E-04	mg/kg				S	6/17/1999	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS879	OCBS23S01	extrapolated	Benzo(e)pyrene	Benzo(e)pyrene	3.10E-03	mg/kg				S	6/17/1999	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS879	OCBS23S01	extrapolated	Benzo(g,h,i)perylene	Benzo(g,h,i)perylene	3.32E-03	mg/kg				S	6/17/1999	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS879	OCBS23S01	extrapolated	Benzo(k)fluoranthene	Benzo(k)fluoranthene	3.08E-04	mg/kg				S	6/17/1999	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS879	OCBS23S01	extrapolated	Chrysene	Chrysene	8.80E-04	mg/kg				S	6/17/1999	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS879	OCBS23S01	extrapolated	Dibenzo(a,h)anthracene	Dibenz(a,h)anthracene	1.66E-04	mg/kg				S	6/17/1999	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS879	OCBS23S01	extrapolated	Fluoranthene	Fluoranthene	1.12E-03	mg/kg				S	6/17/1999	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS879	OCBS23S01	extrapolated	Fluorene	Fluorene	8.52E-03	mg/kg				S	6/17/1999	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS879	OCBS23S01	extrapolated	Indeno(1,2,3-cd)pyrene	Indeno(1,2,3-cd)pyrene	3.61E-04	mg/kg				S	6/17/1999	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS879	OCBS23S01	extrapolated	Perylene	Perylene	1.77E-03	mg/kg				S	6/17/1999	0.50000	Primary Sample	SWMU 7.4 - Old Conservation

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EPA_NO	SAMPLE_ID	LAB_METHOD	ANALYTE	STD_ANALYT	CONCENTRAT	UNITS	REV_QUAL	Q_CODE	D_LIMIT	MATRIX	DATE_SAMP	DEPTH	SAMPLE_TYP	UNIT
RS879	OCBS23S01	extrapolated	Pyrene	Pyrene	2.04E-03	mg/kg				S	6/17/1999	0.50000	Primary Sample	SWMU 7.4 - Old Conservation
RS880	OCBS24S01	extrapolated	Benzene	Benzene	6.60E-04	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS880	OCBS24S01	extrapolated	Ethylbenzene	Ethylbenzene	6.60E-04	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS880	OCBS24S01	extrapolated	m,p-Xylene	m,p-Xylene	1.98E-03	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS880	OCBS24S01	extrapolated	o-Xylene	o-Xylene	4.40E-04	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS880	OCBS24S01	extrapolated	Xylene (total)	Xylenes (total)	2.42E-03	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS880	OCBS24S01	extrapolated	Toluene	Toluene	6.60E-04	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS880	OCBS24S01	extrapolated	2-Methylnaphthalene	2-Methylnaphthalene	1.51E-01	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS880	OCBS24S01	extrapolated	Acenaphthene	Acenaphthene	9.45E-03	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS880	OCBS24S01	extrapolated	Acenaphthylene	Acenaphthylene	1.16E-03	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS880	OCBS24S01	extrapolated	Anthracene	Anthracene	6.16E-03	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS880	OCBS24S01	extrapolated	Benzo(a)anthracene	Benzo(a)anthracene	4.45E-04	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS880	OCBS24S01	extrapolated	Benzo(a)pyrene	Benzo(a)pyrene	4.49E-04	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS880	OCBS24S01	extrapolated	Benzo(b)fluoranthene	Benzo(b)fluoranthene	7.15E-04	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS880	OCBS24S01	extrapolated	Benzo(e)pyrene	Benzo(e)pyrene	3.41E-03	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS880	OCBS24S01	extrapolated	Benzo(g,h,i)perylene	Benzo(g,h,i)perylene	3.65E-03	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS880	OCBS24S01	extrapolated	Benzo(k)fluoranthene	Benzo(k)fluoranthene	3.38E-04	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS880	OCBS24S01	extrapolated	Chrysene	Chrysene	9.68E-04	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS880	OCBS24S01	extrapolated	Dibenzo(a,h)anthracene	Dibenz(a,h)anthracene	1.83E-04	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS880	OCBS24S01	extrapolated	Fluoranthene	Fluoranthene	1.23E-03	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS880	OCBS24S01	extrapolated	Fluorene	Fluorene	9.37E-03	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS880	OCBS24S01	extrapolated	Indeno(1,2,3-cd)pyrene	Indeno(1,2,3-cd)pyrene	3.97E-04	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS880	OCBS24S01	extrapolated	Perylene	Perylene	1.95E-03	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS880	OCBS24S01	extrapolated	Pyrene	Pyrene	2.25E-03	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS881	OCBS07S01	extrapolated	Benzene	Benzene	3.18E-03	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS881	OCBS07S01	extrapolated	Ethylbenzene	Ethylbenzene	3.18E-03	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS881	OCBS07S01	extrapolated	Toluene	Toluene	3.18E-03	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS881	OCBS07S01	extrapolated	m,p-Xylene	m,p-Xylene	9.54E-03	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS881	OCBS07S01	extrapolated	o-Xylene	o-Xylene	2.12E-03	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS881	OCBS07S01	extrapolated	Xylene (total)	Xylenes (total)	1.17E-02	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS881	OCBS07S01	extrapolated	2-Methylnaphthalene	2-Methylnaphthalene	7.30E-01	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS881	OCBS07S01	extrapolated	Acenaphthene	Acenaphthene	8.48E-02	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS881	OCBS07S01	extrapolated	Acenaphthylene	Acenaphthylene	1.04E-02	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS881	OCBS07S01	extrapolated	Anthracene	Anthracene	5.53E-02	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS881	OCBS07S01	extrapolated	Benzo(a)anthracene	Benzo(a)anthracene	3.99E-03	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS881	OCBS07S01	extrapolated	Benzo(a)pyrene	Benzo(a)pyrene	4.03E-03	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS881	OCBS07S01	extrapolated	Benzo(b)fluoranthene	Benzo(b)fluoranthene	6.41E-03	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS881	OCBS07S01	extrapolated	Benzo(e)pyrene	Benzo(e)pyrene	3.06E-02	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS881	OCBS07S01	extrapolated	Benzo(g,h,i)perylene	Benzo(g,h,i)perylene	3.27E-02	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS881	OCBS07S01	extrapolated	Benzo(k)fluoranthene	Benzo(k)fluoranthene	3.04E-03	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS881	OCBS07S01	extrapolated	Chrysene	Chrysene	8.68E-03	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS881	OCBS07S01	extrapolated	Dibenz(a,h)anthracene	Dibenz(a,h)anthracene	1.64E-03	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS881	OCBS07S01	extrapolated	Fluoranthene	Fluoranthene	1.11E-02	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS881	OCBS07S01	extrapolated	Fluorene	Fluorene	8.40E-02	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS881	OCBS07S01	extrapolated	Indeno(1,2,3-cd)pyrene	Indeno(1,2,3-cd)pyrene	3.56E-03	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS881	OCBS07S01	extrapolated	Naphthalene	Naphthalene	1.84E-01	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS881	OCBS07S01	extrapolated	Perylene	Perylene	1.75E-02	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS881	OCBS07S01	extrapolated	Phenanthrene	Phenanthrene	2.27E-01	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation
RS881	OCBS07S01	extrapolated	Pyrene	Pyrene	2.02E-02	mg/kg				S	6/17/1999	1.00000	Primary Sample	SWMU 7.4 - Old Conservation

Table C7-3
Extrapolated Data
Sodium Reactor Experiment (SRE) Area

EPA_NO	SAMPLE_ID	LAB_METHOD	ANALYTE	STD_ANALYT	CONCENTRAT	UNITS	REV_QUAL	Q_CODE	D_LIMIT	MATRIX	DATE_SAMP	DEPTH	SAMPLE_TYP	UNIT	Scenario
MJ248	SRBS53S01	extrapolated	PCB-105	PCB-105	1.48E-05	mg/kg				S		0.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ248	SRBS53S01	extrapolated	PCB-114	PCB-114	5.44E-07	mg/kg				S		0.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ248	SRBS53S01	extrapolated	PCB-118	PCB-118	3.22E-05	mg/kg				S		0.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ248	SRBS53S01	extrapolated	PCB-123	PCB-123	3.59E-07	mg/kg				S		0.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ248	SRBS53S01	extrapolated	PCB-126	PCB-126	9.03E-07	mg/kg				S		0.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ248	SRBS53S01	extrapolated	PCB-156	PCB-156	7.55E-06	mg/kg				S		0.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ248	SRBS53S01	extrapolated	PCB-157	PCB-157	1.48E-06	mg/kg				S		0.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ248	SRBS53S01	extrapolated	PCB-167	PCB-167	2.47E-06	mg/kg				S		0.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ248	SRBS53S01	extrapolated	PCB-169	PCB-169	4.39E-08	mg/kg				S		0.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ248	SRBS53S01	extrapolated	PCB-189	PCB-189	3.59E-07	mg/kg				S		0.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ248	SRBS53S01	extrapolated	PCB-77	PCB-77	1.86E-06	mg/kg				S		0.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ248	SRBS53S01	extrapolated	PCB-81	PCB-81	3.59E-07	mg/kg				S		0.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ623	SRBS54S01	extrapolated	PCB-105	PCB-105	5.65E-04	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ623	SRBS54S01	extrapolated	PCB-114	PCB-114	1.00E-05	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ623	SRBS54S01	extrapolated	PCB-118	PCB-118	1.13E-03	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ623	SRBS54S01	extrapolated	PCB-123	PCB-123	1.60E-05	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ623	SRBS54S01	extrapolated	PCB-126	PCB-126	4.39E-05	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ623	SRBS54S01	extrapolated	PCB-156	PCB-156	3.76E-04	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ623	SRBS54S01	extrapolated	PCB-157	PCB-157	1.69E-04	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ623	SRBS54S01	extrapolated	PCB-167	PCB-167	2.95E-04	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ623	SRBS54S01	extrapolated	PCB-169	PCB-169	4.39E-06	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ623	SRBS54S01	extrapolated	PCB-189	PCB-189	4.39E-05	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ623	SRBS54S01	extrapolated	PCB-77	PCB-77	8.78E-05	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ623	SRBS54S01	extrapolated	PCB-81	PCB-81	1.55E-05	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ624	SRBS54S02	extrapolated	PCB-105	PCB-105	5.24E-04	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ624	SRBS54S02	extrapolated	PCB-114	PCB-114	9.31E-06	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ624	SRBS54S02	extrapolated	PCB-118	PCB-118	1.05E-03	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ624	SRBS54S02	extrapolated	PCB-123	PCB-123	1.48E-05	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ624	SRBS54S02	extrapolated	PCB-126	PCB-126	4.07E-05	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ624	SRBS54S02	extrapolated	PCB-156	PCB-156	3.49E-04	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ624	SRBS54S02	extrapolated	PCB-157	PCB-157	1.57E-04	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ624	SRBS54S02	extrapolated	PCB-167	PCB-167	2.73E-04	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ624	SRBS54S02	extrapolated	PCB-169	PCB-169	4.07E-06	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ624	SRBS54S02	extrapolated	PCB-189	PCB-189	4.07E-05	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ624	SRBS54S02	extrapolated	PCB-77	PCB-77	8.15E-05	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ624	SRBS54S02	extrapolated	PCB-81	PCB-81	1.44E-05	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ625	SRBS54S03	extrapolated	PCB-105	PCB-105	3.93E-04	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ625	SRBS54S03	extrapolated	PCB-114	PCB-114	6.98E-06	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ625	SRBS54S03	extrapolated	PCB-118	PCB-118	7.85E-04	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ625	SRBS54S03	extrapolated	PCB-123	PCB-123	1.11E-05	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ625	SRBS54S03	extrapolated	PCB-126	PCB-126	3.05E-05	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ625	SRBS54S03	extrapolated	PCB-156	PCB-156	2.62E-04	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ625	SRBS54S03	extrapolated	PCB-157	PCB-157	1.18E-04	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ625	SRBS54S03	extrapolated	PCB-167	PCB-167	2.05E-04	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ625	SRBS54S03	extrapolated	PCB-169	PCB-169	3.05E-06	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ625	SRBS54S03	extrapolated	PCB-189	PCB-189	3.05E-05	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ625	SRBS54S03	extrapolated	PCB-77	PCB-77	6.11E-05	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ625	SRBS54S03	extrapolated	PCB-81	PCB-81	1.08E-05	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ626	SRBS54S04	extrapolated	PCB-105	PCB-105	6.38E-04	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ626	SRBS54S04	extrapolated	PCB-114	PCB-114	1.13E-05	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ626	SRBS54S04	extrapolated	PCB-118	PCB-118	1.28E-03	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios

Table C7-3
Extrapolated Data
Sodium Reactor Experiment (SRE) Area

EPA_NO	SAMPLE_ID	LAB_METHOD	ANALYTE	STD_ANALYT	CONCENTRAT	UNITS	REV_QUAL	Q_CODE	D_LIMIT	MATRIX	DATE_SAMP	DEPTH	SAMPLE_TYP	UNIT	Scenario
MJ626	SRBS54S04	extrapolated	PCB-123	PCB-123	1.81E-05	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ626	SRBS54S04	extrapolated	PCB-126	PCB-126	4.96E-05	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ626	SRBS54S04	extrapolated	PCB-156	PCB-156	4.25E-04	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ626	SRBS54S04	extrapolated	PCB-157	PCB-157	1.91E-04	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ626	SRBS54S04	extrapolated	PCB-167	PCB-167	3.33E-04	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ626	SRBS54S04	extrapolated	PCB-169	PCB-169	4.96E-06	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ626	SRBS54S04	extrapolated	PCB-189	PCB-189	4.96E-05	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ626	SRBS54S04	extrapolated	PCB-77	PCB-77	9.93E-05	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ626	SRBS54S04	extrapolated	PCB-81	PCB-81	1.76E-05	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ627	SRBS54S05	extrapolated	PCB-105	PCB-105	1.15E-05	mg/kg				S		2.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ627	SRBS54S05	extrapolated	PCB-114	PCB-114	2.04E-07	mg/kg				S		2.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ627	SRBS54S05	extrapolated	PCB-118	PCB-118	2.29E-05	mg/kg				S		2.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ627	SRBS54S05	extrapolated	PCB-123	PCB-123	3.25E-07	mg/kg				S		2.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ627	SRBS54S05	extrapolated	PCB-126	PCB-126	8.91E-07	mg/kg				S		2.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ627	SRBS54S05	extrapolated	PCB-156	PCB-156	7.64E-06	mg/kg				S		2.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ627	SRBS54S05	extrapolated	PCB-157	PCB-157	3.44E-06	mg/kg				S		2.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ627	SRBS54S05	extrapolated	PCB-167	PCB-167	5.98E-06	mg/kg				S		2.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ627	SRBS54S05	extrapolated	PCB-169	PCB-169	8.91E-08	mg/kg				S		2.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ627	SRBS54S05	extrapolated	PCB-189	PCB-189	8.91E-07	mg/kg				S		2.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ627	SRBS54S05	extrapolated	PCB-77	PCB-77	1.78E-06	mg/kg				S		2.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ627	SRBS54S05	extrapolated	PCB-81	PCB-81	3.15E-07	mg/kg				S		2.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ628	SRBS55S01	extrapolated	PCB-105	PCB-105	5.32E-05	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ628	SRBS55S01	extrapolated	PCB-114	PCB-114	1.95E-06	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ628	SRBS55S01	extrapolated	PCB-118	PCB-118	1.15E-04	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ628	SRBS55S01	extrapolated	PCB-123	PCB-123	1.29E-06	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ628	SRBS55S01	extrapolated	PCB-126	PCB-126	3.24E-06	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ628	SRBS55S01	extrapolated	PCB-156	PCB-156	2.70E-05	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ628	SRBS55S01	extrapolated	PCB-157	PCB-157	5.32E-06	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ628	SRBS55S01	extrapolated	PCB-167	PCB-167	8.87E-06	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ628	SRBS55S01	extrapolated	PCB-169	PCB-169	1.57E-07	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ628	SRBS55S01	extrapolated	PCB-189	PCB-189	1.29E-06	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ628	SRBS55S01	extrapolated	PCB-77	PCB-77	6.65E-06	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ628	SRBS55S01	extrapolated	PCB-81	PCB-81	1.29E-06	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ629	SRBS56S01	extrapolated	PCB-105	PCB-105	1.98E-05	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ629	SRBS56S01	extrapolated	PCB-114	PCB-114	7.26E-07	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ629	SRBS56S01	extrapolated	PCB-118	PCB-118	4.29E-05	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ629	SRBS56S01	extrapolated	PCB-123	PCB-123	4.78E-07	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ629	SRBS56S01	extrapolated	PCB-126	PCB-126	1.20E-06	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ629	SRBS56S01	extrapolated	PCB-156	PCB-156	1.01E-05	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ629	SRBS56S01	extrapolated	PCB-157	PCB-157	1.98E-06	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ629	SRBS56S01	extrapolated	PCB-167	PCB-167	3.30E-06	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ629	SRBS56S01	extrapolated	PCB-169	PCB-169	5.86E-08	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ629	SRBS56S01	extrapolated	PCB-189	PCB-189	4.78E-07	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ629	SRBS56S01	extrapolated	PCB-77	PCB-77	2.47E-06	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ629	SRBS56S01	extrapolated	PCB-81	PCB-81	4.78E-07	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ630	SRBS58S01	Extrapolated	Acenaphthe	Acenaphthene	3.62E-03	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ630	SRBS58S01	Extrapolated	Acenaphthy	Acenaphthylene	7.51E-04	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ630	SRBS58S01	Extrapolated	Anthracene	Anthracene	1.95E-03	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ630	SRBS58S01	Extrapolated	Benzo(a)ant	Benzo(a)anthra	7.66E-05	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ630	SRBS58S01	Extrapolated	Benzo(a)pyr	Benzo(a)pyrene	9.44E-05	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ630	SRBS58S01	Extrapolated	Benzo(b)flu	Benzo(b)fluoran	4.17E-05	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios

Table C7-3
Extrapolated Data
Sodium Reactor Experiment (SRE) Area

EPA_NO	SAMPLE_ID	LAB_METHOD	ANALYTE	STD_ANALYT	CONCENTRAT	UNITS	REV_QUAL	Q_CODE	D_LIMIT	MATRIX	DATE_SAMP	DEPTH	SAMPLE_TYP	UNIT	Scenario
MJ630	SRBS58S01	Extrapolated	Benzo(e)pyr	Benzo(e)pyrene	1.25E-04	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ630	SRBS58S01	Extrapolated	Benzo(g,h,i)	Benzo(g,h,i)per	2.22E-03	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ630	SRBS58S01	Extrapolated	Benzo(k)flu	Benzo(k)fluoran	1.35E-05	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ630	SRBS58S01	Extrapolated	Chrysene	Chrysene	1.10E-04	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ630	SRBS58S01	Extrapolated	Dibenz(a,h)	Dibenz(a,h)anth	1.11E-04	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ630	SRBS58S01	Extrapolated	Fluoranthen	Fluoranthene	3.86E-04	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ630	SRBS58S01	Extrapolated	Fluorene	Fluorene	4.89E-03	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ630	SRBS58S01	Extrapolated	Indeno(1,2,3	Indeno(1,2,3-cd	1.49E-04	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ630	SRBS58S01	extrapolated	PCB-105	PCB-105	3.34E-06	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ630	SRBS58S01	extrapolated	PCB-114	PCB-114	1.22E-07	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ630	SRBS58S01	extrapolated	PCB-118	PCB-118	7.24E-06	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ630	SRBS58S01	extrapolated	PCB-123	PCB-123	8.07E-08	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ630	SRBS58S01	extrapolated	PCB-126	PCB-126	2.03E-07	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ630	SRBS58S01	extrapolated	PCB-156	PCB-156	1.70E-06	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ630	SRBS58S01	extrapolated	PCB-157	PCB-157	6.63E-07	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ630	SRBS58S01	extrapolated	PCB-167	PCB-167	1.15E-06	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ630	SRBS58S01	extrapolated	PCB-169	PCB-169	1.72E-08	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ630	SRBS58S01	extrapolated	PCB-189	PCB-189	1.72E-07	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ630	SRBS58S01	extrapolated	PCB-77	PCB-77	4.18E-07	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ630	SRBS58S01	extrapolated	PCB-81	PCB-81	8.07E-08	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ630	SRBS58S01	Extrapolated	Perylene	Perylene	8.72E-05	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ630	SRBS58S01	Extrapolated	Phenanthre	Phenanthrene	9.45E-03	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ630	SRBS58S01	Extrapolated	Pyrene	Pyrene	1.66E-03	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ631	SRBS59S01	Extrapolated	Acenaphthe	Acenaphthene	7.28E-03	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ631	SRBS59S01	Extrapolated	Acenaphthy	Acenaphthylene	1.51E-03	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ631	SRBS59S01	Extrapolated	Anthracene	Anthracene	3.93E-03	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ631	SRBS59S01	Extrapolated	Benzo(a)ant	Benzo(a)anthra	1.54E-04	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ631	SRBS59S01	Extrapolated	Benzo(a)pyr	Benzo(a)pyrene	1.90E-04	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ631	SRBS59S01	Extrapolated	Benzo(b)flu	Benzo(b)fluoran	8.40E-05	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ631	SRBS59S01	Extrapolated	Benzo(e)pyr	Benzo(e)pyrene	2.51E-04	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ631	SRBS59S01	Extrapolated	Benzo(g,h,i)	Benzo(g,h,i)per	4.48E-03	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ631	SRBS59S01	Extrapolated	Benzo(k)flu	Benzo(k)fluoran	2.71E-05	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ631	SRBS59S01	Extrapolated	Chrysene	Chrysene	2.22E-04	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ631	SRBS59S01	Extrapolated	Dibenz(a,h)	Dibenz(a,h)anth	2.24E-04	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ631	SRBS59S01	Extrapolated	Fluoranthen	Fluoranthene	7.77E-04	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ631	SRBS59S01	Extrapolated	Fluorene	Fluorene	9.83E-03	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ631	SRBS59S01	Extrapolated	Indeno(1,2,3	Indeno(1,2,3-cd	2.99E-04	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ631	SRBS59S01	extrapolated	PCB-105	PCB-105	3.28E-06	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ631	SRBS59S01	extrapolated	PCB-114	PCB-114	1.20E-07	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ631	SRBS59S01	extrapolated	PCB-118	PCB-118	7.10E-06	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ631	SRBS59S01	extrapolated	PCB-123	PCB-123	7.92E-08	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ631	SRBS59S01	extrapolated	PCB-126	PCB-126	1.99E-07	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ631	SRBS59S01	extrapolated	PCB-156	PCB-156	1.67E-06	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ631	SRBS59S01	extrapolated	PCB-157	PCB-157	6.50E-07	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ631	SRBS59S01	extrapolated	PCB-167	PCB-167	1.13E-06	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ631	SRBS59S01	extrapolated	PCB-169	PCB-169	1.69E-08	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ631	SRBS59S01	extrapolated	PCB-189	PCB-189	1.69E-07	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ631	SRBS59S01	extrapolated	PCB-77	PCB-77	4.10E-07	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ631	SRBS59S01	extrapolated	PCB-81	PCB-81	7.92E-08	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ631	SRBS59S01	Extrapolated	Perylene	Perylene	1.76E-04	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ631	SRBS59S01	Extrapolated	Phenanthre	Phenanthrene	1.90E-02	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios

Table C7-3
Extrapolated Data
Sodium Reactor Experiment (SRE) Area

EPA_NO	SAMPLE_ID	LAB_METHOD	ANALYTE	STD_ANALYT	CONCENTRAT	UNITS	REV_QUAL	Q_CODE	D_LIMIT	MATRIX	DATE_SAMP	DEPTH	SAMPLE_TYP	UNIT	Scenario
MJ631	SRBS59S01	Extrapolated	Pyrene	Pyrene	3.34E-03	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ635	SRBS60S01	extrapolated	PCB-105	PCB-105	1.47E-05	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Soil in Dry Scenario/Sediment in Wet Scenario
MJ635	SRBS60S01	extrapolated	PCB-114	PCB-114	4.99E-07	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Soil in Dry Scenario/Sediment in Wet Scenario
MJ635	SRBS60S01	extrapolated	PCB-118	PCB-118	2.95E-05	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Soil in Dry Scenario/Sediment in Wet Scenario
MJ635	SRBS60S01	extrapolated	PCB-123	PCB-123	4.17E-07	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Soil in Dry Scenario/Sediment in Wet Scenario
MJ635	SRBS60S01	extrapolated	PCB-126	PCB-126	1.15E-06	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Soil in Dry Scenario/Sediment in Wet Scenario
MJ635	SRBS60S01	extrapolated	PCB-156	PCB-156	9.82E-06	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Soil in Dry Scenario/Sediment in Wet Scenario
MJ635	SRBS60S01	extrapolated	PCB-157	PCB-157	4.42E-06	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Soil in Dry Scenario/Sediment in Wet Scenario
MJ635	SRBS60S01	extrapolated	PCB-167	PCB-167	7.69E-06	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Soil in Dry Scenario/Sediment in Wet Scenario
MJ635	SRBS60S01	extrapolated	PCB-169	PCB-169	1.15E-07	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Soil in Dry Scenario/Sediment in Wet Scenario
MJ635	SRBS60S01	extrapolated	PCB-189	PCB-189	1.15E-06	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Soil in Dry Scenario/Sediment in Wet Scenario
MJ635	SRBS60S01	extrapolated	PCB-77	PCB-77	2.29E-06	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Soil in Dry Scenario/Sediment in Wet Scenario
MJ635	SRBS60S01	extrapolated	PCB-81	PCB-81	4.05E-07	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Soil in Dry Scenario/Sediment in Wet Scenario
MJ636	SRBS60S02	summation	Total Hepta	Total Hepta	1.43E-03	mg/kg				S	2/14/2006	2.00000	Primary Sample	Area IV AOC - SRE	Soil in Dry Scenario/Sediment in Wet Scenario
MJ636	SRBS60S02	summation	Total Hexa	Total Hexa	6.80E-05	mg/kg				S	2/14/2006	2.00000	Primary Sample	Area IV AOC - SRE	Soil in Dry Scenario/Sediment in Wet Scenario
MJ636	SRBS60S02	summation	Total Octa	Total Octa	1.88E-02	mg/kg				S	2/14/2006	2.00000	Primary Sample	Area IV AOC - SRE	Soil in Dry Scenario/Sediment in Wet Scenario
MJ636	SRBS60S02	summation	Total Penta	Total Penta	4.42E-06	mg/kg				S	2/14/2006	2.00000	Primary Sample	Area IV AOC - SRE	Soil in Dry Scenario/Sediment in Wet Scenario
MJ636	SRBS60S02	summation	Total Tetra	Total Tetra	1.32E-06	mg/kg				S	2/14/2006	2.00000	Primary Sample	Area IV AOC - SRE	Soil in Dry Scenario/Sediment in Wet Scenario
MJ637	SRBS61S01	summation	Total Hepta	Total Hepta	1.18E-06	mg/kg				S	2/15/2006	4.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ637	SRBS61S01	summation	Total Hexa	Total Hexa	5.19E-07	mg/kg				S	2/15/2006	4.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ637	SRBS61S01	summation	Total Octa	Total Octa	1.01E-05	mg/kg				S	2/15/2006	4.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ637	SRBS61S01	summation	Total Penta	Total Penta	1.74E-07	mg/kg				S	2/15/2006	4.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ637	SRBS61S01	summation	Total Tetra	Total Tetra	8.61E-08	mg/kg				S	2/15/2006	4.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ644	SRBS64S01	extrapolated	PCB-105	PCB-105	5.63E-06	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Soil in Dry Scenario/Sediment in Wet Scenario
MJ644	SRBS64S01	extrapolated	PCB-114	PCB-114	2.06E-07	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Soil in Dry Scenario/Sediment in Wet Scenario
MJ644	SRBS64S01	extrapolated	PCB-118	PCB-118	1.22E-05	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Soil in Dry Scenario/Sediment in Wet Scenario
MJ644	SRBS64S01	extrapolated	PCB-123	PCB-123	1.36E-07	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Soil in Dry Scenario/Sediment in Wet Scenario
MJ644	SRBS64S01	extrapolated	PCB-126	PCB-126	3.42E-07	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Soil in Dry Scenario/Sediment in Wet Scenario
MJ644	SRBS64S01	extrapolated	PCB-156	PCB-156	2.86E-06	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Soil in Dry Scenario/Sediment in Wet Scenario
MJ644	SRBS64S01	extrapolated	PCB-157	PCB-157	1.12E-06	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Soil in Dry Scenario/Sediment in Wet Scenario
MJ644	SRBS64S01	extrapolated	PCB-167	PCB-167	1.94E-06	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Soil in Dry Scenario/Sediment in Wet Scenario
MJ644	SRBS64S01	extrapolated	PCB-169	PCB-169	2.90E-08	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Soil in Dry Scenario/Sediment in Wet Scenario
MJ644	SRBS64S01	extrapolated	PCB-189	PCB-189	2.90E-07	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Soil in Dry Scenario/Sediment in Wet Scenario
MJ644	SRBS64S01	extrapolated	PCB-77	PCB-77	7.04E-07	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Soil in Dry Scenario/Sediment in Wet Scenario
MJ644	SRBS64S01	extrapolated	PCB-81	PCB-81	1.36E-07	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Soil in Dry Scenario/Sediment in Wet Scenario
MJ645	SRBS65S01	summation	Total Hepta	Total Hepta	1.31E-04	mg/kg				S	2/15/2006	0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ645	SRBS65S01	summation	Total Hexa	Total Hexa	7.94E-06	mg/kg				S	2/15/2006	0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ645	SRBS65S01	summation	Total Octa	Total Octa	1.83E-03	mg/kg				S	2/15/2006	0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ645	SRBS65S01	summation	Total Penta	Total Penta	8.13E-07	mg/kg				S	2/15/2006	0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ645	SRBS65S01	summation	Total Tetra	Total Tetra	5.79E-07	mg/kg				S	2/15/2006	0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ652	SRBS67S01	extrapolated	PCB-105	PCB-105	3.34E-06	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ652	SRBS67S01	extrapolated	PCB-114	PCB-114	1.22E-07	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ652	SRBS67S01	extrapolated	PCB-118	PCB-118	7.24E-06	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ652	SRBS67S01	extrapolated	PCB-123	PCB-123	8.07E-08	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ652	SRBS67S01	extrapolated	PCB-126	PCB-126	2.03E-07	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ652	SRBS67S01	extrapolated	PCB-156	PCB-156	1.70E-06	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ652	SRBS67S01	extrapolated	PCB-157	PCB-157	6.63E-07	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ652	SRBS67S01	extrapolated	PCB-167	PCB-167	1.15E-06	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ652	SRBS67S01	extrapolated	PCB-169	PCB-169	1.72E-08	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ652	SRBS67S01	extrapolated	PCB-189	PCB-189	1.72E-07	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ652	SRBS67S01	extrapolated	PCB-77	PCB-77	4.18E-07	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios

Table C7-3
Extrapolated Data
Sodium Reactor Experiment (SRE) Area

EPA_NO	SAMPLE_ID	LAB_METHOD	ANALYTE	STD_ANALYT	CONCENTRAT	UNITS	REV_QUAL	Q_CODE	D_LIMIT	MATRIX	DATE_SAMP	DEPTH	SAMPLE_TYP	UNIT	Scenario
MJ652	SRBS67S01	extrapolated	PCB-81	PCB-81	8.07E-08	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ653	SRBS68S01	extrapolated	PCB-105	PCB-105	3.28E-06	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ653	SRBS68S01	extrapolated	PCB-114	PCB-114	1.20E-07	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ653	SRBS68S01	extrapolated	PCB-118	PCB-118	7.10E-06	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ653	SRBS68S01	extrapolated	PCB-123	PCB-123	7.92E-08	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ653	SRBS68S01	extrapolated	PCB-126	PCB-126	1.99E-07	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ653	SRBS68S01	extrapolated	PCB-156	PCB-156	1.67E-06	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ653	SRBS68S01	extrapolated	PCB-157	PCB-157	6.50E-07	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ653	SRBS68S01	extrapolated	PCB-167	PCB-167	1.13E-06	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ653	SRBS68S01	extrapolated	PCB-169	PCB-169	1.69E-08	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ653	SRBS68S01	extrapolated	PCB-189	PCB-189	1.69E-07	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ653	SRBS68S01	extrapolated	PCB-77	PCB-77	4.10E-07	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ653	SRBS68S01	extrapolated	PCB-81	PCB-81	7.92E-08	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ661	SRBS70S01	Extrapolated	Acenaphthe	Acenaphthene	8.04E-03	mg/kg				S		1.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ661	SRBS70S01	Extrapolated	Acenaphthy	Acenaphthylene	1.67E-03	mg/kg				S		1.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ661	SRBS70S01	Extrapolated	Anthracene	Anthracene	4.34E-03	mg/kg				S		1.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ661	SRBS70S01	Extrapolated	Benzo(a)ant	Benzo(a)anthra	1.70E-04	mg/kg				S		1.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ661	SRBS70S01	Extrapolated	Benzo(a)pyr	Benzo(a)pyrene	2.10E-04	mg/kg				S		1.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ661	SRBS70S01	Extrapolated	Benzo(b)flu	Benzo(b)fluoran	9.28E-05	mg/kg				S		1.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ661	SRBS70S01	Extrapolated	Benzo(e)pyr	Benzo(e)pyrene	2.77E-04	mg/kg				S		1.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ661	SRBS70S01	Extrapolated	Benzo(g,h,i)	Benzo(g,h,i)per	4.94E-03	mg/kg				S		1.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ661	SRBS70S01	Extrapolated	Benzo(k)flu	Benzo(k)fluoran	2.99E-05	mg/kg				S		1.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ661	SRBS70S01	Extrapolated	Chrysene	Chrysene	2.45E-04	mg/kg				S		1.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ661	SRBS70S01	Extrapolated	Dibenz(a,h)a	Dibenz(a,h)anth	2.47E-04	mg/kg				S		1.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ661	SRBS70S01	Extrapolated	Fluoranthen	Fluoranthene	8.58E-04	mg/kg				S		1.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ661	SRBS70S01	Extrapolated	Fluorene	Fluorene	1.09E-02	mg/kg				S		1.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ661	SRBS70S01	Extrapolated	Indeno(1,2,3	Indeno(1,2,3-cd	3.30E-04	mg/kg				S		1.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ661	SRBS70S01	Extrapolated	Perylene	Perylene	1.94E-04	mg/kg				S		1.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ661	SRBS70S01	Extrapolated	Phenanthren	Phenanthrene	2.10E-02	mg/kg				S		1.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ661	SRBS70S01	Extrapolated	Pyrene	Pyrene	3.69E-03	mg/kg				S		1.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ662	SRBS71S01	Extrapolated	Acenaphthe	Acenaphthene	7.37E-03	mg/kg				S		1.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ662	SRBS71S01	Extrapolated	Acenaphthy	Acenaphthylene	1.53E-03	mg/kg				S		1.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ662	SRBS71S01	Extrapolated	Anthracene	Anthracene	3.98E-03	mg/kg				S		1.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ662	SRBS71S01	Extrapolated	Benzo(a)ant	Benzo(a)anthra	1.56E-04	mg/kg				S		1.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ662	SRBS71S01	Extrapolated	Benzo(a)pyr	Benzo(a)pyrene	1.92E-04	mg/kg				S		1.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ662	SRBS71S01	Extrapolated	Benzo(b)flu	Benzo(b)fluoran	8.50E-05	mg/kg				S		1.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ662	SRBS71S01	Extrapolated	Benzo(e)pyr	Benzo(e)pyrene	2.54E-04	mg/kg				S		1.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ662	SRBS71S01	Extrapolated	Benzo(g,h,i)	Benzo(g,h,i)per	4.53E-03	mg/kg				S		1.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ662	SRBS71S01	Extrapolated	Benzo(k)flu	Benzo(k)fluoran	2.74E-05	mg/kg				S		1.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ662	SRBS71S01	Extrapolated	Chrysene	Chrysene	2.25E-04	mg/kg				S		1.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ662	SRBS71S01	Extrapolated	Dibenz(a,h)a	Dibenz(a,h)anth	2.27E-04	mg/kg				S		1.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ662	SRBS71S01	Extrapolated	Fluoranthen	Fluoranthene	7.87E-04	mg/kg				S		1.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ662	SRBS71S01	Extrapolated	Fluorene	Fluorene	9.96E-03	mg/kg				S		1.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ662	SRBS71S01	Extrapolated	Indeno(1,2,3	Indeno(1,2,3-cd	3.03E-04	mg/kg				S		1.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ662	SRBS71S01	Extrapolated	Perylene	Perylene	1.78E-04	mg/kg				S		1.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ662	SRBS71S01	Extrapolated	Phenanthren	Phenanthrene	1.93E-02	mg/kg				S		1.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ662	SRBS71S01	Extrapolated	Pyrene	Pyrene	3.38E-03	mg/kg				S		1.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ663	SRBS72S01	Extrapolated	Acenaphthe	Acenaphthene	7.15E-03	mg/kg				S		1.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ663	SRBS72S01	Extrapolated	Acenaphthy	Acenaphthylene	1.48E-03	mg/kg				S		1.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ663	SRBS72S01	Extrapolated	Anthracene	Anthracene	3.86E-03	mg/kg				S		1.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ663	SRBS72S01	Extrapolated	Benzo(a)ant	Benzo(a)anthra	1.51E-04	mg/kg				S		1.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios

Table C7-3
Extrapolated Data
Sodium Reactor Experiment (SRE) Area

EPA_NO	SAMPLE_ID	LAB_METHOD	ANALYTE	STD_ANALYT	CONCENTRAT	UNITS	REV_QUAL	Q_CODE	D_LIMIT	MATRIX	DATE_SAMP	DEPTH	SAMPLE_TYP	UNIT	Scenario
MJ663	SRBS72S01	Extrapolated	Benzo(a)pyr	Benzo(a)pyrene	1.86E-04	mg/kg				S		1.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ663	SRBS72S01	Extrapolated	Benzo(b)flu	Benzo(b)fluoran	8.25E-05	mg/kg				S		1.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ663	SRBS72S01	Extrapolated	Benzo(e)pyr	Benzo(e)pyrene	2.46E-04	mg/kg				S		1.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ663	SRBS72S01	Extrapolated	Benzo(g,h,i)	Benzo(g,h,i)per	4.39E-03	mg/kg				S		1.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ663	SRBS72S01	Extrapolated	Benzo(k)flu	Benzo(k)fluoran	2.66E-05	mg/kg				S		1.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ663	SRBS72S01	Extrapolated	Chrysene	Chrysene	2.18E-04	mg/kg				S		1.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ663	SRBS72S01	Extrapolated	Dibenz(a,h)	Dibenz(a,h)anth	2.20E-04	mg/kg				S		1.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ663	SRBS72S01	Extrapolated	Fluoranthen	Fluoranthene	7.63E-04	mg/kg				S		1.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ663	SRBS72S01	Extrapolated	Fluorene	Fluorene	9.65E-03	mg/kg				S		1.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ663	SRBS72S01	Extrapolated	Indeno(1,2,3	Indeno(1,2,3-cd	2.94E-04	mg/kg				S		1.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ663	SRBS72S01	Extrapolated	Perylene	Perylene	1.72E-04	mg/kg				S		1.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ663	SRBS72S01	Extrapolated	Phenanthre	Phenanthrene	1.87E-02	mg/kg				S		1.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ663	SRBS72S01	Extrapolated	Pyrene	Pyrene	3.28E-03	mg/kg				S		1.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ664	SRBS73S01	Extrapolated	Acenaphthe	Acenaphthene	7.73E-03	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ664	SRBS73S01	Extrapolated	Acenaphthy	Acenaphthylene	1.60E-03	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ664	SRBS73S01	Extrapolated	Anthracene	Anthracene	4.17E-03	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ664	SRBS73S01	Extrapolated	Benzo(a)ant	Benzo(a)anthra	1.64E-04	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ664	SRBS73S01	Extrapolated	Benzo(a)pyr	Benzo(a)pyrene	2.02E-04	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ664	SRBS73S01	Extrapolated	Benzo(b)flu	Benzo(b)fluoran	8.92E-05	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ664	SRBS73S01	Extrapolated	Benzo(e)pyr	Benzo(e)pyrene	2.66E-04	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ664	SRBS73S01	Extrapolated	Benzo(g,h,i)	Benzo(g,h,i)per	4.75E-03	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ664	SRBS73S01	Extrapolated	Benzo(k)flu	Benzo(k)fluoran	2.87E-05	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ664	SRBS73S01	Extrapolated	Chrysene	Chrysene	2.36E-04	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ664	SRBS73S01	Extrapolated	Dibenz(a,h)	Dibenz(a,h)anth	2.38E-04	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ664	SRBS73S01	Extrapolated	Fluoranthen	Fluoranthene	8.25E-04	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ664	SRBS73S01	Extrapolated	Fluorene	Fluorene	1.04E-02	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ664	SRBS73S01	Extrapolated	Indeno(1,2,3	Indeno(1,2,3-cd	3.18E-04	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ664	SRBS73S01	extrapolated	PCB-105	PCB-105	5.07E-06	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ664	SRBS73S01	extrapolated	PCB-114	PCB-114	1.86E-07	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ664	SRBS73S01	extrapolated	PCB-118	PCB-118	1.10E-05	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ664	SRBS73S01	extrapolated	PCB-123	PCB-123	1.23E-07	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ664	SRBS73S01	extrapolated	PCB-126	PCB-126	3.09E-07	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ664	SRBS73S01	extrapolated	PCB-156	PCB-156	2.58E-06	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ664	SRBS73S01	extrapolated	PCB-157	PCB-157	1.01E-06	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ664	SRBS73S01	extrapolated	PCB-167	PCB-167	1.75E-06	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ664	SRBS73S01	extrapolated	PCB-169	PCB-169	2.61E-08	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ664	SRBS73S01	extrapolated	PCB-189	PCB-189	2.61E-07	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ664	SRBS73S01	extrapolated	PCB-77	PCB-77	6.34E-07	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ664	SRBS73S01	extrapolated	PCB-81	PCB-81	1.23E-07	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ664	SRBS73S01	Extrapolated	Perylene	Perylene	1.86E-04	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ664	SRBS73S01	Extrapolated	Phenanthre	Phenanthrene	2.02E-02	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ664	SRBS73S01	Extrapolated	Pyrene	Pyrene	3.55E-03	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ765	SRBS74S01	extrapolated	PCB-105	PCB-105	1.11E-05	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ765	SRBS74S01	extrapolated	PCB-114	PCB-114	4.08E-07	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ765	SRBS74S01	extrapolated	PCB-118	PCB-118	2.41E-05	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ765	SRBS74S01	extrapolated	PCB-123	PCB-123	2.69E-07	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ765	SRBS74S01	extrapolated	PCB-126	PCB-126	6.77E-07	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ765	SRBS74S01	extrapolated	PCB-156	PCB-156	5.66E-06	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ765	SRBS74S01	extrapolated	PCB-157	PCB-157	2.21E-06	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ765	SRBS74S01	extrapolated	PCB-167	PCB-167	3.85E-06	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ765	SRBS74S01	extrapolated	PCB-169	PCB-169	5.73E-08	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios

Table C7-3
Extrapolated Data
Sodium Reactor Experiment (SRE) Area

EPA_NO	SAMPLE_ID	LAB_METHOD	ANALYTE	STD_ANALYT	CONCENTRAT	UNITS	REV_QUAL	Q_CODE	D_LIMIT	MATRIX	DATE_SAMP	DEPTH	SAMPLE_TYP	UNIT	Scenario
MJ765	SRBS74S01	extrapolated	PCB-189	PCB-189	5.73E-07	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ765	SRBS74S01	extrapolated	PCB-77	PCB-77	1.39E-06	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ765	SRBS74S01	extrapolated	PCB-81	PCB-81	2.69E-07	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ768	SRBS77S01	extrapolated	PCB-105	PCB-105	5.26E-06	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ768	SRBS77S01	extrapolated	PCB-114	PCB-114	1.93E-07	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ768	SRBS77S01	extrapolated	PCB-118	PCB-118	1.14E-05	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ768	SRBS77S01	extrapolated	PCB-123	PCB-123	1.27E-07	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ768	SRBS77S01	extrapolated	PCB-126	PCB-126	3.20E-07	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ768	SRBS77S01	extrapolated	PCB-156	PCB-156	2.67E-06	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ768	SRBS77S01	extrapolated	PCB-157	PCB-157	1.04E-06	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ768	SRBS77S01	extrapolated	PCB-167	PCB-167	1.82E-06	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ768	SRBS77S01	extrapolated	PCB-169	PCB-169	2.70E-08	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ768	SRBS77S01	extrapolated	PCB-189	PCB-189	2.70E-07	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ768	SRBS77S01	extrapolated	PCB-77	PCB-77	6.57E-07	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ768	SRBS77S01	extrapolated	PCB-81	PCB-81	1.27E-07	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ776	SRBS85S01	extrapolated	PCB-105	PCB-105	5.44E-06	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ776	SRBS85S01	extrapolated	PCB-114	PCB-114	2.00E-07	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ776	SRBS85S01	extrapolated	PCB-118	PCB-118	1.18E-05	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ776	SRBS85S01	extrapolated	PCB-123	PCB-123	1.32E-07	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ776	SRBS85S01	extrapolated	PCB-126	PCB-126	3.31E-07	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ776	SRBS85S01	extrapolated	PCB-156	PCB-156	2.77E-06	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ776	SRBS85S01	extrapolated	PCB-157	PCB-157	1.08E-06	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ776	SRBS85S01	extrapolated	PCB-167	PCB-167	1.88E-06	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ776	SRBS85S01	extrapolated	PCB-169	PCB-169	2.80E-08	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ776	SRBS85S01	extrapolated	PCB-189	PCB-189	2.80E-07	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ776	SRBS85S01	extrapolated	PCB-77	PCB-77	6.80E-07	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ776	SRBS85S01	extrapolated	PCB-81	PCB-81	1.32E-07	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ776	SRBS85S01	summation	Total Hepta	Total Hepta	3.74E-04	mg/kg				S	4/12/2006	0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ776	SRBS85S01	summation	Total Hexa	Total Hexa	1.65E-05	mg/kg				S	4/12/2006	0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ776	SRBS85S01	summation	Total Octa	Total Octa	7.46E-03	mg/kg				S	4/12/2006	0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ776	SRBS85S01	summation	Total Penta	Total Penta	6.53E-07	mg/kg				S	4/12/2006	0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ776	SRBS85S01	summation	Total Tetra	Total Tetra	2.02E-07	mg/kg				S	4/12/2006	0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ777	SRBS86S01	extrapolated	PCB-105	PCB-105	5.44E-06	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ777	SRBS86S01	extrapolated	PCB-114	PCB-114	2.00E-07	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ777	SRBS86S01	extrapolated	PCB-118	PCB-118	1.18E-05	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ777	SRBS86S01	extrapolated	PCB-123	PCB-123	1.32E-07	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ777	SRBS86S01	extrapolated	PCB-126	PCB-126	3.31E-07	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ777	SRBS86S01	extrapolated	PCB-156	PCB-156	2.77E-06	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ777	SRBS86S01	extrapolated	PCB-157	PCB-157	1.08E-06	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ777	SRBS86S01	extrapolated	PCB-167	PCB-167	1.88E-06	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ777	SRBS86S01	extrapolated	PCB-169	PCB-169	2.80E-08	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ777	SRBS86S01	extrapolated	PCB-189	PCB-189	2.80E-07	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ777	SRBS86S01	extrapolated	PCB-77	PCB-77	6.80E-07	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ777	SRBS86S01	extrapolated	PCB-81	PCB-81	1.32E-07	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ777	SRBS86S01	summation	Total Hepta	Total Hepta	5.54E-04	mg/kg				S	4/12/2006	0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ777	SRBS86S01	summation	Total Hexa	Total Hexa	4.10E-05	mg/kg				S	4/12/2006	0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ777	SRBS86S01	summation	Total Octa	Total Octa	5.88E-03	mg/kg				S	4/12/2006	0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ777	SRBS86S01	summation	Total Penta	Total Penta	2.88E-06	mg/kg				S	4/12/2006	0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
MJ777	SRBS86S01	summation	Total Tetra	Total Tetra	1.19E-06	mg/kg				S	4/12/2006	0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RD977	SRBS01S01	Extrapolated	Acenaphthe	Acenaphthene	7.37E-03	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RD977	SRBS01S01	Extrapolated	Acenaphthy	Acenaphthylene	1.53E-03	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios

Table C7-3
Extrapolated Data
Sodium Reactor Experiment (SRE) Area

EPA_NO	SAMPLE_ID	LAB_METHOD	ANALYTE	STD_ANALYT	CONCENTRAT	UNITS	REV_QUAL	Q_CODE	D_LIMIT	MATRIX	DATE_SAMP	DEPTH	SAMPLE_TYP	UNIT	Scenario
RD977	SRBS01S01	Extrapolated	Anthracene	Anthracene	3.98E-03	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RD977	SRBS01S01	Extrapolated	Benzo(a)ant	Benzo(a)anthra	1.56E-04	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RD977	SRBS01S01	Extrapolated	Benzo(a)pyr	Benzo(a)pyrene	1.92E-04	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RD977	SRBS01S01	Extrapolated	Benzo(b)flu	Benzo(b)fluoran	8.50E-05	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RD977	SRBS01S01	Extrapolated	Benzo(e)pyr	Benzo(e)pyrene	2.54E-04	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RD977	SRBS01S01	Extrapolated	Benzo(g,h,i)	Benzo(g,h,i)per	4.53E-03	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RD977	SRBS01S01	Extrapolated	Benzo(k)flu	Benzo(k)fluoran	2.74E-05	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RD977	SRBS01S01	Extrapolated	Chrysene	Chrysene	2.25E-04	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RD977	SRBS01S01	Extrapolated	Dibenz(a,h)a	Dibenz(a,h)anth	2.27E-04	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RD977	SRBS01S01	Extrapolated	Fluoranthen	Fluoranthene	7.87E-04	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RD977	SRBS01S01	Extrapolated	Fluorene	Fluorene	9.96E-03	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RD977	SRBS01S01	Extrapolated	Indeno(1,2,3	Indeno(1,2,3-cd	3.03E-04	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RD977	SRBS01S01	Extrapolated	Perylene	Perylene	1.78E-04	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RD977	SRBS01S01	Extrapolated	Phenanthren	Phenanthrene	1.93E-02	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RD977	SRBS01S01	Extrapolated	Pyrene	Pyrene	3.38E-03	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RD979	SRBS02S01	Extrapolated	Acenaphthe	Acenaphthene	7.37E-03	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Soil in Dry Scenario/Sediment in Wet Scenario
RD979	SRBS02S01	Extrapolated	Acenaphthy	Acenaphthylene	1.53E-03	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Soil in Dry Scenario/Sediment in Wet Scenario
RD979	SRBS02S01	Extrapolated	Anthracene	Anthracene	3.98E-03	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Soil in Dry Scenario/Sediment in Wet Scenario
RD979	SRBS02S01	Extrapolated	Benzo(a)ant	Benzo(a)anthra	1.56E-04	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Soil in Dry Scenario/Sediment in Wet Scenario
RD979	SRBS02S01	Extrapolated	Benzo(a)pyr	Benzo(a)pyrene	1.92E-04	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Soil in Dry Scenario/Sediment in Wet Scenario
RD979	SRBS02S01	Extrapolated	Benzo(b)flu	Benzo(b)fluoran	8.50E-05	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Soil in Dry Scenario/Sediment in Wet Scenario
RD979	SRBS02S01	Extrapolated	Benzo(e)pyr	Benzo(e)pyrene	2.54E-04	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Soil in Dry Scenario/Sediment in Wet Scenario
RD979	SRBS02S01	Extrapolated	Benzo(g,h,i)	Benzo(g,h,i)per	4.53E-03	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Soil in Dry Scenario/Sediment in Wet Scenario
RD979	SRBS02S01	Extrapolated	Benzo(k)flu	Benzo(k)fluoran	2.74E-05	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Soil in Dry Scenario/Sediment in Wet Scenario
RD979	SRBS02S01	Extrapolated	Chrysene	Chrysene	2.25E-04	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Soil in Dry Scenario/Sediment in Wet Scenario
RD979	SRBS02S01	Extrapolated	Dibenz(a,h)a	Dibenz(a,h)anth	2.27E-04	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Soil in Dry Scenario/Sediment in Wet Scenario
RD979	SRBS02S01	Extrapolated	Fluoranthen	Fluoranthene	7.87E-04	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Soil in Dry Scenario/Sediment in Wet Scenario
RD979	SRBS02S01	Extrapolated	Fluorene	Fluorene	9.96E-03	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Soil in Dry Scenario/Sediment in Wet Scenario
RD979	SRBS02S01	Extrapolated	Indeno(1,2,3	Indeno(1,2,3-cd	3.03E-04	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Soil in Dry Scenario/Sediment in Wet Scenario
RD979	SRBS02S01	Extrapolated	Perylene	Perylene	1.78E-04	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Soil in Dry Scenario/Sediment in Wet Scenario
RD979	SRBS02S01	Extrapolated	Phenanthren	Phenanthrene	1.93E-02	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Soil in Dry Scenario/Sediment in Wet Scenario
RD979	SRBS02S01	Extrapolated	Pyrene	Pyrene	3.38E-03	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Soil in Dry Scenario/Sediment in Wet Scenario
RD980	SRBS02S02	Extrapolated	Acenaphthe	Acenaphthene	7.37E-03	mg/kg				S		4.00000	Primary Sample	Area IV AOC - SRE	Soil in Dry Scenario/Sediment in Wet Scenario
RD980	SRBS02S02	Extrapolated	Acenaphthy	Acenaphthylene	1.53E-03	mg/kg				S		4.00000	Primary Sample	Area IV AOC - SRE	Soil in Dry Scenario/Sediment in Wet Scenario
RD980	SRBS02S02	Extrapolated	Anthracene	Anthracene	3.98E-03	mg/kg				S		4.00000	Primary Sample	Area IV AOC - SRE	Soil in Dry Scenario/Sediment in Wet Scenario
RD980	SRBS02S02	Extrapolated	Benzo(a)ant	Benzo(a)anthra	1.56E-04	mg/kg				S		4.00000	Primary Sample	Area IV AOC - SRE	Soil in Dry Scenario/Sediment in Wet Scenario
RD980	SRBS02S02	Extrapolated	Benzo(a)pyr	Benzo(a)pyrene	1.92E-04	mg/kg				S		4.00000	Primary Sample	Area IV AOC - SRE	Soil in Dry Scenario/Sediment in Wet Scenario
RD980	SRBS02S02	Extrapolated	Benzo(b)flu	Benzo(b)fluoran	8.50E-05	mg/kg				S		4.00000	Primary Sample	Area IV AOC - SRE	Soil in Dry Scenario/Sediment in Wet Scenario
RD980	SRBS02S02	Extrapolated	Benzo(e)pyr	Benzo(e)pyrene	2.54E-04	mg/kg				S		4.00000	Primary Sample	Area IV AOC - SRE	Soil in Dry Scenario/Sediment in Wet Scenario
RD980	SRBS02S02	Extrapolated	Benzo(g,h,i)	Benzo(g,h,i)per	4.53E-03	mg/kg				S		4.00000	Primary Sample	Area IV AOC - SRE	Soil in Dry Scenario/Sediment in Wet Scenario
RD980	SRBS02S02	Extrapolated	Benzo(k)flu	Benzo(k)fluoran	2.74E-05	mg/kg				S		4.00000	Primary Sample	Area IV AOC - SRE	Soil in Dry Scenario/Sediment in Wet Scenario
RD980	SRBS02S02	Extrapolated	Chrysene	Chrysene	2.25E-04	mg/kg				S		4.00000	Primary Sample	Area IV AOC - SRE	Soil in Dry Scenario/Sediment in Wet Scenario
RD980	SRBS02S02	Extrapolated	Dibenz(a,h)a	Dibenz(a,h)anth	2.27E-04	mg/kg				S		4.00000	Primary Sample	Area IV AOC - SRE	Soil in Dry Scenario/Sediment in Wet Scenario
RD980	SRBS02S02	Extrapolated	Fluoranthen	Fluoranthene	7.87E-04	mg/kg				S		4.00000	Primary Sample	Area IV AOC - SRE	Soil in Dry Scenario/Sediment in Wet Scenario
RD980	SRBS02S02	Extrapolated	Fluorene	Fluorene	9.96E-03	mg/kg				S		4.00000	Primary Sample	Area IV AOC - SRE	Soil in Dry Scenario/Sediment in Wet Scenario
RD980	SRBS02S02	Extrapolated	Indeno(1,2,3	Indeno(1,2,3-cd	3.03E-04	mg/kg				S		4.00000	Primary Sample	Area IV AOC - SRE	Soil in Dry Scenario/Sediment in Wet Scenario
RD980	SRBS02S02	Extrapolated	Perylene	Perylene	1.78E-04	mg/kg				S		4.00000	Primary Sample	Area IV AOC - SRE	Soil in Dry Scenario/Sediment in Wet Scenario
RD980	SRBS02S02	Extrapolated	Phenanthren	Phenanthrene	1.93E-02	mg/kg				S		4.00000	Primary Sample	Area IV AOC - SRE	Soil in Dry Scenario/Sediment in Wet Scenario
RD980	SRBS02S02	Extrapolated	Pyrene	Pyrene	3.38E-03	mg/kg				S		4.00000	Primary Sample	Area IV AOC - SRE	Soil in Dry Scenario/Sediment in Wet Scenario
RJ152	SRBS30S01	Extrapolated	Acenaphthe	Acenaphthene	2.68E-03					S		5.00000	Primary Sample	Area IV AOC - SRE	Soil in Dry Scenario/Sediment in Wet Scenario
RJ152	SRBS30S01	Extrapolated	Acenaphthy	Acenaphthylene	5.56E-04					S		5.00000	Primary Sample	Area IV AOC - SRE	Soil in Dry Scenario/Sediment in Wet Scenario

Table C7-3
Extrapolated Data
Sodium Reactor Experiment (SRE) Area

EPA_NO	SAMPLE_ID	LAB_METHOD	ANALYTE	STD_ANALYT	CONCENTRAT	UNITS	REV_QUAL	Q_CODE	D_LIMIT	MATRIX	DATE_SAMP	DEPTH	SAMPLE_TYP	UNIT	Scenario
RJ152	SRBS30S01	Extrapolated	Anthracene	Anthracene	1.45E-03					S		5.00000	Primary Sample	Area IV AOC - SRE	Soil in Dry Scenario/Sediment in Wet Scenario
RJ152	SRBS30S01	Extrapolated	Benzo(a)ant	Benzo(a)anthra	5.68E-05					S		5.00000	Primary Sample	Area IV AOC - SRE	Soil in Dry Scenario/Sediment in Wet Scenario
RJ152	SRBS30S01	Extrapolated	Benzo(a)pyr	Benzo(a)pyrene	6.99E-05					S		5.00000	Primary Sample	Area IV AOC - SRE	Soil in Dry Scenario/Sediment in Wet Scenario
RJ152	SRBS30S01	Extrapolated	Benzo(b)flu	Benzo(b)fluoran	3.09E-05					S		5.00000	Primary Sample	Area IV AOC - SRE	Soil in Dry Scenario/Sediment in Wet Scenario
RJ152	SRBS30S01	Extrapolated	Benzo(e)pyr	Benzo(e)pyrene	9.23E-05					S		5.00000	Primary Sample	Area IV AOC - SRE	Soil in Dry Scenario/Sediment in Wet Scenario
RJ152	SRBS30S01	Extrapolated	Benzo(g,h,i)	Benzo(g,h,i)per	1.65E-03					S		5.00000	Primary Sample	Area IV AOC - SRE	Soil in Dry Scenario/Sediment in Wet Scenario
RJ152	SRBS30S01	Extrapolated	Benzo(k)flu	Benzo(k)fluoran	9.97E-06					S		5.00000	Primary Sample	Area IV AOC - SRE	Soil in Dry Scenario/Sediment in Wet Scenario
RJ152	SRBS30S01	Extrapolated	Chrysene	Chrysene	8.17E-05					S		5.00000	Primary Sample	Area IV AOC - SRE	Soil in Dry Scenario/Sediment in Wet Scenario
RJ152	SRBS30S01	Extrapolated	Dibenz(a,h)	Dibenz(a,h)anth	8.25E-05					S		5.00000	Primary Sample	Area IV AOC - SRE	Soil in Dry Scenario/Sediment in Wet Scenario
RJ152	SRBS30S01	Extrapolated	Fluoranthen	Fluoranthene	2.86E-04					S		5.00000	Primary Sample	Area IV AOC - SRE	Soil in Dry Scenario/Sediment in Wet Scenario
RJ152	SRBS30S01	Extrapolated	Fluorene	Fluorene	3.62E-03					S		5.00000	Primary Sample	Area IV AOC - SRE	Soil in Dry Scenario/Sediment in Wet Scenario
RJ152	SRBS30S01	Extrapolated	Indeno(1,2,3	Indeno(1,2,3-cd	1.10E-04					S		5.00000	Primary Sample	Area IV AOC - SRE	Soil in Dry Scenario/Sediment in Wet Scenario
RJ152	SRBS30S01	Extrapolated	Perylene	Perylene	6.46E-05					S		5.00000	Primary Sample	Area IV AOC - SRE	Soil in Dry Scenario/Sediment in Wet Scenario
RJ152	SRBS30S01	Extrapolated	Phenanthrer	Phenanthrene	7.00E-03					S		5.00000	Primary Sample	Area IV AOC - SRE	Soil in Dry Scenario/Sediment in Wet Scenario
RJ152	SRBS30S01	Extrapolated	Pyrene	Pyrene	1.23E-03					S		5.00000	Primary Sample	Area IV AOC - SRE	Soil in Dry Scenario/Sediment in Wet Scenario
RJ202	SRBS31S01	Extrapolated	Acenaphthe	Acenaphthene	4.58E-03	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ202	SRBS31S01	Extrapolated	Acenaphthy	Acenaphthylene	9.50E-04	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ202	SRBS31S01	Extrapolated	Anthracene	Anthracene	2.47E-03	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ202	SRBS31S01	Extrapolated	Benzo(a)ant	Benzo(a)anthra	9.70E-05	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ202	SRBS31S01	Extrapolated	Benzo(a)pyr	Benzo(a)pyrene	1.19E-04	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ202	SRBS31S01	Extrapolated	Benzo(b)flu	Benzo(b)fluoran	5.28E-05	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ202	SRBS31S01	Extrapolated	Benzo(e)pyr	Benzo(e)pyrene	1.58E-04	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ202	SRBS31S01	Extrapolated	Benzo(g,h,i)	Benzo(g,h,i)per	2.81E-03	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ202	SRBS31S01	Extrapolated	Benzo(k)flu	Benzo(k)fluoran	1.70E-05	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ202	SRBS31S01	Extrapolated	Chrysene	Chrysene	1.40E-04	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ202	SRBS31S01	Extrapolated	Dibenz(a,h)	Dibenz(a,h)anth	1.41E-04	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ202	SRBS31S01	Extrapolated	Fluoranthen	Fluoranthene	4.89E-04	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ202	SRBS31S01	Extrapolated	Fluorene	Fluorene	6.18E-03	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ202	SRBS31S01	Extrapolated	Indeno(1,2,3	Indeno(1,2,3-cd	1.88E-04	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ202	SRBS31S01	Extrapolated	Perylene	Perylene	1.10E-04	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ202	SRBS31S01	Extrapolated	Phenanthrer	Phenanthrene	1.20E-02	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ202	SRBS31S01	Extrapolated	Pyrene	Pyrene	2.10E-03	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ251	SRTS06S01	Extrapolated	Acenaphthy	Acenaphthylene	6.86E-04	mg/kg				S	4/18/2001	9.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ251	SRTS06S01	Extrapolated	Benzo(g,h,i)	Benzo(g,h,i)per	6.00E-03	mg/kg				S	4/18/2001	9.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ251	SRTS06S01	Extrapolated	Perylene	Perylene	7.97E-05	mg/kg				S		9.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ253	SRTS07S01	Extrapolated	Acenaphthy	Acenaphthylene	5.56E-04	mg/kg				S	4/18/2001	5.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ253	SRTS07S01	Extrapolated	Benzo(a)ant	Benzo(a)anthra	5.68E-05	mg/kg				S	4/18/2001	5.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ253	SRTS07S01	Extrapolated	Benzo(a)pyr	Benzo(a)pyrene	6.99E-05	mg/kg				S	4/18/2001	5.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ253	SRTS07S01	Extrapolated	Benzo(b)flu	Benzo(b)fluoran	3.09E-05	mg/kg				S	4/18/2001	5.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ253	SRTS07S01	Extrapolated	Benzo(e)pyr	Benzo(e)pyrene	9.23E-05	mg/kg				S		5.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ253	SRTS07S01	Extrapolated	Benzo(g,h,i)	Benzo(g,h,i)per	1.65E-03	mg/kg				S	4/18/2001	5.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ253	SRTS07S01	Extrapolated	Benzo(k)flu	Benzo(k)fluoran	9.97E-06	mg/kg				S	4/18/2001	5.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ253	SRTS07S01	Extrapolated	Chrysene	Chrysene	8.17E-05	mg/kg				S	4/18/2001	5.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ253	SRTS07S01	Extrapolated	Dibenzo(a,h	Dibenz(a,h)anth	8.25E-05	mg/kg				S	4/18/2001	5.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ253	SRTS07S01	Extrapolated	Fluoranthen	Fluoranthene	2.86E-04	mg/kg				S	4/18/2001	5.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ253	SRTS07S01	Extrapolated	Indeno(1,2,3	Indeno(1,2,3-cd	1.10E-04	mg/kg				S	4/18/2001	5.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ253	SRTS07S01	Extrapolated	Pyrene	Pyrene	1.23E-03	mg/kg				S	4/18/2001	5.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ271	SRTS09S01	Extrapolated	Acenaphthy	Acenaphthylene	5.56E-04	mg/kg				S	4/25/2001	6.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ271	SRTS09S01	Extrapolated	Benzo(a)ant	Benzo(a)anthra	5.68E-05	mg/kg				S	4/25/2001	6.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ271	SRTS09S01	Extrapolated	Benzo(a)pyr	Benzo(a)pyrene	6.99E-05	mg/kg				S	4/25/2001	6.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ271	SRTS09S01	Extrapolated	Benzo(b)flu	Benzo(b)fluoran	3.09E-05	mg/kg				S	4/25/2001	6.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios

Table C7-3
Extrapolated Data
Sodium Reactor Experiment (SRE) Area

EPA_NO	SAMPLE_ID	LAB_METHOD	ANALYTE	STD_ANALYT	CONCENTRAT	UNITS	REV_QUAL	Q_CODE	D_LIMIT	MATRIX	DATE_SAMP	DEPTH	SAMPLE_TYP	UNIT	Scenario
RJ271	SRTS09S01	Extrapolated	Benzo(e)pyr	Benzo(e)pyrene	9.23E-05	mg/kg				S		6.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ271	SRTS09S01	Extrapolated	Benzo(g,h,i)	Benzo(g,h,i)per	3.00E-03	mg/kg				S	4/25/2001	6.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ271	SRTS09S01	Extrapolated	Benzo(k)flu	Benzo(k)fluoran	9.97E-06	mg/kg				S	4/25/2001	6.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ271	SRTS09S01	Extrapolated	Chrysene	Chrysene	8.17E-05	mg/kg				S	4/25/2001	6.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ271	SRTS09S01	Extrapolated	Dibenzo(a,h	Dibenz(a,h)anth	8.25E-05	mg/kg				S	4/25/2001	6.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ271	SRTS09S01	Extrapolated	Fluoranthen	Fluoranthene	2.86E-04	mg/kg				S	4/25/2001	6.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ271	SRTS09S01	Extrapolated	Indeno(1,2,3	Indeno(1,2,3-cd	1.10E-04	mg/kg				S	4/25/2001	6.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ271	SRTS09S01	Extrapolated	Perylene	Perylene	6.46E-05	mg/kg				S		6.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ271	SRTS09S01	Extrapolated	Pyrene	Pyrene	1.23E-03	mg/kg				S	4/25/2001	6.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ398	SRBS30S02	Extrapolated	Acenaphthe	Acenaphthene	2.68E-03	mg/kg				S		7.50000	Primary Sample	Area IV AOC - SRE	Soil in Dry Scenario/Sediment in Wet Scenario
RJ398	SRBS30S02	Extrapolated	Acenaphthy	Acenaphthylene	5.56E-04	mg/kg				S		7.50000	Primary Sample	Area IV AOC - SRE	Soil in Dry Scenario/Sediment in Wet Scenario
RJ398	SRBS30S02	Extrapolated	Anthracene	Anthracene	1.45E-03	mg/kg				S		7.50000	Primary Sample	Area IV AOC - SRE	Soil in Dry Scenario/Sediment in Wet Scenario
RJ398	SRBS30S02	Extrapolated	Benzo(a)ant	Benzo(a)anthra	5.68E-05	mg/kg				S		7.50000	Primary Sample	Area IV AOC - SRE	Soil in Dry Scenario/Sediment in Wet Scenario
RJ398	SRBS30S02	Extrapolated	Benzo(a)pyr	Benzo(a)pyrene	6.99E-05	mg/kg				S		7.50000	Primary Sample	Area IV AOC - SRE	Soil in Dry Scenario/Sediment in Wet Scenario
RJ398	SRBS30S02	Extrapolated	Benzo(b)flu	Benzo(b)fluoran	3.09E-05	mg/kg				S		7.50000	Primary Sample	Area IV AOC - SRE	Soil in Dry Scenario/Sediment in Wet Scenario
RJ398	SRBS30S02	Extrapolated	Benzo(e)pyr	Benzo(e)pyrene	9.23E-05	mg/kg				S		7.50000	Primary Sample	Area IV AOC - SRE	Soil in Dry Scenario/Sediment in Wet Scenario
RJ398	SRBS30S02	Extrapolated	Benzo(g,h,i)	Benzo(g,h,i)per	1.65E-03	mg/kg				S		7.50000	Primary Sample	Area IV AOC - SRE	Soil in Dry Scenario/Sediment in Wet Scenario
RJ398	SRBS30S02	Extrapolated	Benzo(k)flu	Benzo(k)fluoran	9.97E-06	mg/kg				S		7.50000	Primary Sample	Area IV AOC - SRE	Soil in Dry Scenario/Sediment in Wet Scenario
RJ398	SRBS30S02	Extrapolated	Chrysene	Chrysene	8.17E-05	mg/kg				S		7.50000	Primary Sample	Area IV AOC - SRE	Soil in Dry Scenario/Sediment in Wet Scenario
RJ398	SRBS30S02	Extrapolated	Dibenz(a,h)	Dibenz(a,h)anth	8.25E-05	mg/kg				S		7.50000	Primary Sample	Area IV AOC - SRE	Soil in Dry Scenario/Sediment in Wet Scenario
RJ398	SRBS30S02	Extrapolated	Fluoranthen	Fluoranthene	2.86E-04	mg/kg				S		7.50000	Primary Sample	Area IV AOC - SRE	Soil in Dry Scenario/Sediment in Wet Scenario
RJ398	SRBS30S02	Extrapolated	Fluorene	Fluorene	3.62E-03	mg/kg				S		7.50000	Primary Sample	Area IV AOC - SRE	Soil in Dry Scenario/Sediment in Wet Scenario
RJ398	SRBS30S02	Extrapolated	Indeno(1,2,3	Indeno(1,2,3-cd	1.10E-04	mg/kg				S		7.50000	Primary Sample	Area IV AOC - SRE	Soil in Dry Scenario/Sediment in Wet Scenario
RJ398	SRBS30S02	Extrapolated	Perylene	Perylene	6.46E-05	mg/kg				S		7.50000	Primary Sample	Area IV AOC - SRE	Soil in Dry Scenario/Sediment in Wet Scenario
RJ398	SRBS30S02	Extrapolated	Phenanthrer	Phenanthrene	7.00E-03	mg/kg				S		7.50000	Primary Sample	Area IV AOC - SRE	Soil in Dry Scenario/Sediment in Wet Scenario
RJ398	SRBS30S02	Extrapolated	Pyrene	Pyrene	1.23E-03	mg/kg				S		7.50000	Primary Sample	Area IV AOC - SRE	Soil in Dry Scenario/Sediment in Wet Scenario
RJ513	SRBS09S01	Extrapolated	Benzo(a)ant	Benzo(a)anthra	6.53E-04	mg/kg				S	6/30/2000	0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ513	SRBS09S01	Extrapolated	Benzo(a)pyr	Benzo(a)pyrene	8.04E-04	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ513	SRBS09S01	Extrapolated	Benzo(b)flu	Benzo(b)fluoran	3.56E-04	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ513	SRBS09S01	Extrapolated	Benzo(e)pyr	Benzo(e)pyrene	1.06E-03	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ513	SRBS09S01	Extrapolated	Benzo(g,h,i)	Benzo(g,h,i)per	1.89E-02	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ513	SRBS09S01	Extrapolated	Benzo(k)flu	Benzo(k)fluoran	1.15E-04	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ513	SRBS09S01	Extrapolated	Dibenz(a,h)	Dibenz(a,h)anth	9.48E-04	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ513	SRBS09S01	Extrapolated	Indeno(1,2,3	Indeno(1,2,3-cd	1.27E-03	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ513	SRBS09S01	Extrapolated	Perylene	Perylene	7.43E-04	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ516	SRBS10S01	Extrapolated	Benzo(e)pyr	Benzo(e)pyrene	7.98E-03	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ516	SRBS10S01	Extrapolated	Perylene	Perylene	5.59E-03	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ517	SRBS11S01	Extrapolated	Acenaphthy	Acenaphthylene	1.39E-03	mg/kg				S	7/5/2000	0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ517	SRBS11S01	Extrapolated	Benzo(a)ant	Benzo(a)anthra	1.42E-04	mg/kg				S	7/5/2000	0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ517	SRBS11S01	Extrapolated	Benzo(a)pyr	Benzo(a)pyrene	1.75E-04	mg/kg				S	7/5/2000	0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ517	SRBS11S01	Extrapolated	Benzo(e)pyr	Benzo(e)pyrene	2.31E-04	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ517	SRBS11S01	Extrapolated	Benzo(k)flu	Benzo(k)fluoran	2.49E-05	mg/kg				S	7/5/2000	0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ517	SRBS11S01	Extrapolated	Dibenzo(a,h	Dibenz(a,h)anth	2.06E-04	mg/kg				S	7/5/2000	0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ517	SRBS11S01	Extrapolated	Indeno(1,2,3	Indeno(1,2,3-cd	2.75E-04	mg/kg				S	7/5/2000	0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ517	SRBS11S01	Extrapolated	Perylene	Perylene	1.62E-04	mg/kg				S		0.50000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ627	SRTS01S01	Extrapolated	Acenaphthe	Acenaphthene	2.68E-03	mg/kg				S		1.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ627	SRTS01S01	Extrapolated	Acenaphthy	Acenaphthylene	5.56E-04	mg/kg				S		1.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ627	SRTS01S01	Extrapolated	Anthracene	Anthracene	1.45E-03	mg/kg				S		1.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ627	SRTS01S01	Extrapolated	Benzo(a)ant	Benzo(a)anthra	5.68E-05	mg/kg				S		1.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ627	SRTS01S01	Extrapolated	Benzo(a)pyr	Benzo(a)pyrene	6.99E-05	mg/kg				S		1.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ627	SRTS01S01	Extrapolated	Benzo(b)flu	Benzo(b)fluoran	3.09E-05	mg/kg				S		1.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios

Table C7-3
Extrapolated Data
Sodium Reactor Experiment (SRE) Area

EPA_NO	SAMPLE_ID	LAB_METHOD	ANALYTE	STD_ANALYT	CONCENTRAT	UNITS	REV_QUAL	Q_CODE	D_LIMIT	MATRIX	DATE_SAMP	DEPTH	SAMPLE_TYP	UNIT	Scenario
RJ627	SRTS01S01	Extrapolated	Benzo(e)pyr	Benzo(e)pyrene	9.23E-05	mg/kg				S		1.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ627	SRTS01S01	Extrapolated	Benzo(g,h,i)	Benzo(g,h,i)per	1.65E-03	mg/kg				S		1.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ627	SRTS01S01	Extrapolated	Benzo(k)flu	Benzo(k)fluoran	9.97E-06	mg/kg				S		1.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ627	SRTS01S01	Extrapolated	Chrysene	Chrysene	8.17E-05	mg/kg				S		1.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ627	SRTS01S01	Extrapolated	Dibenz(a,h)	Dibenz(a,h)anth	8.25E-05	mg/kg				S		1.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ627	SRTS01S01	Extrapolated	Fluoranthen	Fluoranthene	2.86E-04	mg/kg				S		1.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ627	SRTS01S01	Extrapolated	Fluorene	Fluorene	3.62E-03	mg/kg				S		1.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ627	SRTS01S01	Extrapolated	Indeno(1,2,3	Indeno(1,2,3-cd	1.10E-04	mg/kg				S		1.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ627	SRTS01S01	extrapolated	PCB-105	PCB-105	2.16E-06	mg/kg				S		1.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ627	SRTS01S01	extrapolated	PCB-114	PCB-114	7.94E-08	mg/kg				S		1.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ627	SRTS01S01	extrapolated	PCB-118	PCB-118	4.69E-06	mg/kg				S		1.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ627	SRTS01S01	extrapolated	PCB-123	PCB-123	5.23E-08	mg/kg				S		1.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ627	SRTS01S01	extrapolated	PCB-126	PCB-126	1.32E-07	mg/kg				S		1.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ627	SRTS01S01	extrapolated	PCB-156	PCB-156	1.10E-06	mg/kg				S		1.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ627	SRTS01S01	extrapolated	PCB-157	PCB-157	4.30E-07	mg/kg				S		1.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ627	SRTS01S01	extrapolated	PCB-167	PCB-167	7.48E-07	mg/kg				S		1.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ627	SRTS01S01	extrapolated	PCB-169	PCB-169	1.11E-08	mg/kg				S		1.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ627	SRTS01S01	extrapolated	PCB-189	PCB-189	1.11E-07	mg/kg				S		1.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ627	SRTS01S01	extrapolated	PCB-77	PCB-77	2.71E-07	mg/kg				S		1.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ627	SRTS01S01	extrapolated	PCB-81	PCB-81	5.23E-08	mg/kg				S		1.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ627	SRTS01S01	Extrapolated	Perylene	Perylene	6.46E-05	mg/kg				S		1.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ627	SRTS01S01	Extrapolated	Phenanthre	Phenanthrene	7.00E-03	mg/kg				S		1.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ627	SRTS01S01	Extrapolated	Pyrene	Pyrene	1.23E-03	mg/kg				S		1.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ786	SRBS23S01	Extrapolated	Acenaphthe	Acenaphthene	2.32E-01	mg/kg				S		1.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ786	SRBS23S01	Extrapolated	Acenaphthy	Acenaphthylene	4.81E-02	mg/kg				S		1.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ786	SRBS23S01	Extrapolated	Anthracene	Anthracene	1.25E-01	mg/kg				S		1.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ786	SRBS23S01	Extrapolated	Benzo(a)ant	Benzo(a)anthra	4.91E-03	mg/kg				S		1.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ786	SRBS23S01	Extrapolated	Benzo(a)pyr	Benzo(a)pyrene	6.05E-03	mg/kg				S		1.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ786	SRBS23S01	Extrapolated	Benzo(b)flu	Benzo(b)fluoran	2.67E-03	mg/kg				S		1.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ786	SRBS23S01	Extrapolated	Benzo(e)pyr	Benzo(e)pyrene	7.98E-03	mg/kg				S		1.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ786	SRBS23S01	Extrapolated	Benzo(g,h,i)	Benzo(g,h,i)per	1.43E-01	mg/kg				S		1.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ786	SRBS23S01	Extrapolated	Benzo(k)flu	Benzo(k)fluoran	8.62E-04	mg/kg				S		1.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ786	SRBS23S01	Extrapolated	Chrysene	Chrysene	7.07E-03	mg/kg				S		1.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ786	SRBS23S01	Extrapolated	Dibenz(a,h)	Dibenz(a,h)anth	7.13E-03	mg/kg				S		1.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ786	SRBS23S01	Extrapolated	Fluoranthen	Fluoranthene	2.48E-02	mg/kg				S		1.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ786	SRBS23S01	Extrapolated	Fluorene	Fluorene	3.13E-01	mg/kg				S		1.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ786	SRBS23S01	Extrapolated	Indeno(1,2,3	Indeno(1,2,3-cd	9.53E-03	mg/kg				S		1.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ786	SRBS23S01	extrapolated	PCB-105	PCB-105	7.42E-06	mg/kg				S		1.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ786	SRBS23S01	extrapolated	PCB-114	PCB-114	2.72E-07	mg/kg				S		1.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ786	SRBS23S01	extrapolated	PCB-118	PCB-118	1.61E-05	mg/kg				S		1.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ786	SRBS23S01	extrapolated	PCB-123	PCB-123	1.79E-07	mg/kg				S		1.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ786	SRBS23S01	extrapolated	PCB-126	PCB-126	4.52E-07	mg/kg				S		1.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ786	SRBS23S01	extrapolated	PCB-156	PCB-156	3.77E-06	mg/kg				S		1.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ786	SRBS23S01	extrapolated	PCB-157	PCB-157	7.42E-07	mg/kg				S		1.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ786	SRBS23S01	extrapolated	PCB-167	PCB-167	1.24E-06	mg/kg				S		1.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ786	SRBS23S01	extrapolated	PCB-169	PCB-169	2.20E-08	mg/kg				S		1.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ786	SRBS23S01	extrapolated	PCB-189	PCB-189	1.79E-07	mg/kg				S		1.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ786	SRBS23S01	extrapolated	PCB-77	PCB-77	9.28E-07	mg/kg				S		1.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ786	SRBS23S01	extrapolated	PCB-81	PCB-81	1.79E-07	mg/kg				S		1.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ786	SRBS23S01	Extrapolated	Perylene	Perylene	5.59E-03	mg/kg				S		1.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ786	SRBS23S01	Extrapolated													

Table C7-3
Extrapolated Data
Sodium Reactor Experiment (SRE) Area

EPA_NO	SAMPLE_ID	LAB_METHOD	ANALYTE	STD_ANALYT	CONCENTRAT	UNITS	REV_QUAL	Q_CODE	D_LIMIT	MATRIX	DATE_SAMP	DEPTH	SAMPLE_TYP	UNIT	Scenario
RJ786	SRBS23S01	Extrapolated	Pyrene	Pyrene	1.06E-01	mg/kg				S		1.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ788	SRTS02S01	Extrapolated	Benzo(e)pyr	Benzo(e)pyrene	2.24E-03	mg/kg				S		4.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ788	SRTS02S01	Extrapolated	Chrysene	Chrysene	1.98E-03	mg/kg				S	11/2/2000	4.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ788	SRTS02S01	Extrapolated	Perylene	Perylene	1.57E-03	mg/kg				S		4.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ790	SRTS02S02	Extrapolated	Acenaphthy	Acenaphthylene	3.40E-02	mg/kg				S	11/2/2000	4.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ790	SRTS02S02	Extrapolated	Benzo(e)pyr	Benzo(e)pyrene	5.64E-03	mg/kg				S		4.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ790	SRTS02S02	Extrapolated	Perylene	Perylene	3.95E-03	mg/kg				S		4.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ842	SRBS22S02	Extrapolated	Acenaphthe	Acenaphthene	2.68E-03	mg/kg				S		8.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ842	SRBS22S02	Extrapolated	Acenaphthy	Acenaphthylene	5.56E-04	mg/kg				S		8.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ842	SRBS22S02	Extrapolated	Anthracene	Anthracene	1.45E-03	mg/kg				S		8.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ842	SRBS22S02	Extrapolated	Benzo(a)ant	Benzo(a)anthra	5.68E-05	mg/kg				S		8.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ842	SRBS22S02	Extrapolated	Benzo(a)pyr	Benzo(a)pyrene	6.99E-05	mg/kg				S		8.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ842	SRBS22S02	Extrapolated	Benzo(b)flu	Benzo(b)fluoran	3.09E-05	mg/kg				S		8.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ842	SRBS22S02	Extrapolated	Benzo(e)pyr	Benzo(e)pyrene	9.23E-05	mg/kg				S		8.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ842	SRBS22S02	Extrapolated	Benzo(g,h,i)	Benzo(g,h,i)per	1.65E-03	mg/kg				S		8.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ842	SRBS22S02	Extrapolated	Benzo(k)flu	Benzo(k)fluoran	9.97E-06	mg/kg				S		8.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ842	SRBS22S02	Extrapolated	Chrysene	Chrysene	8.17E-05	mg/kg				S		8.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ842	SRBS22S02	Extrapolated	Dibenz(a,h)	Dibenz(a,h)anth	8.25E-05	mg/kg				S		8.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ842	SRBS22S02	Extrapolated	Fluoranthen	Fluoranthene	2.86E-04	mg/kg				S		8.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ842	SRBS22S02	Extrapolated	Fluorene	Fluorene	3.62E-03	mg/kg				S		8.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ842	SRBS22S02	Extrapolated	Indeno(1,2,3	Indeno(1,2,3-cc	1.10E-04	mg/kg				S		8.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ842	SRBS22S02	Extrapolated	Perylene	Perylene	6.46E-05	mg/kg				S		8.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ842	SRBS22S02	Extrapolated	Phenanthre	Phenanthrene	7.00E-03	mg/kg				S		8.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios
RJ842	SRBS22S02	Extrapolated	Pyrene	Pyrene	1.23E-03	mg/kg				S		8.00000	Primary Sample	Area IV AOC - SRE	Dry Soil in Both Scenarios

APPENDIX C8

ALL RISK ASSESSMENT CALCULATION TABLES
(ELECTRONIC COPY)

APPENDIX C, ATTACHMENT C8

NCY Risk Assessment Calculation Tables

Parameter Values Used for EPV and ADD Calculations
New Conservation Yard RFI Site

Species[a]	Fraction of Prey Item (unitless)				Body Weight	Food Intake Rate	Area Use[c]	Seasonality[c]	Lifespan	Inhalation Rate[d]	Fraction of Time Spent in Burrow[c]
	Terrestrial plants	Terrestrial Invertebrates	Terrestrial vertebrate	Incidental soil	(kg)	(kg/day)	(fraction)	(percent)	(year)	(m^3/day)	(percent)
Earthworm	0	0	0	1	NA	NA	NA	NA	NA	NA	NA
Deer mouse	0.70	0.30	0	0.020	0.018	0.0038	1	1	1.6	0.024	0.75
Thrush [b]	0.39 b	0.61 b	0	0.040	0.029	0.0063	1	1	1.4 b	NA	NA
Hawk	0	0	1	0	1.22	0.095	1	1	NA	NA	NA
Bobcat	0	0	1	0	10	0.33	1	1	NA	NA	NA
Mule deer[e]	1	0	0	0.02	39.1	1.6	1	1	NA	NA	NA

Notes:
a. Reference receptor species used for food chain model
b. Values for the thrush are estimated based on American robin
c. Value based on SRAM or professional judgment
d. Average of male and female values from U.S. EPA Wildlife Exposure Factors Handbook
e. Body weight from Nagy, 2001
kg - kilogram
kg/day - kilograms per day
cm^2 - square centimeters
m^3/day - cubic meters per day
NA - not applicable
EPV- exposure point values
ADD- applied daily dosage

Applied Daily Dose for the Mule Deer
Ingestion Exposure Route

New Conservation Yard RFI Site

Chemical	Soil Exposure Point Concentration [a]		EPV in Terrestrial Plants[b]		Applied Daily Dose	
	CTE	RME	CTE	RME	CTE	RME
	(mg/kg)		(mg/kg)		(mg/kg-day)	
Inorganic Compounds						
Antimony	5.6E+00	6.0E+00	3.0E+01	3.2E+01	1.2E+00	1.3E+00
Barium	2.2E+02	9.6E+02	2.2E+02	9.6E+02	8.9E+00	3.9E+01
Cadmium	1.8E+00	1.3E+01	1.9E+01	1.4E+02	7.8E-01	5.8E+00
Chromium	2.3E+01	4.1E+01	2.2E+02	3.8E+02	8.8E+00	1.5E+01
Copper	2.9E+01	8.2E+01	5.4E+01	1.5E+02	2.2E+00	6.2E+00
Lead	2.6E+01	3.5E+01	5.5E+01	7.5E+01	2.2E+00	3.0E+00
Mercury	1.2E-01	6.4E-01	1.0E-01	5.3E-01	4.1E-03	2.2E-02
Molybdenum	3.4E+00	6.0E+00	4.6E+01	8.1E+01	1.8E+00	3.3E+00
Nickel	2.2E+01	5.7E+01	1.7E+02	4.4E+02	6.9E+00	1.8E+01
Selenium	1.7E+00	3.0E+00	1.7E+00	3.0E+00	6.8E-02	1.2E-01
Silver	1.5E+01	9.6E+01	2.6E+01	1.6E+02	1.1E+00	6.6E+00
Zinc	5.4E+02	2.8E+03	8.8E+02	4.5E+03	3.6E+01	1.8E+02
VOCs						
Toluene	5.3E-02	1.1E-01	5.3E-02	1.1E-01	2.2E-03	4.5E-03
SVOCs						
Benzo(a)anthracene	3.6E-02	1.2E-02	1.9E-01	6.3E-02	7.7E-03	2.5E-03
Benzo(a)pyrene	4.0E-02	4.3E-02	4.0E-02	4.3E-02	1.6E-03	1.8E-03
Benzo(b)fluoranthene	4.3E-02	6.5E-02	4.3E-02	6.5E-02	1.8E-03	2.7E-03
Benzo(g,h,i)perylene	3.9E-02	3.1E-02	3.9E-02	3.1E-02	1.6E-03	1.3E-03
Benzo(k)fluoranthene	3.6E-02	1.2E-02	3.6E-02	1.2E-02	1.5E-03	4.9E-04
Chrysene	4.0E-02	2.7E-02	1.1E-01	7.5E-02	4.4E-03	3.0E-03
Dibenz(a,h)anthracene	3.6E-02	8.0E-03	3.6E-02	8.0E-03	1.5E-03	3.3E-04
Fluoranthene	4.3E-02	3.6E-02	1.2E-01	1.0E-01	4.9E-03	4.1E-03
Indeno(1,2,3-cd)pyrene	4.1E-02	5.3E-02	4.1E-02	5.3E-02	1.7E-03	2.2E-03
Phenanthrene	3.7E-02	1.4E-02	2.6E-01	1.0E-01	1.1E-02	4.0E-03
Pyrene	4.3E-02	4.3E-02	8.1E-02	8.2E-02	3.3E-03	3.3E-03
PCDD/PCDFs						
2,3,7,8-TCDD	5.6E-06	3.4E-05	5.6E-06	3.4E-05	2.3E-07	1.4E-06
1,2,3,7,8-PeCDD	1.6E-05	9.0E-05	1.6E-05	9.0E-05	6.6E-07	3.7E-06
1,2,3,4,7,8-HxCDD	4.1E-05	1.0E-04	4.1E-05	1.0E-04	1.7E-06	4.2E-06

Applied Daily Dose for the Mule Deer
Ingestion Exposure Route

New Conservation Yard RFI Site

Chemical	Soil Exposure Point Concentration [a]		EPV in Terrestrial Plants[b]		Applied Daily Dose	
	CTE	RME	CTE	RME	CTE	RME
	(mg/kg)		(mg/kg)		(mg/kg-day)	
1,2,3,6,7,8-HxCDD	2.0E-04	5.4E-04	3.3E-05	8.7E-05	1.5E-06	3.9E-06
1,2,3,7,8,9-HxCDD	7.1E-05	4.7E-04	7.1E-05	4.7E-04	2.9E-06	1.9E-05
1,2,3,4,6,7,8-HpCDD	4.7E-03	1.2E-02	1.5E-03	3.9E-03	6.5E-05	1.6E-04
OCDD	5.4E-02	1.4E-01	1.3E-02	3.2E-02	5.5E-04	1.4E-03
2,3,7,8-TCDF	3.1E-06	5.7E-06	3.1E-06	5.7E-06	1.3E-07	2.3E-07
1,2,3,7,8-PeCDF	3.6E-06	1.0E-05	3.6E-06	1.0E-05	1.5E-07	4.1E-07
2,3,4,7,8-PeCDF	8.8E-06	1.7E-05	8.8E-06	1.7E-05	3.6E-07	7.1E-07
1,2,3,4,7,8-HxCDF	2.7E-05	6.3E-05	2.7E-05	6.3E-05	1.1E-06	2.6E-06
1,2,3,6,7,8-HxCDF	2.1E-05	4.9E-05	2.1E-05	4.9E-05	8.5E-07	2.0E-06
2,3,4,6,7,8-HxCDF	4.3E-05	1.1E-04	4.3E-05	1.1E-04	1.8E-06	4.3E-06
1,2,3,7,8,9-HxCDF	6.9E-06	1.4E-05	6.9E-06	1.4E-05	2.8E-07	5.8E-07
1,2,3,4,6,7,8-HpCDF	7.7E-04	2.0E-03	1.7E-04	4.5E-04	7.6E-06	2.0E-05
1,2,3,4,7,8,9-HpCDF	7.2E-05	1.8E-04	7.2E-05	1.8E-04	3.0E-06	7.4E-06
OCDF	2.0E-03	5.1E-03	6.7E-04	1.7E-03	2.9E-05	7.2E-05
PCBs						
Aroclor-1254	7.1E-02	7.1E-02	7.1E-02	7.1E-02	2.9E-03	2.9E-03
PCB-105	1.5E-05	2.1E-05	5.1E-05	7.0E-05	2.1E-06	2.8E-06
PCB-114	5.7E-07	7.7E-07	2.1E-06	2.9E-06	8.4E-08	1.1E-07
PCB-118	3.4E-05	4.6E-05	1.1E-04	1.4E-04	4.3E-06	5.8E-06
PCB-123	3.7E-07	5.1E-07	1.3E-06	1.7E-06	5.1E-08	7.0E-08
PCB-126	9.4E-07	1.3E-06	2.1E-06	2.9E-06	8.5E-08	1.2E-07
PCB-156	7.9E-06	1.1E-05	2.0E-05	2.7E-05	7.9E-07	1.1E-06
PCB-157	2.6E-06	2.7E-06	6.7E-06	7.2E-06	2.7E-07	2.9E-07
PCB-167	4.4E-06	4.7E-06	1.2E-05	1.3E-05	4.9E-07	5.3E-07
PCB-169	6.8E-08	7.5E-08	6.8E-08	7.5E-08	2.8E-09	3.0E-09
PCB-189	6.5E-07	7.0E-07	1.4E-06	1.5E-06	5.7E-08	6.1E-08
PCB-77	1.9E-06	2.6E-06	4.7E-06	6.4E-06	1.9E-07	2.6E-07
PCB-81	3.7E-07	5.1E-07	1.1E-06	1.5E-06	4.5E-08	6.2E-08

Notes:

a. Exposure point concentration (EPC) for soil 0 to 2 feet bgs, from Spreadsheet C1-90.

b. Terrestrial plant exposure point values were estimated by application of site-specific bioaccumulation factors (BAFs) to soil exposure point concentration when available, or by application of a BAF of 1 when site-specific BAFs were not available.

Applied Daily Dose for the Mule Deer
Ingestion Exposure Route

New Conservation Yard RFI Site

Chemical	Soil Exposure Point Concentration [a]		EPV in Terrestrial Plants[b]		Applied Daily Dose	
	CTE	RME	CTE	RME	CTE	RME
	(mg/kg)		(mg/kg)		(mg/kg-day)	

CTE - central tendancy exposure
RME - reasonable maximum exposure
EPV - exposure point value
NC - not selected as a CPEC in the indicated media, per the SRAM (MWH 2005).
CPEC - chemical of potential ecological concern
VOC - volatile organic compund
SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyls
"-" not applicable
mg/kg - milligram per kilogram
mg/kg-day - milligram per kilogram per day

Applied Daily Dose for the Bobcat
Ingestion Exposure Route
New Conservation Yard RFI Site

Chemical	Soil Exposure Point Concentration [a]		EPV in Deer Mouse[b]		Applied Daily Dose	
	CTE	RME	CTE	RME	CTE	RME
	(mg/kg)		(mg/kg)		(mg/kg-day)	
Inorganic Compounds						
Antimony	5.6E+00	6.0E+00	3.2E+00	3.5E+00	1.1E-01	1.2E-01
Barium	2.2E+02	9.6E+02	7.8E+01	3.4E+02	2.6E+00	1.1E+01
Cadmium	1.8E+00	1.3E+01	1.8E+00	1.3E+01	6.0E-02	4.4E-01
Chromium	2.3E+01	4.1E+01	3.4E+00	5.9E+00	1.1E-01	2.0E-01
Copper	2.9E+01	8.2E+01	2.2E+01	6.2E+01	7.2E-01	2.1E+00
Lead	2.6E+01	3.5E+01	2.6E+01	3.5E+01	8.5E-01	1.2E+00
Mercury	1.2E-01	6.4E-01	1.2E-01	6.4E-01	4.1E-03	2.1E-02
Molybdenum	3.4E+00	6.0E+00	9.8E+00	1.7E+01	3.2E-01	5.8E-01
Nickel	2.2E+01	5.7E+01	2.7E+00	7.0E+00	9.0E-02	2.3E-01
Selenium	1.7E+00	3.0E+00	9.7E+00	1.7E+01	3.2E-01	5.8E-01
Silver	1.5E+01	9.6E+01	1.5E+01	9.6E+01	5.1E-01	3.2E+00
Zinc	5.4E+02	2.8E+03	1.9E+03	9.7E+03	6.3E+01	3.2E+02
VOCs						
Toluene	5.3E-02	1.1E-01	5.3E-02	1.1E-01	1.8E-03	3.6E-03
SVOCs						
Benzo(a)anthracene	3.6E-02	1.2E-02	5.9E-01	1.9E-01	1.9E-02	6.4E-03
Benzo(a)pyrene	4.0E-02	4.3E-02	2.4E-01	2.6E-01	7.8E-03	8.5E-03
Benzo(b)fluoranthene	4.3E-02	6.5E-02	2.3E-01	3.4E-01	7.5E-03	1.1E-02
Benzo(g,h,i)perylene	3.9E-02	3.1E-02	1.8E-01	1.4E-01	5.8E-03	4.6E-03
Benzo(k)fluoranthene	3.6E-02	1.2E-02	2.8E-01	9.4E-02	9.4E-03	3.1E-03
Chrysene	4.0E-02	2.7E-02	2.5E-01	1.7E-01	8.4E-03	5.7E-03
Dibenz(a,h)anthracene	3.6E-02	8.0E-03	5.9E-01	1.3E-01	2.0E-02	4.4E-03
Fluoranthene	4.3E-02	3.6E-02	1.0E-01	8.4E-02	3.3E-03	2.8E-03
Indeno(1,2,3-cd)pyrene	4.1E-02	5.3E-02	3.0E-01	3.8E-01	9.8E-03	1.3E-02
Phenanthrene	3.7E-02	1.4E-02	1.2E-01	4.7E-02	4.1E-03	1.6E-03
Pyrene	4.3E-02	4.3E-02	1.5E-01	1.6E-01	5.1E-03	5.2E-03
PCDD/PCDFs						
2,3,7,8-TCDD	5.6E-06	3.4E-05	5.6E-06	3.4E-05	1.9E-07	1.1E-06
1,2,3,7,8-PeCDD	1.6E-05	9.0E-05	1.6E-05	9.0E-05	5.4E-07	3.0E-06
1,2,3,4,7,8-HxCDD	4.1E-05	1.0E-04	9.7E-06	2.5E-05	3.2E-07	8.2E-07

Applied Daily Dose for the Bobcat
Ingestion Exposure Route
New Conservation Yard RFI Site

Chemical	Soil Exposure Point Concentration [a]		EPV in Deer Mouse[b]		Applied Daily Dose	
	CTE	RME	CTE	RME	CTE	RME
	(mg/kg)		(mg/kg)		(mg/kg-day)	
1,2,3,6,7,8-HxCDD	2.0E-04	5.4E-04	4.3E-05	1.2E-04	1.4E-06	3.8E-06
1,2,3,7,8,9-HxCDD	7.1E-05	4.7E-04	1.3E-05	8.4E-05	4.2E-07	2.8E-06
1,2,3,4,6,7,8-HpCDD	4.7E-03	1.2E-02	1.4E-03	3.4E-03	4.5E-05	1.1E-04
OCDD	5.4E-02	1.4E-01	1.2E-02	2.9E-02	3.9E-04	9.7E-04
2,3,7,8-TCDF	3.1E-06	5.7E-06	5.8E-07	1.1E-06	1.9E-08	3.5E-08
1,2,3,7,8-PeCDF	3.6E-06	1.0E-05	3.6E-06	1.0E-05	1.2E-07	3.3E-07
2,3,4,7,8-PeCDF	8.8E-06	1.7E-05	3.9E-06	7.7E-06	1.3E-07	2.5E-07
1,2,3,4,7,8-HxCDF	2.7E-05	6.3E-05	2.2E-06	5.1E-06	7.3E-08	1.7E-07
1,2,3,6,7,8-HxCDF	2.1E-05	4.9E-05	1.4E-05	3.2E-05	4.5E-07	1.1E-06
2,3,4,6,7,8-HxCDF	4.3E-05	1.1E-04	2.3E-05	5.7E-05	7.7E-07	1.9E-06
1,2,3,7,8,9-HxCDF	6.9E-06	1.4E-05	6.9E-06	1.4E-05	2.3E-07	4.7E-07
1,2,3,4,6,7,8-HpCDF	7.7E-04	2.0E-03	3.3E-04	8.6E-04	1.1E-05	2.9E-05
1,2,3,4,7,8,9-HpCDF	7.2E-05	1.8E-04	7.2E-05	1.8E-04	2.4E-06	6.0E-06
OCDF	2.0E-03	5.1E-03	1.9E-03	4.8E-03	6.3E-05	1.6E-04
PCBs						
Aroclor-1254	7.1E-02	7.1E-02	7.1E-02	7.1E-02	2.4E-03	2.4E-03
PCB-105	1.5E-05	2.1E-05	4.2E-05	5.7E-05	1.4E-06	1.9E-06
PCB-114	5.7E-07	7.7E-07	3.7E-06	5.1E-06	1.2E-07	1.7E-07
PCB-118	3.4E-05	4.6E-05	9.4E-05	1.3E-04	3.1E-06	4.3E-06
PCB-123	3.7E-07	5.1E-07	1.3E-06	1.7E-06	4.2E-08	5.7E-08
PCB-126	9.4E-07	1.3E-06	1.7E-06	2.4E-06	5.8E-08	7.9E-08
PCB-156	7.9E-06	1.1E-05	3.1E-05	4.2E-05	1.0E-06	1.4E-06
PCB-157	2.6E-06	2.7E-06	6.8E-05	7.3E-05	2.3E-06	2.4E-06
PCB-167	4.4E-06	4.7E-06	2.2E-05	2.3E-05	7.1E-07	7.6E-07
PCB-169	6.8E-08	7.5E-08	6.8E-08	7.5E-08	2.3E-09	2.5E-09
PCB-189	6.5E-07	7.0E-07	4.6E-06	4.9E-06	1.5E-07	1.6E-07
PCB-77	1.9E-06	2.6E-06	1.5E-06	2.0E-06	4.9E-08	6.7E-08
PCB-81	3.7E-07	5.1E-07	3.7E-07	5.1E-07	1.2E-08	1.7E-08

Notes:

a. Exposure point concentration (EPC) for soil 0 to 2 feet bgs, from Spreadsheet C1-90.

b. Deer mouse exposure point values were estimated by application of site-specific bioaccumulation factors (BAFs) to soil exposure point concentration when available, or by application of a BAF of 1 when site-specific BAFs were not available.

CTE - central tendancy exposure

Applied Daily Dose for the Bobcat
Ingestion Exposure Route
New Conservation Yard RFI Site

Chemical	Soil Exposure Point Concentration [a]		EPV in Deer Mouse[b]		Applied Daily Dose	
	CTE	RME	CTE	RME	CTE	RME
	(mg/kg)		(mg/kg)		(mg/kg-day)	

RME - reasonable maximum exposure
NC - not selected as a CPEC in the indicated media, per the SRAM (MWH 2005).
EPV - exposure point value
CPEC - chemical of potential ecological concern
VOC - volatile organic compund
SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyls
"-" not applicable
mg/kg - milligram per kilogram
mg/kg-day - milligram per kilogram per day

Applied Daily Dose for the Hawk
Ingestion Exposure Route
New Conservation Yard RFI Site

Chemical	Soil Exposure Point Concentration [a]		EPV in Deer Mouse[b]		Applied Daily Dose	
	CTE	RME	CTE	RME	CTE	RME
	(mg/kg)		(mg/kg)		(mg/kg-day)	
Inorganic Compounds						
Antimony	5.6E+00	6.0E+00	3.2E+00	3.5E+00	2.5E-01	2.7E-01
Barium	2.2E+02	9.6E+02	7.8E+01	3.4E+02	6.0E+00	2.6E+01
Cadmium	1.8E+00	1.3E+01	1.8E+00	1.3E+01	1.4E-01	1.0E+00
Chromium	2.3E+01	4.1E+01	3.4E+00	5.9E+00	2.6E-01	4.6E-01
Copper	2.9E+01	8.2E+01	2.2E+01	6.2E+01	1.7E+00	4.8E+00
Lead	2.6E+01	3.5E+01	2.6E+01	3.5E+01	2.0E+00	2.7E+00
Mercury	1.2E-01	6.4E-01	1.2E-01	6.4E-01	9.5E-03	5.0E-02
Molybdenum	3.4E+00	6.0E+00	9.8E+00	1.7E+01	7.6E-01	1.4E+00
Nickel	2.2E+01	5.7E+01	2.7E+00	7.0E+00	2.1E-01	5.4E-01
Selenium	1.7E+00	3.0E+00	9.7E+00	1.7E+01	7.5E-01	1.3E+00
Silver	1.5E+01	9.6E+01	1.5E+01	9.6E+01	1.2E+00	7.4E+00
Zinc	5.4E+02	2.8E+03	1.9E+03	9.7E+03	1.5E+02	7.5E+02
VOCs						
Toluene	5.3E-02	1.1E-01	5.3E-02	1.1E-01	4.1E-03	8.5E-03
SVOCs						
Benzo(a)anthracene	3.6E-02	1.2E-02	5.9E-01	1.9E-01	4.5E-02	1.5E-02
Benzo(a)pyrene	4.0E-02	4.3E-02	2.4E-01	2.6E-01	1.8E-02	2.0E-02
Benzo(b)fluoranthene	4.3E-02	6.5E-02	2.3E-01	3.4E-01	1.8E-02	2.6E-02
Benzo(g,h,i)perylene	3.9E-02	3.1E-02	1.8E-01	1.4E-01	1.4E-02	1.1E-02
Benzo(k)fluoranthene	3.6E-02	1.2E-02	2.8E-01	9.4E-02	2.2E-02	7.2E-03
Chrysene	4.0E-02	2.7E-02	2.5E-01	1.7E-01	1.9E-02	1.3E-02
Dibenz(a,h)anthracene	3.6E-02	8.0E-03	5.9E-01	1.3E-01	4.6E-02	1.0E-02
Fluoranthene	4.3E-02	3.6E-02	1.0E-01	8.4E-02	7.7E-03	6.5E-03
Indeno(1,2,3-cd)pyrene	4.1E-02	5.3E-02	3.0E-01	3.8E-01	2.3E-02	3.0E-02
Phenanthrene	3.7E-02	1.4E-02	1.2E-01	4.7E-02	9.5E-03	3.6E-03
Pyrene	4.3E-02	4.3E-02	1.5E-01	1.6E-01	1.2E-02	1.2E-02
PCDD/PCDFs						
2,3,7,8-TCDD	5.6E-06	3.4E-05	5.6E-06	3.4E-05	4.3E-07	2.7E-06
1,2,3,7,8-PeCDD	1.6E-05	9.0E-05	1.6E-05	9.0E-05	1.3E-06	7.0E-06
1,2,3,4,7,8-HxCDD	4.1E-05	1.0E-04	9.7E-06	2.5E-05	7.5E-07	1.9E-06

Applied Daily Dose for the Hawk
Ingestion Exposure Route
New Conservation Yard RFI Site

Chemical	Soil Exposure Point Concentration [a]		EPV in Deer Mouse[b]		Applied Daily Dose	
	CTE	RME	CTE	RME	CTE	RME
	(mg/kg)		(mg/kg)		(mg/kg-day)	
1,2,3,6,7,8-HxCDD	2.0E-04	5.4E-04	4.3E-05	1.2E-04	3.3E-06	8.9E-06
1,2,3,7,8,9-HxCDD	7.1E-05	4.7E-04	1.3E-05	8.4E-05	9.8E-07	6.5E-06
1,2,3,4,6,7,8-HpCDD	4.7E-03	1.2E-02	1.4E-03	3.4E-03	1.0E-04	2.7E-04
OCDD	5.4E-02	1.4E-01	1.2E-02	2.9E-02	9.0E-04	2.3E-03
2,3,7,8-TCDF	3.1E-06	5.7E-06	5.8E-07	1.1E-06	4.5E-08	8.2E-08
1,2,3,7,8-PeCDF	3.6E-06	1.0E-05	3.6E-06	1.0E-05	2.8E-07	7.7E-07
2,3,4,7,8-PeCDF	8.8E-06	1.7E-05	3.9E-06	7.7E-06	3.0E-07	5.9E-07
1,2,3,4,7,8-HxCDF	2.7E-05	6.3E-05	2.2E-06	5.1E-06	1.7E-07	4.0E-07
1,2,3,6,7,8-HxCDF	2.1E-05	4.9E-05	1.4E-05	3.2E-05	1.1E-06	2.5E-06
2,3,4,6,7,8-HxCDF	4.3E-05	1.1E-04	2.3E-05	5.7E-05	1.8E-06	4.4E-06
1,2,3,7,8,9-HxCDF	6.9E-06	1.4E-05	6.9E-06	1.4E-05	5.3E-07	1.1E-06
1,2,3,4,6,7,8-HpCDF	7.7E-04	2.0E-03	3.3E-04	8.6E-04	2.6E-05	6.7E-05
1,2,3,4,7,8,9-HpCDF	7.2E-05	1.8E-04	7.2E-05	1.8E-04	5.6E-06	1.4E-05
OCDF	2.0E-03	5.1E-03	1.9E-03	4.8E-03	1.5E-04	3.7E-04
PCBs						
Aroclor-1254	7.1E-02	7.1E-02	7.1E-02	7.1E-02	5.5E-03	5.5E-03
PCB-105	1.5E-05	2.1E-05	4.2E-05	5.7E-05	3.2E-06	4.4E-06
PCB-114	5.7E-07	7.7E-07	3.7E-06	5.1E-06	2.9E-07	3.9E-07
PCB-118	3.4E-05	4.6E-05	9.4E-05	1.3E-04	7.3E-06	9.9E-06
PCB-123	3.7E-07	5.1E-07	1.3E-06	1.7E-06	9.8E-08	1.3E-07
PCB-126	9.4E-07	1.3E-06	1.7E-06	2.4E-06	1.3E-07	1.8E-07
PCB-156	7.9E-06	1.1E-05	3.1E-05	4.2E-05	2.4E-06	3.3E-06
PCB-157	2.6E-06	2.7E-06	6.8E-05	7.3E-05	5.3E-06	5.6E-06
PCB-167	4.4E-06	4.7E-06	2.2E-05	2.3E-05	1.7E-06	1.8E-06
PCB-169	6.8E-08	7.5E-08	6.8E-08	7.5E-08	5.3E-09	5.8E-09
PCB-189	6.5E-07	7.0E-07	4.6E-06	4.9E-06	3.6E-07	3.8E-07
PCB-77	1.9E-06	2.6E-06	1.5E-06	2.0E-06	1.1E-07	1.6E-07
PCB-81	3.7E-07	5.1E-07	3.7E-07	5.1E-07	2.9E-08	3.9E-08

Notes:

a. Exposure point concentration (EPC) for soil 0 to 2 feet bgs, from Spreadsheet C1-90.

b. Deer mouse exposure point values were estimated by application of site-specific bioaccumulation factors (BAFs) to soil exposure point concentration when available, or by application of a BAF of 1 when site-specific BAFs were not available.

CTE - central tendancy exposure

Applied Daily Dose for the Hawk
Ingestion Exposure Route
New Conservation Yard RFI Site

Chemical	Soil Exposure Point Concentration [a]		EPV in Deer Mouse[b]		Applied Daily Dose	
	CTE	RME	CTE	RME	CTE	RME
	(mg/kg)		(mg/kg)		(mg/kg-day)	

RME - reasonable maximum exposure
EPV - exposure point value
VOC - volatile organic compund
SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyls
"-" not applicable
mg/kg - milligram per kilogram
mg/kg-day - milligram per kilogram per day

Applied Daily Dose for the Thrush
Ingestion Exposure Route
New Conservation Yard RFI Site

Chemical	Soil Exposure Point Concentration [a]		EPV in Earthworms[b]		EPV in Terrestrial Plants[b]		Applied Daily Dose	
	CTE	RME	CTE	RME	CTE	RME	CTE	RME
	(mg/kg)		(mg/kg)		(mg/kg)		(mg/kg-day)	
Inorganic Compounds								
Antimony	5.6E+00	6.0E+00	4.3E+01	4.7E+01	3.0E+01	3.2E+01	8.3E+00	9.0E+00
Barium	2.2E+02	9.6E+02	6.1E+02	2.7E+03	2.2E+02	9.6E+02	1.0E+02	4.4E+02
Cadmium	1.8E+00	1.3E+01	3.5E+01	2.6E+02	1.9E+01	1.4E+02	6.3E+00	4.7E+01
Chromium	2.3E+01	4.1E+01	5.6E+01	9.9E+01	2.2E+02	3.8E+02	2.6E+01	4.6E+01
Copper	2.9E+01	8.2E+01	4.2E+02	1.2E+03	5.4E+01	1.5E+02	6.1E+01	1.7E+02
Lead	2.6E+01	3.5E+01	6.2E+00	8.5E+00	5.5E+01	7.5E+01	5.7E+00	7.7E+00
Mercury	1.2E-01	6.4E-01	4.0E-01	2.1E+00	1.0E-01	5.3E-01	6.3E-02	3.3E-01
Molybdenum	3.4E+00	6.0E+00	2.0E+01	3.5E+01	4.6E+01	8.1E+01	6.5E+00	1.2E+01
Nickel	2.2E+01	5.7E+01	4.7E+01	1.2E+02	1.7E+02	4.4E+02	2.1E+01	5.3E+01
Selenium	1.7E+00	3.0E+00	3.1E+00	5.5E+00	1.7E+00	3.0E+00	5.6E-01	1.0E+00
Silver	1.5E+01	9.6E+01	1.0E+02	6.4E+02	2.6E+01	1.6E+02	1.6E+01	9.9E+01
Zinc	5.4E+02	2.8E+03	1.7E+03	8.7E+03	8.8E+02	4.5E+03	3.0E+02	1.6E+03
VOCs								
Toluene	5.3E-02	1.1E-01	5.3E-02	1.1E-01	5.3E-02	1.1E-01	1.2E-02	2.5E-02
SVOCs								
Benzo(a)anthracene	3.6E-02	1.2E-02	6.9E-02	2.3E-02	1.9E-01	6.3E-02	2.6E-02	8.4E-03
Benzo(a)pyrene	4.0E-02	4.3E-02	4.0E-02	4.3E-02	4.0E-02	4.3E-02	8.9E-03	9.7E-03
Benzo(b)fluoranthene	4.3E-02	6.5E-02	8.9E-02	1.3E-01	4.3E-02	6.5E-02	1.6E-02	2.4E-02
Benzo(g,h,i)perylene	3.9E-02	3.1E-02	2.1E-02	1.6E-02	3.9E-02	3.1E-02	6.4E-03	5.1E-03
Benzo(k)fluoranthene	3.6E-02	1.2E-02	3.3E-02	1.1E-02	3.6E-02	1.2E-02	7.7E-03	2.5E-03
Chrysene	4.0E-02	2.7E-02	7.4E-02	5.0E-02	1.1E-01	7.5E-02	1.9E-02	1.3E-02
Dibenz(a,h)anthracene	3.6E-02	8.0E-03	3.6E-02	8.0E-03	3.6E-02	8.0E-03	8.1E-03	1.8E-03
Fluoranthene	4.3E-02	3.6E-02	3.9E-02	3.3E-02	1.2E-01	1.0E-01	1.6E-02	1.3E-02
Indeno(1,2,3-cd)pyrene	4.1E-02	5.3E-02	3.5E-02	4.5E-02	4.1E-02	5.3E-02	8.5E-03	1.1E-02
Phenanthrene	3.7E-02	1.4E-02	6.8E-02	2.6E-02	2.6E-01	1.0E-01	3.2E-02	1.2E-02
Pyrene	4.3E-02	4.3E-02	1.2E-01	1.3E-01	8.1E-02	8.2E-02	2.4E-02	2.4E-02
PCDD/PCDFs								
2,3,7,8-TCDD	5.6E-06	3.4E-05	5.6E-06	3.4E-05	5.6E-06	3.4E-05	1.3E-06	7.8E-06
1,2,3,7,8-PeCDD	1.6E-05	9.0E-05	1.4E-05	7.9E-05	1.6E-05	9.0E-05	3.4E-06	1.9E-05

Applied Daily Dose for the Thrush
Ingestion Exposure Route
New Conservation Yard RFI Site

Chemical	Soil Exposure Point Concentration [a]		EPV in Earthworms[b]		EPV in Terrestrial Plants[b]		Applied Daily Dose	
	CTE	RME	CTE	RME	CTE	RME	CTE	RME
	(mg/kg)		(mg/kg)		(mg/kg)		(mg/kg-day)	
1,2,3,4,7,8-HxCDD	4.1E-05	1.0E-04	3.2E-05	8.1E-05	4.1E-05	1.0E-04	8.0E-06	2.0E-05
1,2,3,6,7,8-HxCDD	2.0E-04	5.4E-04	1.5E-04	4.1E-04	3.3E-05	8.7E-05	2.5E-05	6.6E-05
1,2,3,7,8,9-HxCDD	7.1E-05	4.7E-04	6.7E-05	4.4E-04	7.1E-05	4.7E-04	1.5E-05	1.0E-04
1,2,3,4,6,7,8-HpCDD	4.7E-03	1.2E-02	2.6E-03	6.5E-03	1.5E-03	3.9E-03	5.1E-04	1.3E-03
OCDD	5.4E-02	1.4E-01	2.6E-02	6.5E-02	1.3E-02	3.2E-02	4.9E-03	1.2E-02
2,3,7,8-TCDF	3.1E-06	5.7E-06	3.2E-06	5.8E-06	3.1E-06	5.7E-06	7.1E-07	1.3E-06
1,2,3,7,8-PeCDF	3.6E-06	1.0E-05	1.5E-06	4.3E-06	3.6E-06	1.0E-05	5.4E-07	1.5E-06
2,3,4,7,8-PeCDF	8.8E-06	1.7E-05	4.5E-06	8.9E-06	8.8E-06	1.7E-05	1.4E-06	2.8E-06
1,2,3,4,7,8-HxCDF	2.7E-05	6.3E-05	1.8E-05	4.1E-05	2.7E-05	6.3E-05	4.9E-06	1.1E-05
1,2,3,6,7,8-HxCDF	2.1E-05	4.9E-05	5.4E-06	1.3E-05	2.1E-05	4.9E-05	2.7E-06	6.2E-06
2,3,4,6,7,8-HxCDF	4.3E-05	1.1E-04	2.4E-05	5.9E-05	4.3E-05	1.1E-04	7.2E-06	1.8E-05
1,2,3,7,8,9-HxCDF	6.9E-06	1.4E-05	6.9E-06	1.4E-05	6.9E-06	1.4E-05	1.6E-06	3.2E-06
1,2,3,4,6,7,8-HpCDF	7.7E-04	2.0E-03	4.2E-04	1.1E-03	1.7E-04	4.5E-04	7.7E-05	2.0E-04
1,2,3,4,7,8,9-HpCDF	7.2E-05	1.8E-04	7.2E-05	1.8E-04	7.2E-05	1.8E-04	1.6E-05	4.1E-05
OCDF	2.0E-03	5.1E-03	1.0E-03	2.6E-03	6.7E-04	1.7E-03	2.1E-04	5.3E-04
PCBs								
Aroclor-1254	7.1E-02	7.1E-02	7.1E-02	7.1E-02	7.1E-02	7.1E-02	1.6E-02	1.6E-02
PCB-105	1.5E-05	2.1E-05	1.6E-04	2.2E-04	5.1E-05	7.0E-05	2.6E-05	3.5E-05
PCB-114	5.7E-07	7.7E-07	1.5E-05	2.1E-05	2.1E-06	2.9E-06	2.2E-06	3.0E-06
PCB-118	3.4E-05	4.6E-05	3.8E-04	5.3E-04	1.1E-04	1.4E-04	6.0E-05	8.2E-05
PCB-123	3.7E-07	5.1E-07	4.7E-06	6.4E-06	1.3E-06	1.7E-06	7.3E-07	1.0E-06
PCB-126	9.4E-07	1.3E-06	5.0E-06	6.8E-06	2.1E-06	2.9E-06	8.5E-07	1.2E-06
PCB-156	7.9E-06	1.1E-05	4.6E-05	6.2E-05	2.0E-05	2.7E-05	7.7E-06	1.1E-05
PCB-157	2.6E-06	2.7E-06	1.5E-05	1.6E-05	6.7E-06	7.2E-06	2.6E-06	2.8E-06
PCB-167	4.4E-06	4.7E-06	2.6E-05	2.8E-05	1.2E-05	1.3E-05	4.5E-06	4.8E-06
PCB-169	6.8E-08	7.5E-08	6.8E-08	7.5E-08	6.8E-08	7.5E-08	1.5E-08	1.7E-08
PCB-189	6.5E-07	7.0E-07	1.6E-06	1.7E-06	1.4E-06	1.5E-06	3.3E-07	3.6E-07
PCB-77	1.9E-06	2.6E-06	1.2E-05	1.6E-05	4.7E-06	6.4E-06	2.0E-06	2.7E-06
PCB-81	3.7E-07	5.1E-07	2.2E-06	3.1E-06	1.1E-06	1.5E-06	3.9E-07	5.4E-07

Notes:

a. Exposure point concentration (EPC) for soil 0 to 2 feet bgs, from Spreadsheet C1-90.

b. Earthworm and terrestrial plant exposure point values were estimated by application of site-specific bioaccumulation factors (BAFs)

Applied Daily Dose for the Thrush
Ingestion Exposure Route
New Conservation Yard RFI Site

Chemical	Soil Exposure Point Concentration [a]		EPV in Earthworms[b]		EPV in Terrestrial Plants[b]		Applied Daily Dose	
	CTE	RME	CTE	RME	CTE	RME	CTE	RME
	(mg/kg)		(mg/kg)		(mg/kg)		(mg/kg-day)	

to soil exposure point concentration when available, or by application of a BAF of 1 when site-specific BAFs were not available.

CTE - central tendancy exposure
RME - reasonable maximum exposure
EPV - exposure point value
NC - not selected as a CPEC in the indicated media, per the SRAM (MWH 2005).
CPEC - chemical of potential ecological concern
VOC - volatile organic compund
SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyls
"-" not applicable
mg/kg - milligram per kilogram
mg/kg-day - milligram per kilogram per day

Applied Daily Dose for the Deer Mouse
Inhalation Exposure Route
New Conservation Yard RFI Site

Chemical	Burrow Air Concentration [a]		Applied Daily Dose	
	CTE (mg/m^3)	RME (mg/m^3)	CTE (mg/kg-day)	RME (mg/kg-day)
VOCs				
Toluene	2.7E+01	5.7E+01	2.8E+01	5.7E+01

Notes:
a. Based on 0 to 2 feet bgs soil exposure point concentration as presented in Spreadsheet C1-90.
CTE - central tendancy exposure
RME - reasonable maximum exposure
VOC - volatile organic compound
"-" not applicable
mg/m^3 - milligrams per cubic meter
mg/kg-day - milligram per kilogram per day

Applied Daily Dose for the Deer Mouse
Ingestion Exposure Route
New Conservation Yard RFI Site

Chemical	Soil Exposure Point Concentration [a]		EPV in Earthworms[b]		EPV in Terrestrial Plants[b]		Applied Daily Dose	
	CTE	RME	CTE	RME	CTE	RME	CTE	RME
	(mg/kg)		(mg/kg)		(mg/kg)		(mg/kg-day)	
Inorganic Compounds								
Antimony	5.6E+00	6.0E+00	4.3E+01	4.7E+01	3.0E+01	3.2E+01	7.2E+00	7.8E+00
Barium	2.2E+02	9.6E+02	6.1E+02	2.7E+03	2.2E+02	9.6E+02	7.2E+01	3.2E+02
Cadmium	1.8E+00	1.3E+01	3.5E+01	2.6E+02	1.9E+01	1.4E+02	5.2E+00	3.8E+01
Chromium	2.3E+01	4.1E+01	5.6E+01	9.9E+01	2.2E+02	3.8E+02	3.6E+01	6.4E+01
Copper	2.9E+01	8.2E+01	4.2E+02	1.2E+03	5.4E+01	1.5E+02	3.5E+01	1.0E+02
Lead	2.6E+01	3.5E+01	6.2E+00	8.5E+00	5.5E+01	7.5E+01	8.7E+00	1.2E+01
Mercury	1.2E-01	6.4E-01	4.0E-01	2.1E+00	1.0E-01	5.3E-01	4.1E-02	2.2E-01
Molybdenum	3.4E+00	6.0E+00	2.0E+01	3.5E+01	4.6E+01	8.1E+01	8.1E+00	1.4E+01
Nickel	2.2E+01	5.7E+01	4.7E+01	1.2E+02	1.7E+02	4.4E+02	2.9E+01	7.3E+01
Selenium	1.7E+00	3.0E+00	3.1E+00	5.5E+00	1.7E+00	3.0E+00	4.5E-01	8.1E-01
Silver	1.5E+01	9.6E+01	1.0E+02	6.4E+02	2.6E+01	1.6E+02	1.0E+01	6.5E+01
Zinc	5.4E+02	2.8E+03	1.7E+03	8.7E+03	8.8E+02	4.5E+03	2.4E+02	1.2E+03
VOCs								
Toluene	5.3E-02	1.1E-01	5.3E-02	1.1E-01	5.3E-02	1.1E-01	1.2E-02	2.4E-02
SVOCs								
Benzo(a)anthracene	3.6E-02	1.2E-02	6.9E-02	2.3E-02	1.9E-01	6.3E-02	3.3E-02	1.1E-02
Benzo(a)pyrene	4.0E-02	4.3E-02	4.0E-02	4.3E-02	4.0E-02	4.3E-02	8.6E-03	9.3E-03
Benzo(b)fluoranthene	4.3E-02	6.5E-02	8.9E-02	1.3E-01	4.3E-02	6.5E-02	1.2E-02	1.8E-02
Benzo(g,h,i)perylene	3.9E-02	3.1E-02	2.1E-02	1.6E-02	3.9E-02	3.1E-02	7.3E-03	5.8E-03
Benzo(k)fluoranthene	3.6E-02	1.2E-02	3.3E-02	1.1E-02	3.6E-02	1.2E-02	7.7E-03	2.5E-03
Chrysene	4.0E-02	2.7E-02	7.4E-02	5.0E-02	1.1E-01	7.5E-02	2.1E-02	1.5E-02
Dibenz(a,h)anthracene	3.6E-02	8.0E-03	3.6E-02	8.0E-03	3.6E-02	8.0E-03	7.8E-03	1.7E-03
Fluoranthene	4.3E-02	3.6E-02	3.9E-02	3.3E-02	1.2E-01	1.0E-01	2.1E-02	1.8E-02
Indeno(1,2,3-cd)pyrene	4.1E-02	5.3E-02	3.5E-02	4.5E-02	4.1E-02	5.3E-02	8.5E-03	1.1E-02
Phenanthrene	3.7E-02	1.4E-02	6.8E-02	2.6E-02	2.6E-01	1.0E-01	4.4E-02	1.7E-02
Pyrene	4.3E-02	4.3E-02	1.2E-01	1.3E-01	8.1E-02	8.2E-02	2.0E-02	2.0E-02
PCDD/PCDFs								
2,3,7,8-TCDD	5.6E-06	3.4E-05	5.6E-06	3.4E-05	5.6E-06	3.4E-05	1.2E-06	7.5E-06
1,2,3,7,8-PeCDD	1.6E-05	9.0E-05	1.4E-05	7.9E-05	1.6E-05	9.0E-05	3.4E-06	1.9E-05

Applied Daily Dose for the Deer Mouse
Ingestion Exposure Route
New Conservation Yard RFI Site

Chemical	Soil Exposure Point Concentration [a]		EPV in Earthworms[b]		EPV in Terrestrial Plants[b]		Applied Daily Dose	
	CTE	RME	CTE	RME	CTE	RME	CTE	RME
	(mg/kg)		(mg/kg)		(mg/kg)		(mg/kg-day)	
1,2,3,4,7,8-HxCDD	4.1E-05	1.0E-04	3.2E-05	8.1E-05	4.1E-05	1.0E-04	8.3E-06	2.1E-05
1,2,3,6,7,8-HxCDD	2.0E-04	5.4E-04	1.5E-04	4.1E-04	3.3E-05	8.7E-05	1.6E-05	4.1E-05
1,2,3,7,8,9-HxCDD	7.1E-05	4.7E-04	6.7E-05	4.4E-04	7.1E-05	4.7E-04	1.5E-05	1.0E-04
1,2,3,4,6,7,8-HpCDD	4.7E-03	1.2E-02	2.6E-03	6.5E-03	1.5E-03	3.9E-03	4.1E-04	1.0E-03
OCDD	5.4E-02	1.4E-01	2.6E-02	6.5E-02	1.3E-02	3.2E-02	3.8E-03	9.5E-03
2,3,7,8-TCDF	3.1E-06	5.7E-06	3.2E-06	5.8E-06	3.1E-06	5.7E-06	6.8E-07	1.2E-06
1,2,3,7,8-PeCDF	3.6E-06	1.0E-05	1.5E-06	4.3E-06	3.6E-06	1.0E-05	6.5E-07	1.8E-06
2,3,4,7,8-PeCDF	8.8E-06	1.7E-05	4.5E-06	8.9E-06	8.8E-06	1.7E-05	1.6E-06	3.2E-06
1,2,3,4,7,8-HxCDF	2.7E-05	6.3E-05	1.8E-05	4.1E-05	2.7E-05	6.3E-05	5.3E-06	1.2E-05
1,2,3,6,7,8-HxCDF	2.1E-05	4.9E-05	5.4E-06	1.3E-05	2.1E-05	4.9E-05	3.6E-06	8.3E-06
2,3,4,6,7,8-HxCDF	4.3E-05	1.1E-04	2.4E-05	5.9E-05	4.3E-05	1.1E-04	8.2E-06	2.0E-05
1,2,3,7,8,9-HxCDF	6.9E-06	1.4E-05	6.9E-06	1.4E-05	6.9E-06	1.4E-05	1.5E-06	3.1E-06
1,2,3,4,6,7,8-HpCDF	7.7E-04	2.0E-03	4.2E-04	1.1E-03	1.7E-04	4.5E-04	5.6E-05	1.4E-04
1,2,3,4,7,8,9-HpCDF	7.2E-05	1.8E-04	7.2E-05	1.8E-04	7.2E-05	1.8E-04	1.6E-05	4.0E-05
OCDF	2.0E-03	5.1E-03	1.0E-03	2.6E-03	6.7E-04	1.7E-03	1.7E-04	4.4E-04
PCBs								
Aroclor-1254	7.1E-02	7.1E-02	7.1E-02	7.1E-02	7.1E-02	7.1E-02	1.5E-02	1.5E-02
PCB-105	1.5E-05	2.1E-05	1.6E-04	2.2E-04	5.1E-05	7.0E-05	1.8E-05	2.4E-05
PCB-114	5.7E-07	7.7E-07	1.5E-05	2.1E-05	2.1E-06	2.9E-06	1.3E-06	1.7E-06
PCB-118	3.4E-05	4.6E-05	3.8E-04	5.3E-04	1.1E-04	1.4E-04	4.0E-05	5.5E-05
PCB-123	3.7E-07	5.1E-07	4.7E-06	6.4E-06	1.3E-06	1.7E-06	4.9E-07	6.7E-07
PCB-126	9.4E-07	1.3E-06	5.0E-06	6.8E-06	2.1E-06	2.9E-06	6.3E-07	8.7E-07
PCB-156	7.9E-06	1.1E-05	4.6E-05	6.2E-05	2.0E-05	2.7E-05	5.9E-06	8.0E-06
PCB-157	2.6E-06	2.7E-06	1.5E-05	1.6E-05	6.7E-06	7.2E-06	2.0E-06	2.1E-06
PCB-167	4.4E-06	4.7E-06	2.6E-05	2.8E-05	1.2E-05	1.3E-05	3.5E-06	3.7E-06
PCB-169	6.8E-08	7.5E-08	6.8E-08	7.5E-08	6.8E-08	7.5E-08	1.5E-08	1.6E-08
PCB-189	6.5E-07	7.0E-07	1.6E-06	1.7E-06	1.4E-06	1.5E-06	3.1E-07	3.4E-07
PCB-77	1.9E-06	2.6E-06	1.2E-05	1.6E-05	4.7E-06	6.4E-06	1.5E-06	2.0E-06
PCB-81	3.7E-07	5.1E-07	2.2E-06	3.1E-06	1.1E-06	1.5E-06	3.1E-07	4.3E-07

Notes:

a. Exposure point concentration (EPC) for soil 0 to 2 feet bgs, from Spreadsheet C1-90.

b. Earthworm and terrestrial plant exposure point values were estimated by application of site-specific bioaccumulation factors (BAFs)

Applied Daily Dose for the Deer Mouse
Ingestion Exposure Route
New Conservation Yard RFI Site

Chemical	Soil Exposure Point Concentration [a]		EPV in Earthworms[b]		EPV in Terrestrial Plants[b]		Applied Daily Dose	
	CTE	RME	CTE	RME	CTE	RME	CTE	RME
	(mg/kg)		(mg/kg)		(mg/kg)		(mg/kg-day)	

to soil exposure point concentration when available, or by application of a BAF of 1 when site-specific BAFs were not available.

* Chemical selected as a CPEC in soil vapor; value is based on one-half the sample quantitation limit for soil at 0 to 6 feet bgs.

CTE - central tendancy exposure

RME - reasonable maximum exposure

EPV - exposure point value

NC - not selected as a CPEC in the indicated media, per the SRAM (MWH 2005).

CPEC - chemical of potential ecological concern

VOC - volatile organic compund

SVOC - semi-volatile organic compound

PCB - polychlorinated biphenyls

CPEC - chemical of potential ecological concern

"-" not applicable

mg/kg - milligram per kilogram

mg/kg-day - milligram per kilogram per day

Exposure Point Values for Plants
New Conservation Yard RFI Site

Chemical	Soil EPC		BAF	Plant EPV	
	CTE (mg/kg)	RME (mg/kg)	(unitless)	CTE (mg/kg)	RME (mg/kg)
Inorganic Compounds					
Antimony	5.6E+00	6.0E+00	5	3.0E+01	3.2E+01
Barium	2.2E+02	9.6E+02	1	2.2E+02	9.6E+02
Cadmium	1.8E+00	1.3E+01	11	1.9E+01	1.4E+02
Chromium	2.3E+01	4.1E+01	9	2.2E+02	3.8E+02
Copper	2.9E+01	8.2E+01	2	5.4E+01	1.5E+02
Lead	2.6E+01	3.5E+01	2	5.5E+01	7.5E+01
Mercury	1.2E-01	6.4E-01	1	1.0E-01	5.3E-01
Molybdenum	3.4E+00	6.0E+00	14	4.6E+01	8.1E+01
Nickel	2.2E+01	5.7E+01	8	1.7E+02	4.4E+02
Selenium	1.7E+00	3.0E+00	1	1.7E+00	3.0E+00
Silver	1.5E+01	9.6E+01	2	2.6E+01	1.6E+02
Zinc	5.4E+02	2.8E+03	2	8.8E+02	4.5E+03
VOCs					
Toluene	5.3E-02	1.1E-01	1	5.3E-02	1.1E-01
SVOCs					
Benzo(a)anthracene	3.6E-02	1.2E-02	5	1.9E-01	6.3E-02
Benzo(a)pyrene	4.0E-02	4.3E-02	1	4.0E-02	4.3E-02
Benzo(b)fluoranthene	4.3E-02	6.5E-02	1	4.3E-02	6.5E-02
Benzo(g,h,i)perylene	3.9E-02	3.1E-02	1	3.9E-02	3.1E-02
Benzo(k)fluoranthene	3.6E-02	1.2E-02	1	3.6E-02	1.2E-02
Chrysene	4.0E-02	2.7E-02	3	1.1E-01	7.5E-02
Dibenz(a,h)anthracene	3.6E-02	8.0E-03	1	3.6E-02	8.0E-03
Fluoranthene	4.3E-02	3.6E-02	3	1.2E-01	1.0E-01
Indeno(1,2,3-cd)pyrene	4.1E-02	5.3E-02	1	4.1E-02	5.3E-02
Phenanthrene	3.7E-02	1.4E-02	7	2.6E-01	1.0E-01
Pyrene	4.3E-02	4.3E-02	2	8.1E-02	8.2E-02
PCDD/PCDFs					
2,3,7,8-TCDD	5.6E-06	3.4E-05	1	5.6E-06	3.4E-05
1,2,3,7,8-PeCDD	1.6E-05	9.0E-05	1	1.6E-05	9.0E-05
1,2,3,4,7,8-HxCDD	4.1E-05	1.0E-04	1	4.1E-05	1.0E-04
1,2,3,6,7,8-HxCDD	2.0E-04	5.4E-04	0	3.3E-05	8.7E-05
1,2,3,7,8,9-HxCDD	7.1E-05	4.7E-04	1	7.1E-05	4.7E-04
1,2,3,4,6,7,8-HpCDD	4.7E-03	1.2E-02	0	1.5E-03	3.9E-03

Exposure Point Values for Plants
New Conservation Yard RFI Site

Chemical	Soil EPC		BAF	Plant EPV	
	CTE (mg/kg)	RME (mg/kg)	(unitless)	CTE (mg/kg)	RME (mg/kg)
OCDD	5.4E-02	1.4E-01	0	1.3E-02	3.2E-02
2,3,7,8-TCDF	3.1E-06	5.7E-06	1	3.1E-06	5.7E-06
1,2,3,7,8-PeCDF	3.6E-06	1.0E-05	1	3.6E-06	1.0E-05
2,3,4,7,8-PeCDF	8.8E-06	1.7E-05	1	8.8E-06	1.7E-05
1,2,3,4,7,8-HxCDF	2.7E-05	6.3E-05	1	2.7E-05	6.3E-05
1,2,3,6,7,8-HxCDF	2.1E-05	4.9E-05	1	2.1E-05	4.9E-05
2,3,4,6,7,8-HxCDF	4.3E-05	1.1E-04	1	4.3E-05	1.1E-04
1,2,3,7,8,9-HxCDF	6.9E-06	1.4E-05	1	6.9E-06	1.4E-05
1,2,3,4,6,7,8-HpCDF	7.7E-04	2.0E-03	0	1.7E-04	4.5E-04
1,2,3,4,7,8,9-HpCDF	7.2E-05	1.8E-04	1	7.2E-05	1.8E-04
OCDF	2.0E-03	5.1E-03	0	6.7E-04	1.7E-03
PCBs					
Aroclor-1254	7.1E-02	7.1E-02	1	7.1E-02	7.1E-02
PCB-105	1.5E-05	2.1E-05	3	5.1E-05	7.0E-05
PCB-114	5.7E-07	7.7E-07	4	2.1E-06	2.9E-06
PCB-118	3.4E-05	4.6E-05	3	1.1E-04	1.4E-04
PCB-123	3.7E-07	5.1E-07	3	1.3E-06	1.7E-06
PCB-126	9.4E-07	1.3E-06	2	2.1E-06	2.9E-06
PCB-156	7.9E-06	1.1E-05	2	2.0E-05	2.7E-05
PCB-157	2.6E-06	2.7E-06	3	6.7E-06	7.2E-06
PCB-167	4.4E-06	4.7E-06	3	1.2E-05	1.3E-05
PCB-169	6.8E-08	7.5E-08	1	6.8E-08	7.5E-08
PCB-189	6.5E-07	7.0E-07	2	1.4E-06	1.5E-06
PCB-77	1.9E-06	2.6E-06	2	4.7E-06	6.4E-06
PCB-81	3.7E-07	5.1E-07	3	1.1E-06	1.5E-06

Notes:
EPC - exposure point concentration (based on 0 to 2 feet bgs data) as presented in Spreadsheet C1-90.
EPV - exposure point value
BAF - bioaccumulation factor approximates the 75th percentile of BAFs measured at SSFL;
if no BAF was available a default of 1 is used.
CTE - central tendancy exposure
RME - reasonable maximum exposure
NC - not selected as a CPEC in the indicated media, per the SRAM (MWH 2005).
CPEC - chemical of potential ecological concern
VOC - volatile organic compound

Spreadsheet C1-102 (3 of 3)

Exposure Point Values for Plants
New Conservation Yard RFI Site

Chemical	Soil EPC		BAF	Plant EPV	
	CTE (mg/kg)	RME (mg/kg)	(unitless)	CTE (mg/kg)	RME (mg/kg)

SVOC - semi-volatile organic compounds
PCB - polychlorinated biphenyls
mg/kg - milligram per kilogram

Exposure Point Values for Earthworms
New Conservation Yard RFI Site

Chemical	Soil EPC		BAF	Earthworm EPV	
	CTE (mg/kg)	RME (mg/kg)	(unitless)	CTE (mg/kg)	RME (mg/kg)
Inorganic Compounds					
Antimony	5.6E+00	6.0E+00	8	4.3E+01	4.7E+01
Barium	2.2E+02	9.6E+02	3	6.1E+02	2.7E+03
Boron	NC	NC	5	NC	NC
Cadmium	1.8E+00	1.3E+01	20	3.5E+01	2.6E+02
Copper	2.9E+01	8.2E+01	15	4.2E+02	1.2E+03
Lead	2.6E+01	3.5E+01	0	6.2E+00	8.5E+00
Mercury	1.2E-01	6.4E-01	3	4.0E-01	2.1E+00
Silver	1.5E+01	9.6E+01	7	1.0E+02	6.4E+02
Thallium	NC	NC	1	NC	NC
Zinc	5.4E+02	2.8E+03	3	1.7E+03	8.7E+03
VOCs					
1,1,1-Trichloroethane	NC	NC	1	NC	NC
1,1,2-Trichloro-1,2,2-trifluoroethane	NC	NC	1	NC	NC
1,1-Dichloroethene	NC	NC	1	NC	NC
2-Butanone	NC	NC	1	NC	NC
Acetone	NC	NC	1	NC	NC
Benzene	NC	NC	1	NC	NC
cis-1,2-Dichloroethene	NC	NC	1	NC	NC
Ethylbenzene	NC	NC	1	NC	NC
m,p-Xylene	NC	NC	1	NC	NC
Methylene chloride	NC	NC	1	NC	NC
o-Xylene	NC	NC	1	NC	NC
p-Isopropyltoluene	NC	NC	1	NC	NC
Toluene	5.3E-02	1.1E-01	1	5.3E-02	1.1E-01
Trichloroethene	NC	NC	1	NC	NC
Xylenes (total)	NC	NC	1	NC	NC
SVOCs					
2,4-Dinitrophenol	NC	NC	1	NC	NC
2-Methylnaphthalene	NC	NC	1	NC	NC
Acenaphthene	NC	NC	2	NC	NC
Acenaphthylene	NC	NC	1	NC	NC
Anthracene	NC	NC	3	NC	NC
Benzo(a)anthracene	3.6E-02	1.2E-02	2	6.9E-02	2.3E-02
Benzo(a)pyrene	4.0E-02	4.3E-02	1	4.0E-02	4.3E-02

Exposure Point Values for Earthworms
New Conservation Yard RFI Site

Chemical	Soil EPC		BAF	Earthworm EPV	
	CTE (mg/kg)	RME (mg/kg)	(unitless)	CTE (mg/kg)	RME (mg/kg)
Inorganic Compounds					
Benzo(b)fluoranthene	4.3E-02	6.5E-02	2	8.9E-02	1.3E-01
Benzo(e)pyrene	NC	NC	1	NC	NC
Benzo(g,h,i)perylene	3.9E-02	3.1E-02	1	2.1E-02	1.6E-02
Benzo(k)fluoranthene	3.6E-02	1.2E-02	1	3.3E-02	1.1E-02
Chrysene	4.0E-02	2.7E-02	2	7.4E-02	5.0E-02
Dibenz(a,h)anthracene	3.6E-02	8.0E-03	1	3.6E-02	8.0E-03
Fluoranthene	4.3E-02	3.6E-02	1	3.9E-02	3.3E-02
Fluorene	NC	NC	4	NC	NC
Indeno(1,2,3-cd)pyrene	4.1E-02	5.3E-02	1	3.5E-02	4.5E-02
Naphthalene	NC	NC	1	NC	NC
Perylene	NC	NC	1	NC	NC
Phenanthrene	3.7E-02	1.4E-02	2	6.8E-02	2.6E-02
Pyrene	4.3E-02	4.3E-02	3	1.2E-01	1.3E-01
Total Petroleum Hydrocarbons					
C08-C11(Gasoline Range)	NC	NC	1	NC	NC
C11-C14(Kerosene Range)	NC	NC	1	NC	NC
C14-C20(Diesel Range)	NC	NC	1	NC	NC
C20-C30(Lubricant Oil Range)	NC	NC	1	NC	NC
PCDD/PCDFs					
2,3,7,8-TCDD	5.6E-06	3.4E-05	1	5.6E-06	3.4E-05
1,2,3,7,8-PeCDD	1.6E-05	9.0E-05	1	1.4E-05	7.9E-05
1,2,3,4,7,8-HxCDD	4.1E-05	1.0E-04	1	3.2E-05	8.1E-05
1,2,3,6,7,8-HxCDD	2.0E-04	5.4E-04	1	1.5E-04	4.1E-04
1,2,3,7,8,9-HxCDD	7.1E-05	4.7E-04	1	6.7E-05	4.4E-04
1,2,3,4,6,7,8-HpCDD	4.7E-03	1.2E-02	1	2.6E-03	6.5E-03
OCDD	5.4E-02	1.4E-01	0	2.6E-02	6.5E-02
2,3,7,8-TCDF	3.1E-06	5.7E-06	1	3.2E-06	5.8E-06
1,2,3,7,8-PeCDF	3.6E-06	1.0E-05	0	1.5E-06	4.3E-06
2,3,4,7,8-PeCDF	8.8E-06	1.7E-05	1	4.5E-06	8.9E-06
1,2,3,4,7,8-HxCDF	2.7E-05	6.3E-05	1	1.8E-05	4.1E-05
1,2,3,6,7,8-HxCDF	2.1E-05	4.9E-05	0	5.4E-06	1.3E-05
2,3,4,6,7,8-HxCDF	4.3E-05	1.1E-04	1	2.4E-05	5.9E-05
1,2,3,7,8,9-HxCDF	6.9E-06	1.4E-05	1	6.9E-06	1.4E-05
1,2,3,4,6,7,8-HpCDF	7.7E-04	2.0E-03	1	4.2E-04	1.1E-03

Exposure Point Values for Earthworms
New Conservation Yard RFI Site

Chemical	Soil EPC		BAF	Earthworm EPV	
	CTE (mg/kg)	RME (mg/kg)	(unitless)	CTE (mg/kg)	RME (mg/kg)
Inorganic Compounds					
1,2,3,4,7,8,9-HpCDF	7.2E-05	1.8E-04	1	7.2E-05	1.8E-04
OCDF	2.0E-03	5.1E-03	1	1.0E-03	2.6E-03
PCBs					
Aroclor-1248	NC	NC	1	NC	NC
Aroclor-1254	7.1E-02	7.1E-02	1	7.1E-02	7.1E-02
Aroclor-1260	NC	NC	1	NC	NC
PCB-105	1.5E-05	2.1E-05	10	1.6E-04	2.2E-04
PCB-114	5.7E-07	7.7E-07	27	1.5E-05	2.1E-05
PCB-118	3.4E-05	4.6E-05	11	3.8E-04	5.3E-04
PCB-123	3.7E-07	5.1E-07	13	4.7E-06	6.4E-06
PCB-126	9.4E-07	1.3E-06	5	5.0E-06	6.8E-06
PCB-156	7.9E-06	1.1E-05	6	4.6E-05	6.2E-05
PCB-157	2.6E-06	2.7E-06	6	1.5E-05	1.6E-05
PCB-167	4.4E-06	4.7E-06	6	2.6E-05	2.8E-05
PCB-169	6.8E-08	7.5E-08	1	6.8E-08	7.5E-08
PCB-189	6.5E-07	7.0E-07	2	1.6E-06	1.7E-06
PCB-77	1.9E-06	2.6E-06	6	1.2E-05	1.6E-05
PCB-81	3.7E-07	5.1E-07	6	2.2E-06	3.1E-06

Notes:
EPC - exposure point concentration (based on 0 to 2 feet bgs data) as presented in Spreadsheet C1-90.
EPV - exposure point value
BAF - bioaccumulation factor approximates the 75th percentile of BAFs measured at SSFL;
if no BAF was available a default of 1 is used.
CTE - central tendancy exposure
RME - reasonable maximum exposure
NC - not selected as a CPEC in the indicated media, per the SRAM (MWH 2005).
CPEC - chemical of potential ecological concern
VOC - volatile organic compound
SVOC - semi-volatile organic compounds
PCB - polychlorinated biphenyls
mg/kg - milligram per kilogram

Ecological Concentration-Toxicity Screen
for Determination of Applicable Soil Depth [a]
New Conservation Yard RFI Site

Chemical	Mammalian ESL (mg/kg)	Concentration-Toxicity Screen Values		
		Soil 0 to 2 feet bgs Normal (mg/kg)	Soil 0 to 4 feet bgs Normal (mg/kg)	Soil 0 to 6 feet bgs Normal (mg/kg)
Inorganic Compounds				
Antimony	9.5E-02	6.3E+01	6.3E+01	6.3E+01
Barium	1.5E+01	6.6E+01	3.6E+01	3.6E+01
Cadmium	2.1E-02	6.4E+02	6.1E+02	6.1E+02
Chromium	9.3E+02	4.4E-02	4.3E-02	4.3E-02
Copper	2.1E+00	3.8E+01	3.6E+01	3.6E+01
Lead	2.8E+00	1.2E+01	1.2E+01	1.2E+01
Mercury	2.9E+00	2.2E-01	2.1E-01	2.1E-01
Molybdenum	1.1E-01	5.6E+01	5.6E+01	5.6E+01
Nickel	1.0E-01	5.6E+02	5.3E+02	5.3E+02
Selenium	1.7E-01	1.7E+01	1.7E+01	1.7E+01
Silver	5.4E-01	1.8E+02	1.7E+02	1.7E+02
Zinc	2.1E+01	1.3E+02	1.6E+02	1.6E+02
VOCs				
Toluene	2.5E+00	4.5E-02	4.1E-02	4.1E-02
SVOCs				
Benzo(a)anthracene	1.4E+00	8.5E-03	8.5E-03	8.5E-03
Benzo(a)pyrene	5.6E+00	7.7E-03	7.7E-03	7.7E-03
Benzo(b)fluoranthene	4.4E+00	1.5E-02	1.5E-02	1.5E-02
Benzo(g,h,i)perylene	6.4E+00	4.8E-03	4.8E-03	4.8E-03
Benzo(k)fluoranthene	5.8E+00	2.1E-03	2.1E-03	2.1E-03
Chrysene	2.4E+00	1.1E-02	1.1E-02	1.1E-02
Dibenz(a,h)anthracene	5.6E+00	1.4E-03	1.4E-03	1.4E-03
Fluoranthene	1.2E+02	2.9E-04	2.9E-04	2.9E-04
Indeno(1,2,3-cd)pyrene	5.8E+00	9.1E-03	9.1E-03	9.1E-03
Phenanthrene	6.2E+01	2.3E-04	2.3E-04	2.3E-04
Pyrene	7.6E+01	5.6E-04	5.6E-04	5.6E-04
Total Petroleum Hydrocarbons				
PCDD/PCDFs				
2,3,7,8-TCDD	4.3E-06	8.1E+00	7.1E+00	7.1E+00
1,2,3,7,8-PeCDD	4.4E-06	2.0E+01	2.0E+01	2.0E+01

Ecological Concentration-Toxicity Screen
for Determination of Applicable Soil Depth [a]
New Conservation Yard RFI Site

Chemical	Mammalian ESL (mg/kg)	Concentration-Toxicity Screen Values: Soil 0 to 2 feet bgs Normal (mg/kg)	Soil 0 to 4 feet bgs Normal (mg/kg)	Soil 0 to 6 feet bgs Normal (mg/kg)
1,2,3,4,7,8-HxCDD	4.5E-05	2.3E+00	2.1E+00	2.1E+00
1,2,3,6,7,8-HxCDD	1.1E-04	5.1E+00	4.6E+00	4.6E+00
1,2,3,7,8,9-HxCDD	4.3E-05	1.1E+01	9.4E+00	9.4E+00
1,2,3,4,6,7,8-HpCDD	9.6E-04	1.2E+01	1.1E+01	1.1E+01
OCDD	1.2E-01	1.2E+00	1.1E+00	1.1E+00
2,3,7,8-TCDF	4.3E-05	1.3E-01	1.3E-01	1.3E-01
1,2,3,7,8-PeCDF	1.0E-04	9.9E-02	9.9E-02	9.9E-02
2,3,4,7,8-PeCDF	9.8E-06	1.8E+00	1.6E+00	1.6E+00
1,2,3,4,7,8-HxCDF	4.7E-05	1.3E+00	1.2E+00	1.2E+00
1,2,3,6,7,8-HxCDF	5.4E-05	9.1E-01	8.3E-01	8.3E-01
2,3,4,6,7,8-HxCDF	4.9E-05	2.2E+00	2.0E+00	2.0E+00
1,2,3,7,8,9-HxCDF	4.3E-05	3.3E-01	3.0E-01	3.0E-01
1,2,3,4,6,7,8-HpCDF	1.1E-03	1.8E+00	1.6E+00	1.6E+00
1,2,3,4,7,8,9-HpCDF	4.3E-04	4.3E-01	3.8E-01	3.8E-01
OCDF	9.7E-02	5.3E-02	4.7E-02	4.7E-02
PCBs				
Aroclor-1254	2.9E-01	2.4E-01	2.4E-01	2.4E-01
PCB-105	8.5E-03	2.5E-03	2.5E-03	2.5E-03
PCB-114	8.8E-04	8.8E-04	8.8E-04	8.8E-04
PCB-118	8.2E-03	5.6E-03	5.6E-03	5.6E-03
PCB-123	7.5E-03	6.8E-05	6.8E-05	6.8E-05
PCB-126	1.4E-05	8.9E-02	8.9E-02	8.9E-02
PCB-156	2.6E-03	4.1E-03	4.1E-03	4.1E-03
PCB-157	2.5E-03	1.1E-03	1.1E-03	1.1E-03
PCB-167	1.2E-01	3.8E-05	3.8E-05	3.8E-05
PCB-169	4.3E-04	1.7E-04	1.7E-04	1.7E-04
PCB-189	2.0E-02	3.5E-05	3.5E-05	3.5E-05
PCB-77	1.3E-02	2.1E-04	2.1E-04	2.1E-04
PCB-81	1.2E-02	4.3E-05	4.3E-05	4.3E-05
Total Depth-Specific Concentration-Toxicity Screen Value		1.8E+03	1.8E+03	1.8E+03

Notes:

a. Ecological concentration-toxicity screen value
= RME soil concentration / mammalian ecological screening level.
Concentration-toxicity screen values are for comparative purposes only and are not an indication of risk.

Ecological Concentration-Toxicity Screen
for Determination of Applicable Soil Depth [a]
New Conservation Yard RFI Site

Chemical	Mammalian ESL (mg/kg)	Concentration-Toxicity Screen Values		
		Soil 0 to 2 feet bgs Normal (mg/kg)	Soil 0 to 4 feet bgs Normal (mg/kg)	Soil 0 to 6 feet bgs Normal (mg/kg)

VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyls
ESL - ecological screening level
RME - reasonable maximum exposure
NC - Not Calculated
"-" not applicable
mg/kg - milligram per kilogram
bgs - below ground surface

Spreadsheet C1-98 (1 of 2)

Aroclor to PCB Congener Extrapolation (0-6 feet bgs)
New Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentrations (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF_{1254}	EF_{1260}	Estimated Concentrations Aroclor 1254 (mg/kg)	Estimated Concentrations Aroclor 1260 (mg/kg)	Estimated Concentrations PCB_{MAX} (mg/kg)
Aroclor-1254	MJ775	1.9E-01	9.5E-02	U	-	-	-	-	-
Aroclor-1260	MJ775	1.9E-01	9.5E-02	U	-	-	-	-	-
PCB-105	MJ775	-	-	-	1.2E-01	8.2E-02	1.2E-05	7.8E-06	1.2E-05
PCB-114	MJ775	-	-	-	4.5E-03	1.5E-03	4.3E-07	1.4E-07	4.3E-07
PCB-118	MJ775	-	-	-	2.7E-01	1.6E-01	2.5E-05	1.6E-05	2.5E-05
PCB-123	MJ775	-	-	-	3.0E-03	2.3E-03	2.8E-07	2.2E-07	2.8E-07
PCB-126	MJ775	-	-	-	7.5E-03	6.4E-03	7.1E-07	6.0E-07	7.1E-07
PCB-156	MJ775	-	-	-	6.3E-02	5.5E-02	6.0E-06	5.2E-06	6.0E-06
PCB-157	MJ775	-	-	-	1.2E-02	2.5E-02	1.2E-06	2.3E-06	2.3E-06
PCB-167	MJ775	-	-	-	2.1E-02	4.3E-02	2.0E-06	4.1E-06	4.1E-06
PCB-169	MJ775	-	-	-	3.7E-04	6.4E-04	3.5E-08	6.0E-08	6.0E-08
PCB-189	MJ775	-	-	-	3.0E-03	6.4E-03	2.8E-07	6.0E-07	6.0E-07
PCB-77	MJ775	-	-	-	1.5E-02	1.3E-02	1.5E-06	1.2E-06	1.5E-06
PCB-81	MJ775	-	-	-	3.0E-03	2.3E-03	2.8E-07	2.1E-07	2.8E-07
Aroclor-1254	MJ724	2.0E-01	1.0E-01	U	-	-	-	-	-
Aroclor-1260	MJ724	2.0E-01	1.0E-01	U	-	-	-	-	-
PCB-105	MJ724	-	-	-	1.2E-01	8.2E-02	1.2E-05	8.2E-06	1.2E-05
PCB-114	MJ724	-	-	-	4.5E-03	1.5E-03	4.5E-07	1.5E-07	4.5E-07
PCB-118	MJ724	-	-	-	2.7E-01	1.6E-01	2.7E-05	1.6E-05	2.7E-05
PCB-123	MJ724	-	-	-	3.0E-03	2.3E-03	3.0E-07	2.3E-07	3.0E-07
PCB-126	MJ724	-	-	-	7.5E-03	6.4E-03	7.5E-07	6.4E-07	7.5E-07
PCB-156	MJ724	-	-	-	6.3E-02	5.5E-02	6.3E-06	5.5E-06	6.3E-06
PCB-157	MJ724	-	-	-	1.2E-02	2.5E-02	1.2E-06	2.5E-06	2.5E-06
PCB-167	MJ724	-	-	-	2.1E-02	4.3E-02	2.1E-06	4.3E-06	4.3E-06
PCB-169	MJ724	-	-	-	3.7E-04	6.4E-04	3.7E-08	6.4E-08	6.4E-08
PCB-189	MJ724	-	-	-	3.0E-03	6.4E-03	3.0E-07	6.4E-07	6.4E-07
PCB-77	MJ724	-	-	-	1.5E-02	1.3E-02	1.5E-06	1.3E-06	1.5E-06
PCB-81	MJ724	-	-	-	3.0E-03	2.3E-03	3.0E-07	2.3E-07	3.0E-07
Aroclor-1254	MJ734	2.1E-01	1.1E-01	U	-	-	-	-	-
Aroclor-1260	MJ734	2.1E-01	1.1E-01	U	-	-	-	-	-
PCB-105	MJ734	-	-	-	1.2E-01	8.2E-02	1.3E-05	8.6E-06	1.3E-05
PCB-114	MJ734	-	-	-	4.5E-03	1.5E-03	4.8E-07	1.5E-07	4.8E-07
PCB-118	MJ734	-	-	-	2.7E-01	1.6E-01	2.8E-05	1.7E-05	2.8E-05
PCB-123	MJ734	-	-	-	3.0E-03	2.3E-03	3.1E-07	2.4E-07	3.1E-07
PCB-126	MJ734	-	-	-	7.5E-03	6.4E-03	7.9E-07	6.7E-07	7.9E-07
PCB-156	MJ734	-	-	-	6.3E-02	5.5E-02	6.6E-06	5.7E-06	6.6E-06
PCB-157	MJ734	-	-	-	1.2E-02	2.5E-02	1.3E-06	2.6E-06	2.6E-06
PCB-167	MJ734	-	-	-	2.1E-02	4.3E-02	2.2E-06	4.5E-06	4.5E-06
PCB-169	MJ734	-	-	-	3.7E-04	6.4E-04	3.8E-08	6.7E-08	6.7E-08
PCB-189	MJ734	-	-	-	3.0E-03	6.4E-03	3.1E-07	6.7E-07	6.7E-07
PCB-77	MJ734	-	-	-	1.5E-02	1.3E-02	1.6E-06	1.3E-06	1.6E-06
PCB-81	MJ734	-	-	-	3.0E-03	2.3E-03	3.1E-07	2.4E-07	3.1E-07
Aroclor-1254	MJ619	2.1E-01	2.1E-01	J	-	-	-	-	-
Aroclor-1260	MJ619	0.0E+00	0.0E+00	U	-	-	-	-	-
PCB-105	MJ619	-	-	-	1.2E-01	8.2E-02	2.6E-05	0.0E+00	2.6E-05
PCB-114	MJ619	-	-	-	4.5E-03	1.5E-03	9.5E-07	0.0E+00	9.5E-07
PCB-118	MJ619	-	-	-	2.7E-01	1.6E-01	5.6E-05	0.0E+00	5.6E-05
PCB-123	MJ619	-	-	-	3.0E-03	2.3E-03	6.3E-07	0.0E+00	6.3E-07
PCB-126	MJ619	-	-	-	7.5E-03	6.4E-03	1.6E-06	0.0E+00	1.6E-06
PCB-156	MJ619	-	-	-	6.3E-02	5.5E-02	1.3E-05	0.0E+00	1.3E-05
PCB-157	MJ619	-	-	-	1.2E-02	2.5E-02	2.6E-06	0.0E+00	2.6E-06
PCB-167	MJ619	-	-	-	2.1E-02	4.3E-02	4.3E-06	0.0E+00	4.3E-06
PCB-169	MJ619	-	-	-	3.7E-04	6.4E-04	7.7E-08	0.0E+00	7.7E-08
PCB-189	MJ619	-	-	-	3.0E-03	6.4E-03	6.3E-07	0.0E+00	6.3E-07

Spreadsheet C1-98 (2 of 2)

Aroclor to PCB Congener Extrapolation (0-6 feet bgs)
New Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentrations (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF_{1254}	EF_{1260}	Estimated Concentrations Aroclor 1254 (mg/kg)	Estimated Concentrations Aroclor 1260 (mg/kg)	Estimated Concentrations PCB_{MAX} (mg/kg)
PCB-77	MJ619	-	-	-	1.5E-02	1.3E-02	3.2E-06	0.0E+00	3.2E-06
PCB-81	MJ619	-	-	-	3.0E-03	2.3E-03	6.3E-07	0.0E+00	6.3E-07
Aroclor-1254	MJ728	2.3E-01	1.2E-01	U	-	-	-	-	-
Aroclor-1260	MJ728	2.3E-01	1.2E-01	U	-	-	-	-	-
PCB-105	MJ728	-	-	-	1.2E-01	8.2E-02	1.4E-05	9.4E-06	1.4E-05
PCB-114	MJ728	-	-	-	4.5E-03	1.5E-03	5.2E-07	1.7E-07	5.2E-07
PCB-118	MJ728	-	-	-	2.7E-01	1.6E-01	3.1E-05	1.9E-05	3.1E-05
PCB-123	MJ728	-	-	-	3.0E-03	2.3E-03	3.4E-07	2.7E-07	3.4E-07
PCB-126	MJ728	-	-	-	7.5E-03	6.4E-03	8.7E-07	7.3E-07	8.7E-07
PCB-156	MJ728	-	-	-	6.3E-02	5.5E-02	7.2E-06	6.3E-06	7.2E-06
PCB-157	MJ728	-	-	-	1.2E-02	2.5E-02	1.4E-06	2.8E-06	2.8E-06
PCB-167	MJ728	-	-	-	2.1E-02	4.3E-02	2.4E-06	4.9E-06	4.9E-06
PCB-169	MJ728	-	-	-	3.7E-04	6.4E-04	4.2E-08	7.3E-08	7.3E-08
PCB-189	MJ728	-	-	-	3.0E-03	6.4E-03	3.4E-07	7.3E-07	7.3E-07
PCB-77	MJ728	-	-	-	1.5E-02	1.3E-02	1.8E-06	1.5E-06	1.8E-06
PCB-81	MJ728	-	-	-	3.0E-03	2.3E-03	3.4E-07	2.6E-07	3.4E-07

Notes:
PCBs - polychlorinated biphenyls
EF- Extrapolation Factor (ng congener/kg soil)/(µg Aroclor/kg soil)
"-" not applicable
mg/kg - milligrams per kilogram
µg/kg - micrograms per kilogram
ng/kg - nanograms per kilogram
bgs- below ground surface
PCB_{MAX} = the maximum of the extrapolated Aroclor 1254 and 1260 concentrations

Spreadsheet C1-96 (1 of 2)

Aroclor to PCB Congener Extrapolation (0-4 feet bgs)
New Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentrations (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF_{1254}	EF_{1260}	Estimated Concentrations Aroclor-1254 (mg/kg)	Estimated Concentrations Aroclor-1260 (mg/kg)	Estimated Concentrations PCB_{MAX} (mg/kg)
Aroclor-1254	MJ775	1.9E-01	9.5E-02	U	-	-	-	-	-
Aroclor-1260	MJ775	1.9E-01	9.5E-02	U	-	-	-	-	-
PCB-105	MJ775	-	-	-	1.2E-01	8.2E-02	1.2E-05	7.8E-06	1.2E-05
PCB-114	MJ775	-	-	-	4.5E-03	1.5E-03	4.3E-07	1.4E-07	4.3E-07
PCB-118	MJ775	-	-	-	2.7E-01	1.6E-01	2.5E-05	1.6E-05	2.5E-05
PCB-123	MJ775	-	-	-	3.0E-03	2.3E-03	2.8E-07	2.2E-07	2.8E-07
PCB-126	MJ775	-	-	-	7.5E-03	6.4E-03	7.1E-07	6.0E-07	7.1E-07
PCB-156	MJ775	-	-	-	6.3E-02	5.5E-02	6.0E-06	5.2E-06	6.0E-06
PCB-157	MJ775	-	-	-	1.2E-02	2.5E-02	1.2E-06	2.3E-06	2.3E-06
PCB-167	MJ775	-	-	-	2.1E-02	4.3E-02	2.0E-06	4.1E-06	4.1E-06
PCB-169	MJ775	-	-	-	3.7E-04	6.4E-04	3.5E-08	6.0E-08	6.0E-08
PCB-189	MJ775	-	-	-	3.0E-03	6.4E-03	2.8E-07	6.0E-07	6.0E-07
PCB-77	MJ775	-	-	-	1.5E-02	1.3E-02	1.5E-06	1.2E-06	1.5E-06
PCB-81	MJ775	-	-	-	3.0E-03	2.3E-03	2.8E-07	2.1E-07	2.8E-07
Aroclor-1254	MJ724	2.0E-01	1.0E-01	U	-	-	-	-	-
Aroclor-1260	MJ724	2.0E-01	1.0E-01	U	-	-	-	-	-
PCB-105	MJ724	-	-	-	1.2E-01	8.2E-02	1.2E-05	8.2E-06	1.2E-05
PCB-114	MJ724	-	-	-	4.5E-03	1.5E-03	4.5E-07	1.5E-07	4.5E-07
PCB-118	MJ724	-	-	-	2.7E-01	1.6E-01	2.7E-05	1.6E-05	2.7E-05
PCB-123	MJ724	-	-	-	3.0E-03	2.3E-03	3.0E-07	2.3E-07	3.0E-07
PCB-126	MJ724	-	-	-	7.5E-03	6.4E-03	7.5E-07	6.4E-07	7.5E-07
PCB-156	MJ724	-	-	-	6.3E-02	5.5E-02	6.3E-06	5.5E-06	6.3E-06
PCB-157	MJ724	-	-	-	1.2E-02	2.5E-02	1.2E-06	2.5E-06	2.5E-06
PCB-167	MJ724	-	-	-	2.1E-02	4.3E-02	2.1E-06	4.3E-06	4.3E-06
PCB-169	MJ724	-	-	-	3.7E-04	6.4E-04	3.7E-08	6.4E-08	6.4E-08
PCB-189	MJ724	-	-	-	3.0E-03	6.4E-03	3.0E-07	6.4E-07	6.4E-07
PCB-77	MJ724	-	-	-	1.5E-02	1.3E-02	1.5E-06	1.3E-06	1.5E-06
PCB-81	MJ724	-	-	-	3.0E-03	2.3E-03	3.0E-07	2.3E-07	3.0E-07
Aroclor-1254	MJ734	2.1E-01	1.1E-01	U	-	-	-	-	-
Aroclor-1260	MJ734	2.1E-01	1.1E-01	U	-	-	-	-	-
PCB-105	MJ734	-	-	-	1.2E-01	8.2E-02	1.3E-05	8.6E-06	1.3E-05
PCB-114	MJ734	-	-	-	4.5E-03	1.5E-03	4.8E-07	1.5E-07	4.8E-07
PCB-118	MJ734	-	-	-	2.7E-01	1.6E-01	2.8E-05	1.7E-05	2.8E-05
PCB-123	MJ734	-	-	-	3.0E-03	2.3E-03	3.1E-07	2.4E-07	3.1E-07
PCB-126	MJ734	-	-	-	7.5E-03	6.4E-03	7.9E-07	6.7E-07	7.9E-07
PCB-156	MJ734	-	-	-	6.3E-02	5.5E-02	6.6E-06	5.7E-06	6.6E-06
PCB-157	MJ734	-	-	-	1.2E-02	2.5E-02	1.3E-06	2.6E-06	2.6E-06
PCB-167	MJ734	-	-	-	2.1E-02	4.3E-02	2.2E-06	4.5E-06	4.5E-06
PCB-169	MJ734	-	-	-	3.7E-04	6.4E-04	3.8E-08	6.7E-08	6.7E-08
PCB-189	MJ734	-	-	-	3.0E-03	6.4E-03	3.1E-07	6.7E-07	6.7E-07
PCB-77	MJ734	-	-	-	1.5E-02	1.3E-02	1.6E-06	1.3E-06	1.6E-06
PCB-81	MJ734	-	-	-	3.0E-03	2.3E-03	3.1E-07	2.4E-07	3.1E-07
Aroclor-1254	MJ619	2.1E-01	2.1E-01	J	-	-	-	-	-
Aroclor-1260	MJ619	0.0E+00	0.0E+00	U	-	-	-	-	-
PCB-105	MJ619	-	-	-	1.2E-01	8.2E-02	2.6E-05	0.0E+00	2.6E-05
PCB-114	MJ619	-	-	-	4.5E-03	1.5E-03	9.5E-07	0.0E+00	9.5E-07
PCB-118	MJ619	-	-	-	2.7E-01	1.6E-01	5.6E-05	0.0E+00	5.6E-05
PCB-123	MJ619	-	-	-	3.0E-03	2.3E-03	6.3E-07	0.0E+00	6.3E-07
PCB-126	MJ619	-	-	-	7.5E-03	6.4E-03	1.6E-06	0.0E+00	1.6E-06
PCB-156	MJ619	-	-	-	6.3E-02	5.5E-02	1.3E-05	0.0E+00	1.3E-05
PCB-157	MJ619	-	-	-	1.2E-02	2.5E-02	2.6E-06	0.0E+00	2.6E-06
PCB-167	MJ619	-	-	-	2.1E-02	4.3E-02	4.3E-06	0.0E+00	4.3E-06
PCB-169	MJ619	-	-	-	3.7E-04	6.4E-04	7.7E-08	0.0E+00	7.7E-08
PCB-189	MJ619	-	-	-	3.0E-03	6.4E-03	6.3E-07	0.0E+00	6.3E-07

Spreadsheet C1-96 (2 of 2)

Aroclor to PCB Congener Extrapolation (0-4 feet bgs)
New Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentrations (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF_{1254}	EF_{1260}	Estimated Concentrations Aroclor-1254 (mg/kg)	Estimated Concentrations Aroclor-1260 (mg/kg)	Estimated Concentrations PCB_{MAX} (mg/kg)
PCB-77	MJ619	-	-	-	1.5E-02	1.3E-02	3.2E-06	0.0E+00	3.2E-06
PCB-81	MJ619	-	-	-	3.0E-03	2.3E-03	6.3E-07	0.0E+00	6.3E-07
Aroclor-1254	MJ728	2.3E-01	1.2E-01	U	-	-	-	-	-
Aroclor-1260	MJ728	2.3E-01	1.2E-01	U	-	-	-	-	-
PCB-105	MJ728	-	-	-	1.2E-01	8.2E-02	1.4E-05	9.4E-06	1.4E-05
PCB-114	MJ728	-	-	-	4.5E-03	1.5E-03	5.2E-07	1.7E-07	5.2E-07
PCB-118	MJ728	-	-	-	2.7E-01	1.6E-01	3.1E-05	1.9E-05	3.1E-05
PCB-123	MJ728	-	-	-	3.0E-03	2.3E-03	3.4E-07	2.7E-07	3.4E-07
PCB-126	MJ728	-	-	-	7.5E-03	6.4E-03	8.7E-07	7.3E-07	8.7E-07
PCB-156	MJ728	-	-	-	6.3E-02	5.5E-02	7.2E-06	6.3E-06	7.2E-06
PCB-157	MJ728	-	-	-	1.2E-02	2.5E-02	1.4E-06	2.8E-06	2.8E-06
PCB-167	MJ728	-	-	-	2.1E-02	4.3E-02	2.4E-06	4.9E-06	4.9E-06
PCB-169	MJ728	-	-	-	3.7E-04	6.4E-04	4.2E-08	7.3E-08	7.3E-08
PCB-189	MJ728	-	-	-	3.0E-03	6.4E-03	3.4E-07	7.3E-07	7.3E-07
PCB-77	MJ728	-	-	-	1.5E-02	1.3E-02	1.8E-06	1.5E-06	1.8E-06
PCB-81	MJ728	-	-	-	3.0E-03	2.3E-03	3.4E-07	2.6E-07	3.4E-07

Notes:
PCBs - polychlorinated biphenyls
EF- Extrapolation Factor (ng congener/kg soil)/(µg Aroclor/kg soil)
"-" not applicable
mg/kg - milligrams per kilogram
µg/kg - micrograms per kilogram
ng/kg - nanograms per kilogram
bgs- below ground surface
PCB_{MAX} = the maximum of the extrapolated Aroclor 1254 and 1260 concentrations

Spreadsheet C1-94 (1 of 2)

Aroclor to PCB Congener Extrapolation (0-2 feet bgs)
New Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentrations (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF_{1254}	EF_{1260}	Estimated Concentrations Aroclor 1254 (mg/kg)	Estimated Concentrations Aroclor 1260 (mg/kg)	Estimated Concentrations PCB_{MAX} (mg/kg)
Aroclor-1254	MJ775	1.9E-01	9.5E-02	U	-	-	-	-	-
Aroclor-1260	MJ775	1.9E-01	9.5E-02	U	-	-	-	-	-
PCB-105	MJ775	-	-	-	1.2E-01	8.2E-02	1.2E-05	7.8E-06	1.2E-05
PCB-114	MJ775	-	-	-	4.5E-03	1.5E-03	4.3E-07	1.4E-07	4.3E-07
PCB-118	MJ775	-	-	-	2.7E-01	1.6E-01	2.5E-05	1.6E-05	2.5E-05
PCB-123	MJ775	-	-	-	3.0E-03	2.3E-03	2.8E-07	2.2E-07	2.8E-07
PCB-126	MJ775	-	-	-	7.5E-03	6.4E-03	7.1E-07	6.0E-07	7.1E-07
PCB-156	MJ775	-	-	-	6.3E-02	5.5E-02	6.0E-06	5.2E-06	6.0E-06
PCB-157	MJ775	-	-	-	1.2E-02	2.5E-02	1.2E-06	2.3E-06	2.3E-06
PCB-167	MJ775	-	-	-	2.1E-02	4.3E-02	2.0E-06	4.1E-06	4.1E-06
PCB-169	MJ775	-	-	-	3.7E-04	6.4E-04	3.5E-08	6.0E-08	6.0E-08
PCB-189	MJ775	-	-	-	3.0E-03	6.4E-03	2.8E-07	6.0E-07	6.0E-07
PCB-77	MJ775	-	-	-	1.5E-02	1.3E-02	1.5E-06	1.2E-06	1.5E-06
PCB-81	MJ775	-	-	-	3.0E-03	2.3E-03	2.8E-07	2.1E-07	2.8E-07
Aroclor-1254	MJ724	2.0E-01	1.0E-01	U	-	-	-	-	-
Aroclor-1260	MJ724	2.0E-01	1.0E-01	U	-	-	-	-	-
PCB-105	MJ724	-	-	-	1.2E-01	8.2E-02	1.2E-05	8.2E-06	1.2E-05
PCB-114	MJ724	-	-	-	4.5E-03	1.5E-03	4.5E-07	1.5E-07	4.5E-07
PCB-118	MJ724	-	-	-	2.7E-01	1.6E-01	2.7E-05	1.6E-05	2.7E-05
PCB-123	MJ724	-	-	-	3.0E-03	2.3E-03	3.0E-07	2.3E-07	3.0E-07
PCB-126	MJ724	-	-	-	7.5E-03	6.4E-03	7.5E-07	6.4E-07	7.5E-07
PCB-156	MJ724	-	-	-	6.3E-02	5.5E-02	6.3E-06	5.5E-06	6.3E-06
PCB-157	MJ724	-	-	-	1.2E-02	2.5E-02	1.2E-06	2.5E-06	2.5E-06
PCB-167	MJ724	-	-	-	2.1E-02	4.3E-02	2.1E-06	4.3E-06	4.3E-06
PCB-169	MJ724	-	-	-	3.7E-04	6.4E-04	3.7E-08	6.4E-08	6.4E-08
PCB-189	MJ724	-	-	-	3.0E-03	6.4E-03	3.0E-07	6.4E-07	6.4E-07
PCB-77	MJ724	-	-	-	1.5E-02	1.3E-02	1.5E-06	1.3E-06	1.5E-06
PCB-81	MJ724	-	-	-	3.0E-03	2.3E-03	3.0E-07	2.3E-07	3.0E-07
Aroclor-1254	MJ734	2.1E-01	1.1E-01	U	-	-	-	-	-
Aroclor-1260	MJ734	2.1E-01	1.1E-01	U	-	-	-	-	-
PCB-105	MJ734	-	-	-	1.2E-01	8.2E-02	1.3E-05	8.6E-06	1.3E-05
PCB-114	MJ734	-	-	-	4.5E-03	1.5E-03	4.8E-07	1.5E-07	4.8E-07
PCB-118	MJ734	-	-	-	2.7E-01	1.6E-01	2.8E-05	1.7E-05	2.8E-05
PCB-123	MJ734	-	-	-	3.0E-03	2.3E-03	3.1E-07	2.4E-07	3.1E-07
PCB-126	MJ734	-	-	-	7.5E-03	6.4E-03	7.9E-07	6.7E-07	7.9E-07
PCB-156	MJ734	-	-	-	6.3E-02	5.5E-02	6.6E-06	5.7E-06	6.6E-06
PCB-157	MJ734	-	-	-	1.2E-02	2.5E-02	1.3E-06	2.6E-06	2.6E-06
PCB-167	MJ734	-	-	-	2.1E-02	4.3E-02	2.2E-06	4.5E-06	4.5E-06
PCB-169	MJ734	-	-	-	3.7E-04	6.4E-04	3.8E-08	6.7E-08	6.7E-08
PCB-189	MJ734	-	-	-	3.0E-03	6.4E-03	3.1E-07	6.7E-07	6.7E-07
PCB-77	MJ734	-	-	-	1.5E-02	1.3E-02	1.6E-06	1.3E-06	1.6E-06
PCB-81	MJ734	-	-	-	3.0E-03	2.3E-03	3.1E-07	2.4E-07	3.1E-07
Aroclor-1254	MJ619	2.1E-01	2.1E-01	J	-	-	-	-	-
Aroclor-1260	MJ619	0.0E+00	0.0E+00	U	-	-	-	-	-
PCB-105	MJ619	-	-	-	1.2E-01	8.2E-02	2.6E-05	0.0E+00	2.6E-05
PCB-114	MJ619	-	-	-	4.5E-03	1.5E-03	9.5E-07	0.0E+00	9.5E-07
PCB-118	MJ619	-	-	-	2.7E-01	1.6E-01	5.6E-05	0.0E+00	5.6E-05
PCB-123	MJ619	-	-	-	3.0E-03	2.3E-03	6.3E-07	0.0E+00	6.3E-07
PCB-126	MJ619	-	-	-	7.5E-03	6.4E-03	1.6E-06	0.0E+00	1.6E-06
PCB-156	MJ619	-	-	-	6.3E-02	5.5E-02	1.3E-05	0.0E+00	1.3E-05
PCB-157	MJ619	-	-	-	1.2E-02	2.5E-02	2.6E-06	0.0E+00	2.6E-06
PCB-167	MJ619	-	-	-	2.1E-02	4.3E-02	4.3E-06	0.0E+00	4.3E-06
PCB-169	MJ619	-	-	-	3.7E-04	6.4E-04	7.7E-08	0.0E+00	7.7E-08
PCB-189	MJ619	-	-	-	3.0E-03	6.4E-03	6.3E-07	0.0E+00	6.3E-07

Spreadsheet C1-94 (2 of 2)

Aroclor to PCB Congener Extrapolation (0-2 feet bgs)
New Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentrations (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF_{1254}	EF_{1260}	Estimated Concentrations Aroclor 1254 (mg/kg)	Estimated Concentrations Aroclor 1260 (mg/kg)	Estimated Concentrations PCB_{MAX} (mg/kg)
PCB-77	MJ619	-	-	-	1.5E-02	1.3E-02	3.2E-06	0.0E+00	3.2E-06
PCB-81	MJ619	-	-	-	3.0E-03	2.3E-03	6.3E-07	0.0E+00	6.3E-07
Aroclor-1254	MJ728	2.3E-01	1.2E-01	U	-	-	-	-	-
Aroclor-1260	MJ728	2.3E-01	1.2E-01	U	-	-	-	-	-
PCB-105	MJ728	-	-	-	1.2E-01	8.2E-02	1.4E-05	9.4E-06	1.4E-05
PCB-114	MJ728	-	-	-	4.5E-03	1.5E-03	5.2E-07	1.7E-07	5.2E-07
PCB-118	MJ728	-	-	-	2.7E-01	1.6E-01	3.1E-05	1.9E-05	3.1E-05
PCB-123	MJ728	-	-	-	3.0E-03	2.3E-03	3.4E-07	2.7E-07	3.4E-07
PCB-126	MJ728	-	-	-	7.5E-03	6.4E-03	8.7E-07	7.3E-07	8.7E-07
PCB-156	MJ728	-	-	-	6.3E-02	5.5E-02	7.2E-06	6.3E-06	7.2E-06
PCB-157	MJ728	-	-	-	1.2E-02	2.5E-02	1.4E-06	2.8E-06	2.8E-06
PCB-167	MJ728	-	-	-	2.1E-02	4.3E-02	2.4E-06	4.9E-06	4.9E-06
PCB-169	MJ728	-	-	-	3.7E-04	6.4E-04	4.2E-08	7.3E-08	7.3E-08
PCB-189	MJ728	-	-	-	3.0E-03	6.4E-03	3.4E-07	7.3E-07	7.3E-07
PCB-77	MJ728	-	-	-	1.5E-02	1.3E-02	1.8E-06	1.5E-06	1.8E-06
PCB-81	MJ728	-	-	-	3.0E-03	2.3E-03	3.4E-07	2.6E-07	3.4E-07

Notes:
PCBs - polychlorinated biphenyls
EF- Extrapolation Factor (ng congener/kg soil)/(µg Aroclor/kg soil)
"-" not applicable
mg/kg - milligrams per kilogram
µg/kg - micrograms per kilogram
ng/kg - nanograms per kilogram
bgs- below ground surface
PCB_{MAX} = the maximum of the extrapolated Aroclor 1254 and 1260 concentrations

Exposure Point Concentrations for CPECs in Soil/Sediment (0-6 feet bgs)
New Conservation Yard RFI Site

Chemical	Distribution Type	EPCs		
		CTE[a] (mg/kg)	RME[b] (mg/kg)	
Inorganic Compounds				
Antimony	NT	5.5E+00	6.0E+00	c
Barium	NP	2.1E+02	5.2E+02	
Cadmium	NP	1.7E+00	1.3E+01	
Chromium	NP	2.3E+01	3.9E+01	
Copper	NP	2.8E+01	7.8E+01	
Lead	G	2.4E+01	3.3E+01	
Mercury	NP	1.2E-01	6.2E-01	
Molybdenum	NT	3.5E+00	6.0E+00	c
Nickel	NP	2.2E+01	5.4E+01	
Selenium	NT	1.7E+00	3.0E+00	c
Silver	NP	1.5E+01	9.2E+01	
Zinc	NT	5.0E+02	3.4E+03	
VOCs				
Toluene	NP	3.9E-02	1.0E-01	
SVOCs				
Benzo(a)anthracene	NP	4.9E-02	1.2E-02	
Benzo(a)pyrene	NP	5.1E-02	4.3E-02	
Benzo(b)fluoranthene	NP	5.4E-02	6.5E-02	
Benzo(g,h,i)perylene	NP	5.0E-02	3.1E-02	
Benzo(k)fluoranthene	NP	4.9E-02	1.2E-02	
Chrysene	NP	5.1E-02	2.7E-02	
Dibenz(a,h)anthracene	NP	4.8E-02	8.0E-03	
Fluoranthene	NP	5.3E-02	3.6E-02	
Indeno(1,2,3-cd)pyrene	NP	5.2E-02	5.3E-02	
Phenanthrene	NP	4.9E-02	1.4E-02	
Pyrene	NP	5.3E-02	4.3E-02	
PCDD/PCDFs				
2,3,7,8-TCDD	LN	5.3E-06	3.0E-05	
1,2,3,7,8-PeCDD	LN	1.5E-05	9.0E-05	
1,2,3,4,7,8-HxCDD	G	3.9E-05	9.4E-05	
1,2,3,6,7,8-HxCDD	G	1.9E-04	4.8E-04	
1,2,3,7,8,9-HxCDD	LN	6.8E-05	4.1E-04	
1,2,3,4,6,7,8-HpCDD	G	4.5E-03	1.1E-02	
OCDD	G	5.2E-02	1.2E-01	
2,3,7,8-TCDF	G	2.9E-06	5.6E-06	
1,2,3,7,8-PeCDF	NP	3.4E-06	1.0E-05	
2,3,4,7,8-PeCDF	G	8.3E-06	1.6E-05	
1,2,3,4,7,8-HxCDF	G	2.6E-05	5.7E-05	
1,2,3,6,7,8-HxCDF	G	2.0E-05	4.4E-05	
2,3,4,6,7,8-HxCDF	G	4.1E-05	9.6E-05	
1,2,3,7,8,9-HxCDF	G	6.5E-06	1.3E-05	
1,2,3,4,6,7,8-HpCDF	G	7.3E-04	1.8E-03	
1,2,3,4,7,8,9-HpCDF	G	6.9E-05	1.6E-04	
OCDF	G	1.9E-03	4.6E-03	
PCBs				
Aroclor-1254	N	7.1E-02	7.1E-02	
PCB-105	NP	1.5E-05	2.1E-05	
PCB-114	NP	5.7E-07	7.7E-07	
PCB-118	NP	3.4E-05	4.6E-05	
PCB-123	NP	3.7E-07	5.1E-07	
PCB-126	NP	9.4E-07	1.3E-06	
PCB-156	NP	7.9E-06	1.1E-05	
PCB-157	N	2.6E-06	2.7E-06	

Exposure Point Concentrations for CPECs in Soil/Sediment (0-6 feet bgs)
New Conservation Yard RFI Site

Chemical	Distribution Type	EPCs	
		CTE[a] (mg/kg)	RME[b] (mg/kg)
PCB-167	N	4.4E-06	4.7E-06
PCB-169	N	6.8E-08	7.5E-08
PCB-189	N	6.5E-07	7.0E-07
PCB-77	NP	1.9E-06	2.6E-06
PCB-81	NP	3.7E-07	5.1E-07

Notes:

a. Either the arithmetic mean concentration for two or more samples or the reported concentration for a single sample.

b. Either the 95% upper confidence limit (95% UCL) on the arithmetic mean for three or more samples, or the maximum concentration for less than three samples, or the maximum concentration in cases where the 95% UCL exceeds the maximum concentration.

c. Exposure point concentrations estimated at one-half the sample quantitation limit for soil at 0 to 6 feet bgs.

CPEC - chemical of potential ecological concern
EPC - exposure point concentration
CTE - central tendency exposure
RME - reasonable maximum exposure
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCDD/PCDF - Polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.
N - normal distribution
LN - lognormal distribution
I - indeterminate
NT - data not tested for distribution due to sample size
"-" not applicable
mg/kg - milligrams per kilogram
bgs- below ground surface

Exposure Point Concentrations for CPECs in Soil/Sediment (0-4 feet bgs)
New Conservation Yard RFI Site

Chemical	Distribution Type	EPCs CTE[a] (mg/kg)	EPCs RME[b] (mg/kg)	
Inorganic Compounds				
Antimony	NT	5.5E+00	6.0E+00	c
Barium	NT	2.1E+02	5.2E+02	
Cadmium	NT	1.7E+00	1.3E+01	
Chromium	NT	2.3E+01	3.9E+01	
Copper	NT	2.8E+01	7.8E+01	
Lead	NT	2.4E+01	3.3E+01	
Mercury	NT	1.2E-01	6.2E-01	
Molybdenum	NT	3.5E+00	6.0E+00	c
Nickel	NT	2.2E+01	5.4E+01	
Selenium	NT	1.7E+00	3.0E+00	c
Silver	NT	1.5E+01	9.2E+01	
Zinc	NT	5.0E+02	3.4E+03	
VOCs				
Toluene	NT	3.9E-02	1.0E-01	
SVOCs				
Benzo(a)anthracene	NT	4.9E-02	1.2E-02	
Benzo(a)pyrene	NT	5.1E-02	4.3E-02	
Benzo(b)fluoranthene	NT	5.4E-02	6.5E-02	
Benzo(g,h,i)perylene	NT	5.0E-02	3.1E-02	
Benzo(k)fluoranthene	NT	4.9E-02	1.2E-02	
Chrysene	NT	5.1E-02	2.7E-02	
Dibenz(a,h)anthracene	NT	4.8E-02	8.0E-03	
Fluoranthene	NT	5.3E-02	3.6E-02	
Indeno(1,2,3-cd)pyrene	NT	5.2E-02	5.3E-02	
Phenanthrene	NT	4.9E-02	1.4E-02	
Pyrene	NT	5.3E-02	4.3E-02	
PCDD/PCDFs				
2,3,7,8-TCDD	NT	5.3E-06	3.0E-05	
1,2,3,7,8-PeCDD	NT	1.5E-05	9.0E-05	
1,2,3,4,7,8-HxCDD	NT	3.9E-05	9.4E-05	
1,2,3,6,7,8-HxCDD	NT	1.9E-04	4.8E-04	
1,2,3,7,8,9-HxCDD	NT	6.8E-05	4.1E-04	
1,2,3,4,6,7,8-HpCDD	NT	4.5E-03	1.1E-02	
OCDD	NT	5.2E-02	1.2E-01	
2,3,7,8-TCDF	NT	2.9E-06	5.6E-06	
1,2,3,7,8-PeCDF	NT	3.4E-06	1.0E-05	
2,3,4,7,8-PeCDF	NT	8.3E-06	1.6E-05	
1,2,3,4,7,8-HxCDF	NT	2.6E-05	5.7E-05	
1,2,3,6,7,8-HxCDF	NT	2.0E-05	4.4E-05	
2,3,4,6,7,8-HxCDF	NT	4.1E-05	9.6E-05	
1,2,3,7,8,9-HxCDF	NT	6.5E-06	1.3E-05	
1,2,3,4,6,7,8-HpCDF	NT	7.3E-04	1.8E-03	
1,2,3,4,7,8,9-HpCDF	NT	6.9E-05	1.6E-04	
OCDF	NT	1.9E-03	4.6E-03	
PCBs				
Aroclor-1254	NT	7.1E-02	7.1E-02	
PCB-105	NT	1.5E-05	2.1E-05	
PCB-114	NT	5.7E-07	7.7E-07	
PCB-118	NT	3.4E-05	4.6E-05	
PCB-123	NT	3.7E-07	5.1E-07	
PCB-126	NT	9.4E-07	1.3E-06	
PCB-156	NT	7.9E-06	1.1E-05	
PCB-157	NT	2.6E-06	2.7E-06	

Exposure Point Concentrations for CPECs in Soil/Sediment (0-4 feet bgs)
New Conservation Yard RFI Site

Chemical	Distribution Type	EPCs	
		CTE[a] (mg/kg)	RME[b] (mg/kg)
PCB-167	NT	4.4E-06	4.7E-06
PCB-169	NT	6.8E-08	7.5E-08
PCB-189	NT	6.5E-07	7.0E-07
PCB-77	NT	1.9E-06	2.6E-06
PCB-81	NT	3.7E-07	5.1E-07

Notes:

a. Either the arithmetic mean concentration for two or more samples or the reported concentration for a single sample.

b. Either the 95% upper confidence limit (95% UCL) on the arithmetic mean for three or more samples, or the maximum concentration for less than three samples, or the maximum concentration in cases where the 95% UCL exceeds the maximum concentration.

c. Exposure point concentrations estimated at one-half the sample quantitation limit for soil at 0 to 4 feet bgs.

CPEC - chemical of potential ecological concern
EPC - exposure point concentration
CTE - central tendency exposure
RME - reasonable maximum exposure
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCDD/PCDF - polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.
N - normal distribution
LN - lognormal distribution
I - inderterminate
NT - data not tested for distribution due to sample size
"-" not applicable
mg/kg - milligrams per kilogram
bgs- below ground surface

Exposure Point Concentrations for CPECs in Soil/Sediment (0-2 feet bgs)
New Conservation Yard RFI Site

Chemical	Distribution Type	EPCs CTE[a] (mg/kg)	EPCs RME[b] (mg/kg)	
Inorganic Compounds				
Antimony	NT	5.6E+00	6.0E+00	c
Barium	NP	2.2E+02	9.6E+02	
Cadmium	NP	1.8E+00	1.3E+01	
Chromium	NP	2.3E+01	4.1E+01	
Copper	NP	2.9E+01	8.2E+01	
Lead	G	2.6E+01	3.5E+01	
Mercury	NP	1.2E-01	6.4E-01	
Molybdenum	NT	3.4E+00	6.0E+00	c
Nickel	NP	2.2E+01	5.7E+01	
Selenium	NT	1.7E+00	3.0E+00	c
Silver	NP	1.5E+01	9.6E+01	
Zinc	NP	5.4E+02	2.8E+03	
VOCs				
Toluene	NT	5.3E-02	1.1E-01	
SVOCs				
Benzo(a)anthracene	NP	3.6E-02	1.2E-02	
Benzo(a)pyrene	NP	4.0E-02	4.3E-02	
Benzo(b)fluoranthene	G	4.3E-02	6.5E-02	
Benzo(g,h,i)perylene	G	3.9E-02	3.1E-02	
Benzo(k)fluoranthene	NP	3.6E-02	1.2E-02	
Chrysene	G	4.0E-02	2.7E-02	
Dibenz(a,h)anthracene	NP	3.6E-02	8.0E-03	
Fluoranthene	G	4.3E-02	3.6E-02	
Indeno(1,2,3-cd)pyrene	NP	4.1E-02	5.3E-02	
Phenanthrene	NP	3.7E-02	1.4E-02	
Pyrene	G	4.3E-02	4.3E-02	
PCDD/PCDFs				
2,3,7,8-TCDD	LN	5.6E-06	3.4E-05	
1,2,3,7,8-PeCDD	LN	1.6E-05	9.0E-05	
1,2,3,4,7,8-HxCDD	G	4.1E-05	1.0E-04	
1,2,3,6,7,8-HxCDD	G	2.0E-04	5.4E-04	
1,2,3,7,8,9-HxCDD	LN	7.1E-05	4.7E-04	
1,2,3,4,6,7,8-HpCDD	G	4.7E-03	1.2E-02	
OCDD	G	5.4E-02	1.4E-01	
2,3,7,8-TCDF	G	3.1E-06	5.7E-06	
1,2,3,7,8-PeCDF	LN	3.6E-06	1.0E-05	
2,3,4,7,8-PeCDF	G	8.8E-06	1.7E-05	
1,2,3,4,7,8-HxCDF	G	2.7E-05	6.3E-05	
1,2,3,6,7,8-HxCDF	G	2.1E-05	4.9E-05	
2,3,4,6,7,8-HxCDF	G	4.3E-05	1.1E-04	
1,2,3,7,8,9-HxCDF	G	6.9E-06	1.4E-05	
1,2,3,4,6,7,8-HpCDF	G	7.7E-04	2.0E-03	
1,2,3,4,7,8,9-HpCDF	G	7.2E-05	1.8E-04	
OCDF	G	2.0E-03	5.1E-03	
Total Hepta	G	5.5E-03	1.4E-02	
Total Octa	G	5.6E-02	1.4E-01	
PCBs				
Aroclor-1254	N	7.1E-02	7.1E-02	
PCB-105	NP	1.5E-05	2.1E-05	
PCB-114	NP	5.7E-07	7.7E-07	
PCB-118	NP	3.4E-05	4.6E-05	
PCB-123	NP	3.7E-07	5.1E-07	
PCB-126	NP	9.4E-07	1.3E-06	
PCB-156	NP	7.9E-06	1.1E-05	

Exposure Point Concentrations for CPECs in Soil/Sediment (0-2 feet bgs)
New Conservation Yard RFI Site

Chemical	Distribution Type	EPCs	
		CTE[a] (mg/kg)	RME[b] (mg/kg)
PCB-157	N	2.6E-06	2.7E-06
PCB-167	N	4.4E-06	4.7E-06
PCB-169	N	6.8E-08	7.5E-08
PCB-189	N	6.5E-07	7.0E-07
PCB-77	NP	1.9E-06	2.6E-06
PCB-81	NP	3.7E-07	5.1E-07

Notes:

a. Either the arithmetic mean concentration for two or more samples or the reported concentration for a single sample.

b. Either the 95% upper confidence limit (95% UCL) on the arithmetic mean for three or more samples, or the maximum concentration for less than three samples, or the maximum concentration in cases where the 95% UCL exceeds the maximum concentration.

c. Exposure point concentrations estimated at one-half the sample quantitation limit for soil at 0 to 2 fe

CPEC - chemical of potential ecological concern
EPC - exposure point concentration
CTE - Central Tendency Exposure
RME - Reasonable Maximum Exposure
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCDD/PCDF - polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.
N - normal distribution
LN - lognormal distribution
I - inderterminate
NT - data not tested for distribution due to sample size
"-" not applicable
mg/kg - milligrams per kilogram
bgs- below ground surface

Spreadsheet C1-89 (1 of 1)

Assessment and Measurement Endpoints
New Conservation Yard RFI Site

Assessment Goal	Assessment Endpoint	Measurement Endpoint	
		Meaure of Exposure	Measure of Effect
Protect wildlife populations and plant communities from acute or chronic health effects resulting from exposure to site contaminants	Protect the abundance of native terrestrial vegetation by limiting acute and chronic adverse effects from exposure to site-related CPECs.		Characterize native plant abundance through site-specific observational surveys of plant communities
	Protect the abundance of terrestrial invertebrate community by limiting acute and chronic adverse effects from exposure to site-related CPECs.	CPEC concentrations in soil	Compare CPEC concentrations to TRVs for soil invertebrates
	Protect avian species from acute or chronic health effects (direct and/or secondary effects) related to CPEC exposure	Calculate daily CPEC dosage to red-tailed hawk and thrush using exposure model	Compare CPEC doses to TRVs for the red-tailed hawk or similar raptor species
	Protect bobcat from acute or chronic health effects related to CPEC exposure	Calculate daily CPEC dosage to bobcat using exposure model	Compare CPEC doses to TRVs for bobcat or similar species
	Protect deer from acute or chronic health effects related to secondary exposures to CPEC	Calculate daily CPEC dosage to mule deer using exposure model	Compare CPEC doses to TRVs for mule deer or similar species
	Protect prey abundance of raptor and bobcat prey items (rodents) from direct exposure to CPEC	Calculate daily CPEC dosage to the deer mouse using exposure model	Compare CPEC doses to TRVs for the deer mouse or similar species

Notes:
BAF = Bioaccumulation factor
CPEC = chemicals of potential ecological concern
NOAEL = no observable adverse effect level

Summary of Habitats
New Conservation Yard RFI Site

Habitat	Species Potentially Present	Observed Species[a]	Relative Occurrrence	Status[b]	Representative Ecological Receptor
Coast live oak woodland	deer	mule deer	common	none	mule deer
	coast live oak		common	none	bobcat
	bobcat				
	plants				
Nonnative grassland	invertebrates	invertebrates	common	none	earthworm
	rodents	rodents	common	none	deer mouse
	small birds		common	none	thrush
	raptors	raptors	uncommon	none	red-tailed hawk
	deer	mule deer	common	none	mule deer
			uncommon	none	bobcat
Scrub	invertebrates	invertebrates	common	none	earthworm
	rodents		common	none	deer mouse
	small birds		common	none	thrush
	raptors		uncommon	none	red-tailed hawk
	deer		common	none	mule deer
			uncommon	none	bobcat

Notes:
a. Relative to other habitat types within the RFI site.
b. Listed state or federal threatened or endangered species, or proposed for listing.

PCDD/PCDF Congener Group Summation for Soil/Sediment (0-6 feet bgs)
New Conservation Yard RFI Site

EPA ID	PCDD/PCDF Congener	Measured Concentration [a] (mg/kg)	Data Qualifier	Adjusted Concentration [b] (mg/kg)	Sum of PCDD/PCDF Congener Concentrations				
					Total Tetra (mg/kg)	Total Penta (mg/kg)	Total Hexa (mg/kg)	Total Hepta (mg/kg)	Total Octa (mg/kg)
RJ011	1,2,3,4,6,7,8-HpCDD	3.2E-04		3.2E-04	2.6E-06	4.4E-06	3.7E-05	3.9E-04	4.0E-03
RJ011	1,2,3,4,6,7,8-HpCDF	1.1E-04	UJ	5.5E-05					
RJ011	1,2,3,4,7,8,9-HpCDF	1.0E-05	J	1.0E-05					
RJ011	1,2,3,4,7,8-HxCDD	9.6E-07	U	4.8E-07					
RJ011	1,2,3,4,7,8-HxCDF	1.0E-05	J	1.0E-05					
RJ011	1,2,3,6,7,8-HxCDD	1.0E-05	J	1.0E-05					
RJ011	1,2,3,6,7,8-HxCDF	1.0E-05	UJ	5.0E-06					
RJ011	1,2,3,7,8,9-HxCDD	3.2E-06	J	3.2E-06					
RJ011	1,2,3,7,8,9-HxCDF	3.7E-06	J	3.7E-06					
RJ011	1,2,3,7,8-PeCDD	5.5E-07	U	2.8E-07					
RJ011	1,2,3,7,8-PeCDF	1.7E-06	UJ	8.5E-07					
RJ011	2,3,4,6,7,8-HxCDF	4.2E-06	J	4.2E-06					
RJ011	2,3,4,7,8-PeCDF	3.3E-06	J	3.3E-06					
RJ011	2,3,7,8-TCDD	1.3E-06	U	6.5E-07					
RJ011	2,3,7,8-TCDF	1.9E-06	J	1.9E-06					
RJ011	OCDD	3.9E-03		3.9E-03					
RJ011	OCDF	1.2E-04		1.2E-04					
RJ011	Total HpCDD	6.1E-04		6.1E-04					
RJ011	Total HpCDF	1.8E-04		1.8E-04					
RJ011	Total HxCDD	9.0E-05		9.0E-05					
RJ011	Total HxCDF	1.5E-04		1.5E-04					
RJ011	Total PeCDD	4.6E-06	J	4.6E-06					
RJ011	Total PeCDF	1.0E-05	J	1.0E-05					
RJ011	Total TCDD	1.0E-05		1.0E-05					
RJ011	Total TCDF	2.0E-05		2.0E-05					
RJ012	1,2,3,4,6,7,8-HpCDD	2.0E-05		2.0E-05	6.3E-07	9.4E-07	3.4E-06	2.5E-05	2.5E-04
RJ012	1,2,3,4,6,7,8-HpCDF	1.0E-05	UJ	5.0E-06					
RJ012	1,2,3,4,7,8,9-HpCDF	9.2E-07	U	4.6E-07					
RJ012	1,2,3,4,7,8-HxCDD	1.7E-06	U	8.5E-07					
RJ012	1,2,3,4,7,8-HxCDF	4.0E-07	U	2.0E-07					
RJ012	1,2,3,6,7,8-HxCDD	1.4E-06	U	7.0E-07					
RJ012	1,2,3,6,7,8-HxCDF	7.9E-07	U	4.0E-07					
RJ012	1,2,3,7,8,9-HxCDD	1.2E-06	U	6.0E-07					
RJ012	1,2,3,7,8,9-HxCDF	6.0E-07	U	3.0E-07					
RJ012	1,2,3,7,8-PeCDD	5.8E-07	U	2.9E-07					
RJ012	1,2,3,7,8-PeCDF	8.6E-07	U	4.3E-07					
RJ012	2,3,4,6,7,8-HxCDF	6.4E-07	U	3.2E-07					
RJ012	2,3,4,7,8-PeCDF	4.4E-07	U	2.2E-07					
RJ012	2,3,7,8-TCDD	7.9E-07	U	4.0E-07					
RJ012	2,3,7,8-TCDF	4.6E-07	U	2.3E-07					
RJ012	OCDD	2.3E-04		2.3E-04					
RJ012	OCDF	2.0E-05	J	2.0E-05					
RJ012	Total HpCDD	4.0E-05		4.0E-05					
RJ012	Total HpCDF	1.0E-05	J	1.0E-05					
RJ012	Total HxCDD	1.5E-06	U	7.5E-07					
RJ012	Total HxCDF	6.1E-07	U	3.1E-07					
RJ012	Total PeCDD	5.8E-07	U	2.9E-07					
RJ012	Total PeCDF	6.5E-07	U	3.3E-07					
RJ012	Total TCDD	7.9E-07	U	4.0E-07					
RJ012	Total TCDF	4.6E-07	U	2.3E-07					
RJ014	1,2,3,4,6,7,8-HpCDD	6.0E-04		6.0E-04	1.1E-05	3.1E-05	7.9E-05	7.2E-04	7.2E-03
RJ014	1,2,3,4,6,7,8-HpCDF	2.2E-04	UJ	1.1E-04					
RJ014	1,2,3,4,7,8,9-HpCDF	1.0E-05	J	1.0E-05					
RJ014	1,2,3,4,7,8-HxCDD	4.4E-06	J	4.4E-06					

PCDD/PCDF Congener Group Summation for Soil/Sediment (0-6 feet bgs)
New Conservation Yard RFI Site

EPA ID	PCDD/PCDF Congener	Measured Concentration [a] (mg/kg)	Data Qualifier	Adjusted Concentration [b] (mg/kg)	Sum of PCDD/PCDF Congener Concentrations				
					Total Tetra (mg/kg)	Total Penta (mg/kg)	Total Hexa (mg/kg)	Total Hepta (mg/kg)	Total Octa (mg/kg)
RJ014	1,2,3,4,7,8-HxCDF	2.0E-05		2.0E-05					
RJ014	1,2,3,6,7,8-HxCDD	2.0E-05		2.0E-05					
RJ014	1,2,3,6,7,8-HxCDF	2.0E-05	UJ	1.0E-05					
RJ014	1,2,3,7,8,9-HxCDD	1.0E-05	J	1.0E-05					
RJ014	1,2,3,7,8,9-HxCDF	4.7E-06	J	4.7E-06					
RJ014	1,2,3,7,8-PeCDD	1.0E-06	U	5.0E-07					
RJ014	1,2,3,7,8-PeCDF	1.0E-05	J	1.0E-05					
RJ014	2,3,4,6,7,8-HxCDF	1.0E-05	J	1.0E-05					
RJ014	2,3,4,7,8-PeCDF	2.0E-05		2.0E-05					
RJ014	2,3,7,8-TCDD	1.4E-06	U	7.0E-07					
RJ014	2,3,7,8-TCDF	1.0E-05	J	1.0E-05					
RJ014	OCDD	6.9E-03		6.9E-03					
RJ014	OCDF	2.7E-04		2.7E-04					
RJ014	Total HpCDD	1.0E-03		1.0E-03					
RJ014	Total HpCDF	1.8E-04		1.8E-04					
RJ014	Total HxCDD	1.5E-04		1.5E-04					
RJ014	Total HxCDF	2.1E-04		2.1E-04					
RJ014	Total PeCDD	1.0E-05	J	1.0E-05					
RJ014	Total PeCDF	7.0E-05		7.0E-05					
RJ014	Total TCDD	4.0E-05		4.0E-05					
RJ014	Total TCDF	7.0E-05		7.0E-05					
RS888	1,2,3,4,6,7,8-HpCDD	3.3E-03		3.3E-03	1.0E-05	3.2E-05	1.9E-04	3.6E-03	4.1E-02
RS888	1,2,3,4,6,7,8-HpCDF	5.6E-04	UJ	2.8E-04					
RS888	1,2,3,4,7,8,9-HpCDF	6.0E-05		6.0E-05					
RS888	1,2,3,4,7,8-HxCDD	1.0E-05		1.0E-05					
RS888	1,2,3,4,7,8-HxCDF	4.0E-05		4.0E-05					
RS888	1,2,3,6,7,8-HxCDD	6.0E-05		6.0E-05					
RS888	1,2,3,6,7,8-HxCDF	3.0E-05		3.0E-05					
RS888	1,2,3,7,8,9-HxCDD	1.0E-05		1.0E-05					
RS888	1,2,3,7,8,9-HxCDF	2.0E-05		2.0E-05					
RS888	1,2,3,7,8-PeCDD	4.8E-06	U	2.4E-06					
RS888	1,2,3,7,8-PeCDF	1.0E-05		1.0E-05					
RS888	2,3,4,6,7,8-HxCDF	2.0E-05		2.0E-05					
RS888	2,3,4,7,8-PeCDF	2.0E-05		2.0E-05					
RS888	2,3,7,8-TCDD	9.8E-07	U	4.9E-07					
RS888	2,3,7,8-TCDF	1.0E-05		1.0E-05					
RS888	OCDD	4.0E-02	J	4.0E-02					
RS888	OCDF	8.4E-04		8.4E-04					
RS888	Total HpCDD	1.6E-02		1.6E-02					
RS888	Total HpCDF	2.7E-03	J	2.7E-03					
RS888	Total HxCDD	6.1E-04		6.1E-04					
RS888	Total HxCDF	8.1E-04	J	8.1E-04					
RS888	Total PeCDD	7.0E-05		7.0E-05					
RS888	Total PeCDF	1.6E-04	J	1.6E-04					
RS888	Total TCDD	1.1E-04		1.1E-04					
RS888	Total TCDF	1.0E-04	J	1.0E-04					
MJ610	1,2,3,4,6,7,8-HpCDD	1.0E-05		1.0E-05	2.5E-07	4.2E-07	1.6E-06	1.2E-05	1.5E-04
MJ610	1,2,3,4,6,7,8-HpCDF	1.9E-06	J	1.9E-06					
MJ610	1,2,3,4,7,8,9-HpCDF	1.9E-07	UJ	9.5E-08					
MJ610	1,2,3,4,7,8-HxCDD	3.4E-07	U	1.7E-07					
MJ610	1,2,3,4,7,8-HxCDF	4.0E-07	J	4.0E-07					
MJ610	1,2,3,6,7,8-HxCDD	3.3E-07	J	3.3E-07					
MJ610	1,2,3,6,7,8-HxCDF	1.8E-07	J	1.8E-07					
MJ610	1,2,3,7,8,9-HxCDD	2.0E-07	U	9.9E-08					

PCDD/PCDF Congener Group Summation for Soil/Sediment (0-6 feet bgs)
New Conservation Yard RFI Site

EPA ID	PCDD/PCDF Congener	Measured Concentration [a] (mg/kg)	Data Qualifier	Adjusted Concentration [b] (mg/kg)	Sum of PCDD/PCDF Congener Concentrations				
					Total Tetra (mg/kg)	Total Penta (mg/kg)	Total Hexa (mg/kg)	Total Hepta (mg/kg)	Total Octa (mg/kg)
MJ610	1,2,3,7,8,9-HxCDF	2.7E-07	U	1.3E-07					
MJ610	1,2,3,7,8-PeCDD	1.3E-07	U	6.4E-08					
MJ610	1,2,3,7,8-PeCDF	1.7E-07	J	1.7E-07					
MJ610	2,3,4,6,7,8-HxCDF	2.4E-07	J	2.4E-07					
MJ610	2,3,4,7,8-PeCDF	1.9E-07	J	1.9E-07					
MJ610	2,3,7,8-TCDD	1.3E-07	U	6.5E-08					
MJ610	2,3,7,8-TCDF	1.9E-07	J	1.9E-07					
MJ610	OCDD	1.5E-04		1.5E-04					
MJ610	OCDF	3.1E-06	J	3.1E-06					
MJ610	Total HpCDD	5.0E-05		5.0E-05					
MJ610	Total HpCDF	1.0E-05		1.0E-05					
MJ610	Total HxCDD	3.7E-06		3.7E-06					
MJ610	Total HxCDF	4.0E-06		4.0E-06					
MJ610	Total PeCDD	4.9E-07		4.9E-07					
MJ610	Total PeCDF	1.3E-06		1.3E-06					
MJ610	Total TCDD	7.3E-07		7.3E-07					
MJ610	Total TCDF	9.3E-07		9.3E-07					
MJ618	1,2,3,4,6,7,8-HpCDD	1.2E-04		1.2E-04	1.6E-06	2.8E-06	1.2E-05	1.4E-04	1.6E-03
MJ618	1,2,3,4,6,7,8-HpCDF	2.0E-05		2.0E-05					
MJ618	1,2,3,4,7,8,9-HpCDF	1.9E-06	J	1.9E-06					
MJ618	1,2,3,4,7,8-HxCDD	8.6E-07	J	8.6E-07					
MJ618	1,2,3,4,7,8-HxCDF	2.6E-06		2.6E-06					
MJ618	1,2,3,6,7,8-HxCDD	3.4E-06		3.4E-06					
MJ618	1,2,3,6,7,8-HxCDF	1.2E-06	J	1.2E-06					
MJ618	1,2,3,7,8,9-HxCDD	1.9E-06	J	1.9E-06					
MJ618	1,2,3,7,8,9-HxCDF	8.1E-07	J	8.1E-07					
MJ618	1,2,3,7,8-PeCDD	4.9E-07	J	4.9E-07					
MJ618	1,2,3,7,8-PeCDF	6.5E-07	J	6.5E-07					
MJ618	2,3,4,6,7,8-HxCDF	1.5E-06	J	1.5E-06					
MJ618	2,3,4,7,8-PeCDF	1.6E-06	J	1.6E-06					
MJ618	2,3,7,8-TCDD	2.5E-07	U	1.3E-07					
MJ618	2,3,7,8-TCDF	1.5E-06		1.5E-06					
MJ618	OCDD	1.5E-03		1.5E-03					
MJ618	OCDF	5.0E-05		5.0E-05					
MJ618	Total HpCDD	3.7E-04		3.7E-04					
MJ618	Total HpCDF	7.0E-05		7.0E-05					
MJ618	Total HxCDD	3.0E-05		3.0E-05					
MJ618	Total HxCDF	4.0E-05		4.0E-05					
MJ618	Total PeCDD	3.3E-06		3.3E-06					
MJ618	Total PeCDF	1.0E-05		1.0E-05					
MJ618	Total TCDD	4.0E-06		4.0E-06					
MJ618	Total TCDF	1.0E-05		1.0E-05					
MJ617	1,2,3,4,6,7,8-HpCDD	7.0E-05		7.0E-05	2.4E-07	1.1E-06	7.0E-06	8.1E-05	1.0E-03
MJ617	1,2,3,4,6,7,8-HpCDF	1.0E-05		1.0E-05					
MJ617	1,2,3,4,7,8,9-HpCDF	1.2E-06	J	1.2E-06					
MJ617	1,2,3,4,7,8-HxCDD	8.4E-07	J	8.4E-07					
MJ617	1,2,3,4,7,8-HxCDF	8.0E-07	J	8.0E-07					
MJ617	1,2,3,6,7,8-HxCDD	2.1E-06	J	2.1E-06					
MJ617	1,2,3,6,7,8-HxCDF	4.4E-07	J	4.4E-07					
MJ617	1,2,3,7,8,9-HxCDD	1.9E-06	J	1.9E-06					
MJ617	1,2,3,7,8,9-HxCDF	2.9E-07	UJ	1.4E-07					
MJ617	1,2,3,7,8-PeCDD	4.8E-07	J	4.8E-07					
MJ617	1,2,3,7,8-PeCDF	1.8E-07	UJ	9.1E-08					
MJ617	2,3,4,6,7,8-HxCDF	7.1E-07	J	7.1E-07					

PCDD/PCDF Congener Group Summation for Soil/Sediment (0-6 feet bgs)
New Conservation Yard RFI Site

EPA ID	PCDD/PCDF Congener	Measured Concentration [a] (mg/kg)	Data Qualifier	Adjusted Concentration [b] (mg/kg)	Sum of PCDD/PCDF Congener Concentrations				
					Total Tetra (mg/kg)	Total Penta (mg/kg)	Total Hexa (mg/kg)	Total Hepta (mg/kg)	Total Octa (mg/kg)
MJ617	2,3,4,7,8-PeCDF	5.3E-07	J	5.3E-07					
MJ617	2,3,7,8-TCDD	1.1E-07	U	5.6E-08					
MJ617	2,3,7,8-TCDF	3.7E-07	UJ	1.9E-07					
MJ617	OCDD	9.5E-04		9.5E-04					
MJ617	OCDF	9.0E-05		9.0E-05					
MJ617	Total HpCDD	1.5E-04		1.5E-04					
MJ617	Total HpCDF	6.0E-05		6.0E-05					
MJ617	Total HxCDD	2.0E-05		2.0E-05					
MJ617	Total HxCDF	2.0E-05		2.0E-05					
MJ617	Total PeCDD	1.2E-06		1.2E-06					
MJ617	Total PeCDF	4.8E-06		4.8E-06					
MJ617	Total TCDD	1.1E-07	U	5.6E-08					
MJ617	Total TCDF	2.0E-06		2.0E-06					
MJ775	1,2,3,4,6,7,8-HpCDD	2.7E-02		2.7E-02	4.5E-05	1.3E-04	1.9E-03	2.9E-02	2.8E-01
MJ775	1,2,3,4,6,7,8-HpCDF	2.5E-03		2.5E-03					
MJ775	1,2,3,4,7,8,9-HpCDF	2.3E-04		2.3E-04					
MJ775	1,2,3,4,7,8-HxCDD	2.4E-04		2.4E-04					
MJ775	1,2,3,4,7,8-HxCDF	8.0E-05		8.0E-05					
MJ775	1,2,3,6,7,8-HxCDD	9.0E-04		9.0E-04					
MJ775	1,2,3,6,7,8-HxCDF	8.0E-05	J	8.0E-05					
MJ775	1,2,3,7,8,9-HxCDD	4.7E-04		4.7E-04					
MJ775	1,2,3,7,8,9-HxCDF	2.0E-05		2.0E-05					
MJ775	1,2,3,7,8-PeCDD	9.0E-05		9.0E-05					
MJ775	1,2,3,7,8-PeCDF	1.0E-05		1.0E-05					
MJ775	2,3,4,6,7,8-HxCDF	1.4E-04		1.4E-04					
MJ775	2,3,4,7,8-PeCDF	3.0E-05		3.0E-05					
MJ775	2,3,7,8-TCDD	4.0E-05		4.0E-05					
MJ775	2,3,7,8-TCDF	4.8E-06		4.8E-06					
MJ775	OCDD	2.8E-01		2.8E-01					
MJ775	OCDF	6.9E-03		6.9E-03					
MJ775	Total HpCDD	5.5E-02		5.5E-02					
MJ775	Total HpCDF	1.1E-02		1.1E-02					
MJ775	Total HxCDD	6.0E-03		6.0E-03					
MJ775	Total HxCDF	3.9E-03	J	3.9E-03					
MJ775	Total PeCDD	4.7E-04		4.7E-04					
MJ775	Total PeCDF	6.6E-04	J	6.6E-04					
MJ775	Total TCDD	8.0E-05		8.0E-05					
MJ775	Total TCDF	1.9E-04		1.9E-04					
MJ724	1,2,3,4,6,7,8-HpCDD	1.1E-02		1.1E-02	1.5E-05	8.0E-05	1.2E-03	1.4E-02	1.3E-01
MJ724	1,2,3,4,6,7,8-HpCDF	2.2E-03		2.2E-03					
MJ724	1,2,3,4,7,8,9-HpCDF	2.1E-04		2.1E-04					
MJ724	1,2,3,4,7,8-HxCDD	1.3E-04		1.3E-04					
MJ724	1,2,3,4,7,8-HxCDF	8.0E-05		8.0E-05					
MJ724	1,2,3,6,7,8-HxCDD	5.9E-04		5.9E-04					
MJ724	1,2,3,6,7,8-HxCDF	6.0E-05	J	6.0E-05					
MJ724	1,2,3,7,8,9-HxCDD	1.8E-04		1.8E-04					
MJ724	1,2,3,7,8,9-HxCDF	2.0E-05		2.0E-05					
MJ724	1,2,3,7,8-PeCDD	5.0E-05		5.0E-05					
MJ724	1,2,3,7,8-PeCDF	1.0E-05		1.0E-05					
MJ724	2,3,4,6,7,8-HxCDF	1.4E-04		1.4E-04					
MJ724	2,3,4,7,8-PeCDF	2.0E-05		2.0E-05					
MJ724	2,3,7,8-TCDD	1.0E-05		1.0E-05					
MJ724	2,3,7,8-TCDF	4.9E-06		4.9E-06					
MJ724	OCDD	1.2E-01		1.2E-01					

PCDD/PCDF Congener Group Summation for Soil/Sediment (0-6 feet bgs)
New Conservation Yard RFI Site

EPA ID	PCDD/PCDF Congener	Measured Concentration [a] (mg/kg)	Data Qualifier	Adjusted Concentration [b] (mg/kg)	Sum of PCDD/PCDF Congener Concentrations				
					Total Tetra (mg/kg)	Total Penta (mg/kg)	Total Hexa (mg/kg)	Total Hepta (mg/kg)	Total Octa (mg/kg)
MJ724	OCDF	5.3E-03		5.3E-03					
MJ724	Total HpCDD	2.0E-02		2.0E-02					
MJ724	Total HpCDF	1.1E-02		1.1E-02					
MJ724	Total HxCDD	2.9E-03		2.9E-03					
MJ724	Total HxCDF	4.2E-03	J	4.2E-03					
MJ724	Total PeCDD	2.9E-04		2.9E-04					
MJ724	Total PeCDF	6.2E-04	J	6.2E-04					
MJ724	Total TCDD	4.0E-05		4.0E-05					
MJ724	Total TCDF	1.5E-04		1.5E-04					
MJ727	1,2,3,4,6,7,8-HpCDD	6.6E-04		6.6E-04	2.2E-07	2.5E-06	5.0E-05	7.6E-04	6.7E-03
MJ727	1,2,3,4,6,7,8-HpCDF	9.0E-05		9.0E-05					
MJ727	1,2,3,4,7,8,9-HpCDF	1.0E-05		1.0E-05					
MJ727	1,2,3,4,7,8-HxCDD	4.0E-06		4.0E-06					
MJ727	1,2,3,4,7,8-HxCDF	3.2E-06		3.2E-06					
MJ727	1,2,3,6,7,8-HxCDD	2.0E-05		2.0E-05					
MJ727	1,2,3,6,7,8-HxCDF	1.9E-06	J	1.9E-06					
MJ727	1,2,3,7,8,9-HxCDD	1.0E-05		1.0E-05					
MJ727	1,2,3,7,8,9-HxCDF	8.6E-07	J	8.6E-07					
MJ727	1,2,3,7,8-PeCDD	1.7E-06	J	1.7E-06					
MJ727	1,2,3,7,8-PeCDF	2.2E-07	J	2.2E-07					
MJ727	2,3,4,6,7,8-HxCDF	1.0E-05		1.0E-05					
MJ727	2,3,4,7,8-PeCDF	5.5E-07	J	5.5E-07					
MJ727	2,3,7,8-TCDD	3.9E-07	UJ	2.0E-07					
MJ727	2,3,7,8-TCDF	4.0E-08	U	2.0E-08					
MJ727	OCDD	6.4E-03		6.4E-03					
MJ727	OCDF	2.7E-04		2.7E-04					
MJ727	Total HpCDD	1.2E-03		1.2E-03					
MJ727	Total HpCDF	5.3E-04		5.3E-04					
MJ727	Total HxCDD	1.5E-04		1.5E-04					
MJ727	Total HxCDF	2.2E-04	J	2.2E-04					
MJ727	Total PeCDD	1.0E-05		1.0E-05					
MJ727	Total PeCDF	3.0E-05		3.0E-05					
MJ727	Total TCDD	5.0E-07		5.0E-07					
MJ727	Total TCDF	2.3E-06		2.3E-06					
MJ725	1,2,3,4,6,7,8-HpCDD	2.0E-04		2.0E-04	5.1E-07	1.0E-06	1.7E-05	2.3E-04	2.4E-03
MJ725	1,2,3,4,6,7,8-HpCDF	3.0E-05		3.0E-05					
MJ725	1,2,3,4,7,8,9-HpCDF	2.1E-06	J	2.1E-06					
MJ725	1,2,3,4,7,8-HxCDD	1.4E-06	J	1.4E-06					
MJ725	1,2,3,4,7,8-HxCDF	7.7E-07	J	7.7E-07					
MJ725	1,2,3,6,7,8-HxCDD	1.0E-05		1.0E-05					
MJ725	1,2,3,6,7,8-HxCDF	6.4E-07	J	6.4E-07					
MJ725	1,2,3,7,8,9-HxCDD	2.8E-06		2.8E-06					
MJ725	1,2,3,7,8,9-HxCDF	2.3E-07	J	2.3E-07					
MJ725	1,2,3,7,8-PeCDD	5.9E-07	J	5.9E-07					
MJ725	1,2,3,7,8-PeCDF	1.0E-07	J	1.0E-07					
MJ725	2,3,4,6,7,8-HxCDF	1.2E-06	J	1.2E-06					
MJ725	2,3,4,7,8-PeCDF	3.5E-07	J	3.5E-07					
MJ725	2,3,7,8-TCDD	2.7E-07	J	2.7E-07					
MJ725	2,3,7,8-TCDF	2.4E-07	J	2.4E-07					
MJ725	OCDD	2.3E-03		2.3E-03					
MJ725	OCDF	8.0E-05		8.0E-05					
MJ725	Total HpCDD	3.9E-04		3.9E-04					
MJ725	Total HpCDF	1.1E-04		1.1E-04					
MJ725	Total HxCDD	4.0E-05		4.0E-05					

PCDD/PCDF Congener Group Summation for Soil/Sediment (0-6 feet bgs)
New Conservation Yard RFI Site

EPA ID	PCDD/PCDF Congener	Measured Concentration [a] (mg/kg)	Data Qualifier	Adjusted Concentration [b] (mg/kg)	Sum of PCDD/PCDF Congener Concentrations				
					Total Tetra (mg/kg)	Total Penta (mg/kg)	Total Hexa (mg/kg)	Total Hepta (mg/kg)	Total Octa (mg/kg)
MJ725	Total HxCDF	4.0E-05	J	4.0E-05					
MJ725	Total PeCDD	3.3E-06		3.3E-06					
MJ725	Total PeCDF	1.0E-05		1.0E-05					
MJ725	Total TCDD	5.7E-07		5.7E-07					
MJ725	Total TCDF	3.2E-06		3.2E-06					
MJ726	1,2,3,4,6,7,8-HpCDD	2.2E-02		2.2E-02	3.0E-05	1.2E-04	2.2E-03	2.8E-02	3.1E-01
MJ726	1,2,3,4,6,7,8-HpCDF	5.7E-03	J	5.7E-03					
MJ726	1,2,3,4,7,8,9-HpCDF	4.9E-04		4.9E-04					
MJ726	1,2,3,4,7,8-HxCDD	1.7E-04		1.7E-04					
MJ726	1,2,3,4,7,8-HxCDF	1.5E-04		1.5E-04					
MJ726	1,2,3,6,7,8-HxCDD	1.2E-03		1.2E-03					
MJ726	1,2,3,6,7,8-HxCDF	1.1E-04	J	1.1E-04					
MJ726	1,2,3,7,8,9-HxCDD	2.9E-04		2.9E-04					
MJ726	1,2,3,7,8,9-HxCDF	3.0E-05		3.0E-05					
MJ726	1,2,3,7,8-PeCDD	8.0E-05		8.0E-05					
MJ726	1,2,3,7,8-PeCDF	1.0E-05		1.0E-05					
MJ726	2,3,4,6,7,8-HxCDF	2.8E-04		2.8E-04					
MJ726	2,3,4,7,8-PeCDF	3.0E-05		3.0E-05					
MJ726	2,3,7,8-TCDD	2.0E-05		2.0E-05					
MJ726	2,3,7,8-TCDF	1.0E-05	J	1.0E-05					
MJ726	OCDD	3.0E-01		3.0E-01					
MJ726	OCDF	1.5E-02		1.5E-02					
MJ726	Total HpCDD	3.7E-02		3.7E-02					
MJ726	Total HpCDF	2.7E-02	J	2.7E-02					
MJ726	Total HxCDD	5.8E-03		5.8E-03					
MJ726	Total HxCDF	1.1E-02	J	1.1E-02					
MJ726	Total PeCDD	3.9E-04		3.9E-04					
MJ726	Total PeCDF	1.4E-03	J	1.4E-03					
MJ726	Total TCDD	4.0E-05		4.0E-05					
MJ726	Total TCDF	1.7E-04	J	1.7E-04					
MJ729	1,2,3,4,6,7,8-HpCDD	4.5E-03		4.5E-03	1.1E-05	1.5E-05	3.2E-04	5.1E-03	5.4E-02
MJ729	1,2,3,4,6,7,8-HpCDF	5.4E-04		5.4E-04					
MJ729	1,2,3,4,7,8,9-HpCDF	5.0E-05		5.0E-05					
MJ729	1,2,3,4,7,8-HxCDD	3.0E-05		3.0E-05					
MJ729	1,2,3,4,7,8-HxCDF	2.0E-05		2.0E-05					
MJ729	1,2,3,6,7,8-HxCDD	1.6E-04		1.6E-04					
MJ729	1,2,3,6,7,8-HxCDF	1.0E-05		1.0E-05					
MJ729	1,2,3,7,8,9-HxCDD	7.0E-05		7.0E-05					
MJ729	1,2,3,7,8,9-HxCDF	3.5E-06		3.5E-06					
MJ729	1,2,3,7,8-PeCDD	1.0E-05		1.0E-05					
MJ729	1,2,3,7,8-PeCDF	1.4E-06	J	1.4E-06					
MJ729	2,3,4,6,7,8-HxCDF	3.0E-05		3.0E-05					
MJ729	2,3,4,7,8-PeCDF	3.9E-06		3.9E-06					
MJ729	2,3,7,8-TCDD	1.0E-05		1.0E-05					
MJ729	2,3,7,8-TCDF	1.0E-06		1.0E-06					
MJ729	OCDD	5.3E-02		5.3E-02					
MJ729	OCDF	1.5E-03		1.5E-03					
MJ729	Total HpCDD	8.2E-03		8.2E-03					
MJ729	Total HpCDF	2.6E-03		2.6E-03					
MJ729	Total HxCDD	8.5E-04		8.5E-04					
MJ729	Total HxCDF	8.4E-04	J	8.4E-04					
MJ729	Total PeCDD	6.0E-05		6.0E-05					
MJ729	Total PeCDF	1.0E-04		1.0E-04					
MJ729	Total TCDD	1.0E-05		1.0E-05					

PCDD/PCDF Congener Group Summation for Soil/Sediment (0-6 feet bgs)
New Conservation Yard RFI Site

EPA ID	PCDD/PCDF Congener	Measured Concentration [a] (mg/kg)	Data Qualifier	Adjusted Concentration [b] (mg/kg)	Sum of PCDD/PCDF Congener Concentrations Total Tetra (mg/kg)	Total Penta (mg/kg)	Total Hexa (mg/kg)	Total Hepta (mg/kg)	Total Octa (mg/kg)
MJ729	Total TCDF	3.0E-05		3.0E-05					
MJ730	1,2,3,4,6,7,8-HpCDD	9.2E-04		9.2E-04	9.6E-07	3.6E-06	6.7E-05	1.1E-03	1.1E-02
MJ730	1,2,3,4,6,7,8-HpCDF	1.4E-04		1.4E-04					
MJ730	1,2,3,4,7,8,9-HpCDF	1.0E-05		1.0E-05					
MJ730	1,2,3,4,7,8-HxCDD	1.0E-05		1.0E-05					
MJ730	1,2,3,4,7,8-HxCDF	3.5E-06		3.5E-06					
MJ730	1,2,3,6,7,8-HxCDD	3.0E-05		3.0E-05					
MJ730	1,2,3,6,7,8-HxCDF	2.9E-06		2.9E-06					
MJ730	1,2,3,7,8,9-HxCDD	1.0E-05		1.0E-05					
MJ730	1,2,3,7,8,9-HxCDF	9.6E-07	J	9.6E-07					
MJ730	1,2,3,7,8-PeCDD	2.3E-06	J	2.3E-06					
MJ730	1,2,3,7,8-PeCDF	3.8E-07	J	3.8E-07					
MJ730	2,3,4,6,7,8-HxCDF	1.0E-05		1.0E-05					
MJ730	2,3,4,7,8-PeCDF	9.5E-07	J	9.5E-07					
MJ730	2,3,7,8-TCDD	6.0E-07		6.0E-07					
MJ730	2,3,7,8-TCDF	3.6E-07	J	3.6E-07					
MJ730	OCDD	1.1E-02		1.1E-02					
MJ730	OCDF	3.8E-04		3.8E-04					
MJ730	Total HpCDD	1.6E-03		1.6E-03					
MJ730	Total HpCDF	6.3E-04		6.3E-04					
MJ730	Total HxCDD	1.5E-04		1.5E-04					
MJ730	Total HxCDF	1.9E-04	J	1.9E-04					
MJ730	Total PeCDD	1.0E-05		1.0E-05					
MJ730	Total PeCDF	2.0E-05		2.0E-05					
MJ730	Total TCDD	1.1E-06		1.1E-06					
MJ730	Total TCDF	1.0E-05		1.0E-05					
MJ732	1,2,3,4,6,7,8-HpCDD	4.1E-04		4.1E-04	6.3E-07	1.9E-06	2.9E-05	4.5E-04	4.7E-03
MJ732	1,2,3,4,6,7,8-HpCDF	4.0E-05		4.0E-05					
MJ732	1,2,3,4,7,8,9-HpCDF	4.3E-06		4.3E-06					
MJ732	1,2,3,4,7,8-HxCDD	3.0E-06		3.0E-06					
MJ732	1,2,3,4,7,8-HxCDF	1.5E-06	J	1.5E-06					
MJ732	1,2,3,6,7,8-HxCDD	1.0E-05		1.0E-05					
MJ732	1,2,3,6,7,8-HxCDF	1.4E-06	J	1.4E-06					
MJ732	1,2,3,7,8,9-HxCDD	1.0E-05		1.0E-05					
MJ732	1,2,3,7,8,9-HxCDF	4.3E-07	J	4.3E-07					
MJ732	1,2,3,7,8-PeCDD	1.1E-06	J	1.1E-06					
MJ732	1,2,3,7,8-PeCDF	1.9E-07	J	1.9E-07					
MJ732	2,3,4,6,7,8-HxCDF	2.8E-06		2.8E-06					
MJ732	2,3,4,7,8-PeCDF	5.7E-07	J	5.7E-07					
MJ732	2,3,7,8-TCDD	3.9E-07	J	3.9E-07					
MJ732	2,3,7,8-TCDF	2.5E-07	J	2.5E-07					
MJ732	OCDD	4.6E-03		4.6E-03					
MJ732	OCDF	1.0E-04		1.0E-04					
MJ732	Total HpCDD	7.9E-04		7.9E-04					
MJ732	Total HpCDF	1.7E-04		1.7E-04					
MJ732	Total HxCDD	9.0E-05		9.0E-05					
MJ732	Total HxCDF	7.0E-05	J	7.0E-05					
MJ732	Total PeCDD	1.0E-05		1.0E-05					
MJ732	Total PeCDF	1.0E-05		1.0E-05					
MJ732	Total TCDD	7.5E-07		7.5E-07					
MJ732	Total TCDF	3.5E-06		3.5E-06					
MJ620	1,2,3,4,6,7,8-HpCDD	1.9E-03		1.9E-03	3.9E-06	1.4E-05	1.8E-04	2.2E-03	2.1E-02
MJ620	1,2,3,4,6,7,8-HpCDF	3.0E-04		3.0E-04					
MJ620	1,2,3,4,7,8,9-HpCDF	3.0E-05		3.0E-05					

PCDD/PCDF Congener Group Summation for Soil/Sediment (0-6 feet bgs)
New Conservation Yard RFI Site

EPA ID	PCDD/PCDF Congener	Measured Concentration [a] (mg/kg)	Data Qualifier	Adjusted Concentration [b] (mg/kg)	Sum of PCDD/PCDF Congener Concentrations				
					Total Tetra (mg/kg)	Total Penta (mg/kg)	Total Hexa (mg/kg)	Total Hepta (mg/kg)	Total Octa (mg/kg)
MJ620	1,2,3,4,7,8-HxCDD	2.0E-05		2.0E-05					
MJ620	1,2,3,4,7,8-HxCDF	1.0E-05		1.0E-05					
MJ620	1,2,3,6,7,8-HxCDD	9.0E-05		9.0E-05					
MJ620	1,2,3,6,7,8-HxCDF	1.0E-05		1.0E-05					
MJ620	1,2,3,7,8,9-HxCDD	3.0E-05		3.0E-05					
MJ620	1,2,3,7,8,9-HxCDF	2.2E-06	J	2.2E-06					
MJ620	1,2,3,7,8-PeCDD	1.0E-05		1.0E-05					
MJ620	1,2,3,7,8-PeCDF	1.3E-06	J	1.3E-06					
MJ620	2,3,4,6,7,8-HxCDF	2.0E-05		2.0E-05					
MJ620	2,3,4,7,8-PeCDF	2.9E-06		2.9E-06					
MJ620	2,3,7,8-TCDD	2.8E-06		2.8E-06					
MJ620	2,3,7,8-TCDF	1.1E-06		1.1E-06					
MJ620	OCDD	2.0E-02		2.0E-02					
MJ620	OCDF	7.4E-04		7.4E-04					
MJ620	Total HpCDD	3.5E-03		3.5E-03					
MJ620	Total HpCDF	1.4E-03		1.4E-03					
MJ620	Total HxCDD	4.8E-04		4.8E-04					
MJ620	Total HxCDF	5.8E-04		5.8E-04					
MJ620	Total PeCDD	6.0E-05		6.0E-05					
MJ620	Total PeCDF	1.0E-04		1.0E-04					
MJ620	Total TCDD	1.0E-05		1.0E-05					
MJ620	Total TCDF	2.0E-05		2.0E-05					
MJ619	1,2,3,4,6,7,8-HpCDD	2.4E-03		2.4E-03	5.1E-06	1.6E-05	2.0E-04	2.8E-03	2.9E-02
MJ619	1,2,3,4,6,7,8-HpCDF	3.8E-04		3.8E-04					
MJ619	1,2,3,4,7,8,9-HpCDF	4.0E-05		4.0E-05					
MJ619	1,2,3,4,7,8-HxCDD	2.0E-05		2.0E-05					
MJ619	1,2,3,4,7,8-HxCDF	1.0E-05		1.0E-05					
MJ619	1,2,3,6,7,8-HxCDD	1.0E-04		1.0E-04					
MJ619	1,2,3,6,7,8-HxCDF	1.0E-05		1.0E-05					
MJ619	1,2,3,7,8,9-HxCDD	4.0E-05		4.0E-05					
MJ619	1,2,3,7,8,9-HxCDF	2.6E-06		2.6E-06					
MJ619	1,2,3,7,8-PeCDD	1.0E-05		1.0E-05					
MJ619	1,2,3,7,8-PeCDF	1.5E-06	J	1.5E-06					
MJ619	2,3,4,6,7,8-HxCDF	2.0E-05		2.0E-05					
MJ619	2,3,4,7,8-PeCDF	4.4E-06		4.4E-06					
MJ619	2,3,7,8-TCDD	2.9E-06		2.9E-06					
MJ619	2,3,7,8-TCDF	2.2E-06		2.2E-06					
MJ619	OCDD	2.8E-02		2.8E-02					
MJ619	OCDF	1.0E-03		1.0E-03					
MJ619	Total HpCDD	4.4E-03		4.4E-03					
MJ619	Total HpCDF	1.7E-03		1.7E-03					
MJ619	Total HxCDD	5.5E-04		5.5E-04					
MJ619	Total HxCDF	6.8E-04		6.8E-04					
MJ619	Total PeCDD	5.0E-05		5.0E-05					
MJ619	Total PeCDF	1.1E-04		1.1E-04					
MJ619	Total TCDD	1.0E-05		1.0E-05					
MJ619	Total TCDF	3.0E-05		3.0E-05					
MJ621	1,2,3,4,6,7,8-HpCDD	4.6E-04		4.6E-04	1.5E-06	3.9E-06	5.7E-05	5.5E-04	5.4E-03
MJ621	1,2,3,4,6,7,8-HpCDF	8.0E-05		8.0E-05					
MJ621	1,2,3,4,7,8,9-HpCDF	1.0E-05		1.0E-05					
MJ621	1,2,3,4,7,8-HxCDD	1.0E-05		1.0E-05					
MJ621	1,2,3,4,7,8-HxCDF	3.6E-06		3.6E-06					
MJ621	1,2,3,6,7,8-HxCDD	2.0E-05		2.0E-05					
MJ621	1,2,3,6,7,8-HxCDF	2.6E-06		2.6E-06					

PCDD/PCDF Congener Group Summation for Soil/Sediment (0-6 feet bgs)
New Conservation Yard RFI Site

EPA ID	PCDD/PCDF Congener	Measured Concentration [a] (mg/kg)	Data Qualifier	Adjusted Concentration [b] (mg/kg)	Sum of PCDD/PCDF Congener Concentrations Total Tetra (mg/kg)	Total Penta (mg/kg)	Total Hexa (mg/kg)	Total Hepta (mg/kg)	Total Octa (mg/kg)
MJ621	1,2,3,7,8,9-HxCDD	1.0E-05		1.0E-05					
MJ621	1,2,3,7,8,9-HxCDF	6.6E-07	J	6.6E-07					
MJ621	1,2,3,7,8-PeCDD	2.2E-06	J	2.2E-06					
MJ621	1,2,3,7,8-PeCDF	4.6E-07	J	4.6E-07					
MJ621	2,3,4,6,7,8-HxCDF	1.0E-05		1.0E-05					
MJ621	2,3,4,7,8-PeCDF	1.3E-06	J	1.3E-06					
MJ621	2,3,7,8-TCDD	5.4E-07		5.4E-07					
MJ621	2,3,7,8-TCDF	9.8E-07	J	9.8E-07					
MJ621	OCDD	5.2E-03		5.2E-03					
MJ621	OCDF	2.3E-04		2.3E-04					
MJ621	Total HpCDD	8.9E-04		8.9E-04					
MJ621	Total HpCDF	3.3E-04		3.3E-04					
MJ621	Total HxCDD	1.1E-04		1.1E-04					
MJ621	Total HxCDF	1.4E-04		1.4E-04					
MJ621	Total PeCDD	1.0E-05		1.0E-05					
MJ621	Total PeCDF	2.0E-05		2.0E-05					
MJ621	Total TCDD	7.6E-07		7.6E-07					
MJ621	Total TCDF	1.0E-05		1.0E-05					
				MAX	4.5E-05	1.3E-04	2.2E-03	2.9E-02	3.1E-01

Maximum of Total Summed Congener Concentrations

Total Tetra	4.5E-05
Total Penta	1.3E-04
Total Hexa	2.2E-03
Total Hepta	2.9E-02
Total Octa	3.1E-01

Notes:

a. Measured concentration - concentration reported by the analytial laboratory

b. Adjusted concentration - concentration reported by the analytical laboratory if the chemical was detected, or estimated at one-half the sample quantitation limit (SQL) if not detected.

PCDD/PCDF - polychlorinated dibenzo-p-dioxins and dibenzofurans

Total Tetra - sum of the 2,3,7,8-substituted tetraclorinated dibenzo-p-dioxin and dibenzofuran congeners.

Total Penta - sum of the 2,3,7,8-substituted pentaclorinated dibenzo-p-dioxin and dibenzofuran congeners.

Total Hexa - sum of the 2,3,7,8-substituted hexaclorinated dibenzo-p-dioxin and dibenzofuran congeners.

Total Hepta - sum of the 2,3,7,8-substituted heptaclorinated dibenzo-p-dioxin and dibenzofuran congeners.

Total Octa - sum of the 2,3,7,8-substituted Octaclorinated dibenzo-p-dioxin and dibenzofuran congeners.

J - concentration estimated

U - not detected. Concentration shown is the SQL.

UJ - not detected. Concentration shown is the estimated SQL.

mg/kg - milligrams per kilogram

bgs- below ground surface

PCDD/PCDF Congener Group Summation for Soil/Sediment (0-4 feet bgs)
New Conservation Yard RFI Site

EPA ID	PCDD/PCDF Congener	Measured Concentration [a] (mg/kg)	Data Qualifier	Adjusted Concentration [b] (mg/kg)	Sum of PCDD/PCDF Congener Concentrations				
					Total Tetra (mg/kg)	Total Penta (mg/kg)	Total Hexa (mg/kg)	Total Hepta (mg/kg)	Total Octa (mg/kg)
RJ011	1,2,3,4,6,7,8-HpCDD	3.2E-04		3.2E-04	2.6E-06	4.4E-06	3.7E-05	3.9E-04	4.0E-03
RJ011	1,2,3,4,6,7,8-HpCDF	1.1E-04	UJ	5.5E-05					
RJ011	1,2,3,4,7,8,9-HpCDF	1.0E-05	J	1.0E-05					
RJ011	1,2,3,4,7,8-HxCDD	9.6E-07	U	4.8E-07					
RJ011	1,2,3,4,7,8-HxCDF	1.0E-05	J	1.0E-05					
RJ011	1,2,3,6,7,8-HxCDD	1.0E-05	J	1.0E-05					
RJ011	1,2,3,6,7,8-HxCDF	1.0E-05	UJ	5.0E-06					
RJ011	1,2,3,7,8,9-HxCDD	3.2E-06	J	3.2E-06					
RJ011	1,2,3,7,8,9-HxCDF	3.7E-06	J	3.7E-06					
RJ011	1,2,3,7,8-PeCDD	5.5E-07	U	2.8E-07					
RJ011	1,2,3,7,8-PeCDF	1.7E-06	UJ	8.5E-07					
RJ011	2,3,4,6,7,8-HxCDF	4.2E-06	J	4.2E-06					
RJ011	2,3,4,7,8-PeCDF	3.3E-06	J	3.3E-06					
RJ011	2,3,7,8-TCDD	1.3E-06	U	6.5E-07					
RJ011	2,3,7,8-TCDF	1.9E-06	J	1.9E-06					
RJ011	OCDD	3.9E-03		3.9E-03					
RJ011	OCDF	1.2E-04		1.2E-04					
RJ011	Total HpCDD	6.1E-04		6.1E-04					
RJ011	Total HpCDF	1.8E-04		1.8E-04					
RJ011	Total HxCDD	9.0E-05		9.0E-05					
RJ011	Total HxCDF	1.5E-04		1.5E-04					
RJ011	Total PeCDD	4.6E-06	J	4.6E-06					
RJ011	Total PeCDF	1.0E-05	J	1.0E-05					
RJ011	Total TCDD	1.0E-05		1.0E-05					
RJ011	Total TCDF	2.0E-05		2.0E-05					
RJ012	1,2,3,4,6,7,8-HpCDD	2.0E-05		2.0E-05	6.3E-07	9.4E-07	3.4E-06	2.5E-05	2.5E-04
RJ012	1,2,3,4,6,7,8-HpCDF	1.0E-05	UJ	5.0E-06					
RJ012	1,2,3,4,7,8,9-HpCDF	9.2E-07	U	4.6E-07					
RJ012	1,2,3,4,7,8-HxCDD	1.7E-06	U	8.5E-07					
RJ012	1,2,3,4,7,8-HxCDF	4.0E-07	U	2.0E-07					
RJ012	1,2,3,6,7,8-HxCDD	1.4E-06	U	7.0E-07					
RJ012	1,2,3,6,7,8-HxCDF	7.9E-07	U	4.0E-07					
RJ012	1,2,3,7,8,9-HxCDD	1.2E-06	U	6.0E-07					
RJ012	1,2,3,7,8,9-HxCDF	6.0E-07	U	3.0E-07					
RJ012	1,2,3,7,8-PeCDD	5.8E-07	U	2.9E-07					
RJ012	1,2,3,7,8-PeCDF	8.6E-07	U	4.3E-07					
RJ012	2,3,4,6,7,8-HxCDF	6.4E-07	U	3.2E-07					
RJ012	2,3,4,7,8-PeCDF	4.4E-07	U	2.2E-07					
RJ012	2,3,7,8-TCDD	7.9E-07	U	4.0E-07					
RJ012	2,3,7,8-TCDF	4.6E-07	U	2.3E-07					
RJ012	OCDD	2.3E-04		2.3E-04					
RJ012	OCDF	2.0E-05	J	2.0E-05					
RJ012	Total HpCDD	4.0E-05		4.0E-05					
RJ012	Total HpCDF	1.0E-05	J	1.0E-05					
RJ012	Total HxCDD	1.5E-06	U	7.5E-07					
RJ012	Total HxCDF	6.1E-07	U	3.1E-07					
RJ012	Total PeCDD	5.8E-07	U	2.9E-07					
RJ012	Total PeCDF	6.5E-07	U	3.3E-07					
RJ012	Total TCDD	7.9E-07	U	4.0E-07					
RJ012	Total TCDF	4.6E-07	U	2.3E-07					
RJ014	1,2,3,4,6,7,8-HpCDD	6.0E-04		6.0E-04	1.1E-05	3.1E-05	7.9E-05	7.2E-04	7.2E-03
RJ014	1,2,3,4,6,7,8-HpCDF	2.2E-04	UJ	1.1E-04					
RJ014	1,2,3,4,7,8,9-HpCDF	1.0E-05	J	1.0E-05					
RJ014	1,2,3,4,7,8-HxCDD	4.4E-06	J	4.4E-06					

PCDD/PCDF Congener Group Summation for Soil/Sediment (0-4 feet bgs)
New Conservation Yard RFI Site

EPA ID	PCDD/PCDF Congener	Measured Concentration [a] (mg/kg)	Data Qualifier	Adjusted Concentration [b] (mg/kg)	Sum of PCDD/PCDF Congener Concentrations				
					Total Tetra (mg/kg)	Total Penta (mg/kg)	Total Hexa (mg/kg)	Total Hepta (mg/kg)	Total Octa (mg/kg)
RJ014	1,2,3,4,7,8-HxCDF	2.0E-05		2.0E-05					
RJ014	1,2,3,6,7,8-HxCDD	2.0E-05		2.0E-05					
RJ014	1,2,3,6,7,8-HxCDF	2.0E-05	UJ	1.0E-05					
RJ014	1,2,3,7,8,9-HxCDD	1.0E-05	J	1.0E-05					
RJ014	1,2,3,7,8,9-HxCDF	4.7E-06	J	4.7E-06					
RJ014	1,2,3,7,8-PeCDD	1.0E-06	U	5.0E-07					
RJ014	1,2,3,7,8-PeCDF	1.0E-05	J	1.0E-05					
RJ014	2,3,4,6,7,8-HxCDF	1.0E-05	J	1.0E-05					
RJ014	2,3,4,7,8-PeCDF	2.0E-05		2.0E-05					
RJ014	2,3,7,8-TCDD	1.4E-06	U	7.0E-07					
RJ014	2,3,7,8-TCDF	1.0E-05	J	1.0E-05					
RJ014	OCDD	6.9E-03		6.9E-03					
RJ014	OCDF	2.7E-04		2.7E-04					
RJ014	Total HpCDD	1.0E-03		1.0E-03					
RJ014	Total HpCDF	1.8E-04		1.8E-04					
RJ014	Total HxCDD	1.5E-04		1.5E-04					
RJ014	Total HxCDF	2.1E-04		2.1E-04					
RJ014	Total PeCDD	1.0E-05	J	1.0E-05					
RJ014	Total PeCDF	7.0E-05		7.0E-05					
RJ014	Total TCDD	4.0E-05		4.0E-05					
RJ014	Total TCDF	7.0E-05		7.0E-05					
RS888	1,2,3,4,6,7,8-HpCDD	3.3E-03		3.3E-03	1.0E-05	3.2E-05	1.9E-04	3.6E-03	4.1E-02
RS888	1,2,3,4,6,7,8-HpCDF	5.6E-04	UJ	2.8E-04					
RS888	1,2,3,4,7,8,9-HpCDF	6.0E-05		6.0E-05					
RS888	1,2,3,4,7,8-HxCDD	1.0E-05		1.0E-05					
RS888	1,2,3,4,7,8-HxCDF	4.0E-05		4.0E-05					
RS888	1,2,3,6,7,8-HxCDD	6.0E-05		6.0E-05					
RS888	1,2,3,6,7,8-HxCDF	3.0E-05		3.0E-05					
RS888	1,2,3,7,8,9-HxCDD	1.0E-05		1.0E-05					
RS888	1,2,3,7,8,9-HxCDF	2.0E-05		2.0E-05					
RS888	1,2,3,7,8-PeCDD	4.8E-06	U	2.4E-06					
RS888	1,2,3,7,8-PeCDF	1.0E-05		1.0E-05					
RS888	2,3,4,6,7,8-HxCDF	2.0E-05		2.0E-05					
RS888	2,3,4,7,8-PeCDF	2.0E-05		2.0E-05					
RS888	2,3,7,8-TCDD	9.8E-07	U	4.9E-07					
RS888	2,3,7,8-TCDF	1.0E-05		1.0E-05					
RS888	OCDD	4.0E-02	J	4.0E-02					
RS888	OCDF	8.4E-04		8.4E-04					
RS888	Total HpCDD	1.6E-02		1.6E-02					
RS888	Total HpCDF	2.7E-03	J	2.7E-03					
RS888	Total HxCDD	6.1E-04		6.1E-04					
RS888	Total HxCDF	8.1E-04	J	8.1E-04					
RS888	Total PeCDD	7.0E-05		7.0E-05					
RS888	Total PeCDF	1.6E-04	J	1.6E-04					
RS888	Total TCDD	1.1E-04		1.1E-04					
RS888	Total TCDF	1.0E-04	J	1.0E-04					
MJ618	1,2,3,4,6,7,8-HpCDD	1.2E-04		1.2E-04	1.6E-06	2.8E-06	1.2E-05	1.4E-04	1.6E-03
MJ618	1,2,3,4,6,7,8-HpCDF	2.0E-05		2.0E-05					
MJ618	1,2,3,4,7,8,9-HpCDF	1.9E-06	J	1.9E-06					
MJ618	1,2,3,4,7,8-HxCDD	8.6E-07	J	8.6E-07					
MJ618	1,2,3,4,7,8-HxCDF	2.6E-06		2.6E-06					
MJ618	1,2,3,6,7,8-HxCDD	3.4E-06		3.4E-06					
MJ618	1,2,3,6,7,8-HxCDF	1.2E-06	J	1.2E-06					
MJ618	1,2,3,7,8,9-HxCDD	1.9E-06	J	1.9E-06					

PCDD/PCDF Congener Group Summation for Soil/Sediment (0-4 feet bgs)
New Conservation Yard RFI Site

EPA ID	PCDD/PCDF Congener	Measured Concentration [a] (mg/kg)	Data Qualifier	Adjusted Concentration [b] (mg/kg)	Sum of PCDD/PCDF Congener Concentrations				
					Total Tetra (mg/kg)	Total Penta (mg/kg)	Total Hexa (mg/kg)	Total Hepta (mg/kg)	Total Octa (mg/kg)
MJ618	1,2,3,7,8,9-HxCDF	8.1E-07	J	8.1E-07					
MJ618	1,2,3,7,8-PeCDD	4.9E-07	J	4.9E-07					
MJ618	1,2,3,7,8-PeCDF	6.5E-07	J	6.5E-07					
MJ618	2,3,4,6,7,8-HxCDF	1.5E-06	J	1.5E-06					
MJ618	2,3,4,7,8-PeCDF	1.6E-06	J	1.6E-06					
MJ618	2,3,7,8-TCDD	2.5E-07	U	1.3E-07					
MJ618	2,3,7,8-TCDF	1.5E-06		1.5E-06					
MJ618	OCDD	1.5E-03		1.5E-03					
MJ618	OCDF	5.0E-05		5.0E-05					
MJ618	Total HpCDD	3.7E-04		3.7E-04					
MJ618	Total HpCDF	7.0E-05		7.0E-05					
MJ618	Total HxCDD	3.0E-05		3.0E-05					
MJ618	Total HxCDF	4.0E-05		4.0E-05					
MJ618	Total PeCDD	3.3E-06		3.3E-06					
MJ618	Total PeCDF	1.0E-05		1.0E-05					
MJ618	Total TCDD	4.0E-06		4.0E-06					
MJ618	Total TCDF	1.0E-05		1.0E-05					
MJ617	1,2,3,4,6,7,8-HpCDD	7.0E-05		7.0E-05	2.4E-07	1.1E-06	7.0E-06	8.1E-05	1.0E-03
MJ617	1,2,3,4,6,7,8-HpCDF	1.0E-05		1.0E-05					
MJ617	1,2,3,4,7,8,9-HpCDF	1.2E-06	J	1.2E-06					
MJ617	1,2,3,4,7,8-HxCDD	8.4E-07	J	8.4E-07					
MJ617	1,2,3,4,7,8-HxCDF	8.0E-07	J	8.0E-07					
MJ617	1,2,3,6,7,8-HxCDD	2.1E-06	J	2.1E-06					
MJ617	1,2,3,6,7,8-HxCDF	4.4E-07	J	4.4E-07					
MJ617	1,2,3,7,8,9-HxCDD	1.9E-06	J	1.9E-06					
MJ617	1,2,3,7,8,9-HxCDF	2.9E-07	UJ	1.4E-07					
MJ617	1,2,3,7,8-PeCDD	4.8E-07	J	4.8E-07					
MJ617	1,2,3,7,8-PeCDF	1.8E-07	UJ	9.1E-08					
MJ617	2,3,4,6,7,8-HxCDF	7.1E-07	J	7.1E-07					
MJ617	2,3,4,7,8-PeCDF	5.3E-07	J	5.3E-07					
MJ617	2,3,7,8-TCDD	1.1E-07	U	5.6E-08					
MJ617	2,3,7,8-TCDF	3.7E-07	UJ	1.9E-07					
MJ617	OCDD	9.5E-04		9.5E-04					
MJ617	OCDF	9.0E-05		9.0E-05					
MJ617	Total HpCDD	1.5E-04		1.5E-04					
MJ617	Total HpCDF	6.0E-05		6.0E-05					
MJ617	Total HxCDD	2.0E-05		2.0E-05					
MJ617	Total HxCDF	2.0E-05		2.0E-05					
MJ617	Total PeCDD	1.2E-06		1.2E-06					
MJ617	Total PeCDF	4.8E-06		4.8E-06					
MJ617	Total TCDD	1.1E-07	U	5.6E-08					
MJ617	Total TCDF	2.0E-06		2.0E-06					
MJ775	1,2,3,4,6,7,8-HpCDD	2.7E-02		2.7E-02	4.5E-05	1.3E-04	1.9E-03	2.9E-02	2.8E-01
MJ775	1,2,3,4,6,7,8-HpCDF	2.5E-03		2.5E-03					
MJ775	1,2,3,4,7,8,9-HpCDF	2.3E-04		2.3E-04					
MJ775	1,2,3,4,7,8-HxCDD	2.4E-04		2.4E-04					
MJ775	1,2,3,4,7,8-HxCDF	8.0E-05		8.0E-05					
MJ775	1,2,3,6,7,8-HxCDD	9.0E-04		9.0E-04					
MJ775	1,2,3,6,7,8-HxCDF	8.0E-05	J	8.0E-05					
MJ775	1,2,3,7,8,9-HxCDD	4.7E-04		4.7E-04					
MJ775	1,2,3,7,8,9-HxCDF	2.0E-05		2.0E-05					
MJ775	1,2,3,7,8-PeCDD	9.0E-05		9.0E-05					
MJ775	1,2,3,7,8-PeCDF	1.0E-05		1.0E-05					
MJ775	2,3,4,6,7,8-HxCDF	1.4E-04		1.4E-04					

PCDD/PCDF Congener Group Summation for Soil/Sediment (0-4 feet bgs)
New Conservation Yard RFI Site

EPA ID	PCDD/PCDF Congener	Measured Concentration [a] (mg/kg)	Data Qualifier	Adjusted Concentration [b] (mg/kg)	Sum of PCDD/PCDF Congener Concentrations Total Tetra (mg/kg)	Total Penta (mg/kg)	Total Hexa (mg/kg)	Total Hepta (mg/kg)	Total Octa (mg/kg)
MJ775	2,3,4,7,8-PeCDF	3.0E-05		3.0E-05					
MJ775	2,3,7,8-TCDD	4.0E-05		4.0E-05					
MJ775	2,3,7,8-TCDF	4.8E-06		4.8E-06					
MJ775	OCDD	2.8E-01		2.8E-01					
MJ775	OCDF	6.9E-03		6.9E-03					
MJ775	Total HpCDD	5.5E-02		5.5E-02					
MJ775	Total HpCDF	1.1E-02		1.1E-02					
MJ775	Total HxCDD	6.0E-03		6.0E-03					
MJ775	Total HxCDF	3.9E-03	J	3.9E-03					
MJ775	Total PeCDD	4.7E-04		4.7E-04					
MJ775	Total PeCDF	6.6E-04	J	6.6E-04					
MJ775	Total TCDD	8.0E-05		8.0E-05					
MJ775	Total TCDF	1.9E-04		1.9E-04					
MJ724	1,2,3,4,6,7,8-HpCDD	1.1E-02		1.1E-02	1.5E-05	8.0E-05	1.2E-03	1.4E-02	1.3E-01
MJ724	1,2,3,4,6,7,8-HpCDF	2.2E-03		2.2E-03					
MJ724	1,2,3,4,7,8,9-HpCDF	2.1E-04		2.1E-04					
MJ724	1,2,3,4,7,8-HxCDD	1.3E-04		1.3E-04					
MJ724	1,2,3,4,7,8-HxCDF	8.0E-05		8.0E-05					
MJ724	1,2,3,6,7,8-HxCDD	5.9E-04		5.9E-04					
MJ724	1,2,3,6,7,8-HxCDF	6.0E-05	J	6.0E-05					
MJ724	1,2,3,7,8,9-HxCDD	1.8E-04		1.8E-04					
MJ724	1,2,3,7,8,9-HxCDF	2.0E-05		2.0E-05					
MJ724	1,2,3,7,8-PeCDD	5.0E-05		5.0E-05					
MJ724	1,2,3,7,8-PeCDF	1.0E-05		1.0E-05					
MJ724	2,3,4,6,7,8-HxCDF	1.4E-04		1.4E-04					
MJ724	2,3,4,7,8-PeCDF	2.0E-05		2.0E-05					
MJ724	2,3,7,8-TCDD	1.0E-05		1.0E-05					
MJ724	2,3,7,8-TCDF	4.9E-06		4.9E-06					
MJ724	OCDD	1.2E-01		1.2E-01					
MJ724	OCDF	5.3E-03		5.3E-03					
MJ724	Total HpCDD	2.0E-02		2.0E-02					
MJ724	Total HpCDF	1.1E-02		1.1E-02					
MJ724	Total HxCDD	2.9E-03		2.9E-03					
MJ724	Total HxCDF	4.2E-03	J	4.2E-03					
MJ724	Total PeCDD	2.9E-04		2.9E-04					
MJ724	Total PeCDF	6.2E-04	J	6.2E-04					
MJ724	Total TCDD	4.0E-05		4.0E-05					
MJ724	Total TCDF	1.5E-04		1.5E-04					
MJ727	1,2,3,4,6,7,8-HpCDD	6.6E-04		6.6E-04	2.2E-07	2.5E-06	5.0E-05	7.6E-04	6.7E-03
MJ727	1,2,3,4,6,7,8-HpCDF	9.0E-05		9.0E-05					
MJ727	1,2,3,4,7,8,9-HpCDF	1.0E-05		1.0E-05					
MJ727	1,2,3,4,7,8-HxCDD	4.0E-06		4.0E-06					
MJ727	1,2,3,4,7,8-HxCDF	3.2E-06		3.2E-06					
MJ727	1,2,3,6,7,8-HxCDD	2.0E-05		2.0E-05					
MJ727	1,2,3,6,7,8-HxCDF	1.9E-06	J	1.9E-06					
MJ727	1,2,3,7,8,9-HxCDD	1.0E-05		1.0E-05					
MJ727	1,2,3,7,8,9-HxCDF	8.6E-07	J	8.6E-07					
MJ727	1,2,3,7,8-PeCDD	1.7E-06	J	1.7E-06					
MJ727	1,2,3,7,8-PeCDF	2.2E-07	J	2.2E-07					
MJ727	2,3,4,6,7,8-HxCDF	1.0E-05		1.0E-05					
MJ727	2,3,4,7,8-PeCDF	5.5E-07	J	5.5E-07					
MJ727	2,3,7,8-TCDD	3.9E-07	UJ	2.0E-07					
MJ727	2,3,7,8-TCDF	4.0E-08	U	2.0E-08					
MJ727	OCDD	6.4E-03		6.4E-03					

PCDD/PCDF Congener Group Summation for Soil/Sediment (0-4 feet bgs)
New Conservation Yard RFI Site

EPA ID	PCDD/PCDF Congener	Measured Concentration [a] (mg/kg)	Data Qualifier	Adjusted Concentration [b] (mg/kg)	Sum of PCDD/PCDF Congener Concentrations				
					Total Tetra (mg/kg)	Total Penta (mg/kg)	Total Hexa (mg/kg)	Total Hepta (mg/kg)	Total Octa (mg/kg)
MJ727	OCDF	2.7E-04		2.7E-04					
MJ727	Total HpCDD	1.2E-03		1.2E-03					
MJ727	Total HpCDF	5.3E-04		5.3E-04					
MJ727	Total HxCDD	1.5E-04		1.5E-04					
MJ727	Total HxCDF	2.2E-04	J	2.2E-04					
MJ727	Total PeCDD	1.0E-05		1.0E-05					
MJ727	Total PeCDF	3.0E-05		3.0E-05					
MJ727	Total TCDD	5.0E-07		5.0E-07					
MJ727	Total TCDF	2.3E-06		2.3E-06					
MJ725	1,2,3,4,6,7,8-HpCDD	2.0E-04		2.0E-04	5.1E-07	1.0E-06	1.7E-05	2.3E-04	2.4E-03
MJ725	1,2,3,4,6,7,8-HpCDF	3.0E-05		3.0E-05					
MJ725	1,2,3,4,7,8,9-HpCDF	2.1E-06	J	2.1E-06					
MJ725	1,2,3,4,7,8-HxCDD	1.4E-06	J	1.4E-06					
MJ725	1,2,3,4,7,8-HxCDF	7.7E-07	J	7.7E-07					
MJ725	1,2,3,6,7,8-HxCDD	1.0E-05		1.0E-05					
MJ725	1,2,3,6,7,8-HxCDF	6.4E-07	J	6.4E-07					
MJ725	1,2,3,7,8,9-HxCDD	2.8E-06		2.8E-06					
MJ725	1,2,3,7,8,9-HxCDF	2.3E-07	J	2.3E-07					
MJ725	1,2,3,7,8-PeCDD	5.9E-07	J	5.9E-07					
MJ725	1,2,3,7,8-PeCDF	1.0E-07	J	1.0E-07					
MJ725	2,3,4,6,7,8-HxCDF	1.2E-06	J	1.2E-06					
MJ725	2,3,4,7,8-PeCDF	3.5E-07	J	3.5E-07					
MJ725	2,3,7,8-TCDD	2.7E-07	J	2.7E-07					
MJ725	2,3,7,8-TCDF	2.4E-07	J	2.4E-07					
MJ725	OCDD	2.3E-03		2.3E-03					
MJ725	OCDF	8.0E-05		8.0E-05					
MJ725	Total HpCDD	3.9E-04		3.9E-04					
MJ725	Total HpCDF	1.1E-04		1.1E-04					
MJ725	Total HxCDD	4.0E-05		4.0E-05					
MJ725	Total HxCDF	4.0E-05	J	4.0E-05					
MJ725	Total PeCDD	3.3E-06		3.3E-06					
MJ725	Total PeCDF	1.0E-05		1.0E-05					
MJ725	Total TCDD	5.7E-07		5.7E-07					
MJ725	Total TCDF	3.2E-06		3.2E-06					
MJ726	1,2,3,4,6,7,8-HpCDD	2.2E-02		2.2E-02	3.0E-05	1.2E-04	2.2E-03	2.8E-02	3.1E-01
MJ726	1,2,3,4,6,7,8-HpCDF	5.7E-03	J	5.7E-03					
MJ726	1,2,3,4,7,8,9-HpCDF	4.9E-04		4.9E-04					
MJ726	1,2,3,4,7,8-HxCDD	1.7E-04		1.7E-04					
MJ726	1,2,3,4,7,8-HxCDF	1.5E-04		1.5E-04					
MJ726	1,2,3,6,7,8-HxCDD	1.2E-03		1.2E-03					
MJ726	1,2,3,6,7,8-HxCDF	1.1E-04	J	1.1E-04					
MJ726	1,2,3,7,8,9-HxCDD	2.9E-04		2.9E-04					
MJ726	1,2,3,7,8,9-HxCDF	3.0E-05		3.0E-05					
MJ726	1,2,3,7,8-PeCDD	8.0E-05		8.0E-05					
MJ726	1,2,3,7,8-PeCDF	1.0E-05		1.0E-05					
MJ726	2,3,4,6,7,8-HxCDF	2.8E-04		2.8E-04					
MJ726	2,3,4,7,8-PeCDF	3.0E-05		3.0E-05					
MJ726	2,3,7,8-TCDD	2.0E-05		2.0E-05					
MJ726	2,3,7,8-TCDF	1.0E-05	J	1.0E-05					
MJ726	OCDD	3.0E-01		3.0E-01					
MJ726	OCDF	1.5E-02		1.5E-02					
MJ726	Total HpCDD	3.7E-02		3.7E-02					
MJ726	Total HpCDF	2.7E-02	J	2.7E-02					
MJ726	Total HxCDD	5.8E-03		5.8E-03					

PCDD/PCDF Congener Group Summation for Soil/Sediment (0-4 feet bgs)
New Conservation Yard RFI Site

EPA ID	PCDD/PCDF Congener	Measured Concentration [a] (mg/kg)	Data Qualifier	Adjusted Concentration [b] (mg/kg)	Sum of PCDD/PCDF Congener Concentrations				
					Total Tetra (mg/kg)	Total Penta (mg/kg)	Total Hexa (mg/kg)	Total Hepta (mg/kg)	Total Octa (mg/kg)
MJ726	Total HxCDF	1.1E-02	J	1.1E-02					
MJ726	Total PeCDD	3.9E-04		3.9E-04					
MJ726	Total PeCDF	1.4E-03	J	1.4E-03					
MJ726	Total TCDD	4.0E-05		4.0E-05					
MJ726	Total TCDF	1.7E-04	J	1.7E-04					
MJ729	1,2,3,4,6,7,8-HpCDD	4.5E-03		4.5E-03	1.1E-05	1.5E-05	3.2E-04	5.1E-03	5.4E-02
MJ729	1,2,3,4,6,7,8-HpCDF	5.4E-04		5.4E-04					
MJ729	1,2,3,4,7,8,9-HpCDF	5.0E-05		5.0E-05					
MJ729	1,2,3,4,7,8-HxCDD	3.0E-05		3.0E-05					
MJ729	1,2,3,4,7,8-HxCDF	2.0E-05		2.0E-05					
MJ729	1,2,3,6,7,8-HxCDD	1.6E-04		1.6E-04					
MJ729	1,2,3,6,7,8-HxCDF	1.0E-05		1.0E-05					
MJ729	1,2,3,7,8,9-HxCDD	7.0E-05		7.0E-05					
MJ729	1,2,3,7,8,9-HxCDF	3.5E-06		3.5E-06					
MJ729	1,2,3,7,8-PeCDD	1.0E-05		1.0E-05					
MJ729	1,2,3,7,8-PeCDF	1.4E-06	J	1.4E-06					
MJ729	2,3,4,6,7,8-HxCDF	3.0E-05		3.0E-05					
MJ729	2,3,4,7,8-PeCDF	3.9E-06		3.9E-06					
MJ729	2,3,7,8-TCDD	1.0E-05		1.0E-05					
MJ729	2,3,7,8-TCDF	1.0E-06		1.0E-06					
MJ729	OCDD	5.3E-02		5.3E-02					
MJ729	OCDF	1.5E-03		1.5E-03					
MJ729	Total HpCDD	8.2E-03		8.2E-03					
MJ729	Total HpCDF	2.6E-03		2.6E-03					
MJ729	Total HxCDD	8.5E-04		8.5E-04					
MJ729	Total HxCDF	8.4E-04	J	8.4E-04					
MJ729	Total PeCDD	6.0E-05		6.0E-05					
MJ729	Total PeCDF	1.0E-04		1.0E-04					
MJ729	Total TCDD	1.0E-05		1.0E-05					
MJ729	Total TCDF	3.0E-05		3.0E-05					
MJ730	1,2,3,4,6,7,8-HpCDD	9.2E-04		9.2E-04	9.6E-07	3.6E-06	6.7E-05	1.1E-03	1.1E-02
MJ730	1,2,3,4,6,7,8-HpCDF	1.4E-04		1.4E-04					
MJ730	1,2,3,4,7,8,9-HpCDF	1.0E-05		1.0E-05					
MJ730	1,2,3,4,7,8-HxCDD	1.0E-05		1.0E-05					
MJ730	1,2,3,4,7,8-HxCDF	3.5E-06		3.5E-06					
MJ730	1,2,3,6,7,8-HxCDD	3.0E-05		3.0E-05					
MJ730	1,2,3,6,7,8-HxCDF	2.9E-06		2.9E-06					
MJ730	1,2,3,7,8,9-HxCDD	1.0E-05		1.0E-05					
MJ730	1,2,3,7,8,9-HxCDF	9.6E-07	J	9.6E-07					
MJ730	1,2,3,7,8-PeCDD	2.3E-06	J	2.3E-06					
MJ730	1,2,3,7,8-PeCDF	3.8E-07	J	3.8E-07					
MJ730	2,3,4,6,7,8-HxCDF	1.0E-05		1.0E-05					
MJ730	2,3,4,7,8-PeCDF	9.5E-07	J	9.5E-07					
MJ730	2,3,7,8-TCDD	6.0E-07		6.0E-07					
MJ730	2,3,7,8-TCDF	3.6E-07	J	3.6E-07					
MJ730	OCDD	1.1E-02		1.1E-02					
MJ730	OCDF	3.8E-04		3.8E-04					
MJ730	Total HpCDD	1.6E-03		1.6E-03					
MJ730	Total HpCDF	6.3E-04		6.3E-04					
MJ730	Total HxCDD	1.5E-04		1.5E-04					
MJ730	Total HxCDF	1.9E-04	J	1.9E-04					
MJ730	Total PeCDD	1.0E-05		1.0E-05					
MJ730	Total PeCDF	2.0E-05		2.0E-05					
MJ730	Total TCDD	1.1E-06		1.1E-06					

PCDD/PCDF Congener Group Summation for Soil/Sediment (0-4 feet bgs)
New Conservation Yard RFI Site

EPA ID	PCDD/PCDF Congener	Measured Concentration [a] (mg/kg)	Data Qualifier	Adjusted Concentration [b] (mg/kg)	Sum of PCDD/PCDF Congener Concentrations				
					Total Tetra (mg/kg)	Total Penta (mg/kg)	Total Hexa (mg/kg)	Total Hepta (mg/kg)	Total Octa (mg/kg)
MJ730	Total TCDF	1.0E-05		1.0E-05					
MJ732	1,2,3,4,6,7,8-HpCDD	4.1E-04		4.1E-04	6.3E-07	1.9E-06	2.9E-05	4.5E-04	4.7E-03
MJ732	1,2,3,4,6,7,8-HpCDF	4.0E-05		4.0E-05					
MJ732	1,2,3,4,7,8,9-HpCDF	4.3E-06		4.3E-06					
MJ732	1,2,3,4,7,8-HxCDD	3.0E-06		3.0E-06					
MJ732	1,2,3,4,7,8-HxCDF	1.5E-06	J	1.5E-06					
MJ732	1,2,3,6,7,8-HxCDD	1.0E-05		1.0E-05					
MJ732	1,2,3,6,7,8-HxCDF	1.4E-06	J	1.4E-06					
MJ732	1,2,3,7,8,9-HxCDD	1.0E-05		1.0E-05					
MJ732	1,2,3,7,8,9-HxCDF	4.3E-07	J	4.3E-07					
MJ732	1,2,3,7,8-PeCDD	1.1E-06	J	1.1E-06					
MJ732	1,2,3,7,8-PeCDF	1.9E-07	J	1.9E-07					
MJ732	2,3,4,6,7,8-HxCDF	2.8E-06		2.8E-06					
MJ732	2,3,4,7,8-PeCDF	5.7E-07	J	5.7E-07					
MJ732	2,3,7,8-TCDD	3.9E-07	J	3.9E-07					
MJ732	2,3,7,8-TCDF	2.5E-07	J	2.5E-07					
MJ732	OCDD	4.6E-03		4.6E-03					
MJ732	OCDF	1.0E-04		1.0E-04					
MJ732	Total HpCDD	7.9E-04		7.9E-04					
MJ732	Total HpCDF	1.7E-04		1.7E-04					
MJ732	Total HxCDD	9.0E-05		9.0E-05					
MJ732	Total HxCDF	7.0E-05	J	7.0E-05					
MJ732	Total PeCDD	1.0E-05		1.0E-05					
MJ732	Total PeCDF	1.0E-05		1.0E-05					
MJ732	Total TCDD	7.5E-07		7.5E-07					
MJ732	Total TCDF	3.5E-06		3.5E-06					
MJ620	1,2,3,4,6,7,8-HpCDD	1.9E-03		1.9E-03	3.9E-06	1.4E-05	1.8E-04	2.2E-03	2.1E-02
MJ620	1,2,3,4,6,7,8-HpCDF	3.0E-04		3.0E-04					
MJ620	1,2,3,4,7,8,9-HpCDF	3.0E-05		3.0E-05					
MJ620	1,2,3,4,7,8-HxCDD	2.0E-05		2.0E-05					
MJ620	1,2,3,4,7,8-HxCDF	1.0E-05		1.0E-05					
MJ620	1,2,3,6,7,8-HxCDD	9.0E-05		9.0E-05					
MJ620	1,2,3,6,7,8-HxCDF	1.0E-05		1.0E-05					
MJ620	1,2,3,7,8,9-HxCDD	3.0E-05		3.0E-05					
MJ620	1,2,3,7,8,9-HxCDF	2.2E-06	J	2.2E-06					
MJ620	1,2,3,7,8-PeCDD	1.0E-05		1.0E-05					
MJ620	1,2,3,7,8-PeCDF	1.3E-06	J	1.3E-06					
MJ620	2,3,4,6,7,8-HxCDF	2.0E-05		2.0E-05					
MJ620	2,3,4,7,8-PeCDF	2.9E-06		2.9E-06					
MJ620	2,3,7,8-TCDD	2.8E-06		2.8E-06					
MJ620	2,3,7,8-TCDF	1.1E-06		1.1E-06					
MJ620	OCDD	2.0E-02		2.0E-02					
MJ620	OCDF	7.4E-04		7.4E-04					
MJ620	Total HpCDD	3.5E-03		3.5E-03					
MJ620	Total HpCDF	1.4E-03		1.4E-03					
MJ620	Total HxCDD	4.8E-04		4.8E-04					
MJ620	Total HxCDF	5.8E-04		5.8E-04					
MJ620	Total PeCDD	6.0E-05		6.0E-05					
MJ620	Total PeCDF	1.0E-04		1.0E-04					
MJ620	Total TCDD	1.0E-05		1.0E-05					
MJ620	Total TCDF	2.0E-05		2.0E-05					
MJ619	1,2,3,4,6,7,8-HpCDD	2.4E-03		2.4E-03	5.1E-06	1.6E-05	2.0E-04	2.8E-03	2.9E-02
MJ619	1,2,3,4,6,7,8-HpCDF	3.8E-04		3.8E-04					
MJ619	1,2,3,4,7,8,9-HpCDF	4.0E-05		4.0E-05					

PCDD/PCDF Congener Group Summation for Soil/Sediment (0-4 feet bgs)
New Conservation Yard RFI Site

EPA ID	PCDD/PCDF Congener	Measured Concentration [a] (mg/kg)	Data Qualifier	Adjusted Concentration [b] (mg/kg)	Sum of PCDD/PCDF Congener Concentrations Total Tetra (mg/kg)	Total Penta (mg/kg)	Total Hexa (mg/kg)	Total Hepta (mg/kg)	Total Octa (mg/kg)
MJ619	1,2,3,4,7,8-HxCDD	2.0E-05		2.0E-05					
MJ619	1,2,3,4,7,8-HxCDF	1.0E-05		1.0E-05					
MJ619	1,2,3,6,7,8-HxCDD	1.0E-04		1.0E-04					
MJ619	1,2,3,6,7,8-HxCDF	1.0E-05		1.0E-05					
MJ619	1,2,3,7,8,9-HxCDD	4.0E-05		4.0E-05					
MJ619	1,2,3,7,8,9-HxCDF	2.6E-06		2.6E-06					
MJ619	1,2,3,7,8-PeCDD	1.0E-05		1.0E-05					
MJ619	1,2,3,7,8-PeCDF	1.5E-06	J	1.5E-06					
MJ619	2,3,4,6,7,8-HxCDF	2.0E-05		2.0E-05					
MJ619	2,3,4,7,8-PeCDF	4.4E-06		4.4E-06					
MJ619	2,3,7,8-TCDD	2.9E-06		2.9E-06					
MJ619	2,3,7,8-TCDF	2.2E-06		2.2E-06					
MJ619	OCDD	2.8E-02		2.8E-02					
MJ619	OCDF	1.0E-03		1.0E-03					
MJ619	Total HpCDD	4.4E-03		4.4E-03					
MJ619	Total HpCDF	1.7E-03		1.7E-03					
MJ619	Total HxCDD	5.5E-04		5.5E-04					
MJ619	Total HxCDF	6.8E-04		6.8E-04					
MJ619	Total PeCDD	5.0E-05		5.0E-05					
MJ619	Total PeCDF	1.1E-04		1.1E-04					
MJ619	Total TCDD	1.0E-05		1.0E-05					
MJ619	Total TCDF	3.0E-05		3.0E-05					
MJ621	1,2,3,4,6,7,8-HpCDD	4.6E-04		4.6E-04	1.5E-06	3.9E-06	5.7E-05	5.5E-04	5.4E-03
MJ621	1,2,3,4,6,7,8-HpCDF	8.0E-05		8.0E-05					
MJ621	1,2,3,4,7,8,9-HpCDF	1.0E-05		1.0E-05					
MJ621	1,2,3,4,7,8-HxCDD	1.0E-05		1.0E-05					
MJ621	1,2,3,4,7,8-HxCDF	3.6E-06		3.6E-06					
MJ621	1,2,3,6,7,8-HxCDD	2.0E-05		2.0E-05					
MJ621	1,2,3,6,7,8-HxCDF	2.6E-06		2.6E-06					
MJ621	1,2,3,7,8,9-HxCDD	1.0E-05		1.0E-05					
MJ621	1,2,3,7,8,9-HxCDF	6.6E-07	J	6.6E-07					
MJ621	1,2,3,7,8-PeCDD	2.2E-06	J	2.2E-06					
MJ621	1,2,3,7,8-PeCDF	4.6E-07	J	4.6E-07					
MJ621	2,3,4,6,7,8-HxCDF	1.0E-05		1.0E-05					
MJ621	2,3,4,7,8-PeCDF	1.3E-06	J	1.3E-06					
MJ621	2,3,7,8-TCDD	5.4E-07		5.4E-07					
MJ621	2,3,7,8-TCDF	9.8E-07	J	9.8E-07					
MJ621	OCDD	5.2E-03		5.2E-03					
MJ621	OCDF	2.3E-04		2.3E-04					
MJ621	Total HpCDD	8.9E-04		8.9E-04					
MJ621	Total HpCDF	3.3E-04		3.3E-04					
MJ621	Total HxCDD	1.1E-04		1.1E-04					
MJ621	Total HxCDF	1.4E-04		1.4E-04					
MJ621	Total PeCDD	1.0E-05		1.0E-05					
MJ621	Total PeCDF	2.0E-05		2.0E-05					
MJ621	Total TCDD	7.6E-07		7.6E-07					
MJ621	Total TCDF	1.0E-05		1.0E-05					
				MAX	4.5E-05	1.3E-04	2.2E-03	2.9E-02	3.1E-01

Maximum of Total Summed Congener Concentrations

Total Tetra	4.5E-05
Total Penta	1.3E-04
Total Hexa	2.2E-03
Total Hepta	2.9E-02
Total Octa	3.1E-01

PCDD/PCDF Congener Group Summation for Soil/Sediment (0-4 feet bgs)
New Conservation Yard RFI Site

EPA ID	PCDD/PCDF Congener	Measured Concentration [a] (mg/kg)	Data Qualifier	Adjusted Concentration [b] (mg/kg)	Sum of PCDD/PCDF Congener Concentrations				
					Total Tetra (mg/kg)	Total Penta (mg/kg)	Total Hexa (mg/kg)	Total Hepta (mg/kg)	Total Octa (mg/kg)

Notes:

a. Measured concentration - concentration reported by the analytial laboratory

b. Adjusted concentration - concentration reported by the analytical laboratory if the chemical was detected, or estimated at one-half the sample quantitation limit (SQL) if not detected.

PCDD/PCDF - polychlorinated dibenzo-p-dioxins and dibenzofurans

Total Tetra - sum of the 2,3,7,8-substituted tetraclorinated dibenzo-p-dioxin and dibenzofuran congeners.

Total Penta - sum of the 2,3,7,8-substituted pentaclorinated dibenzo-p-dioxin and dibenzofuran congeners.

Total Hexa - sum of the 2,3,7,8-substituted hexaclorinated dibenzo-p-dioxin and dibenzofuran congeners.

Total Hepta - sum of the 2,3,7,8-substituted heptaclorinated dibenzo-p-dioxin and dibenzofuran congeners.

Total Octa - sum of the 2,3,7,8-substituted Octaclorinated dibenzo-p-dioxin and dibenzofuran congeners.

J - concentration estimated

U - not detected. Concentration shown is the SQL.

UJ - not detected. Concentration shown is the estimated SQL.

mg/kg - milligrams per kilogram

bgs- below ground surface

PCDD/PCDF Congener Group Summation for Soil/Sediment (0-2 feet bgs)
New Conservation Yard RFI Site

EPA ID	PCDD/PCDF Congener	Measured Concentration [a] (mg/kg)	Data Qualifier	Adjusted Concentration [b] (mg/kg)	Sum of PCDD/PCDF Congener Concentrations				
					Total Tetra (mg/kg)	Total Penta (mg/kg)	Total Hexa (mg/kg)	Total Hepta (mg/kg)	Total Octa (mg/kg)
RJ011	1,2,3,4,6,7,8-HpCDD	3.2E-04		3.2E-04	2.6E-06	4.4E-06	3.7E-05	3.9E-04	4.0E-03
RJ011	1,2,3,4,6,7,8-HpCDF	1.1E-04	UJ	5.5E-05					
RJ011	1,2,3,4,7,8,9-HpCDF	1.0E-05	J	1.0E-05					
RJ011	1,2,3,4,7,8-HxCDD	9.6E-07	U	4.8E-07					
RJ011	1,2,3,4,7,8-HxCDF	1.0E-05	J	1.0E-05					
RJ011	1,2,3,6,7,8-HxCDD	1.0E-05	J	1.0E-05					
RJ011	1,2,3,6,7,8-HxCDF	1.0E-05	UJ	5.0E-06					
RJ011	1,2,3,7,8,9-HxCDD	3.2E-06	J	3.2E-06					
RJ011	1,2,3,7,8,9-HxCDF	3.7E-06	J	3.7E-06					
RJ011	1,2,3,7,8-PeCDD	5.5E-07	U	2.8E-07					
RJ011	1,2,3,7,8-PeCDF	1.7E-06	UJ	8.5E-07					
RJ011	2,3,4,6,7,8-HxCDF	4.2E-06	J	4.2E-06					
RJ011	2,3,4,7,8-PeCDF	3.3E-06	J	3.3E-06					
RJ011	2,3,7,8-TCDD	1.3E-06	U	6.5E-07					
RJ011	2,3,7,8-TCDF	1.9E-06	J	1.9E-06					
RJ011	OCDD	3.9E-03		3.9E-03					
RJ011	OCDF	1.2E-04		1.2E-04					
RJ011	Total HpCDD	6.1E-04		6.1E-04					
RJ011	Total HpCDF	1.8E-04		1.8E-04					
RJ011	Total HxCDD	9.0E-05		9.0E-05					
RJ011	Total HxCDF	1.5E-04		1.5E-04					
RJ011	Total PeCDD	4.6E-06	J	4.6E-06					
RJ011	Total PeCDF	1.0E-05	J	1.0E-05					
RJ011	Total TCDD	1.0E-05		1.0E-05					
RJ011	Total TCDF	2.0E-05		2.0E-05					
RJ012	1,2,3,4,6,7,8-HpCDD	2.0E-05		2.0E-05	6.3E-07	9.4E-07	3.4E-06	2.5E-05	2.5E-04
RJ012	1,2,3,4,6,7,8-HpCDF	1.0E-05	UJ	5.0E-06					
RJ012	1,2,3,4,7,8,9-HpCDF	9.2E-07	U	4.6E-07					
RJ012	1,2,3,4,7,8-HxCDD	1.7E-06	U	8.5E-07					
RJ012	1,2,3,4,7,8-HxCDF	4.0E-07	U	2.0E-07					
RJ012	1,2,3,6,7,8-HxCDD	1.4E-06	U	7.0E-07					
RJ012	1,2,3,6,7,8-HxCDF	7.9E-07	U	4.0E-07					
RJ012	1,2,3,7,8,9-HxCDD	1.2E-06	U	6.0E-07					
RJ012	1,2,3,7,8,9-HxCDF	6.0E-07	U	3.0E-07					
RJ012	1,2,3,7,8-PeCDD	5.8E-07	U	2.9E-07					
RJ012	1,2,3,7,8-PeCDF	8.6E-07	U	4.3E-07					
RJ012	2,3,4,6,7,8-HxCDF	6.4E-07	U	3.2E-07					
RJ012	2,3,4,7,8-PeCDF	4.4E-07	U	2.2E-07					
RJ012	2,3,7,8-TCDD	7.9E-07	U	4.0E-07					
RJ012	2,3,7,8-TCDF	4.6E-07	U	2.3E-07					
RJ012	OCDD	2.3E-04		2.3E-04					
RJ012	OCDF	2.0E-05	J	2.0E-05					
RJ012	Total HpCDD	4.0E-05		4.0E-05					
RJ012	Total HpCDF	1.0E-05	J	1.0E-05					
RJ012	Total HxCDD	1.5E-06	U	7.5E-07					
RJ012	Total HxCDF	6.1E-07	U	3.1E-07					
RJ012	Total PeCDD	5.8E-07	U	2.9E-07					
RJ012	Total PeCDF	6.5E-07	U	3.3E-07					
RJ012	Total TCDD	7.9E-07	U	4.0E-07					
RJ012	Total TCDF	4.6E-07	U	2.3E-07					
RJ014	1,2,3,4,6,7,8-HpCDD	6.0E-04		6.0E-04	1.1E-05	3.1E-05	7.9E-05	7.2E-04	7.2E-03
RJ014	1,2,3,4,6,7,8-HpCDF	2.2E-04	UJ	1.1E-04					
RJ014	1,2,3,4,7,8,9-HpCDF	1.0E-05	J	1.0E-05					
RJ014	1,2,3,4,7,8-HxCDD	4.4E-06	J	4.4E-06					

PCDD/PCDF Congener Group Summation for Soil/Sediment (0-2 feet bgs)
New Conservation Yard RFI Site

EPA ID	PCDD/PCDF Congener	Measured Concentration [a] (mg/kg)	Data Qualifier	Adjusted Concentration [b] (mg/kg)	Sum of PCDD/PCDF Congener Concentrations				
					Total Tetra (mg/kg)	Total Penta (mg/kg)	Total Hexa (mg/kg)	Total Hepta (mg/kg)	Total Octa (mg/kg)
RJ014	1,2,3,4,7,8-HxCDF	2.0E-05		2.0E-05					
RJ014	1,2,3,6,7,8-HxCDD	2.0E-05		2.0E-05					
RJ014	1,2,3,6,7,8-HxCDF	2.0E-05	UJ	1.0E-05					
RJ014	1,2,3,7,8,9-HxCDD	1.0E-05	J	1.0E-05					
RJ014	1,2,3,7,8,9-HxCDF	4.7E-06	J	4.7E-06					
RJ014	1,2,3,7,8-PeCDD	1.0E-06	U	5.0E-07					
RJ014	1,2,3,7,8-PeCDF	1.0E-05	J	1.0E-05					
RJ014	2,3,4,6,7,8-HxCDF	1.0E-05	J	1.0E-05					
RJ014	2,3,4,7,8-PeCDF	2.0E-05		2.0E-05					
RJ014	2,3,7,8-TCDD	1.4E-06	U	7.0E-07					
RJ014	2,3,7,8-TCDF	1.0E-05	J	1.0E-05					
RJ014	OCDD	6.9E-03		6.9E-03					
RJ014	OCDF	2.7E-04		2.7E-04					
RJ014	Total HpCDD	1.0E-03		1.0E-03					
RJ014	Total HpCDF	1.8E-04		1.8E-04					
RJ014	Total HxCDD	1.5E-04		1.5E-04					
RJ014	Total HxCDF	2.1E-04		2.1E-04					
RJ014	Total PeCDD	1.0E-05	J	1.0E-05					
RJ014	Total PeCDF	7.0E-05		7.0E-05					
RJ014	Total TCDD	4.0E-05		4.0E-05					
RJ014	Total TCDF	7.0E-05		7.0E-05					
RS888	1,2,3,4,6,7,8-HpCDD	3.3E-03		3.3E-03	1.0E-05	3.2E-05	1.9E-04	3.6E-03	4.1E-02
RS888	1,2,3,4,6,7,8-HpCDF	5.6E-04	UJ	2.8E-04					
RS888	1,2,3,4,7,8,9-HpCDF	6.0E-05		6.0E-05					
RS888	1,2,3,4,7,8-HxCDD	1.0E-05		1.0E-05					
RS888	1,2,3,4,7,8-HxCDF	4.0E-05		4.0E-05					
RS888	1,2,3,6,7,8-HxCDD	6.0E-05		6.0E-05					
RS888	1,2,3,6,7,8-HxCDF	3.0E-05		3.0E-05					
RS888	1,2,3,7,8,9-HxCDD	1.0E-05		1.0E-05					
RS888	1,2,3,7,8,9-HxCDF	2.0E-05		2.0E-05					
RS888	1,2,3,7,8-PeCDD	4.8E-06	U	2.4E-06					
RS888	1,2,3,7,8-PeCDF	1.0E-05		1.0E-05					
RS888	2,3,4,6,7,8-HxCDF	2.0E-05		2.0E-05					
RS888	2,3,4,7,8-PeCDF	2.0E-05		2.0E-05					
RS888	2,3,7,8-TCDD	9.8E-07	U	4.9E-07					
RS888	2,3,7,8-TCDF	1.0E-05		1.0E-05					
RS888	OCDD	4.0E-02	J	4.0E-02					
RS888	OCDF	8.4E-04		8.4E-04					
RS888	Total HpCDD	1.6E-02		1.6E-02					
RS888	Total HpCDF	2.7E-03	J	2.7E-03					
RS888	Total HxCDD	6.1E-04		6.1E-04					
RS888	Total HxCDF	8.1E-04	J	8.1E-04					
RS888	Total PeCDD	7.0E-05		7.0E-05					
RS888	Total PeCDF	1.6E-04	J	1.6E-04					
RS888	Total TCDD	1.1E-04		1.1E-04					
RS888	Total TCDF	1.0E-04	J	1.0E-04					
MJ618	1,2,3,4,6,7,8-HpCDD	1.2E-04		1.2E-04	1.6E-06	2.8E-06	1.2E-05	1.4E-04	1.6E-03
MJ618	1,2,3,4,6,7,8-HpCDF	2.0E-05		2.0E-05					
MJ618	1,2,3,4,7,8,9-HpCDF	1.9E-06	J	1.9E-06					
MJ618	1,2,3,4,7,8-HxCDD	8.6E-07	J	8.6E-07					
MJ618	1,2,3,4,7,8-HxCDF	2.6E-06		2.6E-06					
MJ618	1,2,3,6,7,8-HxCDD	3.4E-06		3.4E-06					
MJ618	1,2,3,6,7,8-HxCDF	1.2E-06	J	1.2E-06					
MJ618	1,2,3,7,8,9-HxCDD	1.9E-06	J	1.9E-06					

PCDD/PCDF Congener Group Summation for Soil/Sediment (0-2 feet bgs)
New Conservation Yard RFI Site

EPA ID	PCDD/PCDF Congener	Measured Concentration [a] (mg/kg)	Data Qualifier	Adjusted Concentration [b] (mg/kg)	Sum of PCDD/PCDF Congener Concentrations				
					Total Tetra (mg/kg)	Total Penta (mg/kg)	Total Hexa (mg/kg)	Total Hepta (mg/kg)	Total Octa (mg/kg)
MJ618	1,2,3,7,8,9-HxCDF	8.1E-07	J	8.1E-07					
MJ618	1,2,3,7,8-PeCDD	4.9E-07	J	4.9E-07					
MJ618	1,2,3,7,8-PeCDF	6.5E-07	J	6.5E-07					
MJ618	2,3,4,6,7,8-HxCDF	1.5E-06	J	1.5E-06					
MJ618	2,3,4,7,8-PeCDF	1.6E-06	J	1.6E-06					
MJ618	2,3,7,8-TCDD	2.5E-07	U	1.3E-07					
MJ618	2,3,7,8-TCDF	1.5E-06		1.5E-06					
MJ618	OCDD	1.5E-03		1.5E-03					
MJ618	OCDF	5.0E-05		5.0E-05					
MJ618	Total HpCDD	3.7E-04		3.7E-04					
MJ618	Total HpCDF	7.0E-05		7.0E-05					
MJ618	Total HxCDD	3.0E-05		3.0E-05					
MJ618	Total HxCDF	4.0E-05		4.0E-05					
MJ618	Total PeCDD	3.3E-06		3.3E-06					
MJ618	Total PeCDF	1.0E-05		1.0E-05					
MJ618	Total TCDD	4.0E-06		4.0E-06					
MJ618	Total TCDF	1.0E-05		1.0E-05					
MJ617	1,2,3,4,6,7,8-HpCDD	7.0E-05		7.0E-05	2.4E-07	1.1E-06	7.0E-06	8.1E-05	1.0E-03
MJ617	1,2,3,4,6,7,8-HpCDF	1.0E-05		1.0E-05					
MJ617	1,2,3,4,7,8,9-HpCDF	1.2E-06	J	1.2E-06					
MJ617	1,2,3,4,7,8-HxCDD	8.4E-07	J	8.4E-07					
MJ617	1,2,3,4,7,8-HxCDF	8.0E-07	J	8.0E-07					
MJ617	1,2,3,6,7,8-HxCDD	2.1E-06	J	2.1E-06					
MJ617	1,2,3,6,7,8-HxCDF	4.4E-07	J	4.4E-07					
MJ617	1,2,3,7,8,9-HxCDD	1.9E-06	J	1.9E-06					
MJ617	1,2,3,7,8,9-HxCDF	2.9E-07	UJ	1.4E-07					
MJ617	1,2,3,7,8-PeCDD	4.8E-07	J	4.8E-07					
MJ617	1,2,3,7,8-PeCDF	1.8E-07	UJ	9.1E-08					
MJ617	2,3,4,6,7,8-HxCDF	7.1E-07	J	7.1E-07					
MJ617	2,3,4,7,8-PeCDF	5.3E-07	J	5.3E-07					
MJ617	2,3,7,8-TCDD	1.1E-07	U	5.6E-08					
MJ617	2,3,7,8-TCDF	3.7E-07	UJ	1.9E-07					
MJ617	OCDD	9.5E-04		9.5E-04					
MJ617	OCDF	9.0E-05		9.0E-05					
MJ617	Total HpCDD	1.5E-04		1.5E-04					
MJ617	Total HpCDF	6.0E-05		6.0E-05					
MJ617	Total HxCDD	2.0E-05		2.0E-05					
MJ617	Total HxCDF	2.0E-05		2.0E-05					
MJ617	Total PeCDD	1.2E-06		1.2E-06					
MJ617	Total PeCDF	4.8E-06		4.8E-06					
MJ617	Total TCDD	1.1E-07	U	5.6E-08					
MJ617	Total TCDF	2.0E-06		2.0E-06					
MJ775	1,2,3,4,6,7,8-HpCDD	2.7E-02		2.7E-02	4.5E-05	1.3E-04	1.9E-03	2.9E-02	2.8E-01
MJ775	1,2,3,4,6,7,8-HpCDF	2.5E-03		2.5E-03					
MJ775	1,2,3,4,7,8,9-HpCDF	2.3E-04		2.3E-04					
MJ775	1,2,3,4,7,8-HxCDD	2.4E-04		2.4E-04					
MJ775	1,2,3,4,7,8-HxCDF	8.0E-05		8.0E-05					
MJ775	1,2,3,6,7,8-HxCDD	9.0E-04		9.0E-04					
MJ775	1,2,3,6,7,8-HxCDF	8.0E-05	J	8.0E-05					
MJ775	1,2,3,7,8,9-HxCDD	4.7E-04		4.7E-04					
MJ775	1,2,3,7,8,9-HxCDF	2.0E-05		2.0E-05					
MJ775	1,2,3,7,8-PeCDD	9.0E-05		9.0E-05					
MJ775	1,2,3,7,8-PeCDF	1.0E-05		1.0E-05					
MJ775	2,3,4,6,7,8-HxCDF	1.4E-04		1.4E-04					

PCDD/PCDF Congener Group Summation for Soil/Sediment (0-2 feet bgs)
New Conservation Yard RFI Site

EPA ID	PCDD/PCDF Congener	Measured Concentration [a] (mg/kg)	Data Qualifier	Adjusted Concentration [b] (mg/kg)	Sum of PCDD/PCDF Congener Concentrations Total Tetra (mg/kg)	Total Penta (mg/kg)	Total Hexa (mg/kg)	Total Hepta (mg/kg)	Total Octa (mg/kg)
MJ775	2,3,4,7,8-PeCDF	3.0E-05		3.0E-05					
MJ775	2,3,7,8-TCDD	4.0E-05		4.0E-05					
MJ775	2,3,7,8-TCDF	4.8E-06		4.8E-06					
MJ775	OCDD	2.8E-01		2.8E-01					
MJ775	OCDF	6.9E-03		6.9E-03					
MJ775	Total HpCDD	5.5E-02		5.5E-02					
MJ775	Total HpCDF	1.1E-02		1.1E-02					
MJ775	Total HxCDD	6.0E-03		6.0E-03					
MJ775	Total HxCDF	3.9E-03	J	3.9E-03					
MJ775	Total PeCDD	4.7E-04		4.7E-04					
MJ775	Total PeCDF	6.6E-04	J	6.6E-04					
MJ775	Total TCDD	8.0E-05		8.0E-05					
MJ775	Total TCDF	1.9E-04		1.9E-04					
MJ724	1,2,3,4,6,7,8-HpCDD	1.1E-02		1.1E-02	1.5E-05	8.0E-05	1.2E-03	1.4E-02	1.3E-01
MJ724	1,2,3,4,6,7,8-HpCDF	2.2E-03		2.2E-03					
MJ724	1,2,3,4,7,8,9-HpCDF	2.1E-04		2.1E-04					
MJ724	1,2,3,4,7,8-HxCDD	1.3E-04		1.3E-04					
MJ724	1,2,3,4,7,8-HxCDF	8.0E-05		8.0E-05					
MJ724	1,2,3,6,7,8-HxCDD	5.9E-04		5.9E-04					
MJ724	1,2,3,6,7,8-HxCDF	6.0E-05	J	6.0E-05					
MJ724	1,2,3,7,8,9-HxCDD	1.8E-04		1.8E-04					
MJ724	1,2,3,7,8,9-HxCDF	2.0E-05		2.0E-05					
MJ724	1,2,3,7,8-PeCDD	5.0E-05		5.0E-05					
MJ724	1,2,3,7,8-PeCDF	1.0E-05		1.0E-05					
MJ724	2,3,4,6,7,8-HxCDF	1.4E-04		1.4E-04					
MJ724	2,3,4,7,8-PeCDF	2.0E-05		2.0E-05					
MJ724	2,3,7,8-TCDD	1.0E-05		1.0E-05					
MJ724	2,3,7,8-TCDF	4.9E-06		4.9E-06					
MJ724	OCDD	1.2E-01		1.2E-01					
MJ724	OCDF	5.3E-03		5.3E-03					
MJ724	Total HpCDD	2.0E-02		2.0E-02					
MJ724	Total HpCDF	1.1E-02		1.1E-02					
MJ724	Total HxCDD	2.9E-03		2.9E-03					
MJ724	Total HxCDF	4.2E-03	J	4.2E-03					
MJ724	Total PeCDD	2.9E-04		2.9E-04					
MJ724	Total PeCDF	6.2E-04	J	6.2E-04					
MJ724	Total TCDD	4.0E-05		4.0E-05					
MJ724	Total TCDF	1.5E-04		1.5E-04					
MJ725	1,2,3,4,6,7,8-HpCDD	2.0E-04		2.0E-04	5.1E-07	1.0E-06	1.7E-05	2.3E-04	2.4E-03
MJ725	1,2,3,4,6,7,8-HpCDF	3.0E-05		3.0E-05					
MJ725	1,2,3,4,7,8,9-HpCDF	2.1E-06	J	2.1E-06					
MJ725	1,2,3,4,7,8-HxCDD	1.4E-06	J	1.4E-06					
MJ725	1,2,3,4,7,8-HxCDF	7.7E-07	J	7.7E-07					
MJ725	1,2,3,6,7,8-HxCDD	1.0E-05		1.0E-05					
MJ725	1,2,3,6,7,8-HxCDF	6.4E-07	J	6.4E-07					
MJ725	1,2,3,7,8,9-HxCDD	2.8E-06		2.8E-06					
MJ725	1,2,3,7,8,9-HxCDF	2.3E-07	J	2.3E-07					
MJ725	1,2,3,7,8-PeCDD	5.9E-07	J	5.9E-07					
MJ725	1,2,3,7,8-PeCDF	1.0E-07	J	1.0E-07					
MJ725	2,3,4,6,7,8-HxCDF	1.2E-06	J	1.2E-06					
MJ725	2,3,4,7,8-PeCDF	3.5E-07	J	3.5E-07					
MJ725	2,3,7,8-TCDD	2.7E-07	J	2.7E-07					
MJ725	2,3,7,8-TCDF	2.4E-07	J	2.4E-07					
MJ725	OCDD	2.3E-03		2.3E-03					

PCDD/PCDF Congener Group Summation for Soil/Sediment (0-2 feet bgs)
New Conservation Yard RFI Site

EPA ID	PCDD/PCDF Congener	Measured Concentration [a] (mg/kg)	Data Qualifier	Adjusted Concentration [b] (mg/kg)	Sum of PCDD/PCDF Congener Concentrations				
					Total Tetra (mg/kg)	Total Penta (mg/kg)	Total Hexa (mg/kg)	Total Hepta (mg/kg)	Total Octa (mg/kg)
MJ725	OCDF	8.0E-05		8.0E-05					
MJ725	Total HpCDD	3.9E-04		3.9E-04					
MJ725	Total HpCDF	1.1E-04		1.1E-04					
MJ725	Total HxCDD	4.0E-05		4.0E-05					
MJ725	Total HxCDF	4.0E-05	J	4.0E-05					
MJ725	Total PeCDD	3.3E-06		3.3E-06					
MJ725	Total PeCDF	1.0E-05		1.0E-05					
MJ725	Total TCDD	5.7E-07		5.7E-07					
MJ725	Total TCDF	3.2E-06		3.2E-06					
MJ726	1,2,3,4,6,7,8-HpCDD	2.2E-02		2.2E-02	3.0E-05	1.2E-04	2.2E-03	2.8E-02	3.1E-01
MJ726	1,2,3,4,6,7,8-HpCDF	5.7E-03	J	5.7E-03					
MJ726	1,2,3,4,7,8,9-HpCDF	4.9E-04		4.9E-04					
MJ726	1,2,3,4,7,8-HxCDD	1.7E-04		1.7E-04					
MJ726	1,2,3,4,7,8-HxCDF	1.5E-04		1.5E-04					
MJ726	1,2,3,6,7,8-HxCDD	1.2E-03		1.2E-03					
MJ726	1,2,3,6,7,8-HxCDF	1.1E-04	J	1.1E-04					
MJ726	1,2,3,7,8,9-HxCDD	2.9E-04		2.9E-04					
MJ726	1,2,3,7,8,9-HxCDF	3.0E-05		3.0E-05					
MJ726	1,2,3,7,8-PeCDD	8.0E-05		8.0E-05					
MJ726	1,2,3,7,8-PeCDF	1.0E-05		1.0E-05					
MJ726	2,3,4,6,7,8-HxCDF	2.8E-04		2.8E-04					
MJ726	2,3,4,7,8-PeCDF	3.0E-05		3.0E-05					
MJ726	2,3,7,8-TCDD	2.0E-05		2.0E-05					
MJ726	2,3,7,8-TCDF	1.0E-05	J	1.0E-05					
MJ726	OCDD	3.0E-01		3.0E-01					
MJ726	OCDF	1.5E-02		1.5E-02					
MJ726	Total HpCDD	3.7E-02		3.7E-02					
MJ726	Total HpCDF	2.7E-02	J	2.7E-02					
MJ726	Total HxCDD	5.8E-03		5.8E-03					
MJ726	Total HxCDF	1.1E-02	J	1.1E-02					
MJ726	Total PeCDD	3.9E-04		3.9E-04					
MJ726	Total PeCDF	1.4E-03	J	1.4E-03					
MJ726	Total TCDD	4.0E-05		4.0E-05					
MJ726	Total TCDF	1.7E-04	J	1.7E-04					
MJ729	1,2,3,4,6,7,8-HpCDD	4.5E-03		4.5E-03	1.1E-05	1.5E-05	3.2E-04	5.1E-03	5.4E-02
MJ729	1,2,3,4,6,7,8-HpCDF	5.4E-04		5.4E-04					
MJ729	1,2,3,4,7,8,9-HpCDF	5.0E-05		5.0E-05					
MJ729	1,2,3,4,7,8-HxCDD	3.0E-05		3.0E-05					
MJ729	1,2,3,4,7,8-HxCDF	2.0E-05		2.0E-05					
MJ729	1,2,3,6,7,8-HxCDD	1.6E-04		1.6E-04					
MJ729	1,2,3,6,7,8-HxCDF	1.0E-05		1.0E-05					
MJ729	1,2,3,7,8,9-HxCDD	7.0E-05		7.0E-05					
MJ729	1,2,3,7,8,9-HxCDF	3.5E-06		3.5E-06					
MJ729	1,2,3,7,8-PeCDD	1.0E-05		1.0E-05					
MJ729	1,2,3,7,8-PeCDF	1.4E-06	J	1.4E-06					
MJ729	2,3,4,6,7,8-HxCDF	3.0E-05		3.0E-05					
MJ729	2,3,4,7,8-PeCDF	3.9E-06		3.9E-06					
MJ729	2,3,7,8-TCDD	1.0E-05		1.0E-05					
MJ729	2,3,7,8-TCDF	1.0E-06		1.0E-06					
MJ729	OCDD	5.3E-02		5.3E-02					
MJ729	OCDF	1.5E-03		1.5E-03					
MJ729	Total HpCDD	8.2E-03		8.2E-03					
MJ729	Total HpCDF	2.6E-03		2.6E-03					
MJ729	Total HxCDD	8.5E-04		8.5E-04					

PCDD/PCDF Congener Group Summation for Soil/Sediment (0-2 feet bgs)
New Conservation Yard RFI Site

EPA ID	PCDD/PCDF Congener	Measured Concentration [a] (mg/kg)	Data Qualifier	Adjusted Concentration [b] (mg/kg)	Sum of PCDD/PCDF Congener Concentrations				
					Total Tetra (mg/kg)	Total Penta (mg/kg)	Total Hexa (mg/kg)	Total Hepta (mg/kg)	Total Octa (mg/kg)
MJ729	Total HxCDF	8.4E-04	J	8.4E-04					
MJ729	Total PeCDD	6.0E-05		6.0E-05					
MJ729	Total PeCDF	1.0E-04		1.0E-04					
MJ729	Total TCDD	1.0E-05		1.0E-05					
MJ729	Total TCDF	3.0E-05		3.0E-05					
MJ730	1,2,3,4,6,7,8-HpCDD	9.2E-04		9.2E-04	9.6E-07	3.6E-06	6.7E-05	1.1E-03	1.1E-02
MJ730	1,2,3,4,6,7,8-HpCDF	1.4E-04		1.4E-04					
MJ730	1,2,3,4,7,8,9-HpCDF	1.0E-05		1.0E-05					
MJ730	1,2,3,4,7,8-HxCDD	1.0E-05		1.0E-05					
MJ730	1,2,3,4,7,8-HxCDF	3.5E-06		3.5E-06					
MJ730	1,2,3,6,7,8-HxCDD	3.0E-05		3.0E-05					
MJ730	1,2,3,6,7,8-HxCDF	2.9E-06		2.9E-06					
MJ730	1,2,3,7,8,9-HxCDD	1.0E-05		1.0E-05					
MJ730	1,2,3,7,8,9-HxCDF	9.6E-07	J	9.6E-07					
MJ730	1,2,3,7,8-PeCDD	2.3E-06	J	2.3E-06					
MJ730	1,2,3,7,8-PeCDF	3.8E-07	J	3.8E-07					
MJ730	2,3,4,6,7,8-HxCDF	1.0E-05		1.0E-05					
MJ730	2,3,4,7,8-PeCDF	9.5E-07	J	9.5E-07					
MJ730	2,3,7,8-TCDD	6.0E-07		6.0E-07					
MJ730	2,3,7,8-TCDF	3.6E-07	J	3.6E-07					
MJ730	OCDD	1.1E-02		1.1E-02					
MJ730	OCDF	3.8E-04		3.8E-04					
MJ730	Total HpCDD	1.6E-03		1.6E-03					
MJ730	Total HpCDF	6.3E-04		6.3E-04					
MJ730	Total HxCDD	1.5E-04		1.5E-04					
MJ730	Total HxCDF	1.9E-04	J	1.9E-04					
MJ730	Total PeCDD	1.0E-05		1.0E-05					
MJ730	Total PeCDF	2.0E-05		2.0E-05					
MJ730	Total TCDD	1.1E-06		1.1E-06					
MJ730	Total TCDF	1.0E-05		1.0E-05					
MJ732	1,2,3,4,6,7,8-HpCDD	4.1E-04		4.1E-04	6.3E-07	1.9E-06	2.9E-05	4.5E-04	4.7E-03
MJ732	1,2,3,4,6,7,8-HpCDF	4.0E-05		4.0E-05					
MJ732	1,2,3,4,7,8,9-HpCDF	4.3E-06		4.3E-06					
MJ732	1,2,3,4,7,8-HxCDD	3.0E-06		3.0E-06					
MJ732	1,2,3,4,7,8-HxCDF	1.5E-06	J	1.5E-06					
MJ732	1,2,3,6,7,8-HxCDD	1.0E-05		1.0E-05					
MJ732	1,2,3,6,7,8-HxCDF	1.4E-06	J	1.4E-06					
MJ732	1,2,3,7,8,9-HxCDD	1.0E-05		1.0E-05					
MJ732	1,2,3,7,8,9-HxCDF	4.3E-07	J	4.3E-07					
MJ732	1,2,3,7,8-PeCDD	1.1E-06	J	1.1E-06					
MJ732	1,2,3,7,8-PeCDF	1.9E-07	J	1.9E-07					
MJ732	2,3,4,6,7,8-HxCDF	2.8E-06		2.8E-06					
MJ732	2,3,4,7,8-PeCDF	5.7E-07	J	5.7E-07					
MJ732	2,3,7,8-TCDD	3.9E-07	J	3.9E-07					
MJ732	2,3,7,8-TCDF	2.5E-07	J	2.5E-07					
MJ732	OCDD	4.6E-03		4.6E-03					
MJ732	OCDF	1.0E-04		1.0E-04					
MJ732	Total HpCDD	7.9E-04		7.9E-04					
MJ732	Total HpCDF	1.7E-04		1.7E-04					
MJ732	Total HxCDD	9.0E-05		9.0E-05					
MJ732	Total HxCDF	7.0E-05	J	7.0E-05					
MJ732	Total PeCDD	1.0E-05		1.0E-05					
MJ732	Total PeCDF	1.0E-05		1.0E-05					
MJ732	Total TCDD	7.5E-07		7.5E-07					

PCDD/PCDF Congener Group Summation for Soil/Sediment (0-2 feet bgs)
New Conservation Yard RFI Site

EPA ID	PCDD/PCDF Congener	Measured Concentration [a] (mg/kg)	Data Qualifier	Adjusted Concentration [b] (mg/kg)	Sum of PCDD/PCDF Congener Concentrations Total Tetra (mg/kg)	Total Penta (mg/kg)	Total Hexa (mg/kg)	Total Hepta (mg/kg)	Total Octa (mg/kg)
MJ732	Total TCDF	3.5E-06		3.5E-06					
MJ620	1,2,3,4,6,7,8-HpCDD	1.9E-03		1.9E-03	3.9E-06	1.4E-05	1.8E-04	2.2E-03	2.1E-02
MJ620	1,2,3,4,6,7,8-HpCDF	3.0E-04		3.0E-04					
MJ620	1,2,3,4,7,8,9-HpCDF	3.0E-05		3.0E-05					
MJ620	1,2,3,4,7,8-HxCDD	2.0E-05		2.0E-05					
MJ620	1,2,3,4,7,8-HxCDF	1.0E-05		1.0E-05					
MJ620	1,2,3,6,7,8-HxCDD	9.0E-05		9.0E-05					
MJ620	1,2,3,6,7,8-HxCDF	1.0E-05		1.0E-05					
MJ620	1,2,3,7,8,9-HxCDD	3.0E-05		3.0E-05					
MJ620	1,2,3,7,8,9-HxCDF	2.2E-06	J	2.2E-06					
MJ620	1,2,3,7,8-PeCDD	1.0E-05		1.0E-05					
MJ620	1,2,3,7,8-PeCDF	1.3E-06	J	1.3E-06					
MJ620	2,3,4,6,7,8-HxCDF	2.0E-05		2.0E-05					
MJ620	2,3,4,7,8-PeCDF	2.9E-06		2.9E-06					
MJ620	2,3,7,8-TCDD	2.8E-06		2.8E-06					
MJ620	2,3,7,8-TCDF	1.1E-06		1.1E-06					
MJ620	OCDD	2.0E-02		2.0E-02					
MJ620	OCDF	7.4E-04		7.4E-04					
MJ620	Total HpCDD	3.5E-03		3.5E-03					
MJ620	Total HpCDF	1.4E-03		1.4E-03					
MJ620	Total HxCDD	4.8E-04		4.8E-04					
MJ620	Total HxCDF	5.8E-04		5.8E-04					
MJ620	Total PeCDD	6.0E-05		6.0E-05					
MJ620	Total PeCDF	1.0E-04		1.0E-04					
MJ620	Total TCDD	1.0E-05		1.0E-05					
MJ620	Total TCDF	2.0E-05		2.0E-05					
MJ619	1,2,3,4,6,7,8-HpCDD	2.4E-03		2.4E-03	5.1E-06	1.6E-05	2.0E-04	2.8E-03	2.9E-02
MJ619	1,2,3,4,6,7,8-HpCDF	3.8E-04		3.8E-04					
MJ619	1,2,3,4,7,8,9-HpCDF	4.0E-05		4.0E-05					
MJ619	1,2,3,4,7,8-HxCDD	2.0E-05		2.0E-05					
MJ619	1,2,3,4,7,8-HxCDF	1.0E-05		1.0E-05					
MJ619	1,2,3,6,7,8-HxCDD	1.0E-04		1.0E-04					
MJ619	1,2,3,6,7,8-HxCDF	1.0E-05		1.0E-05					
MJ619	1,2,3,7,8,9-HxCDD	4.0E-05		4.0E-05					
MJ619	1,2,3,7,8,9-HxCDF	2.6E-06		2.6E-06					
MJ619	1,2,3,7,8-PeCDD	1.0E-05		1.0E-05					
MJ619	1,2,3,7,8-PeCDF	1.5E-06	J	1.5E-06					
MJ619	2,3,4,6,7,8-HxCDF	2.0E-05		2.0E-05					
MJ619	2,3,4,7,8-PeCDF	4.4E-06		4.4E-06					
MJ619	2,3,7,8-TCDD	2.9E-06		2.9E-06					
MJ619	2,3,7,8-TCDF	2.2E-06		2.2E-06					
MJ619	OCDD	2.8E-02		2.8E-02					
MJ619	OCDF	1.0E-03		1.0E-03					
MJ619	Total HpCDD	4.4E-03		4.4E-03					
MJ619	Total HpCDF	1.7E-03		1.7E-03					
MJ619	Total HxCDD	5.5E-04		5.5E-04					
MJ619	Total HxCDF	6.8E-04		6.8E-04					
MJ619	Total PeCDD	5.0E-05		5.0E-05					
MJ619	Total PeCDF	1.1E-04		1.1E-04					
MJ619	Total TCDD	1.0E-05		1.0E-05					
MJ619	Total TCDF	3.0E-05		3.0E-05					
MJ621	1,2,3,4,6,7,8-HpCDD	4.6E-04		4.6E-04	1.5E-06	3.9E-06	5.7E-05	5.5E-04	5.4E-03
MJ621	1,2,3,4,6,7,8-HpCDF	8.0E-05		8.0E-05					
MJ621	1,2,3,4,7,8,9-HpCDF	1.0E-05		1.0E-05					

PCDD/PCDF Congener Group Summation for Soil/Sediment (0-2 feet bgs)
New Conservation Yard RFI Site

EPA ID	PCDD/PCDF Congener	Measured Concentration [a] (mg/kg)	Data Qualifier	Adjusted Concentration [b] (mg/kg)	Sum of PCDD/PCDF Congener Concentrations Total Tetra (mg/kg)	Total Penta (mg/kg)	Total Hexa (mg/kg)	Total Hepta (mg/kg)	Total Octa (mg/kg)
MJ621	1,2,3,4,7,8-HxCDD	1.0E-05		1.0E-05					
MJ621	1,2,3,4,7,8-HxCDF	3.6E-06		3.6E-06					
MJ621	1,2,3,6,7,8-HxCDD	2.0E-05		2.0E-05					
MJ621	1,2,3,6,7,8-HxCDF	2.6E-06		2.6E-06					
MJ621	1,2,3,7,8,9-HxCDD	1.0E-05		1.0E-05					
MJ621	1,2,3,7,8,9-HxCDF	6.6E-07	J	6.6E-07					
MJ621	1,2,3,7,8-PeCDD	2.2E-06	J	2.2E-06					
MJ621	1,2,3,7,8-PeCDF	4.6E-07	J	4.6E-07					
MJ621	2,3,4,6,7,8-HxCDF	1.0E-05		1.0E-05					
MJ621	2,3,4,7,8-PeCDF	1.3E-06	J	1.3E-06					
MJ621	2,3,7,8-TCDD	5.4E-07		5.4E-07					
MJ621	2,3,7,8-TCDF	9.8E-07	J	9.8E-07					
MJ621	OCDD	5.2E-03		5.2E-03					
MJ621	OCDF	2.3E-04		2.3E-04					
MJ621	Total HpCDD	8.9E-04		8.9E-04					
MJ621	Total HpCDF	3.3E-04		3.3E-04					
MJ621	Total HxCDD	1.1E-04		1.1E-04					
MJ621	Total HxCDF	1.4E-04		1.4E-04					
MJ621	Total PeCDD	1.0E-05		1.0E-05					
MJ621	Total PeCDF	2.0E-05		2.0E-05					
MJ621	Total TCDD	7.6E-07		7.6E-07					
MJ621	Total TCDF	1.0E-05		1.0E-05					
				MAX	4.5E-05	1.3E-04	2.2E-03	2.9E-02	3.1E-01

Maximum of Total Summed Congener Concentrations

Total Tetra	4.5E-05
Total Penta	1.3E-04
Total Hexa	2.2E-03
Total Hepta	2.9E-02
Total Octa	3.1E-01

Notes:

a. Measured concentration - concentration reported by the analytial laboratory

b. Adjusted concentration - concentration reported by the analytical laboratory if the chemical was detected, or estimated at one-half the sample quantitation limit (SQL) if not detected.

PCDD/PCDF - polychlorinated dibenzo-p-dioxins and dibenzofurans

Total Tetra - sum of the 2,3,7,8-substituted tetraclorinated dibenzo-p-dioxin and dibenzofuran congeners.

Total Penta - sum of the 2,3,7,8-substituted pentaclorinated dibenzo-p-dioxin and dibenzofuran congeners.

Total Hexa - sum of the 2,3,7,8-substituted hexaclorinated dibenzo-p-dioxin and dibenzofuran congeners.

Total Hepta - sum of the 2,3,7,8-substituted heptaclorinated dibenzo-p-dioxin and dibenzofuran congeners.

Total Octa - sum of the 2,3,7,8-substituted Octaclorinated dibenzo-p-dioxin and dibenzofuran congeners.

J - concentration estimated

U - not detected. Concentration shown is the SQL.

UJ - not detected. Concentration shown is the estimated SQL.

mg/kg - milligrams per kilogram

bgs- below ground surface

Comparison of Inorganic Compound Concentrations in Soil/Sediment (0-6 feet bgs) Against Background
New Conservation Yard RFI Site

PCDD/PCDF Congener Groups	Maximum Background (mg/kg)	Maximum RFI Site (mg/kg)	Results of Wilcoxon-Rank Sum Test	RFI Site Ever Detected?	RFI Site Exceeds Background?
Total Tetra	9.5E-07	4.5E-05	Yes	Yes	Yes
Total Penta	8.7E-07	1.3E-04	Yes	Yes	Yes
Total Hexa	5.1E-06	2.2E-03	Yes	Yes	Yes
Total Hepta	1.6E-05	2.9E-02	Yes	Yes	Yes
Total Octa	1.5E-04	3.1E-01	Yes	Yes	Yes

Inorganic Compounds	Maximum Background [a] (mg/kg)	Maximum RFI Site (mg/kg)	Results of Wilcoxon-Rank Sum Test	RFI Site Ever Detected?	RFI Site Exceeds Background?
Aluminum	2.0E+04	1.4E+04	No	Yes	No [b]
Antimony	8.7E+00	<12	No	No	No
Arsenic	1.5E+01	9.0E+00	No	Yes	No [b]
Barium	1.4E+02	1.0E+03	No	Yes	No [b]
Beryllium	1.1E+00	7.0E-01	No	Yes	No [b]
Boron	9.7E+00	0.0E+00	No	No	No
Cadmium	1.0E+00	2.0E+01	Yes	Yes	Yes
Chromium	3.7E+01	7.2E+01	No	Yes	No [b]
Hexavalent chromium		<2.2	No	No	No
Cobalt	2.1E+01	1.4E+01	No	Yes	No [b]
Copper	2.9E+01	2.0E+02	No	Yes	No [b]
Lead	3.4E+01	1.0E+02	No	Yes	No [b]
Mercury	9.0E-02	1.0E+00	No	Yes	No [b]
Molybdenum	5.3E+00	<12	No	No	No
Nickel	2.9E+01	1.3E+02	No	Yes	No [b]
Selenium	6.6E-01	<6	No	No	No
Silver	7.9E-01	1.5E+02	Yes	Yes	Yes
Thallium	4.6E-01	3.4E-01	No	Yes	No [b]
Vanadium	6.2E+01	3.8E+01	No	Yes	No [b]
Zinc	1.1E+02	3.4E+03	Yes	Yes	Yes

Notes:

a. The concentrations of inorganic compounds for which soil background data are not available are considered to be above background concentrations if they are detected and are potentially site-related.

b. Determined be within the range of background since the RFI site sample population for soils at 0 to 4 feet bgs was found to be no different than the background sample population at p=0.01 based on the Wilcoxon Rank Sum Test.

b. Determined be within the range of background since the RFI site sample population for soils at 0 to 6 feet bgs was found to be no different than the background sample population at p=0.01 based on the Wilcoxon Rank Sum Test.

mg/kg - milligrams per kilogram

bgs- below ground surface

Comparison of Inorganic Compound Concentrations in Soil/Sediment (0-4 feet bgs) Against Background
New Conservation Yard RFI Site

PCDD/PCDF Congener Groups	Maximum Background (mg/kg)	Maximum RFI Site (mg/kg)	Results of Wilcoxon-Rank Sum Test	RFI Site Ever Detected?	RFI Site Exceeds Background?
Total Tetra	9.5E-07	4.5E-05	Yes	Yes	Yes
Total Penta	8.7E-07	1.3E-04	Yes	Yes	Yes
Total Hexa	5.1E-06	2.2E-03	Yes	Yes	Yes
Total Hepta	1.6E-05	2.9E-02	Yes	Yes	Yes
Total Octa	1.5E-04	3.1E-01	Yes	Yes	Yes

Inorganic Compounds	Maximum Background [a] (mg/kg)	Maximum RFI Site (mg/kg)	Results of Wilcoxon-Rank Sum Test	RFI Site Ever Detected?	RFI Site Exceeds Background?
Aluminum	2.0E+04	1.4E+04	No	Yes	No [b]
Antimony	8.7E+00	<12	No	No	No
Arsenic	1.5E+01	9.0E+00	No	Yes	No [b]
Barium	1.4E+02	1.0E+03	No	Yes	No [b]
Beryllium	1.1E+00	7.0E-01	No	Yes	No [b]
Boron	9.7E+00	0.0E+00	No	No	No
Cadmium	1.0E+00	2.0E+01	Yes	Yes	Yes
Chromium	3.7E+01	7.2E+01	No	Yes	No [b]
Hexavalent chromium		<2.2	No	No	No
Cobalt	2.1E+01	1.4E+01	No	Yes	No [b]
Copper	2.9E+01	2.0E+02	No	Yes	No [b]
Lead	3.4E+01	1.0E+02	No	Yes	No [b]
Mercury	9.0E-02	1.0E+00	No	Yes	No [b]
Molybdenum	5.3E+00	<12	No	No	No
Nickel	2.9E+01	1.3E+02	No	Yes	No [b]
Selenium	6.6E-01	<6	No	No	No
Silver	7.9E-01	1.5E+02	Yes	Yes	Yes
Thallium	4.6E-01	3.4E-01	No	Yes	No [b]
Vanadium	6.2E+01	3.8E+01	No	Yes	No [b]
Zinc	1.1E+02	3.4E+03	Yes	Yes	Yes

Notes:

a. The concentrations of inorganic compounds for which soil background data are not available are considered to be above background concentrations if they are detected and are potentially site-related.

b. Determined be within the range of background since the RFI site sample population for soils at 0 to 4 feet bgs was found to be no different than the background sample population at p=0.01 based on the Wilcoxon Rank Sum Test.

PCDD/PCDF - polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.

Total Tetra - sum of the 2,3,7,8-substituted tetrachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations.

Total Penta - sum of the 2,3,7,8-substituted pentachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations.

Total Hexa - sum of the 2,3,7,8-substituted hexachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations.

Total Hepta - sum of the 2,3,7,8-substituted heptachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations.

Total Octa - sum of the octachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations.

mg/kg - milligrams per kilogram

bgs- below ground surface

Comparison of Inorganic Compound and PCDD/PCDF Concentrations in Soil/Sediment (0-2 feet bgs) Against Background
New Conservation Yard RFI Site

PCDD/PCDF Congener Groups	Maximum Background (mg/kg)	Maximum RFI Site (mg/kg)	Results of Wilcoxon Rank Sum Test	RFI Site Ever Detected?	RFI Site Exceeds Background?
Total Tetra	9.5E-07	4.5E-05	Yes	Yes	Yes
Total Penta	8.7E-07	1.3E-04	Yes	Yes	Yes
Total Hexa	5.1E-06	2.2E-03	Yes	Yes	Yes
Total Hepta	1.6E-05	2.9E-02	Yes	Yes	Yes
Total Octa	1.5E-04	3.1E-01	Yes	Yes	Yes

Inorganic Compounds	Maximum Background [a] (mg/kg)	Maximum RFI Site (mg/kg)	Results of Wilcoxon Rank Sum Test	RFI Site Ever Detected?	RFI Site Exceeds Background?
Aluminum	2.0E+04	1.4E+04	Yes	Yes	No [b]
Antimony	8.7E+00	<12	Yes	No	No
Arsenic	1.5E+01	9.0E+00	Yes	Yes	No [b]
Barium	1.4E+02	1.0E+03	Yes	Yes	No [b]
Beryllium	1.1E+00	7.0E-01	Yes	Yes	No [b]
Boron	9.7E+00	0.0E+00	Yes	No	No
Cadmium	1.0E+00	2.0E+01	Yes	Yes	Yes
Chromium	3.7E+01	7.2E+01	Yes	Yes	No [b]
Hexavalent chromium		<2.2	Yes	No	No
Cobalt	2.1E+01	1.4E+01	Yes	Yes	No [b]
Copper	2.9E+01	2.0E+02	Yes	Yes	No [b]
Lead	3.4E+01	1.0E+02	Yes	Yes	No [b]
Mercury	9.0E-02	1.0E+00	Yes	Yes	No [b]
Molybdenum	5.3E+00	<12	Yes	No	No
Nickel	2.9E+01	1.3E+02	Yes	Yes	No [b]
Selenium	6.6E-01	<6	Yes	No	No
Silver	7.9E-01	1.5E+02	Yes	Yes	Yes
Thallium	4.6E-01	3.4E-01	Yes	Yes	No [b]
Vanadium	6.2E+01	3.8E+01	Yes	Yes	No [b]
Zinc	1.1E+02	3.4E+03	Yes	Yes	Yes

Notes:

a. The concentrations of inorganic compounds for which soil background data are not available are considered to be above background concentrations if they are detected and are potentially site-related.

b. Determined be within the range of background since the RFI site sample population for soils at 0 to 2 feet bgs was found to be no different than the background sample population at p=0.05 based on the Wilcoxon Rank Sum Test.

PCDD/PCDF - polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.

Total Tetra - sum of the 2,3,7,8-substituted tetrachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations.

Total Penta - sum of the 2,3,7,8-substituted pentachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations.

Total Hexa - sum of the 2,3,7,8-substituted hexachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations.

Total Hepta - sum of the 2,3,7,8-substituted heptachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations.

Total Octa - sum of the octachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations.

mg/kg - milligrams per kilogram

bgs- below ground surface

Comparison of Sample Quantitation Limits in Soil/Sediment (0-6 feet bgs) Against Ecological Screening Levels
New Conservation Yard RFI Site

Chemical	Number of Samples	Percent Frequency of Detection	Frequency of Detection Between 0% and 5% ?	Minimum SQL for Chemicals Never Detected or Detected at Frequency of < 5% (mg/kg)	Maximum SQL for Chemicals Never Detected or Detected at Frequency of < 5% (mg/kg)	Lowest ESL (mg/kg)	Percentage of SQLs Exceeding ESL	Greater than 50% of SQLs Exceeds ESL ?
Inorganic Compounds								
Aluminum	7	100	No			1.2E+01	0	No
Antimony	11	0	Yes	1.0E+01	1.2E+01	9.5E-02	100	Yes
Arsenic	18	44	No			1.9E+00	100	Yes
Barium	21	100	No			1.5E+01	0	No
Beryllium	18	56	No			5.1E+00	0	No
Boron	7	0	Yes	5.6E+00	7.6E+00	9.2E+00	0	No
Cadmium	18	56	No			2.1E-02	100	Yes
Chromium	18	100	No			9.3E+02	0	No
Hexavalent chromium	1	0	Yes	2.2E+00	2.2E+00	2.0E-01	100	Yes
Cobalt	18	100	No			9.0E+00	0	No
Copper	18	100	No			1.1E+00	0	No
Lead	25	100	No			6.3E-02	0	No
Mercury	19	26	No			1.0E-01	79	Yes
Molybdenum	18	0	Yes	3.3E-01	1.2E+01	1.1E-01	100	Yes
Nickel	18	94	No			1.0E-01	100	Yes
Selenium	18	0	Yes	2.1E-01	6.0E+00	1.7E-01	100	Yes
Silver	25	60	No			5.4E-01	72	Yes
Thallium	18	39	No			2.9E+00	100	Yes
Vanadium	18	100	No			1.5E+00	0	No
Zinc	22	100	No			2.1E+01	0	No
VOCs								
1,1,1-Trichloroethane	6	0	Yes	5.0E-02	5.0E-02	4.3E+03	0	No
1,1,2,2-Tetrachloroethane	6	0	Yes	5.0E-02	5.0E-02	6.0E+00	0	No
1,1,2-Trichloroethane	6	0	Yes	5.0E-02	5.0E-02	8.3E+00	0	No
1,1-Dichloroethane	6	0	Yes	5.0E-02	5.0E-02	2.1E+02	0	No
1,1-Dichloroethene	6	0	Yes	5.0E-02	5.0E-02	2.9E-01	0	No
1,2,4-Trichlorobenzene	6	0	Yes	1.7E-01	1.7E-01	2.0E+01	0	No
1,2-Dichlorobenzene	6	0	Yes	1.7E-01	1.7E-01	3.7E+02	0	No
1,2-Dichloroethane	6	0	Yes	5.0E-02	5.0E-02	7.6E+01	0	No
1,2-Dichloropropane	6	0	Yes	5.0E-02	5.0E-02	2.5E+01	0	No
1,3-Dichlorobenzene	6	0	Yes	1.7E-01	1.7E-01	3.2E+02	0	No
1,4-Dichlorobenzene	6	0	Yes	1.7E-01	1.7E-01	2.0E+01	0	No
2-Butanone	6	0	Yes	5.0E-01	5.0E-01	7.6E+03	0	No
2-Chloroethylvinylether	6	0	Yes	5.0E-01	5.0E-01	7.3E-01	0	No
2-Hexanone	6	0	Yes	5.0E-01	5.0E-01	2.4E+03	0	No
4-Methyl-2-pentanone	6	0	Yes	5.0E-01	5.0E-01	2.4E+03	0	No
Acetone	6	0	Yes	5.0E-01	5.0E-01	4.3E+01	0	No
Benzene	6	0	Yes	5.0E-02	5.0E-02	4.3E+00	0	No
Bromodichloromethane	6	0	Yes	5.0E-02	5.0E-02	1.5E+01	0	No
Bromoform	6	0	Yes	3.0E-01	3.0E-01	3.8E+01	0	No
Bromomethane	6	0	Yes	5.0E-01	5.0E-01	2.5E+01	0	No
Carbon disulfide	6	0	Yes	5.0E-02	5.0E-02	4.7E+01	0	No
Carbon tetrachloride	6	0	Yes	5.0E-02	5.0E-02	1.5E+00	0	No
Chlorobenzene	6	0	Yes	5.0E-02	5.0E-02	4.0E+01	0	No
Chloroethane	6	0	Yes	5.0E-02	5.0E-02	7.3E+01	0	No
Chloroform	6	0	Yes	5.0E-02	5.0E-02	2.4E-01	0	No
Chloromethane	6	0	Yes	5.0E-01	5.0E-01	2.5E+01	0	No
cis-1,3-Dichloropropene	6	0	Yes	5.0E-02	5.0E-02	2.2E+01	0	No

Comparison of Sample Quantitation Limits in Soil/Sediment (0-6 feet bgs) Against Ecological Screening Levels
New Conservation Yard RFI Site

Chemical	Number of Samples	Percent Frequency of Detection	Frequency of Detection Between 0% and 5% ?	Minimum SQL for Chemicals Never Detected or Detected at Frequency of < 5% (mg/kg)	Maximum SQL for Chemicals Never Detected or Detected at Frequency of < 5% (mg/kg)	Lowest ESL (mg/kg)	Percentage of SQLs Exceeding ESL	Greater than 50% of SQLs Exceeds ESL ?
Dibromochloromethane	6	0	Yes	5.0E-02	5.0E-02	4.6E+01	0	No
Ethylbenzene	6	0	Yes	5.0E-02	5.0E-02	2.1E+02	0	No
Methylene chloride	6	0	Yes	3.0E-01	3.0E-01	2.5E+01	0	No
Styrene	6	0	Yes	5.0E-02	5.0E-02	6.4E+02	0	No
Tetrachloroethene	6	0	Yes	5.0E-02	5.0E-02	2.1E+00	0	No
Toluene	6	17	No			2.5E+00	0	No
trans-1,2-Dichloroethene	6	0	Yes	5.0E-02	5.0E-02	9.7E+02	0	No
trans-1,3-Dichloropropene	6	0	Yes	5.0E-02	5.0E-02	4.4E+00	0	No
Trichloroethene	6	0	Yes	5.0E-02	5.0E-02	3.0E+00	0	No
Vinyl acetate	6	0	Yes	5.0E-01	5.0E-01	5.0E+02	0	No
Vinyl chloride	6	0	Yes	5.0E-02	5.0E-02	7.3E-01	0	No
Xylenes (total)	6	0	Yes	5.0E-02	5.0E-02	1.3E+02	0	No
SVOCs								
2,4,5-Trichlorophenol	6	0	Yes	8.5E-01	8.5E-01	9.0E+00	0	No
2,4,6-Trichlorophenol	6	0	Yes	1.7E-01	1.7E-01	1.0E+01	0	No
2,4-Dichlorophenol	6	0	Yes	1.7E-01	1.7E-01	1.3E+00	0	No
2,4-Dimethylphenol	6	0	Yes	1.7E-01	1.7E-01	1.1E+02	0	No
2,4-Dinitrophenol	6	0	Yes	8.5E-01	8.5E-01	5.9E-01	100	Yes
2,4-Dinitrotoluene	6	0	Yes	1.7E-01	1.7E-01	1.3E+00	0	No
2,6-Dinitrotoluene	6	0	Yes	1.7E-01	1.7E-01	2.5E+00	0	No
2-Chloronaphthalene	6	0	Yes	1.7E-01	1.7E-01	5.3E+02	0	No
2-Chlorophenol	6	0	Yes	1.7E-01	1.7E-01	2.1E+01	0	No
2-Methylnaphthalene	11	0	Yes	4.0E-03	1.7E-01	2.1E+02	0	No
2-Methylphenol	6	0	Yes	1.7E-01	1.7E-01	1.1E+02	0	No
2-Nitroaniline	6	0	Yes	8.5E-01	8.5E-01	2.3E+01	0	No
2-Nitrophenol	6	0	Yes	1.7E-01	1.7E-01	2.3E+01	0	No
4-Methylphenol	6	0	Yes	1.7E-01	1.7E-01	4.3E+00	0	No
3,3'-Dichlorobenzidine	6	0	Yes	3.4E-01	3.4E-01	1.3E+00	0	No
3-Nitroaniline	6	0	Yes	8.5E-01	8.5E-01	5.9E+00	0	No
4,6-Dinitro-2-methylphenol	6	0	Yes	8.5E-01	8.5E-01	2.3E+01	0	No
4-Bromophenyl phenyl ether	6	0	Yes	1.7E-01	1.7E-01	4.3E+00	0	No
4-Chloro-3-methylphenol	6	0	Yes	1.7E-01	1.7E-01	2.1E+01	0	No
4-Chloroaniline	6	0	Yes	1.7E-01	1.7E-01	4.4E+00	0	No
4-Chlorophenyl phenyl ether	6	0	Yes	1.7E-01	1.7E-01	1.3E+00	0	No
4-Nitroaniline	6	0	Yes	8.5E-01	8.5E-01	3.3E+00	0	No
4-Nitrophenol	6	0	Yes	8.5E-01	8.5E-01	7.0E+00	0	No
Acenaphthene	12	0	Yes	4.0E-03	1.7E-01	2.5E+00	0	No
Acenaphthylene	12	0	Yes	4.0E-03	1.7E-01	7.5E+02	0	No
Aniline	6	0	Yes	1.7E-01	1.7E-01	5.3E+01	0	No
Anthracene	12	0	Yes	4.0E-03	1.7E-01	2.4E+00	0	No
Benzidine	6	0	Yes	1.7E+00	1.7E+00	2.3E+00	0	No
Benzo(a)anthracene	12	8	No			1.4E+00	0	No
Benzo(a)pyrene	12	17	No			5.6E+00	0	No
Benzo(b)fluoranthene	12	17	No			4.4E+00	0	No
Benzo(g,h,i)perylene	12	17	No			6.4E+00	0	No
Benzo(k)fluoranthene	12	8	No			5.8E+00	0	No
Benzoic acid	6	0	Yes	8.5E-01	8.5E-01	4.4E+00	0	No
Benzyl alcohol	6	0	Yes	1.7E-01	1.7E-01	4.4E+00	0	No
bis(2-Chloroethoxy)methane	6	0	Yes	1.7E-01	1.7E-01	1.5E+02	0	No

Comparison of Sample Quantitation Limits in Soil/Sediment (0-6 feet bgs) Against Ecological Screening Levels
New Conservation Yard RFI Site

Chemical	Number of Samples	Percent Frequency of Detection	Frequency of Detection Between 0% and 5% ?	Minimum SQL for Chemicals Never Detected or Detected at Frequency of < 5% (mg/kg)	Maximum SQL for Chemicals Never Detected or Detected at Frequency of < 5% (mg/kg)	Lowest ESL (mg/kg)	Percentage of SQLs Exceeding ESL	Greater than 50% of SQLs Exceeds ESL ?
bis(2-Chloroethyl)ether	6	0	Yes	1.7E-01	1.7E-01	1.5E+02	0	No
bis(2-Chloroisopropyl) ether	6	0	Yes	1.7E-01	1.7E-01	1.5E+02	0	No
bis(2-Ethylhexyl)phthalate	7	0	Yes	1.0E-01	1.7E-01	4.9E+00	0	No
Butyl benzyl phthalate	6	0	Yes	1.7E-01	1.7E-01	3.4E+02	0	No
Chrysene	12	17	No			2.4E+00	0	No
Dibenz(a,h)anthracene	12	8	No			5.6E+00	0	No
Dibenzofuran	6	0	Yes	1.7E-01	1.7E-01	6.2E+01	0	No
Diethylphthalate	7	0	Yes	1.0E-01	1.7E-01	6.9E+03	0	No
Dimethyl phthalate	6	0	Yes	1.7E-01	1.7E-01	2.0E+02	0	No
Di-n-butylphthalate	7	0	Yes	1.0E-01	1.7E-01	4.9E-01	0	No
Di-n-octyl phthalate	6	0	Yes	1.7E-01	1.7E-01	1.5E+03	0	No
Fluoranthene	12	25	No			3.8E+01	0	No
Fluorene	12	0	Yes	4.0E-03	1.7E-01	1.6E+00	0	No
Hexachlorobenzene	6	0	Yes	1.7E-01	1.7E-01	3.4E-01	0	No
Hexachlorobutadiene	6	0	Yes	1.7E-01	1.7E-01	8.5E-01	0	No
Hexachlorocyclopentadiene	6	0	Yes	1.7E-01	1.7E-01	1.3E+01	0	No
Hexachloroethane	6	0	Yes	1.7E-01	1.7E-01	2.1E+00	0	No
Indeno(1,2,3-cd)pyrene	12	17	No			5.8E+00	0	No
Isophorone	6	0	Yes	1.7E-01	1.7E-01	4.8E+02	0	No
Naphthalene	12	0	Yes	4.0E-03	1.7E-01	2.1E+02	0	No
Nitrobenzene	6	0	Yes	1.7E-01	1.7E-01	2.0E+00	0	No
N-Nitrosodimethylamine	12	0	Yes	2.0E-03	1.7E-01	5.6E+01	0	No
N-Nitrosodi-n-propylamine	6	0	Yes	1.7E-01	1.7E-01	5.6E+01	0	No
N-Nitrosodiphenylamine	7	0	Yes	3.0E-02	1.7E-01	2.0E+01	0	No
Pentachlorophenol	6	0	Yes	8.5E-01	8.5E-01	6.0E+00	0	No
Phenanthrene	12	8	No			1.3E+00	0	No
Phenol	6	0	Yes	1.7E-01	1.7E-01	5.0E+00	0	No
Pyrene	12	25	No			1.8E+01	0	No
Total Petroleum Hydrocarbons								
PCDD/PCDFs								
2,3,7,8-TCDD	17	59	No			4.3E-06	0	No
1,2,3,7,8-PeCDD	17	76	No			4.4E-06	25	No
1,2,3,4,7,8-HxCDD	17	88	No			4.5E-05	0	No
1,2,3,6,7,8-HxCDD	17	94	No			1.1E-04	0	No
1,2,3,7,8,9-HxCDD	17	94	No			4.3E-05	0	No
1,2,3,4,6,7,8-HpCDD	17	100	No			9.6E-04	0	No
OCDD	17	100	No			1.2E-01	0	No
2,3,7,8-TCDF	17	82	No			4.4E-06	0	No
1,2,3,7,8-PeCDF	17	82	No			1.0E-04	0	No
2,3,4,7,8-PeCDF	17	94	No			9.8E-06	0	No
1,2,3,4,7,8-HxCDF	17	94	No			4.7E-05	0	No
1,2,3,6,7,8-HxCDF	17	82	No			5.4E-05	0	No
2,3,4,6,7,8-HxCDF	17	94	No			4.9E-05	0	No
1,2,3,7,8,9-HxCDF	17	88	No			4.3E-05	0	No
1,2,3,4,6,7,8-HpCDF	17	76	No			1.1E-03	25	No
1,2,3,4,7,8,9-HpCDF	17	94	No			4.3E-04	0	No
OCDF	17	100	No			9.7E-02	0	No
PCBs								
Aroclor-1016	4	0	Yes	1.9E-01	2.3E-01	5.9E+00	0	No

Comparison of Sample Quantitation Limits in Soil/Sediment (0-6 feet bgs) Against Ecological Screening Levels
New Conservation Yard RFI Site

Chemical	Number of Samples	Percent Frequency of Detection	Frequency of Detection Between 0% and 5% ?	Minimum SQL for Chemicals Never Detected or Detected at Frequency of < 5% (mg/kg)	Maximum SQL for Chemicals Never Detected or Detected at Frequency of < 5% (mg/kg)	Lowest ESL (mg/kg)	Percentage of SQLs Exceeding ESL	Greater than 50% of SQLs Exceeds ESL ?
Aroclor-1221	4	0	Yes	1.9E-01	2.3E-01	5.9E+00	0	No
Aroclor-1232	4	0	Yes	1.9E-01	2.3E-01	2.9E-01	0	No
Aroclor-1242	4	0	Yes	1.9E-01	2.3E-01	2.9E-01	0	No
Aroclor-1248	4	0	Yes	1.9E-01	2.3E-01	6.0E-02	100	Yes
Aroclor-1254	5	20	No			2.9E-01	0	No
Aroclor-1260	4	0	Yes	1.9E-01	2.3E-01	2.9E-01	0	No

Notes:
VOC - volatile organic chemicals
SVOC - semivolatile organic chemicals
PCBs - polychlorinated biphenyls
SQL - sample quantitation limit
ESL - ecological screening level
mg/kg - milligrams per kilogram
bgs- below ground surface

Comparison of Sample Quantitation Limits in Soil/Sediment (0-4 feet bgs) Against Ecological Screening Levels
New Conservation Yard RFI Site

Chemical	Number of Samples	Percent Frequency of Detection	Frequency of Detection Between 0% and 5% ?	Minimum SQL for Chemicals Never Detected or Detected at Frequency of < 5% (mg/kg)	Maximum SQL for Chemicals Never Detected or Detected at Frequency of < 5% (mg/kg)	Lowest ESL (mg/kg)	Percentage of SQLs Exceeding ESL	Greater than 50% of SQLs Exceeds ESL ?
Inorganic Compounds								
Aluminum	7	100	No			1.2E+01	0	No
Antimony	11	0	Yes	1.0E+01	1.2E+01	9.5E-02	100	Yes
Arsenic	18	44	No			1.9E+00	100	Yes
Barium	21	100	No			1.5E+01	0	No
Beryllium	18	56	No			5.1E+00	0	No
Boron	7	0	Yes	5.6E+00	7.6E+00	9.2E+00	0	No
Cadmium	18	56	No			2.1E-02	100	Yes
Chromium	18	100	No			9.3E+02	0	No
Hexavalent chromium	1	0	Yes	2.2E+00	2.2E+00	2.0E-01	100	Yes
Cobalt	18	100	No			9.0E+00	0	No
Copper	18	100	No			1.1E+00	0	No
Lead	25	100	No			6.3E-02	0	Yes
Mercury	19	26	No			1.0E-01	92	Yes
Molybdenum	18	0	Yes	3.3E-01	1.2E+01	1.1E-01	100	Yes
Nickel	18	94	No			1.0E-01	100	Yes
Selenium	18	0	Yes	2.1E-01	6.0E+00	1.7E-01	100	Yes
Silver	25	60	No			5.4E-01	60	Yes
Thallium	18	39	No			2.9E+00	100	Yes
Vanadium	18	100	No			1.5E+00	0	No
Zinc	22	100	No			2.1E+01	0	No
VOCs								
1,1,1-Trichloroethane	6	0	Yes	5.0E-02	5.0E-02	4.3E+03	0	No
1,1,2,2-Tetrachloroethane	6	0	Yes	5.0E-02	5.0E-02	6.0E+00	0	No
1,1,2-Trichloroethane	6	0	Yes	5.0E-02	5.0E-02	8.3E+00	0	No
1,1-Dichloroethane	6	0	Yes	5.0E-02	5.0E-02	2.1E+02	0	No
1,1-Dichloroethene	6	0	Yes	5.0E-02	5.0E-02	2.9E-01	0	No
1,2,4-Trichlorobenzene	6	0	Yes	1.7E-01	1.7E-01	2.0E+01	0	No
1,2-Dichlorobenzene	6	0	Yes	1.7E-01	1.7E-01	3.7E+02	0	No
1,2-Dichloroethane	6	0	Yes	5.0E-02	5.0E-02	7.6E+01	0	No
1,2-Dichloropropane	6	0	Yes	5.0E-02	5.0E-02	2.5E+01	0	No
1,3-Dichlorobenzene	6	0	Yes	1.7E-01	1.7E-01	3.2E+02	0	No
1,4-Dichlorobenzene	6	0	Yes	1.7E-01	1.7E-01	2.0E+01	0	No
2-Butanone	6	0	Yes	5.0E-01	5.0E-01	7.6E+03	0	No
2-Chloroethylvinylether	6	0	Yes	5.0E-01	5.0E-01	7.3E-01	0	No
2-Hexanone	6	0	Yes	5.0E-01	5.0E-01	2.4E+03	0	No
4-Methyl-2-pentanone	6	0	Yes	5.0E-01	5.0E-01	2.4E+03	0	No
Acetone	6	0	Yes	5.0E-01	5.0E-01	4.3E+01	0	No
Benzene	6	0	Yes	5.0E-02	5.0E-02	4.3E+00	0	No
Bromodichloromethane	6	0	Yes	5.0E-02	5.0E-02	1.5E+01	0	No
Bromoform	6	0	Yes	3.0E-01	3.0E-01	3.8E+01	0	No
Bromomethane	6	0	Yes	5.0E-01	5.0E-01	2.5E+01	0	No
Carbon disulfide	6	0	Yes	5.0E-02	5.0E-02	4.7E+01	0	No
Carbon tetrachloride	6	0	Yes	5.0E-02	5.0E-02	1.5E+00	0	No
Chlorobenzene	6	0	Yes	5.0E-02	5.0E-02	4.0E+01	0	No
Chloroethane	6	0	Yes	5.0E-02	5.0E-02	7.3E+01	0	No
Chloroform	6	0	Yes	5.0E-02	5.0E-02	2.4E-01	0	No
Chloromethane	6	0	Yes	5.0E-01	5.0E-01	2.5E+01	0	No
cis-1,3-Dichloropropene	6	0	Yes	5.0E-02	5.0E-02	2.2E+01	0	No

Comparison of Sample Quantitation Limits in Soil/Sediment (0-4 feet bgs) Against Ecological Screening Levels
New Conservation Yard RFI Site

Chemical	Number of Samples	Percent Frequency of Detection	Frequency of Detection Between 0% and 5% ?	Minimum SQL for Chemicals Never Detected or Detected at Frequency of < 5% (mg/kg)	Maximum SQL for Chemicals Never Detected or Detected at Frequency of < 5% (mg/kg)	Lowest ESL (mg/kg)	Percentage of SQLs Exceeding ESL	Greater than 50% of SQLs Exceeds ESL ?
Dibromochloromethane	6	0	Yes	5.0E-02	5.0E-02	4.6E+01	0	No
Ethylbenzene	6	0	Yes	5.0E-02	5.0E-02	2.1E+02	0	No
Methylene chloride	6	0	Yes	3.0E-01	3.0E-01	2.5E+01	0	No
Styrene	6	0	Yes	5.0E-02	5.0E-02	6.4E+02	0	No
Tetrachloroethene	6	0	Yes	5.0E-02	5.0E-02	2.1E+00	0	No
Toluene	6	17	No			2.5E+00	0	No
trans-1,2-Dichloroethene	6	0	Yes	5.0E-02	5.0E-02	9.7E+02	0	No
trans-1,3-Dichloropropene	6	0	Yes	5.0E-02	5.0E-02	4.4E+00	0	No
Trichloroethene	6	0	Yes	5.0E-02	5.0E-02	3.0E+00	0	No
Vinyl acetate	6	0	Yes	5.0E-01	5.0E-01	5.0E+02	0	No
Vinyl chloride	6	0	Yes	5.0E-02	5.0E-02	7.3E-01	0	No
SVOCs								
2,4,5-Trichlorophenol	6	0	Yes	8.5E-01	8.5E-01	9.0E+00	0	No
2,4,6-Trichlorophenol	6	0	Yes	1.7E-01	1.7E-01	1.0E+01	0	No
2,4-Dichlorophenol	6	0	Yes	1.7E-01	1.7E-01	1.3E+00	0	No
2,4-Dimethylphenol	6	0	Yes	1.7E-01	1.7E-01	1.1E+02	0	No
2,4-Dinitrophenol	6	0	Yes	8.5E-01	8.5E-01	5.9E-01	100	Yes
2,4-Dinitrotoluene	6	0	Yes	1.7E-01	1.7E-01	1.3E+00	0	No
2,6-Dinitrotoluene	6	0	Yes	1.7E-01	1.7E-01	2.5E+00	0	No
2-Chloronaphthalene	6	0	Yes	1.7E-01	1.7E-01	5.3E+02	0	No
2-Chlorophenol	6	0	Yes	1.7E-01	1.7E-01	2.1E+01	0	No
2-Methylnaphthalene	11	0	Yes	4.0E-03	1.7E-01	2.1E+02	0	No
2-Methylphenol	6	0	Yes	1.7E-01	1.7E-01	1.1E+02	0	No
2-Nitroaniline	6	0	Yes	8.5E-01	8.5E-01	2.3E+01	0	No
2-Nitrophenol	6	0	Yes	1.7E-01	1.7E-01	2.3E+01	0	No
4-Methylphenol	6	0	Yes	1.7E-01	1.7E-01	4.3E+00	0	No
3,3'-Dichlorobenzidine	6	0	Yes	3.4E-01	3.4E-01	1.3E+00	0	No
3-Nitroaniline	6	0	Yes	8.5E-01	8.5E-01	5.9E+00	0	No
4,6-Dinitro-2-methylphenol	6	0	Yes	8.5E-01	8.5E-01	2.3E+01	0	No
4-Bromophenyl phenyl ether	6	0	Yes	1.7E-01	1.7E-01	4.3E+00	0	No
4-Chloro-3-methylphenol	6	0	Yes	1.7E-01	1.7E-01	2.1E+01	0	No
4-Chloroaniline	6	0	Yes	1.7E-01	1.7E-01	4.4E+00	0	No
4-Chlorophenyl phenyl ether	6	0	Yes	1.7E-01	1.7E-01	1.3E+00	0	No
4-Nitroaniline	6	0	Yes	8.5E-01	8.5E-01	3.3E+00	0	No
4-Nitrophenol	6	0	Yes	8.5E-01	8.5E-01	7.0E+00	0	No
Acenaphthene	12	0	Yes	4.0E-03	1.7E-01	2.5E+00	0	No
Acenaphthylene	12	0	Yes	4.0E-03	1.7E-01	7.5E+02	0	No
Aniline	6	0	Yes	1.7E-01	1.7E-01	5.3E+01	0	No
Anthracene	12	0	Yes	4.0E-03	1.7E-01	2.4E+00	0	No
Benzo(a)anthracene	12	8	No			1.4E+00	0	No
Benzo(a)pyrene	12	17	No			5.6E+00	0	No
Benzo(b)fluoranthene	12	17	No			4.4E+00	0	No
Benzo(g,h,i)perylene	12	17	No			6.4E+00	0	No
Benzo(k)fluoranthene	12	8	No			5.8E+00	0	No
Benzoic acid	6	0	Yes	8.5E-01	8.5E-01	4.4E+00	0	No
Benzyl alcohol	6	0	Yes	1.7E-01	1.7E-01	4.4E+00	0	No
bis(2-Chloroethoxy)methane	6	0	Yes	1.7E-01	1.7E-01	1.5E+02	0	No
bis(2-Chloroethyl)ether	6	0	Yes	1.7E-01	1.7E-01	1.5E+02	0	No
bis(2-Chloroisopropyl) ether	6	0	Yes	1.7E-01	1.7E-01	1.5E+02	0	No

Comparison of Sample Quantitation Limits in Soil/Sediment (0-4 feet bgs) Against Ecological Screening Levels
New Conservation Yard RFI Site

Chemical	Number of Samples	Percent Frequency of Detection	Frequency of Detection Between 0% and 5% ?	Minimum SQL for Chemicals Never Detected or Detected at Frequency of < 5% (mg/kg)	Maximum SQL for Chemicals Never Detected or Detected at Frequency of < 5% (mg/kg)	Lowest ESL (mg/kg)	Percentage of SQLs Exceeding ESL	Greater than 50% of SQLs Exceeds ESL ?
bis(2-Ethylhexyl)phthalate	7	0	Yes	1.0E-01	1.7E-01	4.9E+00	0	No
Butyl benzyl phthalate	6	0	Yes	1.7E-01	1.7E-01	3.4E+02	0	No
Chrysene	12	17	No			2.4E+00	0	No
Dibenz(a,h)anthracene	12	8	No			5.6E+00	0	No
Dibenzofuran	6	0	Yes	1.7E-01	1.7E-01	6.2E+01	0	No
Diethylphthalate	7	0	Yes	1.0E-01	1.7E-01	6.9E+03	0	No
Dimethyl phthalate	6	0	Yes	1.7E-01	1.7E-01	2.0E+02	0	No
Di-n-butylphthalate	7	0	Yes	1.0E-01	1.7E-01	4.9E-01	0	No
Di-n-octyl phthalate	6	0	Yes	1.7E-01	1.7E-01	1.5E+03	0	No
Fluoranthene	12	25	No			3.8E+01	0	No
Fluorene	12	0	Yes	4.0E-03	1.7E-01	1.6E+00	0	No
Hexachlorobenzene	6	0	Yes	1.7E-01	1.7E-01	3.4E-01	0	No
Hexachlorobutadiene	6	0	Yes	1.7E-01	1.7E-01	8.5E-01	0	No
Hexachlorocyclopentadiene	6	0	Yes	1.7E-01	1.7E-01	1.3E+01	0	No
Hexachloroethane	6	0	Yes	1.7E-01	1.7E-01	2.1E+00	0	No
Indeno(1,2,3-cd)pyrene	12	17	No			5.8E+00	0	No
Isophorone	6	0	Yes	1.7E-01	1.7E-01	4.8E+02	0	No
Naphthalene	12	0	Yes	4.0E-03	1.7E-01	2.1E+02	0	No
Nitrobenzene	6	0	Yes	1.7E-01	1.7E-01	2.0E+00	0	No
N-Nitrosodimethylamine	12	0	Yes	2.0E-03	1.7E-01	5.6E+01	0	No
N-Nitrosodi-n-propylamine	6	0	Yes	1.7E-01	1.7E-01	5.6E+01	0	No
N-Nitrosodiphenylamine	7	0	Yes	3.0E-02	1.7E-01	2.0E+01	0	No
Pentachlorophenol	6	0	Yes	8.5E-01	8.5E-01	6.0E+00	0	No
Phenanthrene	12	8	No			1.3E+00	0	No
Phenol	6	0	Yes	1.7E-01	1.7E-01	5.0E+00	0	No
Pyrene	12	25	No			1.8E+01	0	No
Total Petroleum Hydrocarbons								
Hydrocarbons	6	0	Yes	5.0E+00	5.0E+00	NA	-	No
PCDD/PCDFs								
2,3,7,8-TCDD	17	59	No			4.3E-06	0	No
1,2,3,7,8-PeCDD	17	76	No			4.4E-06	25	No
1,2,3,4,7,8-HxCDD	17	88	No			4.5E-05	0	No
1,2,3,6,7,8-HxCDD	17	94	No			1.1E-04	0	No
1,2,3,7,8,9-HxCDD	17	94	No			4.3E-05	0	No
1,2,3,4,6,7,8-HpCDD	17	100	No			9.6E-04	0	No
OCDD	17	100	No			1.2E-01	0	No
2,3,7,8-TCDF	17	82	No			4.4E-06	0	No
1,2,3,7,8-PeCDF	17	82	No			1.0E-04	0	No
2,3,4,7,8-PeCDF	17	94	No			9.8E-06	0	No
1,2,3,4,7,8-HxCDF	17	94	No			4.7E-05	0	No
1,2,3,6,7,8-HxCDF	17	82	No			5.4E-05	0	No
2,3,4,6,7,8-HxCDF	17	94	No			4.9E-05	0	No
1,2,3,7,8,9-HxCDF	17	88	No			4.3E-05	0	No
1,2,3,4,6,7,8-HpCDF	17	76	No			1.1E-03	25	No
1,2,3,4,7,8,9-HpCDF	17	94	No			4.3E-04	0	No
OCDF	17	100	No			9.7E-02	0	No
PCBs								
Aroclor-1016	4	0	Yes	1.9E-01	2.3E-01	5.9E+00	0	No
Aroclor-1221	4	0	Yes	1.9E-01	2.3E-01	5.9E+00	0	No

Comparison of Sample Quantitation Limits in Soil/Sediment (0-4 feet bgs) Against Ecological Screening Levels
New Conservation Yard RFI Site

Chemical	Number of Samples	Percent Frequency of Detection	Frequency of Detection Between 0% and 5% ?	Minimum SQL for Chemicals Never Detected or Detected at Frequency of < 5% (mg/kg)	Maximum SQL for Chemicals Never Detected or Detected at Frequency of < 5% (mg/kg)	Lowest ESL (mg/kg)	Percentage of SQLs Exceeding ESL	Greater than 50% of SQLs Exceeds ESL ?
Aroclor-1232	4	0	Yes	1.9E-01	2.3E-01	2.9E-01	0	No
Aroclor-1242	4	0	Yes	1.9E-01	2.3E-01	2.9E-01	0	No
Aroclor-1248	4	0	Yes	1.9E-01	2.3E-01	6.0E-02	100	Yes
Aroclor-1254	5	20	No			2.9E-01	0	No
Aroclor-1260	4	0	Yes	1.9E-01	2.3E-01	2.9E-01	0	No

Notes:
VOC - volatile organic chemicals
SVOC - semivolatile organic chemicals
PCDD/PDDFs - polychlorinated dibenzo-p-dioxins and dibenzofurans
PCBs - polychlorinated biphenyls
SQL - sample quantitation limit
ESL - ecological screening level
mg/kg - milligrams per kilogram
bgs- below ground surface

Comparison of Sample Quantitation Limits in Soil/Sediment (0-2 feet bgs) Against Ecological Screening Levels
New Conservation Yard RFI Site

Chemical	Number of Samples	Percent Frequency of Detection	Frequency of Detection Between 0% and 5% ?	Minimum SQL for Chemicals Never Detected or Detected at Frequency of < 5% (mg/kg)	Maximum SQL for Chemicals Never Detected or Detected at Frequency of < 5% (mg/kg)	Lowest ESL (mg/kg)	Percentage of SQLs Exceeding ESL	Greater than 50% of SQLs Exceeds ESL ?
Inorganic Compounds								
Aluminum	7	100	No			1.2E+01	0	No
Antimony	10	0	Yes	1.0E+01	1.2E+01	9.5E-02	100	Yes
Arsenic	17	47	No			1.9E+00	100	Yes
Barium	20	100	No			1.5E+01	0	No
Beryllium	17	53	No			5.1E+00	0	No
Boron	7	0	Yes	5.6E+00	7.6E+00	9.2E+00	0	No
Cadmium	17	59	No			2.1E-02	100	Yes
Chromium	17	100	No			9.3E+02	0	No
Hexavalent chromium	1	0	Yes	2.2E+00	2.2E+00	2.0E-01	100	Yes
Cobalt	17	100	No			9.0E+00	0	No
Copper	17	100	No			1.1E+00	0	No
Lead	23	100	No			6.3E-02	0	No
Manganese	-	-	No			7.2E+01	-	No
Mercury	18	28	No			1.0E-01	62	Yes
Molybdenum	17	0	Yes	3.3E-01	1.2E+01	1.1E-01	100	Yes
Nickel	17	94	No			1.0E-01	100	Yes
Perchlorate	-	-	No			2.1E-05	-	No
Selenium	17	0	Yes	2.1E-01	6.0E+00	1.7E-01	100	Yes
Silver	24	63	No			5.4E-01	100	Yes
Strontium	-	-	No			NA	-	No
Thallium	17	41	No			2.9E+00	100	Yes
Tin	-	-	No			NA	-	No
Vanadium	17	100	No			1.5E+00	0	No
Zinc	20	100	No			2.1E+01	0	No
VOCs								
1,1,1,2-Tetrachloroethane	-	-	No			7.6E+01	-	No
1,1,1-Trichloroethane	3	0	Yes	5.0E-02	5.0E-02	4.3E+03	0	No
1,1,2,2-Tetrachloroethane	3	0	Yes	5.0E-02	5.0E-02	6.0E+00	0	No
1,1,2-Trichloro-1,2,2-trifluoroetha	-	-	No			2.1E+02	-	No
1,1,2-Trichloroethane	3	0	Yes	5.0E-02	5.0E-02	8.3E+00	0	No
1,1-Dichloroethane	3	0	Yes	5.0E-02	5.0E-02	2.1E+02	0	No
1,1-Dichloroethene	3	0	Yes	5.0E-02	5.0E-02	2.9E-01	0	No
1,1-Dichloropropene	-	-	No			2.2E+01	-	No
1,2,3-Trichlorobenzene	-	-	No			2.0E+01	-	No
1,2,3-Trichloropropane	-	-	No			1.2E+01	-	No
1,2,4-Trichlorobenzene	3	0	Yes	1.7E-01	1.7E-01	2.0E+01	0	No
1,2,4-Trimethylbenzene	-	-	No			1.3E+02	-	No
1,2-Dibromo-3-chloropropane	-	-	No			2.2E+01	-	No
1,2-Dibromoethane	-	-	No			2.5E+01	-	No
1,2-Dichlorobenzene	3	0	Yes	1.7E-01	1.7E-01	3.7E+02	0	No
1,2-Dichloroethane	3	0	Yes	5.0E-02	5.0E-02	7.6E+01	0	No
1,2-Dichloroethene (total)	-	-	No			6.8E+01	-	No
1,2-Dichloropropane	3	0	Yes	5.0E-02	5.0E-02	2.5E+01	0	No
1,3,5-Trimethylbenzene	-	-	No			1.3E+02	-	No
1,3-Dichlorobenzene	3	0	Yes	1.7E-01	1.7E-01	3.2E+02	0	No
1,4-Dichlorobenzene	3	0	Yes	1.7E-01	1.7E-01	2.0E+01	0	No
2-Butanone	3	0	Yes	5.0E-01	5.0E-01	7.6E+03	0	No
2-Chloroethylvinylether	3	0	Yes	5.0E-01	5.0E-01	7.3E-01	0	No
2-Chlorotoluene	-	-	No			3.2E+02	-	No
2-Chloro-1,1,1-trifluoroethane	-	-	No			NA	-	No

Comparison of Sample Quantitation Limits in Soil/Sediment (0-2 feet bgs) Against Ecological Screening Levels
New Conservation Yard RFI Site

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2-Hexanone	3	0	Yes	5.0E-01	5.0E-01	2.4E+03	0	No
4-Bromofluorobenzene	-	-	No			6.3E+01	-	No
4-Chlorotoluene	-	-	No			3.2E+02	-	No
4-Methyl-2-pentanone	3	0	Yes	5.0E-01	5.0E-01	2.4E+03	0	No
Acetone	3	0	Yes	5.0E-01	5.0E-01	4.3E+01	0	No
Acrolein	-	-	No			2.3E+02	-	No
Acrylonitrile	-	-	No			4.3E-01	-	No
Benzene	3	0	Yes	5.0E-02	5.0E-02	4.3E+00	0	No
Bromobenzene	-	-	No			4.3E+00	-	No
Bromodichloromethane	3	0	Yes	5.0E-02	5.0E-02	1.5E+01	0	No
Bromoform	3	0	Yes	3.0E-01	3.0E-01	3.8E+01	0	No
Bromomethane	3	0	Yes	5.0E-01	5.0E-01	2.5E+01	0	No
Carbon disulfide	3	0	Yes	5.0E-02	5.0E-02	4.7E+01	0	No
Carbon tetrachloride	3	0	Yes	5.0E-02	5.0E-02	1.5E+00	0	No
Chlorobenzene	3	0	Yes	5.0E-02	5.0E-02	4.0E+01	0	No
Chloroethane	3	0	Yes	5.0E-02	5.0E-02	7.3E+01	0	No
Chloroform	3	0	Yes	5.0E-02	5.0E-02	2.4E-01	0	No
Chloromethane	3	0	Yes	5.0E-01	5.0E-01	2.5E+01	0	No
Chlorotrifluoroethene	-	-	No			1.6E+01	-	No
cis-1,2-Dichloroethene	-	-	No			6.8E+01	-	No
cis-1,3-Dichloropropene	3	0	Yes	5.0E-02	5.0E-02	2.2E+01	0	No
Dibromochloromethane	3	0	Yes	5.0E-02	5.0E-02	4.6E+01	0	No
Dibromomethane	-	-	No			2.5E+01	-	No
Dichlorobenzenes	3	0	Yes	5.0E-02	5.0E-02	3.2E+02	0	No
Dichlorodifluoromethane	-	-	No			6.4E+01	-	No
Ethylbenzene	3	0	Yes	5.0E-02	5.0E-02	2.1E+02	0	No
Formaldehyde	-	-	No			5.9E+01	-	No
Isopropylbenzene	-	-	No			4.1E+02	-	No
m,p-Xylene	-	-	No			1.3E+02	-	No
Methyl tert-butyl ether	-	-	No			6.1E+01	-	No
Methylene chloride	3	0	Yes	3.0E-01	3.0E-01	2.5E+01	0	No
n-Butylbenzene	-	-	No			4.1E+02	-	No
n-Propylbenzene	-	-	No			4.1E+02	-	No
o-Xylene	-	-	No			1.3E+02	-	No
p-Isopropyltoluene	-	-	No			1.3E+02	-	No
sec-Butylbenzene	-	-	No			4.1E+02	-	No
Styrene	3	0	Yes	5.0E-02	5.0E-02	6.4E+02	0	No
tert-Butylbenzene	-	-	No			4.1E+02	-	No
Tetrachloroethene	3	0	Yes	5.0E-02	5.0E-02	2.1E+00	0	No
Toluene	3	33	No			2.5E+00	0	No
trans-1,2-Dichloroethene	3	0	Yes	5.0E-02	5.0E-02	9.7E+02	0	No
trans-1,3-Dichloropropene	3	0	Yes	5.0E-02	5.0E-02	4.4E+00	0	No
Trichloroethene	3	0	Yes	5.0E-02	5.0E-02	3.0E+00	0	No
Trichlorofluoromethane	-	-	No			3.0E+02	-	No
Vinyl acetate	3	0	Yes	5.0E-01	5.0E-01	5.0E+02	0	No
Vinyl chloride	3	0	Yes	5.0E-02	5.0E-02	7.3E-01	0	No
Xylenes (total)	3	0	Yes	5.0E-02	5.0E-02	1.3E+02	0	No
SVOCs								
1,4-Dioxane	-	-	No			NA	-	No
1,3-Dinitrobenzene	-	-	No			7.5E-01	-	No
1,3,5-Trinitrobenzene	-	-	No			1.1E+01	-	No

Comparison of Sample Quantitation Limits in Soil/Sediment (0-2 feet bgs) Against Ecological Screening Levels
New Conservation Yard RFI Site

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2,4,6-Trinitrotoluene	-	-	No			3.2E-01	-	No
2,4,5-Trichlorophenol	3	0	Yes	8.5E-01	8.5E-01	9.0E+00	0	No
2,4,6-Trichlorophenol	3	0	Yes	1.7E-01	1.7E-01	1.0E+01	0	No
2,4-Dichlorophenol	3	0	Yes	1.7E-01	1.7E-01	1.3E+00	0	No
2,4-Dimethylphenol	3	0	Yes	1.7E-01	1.7E-01	1.1E+02	0	No
2,4-Dinitrophenol	3	0	Yes	8.5E-01	8.5E-01	5.9E-01	100	Yes
2,4-Dinitrotoluene	3	0	Yes	1.7E-01	1.7E-01	1.3E+00	0	No
2,6-Dinitrotoluene	3	0	Yes	1.7E-01	1.7E-01	2.5E+00	0	No
2-Amino-4,6-dinitrotoluene	-	-	No			NA	-	No
2-Chloronaphthalene	3	0	Yes	1.7E-01	1.7E-01	5.3E+02	0	No
2-Chlorophenol	3	0	Yes	1.7E-01	1.7E-01	2.1E+01	0	No
2-Methylnaphthalene	8	0	Yes	4.0E-03	1.7E-01	2.1E+02	0	No
2-Methylphenol	3	0	Yes	1.7E-01	1.7E-01	1.1E+02	0	No
2-Nitrotoluene	-	-	No			1.3E+00	-	No
2-Nitroaniline	3	0	Yes	8.5E-01	8.5E-01	2.3E+01	0	No
2-Nitrophenol	3	0	Yes	1.7E-01	1.7E-01	2.3E+01	0	No
3- and 4-Methylphenol Coelution	-	-	No			NA	-	No
3-Methylphenol	-	-	No			2.1E+02	-	No
3-Nitrotoluene	-	-	No			1.3E+00	-	No
4-Amino-2,6-dinitrotoluene	-	-	No			NA	-	No
4-Methylphenol	3	0	Yes	1.7E-01	1.7E-01	4.3E+00	0	No
4-Nitrotoluene	-	-	No			1.3E+00	-	No
3,3'-Dichlorobenzidine	3	0	Yes	3.4E-01	3.4E-01	1.3E+00	0	No
3-Nitroaniline	3	0	Yes	8.5E-01	8.5E-01	5.9E+00	0	No
4,6-Dinitro-2-methylphenol	3	0	Yes	8.5E-01	8.5E-01	2.3E+01	0	No
4-Bromophenyl phenyl ether	3	0	Yes	1.7E-01	1.7E-01	4.3E+00	0	No
4-Chloro-3-methylphenol	3	0	Yes	1.7E-01	1.7E-01	2.1E+01	0	No
4-Chloroaniline	3	0	Yes	1.7E-01	1.7E-01	4.4E+00	0	No
4-Chlorophenyl phenyl ether	3	0	Yes	1.7E-01	1.7E-01	1.3E+00	0	No
4-Nitroaniline	3	0	Yes	8.5E-01	8.5E-01	3.3E+00	0	No
4-Nitrophenol	3	0	Yes	8.5E-01	8.5E-01	7.0E+00	0	No
Acenaphthene	9	0	Yes	4.0E-03	1.7E-01	2.5E+00	0	No
Acenaphthylene	9	0	Yes	4.0E-03	1.7E-01	7.5E+02	0	No
Aniline	3	0	Yes	1.7E-01	1.7E-01	5.3E+01	0	No
Anthracene	9	0	Yes	4.0E-03	1.7E-01	2.4E+00	0	No
Benzidine	3	0	Yes	1.7E+00	1.7E+00	2.3E+00	0	No
Benzo(a)anthracene	9	11	No			1.4E+00	0	No
Benzo(a)pyrene	9	22	No			5.6E+00	0	No
Benzo(b)fluoranthene	9	22	No			4.4E+00	0	No
Benzo(e)pyrene	0	-	No			NA	-	No
Benzo(g,h,i)perylene	9	22	No			6.4E+00	0	No
Benzo(k)fluoranthene	9	11	No			5.8E+00	0	No
Benzoic acid	3	0	Yes	8.5E-01	8.5E-01	4.4E+00	0	No
Benzyl alcohol	3	0	Yes	1.7E-01	1.7E-01	4.4E+00	0	No
bis(2-Chloroethoxy)methane	3	0	Yes	1.7E-01	1.7E-01	1.5E+02	0	No
bis(2-Chloroethyl)ether	3	0	Yes	1.7E-01	1.7E-01	1.5E+02	0	No
bis(2-Chloroisopropyl) ether	3	0	Yes	1.7E-01	1.7E-01	1.5E+02	0	No
bis(2-Ethylhexyl)phthalate	4	0	Yes	1.0E-01	1.7E-01	4.9E+00	0	No
Butyl benzyl phthalate	3	0	Yes	1.7E-01	1.7E-01	3.4E+02	0	No
Carbazole	-	-	No			3.4E+01	-	No
Chrysene	9	22	No			2.4E+00	0	No
Dibenz(a,h)anthracene	9	11	No			5.6E+00	0	No

Comparison of Sample Quantitation Limits in Soil/Sediment (0-2 feet bgs) Against Ecological Screening Levels
New Conservation Yard RFI Site

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Dibenzofuran	3	0	Yes	1.7E-01	1.7E-01	6.2E+01	0	No
Diethylphthalate	4	0	Yes	1.0E-01	1.7E-01	6.9E+03	0	No
Dimethyl phthalate	3	0	Yes	1.7E-01	1.7E-01	2.0E+02	0	No
Di-n-butylphthalate	4	0	Yes	1.0E-01	1.7E-01	4.9E-01	0	No
Di-n-octyl phthalate	3	0	Yes	1.7E-01	1.7E-01	1.5E+03	0	No
Fluoranthene	9	33	No			3.8E+01	0	No
Fluorene	9	0	Yes	4.0E-03	1.7E-01	1.6E+00	0	No
Hexachlorobenzene	3	0	Yes	1.7E-01	1.7E-01	3.4E-01	0	No
Hexachlorobutadiene	3	0	Yes	1.7E-01	1.7E-01	8.5E-01	0	No
Hexachlorocyclopentadiene	3	0	Yes	1.7E-01	1.7E-01	1.3E+01	0	No
Hexachloroethane	3	0	Yes	1.7E-01	1.7E-01	2.1E+00	0	No
HMX	-	-	No			6.4E+01	-	No
Indeno(1,2,3-cd)pyrene	9	22	No			5.8E+00	0	No
Isophorone	3	0	Yes	1.7E-01	1.7E-01	4.8E+02	0	No
Naphthalene	9	0	Yes	4.0E-03	1.7E-01	2.1E+02	0	No
Nitrobenzene	3	0	Yes	1.7E-01	1.7E-01	2.0E+00	0	No
N-Nitrosodimethylamine	9	0	Yes	2.0E-03	1.7E-01	5.6E+01	0	No
N-Nitrosodi-n-propylamine	3	0	Yes	1.7E-01	1.7E-01	5.6E+01	0	No
N-Nitrosodiphenylamine	4	0	Yes	3.0E-02	1.7E-01	2.0E+01	0	No
Pentachlorophenol	3	0	Yes	8.5E-01	8.5E-01	6.0E+00	0	No
Perylene	0	0	Yes	-	-	NA	-	No
Phenanthrene	9	11	No			1.3E+00	0	No
Phenol	3	0	Yes	1.7E-01	1.7E-01	5.0E+00	0	No
Pyrene	9	33	No			1.8E+01	0	No
Pyridine	-	-	No			2.1E+00	-	No
RDX	-	-	No			4.3E+01	-	No
Tetryl	-	-	No			2.8E+01	-	No
Total Petroleum Hydrocarbons								
C08-C11(Gasoline Range)	-	-	No			NA	-	No
C11-C14(Kerosene Range)	-	-	No			NA	-	No
C14-C20(Diesel Range)	-	-	No			NA	-	No
C20-C30(Lubricant Oil Range)	-	-	No			NA	-	No
Hydrocarbons	3	0	Yes	5.0E+00	5.0E+00	NA	-	No
PCDD/PCDFs								
2,3,7,8-TCDD	16	63	No			4.3E-06	0	No
1,2,3,7,8-PeCDD	16	75	No			4.4E-06	25	No
1,2,3,4,7,8-HxCDD	16	88	No			4.5E-05	0	No
1,2,3,6,7,8-HxCDD	16	94	No			1.1E-04	0	No

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1,2,3,7,8,9-HxCDD	16	94	No			4.3E-05	0	No
1,2,3,4,6,7,8-HpCDD	16	100	No			9.6E-04	0	No
OCDD	16	100	No			1.2E-01	0	No
2,3,7,8-TCDF	16	88	No			4.4E-06	0	No
1,2,3,7,8-PeCDF	16	81	No			1.0E-04	0	No
2,3,4,7,8-PeCDF	16	94	No			9.8E-06	0	No
1,2,3,4,7,8-HxCDF	16	94	No			4.7E-05	0	No
1,2,3,6,7,8-HxCDF	16	81	No			5.4E-05	0	No
2,3,4,6,7,8-HxCDF	16	94	No			4.9E-05	0	No
1,2,3,7,8,9-HxCDF	16	88	No			4.3E-05	0	No
1,2,3,4,6,7,8-HpCDF	16	75	No			1.1E-03	25	No
1,2,3,4,7,8,9-HpCDF	16	94	No			4.3E-04	0	No
OCDF	16	100	No			9.7E-02	0	No
Total Tetra	-	-	-			-	-	No
Total Penta	-	-	-			-	-	No
Total Hexa	-	-	-			-	-	No
Total Hepta	-	-	-			-	-	No
Total Octa	-	-	-			-	-	No
PCDD/PCDF	-	-	-			-	-	No
PCBs								
Aroclor-1016	4	0	Yes	1.9E-01	2.3E-01	5.9E+00	0	No
Aroclor-1221	4	0	Yes	1.9E-01	2.3E-01	5.9E+00	0	No
Aroclor-1232	4	0	Yes	1.9E-01	2.3E-01	2.9E-01	0	No
Aroclor-1242	4	0	Yes	1.9E-01	2.3E-01	2.9E-01	0	No
Aroclor-1248	4	0	Yes	1.9E-01	2.3E-01	6.0E-02	100	Yes
Aroclor-1254	5	20	No			2.9E-01	0	No
Aroclor-1260	4	0	Yes	1.9E-01	2.3E-01	2.9E-01	0	No
PCB-105	-	100	No			8.5E-03	-	No
PCB-114	-	100	No			8.8E-04	-	No
PCB-118	-	100	No			8.2E-03	-	No
PCB-123	-	100	No			7.5E-03	-	No
PCB-126	-	100	No			1.4E-05	-	No
PCB-156	-	100	No			2.6E-03	-	No
PCB-157	-	100	No			2.5E-03	-	No
PCB-167	-	100	No			1.2E-01	-	No
PCB-169	-	100	No			4.3E-04	-	No
PCB-189	-	100	No			2.0E-02	-	No
PCB-77	-	100	No			2.8E-04	-	No
PCB-81	-	100	No			1.4E-04	-	No

Notes:

a. Chemicals considered in the comparison of SQLs to ESLs are those that were never detected in site media, and those that were detected at a frequenc of detection of less than 5% and under consideration for exclusion as CPEC.

VOC - volatile organic chemicals
SVOC - semivolatile organic chemicals
PCDD/PDDFs - polychlorinated dibenzo-p-dioxins and dibenzofurans
PCBs - polychlorinated biphenyls
SQL - sample quantitation limit
ESL - ecological screening level
mg/kg - milligrams per kilogram
bgs- below ground surface

Selection of Chemicals of Potential Ecological Concern in Soil/Sediment (0-6 feet bgs)
New Conservation Yard RFI Site

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (mg/kg)	Chemical Detected in Laboratory Blanks [a]	WRS Test Indicates Exceeds Background [b]	Maximum SQL (mg/kg)	SQLs Exceed Background	SQLs Exceed ESLs	Potentially Site Related	CPEC	
Inorganic Compounds												
Aluminum	7	7	100	1.4E+04	No	No		-	No	Yes	No	c
Antimony	11	0	0	-	No	No	1.2E+01	No	Yes	Yes	Yes	e
Arsenic	18	8	44	9.0E+00	No	No	6.0E+00	-	Yes	Yes	No	c
Barium	21	21	100	1.0E+03	No	No		-	No	Yes	Yes	d
Beryllium	18	10	56	7.0E-01	No	No	6.0E-01	-	No	Yes	No	c
Boron	7	0	0	0.0E+00	No	No	7.6E+00	Yes	No	Yes	No	c
Cadmium	18	10	56	2.0E+01	No	Yes	1.0E+00	-	Yes	Yes	Yes	
Chromium	18	18	100	7.2E+01	No	No		-	No	Yes	Yes	d
Hexavalent chromium	1	0	0	0.0E+00	No	No	2.2E+00	NA	Yes	Yes	No	
Cobalt	18	18	100	1.4E+01	No	No		-	No	Yes	No	c
Copper	18	18	100	2.0E+02	No	No		-	No	Yes	Yes	d
Lead	25	25	100	1.0E+02	No	No		-	No	Yes	Yes	d
Mercury	19	5	26	1.0E+00	No	No	2.0E-01	-	Yes	Yes	Yes	d
Molybdenum	18	0	0	-	No	No	1.2E+01	No	Yes	Yes	Yes	e
Nickel	18	17	94	1.3E+02	No	No	5.0E+00	-	Yes	Yes	Yes	d
Selenium	18	0	0	-	No	No	6.0E+00	No	Yes	Yes	Yes	e
Silver	25	15	60	1.5E+02	No	Yes	1.0E+00	-	Yes	Yes	Yes	
Thallium	18	7	39	3.4E-01	No	No	6.0E+00	-	Yes	Yes	No	c
Vanadium	18	18	100	3.8E+01	No	No		-	No	Yes	No	c
Zinc	22	22	100	3.4E+03	No	Yes		-	No	Yes	Yes	
VOCs												
1,1,1-Trichloroethane	6	0	0	-	No	-	5.0E-02	-	No	Yes	No	
1,1,2,2-Tetrachloroethane	6	0	0	-	No	-	5.0E-02	-	No	Yes	No	
1,1,2-Trichloroethane	6	0	0	-	No	-	5.0E-02	-	No	Yes	No	
1,1-Dichloroethane	6	0	0	-	No	-	5.0E-02	-	No	Yes	No	
1,1-Dichloroethene	6	0	0	-	No	-	5.0E-02	-	No	Yes	No	
1,2,4-Trichlorobenzene	6	0	0	-	No	-	1.7E-01	-	No	Yes	No	
1,2-Dichlorobenzene	6	0	0	-	No	-	1.7E-01	-	No	Yes	No	
1,2-Dichloroethane	6	0	0	-	No	-	5.0E-02	-	No	Yes	No	
1,2-Dichloropropane	6	0	0	-	No	-	5.0E-02	-	No	Yes	No	
1,3-Dichlorobenzene	6	0	0	-	No	-	1.7E-01	-	No	Yes	No	

Selection of Chemicals of Potential Ecological Concern in Soil/Sediment (0-6 feet bgs)
New Conservation Yard RFI Site

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (mg/kg)	Chemical Detected in Laboratory Blanks [a]	WRS Test Indicates Exceeds Background [b]	Maximum SQL (mg/kg)	SQLs Exceed Background	SQLs Exceed ESLs	Potentially Site Related	CPEC
1,4-Dichlorobenzene	6	0	0	-	No	-	1.7E-01	-	No	Yes	No
2-Butanone	6	0	0	-	No	-	5.0E-01	-	No	Yes	No
2-Chloroethylvinylether	6	0	0	-	No	-	5.0E-01	-	No	Yes	No
2-Hexanone	6	0	0	-	No	-	5.0E-01	-	No	Yes	No
4-Methyl-2-pentanone	6	0	0	-	No	-	5.0E-01	-	No	Yes	No
Acetone	6	0	0	-	No	-	5.0E-01		No	Yes	No
Benzene	6	0	0	-	No	-	5.0E-02	-	No	Yes	No
Bromodichloromethane	6	0	0	-	No	-	5.0E-02	-	No	Yes	No
Bromoform	6	0	0	-	No	-	3.0E-01	-	No	Yes	No
Bromomethane	6	0	0	-	No	-	5.0E-01	-	No	Yes	No
Carbon disulfide	6	0	0	-	No	-	5.0E-02	-	No	Yes	No
Carbon tetrachloride	6	0	0	-	No	-	5.0E-02	-	No	Yes	No
Chlorobenzene	6	0	0	-	No	-	5.0E-02	-	No	Yes	No
Chloroethane	6	0	0	-	No	-	5.0E-02	-	No	Yes	No
Chloroform	6	0	0	-	No	-	5.0E-02	-	No	Yes	No
Chloromethane	6	0	0	-	No	-	5.0E-01	-	No	Yes	No
cis-1,3-Dichloropropene	6	0	0	-	No	-	5.0E-02	-	No	Yes	No
Dibromochloromethane	6	0	0	-	No	-	5.0E-02	-	No	Yes	No
Ethylbenzene	6	0	0	-	No	-	5.0E-02	-	No	Yes	No
Methylene chloride	6	0	0	-	No	-	3.0E-01	-	No	Yes	No
Styrene	6	0	0	-	No	-	5.0E-02	-	No	Yes	No
Tetrachloroethene	6	0	0	-	No	-	5.0E-02	-	No	Yes	No
Toluene	6	1	17	1.1E-01	No	-	5.0E-02	-	No	Yes	Yes
trans-1,2-Dichloroethene	6	0	0	-	No	-	5.0E-02	-	No	Yes	No
trans-1,3-Dichloropropene	6	0	0	-	No	-	5.0E-02	-	No	Yes	No
Trichloroethene	6	0	0	-	No	-	5.0E-02	-	No	Yes	No
Vinyl acetate	6	0	0	-	No	-	5.0E-01	-	No	Yes	No
Vinyl chloride	6	0	0	-	No	-	5.0E-02	-	No	Yes	No
Xylenes (total)	6	0	0	-	No	-	5.0E-02	-	No	Yes	No
SVOCs											
2,4,5-Trichlorophenol	6	0	0	-	No	-	8.5E-01	-	No	Yes	No
2,4,6-Trichlorophenol	6	0	0	-	No	-	1.7E-01	-	No	Yes	No
2,4-Dichlorophenol	6	0	0	-	No	-	1.7E-01	-	No	Yes	No
2,4-Dimethylphenol	6	0	0	-	No	-	1.7E-01	-	No	Yes	No

Selection of Chemicals of Potential Ecological Concern in Soil/Sediment (0-6 feet bgs)
New Conservation Yard RFI Site

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (mg/kg)	Chemical Detected in Laboratory Blanks [a]	WRS Test Indicates Exceeds Background [b]	Maximum SQL (mg/kg)	SQLs Exceed Background	SQLs Exceed ESLs	Potentially Site Related	CPEC
2,4-Dinitrophenol	6	0	0	-	No	-	8.5E-01	-	Yes	Yes	No
2,4-Dinitrotoluene	6	0	0	-	No	-	1.7E-01	-	No	Yes	No
2,6-Dinitrotoluene	6	0	0	-	No	-	1.7E-01	-	No	Yes	No
2-Chloronaphthalene	6	0	0	-	No	-	1.7E-01	-	No	Yes	No
2-Chlorophenol	6	0	0	-	No	-	1.7E-01	-	No	Yes	No
2-Methylnaphthalene	11	0	0	-	No	-	4.0E-03	-	No	Yes	No
2-Methylphenol	6	0	0	-	No	-	1.7E-01	-	No	Yes	No
2-Nitroaniline	6	0	0	-	No	-	8.5E-01	-	No	Yes	No
2-Nitrophenol	6	0	0	-	No	-	1.7E-01	-	No	Yes	No
4-Methylphenol	6	0	0	-	No	-	1.7E-01	-	No	Yes	No
3,3'-Dichlorobenzidine	6	0	0	-	No	-	3.4E-01	-	No	Yes	No
3-Nitroaniline	6	0	0	-	No	-	8.5E-01	-	No	Yes	No
4,6-Dinitro-2-methylphenol	6	0	0	-	No	-	8.5E-01	-	No	Yes	No
4-Bromophenyl phenyl ether	6	0	0	-	No	-	1.7E-01	-	No	Yes	No
4-Chloro-3-methylphenol	6	0	0	-	No	-	1.7E-01	-	No	Yes	No
4-Chloroaniline	6	0	0	-	No	-	1.7E-01	-	No	Yes	No
4-Chlorophenyl phenyl ether	6	0	0	-	No	-	1.7E-01	-	No	Yes	No
4-Nitroaniline	6	0	0	-	No	-	8.5E-01	-	No	Yes	No
4-Nitrophenol	6	0	0	-	No	-	8.5E-01	-	No	Yes	No
Acenaphthene	12	0	0	-	No	-	4.0E-03	-	No	Yes	No
Acenaphthylene	12	0	0	-	No	-	4.0E-03	-	No	Yes	No
Aniline	6	0	0	-	No	-	1.7E-01	-	No	Yes	No
Anthracene	12	0	0	-	No	-	4.0E-03	-	No	Yes	No
Benzidine	6	0	0	-	No	-	1.7E+00	-	No	Yes	No
Benzo(a)anthracene	12	1	8	1.2E-02	No	-	2.2E-02	-	No	Yes	Yes
Benzo(a)pyrene	12	2	17	4.3E-02	No	-	2.2E-02	-	No	Yes	Yes
Benzo(b)fluoranthene	12	2	17	6.5E-02	No	-	2.2E-02	-	No	Yes	Yes
Benzo(g,h,i)perylene	12	2	17	3.1E-02	No	-	2.2E-02	-	No	Yes	Yes
Benzo(k)fluoranthene	12	1	8	1.2E-02	No	-	2.2E-02	-	No	Yes	Yes
Benzoic acid	6	0	0	-	No	-	8.5E-01	-	No	Yes	No
Benzyl alcohol	6	0	0	-	No	-	1.7E-01	-	No	Yes	No
bis(2-Chloroethoxy)methane	6	0	0	-	No	-	1.7E-01	-	No	Yes	No
bis(2-Chloroethyl)ether	6	0	0	-	No	-	1.7E-01	-	No	Yes	No

Selection of Chemicals of Potential Ecological Concern in Soil/Sediment (0-6 feet bgs)
New Conservation Yard RFI Site

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (mg/kg)	Chemical Detected in Laboratory Blanks [a]	WRS Test Indicates Exceeds Background [b]	Maximum SQL (mg/kg)	SQLs Exceed Background	SQLs Exceed ESLs	Potentially Site Related	CPEC
bis(2-Chloroisopropyl) ether	6	0	0	-	No	-	1.7E-01	-	No	Yes	No
bis(2-Ethylhexyl)phthalate	7	0	0	-	No	-	1.0E-01	-	No	Yes	No
Butyl benzyl phthalate	6	0	0	-	No	-	1.7E-01	-	No	Yes	No
Chrysene	12	2	17	2.7E-02	No	-	2.2E-02	-	No	Yes	Yes
Dibenz(a,h)anthracene	12	1	8	8.0E-03	No	-	2.2E-02	-	No	Yes	Yes
Dibenzofuran	6	0	0	-	No	-	1.7E-01	-	No	Yes	No
Diethylphthalate	7	0	0	-	No	-	1.0E-01	-	No	Yes	No
Dimethyl phthalate	6	0	0	-	No	-	1.7E-01	-	No	Yes	No
Di-n-butylphthalate	7	0	0	-	No	-	1.0E-01	-	No	Yes	No
Di-n-octyl phthalate	6	0	0	-	No	-	1.7E-01	-	No	Yes	No
Fluoranthene	12	3	25	3.6E-02	No	-	2.2E-02	-	No	Yes	Yes
Fluorene	12	0	0	-	No	-	4.0E-03	-	No	Yes	No
Hexachlorobenzene	6	0	0	-	No	-	1.7E-01	-	No	Yes	No
Hexachlorobutadiene	6	0	0	-	No	-	1.7E-01	-	No	Yes	No
Hexachlorocyclopentadiene	6	0	0	-	No	-	1.7E-01	-	No	Yes	No
Hexachloroethane	6	0	0	-	No	-	1.7E-01	-	No	Yes	No
Indeno(1,2,3-cd)pyrene	12	2	17	5.3E-02	No	-	2.2E-02	-	No	Yes	Yes
Isophorone	6	0	0	-	No	-	1.7E-01	-	No	Yes	No
Naphthalene	12	0	0	-	No	-	4.0E-03	-	No	Yes	No
Nitrobenzene	6	0	0	-	No	-	1.7E-01	-	No	Yes	No
N-Nitrosodimethylamine	12	0	0	-	No	-	2.0E-03	-	No	Yes	No
N-Nitrosodi-n-propylamine	6	0	0	-	No	-	1.7E-01	-	No	Yes	No
N-Nitrosodiphenylamine	7	0	0	-	No	-	3.0E-02	-	No	Yes	No
Pentachlorophenol	6	0	0	-	No	-	8.5E-01	-	No	Yes	No
Phenanthrene	12	1	8	1.4E-02	No	-	2.2E-02	-	No	Yes	Yes
Phenol	6	0	0	-	No	-	1.7E-01	-	No	Yes	No
Pyrene	12	3	25	4.3E-02	No	-	2.2E-02	-	No	Yes	Yes
Total Petroleum Hydrocarbons											
Hydrocarbons	6	0	0	-	No	-	5.0E+00	-	-	No	No
PCDD/PCDFs											
2,3,7,8-TCDD	17	10	59	4.0E-05	No	-	1.1E-07	-	No	Yes	Yes
1,2,3,7,8-PeCDD	17	13	76	9.0E-05	No	-	5.5E-07	-	Yes	Yes	Yes
1,2,3,4,7,8-HxCDD	17	15	88	2.4E-04	No	-	9.6E-07	-	No	Yes	Yes

Selection of Chemicals of Potential Ecological Concern in Soil/Sediment (0-6 feet bgs)
New Conservation Yard RFI Site

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (mg/kg)	Chemical Detected in Laboratory Blanks [a]	WRS Test Indicates Exceeds Background [b]	Maximum SQL (mg/kg)	SQLs Exceed Background	SQLs Exceed ESLs	Potentially Site Related	CPEC
1,2,3,6,7,8-HxCDD	17	16	94	1.2E-03	No	-	1.4E-06	-	No	Yes	Yes
1,2,3,7,8,9-HxCDD	17	16	94	4.7E-04	No	-	1.2E-06	-	No	Yes	Yes
1,2,3,4,6,7,8-HpCDD	17	17	100	2.7E-02	No	-		-	No	Yes	Yes
OCDD	17	17	100	3.0E-01	No	-		-	No	Yes	Yes
2,3,7,8-TCDF	17	14	82	1.0E-05	No	-	4.0E-08	-	No	Yes	Yes
1,2,3,7,8-PeCDF	17	14	82	1.0E-05	No	-	1.8E-07	-	No	Yes	Yes
2,3,4,7,8-PeCDF	17	16	94	3.0E-05	No	-	4.4E-07	-	No	Yes	Yes
1,2,3,4,7,8-HxCDF	17	16	94	1.5E-04	No	-	4.0E-07	-	No	Yes	Yes
1,2,3,6,7,8-HxCDF	17	14	82	1.1E-04	No	-	7.9E-07	-	No	Yes	Yes
2,3,4,6,7,8-HxCDF	17	16	94	2.8E-04	No	-	6.4E-07	-	No	Yes	Yes
1,2,3,7,8,9-HxCDF	17	15	88	3.0E-05	No	-	2.9E-07	-	No	Yes	Yes
1,2,3,4,6,7,8-HpCDF	17	13	76	5.7E-03	No	-	1.0E-05	-	No	Yes	Yes
1,2,3,4,7,8,9-HpCDF	17	16	94	4.9E-04	No	-	9.2E-07	-	No	Yes	Yes
OCDF	17	17	100	1.5E-02	No	-		-	No	Yes	Yes
Total Tetra	-	-	-	-	-	Yes	-	-	-	Yes	-
Total Penta	-	-	-	-	-	Yes	-	-	-	Yes	-
Total Hexa	-	-	-	-	-	Yes	-	-	-	Yes	-
Total Hepta	-	-	-	-	-	Yes	-	-	-	Yes	-
Total Octa	-	-	-	-	-	Yes	-	-	-	Yes	-
PCDD/PCDF	-	-	-	-	-	-	-	-	-	Yes	Yes
PCBs											
Aroclor-1016	4	0	0	-	No	-	1.9E-01	-	No	No	No
Aroclor-1221	4	0	0	-	No	-	1.9E-01	-	No	No	No
Aroclor-1232	4	0	0	-	No	-	1.9E-01	-	No	No	No
Aroclor-1242	4	0	0	-	No	-	1.9E-01	-	No	No	No
Aroclor-1248	4	0	0	-	No	-	1.9E-01	-	Yes	No	No
Aroclor-1254	5	1	20	7.1E-02	No	-	1.9E-01	-	No	Yes	Yes
Aroclor-1260	4	0	0	-	No	-	1.9E-01	-	No	Yes	No
PCB-105	1	1	100	2.6E-05	No	-	-	-	-	Yes	Yes
PCB-114	1	1	100	9.5E-07	No	-	-	-	-	Yes	Yes
PCB-118	1	1	100	5.6E-05	No	-	-	-	-	Yes	Yes
PCB-123	1	1	100	6.3E-07	No	-	-	-	-	Yes	Yes
PCB-126	1	1	100	1.6E-06	No	-	-	-	-	Yes	Yes

Selection of Chemicals of Potential Ecological Concern in Soil/Sediment (0-6 feet bgs)
New Conservation Yard RFI Site

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (mg/kg)	Chemical Detected in Laboratory Blanks [a]	WRS Test Indicates Exceeds Background [b]	Maximum SQL (mg/kg)	SQLs Exceed Background	SQLs Exceed ESLs	Potentially Site Related	CPEC
PCB-156	1	1	100	1.3E-05	No	-	-	-	-	Yes	Yes
PCB-157	1	1	100	2.8E-06	No	-	-	-	-	Yes	Yes
PCB-167	1	1	100	4.9E-06	No	-	-	-	-	Yes	Yes
PCB-169	1	1	100	7.7E-08	No	-	-	-	-	Yes	Yes
PCB-189	1	1	100	7.3E-07	No	-	-	-	-	Yes	Yes
PCB-77	1	1	100	3.2E-06	No	-	-	-	-	Yes	Yes
PCB-81	1	1	100	6.3E-07	No	-	-	-	-	Yes	Yes

Notes:
a. Any chemical eliminated as CPEC due to laboratory blank contamination is discussed in Section 3.0.
b. Background comparision for inorganic compounds presented in Attachment 1 Spreadsheet C1-82.
c. Not selected as CPEC since the RFI site sample population for soils at 0 to 6 feet bgs was found to be no different than the background sample population at p=0.05 based on the Wilcoxon Rank Sum Test.
d. Although Wilcoxon Rank Sum Test indicates comparable to background, metal is present at maximum concentrations significantly larger than maximum background concentrations, and in areas of known metals debris contamination. It is subsequently selected as a COPC.
e. Selected as a CPEC because significant number of SQLs are greater than the ESL.
CPEC - chemical of potential ecological concern
ESL - ecological screening level
SQL - sample quantitation limit
VOC - volatile organic chemicals
SVOC - semivolatile organic chemicals
PCBs - polychlorinated biphenyls
Total Tetra - sum of the 2,3,7,8-substituted tetrachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations
Total Penta - sum of the 2,3,7,8-substituted pentachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations
Total Hexa - sum of the 2,3,7,8-substituted hexachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations
Total Hepta - sum of the 2,3,7,8-substituted heptachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations
Total Octa - sum of the octachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations concentrations
PCDD/PDDFs - polychlorinated dibenzo-p-dioxins and dibenzofurans
"-" not applicable
mg/kg - milligrams per kilogram
bgs- below ground surface

Selection of Chemicals of Potential Ecological Concern in Soil/Sediment (0-4 feet bgs)
New Conservation Yard RFI Site

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (mg/kg)	Chemical Detected in Laboratory Blanks [a]	WRS Test Indicates Exceeds Background [b]	Maximum SQL (mg/kg)	SQLs Exceed Background	SQLs Exceed ESLs	Potentially Site Related	CPEC	
Inorganic Compounds												
Aluminum	7	7	100	1.4E+04	No	No		-	No	Yes	No	c
Antimony	11	0	0	-	No	No	1.0E+01	No	Yes	Yes	Yes	e
Arsenic	18	8	44	9.0E+00	No	No	5.0E+00	-	Yes	Yes	No	c
Barium	21	21	100	1.0E+03	No	No		-	No	Yes	Yes	d
Beryllium	18	10	56	7.0E-01	No	No	5.0E-01	-	No	Yes	No	c
Boron	7	0	0	0.0E+00	No	No	5.6E+00	Yes	No	Yes	No	
Cadmium	18	10	56	2.0E+01	No	Yes	1.0E+00	-	Yes	Yes	Yes	
Chromium	18	18	100	7.2E+01	No	No		-	No	Yes	Yes	d
Hexavalent chromium	1	0	0	0.0E+00	No	No	2.2E+00	No	Yes	Yes	No	
Cobalt	18	18	100	1.4E+01	No	No		-	No	Yes	No	c
Copper	18	18	100	2.0E+02	No	No		-	No	Yes	Yes	d
Lead	25	25	100	1.0E+02	No	No		-	No	Yes	Yes	d
Mercury	19	5	26	1.0E+00	No	No	8.7E-03	-	Yes	Yes	Yes	d
Molybdenum	18	0	0	-	No	No	3.3E-01	No	Yes	Yes	Yes	e
Nickel	18	17	94	1.3E+02	No	No	5.0E+00	-	Yes	Yes	Yes	d
Selenium	18	0	0	-	No	No	2.1E-01	No	Yes	Yes	Yes	e
Silver	25	15	60	1.5E+02	No	Yes	5.2E-02	-	Yes	Yes	Yes	
Thallium	18	7	39	3.4E-01	No	No	5.0E+00	-	Yes	Yes	No	c
Vanadium	18	18	100	3.8E+01	No	No		-	No	Yes	No	c
Zinc	22	22	100	3.4E+03	No	Yes		-	No	Yes	Yes	
VOCs												
1,1,1-Trichloroethane	6	0	0	-	No	-	5.0E-02	-	No	Yes	No	
1,1,2,2-Tetrachloroethane	6	0	0	0.0E+00	No	-	5.0E-02	-	No	Yes	No	
1,1,2-Trichloroethane	6	0	0	0.0E+00	No	-	5.0E-02	-	No	Yes	No	
1,1-Dichloroethane	6	0	0	-	No	-	5.0E-02	-	No	Yes	No	
1,1-Dichloroethene	6	0	0	-	No	-	5.0E-02	-	No	Yes	No	
1,2,4-Trichlorobenzene	6	0	0	0.0E+00	No	-	1.7E-01	-	No	Yes	No	
1,2-Dichlorobenzene	6	0	0	0.0E+00	No	-	1.7E-01	-	No	Yes	No	
1,2-Dichloroethane	6	0	0	0.0E+00	No	-	5.0E-02	-	No	Yes	No	
1,2-Dichloropropane	6	0	0	0.0E+00	No	-	5.0E-02	-	No	Yes	No	
1,3-Dichlorobenzene	6	0	0	0.0E+00	No	-	1.7E-01	-	No	Yes	No	
1,4-Dichlorobenzene	6	0	0	0.0E+00	No	-	1.7E-01	-	No	Yes	No	

Selection of Chemicals of Potential Ecological Concern in Soil/Sediment (0-4 feet bgs)
New Conservation Yard RFI Site

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (mg/kg)	Chemical Detected in Laboratory Blanks [a]	WRS Test Indicates Exceeds Background [b]	Maximum SQL (mg/kg)	SQLs Exceed Background	SQLs Exceed ESLs	Potentially Site Related	CPEC
2-Butanone	6	0	0	0.0E+00	No	-	5.0E-01	-	No	Yes	No
2-Chloroethylvinylether	6	0	0	0.0E+00	No	-	5.0E-01	-	No	Yes	No
2-Hexanone	6	0	0	0.0E+00	No	-	5.0E-01	-	No	Yes	No
4-Methyl-2-pentanone	6	0	0	0.0E+00	No	-	5.0E-01	-	No	Yes	No
Acetone	6	0	0	0.0E+00	No	-	5.0E-01		No	Yes	No
Benzene	6	0	0	0.0E+00	No	-	5.0E-02	-	No	Yes	No
Bromodichloromethane	6	0	0	0.0E+00	No	-	5.0E-02	-	No	Yes	No
Bromoform	6	0	0	0.0E+00	No	-	3.0E-01	-	No	Yes	No
Bromomethane	6	0	0	0.0E+00	No	-	5.0E-01	-	No	Yes	No
Carbon disulfide	6	0	0	0.0E+00	No	-	5.0E-02	-	No	Yes	No
Carbon tetrachloride	6	0	0	0.0E+00	No	-	5.0E-02	-	No	Yes	No
Chlorobenzene	6	0	0	0.0E+00	No	-	5.0E-02	-	No	Yes	No
Chloroethane	6	0	0	0.0E+00	No	-	5.0E-02	-	No	Yes	No
Chloroform	6	0	0	0.0E+00	No	-	5.0E-02	-	No	Yes	No
Chloromethane	6	0	0	0.0E+00	No	-	5.0E-01	-	No	Yes	No
cis-1,2-Dichloroethene	-	-	-	-	No	-	-	-	-	Yes	No
cis-1,3-Dichloropropene	6	0	0	0.0E+00	No	-	5.0E-02	-	No	Yes	No
Dibromochloromethane	6	0	0	0.0E+00	No	-	5.0E-02	-	No	Yes	No
Ethylbenzene	6	0	0	0.0E+00	No	-	5.0E-02	-	No	Yes	No
Methylene chloride	6	0	0	0.0E+00	No	-	3.0E-01	-	No	Yes	No
Styrene	6	0	0	0.0E+00	No	-	5.0E-02	-	No	Yes	No
Tetrachloroethene	6	0	0	-	No	-	5.0E-02	-	No	Yes	No
Toluene	6	1	17	1.1E-01	No	-	5.0E-02	-	No	Yes	Yes
trans-1,2-Dichloroethene	6	0	0	0.0E+00	No	-	5.0E-02	-	No	Yes	No
trans-1,3-Dichloropropene	6	0	0	0.0E+00	No	-	5.0E-02	-	No	Yes	No
Trichloroethene	6	0	0	-	No	-	5.0E-02	-	No	Yes	No
Vinyl acetate	6	0	0	0.0E+00	No	-	5.0E-01	-	No	Yes	No
Vinyl chloride	6	0	0	0.0E+00	No	-	5.0E-02	-	No	Yes	No
Xylenes (total)	6	0	0	0.0E+00	No	-	5.0E-02	-	No	Yes	No
SVOCs											
2,4,5-Trichlorophenol	6	0	0	0.0E+00	No	-	8.5E-01	-	No	Yes	No
2,4,6-Trichlorophenol	6	0	0	0.0E+00	No	-	1.7E-01	-	No	Yes	No
2,4-Dichlorophenol	6	0	0	0.0E+00	No	-	1.7E-01	-	No	Yes	No
2,4-Dimethylphenol	6	0	0	0.0E+00	No	-	1.7E-01	-	No	Yes	No

Selection of Chemicals of Potential Ecological Concern in Soil/Sediment (0-4 feet bgs)
New Conservation Yard RFI Site

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (mg/kg)	Chemical Detected in Laboratory Blanks [a]	WRS Test Indicates Exceeds Background [b]	Maximum SQL (mg/kg)	SQLs Exceed Background	SQLs Exceed ESLs	Potentially Site Related	CPEC
2,4-Dinitrophenol	6	0	0	0.0E+00	No	-	8.5E-01	-	Yes	Yes	No
2,4-Dinitrotoluene	6	0	0	0.0E+00	No	-	1.7E-01	-	No	Yes	No
2,6-Dinitrotoluene	6	0	0	0.0E+00	No	-	1.7E-01	-	No	Yes	No
2-Chloronaphthalene	6	0	0	0.0E+00	No	-	1.7E-01	-	No	Yes	No
2-Chlorophenol	6	0	0	0.0E+00	No	-	1.7E-01	-	No	Yes	No
2-Methylnaphthalene	11	0	0	0.0E+00	No	-	4.0E-03	-	No	Yes	No
2-Methylphenol	6	0	0	0.0E+00	No	-	1.7E-01	-	No	Yes	No
2-Nitroaniline	6	0	0	0.0E+00	No	-	8.5E-01	-	No	Yes	No
2-Nitrophenol	6	0	0	0.0E+00	No	-	1.7E-01	-	No	Yes	No
4-Methylphenol	6	0	0	0.0E+00	No	-	1.7E-01	-	No	Yes	No
3,3'-Dichlorobenzidine	6	0	0	0.0E+00	No	-	3.4E-01	-	No	Yes	No
3-Nitroaniline	6	0	0	0.0E+00	No	-	8.5E-01	-	No	Yes	No
4,6-Dinitro-2-methylphenol	6	0	0	0.0E+00	No	-	8.5E-01	-	No	Yes	No
4-Bromophenyl phenyl ether	6	0	0	0.0E+00	No	-	1.7E-01	-	No	Yes	No
4-Chloro-3-methylphenol	6	0	0	0.0E+00	No	-	1.7E-01	-	No	Yes	No
4-Chloroaniline	6	0	0	0.0E+00	No	-	1.7E-01	-	No	Yes	No
4-Chlorophenyl phenyl ether	6	0	0	0.0E+00	No	-	1.7E-01	-	No	Yes	No
4-Nitroaniline	6	0	0	0.0E+00	No	-	8.5E-01	-	No	Yes	No
4-Nitrophenol	6	0	0	0.0E+00	No	-	8.5E-01	-	No	Yes	No
Acenaphthene	12	0	0	-	No	-	4.0E-03	-	No	Yes	No
Acenaphthylene	12	0	0	-	No	-	4.0E-03	-	No	Yes	No
Aniline	6	0	0	0.0E+00	No	-	1.7E-01	-	No	Yes	No
Anthracene	12	0	0	-	No	-	4.0E-03	-	No	Yes	No
Benzidine	6	0	0	0.0E+00	No	-	1.7E+00	-	No	Yes	No
Benzo(a)anthracene	12	1	8	1.2E-02	No	-	2.2E-02	-	No	Yes	Yes
Benzo(a)pyrene	12	2	17	4.3E-02	No	-	2.2E-02	-	No	Yes	Yes
Benzo(b)fluoranthene	12	2	17	6.5E-02	No	-	2.2E-02	-	No	Yes	Yes
Benzo(g,h,i)perylene	12	2	17	3.1E-02	No	-	2.2E-02	-	No	Yes	Yes
Benzo(k)fluoranthene	12	1	8	1.2E-02	No	-	2.2E-02	-	No	Yes	Yes
Benzoic acid	6	0	0	0.0E+00	No	-	8.5E-01	-	No	Yes	No
Benzyl alcohol	6	0	0	0.0E+00	No	-	1.7E-01	-	No	Yes	No
bis(2-Chloroethoxy)methane	6	0	0	0.0E+00	No	-	1.7E-01	-	No	Yes	No
bis(2-Chloroethyl)ether	6	0	0	0.0E+00	No	-	1.7E-01	-	No	Yes	No

Selection of Chemicals of Potential Ecological Concern in Soil/Sediment (0-4 feet bgs)
New Conservation Yard RFI Site

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (mg/kg)	Chemical Detected in Laboratory Blanks [a]	WRS Test Indicates Exceeds Background [b]	Maximum SQL (mg/kg)	SQLs Exceed Background	SQLs Exceed ESLs	Potentially Site Related	CPEC
bis(2-Chloroisopropyl) ether	6	0	0	0.0E+00	No	-	1.7E-01	-	No	Yes	No
bis(2-Ethylhexyl)phthalate	7	0	0	-	No	-	1.0E-01	-	No	Yes	No
Butyl benzyl phthalate	6	0	0	0.0E+00	No	-	1.7E-01	-	No	Yes	No
Chrysene	12	2	17	2.7E-02	No	-	2.2E-02	-	No	Yes	Yes
Dibenz(a,h)anthracene	12	1	8	8.0E-03	No	-	2.2E-02	-	No	Yes	Yes
Dibenzofuran	6	0	0	0.0E+00	No	-	1.7E-01	-	No	Yes	No
Diethylphthalate	7	0	0	-	No	-	1.0E-01	-	No	Yes	No
Dimethyl phthalate	6	0	0	0.0E+00	No	-	1.7E-01	-	No	Yes	No
Di-n-butylphthalate	7	0	0	-	No	-	1.0E-01	-	No	Yes	No
Di-n-octyl phthalate	6	0	0	0.0E+00	No	-	1.7E-01	-	No	Yes	No
Fluoranthene	12	3	25	3.6E-02	No	-	2.2E-02	-	No	Yes	Yes
Fluorene	12	0	0	-	No	-	4.0E-03	-	No	Yes	No
Hexachlorobenzene	6	0	0	0.0E+00	No	-	1.7E-01	-	No	Yes	No
Hexachlorobutadiene	6	0	0	0.0E+00	No	-	1.7E-01	-	No	Yes	No
Hexachlorocyclopentadiene	6	0	0	0.0E+00	No	-	1.7E-01	-	No	Yes	No
Hexachloroethane	6	0	0	0.0E+00	No	-	1.7E-01	-	No	Yes	No
Indeno(1,2,3-cd)pyrene	12	2	17	5.3E-02	No	-	2.2E-02	-	No	Yes	Yes
Isophorone	6	0	0	0.0E+00	No	-	1.7E-01	-	No	Yes	No
Naphthalene	12	0	0	-	No	-	4.0E-03	-	No	Yes	No
Nitrobenzene	6	0	0	0.0E+00	No	-	1.7E-01	-	No	Yes	No
N-Nitrosodimethylamine	12	0	0	-	No	-	2.0E-03	-	No	Yes	No
N-Nitrosodi-n-propylamine	6	0	0	0.0E+00	No	-	1.7E-01	-	No	Yes	No
N-Nitrosodiphenylamine	7	0	0	-	No	-	3.0E-02	-	No	Yes	No
Pentachlorophenol	6	0	0	0.0E+00	No	-	8.5E-01	-	No	Yes	No
Phenanthrene	12	1	8	1.4E-02	No	-	2.2E-02	-	No	Yes	Yes
Phenol	6	0	0	0.0E+00	No	-	1.7E-01	-	No	Yes	No
Pyrene	12	3	25	4.3E-02	No	-	2.2E-02	-	No	Yes	Yes
Total Petroleum Hydrocarbons											
Hydrocarbons	6	0	0	-	No	-	5.0E+00	-	-	No	No
PCDD/PCDFs											
2,3,7,8-TCDD	17	10	59	4.0E-05	No	-	1.1E-07	-	No	Yes	Yes
1,2,3,7,8-PeCDD	17	13	76	9.0E-05	No	-	5.5E-07	-	Yes	Yes	Yes
1,2,3,4,7,8-HxCDD	17	15	88	2.4E-04	No	-	9.6E-07	-	No	Yes	Yes

Selection of Chemicals of Potential Ecological Concern in Soil/Sediment (0-4 feet bgs)
New Conservation Yard RFI Site

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (mg/kg)	Chemical Detected in Laboratory Blanks [a]	WRS Test Indicates Exceeds Background [b]	Maximum SQL (mg/kg)	SQLs Exceed Background	SQLs Exceed ESLs	Potentially Site Related	CPEC
1,2,3,6,7,8-HxCDD	17	16	94	1.2E-03	No	-	1.4E-06	-	No	Yes	Yes
1,2,3,7,8,9-HxCDD	17	16	94	4.7E-04	No	-	1.2E-06	-	No	Yes	Yes
1,2,3,4,6,7,8-HpCDD	17	17	100	2.7E-02	No	-		-	No	Yes	Yes
OCDD	17	17	100	3.0E-01	No	-		-	No	Yes	Yes
2,3,7,8-TCDF	17	14	82	1.0E-05	No	-	4.0E-08	-	No	Yes	Yes
1,2,3,7,8-PeCDF	17	14	82	1.0E-05	No	-	1.8E-07	-	No	Yes	Yes
2,3,4,7,8-PeCDF	17	16	94	3.0E-05	No	-	4.4E-07	-	No	Yes	Yes
1,2,3,4,7,8-HxCDF	17	16	94	1.5E-04	No	-	4.0E-07	-	No	Yes	Yes
1,2,3,6,7,8-HxCDF	17	14	82	1.1E-04	No	-	7.9E-07	-	No	Yes	Yes
2,3,4,6,7,8-HxCDF	17	16	94	2.8E-04	No	-	6.4E-07	-	No	Yes	Yes
1,2,3,7,8,9-HxCDF	17	15	88	3.0E-05	No	-	2.9E-07	-	No	Yes	Yes
1,2,3,4,6,7,8-HpCDF	17	13	76	5.7E-03	No	-	1.0E-05	-	No	Yes	Yes
1,2,3,4,7,8,9-HpCDF	17	16	94	4.9E-04	No	-	9.2E-07	-	No	Yes	Yes
OCDF	17	17	100	1.5E-02	No	-		-	No	Yes	Yes
Total Tetra	-	-	-	-	-	Yes	-	-	-	Yes	-
Total Penta	-	-	-	-	-	Yes	-	-	-	Yes	-
Total Hexa	-	-	-	-	-	Yes	-	-	-	Yes	-
Total Hepta	-	-	-	-	-	Yes	-	-	-	Yes	-
Total Octa	-	-	-	-	-	Yes	-	-	-	Yes	-
PCDD/PCDF	-	-	-	-	-	-	-	-	-	Yes	Yes
Aroclor-1016	4	0	0	-	No	-	1.9E-01	-	No	No	No
Aroclor-1221	4	0	0	-	No	-	1.9E-01	-	No	No	No
Aroclor-1232	4	0	0	-	No	-	1.9E-01	-	No	No	No
Aroclor-1242	4	0	0	-	No	-	1.9E-01	-	No	No	No
Aroclor-1248	4	0	0	-	No	-	1.9E-01	-	Yes	No	No
Aroclor-1254	5	1	20	7.1E-02	No	-	1.9E-01	-	No	Yes	Yes
Aroclor-1260	4	0	0	-	No	-	1.9E-01	-	No	Yes	No
PCB-105	1	1	100	2.6E-05	No	-	-	-	-	Yes	Yes
PCB-114	1	1	100	9.5E-07	No	-	-	-	-	Yes	Yes
PCB-118	1	1	100	5.6E-05	No	-	-	-	-	Yes	Yes
PCB-123	1	1	100	6.3E-07	No	-	-	-	-	Yes	Yes
PCB-126	1	1	100	1.6E-06	No	-	-	-	-	Yes	Yes
PCB-156	1	1	100	1.3E-05	No	-	-	-	-	Yes	Yes

Selection of Chemicals of Potential Ecological Concern in Soil/Sediment (0-4 feet bgs)
New Conservation Yard RFI Site

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (mg/kg)	Chemical Detected in Laboratory Blanks [a]	WRS Test Indicates Exceeds Background [b]	Maximum SQL (mg/kg)	SQLs Exceed Background	SQLs Exceed ESLs	Potentially Site Related	CPEC
PCB-157	1	1	100	2.8E-06	No	-	-	-	-	Yes	Yes
PCB-167	1	1	100	4.9E-06	No	-	-	-	-	Yes	Yes
PCB-169	1	1	100	7.7E-08	No	-	-	-	-	Yes	Yes
PCB-189	1	1	100	7.3E-07	No	-	-	-	-	Yes	Yes
PCB-77	1	1	100	3.2E-06	No	-	-	-	-	Yes	Yes
PCB-81	1	1	100	6.3E-07	No	-	-	-	-	Yes	Yes

Notes:
a. Any chemical eliminated as CPEC due to laboratory blank contamination is discussed in Section 3.0.
b. Background comparision for inorganic compounds presented in Attachment 1 Spreadsheet C1-82.
c. Not selected as CPEC since the RFI site sample population for soils at 0 to 4 feet bgs was found to be no different than the background sample population at p=0.01 based on the Wilcoxon Rank Sum Test.
d. Selected as a CPEC since either petroleum hydrocarbon fraction C11-C14, C14-C20, or C20-C30 was selected as a CPEC.
CPEC - chemical of potential ecological concern
ESL - ecological screening level
SQL - sample quantitation limit
VOC - volatile organic chemicals
SVOC - semivolatile organic chemicals
PCBs - polychlorinated biphenyls
Total Tetra - sum of the 2,3,7,8-substituted tetrachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations
Total Penta - sum of the 2,3,7,8-substituted pentachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations
Total Hexa - sum of the 2,3,7,8-substituted hexachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations
Total Hepta - sum of the 2,3,7,8-substituted heptachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations
Total Octa - sum of the octachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations concentrations
PCDD/PDDFs - polychlorinated dibenzo-p-dioxins and dibenzofurans
"-" not applicable
mg/kg - milligrams per kilogram
bgs- below ground surface

Selection of Chemicals of Potential Ecological Concern in Soil/Sediment (0-2 feet bgs)
New Conservation Yard RFI Site

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (mg/kg)	Chemical Detected in Laboratory Blanks [a]	WRS Test Indicates Exceeds Background [b]	Maximum SQL (mg/kg)	SQLs Exceed Background	SQLs Exceed ESLs	Potentially Site Related	CPEC
Inorganic Compounds											
Aluminum	7	7	100	1.4E+04	No	No		-	No	Yes	No [c]
Antimony	10	0	0	-	No	No	1.2E+01	No	Yes	Yes	Yes [e]
Arsenic	17	8	47	9.0E+00	No	No	6.0E+00	-	Yes	Yes	No [c]
Barium	20	20	100	1.0E+03	No	No		-	No	Yes	Yes [d]
Beryllium	17	9	53	7.0E-01	No	No	6.0E-01	-	No	Yes	No [c]
Boron	7	0	0	0.0E+00	No	No	7.6E+00	No	No	Yes	No [c]
Cadmium	17	10	59	2.0E+01	No	Yes	1.0E+00	-	Yes	Yes	Yes
Chromium	17	17	100	7.2E+01	No	No		-	No	Yes	Yes [d]
Hexavalent chromium	1	0	0	0.0E+00	No	No	2.2E+00	Yes	Yes	Yes	No
Cobalt	17	17	100	1.4E+01	No	No		-	No	Yes	No [c]
Copper	17	17	100	2.0E+02	No	No		-	No	Yes	Yes [d]
Lead	23	23	100	1.0E+02	No	No		-	No	Yes	Yes [d]
Mercury	18	5	28	1.0E+00	No	No	2.0E-01	-	Yes	Yes	Yes [d]
Molybdenum	17	0	0	-	No	No	1.2E+01	No	Yes	Yes	Yes [e]
Nickel	17	16	94	1.3E+02	No	No	5.0E+00	-	Yes	Yes	Yes [d]
Selenium	17	0	0	-	No	No	6.0E+00	No	Yes	Yes	Yes [e]
Silver	24	15	63	1.5E+02	No	Yes	1.0E+00	-	Yes	Yes	Yes
Thallium	17	7	41	3.4E-01	No	No	6.0E+00	-	Yes	Yes	No [c]
Vanadium	17	17	100	3.8E+01	No	No		-	No	Yes	No [c]
Zinc	20	20	100	3.4E+03	No	Yes		-	No	Yes	Yes
VOCs											
1,1,1-Trichloroethane	3	0	0	0.0E+00	No	-	5.0E-02	-	No	Yes	No
1,1,2,2-Tetrachloroethane	3	0	0	0.0E+00	No	-	5.0E-02	-	No	Yes	No
1,1,2-Trichloroethane	3	0	0	0.0E+00	No	-	5.0E-02	-	No	Yes	No
1,1-Dichloroethane	3	0	0	0.0E+00	No	-	5.0E-02	-	No	Yes	No
1,1-Dichloroethene	3	0	0	0.0E+00	No	-	5.0E-02	-	No	Yes	No
1,2,4-Trichlorobenzene	3	0	0	0.0E+00	No	-	1.7E-01	-	No	Yes	No
1,2-Dichlorobenzene	3	0	0	0.0E+00	No	-	1.7E-01	-	No	Yes	No
1,2-Dichloroethane	3	0	0	0.0E+00	No	-	5.0E-02	-	No	Yes	No
1,2-Dichloropropane	3	0	0	0.0E+00	No	-	5.0E-02	-	No	Yes	No
1,3-Dichlorobenzene	3	0	0	0.0E+00	No	-	1.7E-01	-	No	Yes	No
1,4-Dichlorobenzene	3	0	0	0.0E+00	No	-	1.7E-01	-	No	Yes	No

Selection of Chemicals of Potential Ecological Concern in Soil/Sediment (0-2 feet bgs)
New Conservation Yard RFI Site

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (mg/kg)	Chemical Detected in Laboratory Blanks [a]	WRS Test Indicates Exceeds Background [b]	Maximum SQL (mg/kg)	SQLs Exceed Background	SQLs Exceed ESLs	Potentially Site Related	CPEC
2-Butanone	3	0	0	0.0E+00	No	-	5.0E-01	-	No	Yes	No
2-Chloroethylvinylether	3	0	0	0.0E+00	No	-	5.0E-01	-	No	Yes	No
2-Hexanone	3	0	0	0.0E+00	No	-	5.0E-01	-	No	Yes	No
4-Methyl-2-pentanone	3	0	0	0.0E+00	No	-	5.0E-01	-	No	Yes	No
Acetone	3	0	0	0.0E+00	No	-	5.0E-01	-	No	Yes	No
Benzene	3	0	0	0.0E+00	No	-	5.0E-02	-	No	Yes	No
Bromodichloromethane	3	0	0	0.0E+00	No	-	5.0E-02	-	No	Yes	No
Bromoform	3	0	0	0.0E+00	No	-	3.0E-01	-	No	Yes	No
Bromomethane	3	0	0	0.0E+00	No	-	5.0E-01	-	No	Yes	No
Carbon disulfide	3	0	0	0.0E+00	No	-	5.0E-02	-	No	Yes	No
Carbon tetrachloride	3	0	0	0.0E+00	No	-	5.0E-02	-	No	Yes	No
Chlorobenzene	3	0	0	0.0E+00	No	-	5.0E-02	-	No	Yes	No
Chloroethane	3	0	0	0.0E+00	No	-	5.0E-02	-	No	Yes	No
Chloroform	3	0	0	0.0E+00	No	-	5.0E-02	-	No	Yes	No
Chloromethane	3	0	0	0.0E+00	No	-	5.0E-01	-	No	Yes	No
cis-1,3-Dichloropropene	3	0	0	0.0E+00	No	-	5.0E-02	-	No	Yes	No
Dibromochloromethane	3	0	0	0.0E+00	No	-	5.0E-02	-	No	Yes	No
Dichlorobenzenes	3	0	0	0.0E+00	No	-	5.0E-02	-	No	Yes	No
Ethylbenzene	3	0	0	0.0E+00	No	-	5.0E-02	-	No	Yes	No
Methylene chloride	3	0	0	0.0E+00	No	-	3.0E-01	-	No	Yes	No
Styrene	3	0	0	0.0E+00	No	-	5.0E-02	-	No	Yes	No
Tetrachloroethene	3	0	0	0.0E+00	No	-	5.0E-02	-	No	Yes	No
Toluene	3	1	33	1.1E-01	No	-	5.0E-02	-	No	Yes	Yes
trans-1,2-Dichloroethene	3	0	0	0.0E+00	No	-	5.0E-02	-	No	Yes	No
trans-1,3-Dichloropropene	3	0	0	0.0E+00	No	-	5.0E-02	-	No	Yes	No
Trichloroethene	3	0	0	0.0E+00	No	-	5.0E-02	-	No	Yes	No
Vinyl acetate	3	0	0	0.0E+00	No	-	5.0E-01	-	No	Yes	No
Vinyl chloride	3	0	0	0.0E+00	No	-	5.0E-02	-	No	Yes	No
Xylenes (total)	3	0	0	0.0E+00	No	-	5.0E-02	-	No	Yes	No
SVOCs											
2,4,5-Trichlorophenol	3	0	0	0.0E+00	No	-	8.5E-01	-	No	No	No
2,4,6-Trichlorophenol	3	0	0	0.0E+00	No	-	1.7E-01	-	No	No	No
2,4-Dichlorophenol	3	0	0	0.0E+00	No	-	1.7E-01	-	No	No	No
2,4-Dimethylphenol	3	0	0	0.0E+00	No	-	1.7E-01	-	No	No	No

Selection of Chemicals of Potential Ecological Concern in Soil/Sediment (0-2 feet bgs)
New Conservation Yard RFI Site

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (mg/kg)	Chemical Detected in Laboratory Blanks [a]	WRS Test Indicates Exceeds Background [b]	Maximum SQL (mg/kg)	SQLs Exceed Background	SQLs Exceed ESLs	Potentially Site Related	CPEC
2,4-Dinitrophenol	3	0	0	0.0E+00	No	-	8.5E-01	-	Yes	No	No
2,4-Dinitrotoluene	3	0	0	0.0E+00	No	-	1.7E-01	-	No	No	No
2,6-Dinitrotoluene	3	0	0	0.0E+00	No	-	1.7E-01	-	No	No	No
2-Chloronaphthalene	3	0	0	0.0E+00	No	-	1.7E-01	-	No	No	No
2-Chlorophenol	3	0	0	0.0E+00	No	-	1.7E-01	-	No	No	No
2-Methylnaphthalene	8	0	0	0.0E+00	No	-	4.0E-03	-	No	No	No
2-Methylphenol	3	0	0	0.0E+00	No	-	1.7E-01	-	No	No	No
2-Nitroaniline	3	0	0	0.0E+00	No	-	8.5E-01	-	No	No	No
2-Nitrophenol	3	0	0	0.0E+00	No	-	1.7E-01	-	No	No	No
4-Methylphenol	3	0	0	0.0E+00	No	-	1.7E-01	-	No	No	No
3,3'-Dichlorobenzidine	3	0	0	0.0E+00	No	-	3.4E-01	-	No	No	No
3-Nitroaniline	3	0	0	0.0E+00	No	-	8.5E-01	-	No	No	No
4,6-Dinitro-2-methylphenol	3	0	0	0.0E+00	No	-	8.5E-01	-	No	No	No
4-Bromophenyl phenyl ether	3	0	0	0.0E+00	No	-	1.7E-01	-	No	No	No
4-Chloro-3-methylphenol	3	0	0	0.0E+00	No	-	1.7E-01	-	No	No	No
4-Chloroaniline	3	0	0	0.0E+00	No	-	1.7E-01	-	No	No	No
4-Chlorophenyl phenyl ether	3	0	0	0.0E+00	No	-	1.7E-01	-	No	No	No
4-Nitroaniline	3	0	0	0.0E+00	No	-	8.5E-01	-	No	No	No
4-Nitrophenol	3	0	0	0.0E+00	No	-	8.5E-01	-	No	No	No
Acenaphthene	9	0	0	0.0E+00	No	-	4.0E-03	-	No	Yes	No
Acenaphthylene	9	0	0	0.0E+00	No	-	4.0E-03	-	No	Yes	No
Aniline	3	0	0	0.0E+00	No	-	1.7E-01	-	No	No	No
Anthracene	9	0	0	0.0E+00	No	-	4.0E-03	-	No	Yes	No
Benzidine	3	0	0	0.0E+00	No	-	1.7E+00	-	No	No	No
Benzo(a)anthracene	9	1	11	1.2E-02	No	-	2.2E-02	-	No	Yes	Yes
Benzo(a)pyrene	9	2	22	4.3E-02	No	-	2.2E-02	-	No	Yes	Yes
Benzo(b)fluoranthene	9	2	22	6.5E-02	No	-	2.2E-02	-	No	Yes	Yes
Benzo(g,h,i)perylene	9	2	22	3.1E-02	No	-	2.2E-02	-	No	Yes	Yes
Benzo(k)fluoranthene	9	1	11	1.2E-02	No	-	2.2E-02	-	No	Yes	Yes
Benzoic acid	3	0	0	0.0E+00	No	-	8.5E-01	-	No	No	No
Benzyl alcohol	3	0	0	0.0E+00	No	-	1.7E-01	-	No	No	No
bis(2-Chloroethoxy)methane	3	0	0	0.0E+00	No	-	1.7E-01	-	No	No	No
bis(2-Chloroethyl)ether	3	0	0	0.0E+00	No	-	1.7E-01	-	No	No	No

Spreadsheet C1-75 (4 of 6)

Selection of Chemicals of Potential Ecological Concern in Soil/Sediment (0-2 feet bgs)
New Conservation Yard RFI Site

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (mg/kg)	Chemical Detected in Laboratory Blanks [a]	WRS Test Indicates Exceeds Background [b]	Maximum SQL (mg/kg)	SQLs Exceed Background	SQLs Exceed ESLs	Potentially Site Related	CPEC
bis(2-Chloroisopropyl) ether	3	0	0	0.0E+00	No	-	1.7E-01	-	No	No	No
bis(2-Ethylhexyl)phthalate	4	0	0	-	No	-	1.0E-01	-	No	No	No
Butyl benzyl phthalate	3	0	0	0.0E+00	No	-	1.7E-01	-	No	No	No
Chrysene	9	2	22	2.7E-02	No	-	2.2E-02	-	No	Yes	Yes
Dibenz(a,h)anthracene	9	1	11	8.0E-03	No	-	2.2E-02	-	No	Yes	Yes
Dibenzofuran	3	0	0	0.0E+00	No	-	1.7E-01	-	No	No	No
Diethylphthalate	4	0	0	-	No	-	1.0E-01	-	No	No	No
Dimethyl phthalate	3	0	0	0.0E+00	No	-	1.7E-01	-	No	No	No
Di-n-butylphthalate	4	0	0	-	No	-	1.0E-01	-	No	No	No
Di-n-octyl phthalate	3	0	0	0.0E+00	No	-	1.7E-01	-	No	No	No
Fluoranthene	9	3	33	3.6E-02	No	-	2.2E-02	-	No	Yes	Yes
Fluorene	9	0	0	-	No	-	4.0E-03	-	No	Yes	No
Hexachlorobenzene	3	0	0	0.0E+00	No	-	1.7E-01	-	No	No	No
Hexachlorobutadiene	3	0	0	0.0E+00	No	-	1.7E-01	-	No	No	No
Hexachlorocyclopentadiene	3	0	0	0.0E+00	No	-	1.7E-01	-	No	No	No
Hexachloroethane	3	0	0	0.0E+00	No	-	1.7E-01	-	No	No	No
Indeno(1,2,3-cd)pyrene	9	2	22	5.3E-02	No	-	2.2E-02	-	No	Yes	Yes
Isophorone	3	0	0	0.0E+00	No	-	1.7E-01	-	No	No	No
Naphthalene	9	0	0	-	No	-	4.0E-03	-	No	No	No
Nitrobenzene	3	0	0	0.0E+00	No	-	1.7E-01	-	No	No	No
N-Nitrosodimethylamine	9	0	0	-	No	-	2.0E-03	-	No	No	No
N-Nitrosodi-n-propylamine	3	0	0	0.0E+00	No	-	1.7E-01	-	No	No	No
N-Nitrosodiphenylamine	4	0	0	-	No	-	3.0E-02	-	No	No	No
Pentachlorophenol	3	0	0	0.0E+00	No	-	8.5E-01	-	No	No	No
Phenanthrene	9	1	11	1.4E-02	No	-	2.2E-02	-	No	Yes	Yes
Phenol	3	0	0	0.0E+00	No	-	1.7E-01	-	No	No	No
Pyrene	9	3	33	4.3E-02	No	-	2.2E-02	-	No	Yes	Yes
Total Petroleum Hydrocarbons											
Hydrocarbons	3	0	0	-	No	-	5.0E+00	-	-	Yes	No
PCDD/PCDFs											
2,3,7,8-TCDD	16	10	63	4.0E-05	No	-	1.1E-07	-	No	Yes	Yes
1,2,3,7,8-PeCDD	16	12	75	9.0E-05	No	-	5.5E-07	-	Yes	Yes	Yes
1,2,3,4,7,8-HxCDD	16	14	88	2.4E-04	No	-	9.6E-07	-	No	Yes	Yes

Spreadsheet C1-75 (5 of 6)

Selection of Chemicals of Potential Ecological Concern in Soil/Sediment (0-2 feet bgs)
New Conservation Yard RFI Site

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (mg/kg)	Chemical Detected in Laboratory Blanks [a]	WRS Test Indicates Exceeds Background [b]	Maximum SQL (mg/kg)	SQLs Exceed Background	SQLs Exceed ESLs	Potentially Site Related	CPEC
1,2,3,6,7,8-HxCDD	16	15	94	1.2E-03	No	-	1.4E-06	-	No	Yes	Yes
1,2,3,7,8,9-HxCDD	16	15	94	4.7E-04	No	-	1.2E-06	-	No	Yes	Yes
1,2,3,4,6,7,8-HpCDD	16	16	100	2.7E-02	No	-		-	No	Yes	Yes
OCDD	16	16	100	3.0E-01	No	-		-	No	Yes	Yes
2,3,7,8-TCDF	16	14	88	1.0E-05	No	-	3.7E-07	-	No	Yes	Yes
1,2,3,7,8-PeCDF	16	13	81	1.0E-05	No	-	1.8E-07	-	No	Yes	Yes
2,3,4,7,8-PeCDF	16	15	94	3.0E-05	No	-	4.4E-07	-	No	Yes	Yes
1,2,3,4,7,8-HxCDF	16	15	94	1.5E-04	No	-	4.0E-07	-	No	Yes	Yes
1,2,3,6,7,8-HxCDF	16	13	81	1.1E-04	No	-	7.9E-07	-	No	Yes	Yes
2,3,4,6,7,8-HxCDF	16	15	94	2.8E-04	No	-	6.4E-07	-	No	Yes	Yes
1,2,3,7,8,9-HxCDF	16	14	88	3.0E-05	No	-	2.9E-07	-	No	Yes	Yes
1,2,3,4,6,7,8-HpCDF	16	12	75	5.7E-03	No	-	1.0E-05	-	No	Yes	Yes
1,2,3,4,7,8,9-HpCDF	16	15	94	4.9E-04	No	-	9.2E-07	-	No	Yes	Yes
OCDF	16	16	100	1.5E-02	No	-		-	No	Yes	Yes
Total Tetra	-	-	-	-	-	Yes	-	-	-	-	No
Total Penta	-	-	-	-	-	Yes	-	-	-	-	No
Total Hexa	-	-	-	-	-	Yes	-	-	-	-	No
Total Hepta	-	-	-	-	-	Yes	-	-	-	-	Yes
Total Octa	-	-	-	-	-	Yes	-	-	-	-	Yes
PCDD/PCDF	-	-	-	-	-	-	-	-	-	-	Yes
PCBs											
Aroclor-1016	4	0	0	-	No	-	1.9E-01	-	No	No	No
Aroclor-1221	4	0	0	-	No	-	1.9E-01	-	No	No	No
Aroclor-1232	4	0	0	-	No	-	1.9E-01	-	No	No	No
Aroclor-1242	4	0	0	-	No	-	1.9E-01	-	No	No	No
Aroclor-1248	4	0	0	-	No	-	1.9E-01	-	Yes	No	No
Aroclor-1254	5	1	20	7.1E-02	No	-	1.9E-01	-	No	Yes	Yes
Aroclor-1260	4	0	0	-	No	-	1.9E-01	-	No	Yes	No
PCB-105	1	1	100	2.6E-05	No	-	-	-	-	Yes	Yes
PCB-114	1	1	100	9.5E-07	No	-	-	-	-	Yes	Yes
PCB-118	1	1	100	5.6E-05	No	-	-	-	-	Yes	Yes
PCB-123	1	1	100	6.3E-07	No	-	-	-	-	Yes	Yes
PCB-126	1	1	100	1.6E-06	No	-	-	-	-	Yes	Yes

Selection of Chemicals of Potential Ecological Concern in Soil/Sediment (0-2 feet bgs)
New Conservation Yard RFI Site

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (mg/kg)	Chemical Detected in Laboratory Blanks [a]	WRS Test Indicates Exceeds Background [b]	Maximum SQL (mg/kg)	SQLs Exceed Background	SQLs Exceed ESLs	Potentially Site Related	CPEC
PCB-156	1	1	100	1.3E-05	No	-	-	-	-	Yes	Yes
PCB-157	1	1	100	2.8E-06	No	-	-	-	-	Yes	Yes
PCB-167	1	1	100	4.9E-06	No	-	-	-	-	Yes	Yes
PCB-169	1	1	100	7.7E-08	No	-	-	-	-	Yes	Yes
PCB-189	1	1	100	7.3E-07	No	-	-	-	-	Yes	Yes
PCB-77	1	1	100	3.2E-06	No	-	-	-	-	Yes	Yes
PCB-81	1	1	100	6.3E-07	No	-	-	-	-	Yes	Yes

Notes:
a. Any chemical eliminated as CPEC due to laboratory blank contamination is discussed in Section 3.0.
b. Background comparision for inorganic compounds presented in Attachment 1 Spreadsheet C1-82.
c. Not selected as CPEC since the RFI site sample population for soils at 0 to 2 feet bgs was found to be no different than the background sample population at p=0.05 based on the Wilcoxon Rank Sum Test.
d. Although Wilcoxon Rank Sum Test indicates comparable to background, metal is present at maximum concentrations significantly larger than maximum background concentrations, and in areas of known metals debris contamination. It is subsequently selected as a COPC.
CPEC - chemical of potential ecological concern
ESL - ecological screening level
SQL - sample quantitation limit
SVOC - semivolatile organic chemicals
PCBs - polychlorinated biphenyls
Total Tetra - sum of the 2,3,7,8-substituted tetrachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations
Total Penta - sum of the 2,3,7,8-substituted pentachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations
Total Hexa - sum of the 2,3,7,8-substituted hexachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations
Total Hepta - sum of the 2,3,7,8-substituted heptachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations
Total Octa - sum of the octachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations concentrations
PCDD/PDDFs - polychlorinated dibenzo-p-dioxins and dibenzofurans
"-" not applicable
mg/kg - milligrams per kilogram
bgs- below ground surface

Estimates of Human Intake
Edible Plant Ingestion Pathway for Child Resident
New Conservation Yard RFI Site

Intake Equation: Dosage = $\frac{C \times IR \times CF \times F \times EF \times ED \times B}{BW \times AT}$

Exposure Parameters		Units	Typical	RME
Plant concentration	C	mg/kg	CS	CS
Plant ingestion rate	IR	g/day	47	166
Conversion factor	CF	kg/g	1.E-03	1.E-03
Fraction locally grown	F	unitless	0.24	1.0
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	6	6
Bioavailability	B	fraction	CS	CS
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
Inorganic Compounds							
Barium	1.7E+01	7.4E+01	1.2E-02	5.4E-02	9.8E-04	6.3E-02	1
Cadmium	9.2E-02	6.8E-01	6.7E-05	5.0E-04	5.4E-06	5.8E-04	1
Chromium	2.3E-02	3.9E-02	1.6E-05	2.9E-05	1.3E-06	3.4E-05	1
Copper	0.0E+00	0.0E+00	0.0E+00	0.0E+00	0.0E+00	0.0E+00	1
Lead	9.8E-02	1.3E-01	7.2E-05	9.7E-05	5.7E-06	1.1E-04	1
Mercury	9.7E-03	5.1E-02	7.0E-06	3.7E-05	5.6E-07	4.3E-05	1
Molybdenum	7.5E-02	1.3E-01	5.5E-05	9.8E-05	4.4E-06	1.1E-04	1
Nickel	2.3E-01	5.9E-01	1.7E-04	4.3E-04	1.4E-05	5.0E-04	1
Nitrate	NC	NC	NA	NA	NA	NA	1
Selenium	6.0E-02	1.1E-01	4.4E-05	7.9E-05	3.5E-06	9.3E-05	1
Silver	4.2E-03	2.6E-02	3.1E-06	1.9E-05	2.5E-07	2.2E-05	1
Thallium	NC	NC	NA	NA	NA	NA	1
Zinc	1.1E+02	5.4E+02	7.7E-02	3.9E-01	6.1E-03	4.6E-01	1
VOCs							
1,1-Dichloroethane	NC	NC	NA	NA	NA	NA	1
1,2-Dichloroethane	NC	NC	NA	NA	NA	NA	1
Acetone	NC	NC	NA	NA	NA	NA	1
Benzene	NC	NC	NA	NA	NA	NA	1
Carbon disulfide	NC	NC	NA	NA	NA	NA	1
Chloromethane	NC	NC	NA	NA	NA	NA	1
cis-1,2-Dichloroethene	NC	NC	NA	NA	NA	NA	1
Methylene chloride	NC	NC	NA	NA	NA	NA	1
Toluene	1.9E-01	4.0E-01	1.4E-04	2.9E-04	1.1E-05	3.4E-04	1
Trichloroethene	NC	NC	NA	NA	NA	NA	1
SVOCs							
Benzo(a)anthracene	2.5E-03	8.3E-04	1.8E-06	6.0E-07	1.5E-07	7.0E-07	1
Benzo(a)pyrene	1.2E-03	1.3E-03	8.4E-07	9.1E-07	6.7E-08	1.1E-06	1
Benzo(b)fluoranthene	1.4E-03	2.0E-03	9.9E-07	1.5E-06	7.9E-08	1.7E-06	1
Benzo(g,h,i)perylene	9.2E-04	7.3E-04	6.7E-07	5.3E-07	5.3E-08	6.2E-07	1
Benzo(k)fluoranthene	1.5E-03	5.1E-04	1.1E-06	3.7E-07	9.0E-08	4.3E-07	1
Chrysene	2.5E-03	1.7E-03	1.8E-06	1.3E-06	1.5E-07	1.5E-06	1
Dibenz(a,h)anthracene	5.4E-04	1.2E-04	3.9E-07	8.7E-08	3.1E-08	1.0E-07	1
Fluoranthene	6.5E-03	5.5E-03	4.7E-06	4.0E-06	3.8E-07	4.7E-06	1
Indeno(1,2,3-cd)pyrene	3.6E-04	4.6E-04	2.6E-07	3.4E-07	2.1E-08	3.9E-07	1
Phenanthrene	1.1E-02	4.3E-03	8.3E-06	3.2E-06	6.6E-07	3.7E-06	1
Pyrene	7.3E-03	7.3E-03	5.3E-06	5.3E-06	4.2E-07	6.2E-06	1

Spreadsheet C1-74 (2 of 3)

Estimates of Human Intake
Edible Plant Ingestion Pathway for Child Resident
New Conservation Yard RFI Site

Intake Equation: Dosage = $\frac{C \times IR \times CF \times F \times EF \times ED \times B}{BW \times AT}$

Exposure Parameters		Units	Typical	RME
Plant concentration	C	mg/kg	CS	CS
Plant ingestion rate	IR	g/day	47	166
Conversion factor	CF	kg/g	1.E-03	1.E-03
Fraction locally grown	F	unitless	0.24	1.0
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	6	6
Bioavailability	B	fraction	CS	CS
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
Total Petroleum Hydrocarbons							
C20-C30(Lubricant Oil Range)	NC	NC	NA	NA	NA	NA	1
PCDD/PCDFs							
2,3,7,8-TCDD	NC	NC	NA	NA	NA	NA	1
1,2,3,7,8-PeCDD	NC	NC	NA	NA	NA	NA	1
1,2,3,4,7,8-HxCDD	NC	NC	NA	NA	NA	NA	1
1,2,3,6,7,8-HxCDD	NC	NC	NA	NA	NA	NA	1
1,2,3,7,8,9-HxCDD	NC	NC	NA	NA	NA	NA	1
1,2,3,4,6,7,8-HpCDD	NC	NC	NA	NA	NA	NA	1
OCDD	NC	NC	NA	NA	NA	NA	1
2,3,7,8-TCDF	NC	NC	NA	NA	NA	NA	1
1,2,3,7,8-PeCDF	NC	NC	NA	NA	NA	NA	1
2,3,4,7,8-PeCDF	NC	NC	NA	NA	NA	NA	1
1,2,3,4,7,8-HxCDF	NC	NC	NA	NA	NA	NA	1
1,2,3,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA	1
2,3,4,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA	1
1,2,3,7,8,9-HxCDF	NC	NC	NA	NA	NA	NA	1
1,2,3,4,6,7,8-HpCDF	NC	NC	NA	NA	NA	NA	1
1,2,3,4,7,8,9-HpCDF	NC	NC	NA	NA	NA	NA	1
OCDF	NC	NC	NA	NA	NA	NA	1
Total Tetra	NC	NC	NA	NA	NA	NA	1
Total Penta	NC	NC	NA	NA	NA	NA	1
Total Hexa	NC	NC	NA	NA	NA	NA	1
Total Hepta	NC	NC	NA	NA	NA	NA	1
Total Octa	NC	NC	NA	NA	NA	NA	1
PCDD/PCDF	NC	NC	NA	NA	NA	NA	1

Spreadsheet C1-74 (3 of 3)

Estimates of Human Intake
Edible Plant Ingestion Pathway for Child Resident
New Conservation Yard RFI Site

Intake Equation: Dosage = $\frac{C \times IR \times CF \times F \times EF \times ED \times B}{BW \times AT}$

Exposure Parameters		Units	Typical	RME
Plant concentration	C	mg/kg	CS	CS
Plant ingestion rate	IR	g/day	47	166
Conversion factor	CF	kg/g	1.E-03	1.E-03
Fraction locally grown	F	unitless	0.24	1.0
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	6	6
Bioavailability	B	fraction	CS	CS
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
PCBs							
Aroclor-1254	2.2E-03	2.2E-03	1.6E-06	1.6E-06	1.3E-07	1.9E-06	1
PCB-105	4.8E-07	6.5E-07	3.5E-10	4.7E-10	2.8E-11	5.5E-10	1
PCB-114	1.7E-08	2.4E-08	1.3E-11	1.7E-11	1.0E-12	2.0E-11	1
PCB-118	1.0E-06	1.4E-06	7.5E-10	1.0E-09	6.0E-11	1.2E-09	1
PCB-123	1.1E-08	1.6E-08	8.4E-12	1.1E-11	6.7E-13	1.3E-11	1
PCB-126	2.9E-08	4.0E-08	2.1E-11	2.9E-11	1.7E-12	3.4E-11	1
PCB-156	2.4E-07	3.3E-07	1.8E-10	2.4E-10	1.4E-11	2.8E-10	1
PCB-157	7.9E-08	8.4E-08	5.7E-11	6.1E-11	4.6E-12	7.1E-11	1
PCB-167	1.4E-07	1.5E-07	9.9E-11	1.1E-10	7.9E-12	1.2E-10	1
PCB-169	2.1E-09	2.3E-09	1.5E-12	1.7E-12	1.2E-13	2.0E-12	1
PCB-189	2.0E-08	2.2E-08	1.5E-11	1.6E-11	1.2E-12	1.8E-11	1
PCB-77	3.4E-08	4.6E-08	2.5E-11	3.4E-11	2.0E-12	3.9E-11	1
PCB-81	6.6E-09	9.0E-09	4.8E-12	6.5E-12	3.8E-13	7.6E-12	1

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyls
mg/kg-day - milligrams per kilogram per day
mg/kg - milligrams per kilogram

Estimates of Human Intake
Domestic Groundwater Use for Child Resident
New Conservation Yard RFI Site

Intake Equation: Dosage = $\frac{C \times IR \times FT \times EF \times ED \times B}{BW \times AT}$

Exposure Parameters		Units	Typical	RME
Groundwater concentration	C	mg/L	CS	CS
Groundwater ingestion rate$_{voc}$	IR	L/day	1.5	2.5
Groundwater ingestion rate$_{non\text{-}vocs}$	IR	L/day	0.75	1.25
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	6	6
Bioavailability	B	fraction	CS	CS
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/L)	RME EPC (mg/L)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
Inorganic Compounds							
Barium	NC	NC	NA	NA	NA	NA	1
Cadmium	NC	NC	NA	NA	NA	NA	1
Chromium	NC	NC	NA	NA	NA	NA	1
Copper	1.8E-02	1.8E-02	8.6E-04	1.4E-03	6.9E-05	1.2E-04	1
Fluoride	5.6E-01	5.6E-01	2.7E-02	4.5E-02	2.1E-03	3.6E-03	1
Lead	NC	NC	NA	NA	NA	NA	1
Mercury	NC	NC	NA	NA	NA	NA	1
Molybdenum	NC	NC	NA	NA	NA	NA	1
Nickel	NC	NC	NA	NA	NA	NA	1
Nitrate	1.4E+01	1.4E+01	6.8E-01	1.1E+00	5.4E-02	9.1E-02	1
Selenium	NC	NC	NA	NA	NA	NA	1
Silver	NC	NC	NA	NA	NA	NA	1
Thallium	5.4E-04	5.4E-04	2.6E-05	4.3E-05	2.1E-06	3.5E-06	1
Zinc	NC	NC	NA	NA	NA	NA	1
VOCs							
1,1-Dichloroethane	2.6E-03	2.6E-03	2.5E-04	4.2E-04	2.0E-05	3.3E-05	1
1,2-Dichloroethane	9.0E-04	9.0E-04	8.6E-05	1.4E-04	6.9E-06	1.2E-05	1
Acetone	1.6E-02	1.6E-02	1.5E-03	2.6E-03	1.2E-04	2.0E-04	1
Benzene	5.8E-04	5.8E-04	5.6E-05	9.3E-05	4.4E-06	7.4E-06	1
Carbon disulfide	2.6E-03	2.6E-03	2.5E-04	4.2E-04	2.0E-05	3.3E-05	1
Chloromethane	3.2E-04	3.2E-04	3.1E-05	5.1E-05	2.5E-06	4.1E-06	1
cis-1,2-Dichloroethene	5.1E-02	5.1E-02	4.9E-03	8.2E-03	3.9E-04	6.5E-04	1
Methylene chloride	6.4E-04	6.4E-04	6.1E-05	1.0E-04	4.9E-06	8.2E-06	1
Toluene	1.8E-03	1.8E-03	1.7E-04	2.9E-04	1.4E-05	2.3E-05	1
Trichloroethene	1.0E-02	1.0E-02	9.6E-04	1.6E-03	7.7E-05	1.3E-04	1
SVOCs							
Benzo(a)anthracene	NC	NC	NA	NA	NA	NA	1
Benzo(a)pyrene	NC	NC	NA	NA	NA	NA	1
Benzo(b)fluoranthene	NC	NC	NA	NA	NA	NA	1
Benzo(g,h,i)perylene	NC	NC	NA	NA	NA	NA	1
Benzo(k)fluoranthene	NC	NC	NA	NA	NA	NA	1
Chrysene	NC	NC	NA	NA	NA	NA	1
Dibenz(a,h)anthracene	NC	NC	NA	NA	NA	NA	1
Fluoranthene	NC	NC	NA	NA	NA	NA	1
Indeno(1,2,3-cd)pyrene	NC	NC	NA	NA	NA	NA	1
Phenanthrene	NC	NC	NA	NA	NA	NA	1
Pyrene	NC	NC	NA	NA	NA	NA	1

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Estimates of Human Intake
Domestic Groundwater Use for Child Resident
New Conservation Yard RFI Site

Intake Equation: Dosage = $\frac{C \times IR \times FT \times EF \times ED \times B}{BW \times AT}$

Exposure Parameters		Units	Typical	RME
Groundwater concentration	C	mg/L	CS	CS
Groundwater ingestion rate$_{voc}$	IR	L/day	1.5	2.5
Groundwater ingestion rate$_{non\text{-}vocs}$	IR	L/day	0.75	1.25
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	6	6
Bioavailability	B	fraction	CS	CS
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/L)	RME EPC (mg/L)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
Total Petroleum Hydrocarbons							
C20-C30(Lubricant Oil Range)	5.0E-02	5.0E-02	2.4E-03	4.0E-03	1.9E-04	3.2E-04	1
PCDD/PCDFs							
2,3,7,8-TCDD	NC	NC	NA	NA	NA	NA	1
1,2,3,7,8-PeCDD	NC	NC	NA	NA	NA	NA	1
1,2,3,4,7,8-HxCDD	NC	NC	NA	NA	NA	NA	1
1,2,3,6,7,8-HxCDD	NC	NC	NA	NA	NA	NA	1
1,2,3,7,8,9-HxCDD	NC	NC	NA	NA	NA	NA	1
1,2,3,4,6,7,8-HpCDD	NC	NC	NA	NA	NA	NA	1
OCDD	NC	NC	NA	NA	NA	NA	1
2,3,7,8-TCDF	NC	NC	NA	NA	NA	NA	1
1,2,3,7,8-PeCDF	NC	NC	NA	NA	NA	NA	1
2,3,4,7,8-PeCDF	NC	NC	NA	NA	NA	NA	1
1,2,3,4,7,8-HxCDF	NC	NC	NA	NA	NA	NA	1
1,2,3,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA	1
2,3,4,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA	1
1,2,3,7,8,9-HxCDF	NC	NC	NA	NA	NA	NA	1
1,2,3,4,6,7,8-HpCDF	NC	NC	NA	NA	NA	NA	1
1,2,3,4,7,8,9-HpCDF	NC	NC	NA	NA	NA	NA	1
OCDF	NC	NC	NA	NA	NA	NA	1
Total Tetra	NC	NC	NA	NA	NA	NA	1
Total Penta	NC	NC	NA	NA	NA	NA	1
Total Hexa	NC	NC	NA	NA	NA	NA	1
Total Hepta	NC	NC	NA	NA	NA	NA	1
Total Octa	NC	NC	NA	NA	NA	NA	1
PCDD/PCDF	NC	NC	NA	NA	NA	NA	1
Aroclor-1254	NC	NC	NA	NA	NA	NA	1
PCB-105	NC	NC	NA	NA	NA	NA	1
PCB-114	NC	NC	NA	NA	NA	NA	1
PCB-118	NC	NC	NA	NA	NA	NA	1
PCB-123	NC	NC	NA	NA	NA	NA	1
PCB-126	NC	NC	NA	NA	NA	NA	1
PCB-156	NC	NC	NA	NA	NA	NA	1
PCB-157	NC	NC	NA	NA	NA	NA	1
PCB-167	NC	NC	NA	NA	NA	NA	1
PCB-169	NC	NC	NA	NA	NA	NA	1
PCB-189	NC	NC	NA	NA	NA	NA	1
PCB-77	NC	NC	NA	NA	NA	NA	1
PCB-81	NC	NC	NA	NA	NA	NA	1

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
mg/kg-day - milligrams per kilogram per day
mg/L - milligrams per liter

Estimates of Human Intake
Groundwater to Indoor Air Pathway for Child Resident
New Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	8.4	8.4
Fraction of time indoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	6	6
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Inorganic Compounds						
Barium	NC	NC	NA	NA	NA	NA
Cadmium	NC	NC	NA	NA	NA	NA
Chromium	NC	NC	NA	NA	NA	NA
Copper	NC	NC	NA	NA	NA	NA
Lead	NC	NC	NA	NA	NA	NA
Mercury	NC	NC	NA	NA	NA	NA
Molybdenum	NC	NC	NA	NA	NA	NA
Nickel	NC	NC	NA	NA	NA	NA
Nitrate	NC	NC	NA	NA	NA	NA
Selenium	NC	NC	NA	NA	NA	NA
Silver	NC	NC	NA	NA	NA	NA
Thallium	NC	NC	NA	NA	NA	NA
Zinc	NC	NC	NA	NA	NA	NA
VOCs						
1,1-Dichloroethane	NC	NC	NA	NA	NA	NA
1,2-Dichloroethane	NC	NC	NA	NA	NA	NA
Acetone	4.5E-07	4.5E-07	1.2E-07	1.8E-07	9.6E-09	1.4E-08
Benzene	NC	NC	NA	NA	NA	NA
Carbon disulfide	NC	NC	NA	NA	NA	NA
Chloromethane	NC	NC	NA	NA	NA	NA
cis-1,2-Dichloroethene	NC	NC	NA	NA	NA	NA
Methylene chloride	NC	NC	NA	NA	NA	NA
Toluene	8.0E-06	8.0E-06	2.1E-06	3.2E-06	1.7E-07	2.6E-07
Trichloroethene	3.7E-06	3.7E-06	1.0E-06	1.5E-06	8.0E-08	1.2E-07
SVOCs						
Benzo(a)anthracene	NC	NC	NA	NA	NA	NA
Benzo(a)pyrene	NC	NC	NA	NA	NA	NA
Benzo(b)fluoranthene	NC	NC	NA	NA	NA	NA
Benzo(g,h,i)perylene	NC	NC	NA	NA	NA	NA
Benzo(k)fluoranthene	NC	NC	NA	NA	NA	NA
Chrysene	NC	NC	NA	NA	NA	NA
Dibenz(a,h)anthracene	NC	NC	NA	NA	NA	NA
Fluoranthene	NC	NC	NA	NA	NA	NA
Indeno(1,2,3-cd)pyrene	NC	NC	NA	NA	NA	NA
Phenanthrene	NC	NC	NA	NA	NA	NA
Pyrene	NC	NC	NA	NA	NA	NA

Spreadsheet C1-72 (2 of 3)

Estimates of Human Intake
Groundwater to Indoor Air Pathway for Child Resident
New Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	8.4	8.4
Fraction of time indoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	6	6
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Total Petroleum Hydrocarbons						
C20-C30(Lubricant Oil Range)	NC	NC	NA	NA	NA	NA
PCDD/PCDFs						
2,3,7,8-TCDD	NC	NC	NA	NA	NA	NA
1,2,3,7,8-PeCDD	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,6,7,8-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,7,8,9-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,4,6,7,8-HpCDD	NC	NC	NA	NA	NA	NA
OCDD	NC	NC	NA	NA	NA	NA
2,3,7,8-TCDF	NC	NC	NA	NA	NA	NA
1,2,3,7,8-PeCDF	NC	NC	NA	NA	NA	NA
2,3,4,7,8-PeCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA
2,3,4,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,7,8,9-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,6,7,8-HpCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8,9-HpCDF	NC	NC	NA	NA	NA	NA
OCDF	NC	NC	NA	NA	NA	NA
Total Tetra	NC	NC	NA	NA	NA	NA
Total Penta	NC	NC	NA	NA	NA	NA
Total Hexa	NC	NC	NA	NA	NA	NA
Total Hepta	NC	NC	NA	NA	NA	NA
Total Octa	NC	NC	NA	NA	NA	NA
PCDD/PCDF	NC	NC	NA	NA	NA	NA
Aroclor-1254	NC	NC	NA	NA	NA	NA
PCB-105	NC	NC	NA	NA	NA	NA
PCB-114	NC	NC	NA	NA	NA	NA
PCB-118	NC	NC	NA	NA	NA	NA
PCB-123	NC	NC	NA	NA	NA	NA
PCB-126	NC	NC	NA	NA	NA	NA
PCB-156	NC	NC	NA	NA	NA	NA
PCB-157	NC	NC	NA	NA	NA	NA
PCB-167	NC	NC	NA	NA	NA	NA
PCB-169	NC	NC	NA	NA	NA	NA
PCB-189	NC	NC	NA	NA	NA	NA
PCB-77	NC	NC	NA	NA	NA	NA
PCB-81	NC	NC	NA	NA	NA	NA

Notes:

Spreadsheet C1-72 (3 of 3)

Estimates of Human Intake
Groundwater to Indoor Air Pathway for Child Resident
New Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	8.4	8.4
Fraction of time indoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	6	6
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)

CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
mg/kg-day - milligrams per kilogram per day
mg/m^3 - milligrams per cubic meter

Estimates of Human Intake
Soil to Indoor Air Pathway for Child Resident
New Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	8.4	8.4
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	6	6
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Inorganic Compounds						
Barium	NC	NC	NA	NA	NA	NA
Cadmium	NC	NC	NA	NA	NA	NA
Chromium	NC	NC	NA	NA	NA	NA
Copper	NC	NC	NA	NA	NA	NA
Lead	NC	NC	NA	NA	NA	NA
Mercury	NC	NC	NA	NA	NA	NA
Molybdenum	NC	NC	NA	NA	NA	NA
Nickel	NC	NC	NA	NA	NA	NA
Nitrate	NC	NC	NA	NA	NA	NA
Selenium	NC	NC	NA	NA	NA	NA
Silver	NC	NC	NA	NA	NA	NA
Thallium	NC	NC	NA	NA	NA	NA
Zinc	NC	NC	NA	NA	NA	NA
VOCs						
1,1-Dichloroethane	NC	NC	NA	NA	NA	NA
1,2-Dichloroethane	NC	NC	NA	NA	NA	NA
Acetone	NC	NC	NA	NA	NA	NA
Benzene	NC	NC	NA	NA	NA	NA
Carbon disulfide	NC	NC	NA	NA	NA	NA
Chloromethane	NC	NC	NA	NA	NA	NA
cis-1,2-Dichloroethene	NC	NC	NA	NA	NA	NA
Methylene chloride	NC	NC	NA	NA	NA	NA
Toluene	3.6E-02	7.4E-02	9.6E-03	3.0E-02	7.7E-04	2.4E-03
Trichloroethene	NC	NC	NA	NA	NA	NA
SVOCs						
Benzo(a)anthracene	NC	NC	NA	NA	NA	NA
Benzo(a)pyrene	NC	NC	NA	NA	NA	NA
Benzo(b)fluoranthene	NC	NC	NA	NA	NA	NA
Benzo(g,h,i)perylene	NC	NC	NA	NA	NA	NA
Benzo(k)fluoranthene	NC	NC	NA	NA	NA	NA
Chrysene	NC	NC	NA	NA	NA	NA
Dibenz(a,h)anthracene	NC	NC	NA	NA	NA	NA
Fluoranthene	NC	NC	NA	NA	NA	NA
Indeno(1,2,3-cd)pyrene	NC	NC	NA	NA	NA	NA
Phenanthrene	NC	NC	NA	NA	NA	NA
Pyrene	NC	NC	NA	NA	NA	NA

Spreadsheet C1-71 (2 of 3)

Estimates of Human Intake
Soil to Indoor Air Pathway for Child Resident
New Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	8.4	8.4
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	6	6
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Total Petroleum Hydrocarbons						
C20-C30(Lubricant Oil Range)	NC	NC	NA	NA	NA	NA
PCDD/PCDFs						
2,3,7,8-TCDD	NC	NC	NA	NA	NA	NA
1,2,3,7,8-PeCDD	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,6,7,8-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,7,8,9-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,4,6,7,8-HpCDD	NC	NC	NA	NA	NA	NA
OCDD	NC	NC	NA	NA	NA	NA
2,3,7,8-TCDF	NC	NC	NA	NA	NA	NA
1,2,3,7,8-PeCDF	NC	NC	NA	NA	NA	NA
2,3,4,7,8-PeCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA
2,3,4,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,7,8,9-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,6,7,8-HpCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8,9-HpCDF	NC	NC	NA	NA	NA	NA
OCDF	NC	NC	NA	NA	NA	NA
Total Tetra	NC	NC	NA	NA	NA	NA
Total Penta	NC	NC	NA	NA	NA	NA
Total Hexa	NC	NC	NA	NA	NA	NA
Total Hepta	NC	NC	NA	NA	NA	NA
Total Octa	NC	NC	NA	NA	NA	NA
PCDD/PCDF	NC	NC	NA	NA	NA	NA

Spreadsheet C1-71 (3 of 3)

Estimates of Human Intake
Soil to Indoor Air Pathway for Child Resident
New Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	8.4	8.4
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	6	6
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
PCBs						
Aroclor-1254	NC	NC	NA	NA	NA	NA
PCB-105	NC	NC	NA	NA	NA	NA
PCB-114	NC	NC	NA	NA	NA	NA
PCB-118	NC	NC	NA	NA	NA	NA
PCB-123	NC	NC	NA	NA	NA	NA
PCB-126	NC	NC	NA	NA	NA	NA
PCB-156	NC	NC	NA	NA	NA	NA
PCB-157	NC	NC	NA	NA	NA	NA
PCB-167	NC	NC	NA	NA	NA	NA
PCB-169	NC	NC	NA	NA	NA	NA
PCB-189	NC	NC	NA	NA	NA	NA
PCB-77	NC	NC	NA	NA	NA	NA
PCB-81	NC	NC	NA	NA	NA	NA

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyls
mg/kg-day - milligrams per kilogram per day
mg/m^3 - milligrams per cubic meter

Estimates of Human Intake
Groundwater to Ambient Air Pathway for Child Resident
New Conservation Yard RFI Site

Intake Equation: Dosage = $\frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	8.4	8.4
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	6	6
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Inorganic Compounds						
Barium	NC	NC	NA	NA	NA	NA
Cadmium	NC	NC	NA	NA	NA	NA
Chromium	NC	NC	NA	NA	NA	NA
Copper	NC	NC	NA	NA	NA	NA
Lead	NC	NC	NA	NA	NA	NA
Mercury	NC	NC	NA	NA	NA	NA
Molybdenum	NC	NC	NA	NA	NA	NA
Nickel	NC	NC	NA	NA	NA	NA
Nitrate	NC	NC	NA	NA	NA	NA
Selenium	NC	NC	NA	NA	NA	NA
Silver	NC	NC	NA	NA	NA	NA
Thallium	NC	NC	NA	NA	NA	NA
Zinc	NC	NC	NA	NA	NA	NA
VOCs						
1,1-Dichloroethane	NC	NC	NA	NA	NA	NA
1,2-Dichloroethane	NC	NC	NA	NA	NA	NA
Acetone	7.3E-12	7.3E-12	2.0E-12	2.9E-12	1.6E-13	2.4E-13
Benzene	NC	NC	NA	NA	NA	NA
Carbon disulfide	NC	NC	NA	NA	NA	NA
Chloromethane	NC	NC	NA	NA	NA	NA
cis-1,2-Dichloroethene	NC	NC	NA	NA	NA	NA
Methylene chloride	NC	NC	NA	NA	NA	NA
Toluene	2.6E-07	2.6E-07	7.1E-08	1.1E-07	5.7E-09	8.5E-09
Trichloroethene	1.1E-07	1.1E-07	3.0E-08	4.5E-08	2.4E-09	3.6E-09
SVOCs						
Benzo(a)anthracene	NC	NC	NA	NA	NA	NA
Benzo(a)pyrene	NC	NC	NA	NA	NA	NA
Benzo(b)fluoranthene	NC	NC	NA	NA	NA	NA
Benzo(g,h,i)perylene	NC	NC	NA	NA	NA	NA
Benzo(k)fluoranthene	NC	NC	NA	NA	NA	NA
Chrysene	NC	NC	NA	NA	NA	NA
Dibenz(a,h)anthracene	NC	NC	NA	NA	NA	NA
Fluoranthene	NC	NC	NA	NA	NA	NA
Indeno(1,2,3-cd)pyrene	NC	NC	NA	NA	NA	NA
Phenanthrene	NC	NC	NA	NA	NA	NA
Pyrene	NC	NC	NA	NA	NA	NA

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Estimates of Human Intake
Groundwater to Ambient Air Pathway for Child Resident
New Conservation Yard RFI Site

Intake Equation: Dosage = $\frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	8.4	8.4
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	6	6
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Total Petroleum Hydrocarbons						
C20-C30(Lubricant Oil Range)	NC	NC	NA	NA	NA	NA
PCDD/PCDFs						
2,3,7,8-TCDD	NC	NC	NA	NA	NA	NA
1,2,3,7,8-PeCDD	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,6,7,8-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,7,8,9-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,4,6,7,8-HpCDD	NC	NC	NA	NA	NA	NA
OCDD	NC	NC	NA	NA	NA	NA
2,3,7,8-TCDF	NC	NC	NA	NA	NA	NA
1,2,3,7,8-PeCDF	NC	NC	NA	NA	NA	NA
2,3,4,7,8-PeCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA
2,3,4,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,7,8,9-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,6,7,8-HpCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8,9-HpCDF	NC	NC	NA	NA	NA	NA
OCDF	NC	NC	NA	NA	NA	NA
Total Tetra	NC	NC	NA	NA	NA	NA
Total Penta	NC	NC	NA	NA	NA	NA
Total Hexa	NC	NC	NA	NA	NA	NA
Total Hepta	NC	NC	NA	NA	NA	NA
Total Octa	NC	NC	NA	NA	NA	NA
PCDD/PCDF	NC	NC	NA	NA	NA	NA
Aroclor-1254	NC	NC	NA	NA	NA	NA
PCB-105	NC	NC	NA	NA	NA	NA
PCB-114	NC	NC	NA	NA	NA	NA
PCB-118	NC	NC	NA	NA	NA	NA
PCB-123	NC	NC	NA	NA	NA	NA
PCB-126	NC	NC	NA	NA	NA	NA
PCB-156	NC	NC	NA	NA	NA	NA
PCB-157	NC	NC	NA	NA	NA	NA
PCB-167	NC	NC	NA	NA	NA	NA
PCB-169	NC	NC	NA	NA	NA	NA
PCB-189	NC	NC	NA	NA	NA	NA
PCB-77	NC	NC	NA	NA	NA	NA
PCB-81	NC	NC	NA	NA	NA	NA

Notes:

Spreadsheet C1-69 (3 of 3)

Estimates of Human Intake
Groundwater to Ambient Air Pathway for Child Resident
New Conservation Yard RFI Site

Intake Equation: Dosage = $\frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	8.4	8.4
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	6	6
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)

CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
mg/kg-day - milligrams per kilogram per day
mg/m^3 - milligrams per cubic meter

Estimates of Human Intake
Soil to Ambient Air Pathway for Child Resident
New Conservation Yard RFI Site

Intake Equation: Dosage = $\frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	8.4	8.4
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	6	6
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Inorganic Compounds						
Barium	NC	NC	NA	NA	NA	NA
Cadmium	NC	NC	NA	NA	NA	NA
Chromium	NC	NC	NA	NA	NA	NA
Copper	NC	NC	NA	NA	NA	NA
Lead	NC	NC	NA	NA	NA	NA
Mercury	NC	NC	NA	NA	NA	NA
Molybdenum	NC	NC	NA	NA	NA	NA
Nickel	NC	NC	NA	NA	NA	NA
Nitrate	NC	NC	NA	NA	NA	NA
Selenium	NC	NC	NA	NA	NA	NA
Silver	NC	NC	NA	NA	NA	NA
Thallium	NC	NC	NA	NA	NA	NA
Zinc	NC	NC	NA	NA	NA	NA
VOCs						
1,1-Dichloroethane	NC	NC	NA	NA	NA	NA
1,2-Dichloroethane	NC	NC	NA	NA	NA	NA
Acetone	NC	NC	NA	NA	NA	NA
Benzene	NC	NC	NA	NA	NA	NA
Carbon disulfide	NC	NC	NA	NA	NA	NA
Chloromethane	NC	NC	NA	NA	NA	NA
cis-1,2-Dichloroethene	NC	NC	NA	NA	NA	NA
Methylene chloride	NC	NC	NA	NA	NA	NA
Toluene	6.9E-04	6.9E-04	1.8E-04	2.8E-04	1.5E-05	2.2E-05
Trichloroethene	NC	NC	NA	NA	NA	NA
SVOCs						
Benzo(a)anthracene	NC	NC	NA	NA	NA	NA
Benzo(a)pyrene	NC	NC	NA	NA	NA	NA
Benzo(b)fluoranthene	NC	NC	NA	NA	NA	NA
Benzo(g,h,i)perylene	NC	NC	NA	NA	NA	NA
Benzo(k)fluoranthene	NC	NC	NA	NA	NA	NA
Chrysene	NC	NC	NA	NA	NA	NA
Dibenz(a,h)anthracene	NC	NC	NA	NA	NA	NA
Fluoranthene	NC	NC	NA	NA	NA	NA
Indeno(1,2,3-cd)pyrene	NC	NC	NA	NA	NA	NA
Phenanthrene	NC	NC	NA	NA	NA	NA
Pyrene	NC	NC	NA	NA	NA	NA

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Estimates of Human Intake
Soil to Ambient Air Pathway for Child Resident
New Conservation Yard RFI Site

Intake Equation: Dosage = $\frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	8.4	8.4
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	6	6
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Total Petroleum Hydrocarbons						
C20-C30(Lubricant Oil Range)	NC	NC	NA	NA	NA	NA
PCDD/PCDFs						
2,3,7,8-TCDD	NC	NC	NA	NA	NA	NA
1,2,3,7,8-PeCDD	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,6,7,8-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,7,8,9-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,4,6,7,8-HpCDD	NC	NC	NA	NA	NA	NA
OCDD	NC	NC	NA	NA	NA	NA
2,3,7,8-TCDF	NC	NC	NA	NA	NA	NA
1,2,3,7,8-PeCDF	NC	NC	NA	NA	NA	NA
2,3,4,7,8-PeCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA
2,3,4,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,7,8,9-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,6,7,8-HpCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8,9-HpCDF	NC	NC	NA	NA	NA	NA
OCDF	NC	NC	NA	NA	NA	NA
Total Tetra	NC	NC	NA	NA	NA	NA
Total Penta	NC	NC	NA	NA	NA	NA
Total Hexa	NC	NC	NA	NA	NA	NA
Total Hepta	NC	NC	NA	NA	NA	NA
Total Octa	NC	NC	NA	NA	NA	NA
PCDD/PCDF	NC	NC	NA	NA	NA	NA

Spreadsheet C1-68 (3 of 3)

Estimates of Human Intake
Soil to Ambient Air Pathway for Child Resident
New Conservation Yard RFI Site

Intake Equation: Dosage = $\frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	8.4	8.4
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	6	6
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
PCBs						
Aroclor-1254	NC	NC	NA	NA	NA	NA
PCB-105	NC	NC	NA	NA	NA	NA
PCB-114	NC	NC	NA	NA	NA	NA
PCB-118	NC	NC	NA	NA	NA	NA
PCB-123	NC	NC	NA	NA	NA	NA
PCB-126	NC	NC	NA	NA	NA	NA
PCB-156	NC	NC	NA	NA	NA	NA
PCB-157	NC	NC	NA	NA	NA	NA
PCB-167	NC	NC	NA	NA	NA	NA
PCB-169	NC	NC	NA	NA	NA	NA
PCB-189	NC	NC	NA	NA	NA	NA
PCB-77	NC	NC	NA	NA	NA	NA
PCB-81	NC	NC	NA	NA	NA	NA

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyls
mg/kg-day - milligrams per kilogram per day
mg/m^3 - milligrams per cubic meter

Estimates of Human Intake
Soil Particulate Inhalation Pathway for Child Resident
New Conservation Yard RFI Site

Intake Equation:

$$\text{Dosage} = \frac{C \times CF \times IR \times FT \times EF \times ED}{PEF \times BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Inhalation rate	IR	m^3/day	8.4	8.4
Conversion factor	CF	kg/ug	1.E-09	1.E-09
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	6	6
Particulate emission factor	PEF	m^3/ug	2.4	2.4
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Inorganic Compounds						
Barium	216.8	958.1	2.4E-08	1.6E-07	1.9E-09	1.3E-08
Cadmium	1.8	13.3	2.0E-10	2.2E-09	1.6E-11	1.8E-10
Chromium	23.2	40.6	2.6E-09	6.8E-09	2.1E-10	5.4E-10
Copper	28.8	82.0	3.2E-09	1.4E-08	2.6E-10	1.1E-09
Lead	25.7	35.0	2.9E-09	5.9E-09	2.3E-10	4.7E-10
Mercury	0.1	0.6	1.4E-11	1.1E-10	1.1E-12	8.6E-12
Molybdenum	3.4	6.0	3.8E-10	1.0E-09	3.0E-11	8.1E-11
Nickel	22.2	56.8	2.5E-09	9.5E-09	2.0E-10	7.6E-10
Nitrate	NC	NC	NA	NA	NA	NA
Selenium	1.7	3.0	1.9E-10	5.0E-10	1.5E-11	4.0E-11
Silver	15.5	96.0	1.7E-09	1.6E-08	1.4E-10	1.3E-09
Thallium	NC	NC	NA	NA	NA	NA
Zinc	543.6	2788.4	6.1E-08	4.7E-07	4.9E-09	3.7E-08
VOCs						
1,1-Dichloroethane	NC	NC	NA	NA	NA	NA
1,2-Dichloroethane	NC	NC	NA	NA	NA	NA
Acetone	NC	NC	NA	NA	NA	NA
Benzene	NC	NC	NA	NA	NA	NA
Carbon disulfide	NC	NC	NA	NA	NA	NA
Chloromethane	NC	NC	NA	NA	NA	NA
cis-1,2-Dichloroethene	NC	NC	NA	NA	NA	NA
Methylene chloride	NC	NC	NA	NA	NA	NA
Toluene	NC	NC	NA	NA	NA	NA
Trichloroethene	NC	NC	NA	NA	NA	NA
SVOCs						
Benzo(a)anthracene	3.6E-02	1.2E-02	4.1E-12	2.0E-12	3.3E-13	1.6E-13
Benzo(a)pyrene	4.0E-02	4.3E-02	4.4E-12	7.2E-12	3.6E-13	5.8E-13
Benzo(b)fluoranthene	4.3E-02	6.5E-02	4.8E-12	1.1E-11	3.9E-13	8.7E-13
Benzo(g,h,i)perylene	3.9E-02	3.1E-02	4.4E-12	5.2E-12	3.5E-13	4.2E-13
Benzo(k)fluoranthene	3.6E-02	1.2E-02	4.1E-12	2.0E-12	3.3E-13	1.6E-13
Chrysene	4.0E-02	2.7E-02	4.4E-12	4.5E-12	3.5E-13	3.6E-13
Dibenz(a,h)anthracene	3.6E-02	8.0E-03	4.0E-12	1.3E-12	3.2E-13	1.1E-13
Fluoranthene	4.3E-02	3.6E-02	4.8E-12	6.0E-12	3.8E-13	4.8E-13
Indeno(1,2,3-cd)pyrene	4.1E-02	5.3E-02	4.6E-12	8.9E-12	3.7E-13	7.1E-13
Phenanthrene	3.7E-02	1.4E-02	4.1E-12	2.3E-12	3.3E-13	1.9E-13
Pyrene	4.3E-02	4.3E-02	4.8E-12	7.2E-12	3.8E-13	5.8E-13

Spreadsheet C1-67 (2 of 3)

Estimates of Human Intake
Soil Particulate Inhalation Pathway for Child Resident
New Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times CF \times IR \times FT \times EF \times ED}{PEF \times BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Inhalation rate	IR	m^3/day	8.4	8.4
Conversion factor	CF	kg/ug	1.E-09	1.E-09
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	6	6
Particulate emission factor	PEF	m^3/ug	2.4	2.4
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Total Petroleum Hydrocarbons						
C20-C30(Lubricant Oil Range)	NC	NC	NA	NA	NA	NA
PCDD/PCDFs						
2,3,7,8-TCDD	5.6E-06	3.4E-05	6.3E-16	5.8E-15	5.0E-17	4.6E-16
1,2,3,7,8-PeCDD	1.6E-05	9.0E-05	1.8E-15	1.5E-14	1.5E-16	1.2E-15
1,2,3,4,7,8-HxCDD	4.1E-05	1.0E-04	4.6E-15	1.7E-14	3.6E-16	1.4E-15
1,2,3,6,7,8-HxCDD	2.0E-04	5.4E-04	2.2E-14	9.0E-14	1.8E-15	7.2E-15
1,2,3,7,8,9-HxCDD	7.1E-05	4.7E-04	8.0E-15	7.9E-14	6.4E-16	6.3E-15
1,2,3,4,6,7,8-HpCDD	4.7E-03	1.2E-02	5.3E-13	2.0E-12	4.2E-14	1.6E-13
OCDD	5.4E-02	1.4E-01	6.1E-12	2.3E-11	4.9E-13	1.8E-12
2,3,7,8-TCDF	3.1E-06	5.7E-06	3.5E-16	9.6E-16	2.8E-17	7.6E-17
1,2,3,7,8-PeCDF	3.6E-06	1.0E-05	4.0E-16	1.7E-15	3.2E-17	1.3E-16
2,3,4,7,8-PeCDF	8.8E-06	1.7E-05	9.8E-16	2.9E-15	7.8E-17	2.3E-16
1,2,3,4,7,8-HxCDF	2.7E-05	6.3E-05	3.0E-15	1.1E-14	2.4E-16	8.4E-16
1,2,3,6,7,8-HxCDF	2.1E-05	4.9E-05	2.3E-15	8.2E-15	1.9E-16	6.5E-16
2,3,4,6,7,8-HxCDF	4.3E-05	1.1E-04	4.8E-15	1.8E-14	3.9E-16	1.4E-15
1,2,3,7,8,9-HxCDF	6.9E-06	1.4E-05	7.7E-16	2.4E-15	6.2E-17	1.9E-16
1,2,3,4,6,7,8-HpCDF	7.7E-04	2.0E-03	8.6E-14	3.4E-13	6.9E-15	2.7E-14
1,2,3,4,7,8,9-HpCDF	7.2E-05	1.8E-04	8.1E-15	3.1E-14	6.5E-16	2.4E-15
OCDF	2.0E-03	5.1E-03	2.3E-13	8.6E-13	1.8E-14	6.8E-14
Total Tetra	NC	NC	NA	NA	NA	NA
Total Penta	NC	NC	NA	NA	NA	NA
Total Hexa	NC	NC	NA	NA	NA	NA
Total Hepta	NC	NC	NA	NA	NA	NA
Total Octa	NC	NC	NA	NA	NA	NA
PCDD/PCDF	NC	NC	NA	NA	NA	NA

Spreadsheet C1-67 (3 of 3)

Estimates of Human Intake
Soil Particulate Inhalation Pathway for Child Resident
New Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times CF \times IR \times FT \times EF \times ED}{PEF \times BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Inhalation rate	IR	m^3/day	8.4	8.4
Conversion factor	CF	kg/ug	1.E-09	1.E-09
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	6	6
Particulate emission factor	PEF	m^3/ug	2.4	2.4
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
PCBs						
Aroclor-1254	0.1	0.1	7.9E-12	1.2E-11	6.4E-13	9.5E-13
PCB-105	0.0	0.0	1.7E-15	3.5E-15	1.4E-16	2.8E-16
PCB-114	0.0	0.0	6.3E-17	1.3E-16	5.1E-18	1.0E-17
PCB-118	0.0	0.0	3.7E-15	7.7E-15	3.0E-16	6.1E-16
PCB-123	0.0	0.0	4.2E-17	8.6E-17	3.3E-18	6.9E-18
PCB-126	0.0	0.0	1.1E-16	2.2E-16	8.4E-18	1.7E-17
PCB-156	0.0	0.0	8.8E-16	1.8E-15	7.0E-17	1.4E-16
PCB-157	0.0	0.0	2.9E-16	4.6E-16	2.3E-17	3.7E-17
PCB-167	0.0	0.0	4.9E-16	7.9E-16	3.9E-17	6.3E-17
PCB-169	0.0	0.0	7.6E-18	1.3E-17	6.1E-19	1.0E-18
PCB-189	0.0	0.0	7.3E-17	1.2E-16	5.9E-18	9.4E-18
PCB-77	0.0	0.0	2.2E-16	4.4E-16	1.7E-17	3.5E-17
PCB-81	0.0	0.0	4.2E-17	8.6E-17	3.3E-18	6.9E-18

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyls
mg/kg-day - milligrams per kilogram per day
mg/kg - milligrams per kilogram

Estimates of Human Intake
Soil Dermal Contact Pathway for Child Resident
New Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times SA \times AF \times B \times CF \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Skin surface area per event	SA	cm^2/day	2800	2800
Soil loading to skin	AF	mg/cm^2	0.06	0.20
Bioavailability	B	fraction	CS	CS
Conversion factor	CF	kg/mg	1.E-06	1.E-06
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	6	6
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
Inorganic Compounds							
Barium	2.2E+02	9.6E+02	2.3E-05	3.4E-04	1.9E-06	2.7E-05	0.01
Cadmium	1.8E+00	1.3E+01	1.9E-08	4.8E-07	1.5E-09	3.8E-08	0.00
Chromium	2.3E+01	4.1E+01	2.5E-06	1.5E-05	2.0E-07	1.2E-06	0.01
Copper	2.9E+01	8.2E+01	3.1E-06	2.9E-05	2.5E-07	2.3E-06	0.01
Lead	2.6E+01	3.5E+01	2.8E-06	1.3E-05	2.2E-07	1.0E-06	0.01
Mercury	1.2E-01	6.4E-01	1.3E-08	2.3E-07	1.1E-09	1.8E-08	0.01
Molybdenum	3.4E+00	6.0E+00	3.6E-07	2.1E-06	2.9E-08	1.7E-07	0.01
Nickel	2.2E+01	5.7E+01	2.4E-06	2.0E-05	1.9E-07	1.6E-06	0.01
Nitrate	NC	NC	NA	NA	NA	NA	0.01
Selenium	1.7E+00	3.0E+00	1.8E-07	1.1E-06	1.4E-08	8.6E-08	0.01
Silver	1.5E+01	9.6E+01	1.7E-06	3.4E-05	1.3E-07	2.8E-06	0.01
Thallium	NC	NC	NA	NA	NA	NA	0.01
Zinc	5.4E+02	2.8E+03	5.8E-05	1.0E-03	4.7E-06	8.0E-05	0.01
VOCs							
1,1-Dichloroethane	NC	NC	NA	NA	NA	NA	0.10
1,2-Dichloroethane	NC	NC	NA	NA	NA	NA	0.10
Acetone	NC	NC	NA	NA	NA	NA	0.10
Benzene	NC	NC	NA	NA	NA	NA	0.10
Carbon disulfide	NC	NC	NA	NA	NA	NA	0.01
Chloromethane	NC	NC	NA	NA	NA	NA	0.10
cis-1,2-Dichloroethene	NC	NC	NA	NA	NA	NA	0.10
Methylene chloride	NC	NC	NA	NA	NA	NA	0.10
Toluene	5.3E-02	1.1E-01	5.7E-08	3.9E-07	4.6E-09	3.2E-08	0.10
Trichloroethene	NC	NC	NA	NA	NA	NA	0.10
SVOCs							
Benzo(a)anthracene	3.6E-02	1.2E-02	5.1E-08	5.6E-08	4.1E-09	4.5E-09	0.13
Benzo(a)pyrene	4.0E-02	4.3E-02	5.5E-08	2.0E-07	4.4E-09	1.6E-08	0.13
Benzo(b)fluoranthene	4.3E-02	6.5E-02	6.1E-08	3.0E-07	4.8E-09	2.4E-08	0.13
Benzo(g,h,i)perylene	3.9E-02	3.1E-02	5.4E-08	1.4E-07	4.3E-09	1.2E-08	0.13
Benzo(k)fluoranthene	3.6E-02	1.2E-02	5.1E-08	5.6E-08	4.1E-09	4.5E-09	0.13
Chrysene	4.0E-02	2.7E-02	5.5E-08	1.3E-07	4.4E-09	1.0E-08	0.13
Dibenz(a,h)anthracene	3.6E-02	8.0E-03	5.0E-08	3.7E-08	4.0E-09	3.0E-09	0.13
Fluoranthene	4.3E-02	3.6E-02	6.0E-08	1.7E-07	4.8E-09	1.3E-08	0.13
Indeno(1,2,3-cd)pyrene	4.1E-02	5.3E-02	5.7E-08	2.5E-07	4.6E-09	2.0E-08	0.13
Phenanthrene	3.7E-02	1.4E-02	5.1E-08	6.5E-08	4.1E-09	5.2E-09	0.13
Pyrene	4.3E-02	4.3E-02	6.0E-08	2.0E-07	4.8E-09	1.6E-08	0.13

Spreadsheet C1-66 (2 of 3)

Estimates of Human Intake
Soil Dermal Contact Pathway for Child Resident
New Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times SA \times AF \times B \times CF \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Skin surface area per event	SA	cm^2/day	2800	2800
Soil loading to skin	AF	mg/cm^2	0.06	0.20
Bioavailability	B	fraction	CS	CS
Conversion factor	CF	kg/mg	1.E-06	1.E-06
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	6	6
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
Total Petroleum Hydrocarbons							
C20-C30(Lubricant Oil Range)	NC	NC	NA	NA	NA	NA	0.13
PCDD/PCDFs							
2,3,7,8-TCDD	5.6E-06	3.4E-05	1.8E-12	3.7E-11	1.4E-13	3.0E-12	0.03
1,2,3,7,8-PeCDD	1.6E-05	9.0E-05	5.2E-12	9.7E-11	4.2E-13	7.7E-12	0.03
1,2,3,4,7,8-HxCDD	4.1E-05	1.0E-04	1.3E-11	1.1E-10	1.1E-12	8.9E-12	0.03
1,2,3,6,7,8-HxCDD	2.0E-04	5.4E-04	6.5E-11	5.7E-10	5.2E-12	4.6E-11	0.03
1,2,3,7,8,9-HxCDD	7.1E-05	4.7E-04	2.3E-11	5.0E-10	1.8E-12	4.0E-11	0.03
1,2,3,4,6,7,8-HpCDD	4.7E-03	1.2E-02	1.5E-09	1.3E-08	1.2E-10	1.0E-09	0.03
OCDD	5.4E-02	1.4E-01	1.8E-08	1.5E-07	1.4E-09	1.2E-08	0.03
2,3,7,8-TCDF	3.1E-06	5.7E-06	1.0E-12	6.1E-12	8.0E-14	4.9E-13	0.03
1,2,3,7,8-PeCDF	3.6E-06	1.0E-05	1.2E-12	1.1E-11	9.2E-14	8.6E-13	0.03
2,3,4,7,8-PeCDF	8.8E-06	1.7E-05	2.8E-12	1.9E-11	2.3E-13	1.5E-12	0.03
1,2,3,4,7,8-HxCDF	2.7E-05	6.3E-05	8.7E-12	6.7E-11	7.0E-13	5.4E-12	0.03
1,2,3,6,7,8-HxCDF	2.1E-05	4.9E-05	6.7E-12	5.2E-11	5.4E-13	4.2E-12	0.03
2,3,4,6,7,8-HxCDF	4.3E-05	1.1E-04	1.4E-11	1.1E-10	1.1E-12	9.1E-12	0.03
1,2,3,7,8,9-HxCDF	6.9E-06	1.4E-05	2.2E-12	1.5E-11	1.8E-13	1.2E-12	0.03
1,2,3,4,6,7,8-HpCDF	7.7E-04	2.0E-03	2.5E-10	2.1E-09	2.0E-11	1.7E-10	0.03
1,2,3,4,7,8,9-HpCDF	7.2E-05	1.8E-04	2.3E-11	2.0E-10	1.9E-12	1.6E-11	0.03
OCDF	2.0E-03	5.1E-03	6.5E-10	5.5E-09	5.2E-11	4.4E-10	0.03
Total Tetra	NC	NC	NA	NA	NA	NA	0.03
Total Penta	NC	NC	NA	NA	NA	NA	0.03
Total Hexa	NC	NC	NA	NA	NA	NA	0.03
Total Hepta	NC	NC	NA	NA	NA	NA	0.03
Total Octa	NC	NC	NA	NA	NA	NA	0.03
PCDD/PCDF	NC	NC	NA	NA	NA	NA	0.03

Spreadsheet C1-66 (3 of 3)

Estimates of Human Intake
Soil Dermal Contact Pathway for Child Resident
New Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times SA \times AF \times B \times CF \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Skin surface area per event	SA	cm^2/day	2800	2800
Soil loading to skin	AF	mg/cm^2	0.06	0.20
Bioavailability	B	fraction	CS	CS
Conversion factor	CF	kg/mg	1.E-06	1.E-06
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	6	6
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
PCBs							
Aroclor-1254	7.1E-02	7.1E-02	1.1E-07	3.6E-07	8.5E-09	2.8E-08	0.14
PCB-105	1.5E-05	2.1E-05	2.3E-11	1.1E-10	1.9E-12	8.5E-12	0.14
PCB-114	5.7E-07	7.7E-07	8.5E-13	3.9E-12	6.8E-14	3.1E-13	0.14
PCB-118	3.4E-05	4.6E-05	5.0E-11	2.3E-10	4.0E-12	1.8E-11	0.14
PCB-123	3.7E-07	5.1E-07	5.6E-13	2.6E-12	4.5E-14	2.0E-13	0.14
PCB-126	9.4E-07	1.3E-06	1.4E-12	6.4E-12	1.1E-13	5.2E-13	0.14
PCB-156	7.9E-06	1.1E-05	1.2E-11	5.4E-11	9.5E-13	4.3E-12	0.14
PCB-157	2.6E-06	2.7E-06	3.8E-12	1.4E-11	3.1E-13	1.1E-12	0.14
PCB-167	4.4E-06	4.7E-06	6.6E-12	2.4E-11	5.3E-13	1.9E-12	0.14
PCB-169	6.8E-08	7.5E-08	1.0E-13	3.7E-13	8.2E-15	3.0E-14	0.14
PCB-189	6.5E-07	7.0E-07	9.8E-13	3.5E-12	7.9E-14	2.8E-13	0.14
PCB-77	1.9E-06	2.6E-06	2.9E-12	1.3E-11	2.3E-13	1.1E-12	0.14
PCB-81	3.7E-07	5.1E-07	5.6E-13	2.6E-12	4.5E-14	2.0E-13	0.14

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005),
except dermal absorption factors which were taken from USEPA (2001).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyls
mg/kg-day - milligrams per kilogram per day
mg/kg - milligrams per kilogram

Estimates of Human Intake
Soil Ingestion Pathway for Child Resident
New Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times CF \times FT \times EF \times ED \times B}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Soil ingestion rate	IR	mg/day	100	200
Conversion factor	CF	kg/mg	1.E-06	1.E-06
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	6	6
Bioavailability	B	fraction	CS	CS
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
Inorganic Compounds							
Barium	2.2E+02	9.6E+02	1.4E-03	1.2E-02	1.1E-04	9.8E-04	1
Cadmium	1.8E+00	1.3E+01	1.1E-05	1.7E-04	9.2E-07	1.4E-05	1
Chromium	2.3E+01	4.1E+01	1.5E-04	5.2E-04	1.2E-05	4.2E-05	1
Copper	2.9E+01	8.2E+01	1.8E-04	1.0E-03	1.5E-05	8.4E-05	1
Lead	2.6E+01	3.5E+01	1.6E-04	4.5E-04	1.3E-05	3.6E-05	1
Mercury	1.2E-01	6.4E-01	7.8E-07	8.2E-06	6.3E-08	6.6E-07	1
Molybdenum	3.4E+00	6.0E+00	2.2E-05	7.7E-05	1.7E-06	6.1E-06	1
Nickel	2.2E+01	5.7E+01	1.4E-04	7.3E-04	1.1E-05	5.8E-05	1
Nitrate	NC	NC	NA	NA	NA	NA	1
Selenium	1.7E+00	3.0E+00	1.1E-05	3.8E-05	8.5E-07	3.1E-06	1
Silver	1.5E+01	9.6E+01	9.9E-05	1.2E-03	7.9E-06	9.8E-05	1
Thallium	NC	NC	NA	NA	NA	NA	1
Zinc	5.4E+02	2.8E+03	3.5E-03	3.6E-02	2.8E-04	2.9E-03	1
VOCs							
1,1-Dichloroethane	NC	NC	NA	NA	NA	NA	1
1,2-Dichloroethane	NC	NC	NA	NA	NA	NA	1
Acetone	NC	NC	NA	NA	NA	NA	1
Benzene	NC	NC	NA	NA	NA	NA	1
Carbon disulfide	NC	NC	NA	NA	NA	NA	1
Chloromethane	NC	NC	NA	NA	NA	NA	1
cis-1,2-Dichloroethene	NC	NC	NA	NA	NA	NA	1
Methylene chloride	NC	NC	NA	NA	NA	NA	1
Toluene	5.3E-02	1.1E-01	3.4E-07	1.4E-06	2.7E-08	1.1E-07	1
Trichloroethene	NC	NC	NA	NA	NA	NA	1
SVOCs							
Benzo(a)anthracene	3.6E-02	1.2E-02	2.3E-07	1.5E-07	1.9E-08	1.2E-08	1
Benzo(a)pyrene	4.0E-02	4.3E-02	2.5E-07	5.5E-07	2.0E-08	4.4E-08	1
Benzo(b)fluoranthene	4.3E-02	6.5E-02	2.8E-07	8.3E-07	2.2E-08	6.6E-08	1
Benzo(g,h,i)perylene	3.9E-02	3.1E-02	2.5E-07	4.0E-07	2.0E-08	3.2E-08	1
Benzo(k)fluoranthene	3.6E-02	1.2E-02	2.3E-07	1.5E-07	1.9E-08	1.2E-08	1
Chrysene	4.0E-02	2.7E-02	2.5E-07	3.5E-07	2.0E-08	2.8E-08	1
Dibenz(a,h)anthracene	3.6E-02	8.0E-03	2.3E-07	1.0E-07	1.8E-08	8.2E-09	1
Fluoranthene	4.3E-02	3.6E-02	2.7E-07	4.6E-07	2.2E-08	3.7E-08	1
Indeno(1,2,3-cd)pyrene	4.1E-02	5.3E-02	2.6E-07	6.8E-07	2.1E-08	5.4E-08	1
Phenanthrene	3.7E-02	1.4E-02	2.3E-07	1.8E-07	1.9E-08	1.4E-08	1
Pyrene	4.3E-02	4.3E-02	2.7E-07	5.5E-07	2.2E-08	4.4E-08	1

Spreadsheet C1-65 (2 of 3)

Estimates of Human Intake
Soil Ingestion Pathway for Child Resident
New Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times CF \times FT \times EF \times ED \times B}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Soil ingestion rate	IR	mg/day	100	200
Conversion factor	CF	kg/mg	1.E-06	1.E-06
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	6	6
Bioavailability	B	fraction	CS	CS
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
Total Petroleum Hydrocarbons							
C20-C30(Lubricant Oil Range)	NC	NC	NA	NA	NA	NA	1
PCDD/PCDFs							
2,3,7,8-TCDD	5.6E-06	3.4E-05	3.6E-11	4.4E-10	2.9E-12	3.5E-11	1
1,2,3,7,8-PeCDD	1.6E-05	9.0E-05	1.0E-10	1.2E-09	8.3E-12	9.2E-11	1
1,2,3,4,7,8-HxCDD	4.1E-05	1.0E-04	2.6E-10	1.3E-09	2.1E-11	1.1E-10	1
1,2,3,6,7,8-HxCDD	2.0E-04	5.4E-04	1.3E-09	6.8E-09	1.0E-10	5.5E-10	1
1,2,3,7,8,9-HxCDD	7.1E-05	4.7E-04	4.6E-10	6.0E-09	3.6E-11	4.8E-10	1
1,2,3,4,6,7,8-HpCDD	4.7E-03	1.2E-02	3.0E-08	1.5E-07	2.4E-09	1.2E-08	1
OCDD	5.4E-02	1.4E-01	3.5E-07	1.8E-06	2.8E-08	1.4E-07	1
2,3,7,8-TCDF	3.1E-06	5.7E-06	2.0E-11	7.3E-11	1.6E-12	5.8E-12	1
1,2,3,7,8-PeCDF	3.6E-06	1.0E-05	2.3E-11	1.3E-10	1.8E-12	1.0E-11	1
2,3,4,7,8-PeCDF	8.8E-06	1.7E-05	5.6E-11	2.2E-10	4.5E-12	1.8E-11	1
1,2,3,4,7,8-HxCDF	2.7E-05	6.3E-05	1.7E-10	8.0E-10	1.4E-11	6.4E-11	1
1,2,3,6,7,8-HxCDF	2.1E-05	4.9E-05	1.3E-10	6.2E-10	1.1E-11	5.0E-11	1
2,3,4,6,7,8-HxCDF	4.3E-05	1.1E-04	2.8E-10	1.4E-09	2.2E-11	1.1E-10	1
1,2,3,7,8,9-HxCDF	6.9E-06	1.4E-05	4.4E-11	1.8E-10	3.5E-12	1.4E-11	1
1,2,3,4,6,7,8-HpCDF	7.7E-04	2.0E-03	4.9E-09	2.6E-08	4.0E-10	2.0E-09	1
1,2,3,4,7,8,9-HpCDF	7.2E-05	1.8E-04	4.6E-10	2.3E-09	3.7E-11	1.9E-10	1
OCDF	2.0E-03	5.1E-03	1.3E-08	6.5E-08	1.0E-09	5.2E-09	1
Total Tetra	NC	NC	NA	NA	NA	NA	1
Total Penta	NC	NC	NA	NA	NA	NA	1
Total Hexa	NC	NC	NA	NA	NA	NA	1
Total Hepta	NC	NC	NA	NA	NA	NA	1
Total Octa	NC	NC	NA	NA	NA	NA	1
PCDD/PCDF	NC	NC	NA	NA	NA	NA	1

Spreadsheet C1-65 (3 of 3)

Estimates of Human Intake
Soil Ingestion Pathway for Child Resident
New Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times CF \times FT \times EF \times ED \times B}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Soil ingestion rate	IR	mg/day	100	200
Conversion factor	CF	kg/mg	1.E-06	1.E-06
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	6	6
Bioavailability	B	fraction	CS	CS
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
PCBs							
Aroclor-1254	7.1E-02	7.1E-02	4.5E-07	9.1E-07	3.6E-08	7.3E-08	1
PCB-105	1.5E-05	2.1E-05	9.9E-11	2.7E-10	7.9E-12	2.2E-11	1
PCB-114	5.7E-07	7.7E-07	3.6E-12	9.9E-12	2.9E-13	7.9E-13	1
PCB-118	3.4E-05	4.6E-05	2.1E-10	5.9E-10	1.7E-11	4.7E-11	1
PCB-123	3.7E-07	5.1E-07	2.4E-12	6.5E-12	1.9E-13	5.2E-13	1
PCB-126	9.4E-07	1.3E-06	6.0E-12	1.6E-11	4.8E-13	1.3E-12	1
PCB-156	7.9E-06	1.1E-05	5.0E-11	1.4E-10	4.0E-12	1.1E-11	1
PCB-157	2.6E-06	2.7E-06	1.6E-11	3.5E-11	1.3E-12	2.8E-12	1
PCB-167	4.4E-06	4.7E-06	2.8E-11	6.0E-11	2.3E-12	4.8E-12	1
PCB-169	6.8E-08	7.5E-08	4.4E-13	9.5E-13	3.5E-14	7.6E-14	1
PCB-189	6.5E-07	7.0E-07	4.2E-12	9.0E-12	3.3E-13	7.2E-13	1
PCB-77	1.9E-06	2.6E-06	1.2E-11	3.4E-11	9.9E-13	2.7E-12	1
PCB-81	3.7E-07	5.1E-07	2.4E-12	6.5E-12	1.9E-13	5.2E-13	1

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyls
mg/kg-day - milligrams per kilogram perday
mg/kg - milligrams per kilogram

Estimates of Human Intake
Edible Plant Ingestion Pathway for Adult Resident
New Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times CF \times F \times EF \times ED \times B}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Plant concentration	C	mg/kg	CS	CS
Plant ingestion rate	IR	g/day	147	702
Conversion factor	CF	kg/g	1.E-03	1.E-03
Fraction locally grown	F	unitless	0.24	1.0
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	9	24
Bioavailability	B	fraction	CS	CS
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
Inorganic Compounds							
Barium	1.7E+01	7.4E+01	8.1E-03	3.6E-02	9.7E-04	2.3E-01	1
Cadmium	9.2E-02	6.8E-01	4.5E-05	3.3E-04	5.4E-06	2.1E-03	1
Chromium	2.3E-02	3.9E-02	1.1E-05	1.9E-05	1.3E-06	1.2E-04	1
Copper	0.0E+00	0.0E+00	0.0E+00	0.0E+00	0.0E+00	0.0E+00	1
Lead	9.8E-02	1.3E-01	4.8E-05	6.5E-05	5.7E-06	4.1E-04	1
Mercury	9.7E-03	5.1E-02	4.7E-06	2.5E-05	5.6E-07	1.6E-04	1
Molybdenum	7.5E-02	1.3E-01	3.6E-05	6.5E-05	4.4E-06	4.1E-04	1
Nickel	2.3E-01	5.9E-01	1.1E-04	2.9E-04	1.3E-05	1.8E-03	1
Nitrate	NC	NC	NA	NA	NA	NA	1
Selenium	6.0E-02	1.1E-01	2.9E-05	5.3E-05	3.5E-06	3.4E-04	1
Silver	4.2E-03	2.6E-02	2.1E-06	1.3E-05	2.5E-07	8.1E-05	1
Thallium	NC	NC	NA	NA	NA	NA	1
Zinc	1.1E+02	5.4E+02	5.1E-02	2.6E-01	6.1E-03	1.7E+00	1
							1
VOCs							1
1,1-Dichloroethane	NC	NC	NA	NA	NA	NA	1
1,2-Dichloroethane	NC	NC	NA	NA	NA	NA	1
Acetone	NC	NC	NA	NA	NA	NA	1
Benzene	NC	NC	NA	NA	NA	NA	1
Carbon disulfide	NC	NC	NA	NA	NA	NA	1
Chloromethane	NC	NC	NA	NA	NA	NA	1
cis-1,2-Dichloroethene	NC	NC	NA	NA	NA	NA	1
Methylene chloride	NC	NC	NA	NA	NA	NA	1
Toluene	1.9E-01	4.0E-01	9.3E-05	1.9E-04	1.1E-05	1.2E-03	1
Trichloroethene	NC	NC	NA	NA	NA	NA	1
SVOCs							
Benzo(a)anthracene	2.5E-03	8.3E-04	1.2E-06	4.0E-07	1.5E-07	2.5E-06	1
Benzo(a)pyrene	1.2E-03	1.3E-03	5.6E-07	6.0E-07	6.7E-08	3.8E-06	1
Benzo(b)fluoranthene	1.4E-03	2.0E-03	6.6E-07	9.9E-07	7.9E-08	6.3E-06	1
Benzo(g,h,i)perylene	9.2E-04	7.3E-04	4.4E-07	3.5E-07	5.3E-08	2.2E-06	1
Benzo(k)fluoranthene	1.5E-03	5.1E-04	7.5E-07	2.5E-07	9.0E-08	1.6E-06	1
Chrysene	2.5E-03	1.7E-03	1.2E-06	8.3E-07	1.5E-07	5.3E-06	1
Dibenz(a,h)anthracene	5.4E-04	1.2E-04	2.6E-07	5.8E-08	3.1E-08	3.7E-07	1
Fluoranthene	6.5E-03	5.5E-03	3.1E-06	2.6E-06	3.8E-07	1.7E-05	1
Indeno(1,2,3-cd)pyrene	3.6E-04	4.6E-04	1.7E-07	2.2E-07	2.1E-08	1.4E-06	1
Phenanthrene	1.1E-02	4.3E-03	5.5E-06	2.1E-06	6.6E-07	1.3E-05	1
Pyrene	7.3E-03	7.3E-03	3.5E-06	3.5E-06	4.2E-07	2.3E-05	1

Spreadsheet C1-64 (2 of 3)

Estimates of Human Intake
Edible Plant Ingestion Pathway for Adult Resident
New Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times CF \times F \times EF \times ED \times B}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Plant concentration	C	mg/kg	CS	CS
Plant ingestion rate	IR	g/day	147	702
Conversion factor	CF	kg/g	1.E-03	1.E-03
Fraction locally grown	F	unitless	0.24	1.0
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	9	24
Bioavailability	B	fraction	CS	CS
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
Total Petroleum Hydrocarbons							
C20-C30(Lubricant Oil Range)	NC	NC	NA	NA	NA	NA	1
PCDD/PCDFs							
2,3,7,8-TCDD	NC	NC	NA	NA	NA	NA	1
1,2,3,7,8-PeCDD	NC	NC	NA	NA	NA	NA	1
1,2,3,4,7,8-HxCDD	NC	NC	NA	NA	NA	NA	1
1,2,3,6,7,8-HxCDD	NC	NC	NA	NA	NA	NA	1
1,2,3,7,8,9-HxCDD	NC	NC	NA	NA	NA	NA	1
1,2,3,4,6,7,8-HpCDD	NC	NC	NA	NA	NA	NA	1
OCDD	NC	NC	NA	NA	NA	NA	1
2,3,7,8-TCDF	NC	NC	NA	NA	NA	NA	1
1,2,3,7,8-PeCDF	NC	NC	NA	NA	NA	NA	1
2,3,4,7,8-PeCDF	NC	NC	NA	NA	NA	NA	1
1,2,3,4,7,8-HxCDF	NC	NC	NA	NA	NA	NA	1
1,2,3,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA	1
2,3,4,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA	1
1,2,3,7,8,9-HxCDF	NC	NC	NA	NA	NA	NA	1
1,2,3,4,6,7,8-HpCDF	NC	NC	NA	NA	NA	NA	1
1,2,3,4,7,8,9-HpCDF	NC	NC	NA	NA	NA	NA	1
OCDF	NC	NC	NA	NA	NA	NA	1
Total Tetra	NC	NC	NA	NA	NA	NA	1
Total Penta	NC	NC	NA	NA	NA	NA	1
Total Hexa	NC	NC	NA	NA	NA	NA	1
Total Hepta	NC	NC	NA	NA	NA	NA	1
Total Octa	NC	NC	NA	NA	NA	NA	1
PCDD/PCDF	NC	NC	NA	NA	NA	NA	1

Spreadsheet C1-64 (3 of 3)

Estimates of Human Intake
Edible Plant Ingestion Pathway for Adult Resident
New Conservation Yard RFI Site

Intake Equation:

$$\text{Dosage} = \frac{C \times IR \times CF \times F \times EF \times ED \times B}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Plant concentration	C	mg/kg	CS	CS
Plant ingestion rate	IR	g/day	147	702
Conversion factor	CF	kg/g	1.E-03	1.E-03
Fraction locally grown	F	unitless	0.24	1.0
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	9	24
Bioavailability	B	fraction	CS	CS
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
PCBs							
Aroclor-1254	2.2E-03	2.2E-03	1.1E-06	1.1E-06	1.3E-07	6.7E-06	1
PCB-105	4.8E-07	6.5E-07	2.3E-10	3.1E-10	2.8E-11	2.0E-09	1
PCB-114	1.7E-08	2.4E-08	8.4E-12	1.2E-11	1.0E-12	7.3E-11	1
PCB-118	1.0E-06	1.4E-06	5.0E-10	6.8E-10	6.0E-11	4.3E-09	1
PCB-123	1.1E-08	1.6E-08	5.6E-12	7.6E-12	6.7E-13	4.8E-11	1
PCB-126	2.9E-08	4.0E-08	1.4E-11	1.9E-11	1.7E-12	1.2E-10	1
PCB-156	2.4E-07	3.3E-07	1.2E-10	1.6E-10	1.4E-11	1.0E-09	1
PCB-157	7.9E-08	8.4E-08	3.8E-11	4.1E-11	4.6E-12	2.6E-10	1
PCB-167	1.4E-07	1.5E-07	6.6E-11	7.0E-11	7.9E-12	4.5E-10	1
PCB-169	2.1E-09	2.3E-09	1.0E-12	1.1E-12	1.2E-13	7.1E-12	1
PCB-189	2.0E-08	2.2E-08	9.7E-12	1.0E-11	1.2E-12	6.6E-11	1
PCB-77	3.4E-08	4.6E-08	1.6E-11	2.2E-11	2.0E-12	1.4E-10	1
PCB-81	6.6E-09	9.0E-09	3.2E-12	4.3E-12	3.8E-13	2.8E-11	1

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyls
mg/kg-day - milligrams per kilogram per day
mg/kg - milligrams per kilogram

Estimates of Human Intake
Domestic Groundwater Use for Adult Resident
New Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED \times B}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Groundwater concentration	C	mg/L	CS	CS
Groundwater ingestion rate$_{vocs}$	IR	L/day	2.0	3.1
Groundwater ingestion rate$_{non\text{-}vocs}$	IR	L/day	1.0	1.5
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	9	24
Bioavailability	B	fraction	CS	CS
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/L)	RME EPC (mg/L)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
Inorganic Compounds							
Barium	NC	NC	NA	NA	NA	NA	1
Cadmium	NC	NC	NA	NA	NA	NA	1
Chromium	NC	NC	NA	NA	NA	NA	1
Copper	1.8E-02	1.8E-02	2.5E-04	3.8E-04	3.0E-05	1.2E-04	1
Fluoride	5.6E-01	5.6E-01	7.7E-03	1.2E-02	9.2E-04	3.8E-03	1
Lead	NC	NC	NA	NA	NA	NA	1
Mercury	NC	NC	NA	NA	NA	NA	1
Molybdenum	NC	NC	NA	NA	NA	NA	1
Nickel	NC	NC	NA	NA	NA	NA	1
Nitrate	1.4E+01	1.4E+01	1.9E-01	3.0E-01	2.3E-02	9.6E-02	1
Selenium	NC	NC	NA	NA	NA	NA	1
Silver	NC	NC	NA	NA	NA	NA	1
Thallium	5.4E-04	5.4E-04	7.4E-06	1.1E-05	8.9E-07	3.6E-06	1
Zinc	NC	NC	NA	NA	NA	NA	1
VOCs							
1,1-Dichloroethane	2.6E-03	2.6E-03	7.1E-05	1.1E-04	8.5E-06	3.5E-05	1
1,2-Dichloroethane	9.0E-04	9.0E-04	2.5E-05	3.8E-05	3.0E-06	1.2E-05	1
Acetone	1.6E-02	1.6E-02	4.4E-04	6.8E-04	5.3E-05	2.2E-04	1
Benzene	5.8E-04	5.8E-04	1.6E-05	2.4E-05	1.9E-06	7.8E-06	1
Carbon disulfide	2.6E-03	2.6E-03	7.1E-05	1.1E-04	8.5E-06	3.5E-05	1
Chloromethane	3.2E-04	3.2E-04	8.8E-06	1.4E-05	1.1E-06	4.3E-06	1
cis-1,2-Dichloroethene	5.1E-02	5.1E-02	1.4E-03	2.2E-03	1.7E-04	6.9E-04	1
Methylene chloride	6.4E-04	6.4E-04	1.8E-05	2.7E-05	2.1E-06	8.6E-06	1
Toluene	1.8E-03	1.8E-03	4.9E-05	7.6E-05	5.9E-06	2.4E-05	1
Trichloroethene	1.0E-02	1.0E-02	2.7E-04	4.2E-04	3.3E-05	1.4E-04	1
SVOCs							
Benzo(a)anthracene	NC	NC	NA	NA	NA	NA	1
Benzo(a)pyrene	NC	NC	NA	NA	NA	NA	1
Benzo(b)fluoranthene	NC	NC	NA	NA	NA	NA	1
Benzo(g,h,i)perylene	NC	NC	NA	NA	NA	NA	1
Benzo(k)fluoranthene	NC	NC	NA	NA	NA	NA	1
Chrysene	NC	NC	NA	NA	NA	NA	1
Dibenz(a,h)anthracene	NC	NC	NA	NA	NA	NA	1
Fluoranthene	NC	NC	NA	NA	NA	NA	1
Indeno(1,2,3-cd)pyrene	NC	NC	NA	NA	NA	NA	1
Phenanthrene	NC	NC	NA	NA	NA	NA	1
Pyrene	NC	NC	NA	NA	NA	NA	1

Spreadsheet C1-63 (2 of 2)

Estimates of Human Intake
Domestic Groundwater Use for Adult Resident
New Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED \times B}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Groundwater concentration	C	mg/L	CS	CS
Groundwater ingestion rate$_{vocs}$	IR	L/day	2.0	3.1
Groundwater ingestion rate$_{non\text{-}vocs}$	IR	L/day	1.0	1.5
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	9	24
Bioavailability	B	fraction	CS	CS
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/L)	RME EPC (mg/L)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
Total Petroleum Hydrocarbons							
C20-C30(Lubricant Oil Range)	5.0E-02	5.0E-02	6.8E-04	1.1E-03	8.2E-05	3.4E-04	1
PCDD/PCDFs							
2,3,7,8-TCDD	NC	NC	NA	NA	NA	NA	1
1,2,3,7,8-PeCDD	NC	NC	NA	NA	NA	NA	1
1,2,3,4,7,8-HxCDD	NC	NC	NA	NA	NA	NA	1
1,2,3,6,7,8-HxCDD	NC	NC	NA	NA	NA	NA	1
1,2,3,7,8,9-HxCDD	NC	NC	NA	NA	NA	NA	1
1,2,3,4,6,7,8-HpCDD	NC	NC	NA	NA	NA	NA	1
OCDD	NC	NC	NA	NA	NA	NA	1
2,3,7,8-TCDF	NC	NC	NA	NA	NA	NA	1
1,2,3,7,8-PeCDF	NC	NC	NA	NA	NA	NA	1
2,3,4,7,8-PeCDF	NC	NC	NA	NA	NA	NA	1
1,2,3,4,7,8-HxCDF	NC	NC	NA	NA	NA	NA	1
1,2,3,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA	1
2,3,4,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA	1
1,2,3,7,8,9-HxCDF	NC	NC	NA	NA	NA	NA	1
1,2,3,4,6,7,8-HpCDF	NC	NC	NA	NA	NA	NA	1
1,2,3,4,7,8,9-HpCDF	NC	NC	NA	NA	NA	NA	1
OCDF	NC	NC	NA	NA	NA	NA	1
Total Tetra	NC	NC	NA	NA	NA	NA	1
Total Penta	NC	NC	NA	NA	NA	NA	1
Total Hexa	NC	NC	NA	NA	NA	NA	1
Total Hepta	NC	NC	NA	NA	NA	NA	1
Total Octa	NC	NC	NA	NA	NA	NA	1
PCDD/PCDF	NC	NC	NA	NA	NA	NA	1
Aroclor-1254	NC	NC	NA	NA	NA	NA	1
PCB-105	NC	NC	NA	NA	NA	NA	1
PCB-114	NC	NC	NA	NA	NA	NA	1
PCB-118	NC	NC	NA	NA	NA	NA	1
PCB-123	NC	NC	NA	NA	NA	NA	1
PCB-126	NC	NC	NA	NA	NA	NA	1
PCB-156	NC	NC	NA	NA	NA	NA	1
PCB-157	NC	NC	NA	NA	NA	NA	1
PCB-167	NC	NC	NA	NA	NA	NA	1
PCB-169	NC	NC	NA	NA	NA	NA	1
PCB-189	NC	NC	NA	NA	NA	NA	1
PCB-77	NC	NC	NA	NA	NA	NA	1
PCB-81	NC	NC	NA	NA	NA	NA	1

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
mg/kg-day - milligrams per kilogram per day
mg/L - milligrams per liter

Estimates of Human Intake
Groundwater to Indoor Air Pathway for Adult Resident
New Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	7.0	13.2
Fraction of time indoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	9	24
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Inorganic Compounds						
Barium	NC	NC	NA	NA	NA	NA
Cadmium	NC	NC	NA	NA	NA	NA
Chromium	NC	NC	NA	NA	NA	NA
Copper	NC	NC	NA	NA	NA	NA
Lead	NC	NC	NA	NA	NA	NA
Mercury	NC	NC	NA	NA	NA	NA
Molybdenum	NC	NC	NA	NA	NA	NA
Nickel	NC	NC	NA	NA	NA	NA
Nitrate	NC	NC	NA	NA	NA	NA
Selenium	NC	NC	NA	NA	NA	NA
Silver	NC	NC	NA	NA	NA	NA
Thallium	NC	NC	NA	NA	NA	NA
Zinc	NC	NC	NA	NA	NA	NA
VOCs						
1,1-Dichloroethane	NC	NC	NA	NA	NA	NA
1,2-Dichloroethane	NC	NC	NA	NA	NA	NA
Acetone	4.5E-07	4.5E-07	2.1E-08	6.0E-08	2.6E-09	1.9E-08
Benzene	NC	NC	NA	NA	NA	NA
Carbon disulfide	NC	NC	NA	NA	NA	NA
Chloromethane	NC	NC	NA	NA	NA	NA
cis-1,2-Dichloroethene	NC	NC	NA	NA	NA	NA
Methylene chloride	NC	NC	NA	NA	NA	NA
Toluene	8.0E-06	8.0E-06	3.8E-07	1.1E-06	4.6E-08	3.5E-07
Trichloroethene	3.7E-06	3.7E-06	1.8E-07	5.1E-07	2.2E-08	1.6E-07
SVOCs						
Benzo(a)anthracene	NC	NC	NA	NA	NA	NA
Benzo(a)pyrene	NC	NC	NA	NA	NA	NA
Benzo(b)fluoranthene	NC	NC	NA	NA	NA	NA
Benzo(g,h,i)perylene	NC	NC	NA	NA	NA	NA
Benzo(k)fluoranthene	NC	NC	NA	NA	NA	NA
Chrysene	NC	NC	NA	NA	NA	NA
Dibenz(a,h)anthracene	NC	NC	NA	NA	NA	NA
Fluoranthene	NC	NC	NA	NA	NA	NA
Indeno(1,2,3-cd)pyrene	NC	NC	NA	NA	NA	NA
Phenanthrene	NC	NC	NA	NA	NA	NA
Pyrene	NC	NC	NA	NA	NA	NA

Spreadsheet C1-62 (2 of 3)

Estimates of Human Intake
Groundwater to Indoor Air Pathway for Adult Resident
New Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	7.0	13.2
Fraction of time indoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	9	24
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Total Petroleum Hydrocarbons						
C20-C30(Lubricant Oil Range)	NC	NC	NA	NA	NA	NA
PCDD/PCDFs						
2,3,7,8-TCDD	NC	NC	NA	NA	NA	NA
1,2,3,7,8-PeCDD	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,6,7,8-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,7,8,9-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,4,6,7,8-HpCDD	NC	NC	NA	NA	NA	NA
OCDD	NC	NC	NA	NA	NA	NA
2,3,7,8-TCDF	NC	NC	NA	NA	NA	NA
1,2,3,7,8-PeCDF	NC	NC	NA	NA	NA	NA
2,3,4,7,8-PeCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA
2,3,4,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,7,8,9-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,6,7,8-HpCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8,9-HpCDF	NC	NC	NA	NA	NA	NA
OCDF	NC	NC	NA	NA	NA	NA
Total Tetra	NC	NC	NA	NA	NA	NA
Total Penta	NC	NC	NA	NA	NA	NA
Total Hexa	NC	NC	NA	NA	NA	NA
Total Hepta	NC	NC	NA	NA	NA	NA
Total Octa	NC	NC	NA	NA	NA	NA
PCDD/PCDF	NC	NC	NA	NA	NA	NA
Aroclor-1254	NC	NC	NA	NA	NA	NA
PCB-105	NC	NC	NA	NA	NA	NA
PCB-114	NC	NC	NA	NA	NA	NA
PCB-118	NC	NC	NA	NA	NA	NA
PCB-123	NC	NC	NA	NA	NA	NA
PCB-126	NC	NC	NA	NA	NA	NA
PCB-156	NC	NC	NA	NA	NA	NA
PCB-157	NC	NC	NA	NA	NA	NA
PCB-167	NC	NC	NA	NA	NA	NA
PCB-169	NC	NC	NA	NA	NA	NA
PCB-189	NC	NC	NA	NA	NA	NA
PCB-77	NC	NC	NA	NA	NA	NA
PCB-81	NC	NC	NA	NA	NA	NA

Notes:

Spreadsheet C1-62 (3 of 3)

Estimates of Human Intake
Groundwater to Indoor Air Pathway for Adult Resident
New Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	7.0	13.2
Fraction of time indoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	9	24
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)

CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
mg/kg-day - milligrams per kilogram per day
mg/m^3 - milligrams per cubic meter

Estimates of Human Intake
Soil to Indoor Air Pathway for Adult Resident
New Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	7.0	13.2
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	9	24
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Inorganic Compounds						
Barium	NC	NC	NA	NA	NA	NA
Cadmium	NC	NC	NA	NA	NA	NA
Chromium	NC	NC	NA	NA	NA	NA
Copper	NC	NC	NA	NA	NA	NA
Lead	NC	NC	NA	NA	NA	NA
Mercury	NC	NC	NA	NA	NA	NA
Molybdenum	NC	NC	NA	NA	NA	NA
Nickel	NC	NC	NA	NA	NA	NA
Nitrate	NC	NC	NA	NA	NA	NA
Selenium	NC	NC	NA	NA	NA	NA
Silver	NC	NC	NA	NA	NA	NA
Thallium	NC	NC	NA	NA	NA	NA
Zinc	NC	NC	NA	NA	NA	NA
VOCs						
1,1-Dichloroethane	NC	NC	NA	NA	NA	NA
1,2-Dichloroethane	NC	NC	NA	NA	NA	NA
Acetone	NC	NC	NA	NA	NA	NA
Benzene	NC	NC	NA	NA	NA	NA
Carbon disulfide	NC	NC	NA	NA	NA	NA
Chloromethane	NC	NC	NA	NA	NA	NA
cis-1,2-Dichloroethene	NC	NC	NA	NA	NA	NA
Methylene chloride	NC	NC	NA	NA	NA	NA
Toluene	3.6E-02	7.4E-02	1.7E-03	1.0E-02	2.1E-04	3.2E-03
Trichloroethene	NC	NC	NA	NA	NA	NA
SVOCs						
Benzo(a)anthracene	NC	NC	NA	NA	NA	NA
Benzo(a)pyrene	NC	NC	NA	NA	NA	NA
Benzo(b)fluoranthene	NC	NC	NA	NA	NA	NA
Benzo(g,h,i)perylene	NC	NC	NA	NA	NA	NA
Benzo(k)fluoranthene	NC	NC	NA	NA	NA	NA
Chrysene	NC	NC	NA	NA	NA	NA
Dibenz(a,h)anthracene	NC	NC	NA	NA	NA	NA
Fluoranthene	NC	NC	NA	NA	NA	NA
Indeno(1,2,3-cd)pyrene	NC	NC	NA	NA	NA	NA
Phenanthrene	NC	NC	NA	NA	NA	NA
Pyrene	NC	NC	NA	NA	NA	NA

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Estimates of Human Intake
Soil to Indoor Air Pathway for Adult Resident
New Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	7.0	13.2
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	9	24
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Total Petroleum Hydrocarbons						
C20-C30(Lubricant Oil Range)	NC	NC	NA	NA	NA	NA
PCDD/PCDFs						
2,3,7,8-TCDD	NC	NC	NA	NA	NA	NA
1,2,3,7,8-PeCDD	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,6,7,8-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,7,8,9-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,4,6,7,8-HpCDD	NC	NC	NA	NA	NA	NA
OCDD	NC	NC	NA	NA	NA	NA
2,3,7,8-TCDF	NC	NC	NA	NA	NA	NA
1,2,3,7,8-PeCDF	NC	NC	NA	NA	NA	NA
2,3,4,7,8-PeCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA
2,3,4,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,7,8,9-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,6,7,8-HpCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8,9-HpCDF	NC	NC	NA	NA	NA	NA
OCDF	NC	NC	NA	NA	NA	NA
Total Tetra	NC	NC	NA	NA	NA	NA
Total Penta	NC	NC	NA	NA	NA	NA
Total Hexa	NC	NC	NA	NA	NA	NA
Total Hepta	NC	NC	NA	NA	NA	NA
Total Octa	NC	NC	NA	NA	NA	NA
PCDD/PCDF	NC	NC	NA	NA	NA	NA

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Estimates of Human Intake
Soil to Indoor Air Pathway for Adult Resident
New Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	7.0	13.2
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	9	24
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
PCBs						
Aroclor-1254	NC	NC	NA	NA	NA	NA
PCB-105	NC	NC	NA	NA	NA	NA
PCB-114	NC	NC	NA	NA	NA	NA
PCB-118	NC	NC	NA	NA	NA	NA
PCB-123	NC	NC	NA	NA	NA	NA
PCB-126	NC	NC	NA	NA	NA	NA
PCB-156	NC	NC	NA	NA	NA	NA
PCB-157	NC	NC	NA	NA	NA	NA
PCB-167	NC	NC	NA	NA	NA	NA
PCB-169	NC	NC	NA	NA	NA	NA
PCB-189	NC	NC	NA	NA	NA	NA
PCB-77	NC	NC	NA	NA	NA	NA
PCB-81	NC	NC	NA	NA	NA	NA

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyls
mg/kg-day - milligrams per kilogram per day
mg/m^3 - milligrams per cubic meter

Estimates of Human Intake
Groundwater to Ambient Air Pathway for Adult Resident
New Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	7.0	13.2
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	9	24
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Inorganic Compounds						
Barium	NC	NC	NA	NA	NA	NA
Cadmium	NC	NC	NA	NA	NA	NA
Chromium	NC	NC	NA	NA	NA	NA
Copper	NC	NC	NA	NA	NA	NA
Lead	NC	NC	NA	NA	NA	NA
Mercury	NC	NC	NA	NA	NA	NA
Molybdenum	NC	NC	NA	NA	NA	NA
Nickel	NC	NC	NA	NA	NA	NA
Nitrate	NC	NC	NA	NA	NA	NA
Selenium	NC	NC	NA	NA	NA	NA
Silver	NC	NC	NA	NA	NA	NA
Thallium	NC	NC	NA	NA	NA	NA
Zinc	NC	NC	NA	NA	NA	NA
VOCs						
1,1-Dichloroethane	NC	NC	NA	NA	NA	NA
1,2-Dichloroethane	NC	NC	NA	NA	NA	NA
Acetone	7.3E-12	7.3E-12	3.5E-13	9.9E-13	4.2E-14	3.2E-13
Benzene	NC	NC	NA	NA	NA	NA
Carbon disulfide	NC	NC	NA	NA	NA	NA
Chloromethane	NC	NC	NA	NA	NA	NA
cis-1,2-Dichloroethene	NC	NC	NA	NA	NA	NA
Methylene chloride	NC	NC	NA	NA	NA	NA
Toluene	2.6E-07	2.6E-07	1.3E-08	3.6E-08	1.5E-09	1.1E-08
Trichloroethene	1.1E-07	1.1E-07	5.4E-09	1.5E-08	6.5E-10	4.9E-09
SVOCs						
Benzo(a)anthracene	NC	NC	NA	NA	NA	NA
Benzo(a)pyrene	NC	NC	NA	NA	NA	NA
Benzo(b)fluoranthene	NC	NC	NA	NA	NA	NA
Benzo(g,h,i)perylene	NC	NC	NA	NA	NA	NA
Benzo(k)fluoranthene	NC	NC	NA	NA	NA	NA
Chrysene	NC	NC	NA	NA	NA	NA
Dibenz(a,h)anthracene	NC	NC	NA	NA	NA	NA
Fluoranthene	NC	NC	NA	NA	NA	NA
Indeno(1,2,3-cd)pyrene	NC	NC	NA	NA	NA	NA
Phenanthrene	NC	NC	NA	NA	NA	NA
Pyrene	NC	NC	NA	NA	NA	NA

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Estimates of Human Intake
Groundwater to Ambient Air Pathway for Adult Resident
New Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	7.0	13.2
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	9	24
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Total Petroleum Hydrocarbons						
C20-C30(Lubricant Oil Range)	NC	NC	NA	NA	NA	NA
PCDD/PCDFs						
2,3,7,8-TCDD	NC	NC	NA	NA	NA	NA
1,2,3,7,8-PeCDD	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,6,7,8-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,7,8,9-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,4,6,7,8-HpCDD	NC	NC	NA	NA	NA	NA
OCDD	NC	NC	NA	NA	NA	NA
2,3,7,8-TCDF	NC	NC	NA	NA	NA	NA
1,2,3,7,8-PeCDF	NC	NC	NA	NA	NA	NA
2,3,4,7,8-PeCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA
2,3,4,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,7,8,9-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,6,7,8-HpCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8,9-HpCDF	NC	NC	NA	NA	NA	NA
OCDF	NC	NC	NA	NA	NA	NA
Total Tetra	NC	NC	NA	NA	NA	NA
Total Penta	NC	NC	NA	NA	NA	NA
Total Hexa	NC	NC	NA	NA	NA	NA
Total Hepta	NC	NC	NA	NA	NA	NA
Total Octa	NC	NC	NA	NA	NA	NA
PCDD/PCDF	NC	NC	NA	NA	NA	NA
Aroclor-1254	NC	NC	NA	NA	NA	NA
PCB-105	NC	NC	NA	NA	NA	NA
PCB-114	NC	NC	NA	NA	NA	NA
PCB-118	NC	NC	NA	NA	NA	NA
PCB-123	NC	NC	NA	NA	NA	NA
PCB-126	NC	NC	NA	NA	NA	NA
PCB-156	NC	NC	NA	NA	NA	NA
PCB-157	NC	NC	NA	NA	NA	NA
PCB-167	NC	NC	NA	NA	NA	NA
PCB-169	NC	NC	NA	NA	NA	NA
PCB-189	NC	NC	NA	NA	NA	NA
PCB-77	NC	NC	NA	NA	NA	NA
PCB-81	NC	NC	NA	NA	NA	NA

Notes:

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Estimates of Human Intake
Groundwater to Ambient Air Pathway for Adult Resident
New Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	7.0	13.2
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	9	24
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)

CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
mg/kg-day - milligrams per kilogram per day
mg/m^3 - milligrams per cubic meter

Estimates of Human Intake
Soil to Ambient Air Pathway for Adult Resident
New Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	7.0	13.2
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	9	24
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Inorganic Compounds						
Barium	NC	NC	NA	NA	NA	NA
Cadmium	NC	NC	NA	NA	NA	NA
Chromium	NC	NC	NA	NA	NA	NA
Copper	NC	NC	NA	NA	NA	NA
Lead	NC	NC	NA	NA	NA	NA
Mercury	NC	NC	NA	NA	NA	NA
Molybdenum	NC	NC	NA	NA	NA	NA
Nickel	NC	NC	NA	NA	NA	NA
Nitrate	NC	NC	NA	NA	NA	NA
Selenium	NC	NC	NA	NA	NA	NA
Silver	NC	NC	NA	NA	NA	NA
Thallium	NC	NC	NA	NA	NA	NA
Zinc	NC	NC	NA	NA	NA	NA
VOCs						
1,1-Dichloroethane	NC	NC	NA	NA	NA	NA
1,2-Dichloroethane	NC	NC	NA	NA	NA	NA
Acetone	NC	NC	NA	NA	NA	NA
Benzene	NC	NC	NA	NA	NA	NA
Carbon disulfide	NC	NC	NA	NA	NA	NA
Chloromethane	NC	NC	NA	NA	NA	NA
cis-1,2-Dichloroethene	NC	NC	NA	NA	NA	NA
Methylene chloride	NC	NC	NA	NA	NA	NA
Toluene	6.9E-04	6.9E-04	3.3E-05	9.3E-05	4.0E-06	3.0E-05
Trichloroethene	NC	NC	NA	NA	NA	NA
SVOCs						
Benzo(a)anthracene	NC	NC	NA	NA	NA	NA
Benzo(a)pyrene	NC	NC	NA	NA	NA	NA
Benzo(b)fluoranthene	NC	NC	NA	NA	NA	NA
Benzo(g,h,i)perylene	NC	NC	NA	NA	NA	NA
Benzo(k)fluoranthene	NC	NC	NA	NA	NA	NA
Chrysene	NC	NC	NA	NA	NA	NA
Dibenz(a,h)anthracene	NC	NC	NA	NA	NA	NA
Fluoranthene	NC	NC	NA	NA	NA	NA
Indeno(1,2,3-cd)pyrene	NC	NC	NA	NA	NA	NA
Phenanthrene	NC	NC	NA	NA	NA	NA
Pyrene	NC	NC	NA	NA	NA	NA

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Estimates of Human Intake
Soil to Ambient Air Pathway for Adult Resident
New Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	7.0	13.2
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	9	24
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Total Petroleum Hydrocarbons						
C20-C30(Lubricant Oil Range)	NC	NC	NA	NA	NA	NA
PCDD/PCDFs						
2,3,7,8-TCDD	NC	NC	NA	NA	NA	NA
1,2,3,7,8-PeCDD	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,6,7,8-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,7,8,9-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,4,6,7,8-HpCDD	NC	NC	NA	NA	NA	NA
OCDD	NC	NC	NA	NA	NA	NA
2,3,7,8-TCDF	NC	NC	NA	NA	NA	NA
1,2,3,7,8-PeCDF	NC	NC	NA	NA	NA	NA
2,3,4,7,8-PeCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA
2,3,4,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,7,8,9-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,6,7,8-HpCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8,9-HpCDF	NC	NC	NA	NA	NA	NA
OCDF	NC	NC	NA	NA	NA	NA
Total Tetra	NC	NC	NA	NA	NA	NA
Total Penta	NC	NC	NA	NA	NA	NA
Total Hexa	NC	NC	NA	NA	NA	NA
Total Hepta	NC	NC	NA	NA	NA	NA
Total Octa	NC	NC	NA	NA	NA	NA
PCDD/PCDF	NC	NC	NA	NA	NA	NA

Spreadsheet C1-58 (3 of 3)

Estimates of Human Intake
Soil to Ambient Air Pathway for Adult Resident
New Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	7.0	13.2
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	9	24
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
PCBs						
Aroclor-1254	NC	NC	NA	NA	NA	NA
PCB-105	NC	NC	NA	NA	NA	NA
PCB-114	NC	NC	NA	NA	NA	NA
PCB-118	NC	NC	NA	NA	NA	NA
PCB-123	NC	NC	NA	NA	NA	NA
PCB-126	NC	NC	NA	NA	NA	NA
PCB-156	NC	NC	NA	NA	NA	NA
PCB-157	NC	NC	NA	NA	NA	NA
PCB-167	NC	NC	NA	NA	NA	NA
PCB-169	NC	NC	NA	NA	NA	NA
PCB-189	NC	NC	NA	NA	NA	NA
PCB-77	NC	NC	NA	NA	NA	NA
PCB-81	NC	NC	NA	NA	NA	NA

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyls
mg/kg-day - milligrams per kilogram per day
mg/m^3 - milligrams per cubic meter

Estimates of Human Intake
Soil Particulate Inhalation Pathway for Adult Resident
New Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times CF \times IR \times FT \times EF \times ED}{PEF \times BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Inhalation rate	IR	m^3/day	7.0	13.2
Conversion factor	CF	kg/ug	1.E-09	1.E-09
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	9	24
Particulate emission factor	PEF	m^3/ug	2.4	2.4
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Inorganic Compounds						
Barium	2.2E+02	9.6E+02	4.3E-09	5.4E-08	5.2E-10	1.7E-08
Cadmium	1.8E+00	1.3E+01	3.6E-11	7.5E-10	4.3E-12	2.4E-10
Chromium	2.3E+01	4.1E+01	4.6E-10	2.3E-09	5.6E-11	7.3E-10
Copper	2.9E+01	8.2E+01	5.8E-10	4.6E-09	6.9E-11	1.5E-09
Lead	2.6E+01	3.5E+01	5.1E-10	2.0E-09	6.2E-11	6.3E-10
Mercury	1.2E-01	6.4E-01	2.4E-12	3.6E-11	2.9E-13	1.2E-11
Molybdenum	3.4E+00	6.0E+00	6.7E-11	3.4E-10	8.1E-12	1.1E-10
Nickel	2.2E+01	5.7E+01	4.4E-10	3.2E-09	5.3E-11	1.0E-09
Nitrate	NC	NC	NA	NA	NA	NA
Selenium	1.7E+00	3.0E+00	3.3E-11	1.7E-10	4.0E-12	5.4E-11
Silver	1.5E+01	9.6E+01	3.1E-10	5.4E-09	3.7E-11	1.7E-09
Thallium	NC	NC	NA	NA	NA	NA
Zinc	5.4E+02	2.8E+03	1.1E-08	1.6E-07	1.3E-09	5.0E-08
VOCs						
1,1-Dichloroethane	NC	NC	NA	NA	NA	NA
1,2-Dichloroethane	NC	NC	NA	NA	NA	NA
Acetone	NC	NC	NA	NA	NA	NA
Benzene	NC	NC	NA	NA	NA	NA
Carbon disulfide	NC	NC	NA	NA	NA	NA
Chloromethane	NC	NC	NA	NA	NA	NA
cis-1,2-Dichloroethene	NC	NC	NA	NA	NA	NA
Methylene chloride	NC	NC	NA	NA	NA	NA
Toluene	NC	NC	NA	NA	NA	NA
Trichloroethene	NC	NC	NA	NA	NA	NA
SVOCs						
Benzo(a)anthracene	3.6E-02	1.2E-02	7.3E-13	6.8E-13	8.7E-14	2.2E-13
Benzo(a)pyrene	4.0E-02	4.3E-02	7.9E-13	2.4E-12	9.5E-14	7.8E-13
Benzo(b)fluoranthene	4.3E-02	6.5E-02	8.7E-13	3.7E-12	1.0E-13	1.2E-12
Benzo(g,h,i)perylene	3.9E-02	3.1E-02	7.8E-13	1.8E-12	9.3E-14	5.6E-13
Benzo(k)fluoranthene	3.6E-02	1.2E-02	7.3E-13	6.8E-13	8.7E-14	2.2E-13
Chrysene	4.0E-02	2.7E-02	7.9E-13	1.5E-12	9.5E-14	4.9E-13
Dibenz(a,h)anthracene	3.6E-02	8.0E-03	7.2E-13	4.5E-13	8.6E-14	1.4E-13
Fluoranthene	4.3E-02	3.6E-02	8.5E-13	2.0E-12	1.0E-13	6.5E-13
Indeno(1,2,3-cd)pyrene	4.1E-02	5.3E-02	8.2E-13	3.0E-12	9.8E-14	9.6E-13
Phenanthrene	3.7E-02	1.4E-02	7.3E-13	7.9E-13	8.8E-14	2.5E-13
Pyrene	4.3E-02	4.3E-02	8.5E-13	2.4E-12	1.0E-13	7.8E-13

Spreadsheet C1-57 (2 of 3)

Estimates of Human Intake
Soil Particulate Inhalation Pathway for Adult Resident
New Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times CF \times IR \times FT \times EF \times ED}{PEF \times BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Inhalation rate	IR	m^3/day	7.0	13.2
Conversion factor	CF	kg/ug	1.E-09	1.E-09
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	9	24
Particulate emission factor	PEF	m^3/ug	2.4	2.4
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Total Petroleum Hydrocarbons						
C20-C30(Lubricant Oil Range)	NC	NC	NA	NA	NA	NA
PCDD/PCDFs						
2,3,7,8-TCDD	5.6E-06	3.4E-05	1.1E-16	1.9E-15	1.3E-17	6.2E-16
1,2,3,7,8-PeCDD	1.6E-05	9.0E-05	3.3E-16	5.1E-15	3.9E-17	1.6E-15
1,2,3,4,7,8-HxCDD	4.1E-05	1.0E-04	8.1E-16	5.9E-15	9.8E-17	1.9E-15
1,2,3,6,7,8-HxCDD	2.0E-04	5.4E-04	4.0E-15	3.0E-14	4.8E-16	9.7E-15
1,2,3,7,8,9-HxCDD	7.1E-05	4.7E-04	1.4E-15	2.7E-14	1.7E-16	8.5E-15
1,2,3,4,6,7,8-HpCDD	4.7E-03	1.2E-02	9.4E-14	6.7E-13	1.1E-14	2.2E-13
OCDD	5.4E-02	1.4E-01	1.1E-12	7.8E-12	1.3E-13	2.5E-12
2,3,7,8-TCDF	3.1E-06	5.7E-06	6.2E-17	3.2E-16	7.5E-18	1.0E-16
1,2,3,7,8-PeCDF	3.6E-06	1.0E-05	7.2E-17	5.7E-16	8.6E-18	1.8E-16
2,3,4,7,8-PeCDF	8.8E-06	1.7E-05	1.8E-16	9.8E-16	2.1E-17	3.1E-16
1,2,3,4,7,8-HxCDF	2.7E-05	6.3E-05	5.4E-16	3.5E-15	6.5E-17	1.1E-15
1,2,3,6,7,8-HxCDF	2.1E-05	4.9E-05	4.2E-16	2.8E-15	5.0E-17	8.8E-16
2,3,4,6,7,8-HxCDF	4.3E-05	1.1E-04	8.6E-16	6.0E-15	1.0E-16	1.9E-15
1,2,3,7,8,9-HxCDF	6.9E-06	1.4E-05	1.4E-16	8.0E-16	1.7E-17	2.6E-16
1,2,3,4,6,7,8-HpCDF	7.7E-04	2.0E-03	1.5E-14	1.1E-13	1.9E-15	3.6E-14
1,2,3,4,7,8,9-HpCDF	7.2E-05	1.8E-04	1.5E-15	1.0E-14	1.7E-16	3.3E-15
OCDF	2.0E-03	5.1E-03	4.1E-14	2.9E-13	4.9E-15	9.2E-14
Total Tetra	NC	NC	NA	NA	NA	NA
Total Penta	NC	NC	NA	NA	NA	NA
Total Hexa	NC	NC	NA	NA	NA	NA
Total Hepta	NC	NC	NA	NA	NA	NA
Total Octa	NC	NC	NA	NA	NA	NA
PCDD/PCDF	NC	NC	NA	NA	NA	NA

Spreadsheet C1-57 (3 of 3)

Estimates of Human Intake
Soil Particulate Inhalation Pathway for Adult Resident
New Conservation Yard RFI Site

Intake Equation:

$$\text{Dosage} = \frac{C \times CF \times IR \times FT \times EF \times ED}{PEF \times BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Inhalation rate	IR	m^3/day	7.0	13.2
Conversion factor	CF	kg/ug	1.E-09	1.E-09
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	9	24
Particulate emission factor	PEF	m^3/ug	2.4	2.4
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
PCBs						
Aroclor-1254	7.1E-02	7.1E-02	1.4E-12	4.0E-12	1.7E-13	1.3E-12
PCB-105	1.5E-05	2.1E-05	3.1E-16	1.2E-15	3.7E-17	3.8E-16
PCB-114	5.7E-07	7.7E-07	1.1E-17	4.4E-17	1.4E-18	1.4E-17
PCB-118	3.4E-05	4.6E-05	6.7E-16	2.6E-15	8.0E-17	8.3E-16
PCB-123	3.7E-07	5.1E-07	7.5E-18	2.9E-17	9.0E-19	9.2E-18
PCB-126	9.4E-07	1.3E-06	1.9E-17	7.3E-17	2.3E-18	2.3E-17
PCB-156	7.9E-06	1.1E-05	1.6E-16	6.1E-16	1.9E-17	1.9E-16
PCB-157	2.6E-06	2.7E-06	5.1E-17	1.5E-16	6.1E-18	4.9E-17
PCB-167	4.4E-06	4.7E-06	8.8E-17	2.7E-16	1.1E-17	8.5E-17
PCB-169	6.8E-08	7.5E-08	1.4E-18	4.2E-18	1.6E-19	1.3E-18
PCB-189	6.5E-07	7.0E-07	1.3E-17	4.0E-17	1.6E-18	1.3E-17
PCB-77	1.9E-06	2.6E-06	3.9E-17	1.5E-16	4.6E-18	4.8E-17
PCB-81	3.7E-07	5.1E-07	7.5E-18	2.9E-17	9.0E-19	9.2E-18

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyls
mg/kg-day - milligrams per kilogram per day
mg/kg - milligrams per kilogram

Estimates of Human Intake
Soil Dermal Contact Pathway for Adult Resident
New Conservation Yard RFI Site

Intake Equation: Dosage = $\frac{C \times SA \times AF \times B \times CF \times EF \times ED}{BW \times AT}$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Skin surface area per event	SA	cm^2/day	5700	5700
Soil loading to skin	AF	mg/cm^2	0.01	0.07
Bioavailability	B	fraction	CS	CS
Conversion factor	CF	kg/mg	1.E-06	1.E-06
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	9	24
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
Inorganic Compounds							
Barium	2.2E+02	9.6E+02	1.7E-06	5.2E-05	2.0E-07	1.7E-05	0.01
Cadmium	1.8E+00	1.3E+01	1.4E-09	7.3E-08	1.7E-10	2.3E-08	0.00
Chromium	2.3E+01	4.1E+01	1.8E-07	2.2E-06	2.2E-08	7.1E-07	0.01
Copper	2.9E+01	8.2E+01	2.2E-07	4.5E-06	2.7E-08	1.4E-06	0.01
Lead	2.6E+01	3.5E+01	2.0E-07	1.9E-06	2.4E-08	6.1E-07	0.01
Mercury	1.2E-01	6.4E-01	9.6E-10	3.5E-08	1.1E-10	1.1E-08	0.01
Molybdenum	3.4E+00	6.0E+00	2.6E-08	3.3E-07	3.2E-09	1.0E-07	0.01
Nickel	2.2E+01	5.7E+01	1.7E-07	3.1E-06	2.1E-08	9.9E-07	0.01
Nitrate	NC	NC	NA	NA	NA	NA	0.01
Selenium	1.7E+00	3.0E+00	1.3E-08	1.6E-07	1.6E-09	5.2E-08	0.01
Silver	1.5E+01	9.6E+01	1.2E-07	5.2E-06	1.4E-08	1.7E-06	0.01
Thallium	NC	NC	NA	NA	NA	NA	0.01
Zinc	5.4E+02	2.8E+03	4.2E-06	1.5E-04	5.1E-07	4.9E-05	0.01
VOCs							
1,1-Dichloroethane	NC	NC	NA	NA	NA	NA	0.10
1,2-Dichloroethane	NC	NC	NA	NA	NA	NA	0.10
Acetone	NC	NC	NA	NA	NA	NA	0.10
Benzene	NC	NC	NA	NA	NA	NA	0.10
Carbon disulfide	NC	NC	NA	NA	NA	NA	0.01
Chloromethane	NC	NC	NA	NA	NA	NA	0.10
cis-1,2-Dichloroethene	NC	NC	NA	NA	NA	NA	0.10
Methylene chloride	NC	NC	NA	NA	NA	NA	0.10
Toluene	5.3E-02	1.1E-01	4.2E-09	6.0E-08	5.0E-10	1.9E-08	0.10
Trichloroethene	NC	NC	NA	NA	NA	NA	0.10
SVOCs							
Benzo(a)anthracene	3.6E-02	1.2E-02	3.7E-09	8.5E-09	4.4E-10	2.7E-09	0.13
Benzo(a)pyrene	4.0E-02	4.3E-02	4.0E-09	3.1E-08	4.8E-10	9.8E-09	0.13
Benzo(b)fluoranthene	4.3E-02	6.5E-02	4.4E-09	4.6E-08	5.3E-10	1.5E-08	0.13
Benzo(g,h,i)perylene	3.9E-02	3.1E-02	3.9E-09	2.2E-08	4.7E-10	7.0E-09	0.13
Benzo(k)fluoranthene	3.6E-02	1.2E-02	3.7E-09	8.5E-09	4.4E-10	2.7E-09	0.13
Chrysene	4.0E-02	2.7E-02	4.0E-09	1.9E-08	4.8E-10	6.1E-09	0.13
Dibenz(a,h)anthracene	3.6E-02	8.0E-03	3.7E-09	5.7E-09	4.4E-10	1.8E-09	0.13
Fluoranthene	4.3E-02	3.6E-02	4.3E-09	2.6E-08	5.2E-10	8.2E-09	0.13
Indeno(1,2,3-cd)pyrene	4.1E-02	5.3E-02	4.2E-09	3.8E-08	5.0E-10	1.2E-08	0.13
Phenanthrene	3.7E-02	1.4E-02	3.7E-09	9.9E-09	4.5E-10	3.2E-09	0.13
Pyrene	4.3E-02	4.3E-02	4.3E-09	3.1E-08	5.2E-10	9.8E-09	0.13

Spreadsheet C1-56 (2 of 3)

Estimates of Human Intake
Soil Dermal Contact Pathway for Adult Resident
New Conservation Yard RFI Site

Intake Equation: Dosage = $\frac{C \times SA \times AF \times B \times CF \times EF \times ED}{BW \times AT}$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Skin surface area per event	SA	cm^2/day	5700	5700
Soil loading to skin	AF	mg/cm^2	0.01	0.07
Bioavailability	B	fraction	CS	CS
Conversion factor	CF	kg/mg	1.E-06	1.E-06
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	9	24
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
Total Petroleum Hydrocarbons							
C20-C30(Lubricant Oil Range)	NC	NC	NA	NA	NA	NA	0.13
PCDD/PCDFs							
2,3,7,8-TCDD	5.6E-06	3.4E-05	1.3E-13	5.6E-12	1.6E-14	1.8E-12	0.03
1,2,3,7,8-PeCDD	1.6E-05	9.0E-05	3.8E-13	1.5E-11	4.6E-14	4.7E-12	0.03
1,2,3,4,7,8-HxCDD	4.1E-05	1.0E-04	9.5E-13	1.7E-11	1.1E-13	5.5E-12	0.03
1,2,3,6,7,8-HxCDD	2.0E-04	5.4E-04	4.7E-12	8.8E-11	5.7E-13	2.8E-11	0.03
1,2,3,7,8,9-HxCDD	7.1E-05	4.7E-04	1.7E-12	7.7E-11	2.0E-13	2.5E-11	0.03
1,2,3,4,6,7,8-HpCDD	4.7E-03	1.2E-02	1.1E-10	2.0E-09	1.3E-11	6.3E-10	0.03
OCDD	5.4E-02	1.4E-01	1.3E-09	2.3E-08	1.5E-10	7.2E-09	0.03
2,3,7,8-TCDF	3.1E-06	5.7E-06	7.3E-14	9.3E-13	8.7E-15	3.0E-13	0.03
1,2,3,7,8-PeCDF	3.6E-06	1.0E-05	8.4E-14	1.6E-12	1.0E-14	5.2E-13	0.03
2,3,4,7,8-PeCDF	8.8E-06	1.7E-05	2.1E-13	2.8E-12	2.5E-14	9.1E-13	0.03
1,2,3,4,7,8-HxCDF	2.7E-05	6.3E-05	6.3E-13	1.0E-11	7.6E-14	3.3E-12	0.03
1,2,3,6,7,8-HxCDF	2.1E-05	4.9E-05	4.9E-13	8.0E-12	5.9E-14	2.6E-12	0.03
2,3,4,6,7,8-HxCDF	4.3E-05	1.1E-04	1.0E-12	1.7E-11	1.2E-13	5.6E-12	0.03
1,2,3,7,8,9-HxCDF	6.9E-06	1.4E-05	1.6E-13	2.3E-12	1.9E-14	7.4E-13	0.03
1,2,3,4,6,7,8-HpCDF	7.7E-04	2.0E-03	1.8E-11	3.3E-10	2.2E-12	1.0E-10	0.03
1,2,3,4,7,8,9-HpCDF	7.2E-05	1.8E-04	1.7E-12	3.0E-11	2.0E-13	9.6E-12	0.03
OCDF	2.0E-03	5.1E-03	4.7E-11	8.4E-10	5.7E-12	2.7E-10	0.03
Total Tetra	NC	NC	NA	NA	NA	NA	0.03
Total Penta	NC	NC	NA	NA	NA	NA	0.03
Total Hexa	NC	NC	NA	NA	NA	NA	0.03
Total Hepta	NC	NC	NA	NA	NA	NA	0.03
Total Octa	NC	NC	NA	NA	NA	NA	0.03
PCDD/PCDF	NC	NC	NA	NA	NA	NA	0.03

Spreadsheet C1-56 (3 of 3)

Estimates of Human Intake
Soil Dermal Contact Pathway for Adult Resident
New Conservation Yard RFI Site

Intake Equation: Dosage = $\frac{C \times SA \times AF \times B \times CF \times EF \times ED}{BW \times AT}$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Skin surface area per event	SA	cm^2/day	5700	5700
Soil loading to skin	AF	mg/cm^2	0.01	0.07
Bioavailability	B	fraction	CS	CS
Conversion factor	CF	kg/mg	1.E-06	1.E-06
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	9	24
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
PCBs							
Aroclor-1254	7.1E-02	7.1E-02	7.8E-09	5.4E-08	9.3E-10	1.7E-08	0.14
PCB-105	1.5E-05	2.1E-05	1.7E-12	1.6E-11	2.0E-13	5.2E-12	0.14
PCB-114	5.7E-07	7.7E-07	6.2E-14	5.9E-13	7.4E-15	1.9E-13	0.14
PCB-118	3.4E-05	4.6E-05	3.7E-12	3.5E-11	4.4E-13	1.1E-11	0.14
PCB-123	3.7E-07	5.1E-07	4.1E-14	3.9E-13	4.9E-15	1.3E-13	0.14
PCB-126	9.4E-07	1.3E-06	1.0E-13	9.8E-13	1.2E-14	3.1E-13	0.14
PCB-156	7.9E-06	1.1E-05	8.6E-13	8.2E-12	1.0E-13	2.6E-12	0.14
PCB-157	2.6E-06	2.7E-06	2.8E-13	2.1E-12	3.4E-14	6.7E-13	0.14
PCB-167	4.4E-06	4.7E-06	4.8E-13	3.6E-12	5.8E-14	1.2E-12	0.14
PCB-169	6.8E-08	7.5E-08	7.5E-15	5.7E-14	8.9E-16	1.8E-14	0.14
PCB-189	6.5E-07	7.0E-07	7.1E-14	5.4E-13	8.6E-15	1.7E-13	0.14
PCB-77	1.9E-06	2.6E-06	2.1E-13	2.0E-12	2.5E-14	6.5E-13	0.14
PCB-81	3.7E-07	5.1E-07	4.1E-14	3.9E-13	4.9E-15	1.3E-13	0.14

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005),
except dermal absorption factors which were taken from USEPA (2001).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyls
mg/kg-day - milligrams per kilogram per day
mg/kg - milligrams per kilogram

Estimates of Human Intake
Soil Ingestion Pathway for Adult Resident
New Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times CF \times FT \times EF \times ED \times B}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Soil ingestion rate	IR	mg/day	50	100
Conversion factor	CF	kg/mg	1.E-06	1.E-06
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	9	24
Bioavailability	B	fraction	CS	CS
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
Inorganic Compounds							
Barium	2.2E+02	9.6E+02	1.5E-04	1.3E-03	1.8E-05	4.2E-04	1
Cadmium	1.8E+00	1.3E+01	1.2E-06	1.8E-05	1.5E-07	5.8E-06	1
Chromium	2.3E+01	4.1E+01	1.6E-05	5.6E-05	1.9E-06	1.8E-05	1
Copper	2.9E+01	8.2E+01	2.0E-05	1.1E-04	2.4E-06	3.6E-05	1
Lead	2.6E+01	3.5E+01	1.8E-05	4.8E-05	2.1E-06	1.5E-05	1
Mercury	1.2E-01	6.4E-01	8.4E-08	8.8E-07	1.0E-08	2.8E-07	1
Molybdenum	3.4E+00	6.0E+00	2.3E-06	8.2E-06	2.8E-07	2.6E-06	1
Nickel	2.2E+01	5.7E+01	1.5E-05	7.8E-05	1.8E-06	2.5E-05	1
Nitrate	NC	NC	NA	NA	NA	NA	1
Selenium	1.7E+00	3.0E+00	1.1E-06	4.1E-06	1.4E-07	1.3E-06	1
Silver	1.5E+01	9.6E+01	1.1E-05	1.3E-04	1.3E-06	4.2E-05	1
Thallium	NC	NC	NA	NA	NA	NA	1
Zinc	5.4E+02	2.8E+03	3.7E-04	3.8E-03	4.5E-05	1.2E-03	1
VOCs							
1,1-Dichloroethane	NC	NC	NA	NA	NA	NA	1
1,2-Dichloroethane	NC	NC	NA	NA	NA	NA	1
Acetone	NC	NC	NA	NA	NA	NA	1
Benzene	NC	NC	NA	NA	NA	NA	1
Carbon disulfide	NC	NC	NA	NA	NA	NA	1
Chloromethane	NC	NC	NA	NA	NA	NA	1
cis-1,2-Dichloroethene	NC	NC	NA	NA	NA	NA	1
Methylene chloride	NC	NC	NA	NA	NA	NA	1
Toluene	5.3E-02	1.1E-01	3.7E-08	1.5E-07	4.4E-09	4.8E-08	1
Trichloroethene	NC	NC	NA	NA	NA	NA	1
SVOCs							
Benzo(a)anthracene	3.6E-02	1.2E-02	2.5E-08	1.6E-08	3.0E-09	5.3E-09	1
Benzo(a)pyrene	4.0E-02	4.3E-02	2.7E-08	5.9E-08	3.3E-09	1.9E-08	1
Benzo(b)fluoranthene	4.3E-02	6.5E-02	3.0E-08	8.9E-08	3.6E-09	2.8E-08	1
Benzo(g,h,i)perylene	3.9E-02	3.1E-02	2.7E-08	4.2E-08	3.2E-09	1.4E-08	1
Benzo(k)fluoranthene	3.6E-02	1.2E-02	2.5E-08	1.6E-08	3.0E-09	5.3E-09	1
Chrysene	4.0E-02	2.7E-02	2.7E-08	3.7E-08	3.2E-09	1.2E-08	1
Dibenz(a,h)anthracene	3.6E-02	8.0E-03	2.5E-08	1.1E-08	3.0E-09	3.5E-09	1
Fluoranthene	4.3E-02	3.6E-02	2.9E-08	4.9E-08	3.5E-09	1.6E-08	1
Indeno(1,2,3-cd)pyrene	4.1E-02	5.3E-02	2.8E-08	7.3E-08	3.4E-09	2.3E-08	1
Phenanthrene	3.7E-02	1.4E-02	2.5E-08	1.9E-08	3.0E-09	6.1E-09	1
Pyrene	4.3E-02	4.3E-02	2.9E-08	5.9E-08	3.5E-09	1.9E-08	1

Spreadsheet C1-55 (2 of 3)

Estimates of Human Intake
Soil Ingestion Pathway for Adult Resident
New Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times CF \times FT \times EF \times ED \times B}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Soil ingestion rate	IR	mg/day	50	100
Conversion factor	CF	kg/mg	1.E-06	1.E-06
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	9	24
Bioavailability	B	fraction	CS	CS
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
Total Petroleum Hydrocarbons							
C20-C30(Lubricant Oil Range)	NC	NC	NA	NA	NA	NA	1
PCDD/PCDFs							
2,3,7,8-TCDD	5.6E-06	3.4E-05	3.9E-12	4.7E-11	4.6E-13	1.5E-11	1
1,2,3,7,8-PeCDD	1.6E-05	9.0E-05	1.1E-11	1.2E-10	1.3E-12	3.9E-11	1
1,2,3,4,7,8-HxCDD	4.1E-05	1.0E-04	2.8E-11	1.4E-10	3.3E-12	4.6E-11	1
1,2,3,6,7,8-HxCDD	2.0E-04	5.4E-04	1.4E-10	7.3E-10	1.7E-11	2.3E-10	1
1,2,3,7,8,9-HxCDD	7.1E-05	4.7E-04	4.9E-11	6.4E-10	5.9E-12	2.1E-10	1
1,2,3,4,6,7,8-HpCDD	4.7E-03	1.2E-02	3.2E-09	1.6E-08	3.9E-10	5.2E-09	1
OCDD	5.4E-02	1.4E-01	3.7E-08	1.9E-07	4.5E-09	6.0E-08	1
2,3,7,8-TCDF	3.1E-06	5.7E-06	2.1E-12	7.8E-12	2.6E-13	2.5E-12	1
1,2,3,7,8-PeCDF	3.6E-06	1.0E-05	2.5E-12	1.4E-11	2.9E-13	4.4E-12	1
2,3,4,7,8-PeCDF	8.8E-06	1.7E-05	6.0E-12	2.4E-11	7.2E-13	7.6E-12	1
1,2,3,4,7,8-HxCDF	2.7E-05	6.3E-05	1.9E-11	8.6E-11	2.2E-12	2.8E-11	1
1,2,3,6,7,8-HxCDF	2.1E-05	4.9E-05	1.4E-11	6.7E-11	1.7E-12	2.1E-11	1
2,3,4,6,7,8-HxCDF	4.3E-05	1.1E-04	3.0E-11	1.5E-10	3.5E-12	4.7E-11	1
1,2,3,7,8,9-HxCDF	6.9E-06	1.4E-05	4.7E-12	1.9E-11	5.7E-13	6.2E-12	1
1,2,3,4,6,7,8-HpCDF	7.7E-04	2.0E-03	5.3E-10	2.7E-09	6.3E-11	8.8E-10	1
1,2,3,4,7,8,9-HpCDF	7.2E-05	1.8E-04	5.0E-11	2.5E-10	6.0E-12	8.0E-11	1
OCDF	2.0E-03	5.1E-03	1.4E-09	7.0E-09	1.7E-10	2.2E-09	1
Total Tetra	NC	NC	NA	NA	NA	NA	1
Total Penta	NC	NC	NA	NA	NA	NA	1
Total Hexa	NC	NC	NA	NA	NA	NA	1
Total Hepta	NC	NC	NA	NA	NA	NA	1
Total Octa	NC	NC	NA	NA	NA	NA	1
PCDD/PCDF	NC	NC	NA	NA	NA	NA	1

Spreadsheet C1-55 (3 of 3)

Estimates of Human Intake
Soil Ingestion Pathway for Adult Resident
New Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times CF \times FT \times EF \times ED \times B}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Soil ingestion rate	IR	mg/day	50	100
Conversion factor	CF	kg/mg	1.E-06	1.E-06
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	9	24
Bioavailability	B	fraction	CS	CS
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
PCBs							
Aroclor-1254	7.1E-02	7.1E-02	4.9E-08	9.7E-08	5.8E-09	3.1E-08	1
PCB-105	1.5E-05	2.1E-05	1.1E-11	2.9E-11	1.3E-12	9.3E-12	1
PCB-114	5.7E-07	7.7E-07	3.9E-13	1.1E-12	4.7E-14	3.4E-13	1
PCB-118	3.4E-05	4.6E-05	2.3E-11	6.3E-11	2.8E-12	2.0E-11	1
PCB-123	3.7E-07	5.1E-07	2.6E-13	7.0E-13	3.1E-14	2.2E-13	1
PCB-126	9.4E-07	1.3E-06	6.4E-13	1.8E-12	7.7E-14	5.6E-13	1
PCB-156	7.9E-06	1.1E-05	5.4E-12	1.5E-11	6.5E-13	4.7E-12	1
PCB-157	2.6E-06	2.7E-06	1.8E-12	3.7E-12	2.1E-13	1.2E-12	1
PCB-167	4.4E-06	4.7E-06	3.0E-12	6.5E-12	3.6E-13	2.1E-12	1
PCB-169	6.8E-08	7.5E-08	4.7E-14	1.0E-13	5.6E-15	3.3E-14	1
PCB-189	6.5E-07	7.0E-07	4.5E-13	9.6E-13	5.4E-14	3.1E-13	1
PCB-77	1.9E-06	2.6E-06	1.3E-12	3.6E-12	1.6E-13	1.2E-12	1
PCB-81	3.7E-07	5.1E-07	2.6E-13	7.0E-13	3.1E-14	2.2E-13	1

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyls
mg/kg-day - milligrams per kilogram per day
mg/kg - milligrams per kilogram

Estimates of Human Intake
Groundwater to Ambient Air Pathway for Child Recreator
New Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	4.4	8.8
Fraction of time outdoors	FT	fraction	1.0	1.0
Exposure frequency	EF	days/year	50	100
Exposure duration	ED	years	6	6
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Inorganic Compounds						
Barium	NC	NC	NA	NA	NA	NA
Cadmium	NC	NC	NA	NA	NA	NA
Chromium	NC	NC	NA	NA	NA	NA
Copper	NC	NC	NA	NA	NA	NA
Lead	NC	NC	NA	NA	NA	NA
Mercury	NC	NC	NA	NA	NA	NA
Molybdenum	NC	NC	NA	NA	NA	NA
Nickel	NC	NC	NA	NA	NA	NA
Nitrate	NC	NC	NA	NA	NA	NA
Selenium	NC	NC	NA	NA	NA	NA
Silver	NC	NC	NA	NA	NA	NA
Thallium	NC	NC	NA	NA	NA	NA
Zinc	NC	NC	NA	NA	NA	NA
VOCs						
1,1-Dichloroethane	NC	NC	NA	NA	NA	NA
1,2-Dichloroethane	NC	NC	NA	NA	NA	NA
Acetone	7.3E-12	7.3E-12	2.9E-13	1.2E-12	2.3E-14	9.4E-14
Benzene	NC	NC	NA	NA	NA	NA
Carbon disulfide	NC	NC	NA	NA	NA	NA
Chloromethane	NC	NC	NA	NA	NA	NA
cis-1,2-Dichloroethene	NC	NC	NA	NA	NA	NA
Methylene chloride	NC	NC	NA	NA	NA	NA
Toluene	2.6E-07	2.6E-07	1.1E-08	4.2E-08	8.5E-10	3.4E-09
Trichloroethene	1.1E-07	1.1E-07	4.5E-09	1.8E-08	3.6E-10	1.4E-09
SVOCs						
Benzo(a)anthracene	NC	NC	NA	NA	NA	NA
Benzo(a)pyrene	NC	NC	NA	NA	NA	NA
Benzo(b)fluoranthene	NC	NC	NA	NA	NA	NA
Benzo(g,h,i)perylene	NC	NC	NA	NA	NA	NA
Benzo(k)fluoranthene	NC	NC	NA	NA	NA	NA
Chrysene	NC	NC	NA	NA	NA	NA
Dibenz(a,h)anthracene	NC	NC	NA	NA	NA	NA
Fluoranthene	NC	NC	NA	NA	NA	NA
Indeno(1,2,3-cd)pyrene	NC	NC	NA	NA	NA	NA
Phenanthrene	NC	NC	NA	NA	NA	NA
Pyrene	NC	NC	NA	NA	NA	NA

Estimates of Human Intake
Groundwater to Ambient Air Pathway for Child Recreator
New Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	4.4	8.8
Fraction of time outdoors	FT	fraction	1.0	1.0
Exposure frequency	EF	days/year	50	100
Exposure duration	ED	years	6	6
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Total Petroleum Hydrocarbons						
C20-C30(Lubricant Oil Range)	NC	NC	NA	NA	NA	NA
PCDD/PCDFs						
2,3,7,8-TCDD	NC	NC	NA	NA	NA	NA
1,2,3,7,8-PeCDD	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,6,7,8-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,7,8,9-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,4,6,7,8-HpCDD	NC	NC	NA	NA	NA	NA
OCDD	NC	NC	NA	NA	NA	NA
2,3,7,8-TCDF	NC	NC	NA	NA	NA	NA
1,2,3,7,8-PeCDF	NC	NC	NA	NA	NA	NA
2,3,4,7,8-PeCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA
2,3,4,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,7,8,9-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,6,7,8-HpCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8,9-HpCDF	NC	NC	NA	NA	NA	NA
OCDF	NC	NC	NA	NA	NA	NA
Total Tetra	NC	NC	NA	NA	NA	NA
Total Penta	NC	NC	NA	NA	NA	NA
Total Hexa	NC	NC	NA	NA	NA	NA
Total Hepta	NC	NC	NA	NA	NA	NA
Total Octa	NC	NC	NA	NA	NA	NA
PCDD/PCDF	NC	NC	NA	NA	NA	NA
Aroclor-1254	NC	NC	NA	NA	NA	NA
PCB-105	NC	NC	NA	NA	NA	NA
PCB-114	NC	NC	NA	NA	NA	NA
PCB-118	NC	NC	NA	NA	NA	NA
PCB-123	NC	NC	NA	NA	NA	NA
PCB-126	NC	NC	NA	NA	NA	NA
PCB-156	NC	NC	NA	NA	NA	NA
PCB-157	NC	NC	NA	NA	NA	NA
PCB-167	NC	NC	NA	NA	NA	NA
PCB-169	NC	NC	NA	NA	NA	NA
PCB-189	NC	NC	NA	NA	NA	NA
PCB-77	NC	NC	NA	NA	NA	NA
PCB-81	NC	NC	NA	NA	NA	NA

Estimates of Human Intake
Groundwater to Ambient Air Pathway for Child Recreator
New Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	4.4	8.8
Fraction of time outdoors	FT	fraction	1.0	1.0
Exposure frequency	EF	days/year	50	100
Exposure duration	ED	years	6	6
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
mg/kg-day - milligrams per kilogram per day
mg/m^3 - milligrams per cubic meter

Estimates of Human Intake
Soil to Ambient Air Pathway for Child Recreator
New Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	4.4	8.8
Fraction of time outdoors	FT	fraction	1.0	1.0
Exposure frequency	EF	days/year	50	100
Exposure duration	ED	years	6	6
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Inorganic Compounds						
Barium	NC	NC	NA	NA	NA	NA
Cadmium	NC	NC	NA	NA	NA	NA
Chromium	NC	NC	NA	NA	NA	NA
Copper	NC	NC	NA	NA	NA	NA
Lead	NC	NC	NA	NA	NA	NA
Mercury	NC	NC	NA	NA	NA	NA
Molybdenum	NC	NC	NA	NA	NA	NA
Nickel	NC	NC	NA	NA	NA	NA
Nitrate	NC	NC	NA	NA	NA	NA
Selenium	NC	NC	NA	NA	NA	NA
Silver	NC	NC	NA	NA	NA	NA
Thallium	NC	NC	NA	NA	NA	NA
Zinc	NC	NC	NA	NA	NA	NA
VOCs						
1,1-Dichloroethane	NC	NC	NA	NA	NA	NA
1,2-Dichloroethane	NC	NC	NA	NA	NA	NA
Acetone	NC	NC	NA	NA	NA	NA
Benzene	NC	NC	NA	NA	NA	NA
Carbon disulfide	NC	NC	NA	NA	NA	NA
Chloromethane	NC	NC	NA	NA	NA	NA
cis-1,2-Dichloroethene	NC	NC	NA	NA	NA	NA
Methylene chloride	NC	NC	NA	NA	NA	NA
Toluene	6.9E-04	6.9E-04	2.8E-05	1.1E-04	2.2E-06	8.9E-06
Trichloroethene	NC	NC	NA	NA	NA	NA
SVOCs						
Benzo(a)anthracene	NC	NC	NA	NA	NA	NA
Benzo(a)pyrene	NC	NC	NA	NA	NA	NA
Benzo(b)fluoranthene	NC	NC	NA	NA	NA	NA
Benzo(g,h,i)perylene	NC	NC	NA	NA	NA	NA
Benzo(k)fluoranthene	NC	NC	NA	NA	NA	NA
Chrysene	NC	NC	NA	NA	NA	NA
Dibenz(a,h)anthracene	NC	NC	NA	NA	NA	NA
Fluoranthene	NC	NC	NA	NA	NA	NA
Indeno(1,2,3-cd)pyrene	NC	NC	NA	NA	NA	NA
Phenanthrene	NC	NC	NA	NA	NA	NA
Pyrene	NC	NC	NA	NA	NA	NA

Estimates of Human Intake
Soil to Ambient Air Pathway for Child Recreator
New Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	4.4	8.8
Fraction of time outdoors	FT	fraction	1.0	1.0
Exposure frequency	EF	days/year	50	100
Exposure duration	ED	years	6	6
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Total Petroleum Hydrocarbons						
C20-C30(Lubricant Oil Range)	NC	NC	NA	NA	NA	NA
PCDD/PCDFs						
2,3,7,8-TCDD	NC	NC	NA	NA	NA	NA
1,2,3,7,8-PeCDD	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,6,7,8-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,7,8,9-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,4,6,7,8-HpCDD	NC	NC	NA	NA	NA	NA
OCDD	NC	NC	NA	NA	NA	NA
2,3,7,8-TCDF	NC	NC	NA	NA	NA	NA
1,2,3,7,8-PeCDF	NC	NC	NA	NA	NA	NA
2,3,4,7,8-PeCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA
2,3,4,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,7,8,9-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,6,7,8-HpCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8,9-HpCDF	NC	NC	NA	NA	NA	NA
OCDF	NC	NC	NA	NA	NA	NA
Total Tetra	NC	NC	NA	NA	NA	NA
Total Penta	NC	NC	NA	NA	NA	NA
Total Hexa	NC	NC	NA	NA	NA	NA
Total Hepta	NC	NC	NA	NA	NA	NA
Total Octa	NC	NC	NA	NA	NA	NA
PCDD/PCDF	NC	NC	NA	NA	NA	NA

Spreadsheet C1-53 (3 of 3)

Estimates of Human Intake
Soil to Ambient Air Pathway for Child Recreator
New Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	4.4	8.8
Fraction of time outdoors	FT	fraction	1.0	1.0
Exposure frequency	EF	days/year	50	100
Exposure duration	ED	years	6	6
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
PCBs						
Aroclor-1254	NC	NC	NA	NA	NA	NA
PCB-105	NC	NC	NA	NA	NA	NA
PCB-114	NC	NC	NA	NA	NA	NA
PCB-118	NC	NC	NA	NA	NA	NA
PCB-123	NC	NC	NA	NA	NA	NA
PCB-126	NC	NC	NA	NA	NA	NA
PCB-156	NC	NC	NA	NA	NA	NA
PCB-157	NC	NC	NA	NA	NA	NA
PCB-167	NC	NC	NA	NA	NA	NA
PCB-169	NC	NC	NA	NA	NA	NA
PCB-189	NC	NC	NA	NA	NA	NA
PCB-77	NC	NC	NA	NA	NA	NA
PCB-81	NC	NC	NA	NA	NA	NA

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyls
mg/kg-day - milligrams per kilogram per day
mg/m^3 - milligrams per cubic meter

Estimates of Human Intake
Soil Particulate Inhalation Pathway for Child Recreator
New Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times CF \times IR \times FT \times EF \times ED}{PEF \times BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Inhalation rate	IR	m^3/day	4.4	8.8
Conversion factor	CF	kg/ug	1.E-09	1.E-09
Fraction of time outdoors	FT	fraction	1.0	1.0
Exposure frequency	EF	days/year	50	100
Exposure duration	ED	years	6	6
Particulate emission factor	PEF	m^3/ug	2.4	2.4
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Inorganic Compounds						
Barium	2.2E+02	9.6E+02	3.6E-09	6.4E-08	2.9E-10	5.1E-09
Cadmium	1.8E+00	1.3E+01	3.0E-11	8.9E-10	2.4E-12	7.1E-11
Chromium	2.3E+01	4.1E+01	3.9E-10	2.7E-09	3.1E-11	2.2E-10
Copper	2.9E+01	8.2E+01	4.8E-10	5.5E-09	3.9E-11	4.4E-10
Lead	2.6E+01	3.5E+01	4.3E-10	2.3E-09	3.4E-11	1.9E-10
Mercury	1.2E-01	6.4E-01	2.0E-12	4.3E-11	1.6E-13	3.5E-12
Molybdenum	3.4E+00	6.0E+00	5.6E-11	4.0E-10	4.5E-12	3.2E-11
Nickel	2.2E+01	5.7E+01	3.7E-10	3.8E-09	3.0E-11	3.0E-10
Nitrate	NC	NC	NA	NA	NA	NA
Selenium	1.7E+00	3.0E+00	2.8E-11	2.0E-10	2.2E-12	1.6E-11
Silver	1.5E+01	9.6E+01	2.6E-10	6.4E-09	2.1E-11	5.1E-10
Thallium	NC	NC	NA	NA	NA	NA
Zinc	5.4E+02	2.8E+03	9.1E-09	1.9E-07	7.3E-10	1.5E-08
VOCs						
1,1-Dichloroethane	NC	NC	NA	NA	NA	NA
1,2-Dichloroethane	NC	NC	NA	NA	NA	NA
Acetone	NC	NC	NA	NA	NA	NA
Benzene	NC	NC	NA	NA	NA	NA
Carbon disulfide	NC	NC	NA	NA	NA	NA
Chloromethane	NC	NC	NA	NA	NA	NA
cis-1,2-Dichloroethene	NC	NC	NA	NA	NA	NA
Methylene chloride	NC	NC	NA	NA	NA	NA
Toluene	NC	NC	NA	NA	NA	NA
Trichloroethene	NC	NC	NA	NA	NA	NA
SVOCs						
Benzo(a)anthracene	3.6E-02	1.2E-02	6.1E-13	8.0E-13	4.9E-14	6.4E-14
Benzo(a)pyrene	4.0E-02	4.3E-02	6.6E-13	2.9E-12	5.3E-14	2.3E-13
Benzo(b)fluoranthene	4.3E-02	6.5E-02	7.3E-13	4.4E-12	5.8E-14	3.5E-13
Benzo(g,h,i)perylene	3.9E-02	3.1E-02	6.5E-13	2.1E-12	5.2E-14	1.7E-13
Benzo(k)fluoranthene	3.6E-02	1.2E-02	6.1E-13	8.0E-13	4.9E-14	6.4E-14
Chrysene	4.0E-02	2.7E-02	6.6E-13	1.8E-12	5.3E-14	1.4E-13
Dibenz(a,h)anthracene	3.6E-02	8.0E-03	6.0E-13	5.4E-13	4.8E-14	4.3E-14
Fluoranthene	4.3E-02	3.6E-02	7.2E-13	2.4E-12	5.7E-14	1.9E-13
Indeno(1,2,3-cd)pyrene	4.1E-02	5.3E-02	6.9E-13	3.5E-12	5.5E-14	2.8E-13
Phenanthrene	3.7E-02	1.4E-02	6.1E-13	9.4E-13	4.9E-14	7.5E-14
Pyrene	4.3E-02	4.3E-02	7.2E-13	2.9E-12	5.7E-14	2.3E-13

Estimates of Human Intake
Soil Particulate Inhalation Pathway for Child Recreator
New Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times CF \times IR \times FT \times EF \times ED}{PEF \times BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Inhalation rate	IR	m^3/day	4.4	8.8
Conversion factor	CF	kg/ug	1.E-09	1.E-09
Fraction of time outdoors	FT	fraction	1.0	1.0
Exposure frequency	EF	days/year	50	100
Exposure duration	ED	years	6	6
Particulate emission factor	PEF	m^3/ug	2.4	2.4
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Total Petroleum Hydrocarbons						
C20-C30(Lubricant Oil Range)	NC	NC	NA	NA	NA	NA
PCDD/PCDFs						
2,3,7,8-TCDD	5.6E-06	3.4E-05	9.4E-17	2.3E-15	7.5E-18	1.8E-16
1,2,3,7,8-PeCDD	1.6E-05	9.0E-05	2.7E-16	6.0E-15	2.2E-17	4.8E-16
1,2,3,4,7,8-HxCDD	4.1E-05	1.0E-04	6.8E-16	7.0E-15	5.5E-17	5.6E-16
1,2,3,6,7,8-HxCDD	2.0E-04	5.4E-04	3.4E-15	3.6E-14	2.7E-16	2.9E-15
1,2,3,7,8,9-HxCDD	7.1E-05	4.7E-04	1.2E-15	3.1E-14	9.5E-17	2.5E-15
1,2,3,4,6,7,8-HpCDD	4.7E-03	1.2E-02	7.9E-14	8.0E-13	6.3E-15	6.4E-14
OCDD	5.4E-02	1.4E-01	9.1E-13	9.2E-12	7.3E-14	7.4E-13
2,3,7,8-TCDF	3.1E-06	5.7E-06	5.2E-17	3.8E-16	4.2E-18	3.0E-17
1,2,3,7,8-PeCDF	3.6E-06	1.0E-05	6.0E-17	6.7E-16	4.8E-18	5.4E-17
2,3,4,7,8-PeCDF	8.8E-06	1.7E-05	1.5E-16	1.2E-15	1.2E-17	9.3E-17
1,2,3,4,7,8-HxCDF	2.7E-05	6.3E-05	4.5E-16	4.2E-15	3.6E-17	3.4E-16
1,2,3,6,7,8-HxCDF	2.1E-05	4.9E-05	3.5E-16	3.3E-15	2.8E-17	2.6E-16
2,3,4,6,7,8-HxCDF	4.3E-05	1.1E-04	7.2E-16	7.1E-15	5.8E-17	5.7E-16
1,2,3,7,8,9-HxCDF	6.9E-06	1.4E-05	1.2E-16	9.5E-16	9.2E-18	7.6E-17
1,2,3,4,6,7,8-HpCDF	7.7E-04	2.0E-03	1.3E-14	1.3E-13	1.0E-15	1.1E-14
1,2,3,4,7,8,9-HpCDF	7.2E-05	1.8E-04	1.2E-15	1.2E-14	9.7E-17	9.8E-16
OCDF	2.0E-03	5.1E-03	3.4E-14	3.4E-13	2.7E-15	2.7E-14
Total Tetra	NC	NC	NA	NA	NA	NA
Total Penta	NC	NC	NA	NA	NA	NA
Total Hexa	NC	NC	NA	NA	NA	NA
Total Hepta	NC	NC	NA	NA	NA	NA
Total Octa	NC	NC	NA	NA	NA	NA
PCDD/PCDF	NC	NC	NA	NA	NA	NA

Estimates of Human Intake
Soil Particulate Inhalation Pathway for Child Recreator
New Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times CF \times IR \times FT \times EF \times ED}{PEF \times BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Inhalation rate	IR	m^3/day	4.4	8.8
Conversion factor	CF	kg/ug	1.E-09	1.E-09
Fraction of time outdoors	FT	fraction	1.0	1.0
Exposure frequency	EF	days/year	50	100
Exposure duration	ED	years	6	6
Particulate emission factor	PEF	m^3/ug	2.4	2.4
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
PCBs						
Aroclor-1254	7.1E-02	7.1E-02	1.2E-12	4.8E-12	9.5E-14	3.8E-13
PCB-105	1.5E-05	2.1E-05	2.6E-16	1.4E-15	2.1E-17	1.1E-16
PCB-114	5.7E-07	7.7E-07	9.5E-18	5.2E-17	7.6E-19	4.2E-18
PCB-118	3.4E-05	4.6E-05	5.6E-16	3.1E-15	4.5E-17	2.5E-16
PCB-123	3.7E-07	5.1E-07	6.3E-18	3.4E-17	5.0E-19	2.7E-18
PCB-126	9.4E-07	1.3E-06	1.6E-17	8.6E-17	1.3E-18	6.9E-18
PCB-156	7.9E-06	1.1E-05	1.3E-16	7.2E-16	1.1E-17	5.8E-17
PCB-157	2.6E-06	2.7E-06	4.3E-17	1.8E-16	3.4E-18	1.5E-17
PCB-167	4.4E-06	4.7E-06	7.4E-17	3.2E-16	5.9E-18	2.5E-17
PCB-169	6.8E-08	7.5E-08	1.1E-18	5.0E-18	9.1E-20	4.0E-19
PCB-189	6.5E-07	7.0E-07	1.1E-17	4.7E-17	8.8E-19	3.8E-18
PCB-77	1.9E-06	2.6E-06	3.2E-17	1.8E-16	2.6E-18	1.4E-17
PCB-81	3.7E-07	5.1E-07	6.3E-18	3.4E-17	5.0E-19	2.7E-18

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyls
mg/kg-day - milligrams per kilogram per day
mg/kg - milligrams per kilogram

Soil Dermal Contact Pathway for Child Recreator
New Conservation Yard RFI Site

Intake Equation: Dosage = $\frac{C \times SA \times AF \times B \times CF \times EF \times ED}{BW \times AT}$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Skin surface area per event	SA	cm^2/day	2800	2800
Soil loading to skin	AF	mg/cm^2	0.06	0.20
Bioavailability	B	fraction	CS	CS
Conversion factor	CF	kg/mg	0	0
Exposure frequency	EF	days/year	50	100
Exposure duration	ED	years	6	6
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
Inorganic Compounds							
Barium	2.2E+02	9.6E+02	3.3E-06	9.8E-05	2.7E-07	7.8E-06	1.0E-02
Cadmium	1.8E+00	1.3E+01	2.8E-09	1.4E-07	2.2E-10	1.1E-08	0.00
Chromium	2.3E+01	4.1E+01	3.6E-07	4.2E-06	2.9E-08	3.3E-07	0.01
Copper	2.9E+01	8.2E+01	4.4E-07	8.4E-06	3.5E-08	6.7E-07	0.01
Lead	2.6E+01	3.5E+01	3.9E-07	3.6E-06	3.2E-08	2.9E-07	0.01
Mercury	1.2E-01	6.4E-01	1.9E-09	6.6E-08	1.5E-10	5.3E-09	0.01
Molybdenum	3.4E+00	6.0E+00	5.2E-08	6.1E-07	4.1E-09	4.9E-08	0.01
Nickel	2.2E+01	5.7E+01	3.4E-07	5.8E-06	2.7E-08	4.6E-07	0.01
Nitrate	NC	NC	NA	NA	NA	NA	0.01
Selenium	1.7E+00	3.0E+00	2.6E-08	3.1E-07	2.0E-09	2.5E-08	0.01
Silver	1.5E+01	9.6E+01	2.4E-07	9.8E-06	1.9E-08	7.9E-07	0.01
Thallium	NC	NC	NA	NA	NA	NA	0.01
Zinc	5.4E+02	2.8E+03	8.3E-06	2.9E-04	6.7E-07	2.3E-05	0.01
VOCs							
1,1-Dichloroethane	NC	NC	NA	NA	NA	NA	0.10
1,2-Dichloroethane	NC	NC	NA	NA	NA	NA	0.10
Acetone	NC	NC	NA	NA	NA	NA	0.10
Benzene	NC	NC	NA	NA	NA	NA	0.10
Carbon disulfide	NC	NC	NA	NA	NA	NA	0.01
Chloromethane	NC	NC	NA	NA	NA	NA	0.10
cis-1,2-Dichloroethene	NC	NC	NA	NA	NA	NA	0.10
Methylene chloride	NC	NC	NA	NA	NA	NA	0.10
Toluene	5.3E-02	1.1E-01	8.2E-09	1.1E-07	6.5E-10	9.0E-09	0.10
Trichloroethene	NC	NC	NA	NA	NA	NA	0.10
SVOCs							
Benzo(a)anthracene	3.6E-02	1.2E-02	7.3E-09	1.6E-08	5.8E-10	1.3E-09	0.13
Benzo(a)pyrene	4.0E-02	4.3E-02	7.9E-09	5.7E-08	6.3E-10	4.6E-09	0.13
Benzo(b)fluoranthene	4.3E-02	6.5E-02	8.6E-09	8.6E-08	6.9E-10	6.9E-09	0.13
Benzo(g,h,i)perylene	3.9E-02	3.1E-02	7.8E-09	4.1E-08	6.2E-10	3.3E-09	0.13
Benzo(k)fluoranthene	3.6E-02	1.2E-02	7.3E-09	1.6E-08	5.8E-10	1.3E-09	0.13
Chrysene	4.0E-02	2.7E-02	7.9E-09	3.6E-08	6.3E-10	2.9E-09	0.13
Dibenz(a,h)anthracene	3.6E-02	8.0E-03	7.2E-09	1.1E-08	5.7E-10	8.5E-10	0.13
Fluoranthene	4.3E-02	3.6E-02	8.5E-09	4.8E-08	6.8E-10	3.8E-09	0.13
Indeno(1,2,3-cd)pyrene	4.1E-02	5.3E-02	8.2E-09	7.0E-08	6.5E-10	5.6E-09	0.13
Phenanthrene	3.7E-02	1.4E-02	7.3E-09	1.9E-08	5.9E-10	1.5E-09	0.13
Pyrene	4.3E-02	4.3E-02	8.5E-09	5.7E-08	6.8E-10	4.6E-09	0.13

Soil Dermal Contact Pathway for Child Recreator
New Conservation Yard RFI Site

Intake Equation: Dosage = $\frac{C \times SA \times AF \times B \times CF \times EF \times ED}{BW \times AT}$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Skin surface area per event	SA	cm^2/day	2800	2800
Soil loading to skin	AF	mg/cm^2	0.06	0.20
Bioavailability	B	fraction	CS	CS
Conversion factor	CF	kg/mg	0	0
Exposure frequency	EF	days/year	50	100
Exposure duration	ED	years	6	6
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
Total Petroleum Hydrocarbons							
C20-C30(Lubricant Oil Range)	NC	NC	NA	NA	NA	NA	0.13
PCDD/PCDFs							
2,3,7,8-TCDD	5.6E-06	3.4E-05	2.6E-13	1.1E-11	2.1E-14	8.5E-13	0.03
1,2,3,7,8-PeCDD	1.6E-05	9.0E-05	7.5E-13	2.8E-11	6.0E-14	2.2E-12	0.03
1,2,3,4,7,8-HxCDD	4.1E-05	1.0E-04	1.9E-12	3.2E-11	1.5E-13	2.6E-12	0.03
1,2,3,6,7,8-HxCDD	2.0E-04	5.4E-04	9.3E-12	1.6E-10	7.4E-13	1.3E-11	0.03
1,2,3,7,8,9-HxCDD	7.1E-05	4.7E-04	3.3E-12	1.4E-10	2.6E-13	1.2E-11	0.03
1,2,3,4,6,7,8-HpCDD	4.7E-03	1.2E-02	2.2E-10	3.7E-09	1.7E-11	2.9E-10	0.03
OCDD	5.4E-02	1.4E-01	2.5E-09	4.2E-08	2.0E-10	3.4E-09	0.03
2,3,7,8-TCDF	3.1E-06	5.7E-06	1.4E-13	1.7E-12	1.1E-14	1.4E-13	0.03
1,2,3,7,8-PeCDF	3.6E-06	1.0E-05	1.6E-13	3.1E-12	1.3E-14	2.5E-13	0.03
2,3,4,7,8-PeCDF	8.8E-06	1.7E-05	4.0E-13	5.3E-12	3.2E-14	4.3E-13	0.03
1,2,3,4,7,8-HxCDF	2.7E-05	6.3E-05	1.2E-12	1.9E-11	1.0E-13	1.5E-12	0.03
1,2,3,6,7,8-HxCDF	2.1E-05	4.9E-05	9.6E-13	1.5E-11	7.7E-14	1.2E-12	0.03
2,3,4,6,7,8-HxCDF	4.3E-05	1.1E-04	2.0E-12	3.3E-11	1.6E-13	2.6E-12	0.03
1,2,3,7,8,9-HxCDF	6.9E-06	1.4E-05	3.2E-13	4.3E-12	2.5E-14	3.5E-13	0.03
1,2,3,4,6,7,8-HpCDF	7.7E-04	2.0E-03	3.6E-11	6.1E-10	2.8E-12	4.9E-11	0.03
1,2,3,4,7,8,9-HpCDF	7.2E-05	1.8E-04	3.3E-12	5.6E-11	2.7E-13	4.5E-12	0.03
OCDF	2.0E-03	5.1E-03	9.3E-11	1.6E-09	7.5E-12	1.3E-10	0.03
Total Tetra	NC	NC	NA	NA	NA	NA	0.03
Total Penta	NC	NC	NA	NA	NA	NA	0.03
Total Hexa	NC	NC	NA	NA	NA	NA	0.03
Total Hepta	NC	NC	NA	NA	NA	NA	0.03
Total Octa	NC	NC	NA	NA	NA	NA	0.03
PCDD/PCDF	NC	NC	NA	NA	NA	NA	0.03

Soil Dermal Contact Pathway for Child Recreator
New Conservation Yard RFI Site

Intake Equation: Dosage = $\frac{C \times SA \times AF \times B \times CF \times EF \times ED}{BW \times AT}$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Skin surface area per event	SA	cm^2/day	2800	2800
Soil loading to skin	AF	mg/cm^2	0.06	0.20
Bioavailability	B	fraction	CS	CS
Conversion factor	CF	kg/mg	0	0
Exposure frequency	EF	days/year	50	100
Exposure duration	ED	years	6	6
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
PCBs							
Aroclor-1254	7.1E-02	7.1E-02	1.5E-08	1.0E-07	1.2E-09	8.1E-09	0.14
PCB-105	1.5E-05	2.1E-05	3.3E-12	3.0E-11	2.7E-13	2.4E-12	0.14
PCB-114	5.7E-07	7.7E-07	1.2E-13	1.1E-12	9.7E-15	8.9E-14	0.14
PCB-118	3.4E-05	4.6E-05	7.2E-12	6.6E-11	5.8E-13	5.2E-12	0.14
PCB-123	3.7E-07	5.1E-07	8.0E-14	7.3E-13	6.4E-15	5.9E-14	0.14
PCB-126	9.4E-07	1.3E-06	2.0E-13	1.8E-12	1.6E-14	1.5E-13	0.14
PCB-156	7.9E-06	1.1E-05	1.7E-12	1.5E-11	1.4E-13	1.2E-12	0.14
PCB-157	2.6E-06	2.7E-06	5.5E-13	3.9E-12	4.4E-14	3.1E-13	0.14
PCB-167	4.4E-06	4.7E-06	9.5E-13	6.8E-12	7.6E-14	5.4E-13	0.14
PCB-169	6.8E-08	7.5E-08	1.5E-14	1.1E-13	1.2E-15	8.5E-15	0.14
PCB-189	6.5E-07	7.0E-07	1.4E-13	1.0E-12	1.1E-14	8.0E-14	0.14
PCB-77	1.9E-06	2.6E-06	4.2E-13	3.8E-12	3.3E-14	3.0E-13	0.14
PCB-81	3.7E-07	5.1E-07	8.0E-14	7.3E-13	6.4E-15	5.9E-14	0.14

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005),
except dermal absorption factors which were taken from USEPA (2001).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyls
mg/kg-day - milligrams per kilogram per day
mg/kg - milligrams per kilogram

Estimates of Human Intake
Soil Ingestion Pathway for Child Recreator
New Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times CF \times FT \times EF \times ED \times B}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Soil ingestion rate	IR	mg/day	100	200
Conversion factor	CF	kg/mg	1.E-06	1.E-06
Exposure frequency	EF	days/year	50	100
Exposure duration	ED	years	6	6
Bioavailability	B	fraction	CS	CS
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
Inorganic Compounds							
Barium	2.2E+02	9.6E+02	2.0E-04	3.5E-03	1.6E-05	2.8E-04	1
Cadmium	1.8E+00	1.3E+01	1.6E-06	4.9E-05	1.3E-07	3.9E-06	1
Chromium	2.3E+01	4.1E+01	2.1E-05	1.5E-04	1.7E-06	1.2E-05	1
Copper	2.9E+01	8.2E+01	2.6E-05	3.0E-04	2.1E-06	2.4E-05	1
Lead	2.6E+01	3.5E+01	2.3E-05	1.3E-04	1.9E-06	1.0E-05	1
Mercury	1.2E-01	6.4E-01	1.1E-07	2.4E-06	8.9E-09	1.9E-07	1
Molybdenum	3.4E+00	6.0E+00	3.1E-06	2.2E-05	2.5E-07	1.8E-06	1
Nickel	2.2E+01	5.7E+01	2.0E-05	2.1E-04	1.6E-06	1.7E-05	1
Nitrate	NC	NC	NA	NA	NA	NA	1
Selenium	1.7E+00	3.0E+00	1.5E-06	1.1E-05	1.2E-07	8.8E-07	1
Silver	1.5E+01	9.6E+01	1.4E-05	3.5E-04	1.1E-06	2.8E-05	1
Thallium	NC	NC	NA	NA	NA	NA	1
Zinc	5.4E+02	2.8E+03	5.0E-04	1.0E-02	4.0E-05	8.1E-04	1
							1
VOCs							1
1,1-Dichloroethane	NC	NC	NA	NA	NA	NA	1
1,2-Dichloroethane	NC	NC	NA	NA	NA	NA	1
Acetone	NC	NC	NA	NA	NA	NA	1
Benzene	NC	NC	NA	NA	NA	NA	1
Carbon disulfide	NC	NC	NA	NA	NA	NA	1
Chloromethane	NC	NC	NA	NA	NA	NA	1
cis-1,2-Dichloroethene	NC	NC	NA	NA	NA	NA	1
Methylene chloride	NC	NC	NA	NA	NA	NA	1
Toluene	5.3E-02	1.1E-01	4.9E-08	4.0E-07	3.9E-09	3.2E-08	1
Trichloroethene	NC	NC	NA	NA	NA	NA	1
							1
SVOCs							1
Benzo(a)anthracene	3.6E-02	1.2E-02	3.3E-08	4.4E-08	2.7E-09	3.5E-09	1
Benzo(a)pyrene	4.0E-02	4.3E-02	3.6E-08	1.6E-07	2.9E-09	1.3E-08	1
Benzo(b)fluoranthene	4.3E-02	6.5E-02	4.0E-08	2.4E-07	3.2E-09	1.9E-08	1
Benzo(g,h,i)perylene	3.9E-02	3.1E-02	3.6E-08	1.1E-07	2.8E-09	9.1E-09	1
Benzo(k)fluoranthene	3.6E-02	1.2E-02	3.3E-08	4.4E-08	2.7E-09	3.5E-09	1
Chrysene	4.0E-02	2.7E-02	3.6E-08	9.9E-08	2.9E-09	7.9E-09	1
Dibenz(a,h)anthracene	3.6E-02	8.0E-03	3.3E-08	2.9E-08	2.6E-09	2.3E-09	1
Fluoranthene	4.3E-02	3.6E-02	3.9E-08	1.3E-07	3.1E-09	1.1E-08	1
Indeno(1,2,3-cd)pyrene	4.1E-02	5.3E-02	3.7E-08	1.9E-07	3.0E-09	1.5E-08	1
Phenanthrene	3.7E-02	1.4E-02	3.3E-08	5.1E-08	2.7E-09	4.1E-09	1
Pyrene	4.3E-02	4.3E-02	3.9E-08	1.6E-07	3.1E-09	1.3E-08	1

Estimates of Human Intake
Soil Ingestion Pathway for Child Recreator
New Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times CF \times FT \times EF \times ED \times B}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Soil ingestion rate	IR	mg/day	100	200
Conversion factor	CF	kg/mg	1.E-06	1.E-06
Exposure frequency	EF	days/year	50	100
Exposure duration	ED	years	6	6
Bioavailability	B	fraction	CS	CS
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
Total Petroleum Hydrocarbons							
C20-C30(Lubricant Oil Range)	NC	NC	NA	NA	NA	NA	1
PCDD/PCDFs							
2,3,7,8-TCDD	5.6E-06	3.4E-05	5.1E-12	1.3E-10	4.1E-13	1.0E-11	1
1,2,3,7,8-PeCDD	1.6E-05	9.0E-05	1.5E-11	3.3E-10	1.2E-12	2.6E-11	1
1,2,3,4,7,8-HxCDD	4.1E-05	1.0E-04	3.7E-11	3.8E-10	3.0E-12	3.0E-11	1
1,2,3,6,7,8-HxCDD	2.0E-04	5.4E-04	1.8E-10	2.0E-09	1.5E-11	1.6E-10	1
1,2,3,7,8,9-HxCDD	7.1E-05	4.7E-04	6.5E-11	1.7E-09	5.2E-12	1.4E-10	1
1,2,3,4,6,7,8-HpCDD	4.7E-03	1.2E-02	4.3E-09	4.4E-08	3.4E-10	3.5E-09	1
OCDD	5.4E-02	1.4E-01	5.0E-08	5.0E-07	4.0E-09	4.0E-08	1
2,3,7,8-TCDF	3.1E-06	5.7E-06	2.8E-12	2.1E-11	2.3E-13	1.7E-12	1
1,2,3,7,8-PeCDF	3.6E-06	1.0E-05	3.3E-12	3.7E-11	2.6E-13	2.9E-12	1
2,3,4,7,8-PeCDF	8.8E-06	1.7E-05	8.0E-12	6.3E-11	6.4E-13	5.1E-12	1
1,2,3,4,7,8-HxCDF	2.7E-05	6.3E-05	2.5E-11	2.3E-10	2.0E-12	1.8E-11	1
1,2,3,6,7,8-HxCDF	2.1E-05	4.9E-05	1.9E-11	1.8E-10	1.5E-12	1.4E-11	1
2,3,4,6,7,8-HxCDF	4.3E-05	1.1E-04	3.9E-11	3.9E-10	3.2E-12	3.1E-11	1
1,2,3,7,8,9-HxCDF	6.9E-06	1.4E-05	6.3E-12	5.2E-11	5.0E-13	4.1E-12	1
1,2,3,4,6,7,8-HpCDF	7.7E-04	2.0E-03	7.1E-10	7.3E-09	5.6E-11	5.8E-10	1
1,2,3,4,7,8,9-HpCDF	7.2E-05	1.8E-04	6.6E-11	6.7E-10	5.3E-12	5.3E-11	1
OCDF	2.0E-03	5.1E-03	1.8E-09	1.9E-08	1.5E-10	1.5E-09	1
Total Tetra	NC	NC	NA	NA	NA	NA	1
Total Penta	NC	NC	NA	NA	NA	NA	1
Total Hexa	NC	NC	NA	NA	NA	NA	1
Total Hepta	NC	NC	NA	NA	NA	NA	1
Total Octa	NC	NC	NA	NA	NA	NA	1
PCDD/PCDF	NC	NC	NA	NA	NA	NA	1

Estimates of Human Intake
Soil Ingestion Pathway for Child Recreator
New Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times CF \times FT \times EF \times ED \times B}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Soil ingestion rate	IR	mg/day	100	200
Conversion factor	CF	kg/mg	1.E-06	1.E-06
Exposure frequency	EF	days/year	50	100
Exposure duration	ED	years	6	6
Bioavailability	B	fraction	CS	CS
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
PCBs							
Aroclor-1254	7.1E-02	7.1E-02	6.5E-08	2.6E-07	5.2E-09	2.1E-08	1
PCB-105	1.5E-05	2.1E-05	1.4E-11	7.7E-11	1.1E-12	6.2E-12	1
PCB-114	5.7E-07	7.7E-07	5.2E-13	2.8E-12	4.1E-14	2.3E-13	1
PCB-118	3.4E-05	4.6E-05	3.1E-11	1.7E-10	2.4E-12	1.3E-11	1
PCB-123	3.7E-07	5.1E-07	3.4E-13	1.9E-12	2.7E-14	1.5E-13	1
PCB-126	9.4E-07	1.3E-06	8.6E-13	4.7E-12	6.9E-14	3.8E-13	1
PCB-156	7.9E-06	1.1E-05	7.2E-12	3.9E-11	5.7E-13	3.1E-12	1
PCB-157	2.6E-06	2.7E-06	2.3E-12	1.0E-11	1.9E-13	8.0E-13	1
PCB-167	4.4E-06	4.7E-06	4.0E-12	1.7E-11	3.2E-13	1.4E-12	1
PCB-169	6.8E-08	7.5E-08	6.2E-14	2.7E-13	5.0E-15	2.2E-14	1
PCB-189	6.5E-07	7.0E-07	6.0E-13	2.6E-12	4.8E-14	2.0E-13	1
PCB-77	1.9E-06	2.6E-06	1.8E-12	9.7E-12	1.4E-13	7.7E-13	1
PCB-81	3.7E-07	5.1E-07	3.4E-13	1.9E-12	2.7E-14	1.5E-13	1

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyls
mg/kg-day - milligrams per kilogram per day
mg/kg - milligrams per kilogram

Estimates of Human Intake
Groundwater to Ambient Air Pathway for Adult Recreator
New Conservation Yard RFI Site

Intake Equation: Dosage = $\frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	5.2	5.2
Fraction of time outdoors	FT	fraction	1.0	1.0
Exposure frequency	EF	days/year	25	50
Exposure duration	ED	years	9	24
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Inorganic Compounds						
Barium	NC	NC	NA	NA	NA	NA
Cadmium	NC	NC	NA	NA	NA	NA
Chromium	NC	NC	NA	NA	NA	NA
Copper	NC	NC	NA	NA	NA	NA
Lead	NC	NC	NA	NA	NA	NA
Mercury	NC	NC	NA	NA	NA	NA
Molybdenum	NC	NC	NA	NA	NA	NA
Nickel	NC	NC	NA	NA	NA	NA
Nitrate	NC	NC	NA	NA	NA	NA
Selenium	NC	NC	NA	NA	NA	NA
Silver	NC	NC	NA	NA	NA	NA
Thallium	NC	NC	NA	NA	NA	NA
Zinc	NC	NC	NA	NA	NA	NA
VOCs						
1,1-Dichloroethane	NC	NC	NA	NA	NA	NA
1,2-Dichloroethane	NC	NC	NA	NA	NA	NA
Acetone	7.3E-12	7.3E-12	3.7E-14	7.4E-14	4.5E-15	2.4E-14
Benzene	NC	NC	NA	NA	NA	NA
Carbon disulfide	NC	NC	NA	NA	NA	NA
Chloromethane	NC	NC	NA	NA	NA	NA
cis-1,2-Dichloroethene	NC	NC	NA	NA	NA	NA
Methylene chloride	NC	NC	NA	NA	NA	NA
Toluene	2.6E-07	2.6E-07	1.3E-09	2.7E-09	1.6E-10	8.6E-10
Trichloroethene	1.1E-07	1.1E-07	5.7E-10	1.1E-09	6.8E-11	3.6E-10
SVOCs						
Benzo(a)anthracene	NC	NC	NA	NA	NA	NA
Benzo(a)pyrene	NC	NC	NA	NA	NA	NA
Benzo(b)fluoranthene	NC	NC	NA	NA	NA	NA
Benzo(g,h,i)perylene	NC	NC	NA	NA	NA	NA
Benzo(k)fluoranthene	NC	NC	NA	NA	NA	NA
Chrysene	NC	NC	NA	NA	NA	NA
Dibenz(a,h)anthracene	NC	NC	NA	NA	NA	NA
Fluoranthene	NC	NC	NA	NA	NA	NA
Indeno(1,2,3-cd)pyrene	NC	NC	NA	NA	NA	NA
Phenanthrene	NC	NC	NA	NA	NA	NA
Pyrene	NC	NC	NA	NA	NA	NA

Estimates of Human Intake
Groundwater to Ambient Air Pathway for Adult Recreator
New Conservation Yard RFI Site

Intake Equation: Dosage = $\frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	5.2	5.2
Fraction of time outdoors	FT	fraction	1.0	1.0
Exposure frequency	EF	days/year	25	50
Exposure duration	ED	years	9	24
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Total Petroleum Hydrocarbons						
C20-C30(Lubricant Oil Range)	NC	NC	NA	NA	NA	NA
PCDD/PCDFs						
2,3,7,8-TCDD	NC	NC	NA	NA	NA	NA
1,2,3,7,8-PeCDD	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,6,7,8-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,7,8,9-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,4,6,7,8-HpCDD	NC	NC	NA	NA	NA	NA
OCDD	NC	NC	NA	NA	NA	NA
2,3,7,8-TCDF	NC	NC	NA	NA	NA	NA
1,2,3,7,8-PeCDF	NC	NC	NA	NA	NA	NA
2,3,4,7,8-PeCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA
2,3,4,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,7,8,9-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,6,7,8-HpCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8,9-HpCDF	NC	NC	NA	NA	NA	NA
OCDF	NC	NC	NA	NA	NA	NA
Total Tetra	NC	NC	NA	NA	NA	NA
Total Penta	NC	NC	NA	NA	NA	NA
Total Hexa	NC	NC	NA	NA	NA	NA
Total Hepta	NC	NC	NA	NA	NA	NA
Total Octa	NC	NC	NA	NA	NA	NA
PCDD/PCDF	NC	NC	NA	NA	NA	NA
Aroclor-1254	NC	NC	NA	NA	NA	NA
PCB-105	NC	NC	NA	NA	NA	NA
PCB-114	NC	NC	NA	NA	NA	NA
PCB-118	NC	NC	NA	NA	NA	NA
PCB-123	NC	NC	NA	NA	NA	NA
PCB-126	NC	NC	NA	NA	NA	NA
PCB-156	NC	NC	NA	NA	NA	NA
PCB-157	NC	NC	NA	NA	NA	NA
PCB-167	NC	NC	NA	NA	NA	NA
PCB-169	NC	NC	NA	NA	NA	NA
PCB-189	NC	NC	NA	NA	NA	NA
PCB-77	NC	NC	NA	NA	NA	NA
PCB-81	NC	NC	NA	NA	NA	NA

Estimates of Human Intake
Groundwater to Ambient Air Pathway for Adult Recreator
New Conservation Yard RFI Site

Intake Equation: Dosage = $\frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	5.2	5.2
Fraction of time outdoors	FT	fraction	1.0	1.0
Exposure frequency	EF	days/year	25	50
Exposure duration	ED	years	9	24
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
PCB-81	NC	NC	NA	NA	NA	NA

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
mg/kg-day - milligrams per kilogram per day
mg/m^3 - milligrams per cubic meter

Estimates of Human Intake
Soil to Ambient Air Pathway for Adult Recreator
New Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	5.2	5.2
Fraction of time outdoors	FT	fraction	1.0	1.0
Exposure frequency	EF	days/year	25	50
Exposure duration	ED	years	9	24
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Inorganic Compounds						
Barium	NC	NC	NA	NA	NA	NA
Cadmium	NC	NC	NA	NA	NA	NA
Chromium	NC	NC	NA	NA	NA	NA
Copper	NC	NC	NA	NA	NA	NA
Lead	NC	NC	NA	NA	NA	NA
Mercury	NC	NC	NA	NA	NA	NA
Molybdenum	NC	NC	NA	NA	NA	NA
Nickel	NC	NC	NA	NA	NA	NA
Nitrate	NC	NC	NA	NA	NA	NA
Selenium	NC	NC	NA	NA	NA	NA
Silver	NC	NC	NA	NA	NA	NA
Thallium	NC	NC	NA	NA	NA	NA
Zinc	NC	NC	NA	NA	NA	NA
VOCs						
1,1-Dichloroethane	NC	NC	NA	NA	NA	NA
1,2-Dichloroethane	NC	NC	NA	NA	NA	NA
Acetone	NC	NC	NA	NA	NA	NA
Benzene	NC	NC	NA	NA	NA	NA
Carbon disulfide	NC	NC	NA	NA	NA	NA
Chloromethane	NC	NC	NA	NA	NA	NA
cis-1,2-Dichloroethene	NC	NC	NA	NA	NA	NA
Methylene chloride	NC	NC	NA	NA	NA	NA
Toluene	6.9E-04	6.9E-04	3.5E-06	7.0E-06	4.2E-07	2.2E-06
Trichloroethene	NC	NC	NA	NA	NA	NA
SVOCs						
Benzo(a)anthracene	NC	NC	NA	NA	NA	NA
Benzo(a)pyrene	NC	NC	NA	NA	NA	NA
Benzo(b)fluoranthene	NC	NC	NA	NA	NA	NA
Benzo(g,h,i)perylene	NC	NC	NA	NA	NA	NA
Benzo(k)fluoranthene	NC	NC	NA	NA	NA	NA
Chrysene	NC	NC	NA	NA	NA	NA
Dibenz(a,h)anthracene	NC	NC	NA	NA	NA	NA
Fluoranthene	NC	NC	NA	NA	NA	NA
Indeno(1,2,3-cd)pyrene	NC	NC	NA	NA	NA	NA
Phenanthrene	NC	NC	NA	NA	NA	NA
Pyrene	NC	NC	NA	NA	NA	NA

Estimates of Human Intake
Soil to Ambient Air Pathway for Adult Recreator
New Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	5.2	5.2
Fraction of time outdoors	FT	fraction	1.0	1.0
Exposure frequency	EF	days/year	25	50
Exposure duration	ED	years	9	24
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Total Petroleum Hydrocarbons						
C20-C30(Lubricant Oil Range)	NC	NC	NA	NA	NA	NA
PCDD/PCDFs						
2,3,7,8-TCDD	NC	NC	NA	NA	NA	NA
1,2,3,7,8-PeCDD	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,6,7,8-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,7,8,9-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,4,6,7,8-HpCDD	NC	NC	NA	NA	NA	NA
OCDD	NC	NC	NA	NA	NA	NA
2,3,7,8-TCDF	NC	NC	NA	NA	NA	NA
1,2,3,7,8-PeCDF	NC	NC	NA	NA	NA	NA
2,3,4,7,8-PeCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA
2,3,4,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,7,8,9-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,6,7,8-HpCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8,9-HpCDF	NC	NC	NA	NA	NA	NA
OCDF	NC	NC	NA	NA	NA	NA
Total Tetra	NC	NC	NA	NA	NA	NA
Total Penta	NC	NC	NA	NA	NA	NA
Total Hexa	NC	NC	NA	NA	NA	NA
Total Hepta	NC	NC	NA	NA	NA	NA
Total Octa	NC	NC	NA	NA	NA	NA
PCDD/PCDF	NC	NC	NA	NA	NA	NA

Estimates of Human Intake
Soil to Ambient Air Pathway for Adult Recreator
New Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	5.2	5.2
Fraction of time outdoors	FT	fraction	1.0	1.0
Exposure frequency	EF	days/year	25	50
Exposure duration	ED	years	9	24
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
PCBs						
Aroclor-1254	NC	NC	NA	NA	NA	NA
PCB-105	NC	NC	NA	NA	NA	NA
PCB-114	NC	NC	NA	NA	NA	NA
PCB-118	NC	NC	NA	NA	NA	NA
PCB-123	NC	NC	NA	NA	NA	NA
PCB-126	NC	NC	NA	NA	NA	NA
PCB-156	NC	NC	NA	NA	NA	NA
PCB-157	NC	NC	NA	NA	NA	NA
PCB-167	NC	NC	NA	NA	NA	NA
PCB-169	NC	NC	NA	NA	NA	NA
PCB-189	NC	NC	NA	NA	NA	NA
PCB-77	NC	NC	NA	NA	NA	NA
PCB-81	NC	NC	NA	NA	NA	NA

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyls
mg/kg-day - milligrams per kilogram per day
mg/m^3 - milligrams per cubic meter

Estimates of Human Intake
Soil Particulate Inhalation Pathway for Adult Recreator
New Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times CF \times IR \times FT \times EF \times ED}{PEF \times BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Inhalation rate	IR	m^3/day	5.2	5.2
Conversion factor	CF	kg/ug	1.E-09	1.E-09
Fraction of time outdoors	FT	fraction	1.0	1.0
Exposure frequency	EF	days/year	25	50
Exposure duration	ED	years	9	24
Particulate emission factor	PEF	m^3/ug	2.4	2.4
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Inorganic Compounds						
Barium	2.2E+02	9.6E+02	4.6E-10	4.1E-09	5.5E-11	1.3E-09
Cadmium	1.8E+00	1.3E+01	3.8E-12	5.6E-11	4.6E-13	1.8E-11
Chromium	2.3E+01	4.1E+01	4.9E-11	1.7E-10	5.9E-12	5.5E-11
Copper	2.9E+01	8.2E+01	6.1E-11	3.5E-10	7.3E-12	1.1E-10
Lead	2.6E+01	3.5E+01	5.4E-11	1.5E-10	6.5E-12	4.7E-11
Mercury	1.2E-01	6.4E-01	2.6E-13	2.7E-12	3.1E-14	8.7E-13
Molybdenum	3.4E+00	6.0E+00	7.1E-12	2.5E-11	8.6E-13	8.1E-12
Nickel	2.2E+01	5.7E+01	4.7E-11	2.4E-10	5.7E-12	7.7E-11
Nitrate	NC	NC	NA	NA	NA	NA
Selenium	1.7E+00	3.0E+00	3.5E-12	1.3E-11	4.2E-13	4.1E-12
Silver	1.5E+01	9.6E+01	3.3E-11	4.1E-10	3.9E-12	1.3E-10
Thallium	NC	NC	NA	NA	NA	NA
Zinc	NC	NC	NA	NA	NA	NA
VOCs						
1,1-Dichloroethane	NC	NC	NA	NA	NA	NA
1,2-Dichloroethane	NC	NC	NA	NA	NA	NA
Acetone	NC	NC	NA	NA	NA	NA
Benzene	NC	NC	NA	NA	NA	NA
Carbon disulfide	NC	NC	NA	NA	NA	NA
Chloromethane	NC	NC	NA	NA	NA	NA
cis-1,2-Dichloroethene	NC	NC	NA	NA	NA	NA
Methylene chloride	NC	NC	NA	NA	NA	NA
Toluene	NC	NC	NA	NA	NA	NA
Trichloroethene	NC	NC	NA	NA	NA	NA
SVOCs						
Benzo(a)anthracene	3.6E-02	1.2E-02	7.7E-14	5.1E-14	9.3E-15	1.6E-14
Benzo(a)pyrene	4.0E-02	4.3E-02	8.4E-14	1.8E-13	1.0E-14	5.8E-14
Benzo(b)fluoranthene	4.3E-02	6.5E-02	9.2E-14	2.8E-13	1.1E-14	8.8E-14
Benzo(g,h,i)perylene	3.9E-02	3.1E-02	8.2E-14	1.3E-13	9.9E-15	4.2E-14
Benzo(k)fluoranthene	3.6E-02	1.2E-02	7.7E-14	5.1E-14	9.3E-15	1.6E-14
Chrysene	4.0E-02	2.7E-02	8.4E-14	1.1E-13	1.0E-14	3.7E-14
Dibenz(a,h)anthracene	3.6E-02	8.0E-03	7.6E-14	3.4E-14	9.2E-15	1.1E-14
Fluoranthene	4.3E-02	3.6E-02	9.1E-14	1.5E-13	1.1E-14	4.9E-14
Indeno(1,2,3-cd)pyrene	4.1E-02	5.3E-02	8.7E-14	2.2E-13	1.0E-14	7.2E-14
Phenanthrene	3.7E-02	1.4E-02	7.8E-14	5.9E-14	9.3E-15	1.9E-14
Pyrene	4.3E-02	4.3E-02	9.1E-14	1.8E-13	1.1E-14	5.8E-14

Estimates of Human Intake
Soil Particulate Inhalation Pathway for Adult Recreator
New Conservation Yard RFI Site

Intake Equation:

$$\text{Dosage} = \frac{C \times CF \times IR \times FT \times EF \times ED}{PEF \times BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Inhalation rate	IR	m^3/day	5.2	5.2
Conversion factor	CF	kg/ug	1.E-09	1.E-09
Fraction of time outdoors	FT	fraction	1.0	1.0
Exposure frequency	EF	days/year	25	50
Exposure duration	ED	years	9	24
Particulate emission factor	PEF	m^3/ug	2.4	2.4
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Total Petroleum Hydrocarbons						
C20-C30(Lubricant Oil Range)	NC	NC	NA	NA	NA	NA
2,3,7,8-TCDD	5.6E-06	3.4E-05	1.2E-17	1.5E-16	1.4E-18	4.7E-17
1,2,3,7,8-PeCDD	1.6E-05	9.0E-05	3.5E-17	3.8E-16	4.1E-18	1.2E-16
1,2,3,4,7,8-HxCDD	4.1E-05	1.0E-04	8.6E-17	4.4E-16	1.0E-17	1.4E-16
1,2,3,6,7,8-HxCDD	2.0E-04	5.4E-04	4.3E-16	2.3E-15	5.1E-17	7.3E-16
1,2,3,7,8,9-HxCDD	7.1E-05	4.7E-04	1.5E-16	2.0E-15	1.8E-17	6.4E-16
1,2,3,4,6,7,8-HpCDD	4.7E-03	1.2E-02	1.0E-14	5.1E-14	1.2E-15	1.6E-14
OCDD	5.4E-02	1.4E-01	1.2E-13	5.8E-13	1.4E-14	1.9E-13
2,3,7,8-TCDF	3.1E-06	5.7E-06	6.6E-18	2.4E-17	7.9E-19	7.7E-18
1,2,3,7,8-PeCDF	3.6E-06	1.0E-05	7.6E-18	4.2E-17	9.1E-19	1.4E-17
2,3,4,7,8-PeCDF	8.8E-06	1.7E-05	1.9E-17	7.3E-17	2.2E-18	2.4E-17
1,2,3,4,7,8-HxCDF	2.7E-05	6.3E-05	5.7E-17	2.7E-16	6.9E-18	8.5E-17
1,2,3,6,7,8-HxCDF	2.1E-05	4.9E-05	4.4E-17	2.1E-16	5.3E-18	6.6E-17
2,3,4,6,7,8-HxCDF	4.3E-05	1.1E-04	9.2E-17	4.5E-16	1.1E-17	1.4E-16
1,2,3,7,8,9-HxCDF	6.9E-06	1.4E-05	1.5E-17	6.0E-17	1.8E-18	1.9E-17
1,2,3,4,6,7,8-HpCDF	7.7E-04	2.0E-03	1.6E-15	8.5E-15	2.0E-16	2.7E-15
1,2,3,4,7,8,9-HpCDF	7.2E-05	1.8E-04	1.5E-16	7.7E-16	1.8E-17	2.5E-16
OCDF	2.0E-03	5.1E-03	4.3E-15	2.2E-14	5.2E-16	6.9E-15
Total Tetra	NC	NC	NA	NA	NA	NA
Total Penta	NC	NC	NA	NA	NA	NA
Total Hexa	NC	NC	NA	NA	NA	NA
Total Hepta	NC	NC	NA	NA	NA	NA
Total Octa	NC	NC	NA	NA	NA	NA
PCDD/PCDF	NC	NC	NA	NA	NA	NA

Estimates of Human Intake
Soil Particulate Inhalation Pathway for Adult Recreator
New Conservation Yard RFI Site

Intake Equation:

$$\text{Dosage} = \frac{C \times CF \times IR \times FT \times EF \times ED}{PEF \times BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Inhalation rate	IR	m^3/day	5.2	5.2
Conversion factor	CF	kg/ug	1.E-09	1.E-09
Fraction of time outdoors	FT	fraction	1.0	1.0
Exposure frequency	EF	days/year	25	50
Exposure duration	ED	years	9	24
Particulate emission factor	PEF	m^3/ug	2.4	2.4
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
PCBs						
Aroclor-1254	7.1E-02	7.1E-02	1.5E-13	3.0E-13	1.8E-14	9.6E-14
PCB-105	1.5E-05	2.1E-05	3.3E-17	9.0E-17	3.9E-18	2.9E-17
PCB-114	5.7E-07	7.7E-07	1.2E-18	3.3E-18	1.4E-19	1.1E-18
PCB-118	3.4E-05	4.6E-05	7.1E-17	1.9E-16	8.5E-18	6.2E-17
PCB-123	3.7E-07	5.1E-07	7.9E-19	2.2E-18	9.5E-20	6.9E-19
PCB-126	9.4E-07	1.3E-06	2.0E-18	5.5E-18	2.4E-19	1.7E-18
PCB-156	7.9E-06	1.1E-05	1.7E-17	4.6E-17	2.0E-18	1.5E-17
PCB-157	2.6E-06	2.7E-06	5.4E-18	1.2E-17	6.5E-19	3.7E-18
PCB-167	4.4E-06	4.7E-06	9.4E-18	2.0E-17	1.1E-18	6.4E-18
PCB-169	6.8E-08	7.5E-08	1.4E-19	3.2E-19	1.7E-20	1.0E-19
PCB-189	6.5E-07	7.0E-07	1.4E-18	3.0E-18	1.7E-19	9.5E-19
PCB-77	1.9E-06	2.6E-06	4.1E-18	1.1E-17	4.9E-19	3.6E-18
PCB-81	3.7E-07	5.1E-07	7.9E-19	2.2E-18	9.5E-20	6.9E-19

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyls
mg/kg-day - milligrams per kilogram per day
mg/kg - milligrams per kilogram

Estimates of Human Intake
Soil Dermal Contact Pathway for Adult Recreator
New Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times SA \times AF \times B \times CF \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Skin surface area per event	SA	cm^2/day	5700	5700
Soil loading to skin	AF	mg/cm^2	0.01	0.90
Bioavailability	B	fraction	CS	CS
Conversion factor	CF	kg/mg	1.E-06	1.E-06
Exposure frequency	EF	days/year	25	50
Exposure duration	ED	years	9	24
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
Inorganic Compounds							
Barium	2.2E+02	9.6E+02	1.2E-07	9.6E-05	1.5E-08	3.1E-05	1.0E-02
Cadmium	1.8E+00	1.3E+01	1.0E-10	1.3E-07	1.2E-11	4.3E-08	1.0E-03
Chromium	2.3E+01	4.1E+01	1.3E-08	4.1E-06	1.6E-09	1.3E-06	1.0E-02
Copper	2.9E+01	8.2E+01	1.6E-08	8.2E-06	1.9E-09	2.6E-06	1.0E-02
Lead	2.6E+01	3.5E+01	1.4E-08	3.5E-06	1.7E-09	1.1E-06	1.0E-02
Mercury	1.2E-01	6.4E-01	6.8E-11	6.5E-08	8.2E-12	2.1E-08	1.0E-02
Molybdenum	3.4E+00	6.0E+00	1.9E-09	6.0E-07	2.3E-10	1.9E-07	1.0E-02
Nickel	2.2E+01	5.7E+01	1.2E-08	5.7E-06	1.5E-09	1.8E-06	1.0E-02
Nitrate	NC	NC	NA	NA	NA	NA	1.0E-02
Selenium	1.7E+00	3.0E+00	9.3E-10	3.0E-07	1.1E-10	9.6E-08	1.0E-02
Silver	1.5E+01	9.6E+01	8.6E-09	9.6E-06	1.0E-09	3.1E-06	1.0E-02
Thallium	NC	NC	NA	NA	NA	NA	1.0E-02
Zinc	5.4E+02	2.8E+03	3.0E-07	2.8E-04	3.6E-08	9.0E-05	1.0E-02
VOCs							
1,1-Dichloroethane	NC	NC	NA	NA	NA	NA	1.0E-01
1,2-Dichloroethane	NC	NC	NA	NA	NA	NA	1.0E-01
Acetone	NC	NC	NA	NA	NA	NA	1.0E-01
Benzene	NC	NC	NA	NA	NA	NA	1.0E-01
Carbon disulfide	NC	NC	NA	NA	NA	NA	1.0E-02
Chloromethane	NC	NC	NA	NA	NA	NA	1.0E-01
cis-1,2-Dichloroethene	NC	NC	NA	NA	NA	NA	1.0E-01
Methylene chloride	NC	NC	NA	NA	NA	NA	1.0E-01
Toluene	5.3E-02	1.1E-01	3.0E-10	1.1E-07	3.6E-11	3.5E-08	1.0E-01
Trichloroethene	NC	NC	NA	NA	NA	NA	1.0E-01
SVOCs							
Benzo(a)anthracene	3.6E-02	1.2E-02	2.6E-10	1.6E-08	3.2E-11	5.0E-09	1.3E-01
Benzo(a)pyrene	4.0E-02	4.3E-02	2.9E-10	5.6E-08	3.5E-11	1.8E-08	1.3E-01
Benzo(b)fluoranthene	4.3E-02	6.5E-02	3.1E-10	8.5E-08	3.8E-11	2.7E-08	1.3E-01
Benzo(g,h,i)perylene	3.9E-02	3.1E-02	2.8E-10	4.0E-08	3.4E-11	1.3E-08	1.3E-01
Benzo(k)fluoranthene	3.6E-02	1.2E-02	2.6E-10	1.6E-08	3.2E-11	5.0E-09	1.3E-01
Chrysene	4.0E-02	2.7E-02	2.9E-10	3.5E-08	3.4E-11	1.1E-08	1.3E-01
Dibenz(a,h)anthracene	3.6E-02	8.0E-03	2.6E-10	1.0E-08	3.1E-11	3.3E-09	1.3E-01
Fluoranthene	4.3E-02	3.6E-02	3.1E-10	4.7E-08	3.7E-11	1.5E-08	1.3E-01
Indeno(1,2,3-cd)pyrene	4.1E-02	5.3E-02	3.0E-10	6.9E-08	3.6E-11	2.2E-08	1.3E-01
Phenanthrene	3.7E-02	1.4E-02	2.7E-10	1.8E-08	3.2E-11	5.8E-09	1.3E-01
Pyrene	4.3E-02	4.3E-02	3.1E-10	5.6E-08	3.7E-11	1.8E-08	1.3E-01

Estimates of Human Intake
Soil Dermal Contact Pathway for Adult Recreator
New Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times SA \times AF \times B \times CF \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Skin surface area per event	SA	cm^2/day	5700	5700
Soil loading to skin	AF	mg/cm^2	0.01	0.90
Bioavailability	B	fraction	CS	CS
Conversion factor	CF	kg/mg	1.E-06	1.E-06
Exposure frequency	EF	days/year	25	50
Exposure duration	ED	years	9	24
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
Total Petroleum Hydrocarbons							
C20-C30(Lubricant Oil Range)	NC	NC	NA	NA	NA	NA	1.3E-01
PCDD/PCDFs							
2,3,7,8-TCDD	5.6E-06	3.4E-05	9.4E-15	1.0E-11	1.1E-15	3.3E-12	3.0E-02
1,2,3,7,8-PeCDD	1.6E-05	9.0E-05	2.7E-14	2.7E-11	3.3E-15	8.7E-12	3.0E-02
1,2,3,4,7,8-HxCDD	4.1E-05	1.0E-04	6.8E-14	3.1E-11	8.2E-15	1.0E-11	3.0E-02
1,2,3,6,7,8-HxCDD	2.0E-04	5.4E-04	3.4E-13	1.6E-10	4.0E-14	5.2E-11	3.0E-02
1,2,3,7,8,9-HxCDD	7.1E-05	4.7E-04	1.2E-13	1.4E-10	1.4E-14	4.5E-11	3.0E-02
1,2,3,4,6,7,8-HpCDD	4.7E-03	1.2E-02	7.9E-12	3.6E-09	9.4E-13	1.1E-09	3.0E-02
OCDD	5.4E-02	1.4E-01	9.1E-11	4.1E-08	1.1E-11	1.3E-08	3.0E-02
2,3,7,8-TCDF	3.1E-06	5.7E-06	5.2E-15	1.7E-12	6.2E-16	5.5E-13	3.0E-02
1,2,3,7,8-PeCDF	3.6E-06	1.0E-05	6.0E-15	3.0E-12	7.2E-16	9.6E-13	3.0E-02
2,3,4,7,8-PeCDF	8.8E-06	1.7E-05	1.5E-14	5.2E-12	1.8E-15	1.7E-12	3.0E-02
1,2,3,4,7,8-HxCDF	2.7E-05	6.3E-05	4.5E-14	1.9E-11	5.4E-15	6.1E-12	3.0E-02
1,2,3,6,7,8-HxCDF	2.1E-05	4.9E-05	3.5E-14	1.5E-11	4.2E-15	4.7E-12	3.0E-02
2,3,4,6,7,8-HxCDF	4.3E-05	1.1E-04	7.2E-14	3.2E-11	8.7E-15	1.0E-11	3.0E-02
1,2,3,7,8,9-HxCDF	6.9E-06	1.4E-05	1.2E-14	4.3E-12	1.4E-15	1.4E-12	3.0E-02
1,2,3,4,6,7,8-HpCDF	7.7E-04	2.0E-03	1.3E-12	6.0E-10	1.6E-13	1.9E-10	3.0E-02
1,2,3,4,7,8,9-HpCDF	7.2E-05	1.8E-04	1.2E-13	5.5E-11	1.5E-14	1.8E-11	3.0E-02
OCDF	2.0E-03	5.1E-03	3.4E-12	1.5E-09	4.1E-13	4.9E-10	3.0E-02
Total Tetra	NC	NC	NA	NA	NA	NA	3.0E-02
Total Penta	NC	NC	NA	NA	NA	NA	3.0E-02
Total Hexa	NC	NC	NA	NA	NA	NA	3.0E-02
Total Hepta	NC	NC	NA	NA	NA	NA	3.0E-02
Total Octa	NC	NC	NA	NA	NA	NA	3.0E-02
PCDD/PCDF	NC	NC	NA	NA	NA	NA	3.0E-02

Estimates of Human Intake
Soil Dermal Contact Pathway for Adult Recreator
New Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times SA \times AF \times B \times CF \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Skin surface area per event	SA	cm^2/day	5700	5700
Soil loading to skin	AF	mg/cm^2	0.01	0.90
Bioavailability	B	fraction	CS	CS
Conversion factor	CF	kg/mg	1.E-06	1.E-06
Exposure frequency	EF	days/year	25	50
Exposure duration	ED	years	9	24
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
PCBs							
Aroclor-1254	7.1E-02	7.1E-02	5.5E-10	1.0E-07	6.7E-11	3.2E-08	1.4E-01
PCB-105	1.5E-05	2.1E-05	1.2E-13	3.0E-11	1.4E-14	9.5E-12	1.4E-01
PCB-114	5.7E-07	7.7E-07	4.4E-15	1.1E-12	5.3E-16	3.5E-13	1.4E-01
PCB-118	3.4E-05	4.6E-05	2.6E-13	6.4E-11	3.1E-14	2.1E-11	1.4E-01
PCB-123	3.7E-07	5.1E-07	2.9E-15	7.2E-13	3.5E-16	2.3E-13	1.4E-01
PCB-126	9.4E-07	1.3E-06	7.3E-15	1.8E-12	8.8E-16	5.8E-13	1.4E-01
PCB-156	7.9E-06	1.1E-05	6.1E-14	1.5E-11	7.4E-15	4.8E-12	1.4E-01
PCB-157	2.6E-06	2.7E-06	2.0E-14	3.8E-12	2.4E-15	1.2E-12	1.4E-01
PCB-167	4.4E-06	4.7E-06	3.4E-14	6.6E-12	4.1E-15	2.1E-12	1.4E-01
PCB-169	6.8E-08	7.5E-08	5.3E-16	1.0E-13	6.4E-17	3.4E-14	1.4E-01
PCB-189	6.5E-07	7.0E-07	5.1E-15	9.8E-13	6.1E-16	3.2E-13	1.4E-01
PCB-77	1.9E-06	2.6E-06	1.5E-14	3.7E-12	1.8E-15	1.2E-12	1.4E-01
PCB-81	3.7E-07	5.1E-07	2.9E-15	7.2E-13	3.5E-16	2.3E-13	1.4E-01

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005),
except dermal absorption factors which were taken from USEPA (2001).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyls
mg/kg-day - milligrams per kilogram per day
mg/kg - milligrams per kilogram

Estimates of Human Intake
Soil Ingestion Pathway for Adult Recreator
New Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times CF \times FT \times EF \times ED \times B}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Soil ingestion rate	IR	mg/day	50	100
Conversion factor	CF	kg/mg	1.E-06	1.E-06
Exposure frequency	EF	days/year	25	50
Exposure duration	ED	years	9	24
Bioavailability	B	fraction	CS	CS
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
Inorganic Compounds							
Barium	2.2E+02	9.6E+02	1.1E-05	1.9E-04	1.3E-06	6.0E-05	1
Cadmium	1.8E+00	1.3E+01	8.8E-08	2.6E-06	1.1E-08	8.3E-07	1
Chromium	2.3E+01	4.1E+01	1.1E-06	7.9E-06	1.4E-07	2.5E-06	1
Copper	2.9E+01	8.2E+01	1.4E-06	1.6E-05	1.7E-07	5.1E-06	1
Lead	2.6E+01	3.5E+01	1.3E-06	6.8E-06	1.5E-07	2.2E-06	1
Mercury	1.2E-01	6.4E-01	6.0E-09	1.3E-07	7.2E-10	4.0E-08	1
Molybdenum	3.4E+00	6.0E+00	1.6E-07	1.2E-06	2.0E-08	3.8E-07	1
Nickel	2.2E+01	5.7E+01	1.1E-06	1.1E-05	1.3E-07	3.6E-06	1
Nitrate	NC	NC	NA	NA	NA	NA	1
Selenium	1.7E+00	3.0E+00	8.1E-08	5.9E-07	9.8E-09	1.9E-07	1
Silver	1.5E+01	9.6E+01	7.6E-07	1.9E-05	9.1E-08	6.0E-06	1
Thallium	NC	NC	NA	NA	NA	NA	1
Zinc	5.4E+02	2.8E+03	2.7E-05	5.5E-04	3.2E-06	1.7E-04	1
VOCs							
1,1-Dichloroethane	NC	NC	NA	NA	NA	NA	1
1,2-Dichloroethane	NC	NC	NA	NA	NA	NA	1
Acetone	NC	NC	NA	NA	NA	NA	1
Benzene	NC	NC	NA	NA	NA	NA	1
Carbon disulfide	NC	NC	NA	NA	NA	NA	1
Chloromethane	NC	NC	NA	NA	NA	NA	1
cis-1,2-Dichloroethene	NC	NC	NA	NA	NA	NA	1
Methylene chloride	NC	NC	NA	NA	NA	NA	1
Toluene	5.3E-02	1.1E-01	2.6E-09	2.2E-08	3.1E-10	6.9E-09	1
Trichloroethene	NC	NC	NA	NA	NA	NA	1
SVOCs							
Benzo(a)anthracene	3.6E-02	1.2E-02	1.8E-09	2.3E-09	2.1E-10	7.5E-10	1
Benzo(a)pyrene	4.0E-02	4.3E-02	1.9E-09	8.4E-09	2.3E-10	2.7E-09	1
Benzo(b)fluoranthene	4.3E-02	6.5E-02	2.1E-09	1.3E-08	2.5E-10	4.1E-09	1
Benzo(g,h,i)perylene	3.9E-02	3.1E-02	1.9E-09	6.1E-09	2.3E-10	1.9E-09	1
Benzo(k)fluoranthene	3.6E-02	1.2E-02	1.8E-09	2.3E-09	2.1E-10	7.5E-10	1
Chrysene	4.0E-02	2.7E-02	1.9E-09	5.3E-09	2.3E-10	1.7E-09	1
Dibenz(a,h)anthracene	3.6E-02	8.0E-03	1.8E-09	1.6E-09	2.1E-10	5.0E-10	1
Fluoranthene	4.3E-02	3.6E-02	2.1E-09	7.0E-09	2.5E-10	2.3E-09	1
Indeno(1,2,3-cd)pyrene	4.1E-02	5.3E-02	2.0E-09	1.0E-08	2.4E-10	3.3E-09	1
Phenanthrene	3.7E-02	1.4E-02	1.8E-09	2.7E-09	2.2E-10	8.8E-10	1
Pyrene	4.3E-02	4.3E-02	2.1E-09	8.4E-09	2.5E-10	2.7E-09	1

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Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Soil ingestion rate	IR	mg/day	50	100
Conversion factor	CF	kg/mg	1.E-06	1.E-06
Exposure frequency	EF	days/year	25	50
Exposure duration	ED	years	9	24
Bioavailability	B	fraction	CS	CS
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
Total Petroleum Hydrocarbons							
C20-C30(Lubricant Oil Range)	NC	NC	NA	NA	NA	NA	1
PCDD/PCDFs							
2,3,7,8-TCDD	5.6E-06	3.4E-05	2.8E-13	6.7E-12	3.3E-14	2.2E-12	1
1,2,3,7,8-PeCDD	1.6E-05	9.0E-05	8.0E-13	1.8E-11	9.6E-14	5.6E-12	1
1,2,3,4,7,8-HxCDD	4.1E-05	1.0E-04	2.0E-12	2.0E-11	2.4E-13	6.5E-12	1
1,2,3,6,7,8-HxCDD	2.0E-04	5.4E-04	9.8E-12	1.0E-10	1.2E-12	3.4E-11	1
1,2,3,7,8,9-HxCDD	7.1E-05	4.7E-04	3.5E-12	9.2E-11	4.2E-13	2.9E-11	1
1,2,3,4,6,7,8-HpCDD	4.7E-03	1.2E-02	2.3E-10	2.3E-09	2.8E-11	7.5E-10	1
OCDD	5.4E-02	1.4E-01	2.7E-09	2.7E-08	3.2E-10	8.6E-09	1
2,3,7,8-TCDF	3.1E-06	5.7E-06	1.5E-13	1.1E-12	1.8E-14	3.6E-13	1
1,2,3,7,8-PeCDF	3.6E-06	1.0E-05	1.8E-13	2.0E-12	2.1E-14	6.3E-13	1
2,3,4,7,8-PeCDF	8.8E-06	1.7E-05	4.3E-13	3.4E-12	5.1E-14	1.1E-12	1
1,2,3,4,7,8-HxCDF	2.7E-05	6.3E-05	1.3E-12	1.2E-11	1.6E-13	3.9E-12	1
1,2,3,6,7,8-HxCDF	2.1E-05	4.9E-05	1.0E-12	9.5E-12	1.2E-13	3.1E-12	1
2,3,4,6,7,8-HxCDF	4.3E-05	1.1E-04	2.1E-12	2.1E-11	2.5E-13	6.7E-12	1
1,2,3,7,8,9-HxCDF	6.9E-06	1.4E-05	3.4E-13	2.8E-12	4.0E-14	8.8E-13	1
1,2,3,4,6,7,8-HpCDF	7.7E-04	2.0E-03	3.8E-11	3.9E-10	4.5E-12	1.3E-10	1
1,2,3,4,7,8,9-HpCDF	7.2E-05	1.8E-04	3.5E-12	3.6E-11	4.3E-13	1.1E-11	1
OCDF	2.0E-03	5.1E-03	9.9E-11	1.0E-09	1.2E-11	3.2E-10	1
Total Tetra	NC	NC	NA	NA	NA	NA	1
Total Penta	NC	NC	NA	NA	NA	NA	1
Total Hexa	NC	NC	NA	NA	NA	NA	1
Total Hepta	NC	NC	NA	NA	NA	NA	1
Total Octa	NC	NC	NA	NA	NA	NA	1
PCDD/PCDF	NC	NC	NA	NA	NA	NA	1

Estimates of Human Intake
Soil Ingestion Pathway for Adult Recreator
New Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times CF \times FT \times EF \times ED \times B}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Soil ingestion rate	IR	mg/day	50	100
Conversion factor	CF	kg/mg	1.E-06	1.E-06
Exposure frequency	EF	days/year	25	50
Exposure duration	ED	years	9	24
Bioavailability	B	fraction	CS	CS
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
PCBs							
Aroclor-1016	NC	NC	NA	NA	NA	NA	1
Aroclor-1254	7.1E-02	7.1E-02	3.5E-09	1.4E-08	4.2E-10	4.4E-09	1
PCB-105	1.5E-05	2.1E-05	7.6E-13	4.1E-12	9.1E-14	1.3E-12	1
PCB-114	5.7E-07	7.7E-07	2.8E-14	1.5E-13	3.3E-15	4.9E-14	1
PCB-118	3.4E-05	4.6E-05	1.6E-12	9.0E-12	2.0E-13	2.9E-12	1
PCB-123	3.7E-07	5.1E-07	1.8E-14	1.0E-13	2.2E-15	3.2E-14	1
PCB-126	9.4E-07	1.3E-06	4.6E-14	2.5E-13	5.5E-15	8.1E-14	1
PCB-156	7.9E-06	1.1E-05	3.8E-13	2.1E-12	4.6E-14	6.7E-13	1
PCB-157	2.6E-06	2.7E-06	1.3E-13	5.3E-13	1.5E-14	1.7E-13	1
PCB-167	4.4E-06	4.7E-06	2.2E-13	9.2E-13	2.6E-14	3.0E-13	1
PCB-169	6.8E-08	7.5E-08	3.3E-15	1.5E-14	4.0E-16	4.7E-15	1
PCB-189	6.5E-07	7.0E-07	3.2E-14	1.4E-13	3.8E-15	4.4E-14	1
PCB-77	1.9E-06	2.6E-06	9.5E-14	5.2E-13	1.1E-14	1.7E-13	1
PCB-81	3.7E-07	5.1E-07	1.8E-14	1.0E-13	2.2E-15	3.2E-14	1

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyls
mg/kg-day - milligrams per kilogram per day
mg/kg - milligrams per kilogram

Estimates of Human Intake
Groundwater to Indoor Air Pathway for Adult Worker
New Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	10.4	16.0
Fraction of time indoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	219	250
Exposure duration	ED	years	9	25
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	9125
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Inorganic Compounds						
Barium	NC	NC	NA	NA	NA	NA
Cadmium	NC	NC	NA	NA	NA	NA
Chromium	NC	NC	NA	NA	NA	NA
Copper	NC	NC	NA	NA	NA	NA
Lead	NC	NC	NA	NA	NA	NA
Mercury	NC	NC	NA	NA	NA	NA
Molybdenum	NC	NC	NA	NA	NA	NA
Nickel	NC	NC	NA	NA	NA	NA
Nitrate	NC	NC	NA	NA	NA	NA
Selenium	NC	NC	NA	NA	NA	NA
Silver	NC	NC	NA	NA	NA	NA
Thallium	NC	NC	NA	NA	NA	NA
Zinc	NC	NC	NA	NA	NA	NA
VOCs						
1,1-Dichloroethane	NC	NC	NA	NA	NA	NA
1,2-Dichloroethane	NC	NC	NA	NA	NA	NA
Acetone	1.4E-07	1.4E-07	6.4E-09	1.7E-08	7.6E-10	5.6E-09
Benzene	NC	NC	NA	NA	NA	NA
Carbon disulfide	NC	NC	NA	NA	NA	NA
Chloromethane	NC	NC	NA	NA	NA	NA
cis-1,2-Dichloroethene	NC	NC	NA	NA	NA	NA
Methylene chloride	NC	NC	NA	NA	NA	NA
Toluene	2.6E-06	2.6E-06	1.1E-07	3.0E-07	1.4E-08	1.0E-07
Trichloroethene	1.2E-06	1.2E-06	5.3E-08	1.4E-07	6.4E-09	4.7E-08
SVOCs						
Benzo(a)anthracene	NC	NC	NA	NA	NA	NA
Benzo(a)pyrene	NC	NC	NA	NA	NA	NA
Benzo(b)fluoranthene	NC	NC	NA	NA	NA	NA
Benzo(g,h,i)perylene	NC	NC	NA	NA	NA	NA
Benzo(k)fluoranthene	NC	NC	NA	NA	NA	NA
Chrysene	NC	NC	NA	NA	NA	NA
Dibenz(a,h)anthracene	NC	NC	NA	NA	NA	NA
Fluoranthene	NC	NC	NA	NA	NA	NA
Indeno(1,2,3-cd)pyrene	NC	NC	NA	NA	NA	NA
Phenanthrene	NC	NC	NA	NA	NA	NA
Pyrene	NC	NC	NA	NA	NA	NA

Estimates of Human Intake
Groundwater to Indoor Air Pathway for Adult Worker
New Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	10.4	16.0
Fraction of time indoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	219	250
Exposure duration	ED	years	9	25
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	9125
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Total Petroleum Hydrocarbons						
C20-C30(Lubricant Oil Range)	NC	NC	NA	NA	NA	NA
PCDD/PCDFs						
2,3,7,8-TCDD	NC	NC	NA	NA	NA	NA
1,2,3,7,8-PeCDD	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,6,7,8-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,7,8,9-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,4,6,7,8-HpCDD	NC	NC	NA	NA	NA	NA
OCDD	NC	NC	NA	NA	NA	NA
2,3,7,8-TCDF	NC	NC	NA	NA	NA	NA
1,2,3,7,8-PeCDF	NC	NC	NA	NA	NA	NA
2,3,4,7,8-PeCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA
2,3,4,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,7,8,9-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,6,7,8-HpCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8,9-HpCDF	NC	NC	NA	NA	NA	NA
OCDF	NC	NC	NA	NA	NA	NA
Total Tetra	NC	NC	NA	NA	NA	NA
Total Penta	NC	NC	NA	NA	NA	NA
Total Hexa	NC	NC	NA	NA	NA	NA
Total Hepta	NC	NC	NA	NA	NA	NA
Total Octa	NC	NC	NA	NA	NA	NA
PCDD/PCDF	NC	NC	NA	NA	NA	NA
Aroclor-1254	NC	NC	NA	NA	NA	NA
PCB-105	NC	NC	NA	NA	NA	NA
PCB-114	NC	NC	NA	NA	NA	NA
PCB-118	NC	NC	NA	NA	NA	NA
PCB-123	NC	NC	NA	NA	NA	NA
PCB-126	NC	NC	NA	NA	NA	NA
PCB-156	NC	NC	NA	NA	NA	NA
PCB-157	NC	NC	NA	NA	NA	NA
PCB-167	NC	NC	NA	NA	NA	NA
PCB-169	NC	NC	NA	NA	NA	NA
PCB-189	NC	NC	NA	NA	NA	NA
PCB-77	NC	NC	NA	NA	NA	NA
PCB-81	NC	NC	NA	NA	NA	NA

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Estimates of Human Intake
Groundwater to Indoor Air Pathway for Adult Worker
New Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	10.4	16.0
Fraction of time indoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	219	250
Exposure duration	ED	years	9	25
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	9125
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
mg/kg-day - milligrams per kilogram per day
mg/m^3 - milligrams per cubic meter

Estimates of Human Intake
Soil to Indoor Air Pathway for Adult Worker
New Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	10.4	16.0
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	219	250
Exposure duration	ED	years	9	25
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	9125
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Inorganic Compounds						
Barium	NC	NC	NA	NA	NA	NA
Cadmium	NC	NC	NA	NA	NA	NA
Chromium	NC	NC	NA	NA	NA	NA
Copper	NC	NC	NA	NA	NA	NA
Lead	NC	NC	NA	NA	NA	NA
Mercury	NC	NC	NA	NA	NA	NA
Molybdenum	NC	NC	NA	NA	NA	NA
Nickel	NC	NC	NA	NA	NA	NA
Nitrate	NC	NC	NA	NA	NA	NA
Selenium	NC	NC	NA	NA	NA	NA
Silver	NC	NC	NA	NA	NA	NA
Thallium	NC	NC	NA	NA	NA	NA
Zinc	NC	NC	NA	NA	NA	NA
VOCs						
1,1,1,2-Tetrachloroethane	NC	NC	NA	NA	NA	NA
1,1-Dichloroethane	NC	NC	NA	NA	NA	NA
1,2-Dichloroethane	NC	NC	NA	NA	NA	NA
Acetone	NC	NC	NA	NA	NA	NA
Benzene	NC	NC	NA	NA	NA	NA
Carbon disulfide	NC	NC	NA	NA	NA	NA
Chloromethane	NC	NC	NA	NA	NA	NA
cis-1,2-Dichloroethene	NC	NC	NA	NA	NA	NA
Methylene chloride	NC	NC	NA	NA	NA	NA
Toluene	1.2E-02	2.5E-02	5.3E-04	2.9E-03	6.4E-05	9.7E-04
Trichloroethene	NC	NC	NA	NA	NA	NA
SVOCs						
Benzo(a)anthracene	NC	NC	NA	NA	NA	NA
Benzo(a)pyrene	NC	NC	NA	NA	NA	NA
Benzo(b)fluoranthene	NC	NC	NA	NA	NA	NA
Benzo(g,h,i)perylene	NC	NC	NA	NA	NA	NA
Benzo(k)fluoranthene	NC	NC	NA	NA	NA	NA
Chrysene	NC	NC	NA	NA	NA	NA
Dibenz(a,h)anthracene	NC	NC	NA	NA	NA	NA
Fluoranthene	NC	NC	NA	NA	NA	NA
Indeno(1,2,3-cd)pyrene	NC	NC	NA	NA	NA	NA
Phenanthrene	NC	NC	NA	NA	NA	NA
Pyrene	NC	NC	NA	NA	NA	NA

Estimates of Human Intake
Soil to Indoor Air Pathway for Adult Worker
New Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	10.4	16.0
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	219	250
Exposure duration	ED	years	9	25
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	9125
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Total Petroleum Hydrocarbons						
C20-C30(Lubricant Oil Range)	NC	NC	NA	NA	NA	NA
PCDD/PCDFs						
2,3,7,8-TCDD	NC	NC	NA	NA	NA	NA
1,2,3,7,8-PeCDD	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,6,7,8-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,7,8,9-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,4,6,7,8-HpCDD	NC	NC	NA	NA	NA	NA
OCDD	NC	NC	NA	NA	NA	NA
2,3,7,8-TCDF	NC	NC	NA	NA	NA	NA
1,2,3,7,8-PeCDF	NC	NC	NA	NA	NA	NA
2,3,4,7,8-PeCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA
2,3,4,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,7,8,9-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,6,7,8-HpCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8,9-HpCDF	NC	NC	NA	NA	NA	NA
OCDF	NC	NC	NA	NA	NA	NA
Total Tetra	NC	NC	NA	NA	NA	NA
Total Penta	NC	NC	NA	NA	NA	NA
Total Hexa	NC	NC	NA	NA	NA	NA
Total Hepta	NC	NC	NA	NA	NA	NA
Total Octa	NC	NC	NA	NA	NA	NA
PCDD/PCDF	NC	NC	NA	NA	NA	NA

Estimates of Human Intake
Soil to Indoor Air Pathway for Adult Worker
New Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	10.4	16.0
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	219	250
Exposure duration	ED	years	9	25
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	9125
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
PCBs						
Aroclor-1254	NC	NC	NA	NA	NA	NA
PCB-105	NC	NC	NA	NA	NA	NA
PCB-114	NC	NC	NA	NA	NA	NA
PCB-118	NC	NC	NA	NA	NA	NA
PCB-123	NC	NC	NA	NA	NA	NA
PCB-126	NC	NC	NA	NA	NA	NA
PCB-156	NC	NC	NA	NA	NA	NA
PCB-157	NC	NC	NA	NA	NA	NA
PCB-167	NC	NC	NA	NA	NA	NA
PCB-169	NC	NC	NA	NA	NA	NA
PCB-189	NC	NC	NA	NA	NA	NA
PCB-77	NC	NC	NA	NA	NA	NA
PCB-81	NC	NC	NA	NA	NA	NA

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyls
mg/kg-day - milligrams per kilogram per day
mg/m^3 - milligrams per cubic meter

Spreadsheet C1-41 (1 of 3)

Estimates of Human Intake
Groundwater to Ambient Air Pathway for Adult Worker
New Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	10.4	16.0
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	219	250
Exposure duration	ED	years	9	25
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	9125
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Inorganic Compounds						
Barium	NC	NC	NA	NA	NA	NA
Cadmium	NC	NC	NA	NA	NA	NA
Chromium	NC	NC	NA	NA	NA	NA
Copper	NC	NC	NA	NA	NA	NA
Lead	NC	NC	NA	NA	NA	NA
Mercury	NC	NC	NA	NA	NA	NA
Molybdenum	NC	NC	NA	NA	NA	NA
Nickel	NC	NC	NA	NA	NA	NA
Nitrate	NC	NC	NA	NA	NA	NA
Selenium	NC	NC	NA	NA	NA	NA
Silver	NC	NC	NA	NA	NA	NA
Thallium	NC	NC	NA	NA	NA	NA
Zinc	NC	NC	NA	NA	NA	NA
Energetic Constituents						
VOCs						
1,1-Dichloroethane	NC	NC	NA	NA	NA	NA
1,2-Dichloroethane	NC	NC	NA	NA	NA	NA
Acetone	7.3E-12	7.3E-12	3.3E-13	8.6E-13	3.9E-14	2.9E-13
Benzene	NC	NC	NA	NA	NA	NA
Carbon disulfide	NC	NC	NA	NA	NA	NA
Chloromethane	NC	NC	NA	NA	NA	NA
cis-1,2-Dichloroethene	NC	NC	NA	NA	NA	NA
Methylene chloride	NC	NC	NA	NA	NA	NA
Toluene	2.6E-07	2.6E-07	1.2E-08	3.1E-08	1.4E-09	1.0E-08
Trichloroethene	1.1E-07	1.1E-07	5.0E-09	1.3E-08	6.0E-10	4.4E-09
SVOCs						
Benzo(a)anthracene	NC	NC	NA	NA	NA	NA
Benzo(a)pyrene	NC	NC	NA	NA	NA	NA
Benzo(b)fluoranthene	NC	NC	NA	NA	NA	NA
Benzo(g,h,i)perylene	NC	NC	NA	NA	NA	NA
Benzo(k)fluoranthene	NC	NC	NA	NA	NA	NA
Chrysene	NC	NC	NA	NA	NA	NA
Dibenz(a,h)anthracene	NC	NC	NA	NA	NA	NA
Fluoranthene	NC	NC	NA	NA	NA	NA
Indeno(1,2,3-cd)pyrene	NC	NC	NA	NA	NA	NA
Phenanthrene	NC	NC	NA	NA	NA	NA
Pyrene	NC	NC	NA	NA	NA	NA

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Estimates of Human Intake
Groundwater to Ambient Air Pathway for Adult Worker
New Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	10.4	16.0
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	219	250
Exposure duration	ED	years	9	25
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	9125
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Total Petroleum Hydrocarbons						
C20-C30(Lubricant Oil Range)	NC	NC	NA	NA	NA	NA
2,3,7,8-TCDD	NC	NC	NA	NA	NA	NA
1,2,3,7,8-PeCDD	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,6,7,8-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,7,8,9-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,4,6,7,8-HpCDD	NC	NC	NA	NA	NA	NA
OCDD	NC	NC	NA	NA	NA	NA
2,3,7,8-TCDF	NC	NC	NA	NA	NA	NA
1,2,3,7,8-PeCDF	NC	NC	NA	NA	NA	NA
2,3,4,7,8-PeCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA
2,3,4,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,7,8,9-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,6,7,8-HpCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8,9-HpCDF	NC	NC	NA	NA	NA	NA
OCDF	NC	NC	NA	NA	NA	NA
Total Tetra	NC	NC	NA	NA	NA	NA
Total Penta	NC	NC	NA	NA	NA	NA
Total Hexa	NC	NC	NA	NA	NA	NA
Total Hepta	NC	NC	NA	NA	NA	NA
Total Octa	NC	NC	NA	NA	NA	NA
PCDD/PCDF	NC	NC	NA	NA	NA	NA
Aroclor-1254	NC	NC	NA	NA	NA	NA
PCB-105	NC	NC	NA	NA	NA	NA
PCB-114	NC	NC	NA	NA	NA	NA
PCB-118	NC	NC	NA	NA	NA	NA
PCB-123	NC	NC	NA	NA	NA	NA
PCB-126	NC	NC	NA	NA	NA	NA
PCB-156	NC	NC	NA	NA	NA	NA
PCB-157	NC	NC	NA	NA	NA	NA
PCB-167	NC	NC	NA	NA	NA	NA
PCB-169	NC	NC	NA	NA	NA	NA
PCB-189	NC	NC	NA	NA	NA	NA
PCB-77	NC	NC	NA	NA	NA	NA
PCB-81	NC	NC	NA	NA	NA	NA

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).

Spreadsheet C1-41 (3 of 3)

Estimates of Human Intake
Groundwater to Ambient Air Pathway for Adult Worker
New Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	10.4	16.0
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	219	250
Exposure duration	ED	years	9	25
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	9125
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)

NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
mg/kg-day - milligrams per kilogram per day
mg/m^3 - milligrams per cubic meter

Spreadsheet C1-40 (1 of 3)

Estimates of Human Intake
Soil to Ambient Air Pathway for Adult Worker
New Conservation Yard RFI Site

Intake Equation:

$$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	10.4	16.0
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	219	250
Exposure duration	ED	years	9	25
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	9125
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Inorganic Compounds						
Barium	NC	NC	NA	NA	NA	NA
Cadmium	NC	NC	NA	NA	NA	NA
Chromium	NC	NC	NA	NA	NA	NA
Copper	NC	NC	NA	NA	NA	NA
Lead	NC	NC	NA	NA	NA	NA
Mercury	NC	NC	NA	NA	NA	NA
Molybdenum	NC	NC	NA	NA	NA	NA
Nickel	NC	NC	NA	NA	NA	NA
Nitrate	NC	NC	NA	NA	NA	NA
Selenium	NC	NC	NA	NA	NA	NA
Silver	NC	NC	NA	NA	NA	NA
Thallium	NC	NC	NA	NA	NA	NA
Zinc	NC	NC	NA	NA	NA	NA
VOCs						
1,1-Dichloroethane	NC	NC	NA	NA	NA	NA
1,2-Dichloroethane	NC	NC	NA	NA	NA	NA
Acetone	NC	NC	NA	NA	NA	NA
Benzene	NC	NC	NA	NA	NA	NA
Carbon disulfide	NC	NC	NA	NA	NA	NA
Chloromethane	NC	NC	NA	NA	NA	NA
cis-1,2-Dichloroethene	NC	NC	NA	NA	NA	NA
Methylene chloride	NC	NC	NA	NA	NA	NA
Toluene	6.9E-04	6.9E-04	3.1E-05	8.1E-05	3.7E-06	2.7E-05
Trichloroethene	NC	NC	NA	NA	NA	NA
SVOCs						
Benzo(a)anthracene	NC	NC	NA	NA	NA	NA
Benzo(a)pyrene	NC	NC	NA	NA	NA	NA
Benzo(b)fluoranthene	NC	NC	NA	NA	NA	NA
Benzo(g,h,i)perylene	NC	NC	NA	NA	NA	NA
Benzo(k)fluoranthene	NC	NC	NA	NA	NA	NA
Chrysene	NC	NC	NA	NA	NA	NA
Dibenz(a,h)anthracene	NC	NC	NA	NA	NA	NA
Fluoranthene	NC	NC	NA	NA	NA	NA
Indeno(1,2,3-cd)pyrene	NC	NC	NA	NA	NA	NA
Phenanthrene	NC	NC	NA	NA	NA	NA
Pyrene	NC	NC	NA	NA	NA	NA

Spreadsheet C1-40 (2 of 3)

Estimates of Human Intake
Soil to Ambient Air Pathway for Adult Worker
New Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	10.4	16.0
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	219	250
Exposure duration	ED	years	9	25
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	9125
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Total Petroleum Hydrocarbons						
C20-C30(Lubricant Oil Range)	NC	NC	NA	NA	NA	NA
PCDD/PCDFs						
2,3,7,8-TCDD	NC	NC	NA	NA	NA	NA
1,2,3,7,8-PeCDD	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,6,7,8-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,7,8,9-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,4,6,7,8-HpCDD	NC	NC	NA	NA	NA	NA
OCDD	NC	NC	NA	NA	NA	NA
2,3,7,8-TCDF	NC	NC	NA	NA	NA	NA
1,2,3,7,8-PeCDF	NC	NC	NA	NA	NA	NA
2,3,4,7,8-PeCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA
2,3,4,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,7,8,9-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,6,7,8-HpCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8,9-HpCDF	NC	NC	NA	NA	NA	NA
OCDF	NC	NC	NA	NA	NA	NA
Total Tetra	NC	NC	NA	NA	NA	NA
Total Penta	NC	NC	NA	NA	NA	NA
Total Hexa	NC	NC	NA	NA	NA	NA
Total Hepta	NC	NC	NA	NA	NA	NA
Total Octa	NC	NC	NA	NA	NA	NA
PCDD/PCDF	NC	NC	NA	NA	NA	NA

Spreadsheet C1-40 (3 of 3)

Estimates of Human Intake
Soil to Ambient Air Pathway for Adult Worker
New Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	10.4	16.0
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	219	250
Exposure duration	ED	years	9	25
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	9125
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
PCBs						
Aroclor-1254	NC	NC	NA	NA	NA	NA
PCB-105	NC	NC	NA	NA	NA	NA
PCB-114	NC	NC	NA	NA	NA	NA
PCB-118	NC	NC	NA	NA	NA	NA
PCB-123	NC	NC	NA	NA	NA	NA
PCB-126	NC	NC	NA	NA	NA	NA
PCB-156	NC	NC	NA	NA	NA	NA
PCB-157	NC	NC	NA	NA	NA	NA
PCB-167	NC	NC	NA	NA	NA	NA
PCB-169	NC	NC	NA	NA	NA	NA
PCB-189	NC	NC	NA	NA	NA	NA
PCB-77	NC	NC	NA	NA	NA	NA
PCB-81	NC	NC	NA	NA	NA	NA

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyls
mg/kg-day - milligrams per kilogram per day
mg/m^3 - milligrams per cubic meter

Spreadsheet C1-39 (1 of 3)

Estimates of Human Intake
Soil Particulate Inhalation Pathway for Adult Worker
New Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times CF \times IR \times FT \times EF \times ED}{PEF \times BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Inhalation rate	IR	m^3/day	10.4	16.0
Conversion factor	CF	kg/ug	1.E-09	1.E-09
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	219	250
Exposure duration	ED	years	9	25
Particulate emission factor	PEF	m^3/ug	2.4	2.4
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	9125
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Inorganic Compounds						
Barium	2.2E+02	9.6E+02	4.0E-09	4.7E-08	4.8E-10	1.6E-08
Cadmium	1.8E+00	1.3E+01	3.3E-11	6.5E-10	4.0E-12	2.2E-10
Chromium	2.3E+01	4.1E+01	4.3E-10	2.0E-09	5.2E-11	6.6E-10
Copper	2.9E+01	8.2E+01	5.3E-10	4.0E-09	6.4E-11	1.3E-09
Lead	2.6E+01	3.5E+01	4.8E-10	1.7E-09	5.7E-11	5.7E-10
Mercury	1.2E-01	6.4E-01	2.3E-12	3.2E-11	2.7E-13	1.1E-11
Molybdenum	3.4E+00	6.0E+00	6.2E-11	2.9E-10	7.5E-12	9.8E-11
Nickel	2.2E+01	5.7E+01	4.1E-10	2.8E-09	5.0E-11	9.3E-10
Nitrate	NC	NC	NA	NA	NA	NA
Selenium	1.7E+00	3.0E+00	3.1E-11	1.5E-10	3.7E-12	4.9E-11
Silver	1.5E+01	9.6E+01	2.9E-10	4.7E-09	3.4E-11	1.6E-09
Thallium	NC	NC	NA	NA	NA	NA
Zinc	5.4E+02	2.8E+03	1.0E-08	1.4E-07	1.2E-09	4.5E-08
VOCs						
1,1-Dichloroethane	NC	NC	NA	NA	NA	NA
1,2-Dichloroethane	NC	NC	NA	NA	NA	NA
Acetone	NC	NC	NA	NA	NA	NA
Benzene	NC	NC	NA	NA	NA	NA
Carbon disulfide	NC	NC	NA	NA	NA	NA
Chloromethane	NC	NC	NA	NA	NA	NA
cis-1,2-Dichloroethene	NC	NC	NA	NA	NA	NA
Methylene chloride	NC	NC	NA	NA	NA	NA
Toluene	5.3E-02	1.1E-01	NA	NA	NA	NA
Trichloroethene	NC	NC	NA	NA	NA	NA
SVOCs						
Benzo(a)anthracene	3.6E-02	1.2E-02	6.8E-13	5.9E-13	8.1E-14	2.0E-13
Benzo(a)pyrene	4.0E-02	4.3E-02	7.4E-13	2.1E-12	8.8E-14	7.0E-13
Benzo(b)fluoranthene	4.3E-02	6.5E-02	8.0E-13	3.2E-12	9.7E-14	1.1E-12
Benzo(g,h,i)perylene	3.9E-02	3.1E-02	7.2E-13	1.5E-12	8.7E-14	5.1E-13
Benzo(k)fluoranthene	3.6E-02	1.2E-02	6.8E-13	5.9E-13	8.1E-14	2.0E-13
Chrysene	4.0E-02	2.7E-02	7.3E-13	1.3E-12	8.8E-14	4.4E-13
Dibenz(a,h)anthracene	3.6E-02	8.0E-03	6.7E-13	3.9E-13	8.0E-14	1.3E-13
Fluoranthene	4.3E-02	3.6E-02	7.9E-13	1.8E-12	9.5E-14	5.9E-13
Indeno(1,2,3-cd)pyrene	4.1E-02	5.3E-02	7.6E-13	2.6E-12	9.1E-14	8.6E-13
Phenanthrene	3.7E-02	1.4E-02	6.8E-13	6.8E-13	8.2E-14	2.3E-13
Pyrene	4.3E-02	4.3E-02	7.9E-13	2.1E-12	9.5E-14	7.0E-13

Spreadsheet C1-39 (2 of 3)

Estimates of Human Intake
Soil Particulate Inhalation Pathway for Adult Worker
New Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times CF \times IR \times FT \times EF \times ED}{PEF \times BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Inhalation rate	IR	m^3/day	10.4	16.0
Conversion factor	CF	kg/ug	1.E-09	1.E-09
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	219	250
Exposure duration	ED	years	9	25
Particulate emission factor	PEF	m^3/ug	2.4	2.4
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	9125
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Total Petroleum Hydrocarbons						
C20-C30(Lubricant Oil Range)	NC	NC	NA	NA	NA	NA
PCDD/PCDFs						
2,3,7,8-TCDD	5.6E-06	3.4E-05	1.0E-16	1.7E-15	1.3E-17	5.6E-16
1,2,3,7,8-PeCDD	1.6E-05	9.0E-05	3.0E-16	4.4E-15	3.6E-17	1.5E-15
1,2,3,4,7,8-HxCDD	4.1E-05	1.0E-04	7.6E-16	5.1E-15	9.1E-17	1.7E-15
1,2,3,6,7,8-HxCDD	2.0E-04	5.4E-04	3.7E-15	2.6E-14	4.5E-16	8.7E-15
1,2,3,7,8,9-HxCDD	7.1E-05	4.7E-04	1.3E-15	2.3E-14	1.6E-16	7.7E-15
1,2,3,4,6,7,8-HpCDD	4.7E-03	1.2E-02	8.7E-14	5.8E-13	1.0E-14	1.9E-13
OCDD	5.4E-02	1.4E-01	1.0E-12	6.7E-12	1.2E-13	2.2E-12
2,3,7,8-TCDF	3.1E-06	5.7E-06	5.8E-17	2.8E-16	6.9E-18	9.3E-17
1,2,3,7,8-PeCDF	3.6E-06	1.0E-05	6.6E-17	4.9E-16	8.0E-18	1.6E-16
2,3,4,7,8-PeCDF	8.8E-06	1.7E-05	1.6E-16	8.5E-16	2.0E-17	2.8E-16
1,2,3,4,7,8-HxCDF	2.7E-05	6.3E-05	5.0E-16	3.1E-15	6.0E-17	1.0E-15
1,2,3,6,7,8-HxCDF	2.1E-05	4.9E-05	3.9E-16	2.4E-15	4.7E-17	8.0E-16
2,3,4,6,7,8-HxCDF	4.3E-05	1.1E-04	8.0E-16	5.2E-15	9.6E-17	1.7E-15
1,2,3,7,8,9-HxCDF	6.9E-06	1.4E-05	1.3E-16	6.9E-16	1.5E-17	2.3E-16
1,2,3,4,6,7,8-HpCDF	7.7E-04	2.0E-03	1.4E-14	9.8E-14	1.7E-15	3.3E-14
1,2,3,4,7,8,9-HpCDF	7.2E-05	1.8E-04	1.3E-15	8.9E-15	1.6E-16	3.0E-15
OCDF	2.0E-03	5.1E-03	3.8E-14	2.5E-13	4.5E-15	8.3E-14
Total Tetra	NC	NC	-	-	-	-
Total Penta	NC	NC	2.6E-05	2.6E-05	2.6E-05	2.6E-05
Total Hexa	NC	NC	3.7E-04	3.7E-04	3.7E-04	3.7E-04
Total Hepta	NC	NC	5.0E-03	5.0E-03	5.0E-03	5.0E-03
Total Octa	NC	NC	5.1E-02	5.1E-02	5.1E-02	5.1E-02
PCDD/PCDF	NC	NC	NC	NC	NC	NC

Spreadsheet C1-39 (3 of 3)

Estimates of Human Intake
Soil Particulate Inhalation Pathway for Adult Worker
New Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times CF \times IR \times FT \times EF \times ED}{PEF \times BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Inhalation rate	IR	m^3/day	10.4	16.0
Conversion factor	CF	kg/ug	1.E-09	1.E-09
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	219	250
Exposure duration	ED	years	9	25
Particulate emission factor	PEF	m^3/ug	2.4	2.4
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	9125
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
PCBs						
Aroclor-1254	7.1E-02	7.1E-02	1.3E-12	3.5E-12	1.6E-13	1.2E-12
PCB-105	1.5E-05	2.1E-05	2.9E-16	1.0E-15	3.4E-17	3.4E-16
PCB-114	5.7E-07	7.7E-07	1.1E-17	3.8E-17	1.3E-18	1.3E-17
PCB-118	3.4E-05	4.6E-05	6.2E-16	2.2E-15	7.5E-17	7.5E-16
PCB-123	3.7E-07	5.1E-07	6.9E-18	2.5E-17	8.3E-19	8.3E-18
PCB-126	9.4E-07	1.3E-06	1.7E-17	6.3E-17	2.1E-18	2.1E-17
PCB-156	7.9E-06	1.1E-05	1.5E-16	5.3E-16	1.8E-17	1.8E-16
PCB-157	2.6E-06	2.7E-06	4.7E-17	1.3E-16	5.7E-18	4.5E-17
PCB-167	4.4E-06	4.7E-06	8.2E-17	2.3E-16	9.8E-18	7.7E-17
PCB-169	6.8E-08	7.5E-08	1.3E-18	3.7E-18	1.5E-19	1.2E-18
PCB-189	6.5E-07	7.0E-07	1.2E-17	3.4E-17	1.5E-18	1.1E-17
PCB-77	1.9E-06	2.6E-06	3.6E-17	1.3E-16	4.3E-18	4.3E-17
PCB-81	3.7E-07	5.1E-07	6.9E-18	2.5E-17	8.3E-19	8.3E-18

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyls
mg/kg-day - milligrams per kilogram per day
mg/kg - milligrams per kilogram

Spreadsheet C1-38 (1 of 3)

Estimates of Human Intake
Soil Dermal Contact Pathway for Adult Worker
New Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times SA \times AF \times B \times CF \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Skin surface area per event	SA	cm^2/day	2500	2500
Soil loading to skin	AF	mg/cm^2	0.02	0.20
Bioavailability	B	fraction	CS	CS
Conversion factor	CF	kg/mg	1.E-06	1.E-06
Exposure frequency	EF	days/year	219	250
Exposure duration	ED	years	9	25
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	9125
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
Inorganic Compounds							
Barium	2.2E+02	9.6E+02	9.3E-07	4.7E-05	1.1E-07	1.6E-05	0.01
Cadmium	1.8E+00	1.3E+01	7.7E-10	6.5E-08	9.3E-11	2.2E-08	0.00
Chromium	2.3E+01	4.1E+01	1.0E-07	2.0E-06	1.2E-08	6.6E-07	0.01
Copper	2.9E+01	8.2E+01	1.2E-07	4.0E-06	1.5E-08	1.3E-06	0.01
Lead	2.6E+01	3.5E+01	1.1E-07	1.7E-06	1.3E-08	5.7E-07	0.01
Mercury	1.2E-01	6.4E-01	5.2E-10	3.2E-08	6.3E-11	1.1E-08	0.01
Molybdenum	3.4E+00	6.0E+00	1.4E-08	2.9E-07	1.7E-09	9.8E-08	0.01
Nickel	2.2E+01	5.7E+01	9.5E-08	2.8E-06	1.1E-08	9.3E-07	0.01
Nitrate	NC	NC	NA	NA	NA	NA	0.01
Selenium	1.7E+00	3.0E+00	7.1E-09	1.5E-07	8.6E-10	4.9E-08	0.01
Silver	1.5E+01	9.6E+01	6.6E-08	4.7E-06	8.0E-09	1.6E-06	0.01
Thallium	NC	NC	NA	NA	NA	NA	0.01
Zinc	5.4E+02	2.8E+03	2.3E-06	1.4E-04	2.8E-07	4.5E-05	0.01
VOCs							
1,1-Dichloroethane	NC	NC	NA	NA	NA	NA	0.10
1,2-Dichloroethane	NC	NC	NA	NA	NA	NA	0.10
Acetone	NC	NC	NA	NA	NA	NA	0.10
Benzene	NC	NC	NA	NA	NA	NA	0.10
Carbon disulfide	NC	NC	NA	NA	NA	NA	0.01
Chloromethane	NC	NC	NA	NA	NA	NA	0.10
cis-1,2-Dichloroethene	NC	NC	NA	NA	NA	NA	0.10
Methylene chloride	NC	NC	NA	NA	NA	NA	0.10
Toluene	5.3E-02	1.1E-01	2.3E-09	5.4E-08	2.7E-10	1.8E-08	0.10
Trichloroethene	NC	NC	NA	NA	NA	NA	0.10
SVOCs							
Benzo(a)anthracene	3.6E-02	1.2E-02	2.0E-09	7.6E-09	2.4E-10	2.5E-09	0.13
Benzo(a)pyrene	4.0E-02	4.3E-02	2.2E-09	2.7E-08	2.7E-10	9.1E-09	0.13
Benzo(b)fluoranthene	4.3E-02	6.5E-02	2.4E-09	4.1E-08	2.9E-10	1.4E-08	0.13
Benzo(g,h,i)perylene	3.9E-02	3.1E-02	2.2E-09	2.0E-08	2.6E-10	6.6E-09	0.13
Benzo(k)fluoranthene	3.6E-02	1.2E-02	2.0E-09	7.6E-09	2.4E-10	2.5E-09	0.13
Chrysene	4.0E-02	2.7E-02	2.2E-09	1.7E-08	2.6E-10	5.7E-09	0.13
Dibenz(a,h)anthracene	3.6E-02	8.0E-03	2.0E-09	5.1E-09	2.4E-10	1.7E-09	0.13
Fluoranthene	4.3E-02	3.6E-02	2.4E-09	2.3E-08	2.9E-10	7.6E-09	0.13
Indeno(1,2,3-cd)pyrene	4.1E-02	5.3E-02	2.3E-09	3.4E-08	2.7E-10	1.1E-08	0.13
Phenanthrene	3.7E-02	1.4E-02	2.0E-09	8.9E-09	2.5E-10	3.0E-09	0.13
Pyrene	4.3E-02	4.3E-02	2.4E-09	2.7E-08	2.9E-10	9.1E-09	0.13

Spreadsheet C1-38 (2 of 3)

Estimates of Human Intake
Soil Dermal Contact Pathway for Adult Worker
New Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times SA \times AF \times B \times CF \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Skin surface area per event	SA	cm^2/day	2500	2500
Soil loading to skin	AF	mg/cm^2	0.02	0.20
Bioavailability	B	fraction	CS	CS
Conversion factor	CF	kg/mg	1.E-06	1.E-06
Exposure frequency	EF	days/year	219	250
Exposure duration	ED	years	9	25
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	9125
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
Total Petroleum Hydrocarbons							
C20-C30(Lubricant Oil Range)	NC	NC	NA	NA	NA	NA	0.13
PCDD/PCDFs							
2,3,7,8-TCDD	5.6E-06	3.4E-05	7.2E-14	5.1E-12	8.7E-15	1.7E-12	0.03
1,2,3,7,8-PeCDD	1.6E-05	9.0E-05	2.1E-13	1.3E-11	2.5E-14	4.4E-12	0.03
1,2,3,4,7,8-HxCDD	4.1E-05	1.0E-04	5.2E-13	1.5E-11	6.3E-14	5.1E-12	0.03
1,2,3,6,7,8-HxCDD	2.0E-04	5.4E-04	2.6E-12	7.9E-11	3.1E-13	2.6E-11	0.03
1,2,3,7,8,9-HxCDD	7.1E-05	4.7E-04	9.2E-13	6.9E-11	1.1E-13	2.3E-11	0.03
1,2,3,4,6,7,8-HpCDD	4.7E-03	1.2E-02	6.0E-11	1.7E-09	7.3E-12	5.8E-10	0.03
OCDD	5.4E-02	1.4E-01	7.0E-10	2.0E-08	8.4E-11	6.7E-09	0.03
2,3,7,8-TCDF	3.1E-06	5.7E-06	4.0E-14	8.4E-13	4.8E-15	2.8E-13	0.03
1,2,3,7,8-PeCDF	3.6E-06	1.0E-05	4.6E-14	1.5E-12	5.5E-15	4.9E-13	0.03
2,3,4,7,8-PeCDF	8.8E-06	1.7E-05	1.1E-13	2.5E-12	1.4E-14	8.5E-13	0.03
1,2,3,4,7,8-HxCDF	2.7E-05	6.3E-05	3.5E-13	9.2E-12	4.2E-14	3.1E-12	0.03
1,2,3,6,7,8-HxCDF	2.1E-05	4.9E-05	2.7E-13	7.2E-12	3.2E-14	2.4E-12	0.03
2,3,4,6,7,8-HxCDF	4.3E-05	1.1E-04	5.6E-13	1.6E-11	6.7E-14	5.2E-12	0.03
1,2,3,7,8,9-HxCDF	6.9E-06	1.4E-05	8.9E-14	2.1E-12	1.1E-14	6.9E-13	0.03
1,2,3,4,6,7,8-HpCDF	7.7E-04	2.0E-03	9.9E-12	2.9E-10	1.2E-12	9.8E-11	0.03
1,2,3,4,7,8,9-HpCDF	7.2E-05	1.8E-04	9.3E-13	2.7E-11	1.1E-13	8.9E-12	0.03
OCDF	2.0E-03	5.1E-03	2.6E-11	7.5E-10	3.1E-12	2.5E-10	0.03
Total Tetra	NC	NC	1.5E-05	1.5E-05	1.5E-05	1.5E-05	0.03
Total Penta	NC	NC	1.3E-04	1.3E-04	1.3E-04	1.3E-04	0.03
Total Hexa	NC	NC	8.7E-04	8.7E-04	8.7E-04	8.7E-04	0.03
Total Hepta	NC	NC	1.2E-02	1.2E-02	1.2E-02	1.2E-02	0.03
Total Octa	NC	NC	1.2E-01	1.2E-01	1.2E-01	1.2E-01	0.03
PCDD/PCDF	NC	NC	NC	NC	NC	NC	0.03

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Estimates of Human Intake
Soil Dermal Contact Pathway for Adult Worker
New Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times SA \times AF \times B \times CF \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Skin surface area per event	SA	cm^2/day	2500	2500
Soil loading to skin	AF	mg/cm^2	0.02	0.20
Bioavailability	B	fraction	CS	CS
Conversion factor	CF	kg/mg	1.E-06	1.E-06
Exposure frequency	EF	days/year	219	250
Exposure duration	ED	years	9	25
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	9125
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
PCBs							
Aroclor-1254	7.1E-02	7.1E-02	4.3E-09	4.9E-08	5.1E-10	1.6E-08	0.14
PCB-105	1.5E-05	2.1E-05	9.3E-13	1.4E-11	1.1E-13	4.8E-12	0.14
PCB-114	5.7E-07	7.7E-07	3.4E-14	5.3E-13	4.1E-15	1.8E-13	0.14
PCB-118	3.4E-05	4.6E-05	2.0E-12	3.1E-11	2.4E-13	1.0E-11	0.14
PCB-123	3.7E-07	5.1E-07	2.2E-14	3.5E-13	2.7E-15	1.2E-13	0.14
PCB-126	9.4E-07	1.3E-06	5.6E-14	8.8E-13	6.8E-15	2.9E-13	0.14
PCB-156	7.9E-06	1.1E-05	4.7E-13	7.4E-12	5.7E-14	2.5E-12	0.14
PCB-157	2.6E-06	2.7E-06	1.5E-13	1.9E-12	1.8E-14	6.2E-13	0.14
PCB-167	4.4E-06	4.7E-06	2.6E-13	3.2E-12	3.2E-14	1.1E-12	0.14
PCB-169	6.8E-08	7.5E-08	4.1E-15	5.1E-14	4.9E-16	1.7E-14	0.14
PCB-189	6.5E-07	7.0E-07	3.9E-14	4.8E-13	4.7E-15	1.6E-13	0.14
PCB-77	1.9E-06	2.6E-06	1.2E-13	1.8E-12	1.4E-14	6.0E-13	0.14
PCB-81	3.7E-07	5.1E-07	2.2E-14	3.5E-13	2.7E-15	1.2E-13	0.14

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005), except dermal absorption factors which were taken from USEPA (2001).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyls
mg/kg-day - milligrams per kilogram per day
mg/kg - milligrams per kilogram

Spreadsheet C1-37 (1 of 3)

Estimates of Human Intake
Soil Ingestion Pathway for Adult Worker
New Conservation Yard RFI Site

Intake Equation: Dosage = $\frac{C \times IR \times CF \times FT \times EF \times ED \times B}{BW \times AT}$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Soil ingestion rate	IR	mg/day	50	200
Conversion factor	CF	kg/mg	1.E-06	1.E-06
Exposure frequency	EF	days/year	219	250
Exposure duration	ED	years	9	25
Bioavailability	B	fraction	CS	CS
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	9125
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
Inorganic Compounds							
Barium	2.2E+02	9.6E+02	9.3E-05	1.9E-03	1.1E-05	6.3E-04	1
Cadmium	1.8E+00	1.3E+01	7.7E-07	2.6E-05	9.3E-08	8.7E-06	1
Chromium	2.3E+01	4.1E+01	1.0E-05	7.9E-05	1.2E-06	2.6E-05	1
Copper	2.9E+01	8.2E+01	1.2E-05	1.6E-04	1.5E-06	5.3E-05	1
Lead	2.6E+01	3.5E+01	1.1E-05	6.8E-05	1.3E-06	2.3E-05	1
Mercury	1.2E-01	6.4E-01	5.2E-08	1.3E-06	6.3E-09	4.2E-07	1
Molybdenum	3.4E+00	6.0E+00	1.4E-06	1.2E-05	1.7E-07	3.9E-06	1
Nickel	2.2E+01	5.7E+01	9.5E-06	1.1E-04	1.1E-06	3.7E-05	1
Nitrate	NC	NC	NA	NA	NA	NA	1
Selenium	1.7E+00	3.0E+00	7.1E-07	5.9E-06	8.6E-08	2.0E-06	1
Silver	1.5E+01	9.6E+01	6.6E-06	1.9E-04	8.0E-07	6.3E-05	1
Thallium	NC	NC	NA	NA	NA	NA	1
Zinc	5.4E+02	2.8E+03	2.3E-04	5.5E-03	2.8E-05	1.8E-03	1
VOCs							
1,1-Dichloroethane	NC	NC	NA	NA	NA	NA	1
1,2-Dichloroethane	NC	NC	NA	NA	NA	NA	1
Acetone	NC	NC	NA	NA	NA	NA	1
Benzene	NC	NC	NA	NA	NA	NA	1
Carbon disulfide	NC	NC	NA	NA	NA	NA	1
Chloromethane	NC	NC	NA	NA	NA	NA	1
cis-1,2-Dichloroethene	NC	NC	NA	NA	NA	NA	1
Methylene chloride	NC	NC	NA	NA	NA	NA	1
Toluene	5.3E-02	1.1E-01	2.3E-08	2.2E-07	2.7E-09	7.2E-08	1
Trichloroethene	NC	NC	NA	NA	NA	NA	1
SVOCs							
Benzo(a)anthracene	3.6E-02	1.2E-02	1.6E-08	2.3E-08	1.9E-09	7.8E-09	1
Benzo(a)pyrene	4.0E-02	4.3E-02	1.7E-08	8.4E-08	2.0E-09	2.8E-08	1
Benzo(b)fluoranthene	4.3E-02	6.5E-02	1.9E-08	1.3E-07	2.2E-09	4.2E-08	1
Benzo(g,h,i)perylene	3.9E-02	3.1E-02	1.7E-08	6.1E-08	2.0E-09	2.0E-08	1
Benzo(k)fluoranthene	3.6E-02	1.2E-02	1.6E-08	2.3E-08	1.9E-09	7.8E-09	1
Chrysene	4.0E-02	2.7E-02	1.7E-08	5.3E-08	2.0E-09	1.8E-08	1
Dibenz(a,h)anthracene	3.6E-02	8.0E-03	1.5E-08	1.6E-08	1.9E-09	5.2E-09	1
Fluoranthene	4.3E-02	3.6E-02	1.8E-08	7.0E-08	2.2E-09	2.3E-08	1
Indeno(1,2,3-cd)pyrene	4.1E-02	5.3E-02	1.8E-08	1.0E-07	2.1E-09	3.5E-08	1
Phenanthrene	3.7E-02	1.4E-02	1.6E-08	2.7E-08	1.9E-09	9.1E-09	1
Pyrene	4.3E-02	4.3E-02	1.8E-08	8.4E-08	2.2E-09	2.8E-08	1

Spreadsheet C1-37 (2 of 3)

Estimates of Human Intake
Soil Ingestion Pathway for Adult Worker
New Conservation Yard RFI Site

Intake Equation: Dosage = $\frac{C \times IR \times CF \times FT \times EF \times ED \times B}{BW \times AT}$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Soil ingestion rate	IR	mg/day	50	200
Conversion factor	CF	kg/mg	1.E-06	1.E-06
Exposure frequency	EF	days/year	219	250
Exposure duration	ED	years	9	25
Bioavailability	B	fraction	CS	CS
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	9125
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
Total Petroleum Hydrocarbons							
C20-C30(Lubricant Oil Range)	NC	NC	NA	NA	NA	NA	1
PCDD/PCDFs							
2,3,7,8-TCDD	5.6E-06	3.4E-05	2.4E-12	6.7E-11	2.9E-13	2.2E-11	1
1,2,3,7,8-PeCDD	1.6E-05	9.0E-05	7.0E-12	1.8E-10	8.4E-13	5.9E-11	1
1,2,3,4,7,8-HxCDD	4.1E-05	1.0E-04	1.7E-11	2.0E-10	2.1E-12	6.8E-11	1
1,2,3,6,7,8-HxCDD	2.0E-04	5.4E-04	8.6E-11	1.0E-09	1.0E-11	3.5E-10	1
1,2,3,7,8,9-HxCDD	7.1E-05	4.7E-04	3.1E-11	9.2E-10	3.7E-12	3.1E-10	1
1,2,3,4,6,7,8-HpCDD	4.7E-03	1.2E-02	2.0E-09	2.3E-08	2.4E-10	7.8E-09	1
OCDD	5.4E-02	1.4E-01	2.3E-08	2.7E-07	2.8E-09	9.0E-08	1
2,3,7,8-TCDF	3.1E-06	5.7E-06	1.3E-12	1.1E-11	1.6E-13	3.7E-12	1
1,2,3,7,8-PeCDF	3.6E-06	1.0E-05	1.5E-12	2.0E-11	1.8E-13	6.5E-12	1
2,3,4,7,8-PeCDF	8.8E-06	1.7E-05	3.8E-12	3.4E-11	4.5E-13	1.1E-11	1
1,2,3,4,7,8-HxCDF	2.7E-05	6.3E-05	1.2E-11	1.2E-10	1.4E-12	4.1E-11	1
1,2,3,6,7,8-HxCDF	2.1E-05	4.9E-05	9.0E-12	9.5E-11	1.1E-12	3.2E-11	1
2,3,4,6,7,8-HxCDF	4.3E-05	1.1E-04	1.9E-11	2.1E-10	2.2E-12	6.9E-11	1
1,2,3,7,8,9-HxCDF	6.9E-06	1.4E-05	3.0E-12	2.8E-11	3.5E-13	9.2E-12	1
1,2,3,4,6,7,8-HpCDF	7.7E-04	2.0E-03	3.3E-10	3.9E-09	4.0E-11	1.3E-09	1
1,2,3,4,7,8,9-HpCDF	7.2E-05	1.8E-04	3.1E-11	3.6E-10	3.7E-12	1.2E-10	1
OCDF	2.0E-03	5.1E-03	8.7E-10	1.0E-08	1.0E-10	3.3E-09	1
Total Tetra	NC	NC	1.5E-05	1.5E-05	1.5E-05	1.5E-05	1
Total Penta	NC	NC	1.3E-04	1.3E-04	1.3E-04	1.3E-04	1
Total Hexa	NC	NC	8.7E-04	8.7E-04	8.7E-04	8.7E-04	1
Total Hepta	NC	NC	1.2E-02	1.2E-02	1.2E-02	1.2E-02	1
Total Octa	NC	NC	1.2E-01	1.2E-01	1.2E-01	1.2E-01	1
PCDD/PCDF	NC	NC	NC	NC	NC	NC	1

Spreadsheet C1-37 (3 of 3)

Estimates of Human Intake
Soil Ingestion Pathway for Adult Worker
New Conservation Yard RFI Site

Intake Equation: Dosage = $\frac{C \times IR \times CF \times FT \times EF \times ED \times B}{BW \times AT}$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Soil ingestion rate	IR	mg/day	50	200
Conversion factor	CF	kg/mg	1.E-06	1.E-06
Exposure frequency	EF	days/year	219	250
Exposure duration	ED	years	9	25
Bioavailability	B	fraction	CS	CS
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	9125
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
PCBs							
Aroclor-1254	7.1E-02	7.1E-02	3.0E-08	1.4E-07	3.7E-09	4.6E-08	1
PCB-105	1.5E-05	2.1E-05	6.6E-12	4.1E-11	8.0E-13	1.4E-11	1
PCB-114	5.7E-07	7.7E-07	2.4E-13	1.5E-12	2.9E-14	5.1E-13	1
PCB-118	3.4E-05	4.6E-05	1.4E-11	9.0E-11	1.7E-12	3.0E-11	1
PCB-123	3.7E-07	5.1E-07	1.6E-13	1.0E-12	1.9E-14	3.3E-13	1
PCB-126	9.4E-07	1.3E-06	4.0E-13	2.5E-12	4.8E-14	8.4E-13	1
PCB-156	7.9E-06	1.1E-05	3.4E-12	2.1E-11	4.0E-13	7.0E-12	1
PCB-157	2.6E-06	2.7E-06	1.1E-12	5.3E-12	1.3E-13	1.8E-12	1
PCB-167	4.4E-06	4.7E-06	1.9E-12	9.2E-12	2.3E-13	3.1E-12	1
PCB-169	6.8E-08	7.5E-08	2.9E-14	1.5E-13	3.5E-15	4.9E-14	1
PCB-189	6.5E-07	7.0E-07	2.8E-13	1.4E-12	3.4E-14	4.6E-13	1
PCB-77	1.9E-06	2.6E-06	8.3E-13	5.2E-12	9.9E-14	1.7E-12	1
PCB-81	3.7E-07	5.1E-07	1.6E-13	1.0E-12	1.9E-14	3.3E-13	1

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyls
mg/kg-day - milligrams per kilogram per day
mg/kg - milligrams per kilogram

Estimated Human Intake for the Child Resident
New Conservation Yard RFI Site

Central Tendancy Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation of Indoor Air		Inhalation Ambient Air		Inhalation of Indoor Air$_{gw}$		Inhalation Ambient Air$_{gw}$		Domestic Groundwater Use		Plant Consumption	
	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)
Inorganic Compounds																		
Barium	1.4E-03	1.1E-04	2.3E-05	1.9E-06	2.4E-08	1.9E-09	-	-	-	-	-	-	-	-	-	-	1.2E-02	9.8E-04
Cadmium	1.1E-05	9.2E-07	1.9E-08	1.5E-09	2.0E-10	1.6E-11	-	-	-	-	-	-	-	-	-	-	6.7E-05	5.4E-06
Chromium	1.5E-04	1.2E-05	2.5E-06	2.0E-07	2.6E-09	2.1E-10	-	-	-	-	-	-	-	-	-	-	1.6E-05	1.3E-06
Copper	1.8E-04	1.5E-05	3.1E-06	2.5E-07	3.2E-09	2.6E-10	-	-	-	-	-	-	-	-	8.6E-04	6.9E-05	0.0E+00	0.0E+00
Fluoride	-	-	-	-	-	-	-	-	-	-	-	-	-	-	2.7E-02	2.1E-03	-	-
Lead	1.6E-04	1.3E-05	2.8E-06	2.2E-07	2.9E-09	2.3E-10	-	-	-	-	-	-	-	-	-	-	7.2E-05	5.7E-06
Mercury	7.8E-07	6.3E-08	1.3E-08	1.1E-09	1.4E-11	1.1E-12	-	-	-	-	-	-	-	-	-	-	7.0E-06	5.6E-07
Molybdenum	2.2E-05	1.7E-06	3.6E-07	2.9E-08	3.8E-10	3.0E-11	-	-	-	-	-	-	-	-	-	-	5.5E-05	4.4E-06
Nickel	1.4E-04	1.1E-05	2.4E-06	1.9E-07	2.5E-09	2.0E-10	-	-	-	-	-	-	-	-	-	-	1.7E-04	1.4E-05
Nitrate	-	-	-	-	-	-	-	-	-	-	-	-	-	-	6.8E-01	5.4E-02	-	-
Selenium	1.1E-05	8.5E-07	1.8E-07	1.4E-08	1.9E-10	1.5E-11	-	-	-	-	-	-	-	-	-	-	4.4E-05	3.5E-06
Silver	9.9E-05	7.9E-06	1.7E-06	1.3E-07	1.7E-09	1.4E-10	-	-	-	-	-	-	-	-	-	-	3.1E-06	2.5E-07
Thallium	-	-	-	-	-	-	-	-	-	-	-	-	-	-	2.6E-05	2.1E-06	-	-
Zinc	3.5E-03	2.8E-04	5.8E-05	4.7E-06	6.1E-08	4.9E-09	-	-	-	-	-	-	-	-	-	-	7.7E-02	6.1E-03
VOCs																		
1,1-Dichloroethane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	2.5E-04	2.0E-05	-	-
1,2-Dichloroethane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	8.6E-05	6.9E-06	-	-
Acetone	-	-	-	-	-	-	-	-	-	-	1.2E-07	9.6E-09	2.0E-12	1.6E-13	1.5E-03	1.2E-04	-	-
Benzene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	5.6E-05	4.4E-06	-	-
Carbon disulfide	-	-	-	-	-	-	-	-	-	-	-	-	-	-	2.5E-04	2.0E-05	-	-
Chloromethane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	3.1E-05	2.5E-06	-	-
cis-1,2-Dichloroethene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	4.9E-03	3.9E-04	-	-
Methylene chloride	-	-	-	-	-	-	-	-	-	-	-	-	-	-	6.1E-05	4.9E-06	-	-
Toluene	3.4E-07	2.7E-08	5.7E-08	4.6E-09	-	-	9.6E-03	7.7E-04	1.8E-04	1.5E-05	2.1E-06	1.7E-07	7.1E-08	5.7E-09	1.7E-04	1.4E-05	1.4E-04	1.1E-05
Trichloroethene	-	-	-	-	-	-	-	-	-	-	1.0E-06	8.0E-08	3.0E-08	2.4E-09	9.6E-04	7.7E-05	-	-
SVOCs																		
Benzo(a)anthracene	2.3E-07	1.9E-08	5.1E-08	4.1E-09	4.1E-12	3.3E-13	-	-	-	-	-	-	-	-	-	-	1.8E-06	1.5E-07
Benzo(a)pyrene	2.5E-07	2.0E-08	5.5E-08	4.4E-09	4.4E-12	3.6E-13	-	-	-	-	-	-	-	-	-	-	8.4E-07	6.7E-08
Benzo(b)fluoranthene	2.8E-07	2.2E-08	6.1E-08	4.8E-09	4.8E-12	3.9E-13	-	-	-	-	-	-	-	-	-	-	9.9E-07	7.9E-08
Benzo(g,h,i)perylene	2.5E-07	2.0E-08	5.4E-08	4.3E-09	4.4E-12	3.5E-13	-	-	-	-	-	-	-	-	-	-	6.7E-07	5.3E-08
Benzo(k)fluoranthene	2.3E-07	1.9E-08	5.1E-08	4.1E-09	4.1E-12	3.3E-13	-	-	-	-	-	-	-	-	-	-	1.1E-06	9.0E-08
Chrysene	2.5E-07	2.0E-08	5.5E-08	4.4E-09	4.4E-12	3.5E-13	-	-	-	-	-	-	-	-	-	-	1.8E-06	1.5E-07
Dibenz(a,h)anthracene	2.3E-07	1.8E-08	5.0E-08	4.0E-09	4.0E-12	3.2E-13	-	-	-	-	-	-	-	-	-	-	3.9E-07	3.1E-08
Fluoranthene	2.7E-07	2.2E-08	6.0E-08	4.8E-09	4.8E-12	3.8E-13	-	-	-	-	-	-	-	-	-	-	4.7E-06	3.8E-07
Indeno(1,2,3-cd)pyrene	2.6E-07	2.1E-08	5.7E-08	4.6E-09	4.6E-12	3.7E-13	-	-	-	-	-	-	-	-	-	-	2.6E-07	2.1E-08
Phenanthrene	2.3E-07	1.9E-08	5.1E-08	4.1E-09	4.1E-12	3.3E-13	-	-	-	-	-	-	-	-	-	-	8.3E-06	6.6E-07
Pyrene	2.7E-07	2.2E-08	6.0E-08	4.8E-09	4.8E-12	3.8E-13	-	-	-	-	-	-	-	-	-	-	5.3E-06	4.2E-07
Total Petroleum Hydrocarbons																		
C20-C30(Lubricant Oil Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	2.4E-03	1.9E-04	-	-

Spreadsheet C1-36 (2 of 4)

Estimated Human Intake for the Child Resident
New Conservation Yard RFI Site

Central Tendancy Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation of Indoor Air$_{\xi}$		Inhalation Ambient Air$_{\xi}$		Inhalation of Indoor Air$_{gw}$		Inhalation Ambient Air$_{gw}$		Domestic Groundwater Use		Plant Consumption	
	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)
PCDD/PCDFs																		
2,3,7,8-TCDD	3.6E-11	2.9E-12	1.8E-12	1.4E-13	6.3E-16	5.0E-17	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,7,8-PeCDD	1.0E-10	8.3E-12	5.2E-12	4.2E-13	1.8E-15	1.5E-16	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,4,7,8-HxCDD	2.6E-10	2.1E-11	1.3E-11	1.1E-12	4.6E-15	3.6E-16	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,6,7,8-HxCDD	1.3E-09	1.0E-10	6.5E-11	5.2E-12	2.2E-14	1.8E-15	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,7,8,9-HxCDD	4.6E-10	3.6E-11	2.3E-11	1.8E-12	8.0E-15	6.4E-16	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,4,6,7,8-HpCDD	3.0E-08	2.4E-09	1.5E-09	1.2E-10	5.3E-13	4.2E-14	-	-	-	-	-	-	-	-	-	-	-	-
OCDD	3.5E-07	2.8E-08	1.8E-08	1.4E-09	6.1E-12	4.9E-13	-	-	-	-	-	-	-	-	-	-	-	-
2,3,7,8-TCDF	2.0E-11	1.6E-12	1.0E-12	8.0E-14	3.5E-16	2.8E-17	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,7,8-PeCDF	2.3E-11	1.8E-12	1.2E-12	9.2E-14	4.0E-16	3.2E-17	-	-	-	-	-	-	-	-	-	-	-	-
2,3,4,7,8-PeCDF	5.6E-11	4.5E-12	2.8E-12	2.3E-13	9.8E-16	7.8E-17	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,4,7,8-HxCDF	1.7E-10	1.4E-11	8.7E-12	7.0E-13	3.0E-15	2.4E-16	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,6,7,8-HxCDF	1.3E-10	1.1E-11	6.7E-12	5.4E-13	2.3E-15	1.9E-16	-	-	-	-	-	-	-	-	-	-	-	-
2,3,4,6,7,8-HxCDF	2.8E-10	2.2E-11	1.4E-11	1.1E-12	4.8E-15	3.9E-16	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,7,8,9-HxCDF	4.4E-11	3.5E-12	2.2E-12	1.8E-13	7.7E-16	6.2E-17	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,4,6,7,8-HpCDF	4.9E-09	4.0E-10	2.5E-10	2.0E-11	8.6E-14	6.9E-15	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,4,7,8,9-HpCDF	4.6E-10	3.7E-11	2.3E-11	1.9E-12	8.1E-15	6.5E-16	-	-	-	-	-	-	-	-	-	-	-	-
OCDF	1.3E-08	1.0E-09	6.5E-10	5.2E-11	2.3E-13	1.8E-14	-	-	-	-	-	-	-	-	-	-	-	-
Total Tetra	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Total Penta	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Total Hexa	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Total Hepta	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Total Octa	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
PCDD/PCDF	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
PCBs																		
Aroclor-1254	4.5E-07	3.6E-08	1.1E-07	8.5E-09	7.9E-12	6.4E-13	-	-	-	-	-	-	-	-	-	-	1.6E-06	1.3E-07
PCB-105	9.9E-11	7.9E-12	2.3E-11	1.9E-12	1.7E-15	1.4E-16	-	-	-	-	-	-	-	-	-	-	3.5E-10	2.8E-11
PCB-114	3.6E-12	2.9E-13	8.5E-13	6.8E-14	6.3E-17	5.1E-18	-	-	-	-	-	-	-	-	-	-	1.3E-11	1.0E-12
PCB-118	2.1E-10	1.7E-11	5.0E-11	4.0E-12	3.7E-15	3.0E-16	-	-	-	-	-	-	-	-	-	-	7.5E-10	6.0E-11
PCB-123	2.4E-12	1.9E-13	5.6E-13	4.5E-14	4.2E-17	3.3E-18	-	-	-	-	-	-	-	-	-	-	8.4E-12	6.7E-13
PCB-126	6.0E-12	4.8E-13	1.4E-12	1.1E-13	1.1E-16	8.4E-18	-	-	-	-	-	-	-	-	-	-	2.1E-11	1.7E-12
PCB-156	5.0E-11	4.0E-12	1.2E-11	9.5E-13	8.8E-16	7.0E-17	-	-	-	-	-	-	-	-	-	-	1.8E-10	1.4E-11
PCB-157	1.6E-11	1.3E-12	3.8E-12	3.1E-13	2.9E-16	2.3E-17	-	-	-	-	-	-	-	-	-	-	5.7E-11	4.6E-12
PCB-167	2.8E-11	2.3E-12	6.6E-12	5.3E-13	4.9E-16	3.9E-17	-	-	-	-	-	-	-	-	-	-	9.9E-11	7.9E-12
PCB-169	4.4E-13	3.5E-14	1.0E-13	8.2E-15	7.6E-18	6.1E-19	-	-	-	-	-	-	-	-	-	-	1.5E-12	1.2E-13
PCB-189	4.2E-12	3.3E-13	9.8E-13	7.9E-14	7.3E-17	5.9E-18	-	-	-	-	-	-	-	-	-	-	1.5E-11	1.2E-12
PCB-77	1.2E-11	9.9E-13	2.9E-12	2.3E-13	2.2E-16	1.7E-17	-	-	-	-	-	-	-	-	-	-	2.5E-11	2.0E-12
PCB-81	2.4E-12	1.9E-13	5.6E-13	4.5E-14	4.2E-17	3.3E-18	-	-	-	-	-	-	-	-	-	-	4.8E-12	3.8E-13

Spreadsheet C1-36 (3 of 4)

Estimated Human Intake for the Child Resident
New Conservation Yard RFI Site

Reasonable Maximum Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation of Indoor Air$_{\xi}$		Inhalation Ambient Air$_{\xi}$		Inhalation of Indoor Air$_{gw}$		Inhalation Ambient Air$_{gw}$		Domestic Groundwater Use		Plant Consumption	
	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)
Inorganic Compounds																		
Barium	1.2E-02	9.8E-04	3.4E-04	2.7E-05	1.6E-07	1.3E-08	-	-	-	-	-	-	-	-	-	-	5.4E-02	6.3E-02
Cadmium	1.7E-04	1.4E-05	4.8E-07	3.8E-08	2.2E-09	1.8E-10	-	-	-	-	-	-	-	-	-	-	5.0E-04	5.8E-04
Chromium	5.2E-04	4.2E-05	1.5E-05	1.2E-06	6.8E-09	5.4E-10	-	-	-	-	-	-	-	-	-	-	2.9E-05	3.4E-05
Copper	1.0E-03	8.4E-05	2.9E-05	2.3E-06	1.4E-08	1.1E-09	-	-	-	-	-	-	-	-	1.4E-03	1.2E-04	0.0E+00	0.0E+00
Fluoride	-	-	-	-	-	-	-	-	-	-	-	-	-	-	4.5E-02	3.6E-03	-	-
Lead	4.5E-04	3.6E-05	1.3E-05	1.0E-06	5.9E-09	4.7E-10	-	-	-	-	-	-	-	-	-	-	9.7E-05	1.1E-04
Mercury	8.2E-06	6.6E-07	2.3E-07	1.8E-08	1.1E-10	8.6E-12	-	-	-	-	-	-	-	-	-	-	3.7E-05	4.3E-05
Molybdenum	7.7E-05	6.1E-06	2.1E-06	1.7E-07	1.0E-09	8.1E-11	-	-	-	-	-	-	-	-	-	-	9.8E-05	1.1E-04
Nickel	7.3E-04	5.8E-05	2.0E-05	1.6E-06	9.5E-09	7.6E-10	-	-	-	-	-	-	-	-	-	-	4.3E-04	5.0E-04
Nitrate	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1.1E+00	9.1E-02	-	-
Selenium	3.8E-05	3.1E-06	1.1E-06	8.6E-08	5.0E-10	4.0E-11	-	-	-	-	-	-	-	-	-	-	7.9E-05	9.3E-05
Silver	1.2E-03	9.8E-05	3.4E-05	2.8E-06	1.6E-08	1.3E-09	-	-	-	-	-	-	-	-	-	-	1.9E-05	2.2E-05
Thallium	-	-	-	-	-	-	-	-	-	-	-	-	-	-	4.3E-05	3.5E-06	-	-
Zinc	3.6E-02	2.9E-03	1.0E-03	8.0E-05	4.7E-07	3.7E-08	-	-	-	-	-	-	-	-	-	-	3.9E-01	4.6E-01
VOCs																		
1,1-Dichloroethane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	4.2E-04	3.3E-05	-	-
1,2-Dichloroethane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1.4E-04	1.2E-05	-	-
Acetone	-	-	-	-	-	-	-	-	-	-	1.8E-07	1.4E-08	2.9E-12	2.4E-13	2.6E-03	2.0E-04	-	-
Benzene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	9.3E-05	7.4E-06	-	-
Carbon disulfide	-	-	-	-	-	-	-	-	-	-	-	-	-	-	4.2E-04	3.3E-05	-	-
Chloromethane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	5.1E-05	4.1E-06	-	-
cis-1,2-Dichloroethene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	8.2E-03	6.5E-04	-	-
Methylene chloride	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1.0E-04	8.2E-06	-	-
Toluene	1.4E-06	1.1E-07	3.9E-07	3.2E-08	-	-	3.0E-02	2.4E-03	2.8E-04	2.2E-05	3.2E-06	2.6E-07	1.1E-07	8.5E-09	2.9E-04	2.3E-05	2.9E-04	3.4E-04
Trichloroethene	-	-	-	-	-	-	-	-	-	-	1.5E-06	1.2E-07	4.5E-08	3.6E-09	1.6E-03	1.3E-04	-	-
SVOCs																		
Benzo(a)anthracene	1.5E-07	1.2E-08	5.6E-08	4.5E-09	2.0E-12	1.6E-13	-	-	-	-	-	-	-	-	-	-	6.0E-07	7.0E-07
Benzo(a)pyrene	5.5E-07	4.4E-08	2.0E-07	1.6E-08	7.2E-12	5.8E-13	-	-	-	-	-	-	-	-	-	-	9.1E-07	1.1E-06
Benzo(b)fluoranthene	8.3E-07	6.6E-08	3.0E-07	2.4E-08	1.1E-11	8.7E-13	-	-	-	-	-	-	-	-	-	-	1.5E-06	1.7E-06
Benzo(g,h,i)perylene	4.0E-07	3.2E-08	1.4E-07	1.2E-08	5.2E-12	4.2E-13	-	-	-	-	-	-	-	-	-	-	5.3E-07	6.2E-07
Benzo(k)fluoranthene	1.5E-07	1.2E-08	5.6E-08	4.5E-09	2.0E-12	1.6E-13	-	-	-	-	-	-	-	-	-	-	3.7E-07	4.3E-07
Chrysene	3.5E-07	2.8E-08	1.3E-07	1.0E-08	4.5E-12	3.6E-13	-	-	-	-	-	-	-	-	-	-	1.3E-06	1.5E-06
Dibenz(a,h)anthracene	1.0E-07	8.2E-09	3.7E-08	3.0E-09	1.3E-12	1.1E-13	-	-	-	-	-	-	-	-	-	-	8.7E-08	1.0E-07
Fluoranthene	4.6E-07	3.7E-08	1.7E-07	1.3E-08	6.0E-12	4.8E-13	-	-	-	-	-	-	-	-	-	-	4.0E-06	4.7E-06
Indeno(1,2,3-cd)pyrene	6.8E-07	5.4E-08	2.5E-07	2.0E-08	8.9E-12	7.1E-13	-	-	-	-	-	-	-	-	-	-	3.4E-07	3.9E-07
Phenanthrene	1.8E-07	1.4E-08	6.5E-08	5.2E-09	2.3E-12	1.9E-13	-	-	-	-	-	-	-	-	-	-	3.2E-06	3.7E-06
Pyrene	5.5E-07	4.4E-08	2.0E-07	1.6E-08	7.2E-12	5.8E-13	-	-	-	-	-	-	-	-	-	-	5.3E-06	6.2E-06
Total Petroleum Hydrocarbons																		
C20-C30(Lubricant Oil Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	4.0E-03	3.2E-04	-	-

Estimated Human Intake for the Child Resident
New Conservation Yard RFI Site

Reasonable Maximum Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation of Indoor Air$_s$		Inhalation Ambient Air$_s$		Inhalation of Indoor Air$_{gw}$		Inhalation Ambient Air$_{gw}$		Domestic Groundwater Use		Plant Consumption	
	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)
PCDD/PCDFs																		
2,3,7,8-TCDD	4.4E-10	3.5E-11	3.7E-11	3.0E-12	5.8E-15	4.6E-16	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,7,8-PeCDD	1.2E-09	9.2E-11	9.7E-11	7.7E-12	1.5E-14	1.2E-15	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,4,7,8-HxCDD	1.3E-09	1.1E-10	1.1E-10	8.9E-12	1.7E-14	1.4E-15	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,6,7,8-HxCDD	6.8E-09	5.5E-10	5.7E-10	4.6E-11	9.0E-14	7.2E-15	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,7,8,9-HxCDD	6.0E-09	4.8E-10	5.0E-10	4.0E-11	7.9E-14	6.3E-15	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,4,6,7,8-HpCDD	1.5E-07	1.2E-08	1.3E-08	1.0E-09	2.0E-12	1.6E-13	-	-	-	-	-	-	-	-	-	-	-	-
OCDD	1.8E-06	1.4E-07	1.5E-07	1.2E-08	2.3E-11	1.8E-12	-	-	-	-	-	-	-	-	-	-	-	-
2,3,7,8-TCDF	7.3E-11	5.8E-12	6.1E-12	4.9E-13	9.6E-16	7.6E-17	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,7,8-PeCDF	1.3E-10	1.0E-11	1.1E-11	8.6E-13	1.7E-15	1.3E-16	-	-	-	-	-	-	-	-	-	-	-	-
2,3,4,7,8-PeCDF	2.2E-10	1.8E-11	1.9E-11	1.5E-12	2.9E-15	2.3E-16	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,4,7,8-HxCDF	8.0E-10	6.4E-11	6.7E-11	5.4E-12	1.1E-14	8.4E-16	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,6,7,8-HxCDF	6.2E-10	5.0E-11	5.2E-11	4.2E-12	8.2E-15	6.5E-16	-	-	-	-	-	-	-	-	-	-	-	-
2,3,4,6,7,8-HxCDF	1.4E-09	1.1E-10	1.1E-10	9.1E-12	1.8E-14	1.4E-15	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,7,8,9-HxCDF	1.8E-10	1.4E-11	1.5E-11	1.2E-12	2.4E-15	1.9E-16	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,4,6,7,8-HpCDF	2.6E-08	2.0E-09	2.1E-09	1.7E-10	3.4E-13	2.7E-14	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,4,7,8,9-HpCDF	2.3E-09	1.9E-10	2.0E-10	1.6E-11	3.1E-14	2.4E-15	-	-	-	-	-	-	-	-	-	-	-	-
OCDF	6.5E-08	5.2E-09	5.5E-09	4.4E-10	8.6E-13	6.8E-14	-	-	-	-	-	-	-	-	-	-	-	-
Total Tetra	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Total Penta	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Total Hexa	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Total Hepta	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Total Octa	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
PCDD/PCDF	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
PCBs																		
Aroclor-1254	9.1E-07	7.3E-08	3.6E-07	2.8E-08	1.2E-11	9.5E-13	-	-	-	-	-	-	-	-	-	-	1.6E-06	1.9E-06
PCB-105	2.7E-10	2.2E-11	1.1E-10	8.5E-12	3.5E-15	2.8E-16	-	-	-	-	-	-	-	-	-	-	4.7E-10	5.5E-10
PCB-114	9.9E-12	7.9E-13	3.9E-12	3.1E-13	1.3E-16	1.0E-17	-	-	-	-	-	-	-	-	-	-	1.7E-11	2.0E-11
PCB-118	5.9E-10	4.7E-11	2.3E-10	1.8E-11	7.7E-15	6.1E-16	-	-	-	-	-	-	-	-	-	-	1.0E-09	1.2E-09
PCB-123	6.5E-12	5.2E-13	2.6E-12	2.0E-13	8.6E-17	6.9E-18	-	-	-	-	-	-	-	-	-	-	1.1E-11	1.3E-11
PCB-126	1.6E-11	1.3E-12	6.4E-12	5.2E-13	2.2E-16	1.7E-17	-	-	-	-	-	-	-	-	-	-	2.9E-11	3.4E-11
PCB-156	1.4E-10	1.1E-11	5.4E-11	4.3E-12	1.8E-15	1.4E-16	-	-	-	-	-	-	-	-	-	-	2.4E-10	2.8E-10
PCB-157	3.5E-11	2.8E-12	1.4E-11	1.1E-12	4.6E-16	3.7E-17	-	-	-	-	-	-	-	-	-	-	6.1E-11	7.1E-11
PCB-167	6.0E-11	4.8E-12	2.4E-11	1.9E-12	7.9E-16	6.3E-17	-	-	-	-	-	-	-	-	-	-	1.1E-10	1.2E-10
PCB-169	9.5E-13	7.6E-14	3.7E-13	3.0E-14	1.3E-17	1.0E-18	-	-	-	-	-	-	-	-	-	-	1.7E-12	2.0E-12
PCB-189	9.0E-12	7.2E-13	3.5E-12	2.8E-13	1.2E-16	9.4E-18	-	-	-	-	-	-	-	-	-	-	1.6E-11	1.8E-11
PCB-77	3.4E-11	2.7E-12	1.3E-11	1.1E-12	4.4E-16	3.5E-17	-	-	-	-	-	-	-	-	-	-	3.4E-11	3.9E-11
PCB-81	6.5E-12	5.2E-13	2.6E-12	2.0E-13	8.6E-17	6.9E-18	-	-	-	-	-	-	-	-	-	-	6.5E-12	7.6E-12

Notes:
Inhalation Indoor Air $_s$ - Exposure associated with indoor air concentrations of COPCs modeled from soil.
Inhalation Ambient Air $_s$ - Exposure associated with ambient air concentrations of COPCs modeled from soil.
Inhalation Indoor Air $_{gw}$ - Exposure associated with indoor air concentrations of COPCs modeled from groundwater.
Inhalation Ambient Air $_{gw}$ - Exposure associated with ambient air concentrations of COPCs modeled from groundwater.
ADD - Average daily dose, as defined in the SRAM (MWH 2005).
LADD - Lifetime average daily dose, as defined in the SRAM (MWH 2005).
The chemicals presented in this table are comprehensive for all media sampled. Not all chemicals were analyzed for or detected in all media.
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyls
COPC - chemical of potential concern
"-" indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
mg/kg-day - milligrams per kilogram day

Estimated Human Intake for the Adult Resident
New Conservation Yard RFI Site

Central Tendancy Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation of Indoor Air $_s$		Inhalation Ambient Air$_s$		Inhalation of Indoor Air $_{gw}$		Inhalation Ambient Air$_{gw}$		Domestic Groundwater Use		Plant Consumption	
	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)
Inorganic Compounds																		
Barium	1.5E-04	1.8E-05	1.7E-06	2.0E-07	4.3E-09	5.2E-10	-	-	-	-	-	-	-	-	-	-	8.1E-03	9.7E-04
Cadmium	1.2E-06	1.5E-07	1.4E-09	1.7E-10	3.6E-11	4.3E-12	-	-	-	-	-	-	-	-	-	-	4.5E-05	5.4E-06
Chromium	1.6E-05	1.9E-06	1.8E-07	2.2E-08	4.6E-10	5.6E-11	-	-	-	-	-	-	-	-	-	-	1.1E-05	1.3E-06
Copper	2.0E-05	2.4E-06	2.2E-07	2.7E-08	5.8E-10	6.9E-11	-	-	-	-	-	-	-	-	2.5E-04	3.0E-05	0.0E+00	0.0E+00
Fluoride	-	-	-	-	-	-	-	-	-	-	-	-	-	-	7.7E-03	9.2E-04	-	-
Lead	1.8E-05	2.1E-06	2.0E-07	2.4E-08	5.1E-10	6.2E-11	-	-	-	-	-	-	-	-	-	-	4.8E-05	5.7E-06
Mercury	8.4E-08	1.0E-08	9.6E-10	1.1E-10	2.4E-12	2.9E-13	-	-	-	-	-	-	-	-	-	-	4.7E-06	5.6E-07
Molybdenum	2.3E-06	2.8E-07	2.6E-08	3.2E-09	6.7E-11	8.1E-12	-	-	-	-	-	-	-	-	-	-	3.6E-05	4.4E-06
Nickel	1.5E-05	1.8E-06	1.7E-07	2.1E-08	4.4E-10	5.3E-11	-	-	-	-	-	-	-	-	-	-	1.1E-04	1.3E-05
Nitrate	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1.9E-01	2.3E-02	-	-
Selenium	1.1E-06	1.4E-07	1.3E-08	1.6E-09	3.3E-11	4.0E-12	-	-	-	-	-	-	-	-	-	-	2.9E-05	3.5E-06
Silver	1.1E-05	1.3E-06	1.2E-07	1.4E-08	3.1E-10	3.7E-11	-	-	-	-	-	-	-	-	-	-	2.1E-06	2.5E-07
Thallium	-	-	-	-	-	-	-	-	-	-	-	-	-	-	7.4E-06	8.9E-07	-	-
Zinc	3.7E-04	4.5E-05	4.2E-06	5.1E-07	1.1E-08	1.3E-09	-	-	-	-	-	-	-	-	-	-	5.1E-02	6.1E-03
VOCs																		
1,1-Dichloroethane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	7.1E-05	8.5E-06	-	-
1,2-Dichloroethane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	2.5E-05	3.0E-06	-	-
Acetone	-	-	-	-	-	-	-	-	-	-	2.1E-08	2.6E-09	3.5E-13	4.2E-14	4.4E-04	5.3E-05	-	-
Benzene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1.6E-05	1.9E-06	-	-
Carbon disulfide	-	-	-	-	-	-	-	-	-	-	-	-	-	-	7.1E-05	8.5E-06	-	-
Chloromethane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	8.8E-06	1.1E-06	-	-
cis-1,2-Dichloroethene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1.4E-03	1.7E-04	-	-
Methylene chloride	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1.8E-05	2.1E-06	-	-
Toluene	3.7E-08	4.4E-09	4.2E-09	5.0E-10	-	-	1.7E-03	2.1E-04	3.3E-05	4.0E-06	3.8E-07	4.6E-08	1.3E-08	1.5E-09	4.9E-05	5.9E-06	9.3E-05	1.1E-05
Trichloroethene	-	-	-	-	-	-	-	-	-	-	1.8E-07	2.2E-08	5.4E-09	6.5E-10	2.7E-04	3.3E-05	-	-
SVOCs																		
Benzo(a)anthracene	2.5E-08	3.0E-09	3.7E-09	4.4E-10	7.3E-13	8.7E-14	-	-	-	-	-	-	-	-	-	-	1.2E-06	1.5E-07
Benzo(a)pyrene	2.7E-08	3.3E-09	4.0E-09	4.8E-10	7.9E-13	9.5E-14	-	-	-	-	-	-	-	-	-	-	5.6E-07	6.7E-08
Benzo(b)fluoranthene	3.0E-08	3.6E-09	4.4E-09	5.3E-10	8.7E-13	1.0E-13	-	-	-	-	-	-	-	-	-	-	6.6E-07	7.9E-08
Benzo(g,h,i)perylene	2.7E-08	3.2E-09	3.9E-09	4.7E-10	7.8E-13	9.3E-14	-	-	-	-	-	-	-	-	-	-	4.4E-07	5.3E-08
Benzo(k)fluoranthene	2.5E-08	3.0E-09	3.7E-09	4.4E-10	7.3E-13	8.7E-14	-	-	-	-	-	-	-	-	-	-	7.5E-07	9.0E-08
Chrysene	2.7E-08	3.2E-09	4.0E-09	4.8E-10	7.9E-13	9.5E-14	-	-	-	-	-	-	-	-	-	-	1.2E-06	1.5E-07
Dibenz(a,h)anthracene	2.5E-08	3.0E-09	3.7E-09	4.4E-10	7.2E-13	8.6E-14	-	-	-	-	-	-	-	-	-	-	2.6E-07	3.1E-08
Fluoranthene	2.9E-08	3.5E-09	4.3E-09	5.2E-10	8.5E-13	1.0E-13	-	-	-	-	-	-	-	-	-	-	3.1E-06	3.8E-07
Indeno(1,2,3-cd)pyrene	2.8E-08	3.4E-09	4.2E-09	5.0E-10	8.2E-13	9.8E-14	-	-	-	-	-	-	-	-	-	-	1.7E-07	2.1E-08
Phenanthrene	2.5E-08	3.0E-09	3.7E-09	4.5E-10	7.3E-13	8.8E-14	-	-	-	-	-	-	-	-	-	-	5.5E-06	6.6E-07
Pyrene	2.9E-08	3.5E-09	4.3E-09	5.2E-10	8.5E-13	1.0E-13	-	-	-	-	-	-	-	-	-	-	3.5E-06	4.2E-07

Estimated Human Intake for the Adult Resident
New Conservation Yard RFI Site

Central Tendancy Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation of Indoor Air $_s$		Inhalation Ambient Air$_s$		Inhalation of Indoor Air $_{gw}$		Inhalation Ambient Air$_{gw}$		Domestic Groundwater Use		Plant Consumption	
	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)
Total Petroleum Hydrocarbons																		
C20-C30(Lubricant Oil Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	6.8E-04	8.2E-05	-	-
							-	-	-	-	-	-	-	-				
PCDD/PCDFs							-	-	-	-	-	-	-	-				
2,3,7,8-TCDD	3.9E-12	4.6E-13	1.3E-13	1.6E-14	1.1E-16	1.3E-17	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,7,8-PeCDD	1.1E-11	1.3E-12	3.8E-13	4.6E-14	3.3E-16	3.9E-17	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,4,7,8-HxCDD	2.8E-11	3.3E-12	9.5E-13	1.1E-13	8.1E-16	9.8E-17	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,6,7,8-HxCDD	1.4E-10	1.7E-11	4.7E-12	5.7E-13	4.0E-15	4.8E-16	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,7,8,9-HxCDD	4.9E-11	5.9E-12	1.7E-12	2.0E-13	1.4E-15	1.7E-16	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,4,6,7,8-HpCDD	3.2E-09	3.9E-10	1.1E-10	1.3E-11	9.4E-14	1.1E-14	-	-	-	-	-	-	-	-	-	-	-	-
OCDD	3.7E-08	4.5E-09	1.3E-09	1.5E-10	1.1E-12	1.3E-13	-	-	-	-	-	-	-	-	-	-	-	-
2,3,7,8-TCDF	2.1E-12	2.6E-13	7.3E-14	8.7E-15	6.2E-17	7.5E-18	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,7,8-PeCDF	2.5E-12	2.9E-13	8.4E-14	1.0E-14	7.2E-17	8.6E-18	-	-	-	-	-	-	-	-	-	-	-	-
2,3,4,7,8-PeCDF	6.0E-12	7.2E-13	2.1E-13	2.5E-14	1.8E-16	2.1E-17	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,4,7,8-HxCDF	1.9E-11	2.2E-12	6.3E-13	7.6E-14	5.4E-16	6.5E-17	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,6,7,8-HxCDF	1.4E-11	1.7E-12	4.9E-13	5.9E-14	4.2E-16	5.0E-17	-	-	-	-	-	-	-	-	-	-	-	-
2,3,4,6,7,8-HxCDF	3.0E-11	3.5E-12	1.0E-12	1.2E-13	8.6E-16	1.0E-16	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,7,8,9-HxCDF	4.7E-12	5.7E-13	1.6E-13	1.9E-14	1.4E-16	1.7E-17	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,4,6,7,8-HpCDF	5.3E-10	6.3E-11	1.8E-11	2.2E-12	1.5E-14	1.9E-15	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,4,7,8,9-HpCDF	5.0E-11	6.0E-12	1.7E-12	2.0E-13	1.5E-15	1.7E-16	-	-	-	-	-	-	-	-	-	-	-	-
OCDF	1.4E-09	1.7E-10	4.7E-11	5.7E-12	4.1E-14	4.9E-15	-	-	-	-	-	-	-	-	-	-	-	-
Total Tetra	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Total Penta	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Total Hexa	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Total Hepta	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Total Octa	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
PCDD/PCDF	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
PCBs																		
Aroclor-1254	4.9E-08	5.8E-09	7.8E-09	9.3E-10	1.4E-12	1.7E-13	-	-	-	-	-	-	-	-	-	-	1.1E-06	1.3E-07
PCB-105	1.1E-11	1.3E-12	1.7E-12	2.0E-13	3.1E-16	3.7E-17	-	-	-	-	-	-	-	-	-	-	2.3E-10	2.8E-11
PCB-114	3.9E-13	4.7E-14	6.2E-14	7.4E-15	1.1E-17	1.4E-18	-	-	-	-	-	-	-	-	-	-	8.4E-12	1.0E-12
PCB-118	2.3E-11	2.8E-12	3.7E-12	4.4E-13	6.7E-16	8.0E-17	-	-	-	-	-	-	-	-	-	-	5.0E-10	6.0E-11
PCB-123	2.6E-13	3.1E-14	4.1E-14	4.9E-15	7.5E-18	9.0E-19	-	-	-	-	-	-	-	-	-	-	5.6E-12	6.7E-13
PCB-126	6.4E-13	7.7E-14	1.0E-13	1.2E-14	1.9E-17	2.3E-18	-	-	-	-	-	-	-	-	-	-	1.4E-11	1.7E-12
PCB-156	5.4E-12	6.5E-13	8.6E-13	1.0E-13	1.6E-16	1.9E-17	-	-	-	-	-	-	-	-	-	-	1.2E-10	1.4E-11
PCB-157	1.8E-12	2.1E-13	2.8E-13	3.4E-14	5.1E-17	6.1E-18	-	-	-	-	-	-	-	-	-	-	3.8E-11	4.6E-12
PCB-167	3.0E-12	3.6E-13	4.8E-13	5.8E-14	8.8E-17	1.1E-17	-	-	-	-	-	-	-	-	-	-	6.6E-11	7.9E-12
PCB-169	4.7E-14	5.6E-15	7.5E-15	8.9E-16	1.4E-18	1.6E-19	-	-	-	-	-	-	-	-	-	-	1.0E-12	1.2E-13
PCB-189	4.5E-13	5.4E-14	7.1E-14	8.6E-15	1.3E-17	1.6E-18	-	-	-	-	-	-	-	-	-	-	9.7E-12	1.2E-12
PCB-77	1.3E-12	1.6E-13	2.1E-13	2.5E-14	3.9E-17	4.6E-18	-	-	-	-	-	-	-	-	-	-	1.6E-11	2.0E-12
PCB-81	2.6E-13	3.1E-14	4.1E-14	4.9E-15	7.5E-18	9.0E-19	-	-	-	-	-	-	-	-	-	-	3.2E-12	3.8E-13

Estimated Human Intake for the Adult Resident
New Conservation Yard RFI Site

Reasonable Maximum Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation of Indoor Air$_s$		Inhalation Ambient Air$_s$		Inhalation of Indoor Air$_{gw}$		Inhalation Ambient Air$_{gw}$		Domestic Grounder Use		Plant Consumption	
	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)
Inorganic Compounds																		
Barium	1.3E-03	4.2E-04	5.2E-05	1.7E-05	5.4E-08	1.7E-08	-	-	-	-	-	-	-	-	-	-	3.6E-02	2.3E-01
Cadmium	1.8E-05	5.8E-06	7.3E-08	2.3E-08	7.5E-10	2.4E-10	-	-	-	-	-	-	-	-	-	-	3.3E-04	2.1E-03
Chromium	5.6E-05	1.8E-05	2.2E-06	7.1E-07	2.3E-09	7.3E-10	-	-	-	-	-	-	-	-	-	-	1.9E-05	1.2E-04
Copper	1.1E-04	3.6E-05	4.5E-06	1.4E-06	4.6E-09	1.5E-09	-	-	-	-	-	-	-	-	3.8E-04	1.2E-04	0.0E+00	0.0E+00
Fluoride	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1.2E-02	3.8E-03	-	-
Lead	4.8E-05	1.5E-05	1.9E-06	6.1E-07	2.0E-09	6.3E-10	-	-	-	-	-	-	-	-	-	-	6.5E-05	4.1E-04
Mercury	8.8E-07	2.8E-07	3.5E-08	1.1E-08	3.6E-11	1.2E-11	-	-	-	-	-	-	-	-	-	-	2.5E-05	1.6E-04
Molybdenum	8.2E-06	2.6E-06	3.3E-07	1.0E-07	3.4E-10	1.1E-10	-	-	-	-	-	-	-	-	-	-	6.5E-05	4.1E-04
Nickel	7.8E-05	2.5E-05	3.1E-06	9.9E-07	3.2E-09	1.0E-09	-	-	-	-	-	-	-	-	-	-	2.9E-04	1.8E-03
Nitrate	-	-	-	-	-	-	-	-	-	-	-	-	-	-	3.0E-01	9.6E-02	-	-
Selenium	4.1E-06	1.3E-06	1.6E-07	5.2E-08	1.7E-10	5.4E-11	-	-	-	-	-	-	-	-	-	-	5.3E-05	3.4E-04
Silver	1.3E-04	4.2E-05	5.2E-06	1.7E-06	5.4E-09	1.7E-09	-	-	-	-	-	-	-	-	-	-	1.3E-05	8.1E-05
Thallium	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1.1E-05	3.6E-06	-	-
Zinc	3.8E-03	1.2E-03	1.5E-04	4.9E-05	1.6E-07	5.0E-08	-	-	-	-	-	-	-	-	-	-	2.6E-01	1.7E+00
VOCs																		
1,1-Dichloroethane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1.1E-04	3.5E-05	-	-
1,2-Dichloroethane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	3.8E-05	1.2E-05	-	-
Acetone	-	-	-	-	-	-	-	-	-	-	6.0E-08	1.9E-08	9.9E-13	3.2E-13	6.8E-04	2.2E-04	-	-
Benzene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	2.4E-05	7.8E-06	-	-
Carbon disulfide	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1.1E-04	3.5E-05	-	-
Chloromethane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1.4E-05	4.3E-06	-	-
cis-1,2-Dichloroethene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	2.2E-03	6.9E-04	-	-
Methylene chloride	-	-	-	-	-	-	-	-	-	-	-	-	-	-	2.7E-05	8.6E-06	-	-
Toluene	1.5E-07	4.8E-08	6.0E-08	1.9E-08	-	-	1.0E-02	3.2E-03	9.3E-05	3.0E-05	1.1E-06	3.5E-07	3.6E-08	1.1E-08	7.6E-05	2.4E-05	1.9E-04	1.2E-03
Trichloroethene	-	-	-	-	-	-	-	-	-	-	5.1E-07	1.6E-07	1.5E-08	4.9E-09	4.2E-04	1.4E-04	-	-
SVOCs																		
Benzo(a)anthracene	1.6E-08	5.3E-09	8.5E-09	2.7E-09	6.8E-13	2.2E-13	-	-	-	-	-	-	-	-	-	-	4.0E-07	2.5E-06
Benzo(a)pyrene	5.9E-08	1.9E-08	3.1E-08	9.8E-09	2.4E-12	7.8E-13	-	-	-	-	-	-	-	-	-	-	6.0E-07	3.8E-06
Benzo(b)fluoranthene	8.9E-08	2.8E-08	4.6E-08	1.5E-08	3.7E-12	1.2E-12	-	-	-	-	-	-	-	-	-	-	9.9E-07	6.3E-06
Benzo(g,h,i)perylene	4.2E-08	1.4E-08	2.2E-08	7.0E-09	1.8E-12	5.6E-13	-	-	-	-	-	-	-	-	-	-	3.5E-07	2.2E-06
Benzo(k)fluoranthene	1.6E-08	5.3E-09	8.5E-09	2.7E-09	6.8E-13	2.2E-13	-	-	-	-	-	-	-	-	-	-	2.5E-07	1.6E-06
Chrysene	3.7E-08	1.2E-08	1.9E-08	6.1E-09	1.5E-12	4.9E-13	-	-	-	-	-	-	-	-	-	-	8.3E-07	5.3E-06
Dibenz(a,h)anthracene	1.1E-08	3.5E-09	5.7E-09	1.8E-09	4.5E-13	1.4E-13	-	-	-	-	-	-	-	-	-	-	5.8E-08	3.7E-07
Fluoranthene	4.9E-08	1.6E-08	2.6E-08	8.2E-09	2.0E-12	6.5E-13	-	-	-	-	-	-	-	-	-	-	2.6E-06	1.7E-05
Indeno(1,2,3-cd)pyrene	7.3E-08	2.3E-08	3.8E-08	1.2E-08	3.0E-12	9.6E-13	-	-	-	-	-	-	-	-	-	-	2.2E-07	1.4E-06
Phenanthrene	1.9E-08	6.1E-09	9.9E-09	3.2E-09	7.9E-13	2.5E-13	-	-	-	-	-	-	-	-	-	-	2.1E-06	1.3E-05
Pyrene	5.9E-08	1.9E-08	3.1E-08	9.8E-09	2.4E-12	7.8E-13	-	-	-	-	-	-	-	-	-	-	3.5E-06	2.3E-05
Total Petroleum Hydrocarbons																		
C20-C30(Lubricant Oil Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1.1E-03	3.4E-04	-	-

Estimated Human Intake for the Adult Resident
New Conservation Yard RFI Site

Reasonable Maximum Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation of Indoor Air $_s$		Inhalation Ambient Air$_s$		Inhalation of Indoor Air $_{gw}$		Inhalation Ambient Air$_{gw}$		Domestic Grounder Use		Plant Consumption	
	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)
PCDD/PCDFs																		
2,3,7,8-TCDD	4.7E-11	1.5E-11	5.6E-12	1.8E-12	1.9E-15	6.2E-16	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,7,8-PeCDD	1.2E-10	3.9E-11	1.5E-11	4.7E-12	5.1E-15	1.6E-15	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,4,7,8-HxCDD	1.4E-10	4.6E-11	1.7E-11	5.5E-12	5.9E-15	1.9E-15	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,6,7,8-HxCDD	7.3E-10	2.3E-10	8.8E-11	2.8E-11	3.0E-14	9.7E-15	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,7,8,9-HxCDD	6.4E-10	2.1E-10	7.7E-11	2.5E-11	2.7E-14	8.5E-15	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,4,6,7,8-HpCDD	1.6E-08	5.2E-09	2.0E-09	6.3E-10	6.7E-13	2.2E-13	-	-	-	-	-	-	-	-	-	-	-	-
OCDD	1.9E-07	6.0E-08	2.3E-08	7.2E-09	7.8E-12	2.5E-12	-	-	-	-	-	-	-	-	-	-	-	-
2,3,7,8-TCDF	7.8E-12	2.5E-12	9.3E-13	3.0E-13	3.2E-16	1.0E-16	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,7,8-PeCDF	1.4E-11	4.4E-12	1.6E-12	5.2E-13	5.7E-16	1.8E-16	-	-	-	-	-	-	-	-	-	-	-	-
2,3,4,7,8-PeCDF	2.4E-11	7.6E-12	2.8E-12	9.1E-13	9.8E-16	3.1E-16	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,4,7,8-HxCDF	8.6E-11	2.8E-11	1.0E-11	3.3E-12	3.5E-15	1.1E-15	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,6,7,8-HxCDF	6.7E-11	2.1E-11	8.0E-12	2.6E-12	2.8E-15	8.8E-16	-	-	-	-	-	-	-	-	-	-	-	-
2,3,4,6,7,8-HxCDF	1.5E-10	4.7E-11	1.7E-11	5.6E-12	6.0E-15	1.9E-15	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,7,8,9-HxCDF	1.9E-11	6.2E-12	2.3E-12	7.4E-13	8.0E-16	2.6E-16	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,4,6,7,8-HpCDF	2.7E-09	8.8E-10	3.3E-10	1.0E-10	1.1E-13	3.6E-14	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,4,7,8,9-HpCDF	2.5E-10	8.0E-11	3.0E-11	9.6E-12	1.0E-14	3.3E-15	-	-	-	-	-	-	-	-	-	-	-	-
OCDF	7.0E-09	2.2E-09	8.4E-10	2.7E-10	2.9E-13	9.2E-14	-	-	-	-	-	-	-	-	-	-	-	-
PCBs																		
Aroclor-1254	9.7E-08	3.1E-08	5.4E-08	1.7E-08	4.0E-12	1.3E-12	-	-	-	-	-	-	-	-	-	-	1.1E-06	6.7E-06
PCB-105	2.9E-11	9.3E-12	1.6E-11	5.2E-12	1.2E-15	3.8E-16	-	-	-	-	-	-	-	-	-	-	3.1E-10	2.0E-09
PCB-114	1.1E-12	3.4E-13	5.9E-13	1.9E-13	4.4E-17	1.4E-17	-	-	-	-	-	-	-	-	-	-	1.2E-11	7.3E-11
PCB-118	6.3E-11	2.0E-11	3.5E-11	1.1E-11	2.6E-15	8.3E-16	-	-	-	-	-	-	-	-	-	-	6.8E-10	4.3E-09
PCB-123	7.0E-13	2.2E-13	3.9E-13	1.3E-13	2.9E-17	9.2E-18	-	-	-	-	-	-	-	-	-	-	7.6E-12	4.8E-11
PCB-126	1.8E-12	5.6E-13	9.8E-13	3.1E-13	7.3E-17	2.3E-17	-	-	-	-	-	-	-	-	-	-	1.9E-11	1.2E-10
PCB-156	1.5E-11	4.7E-12	8.2E-12	2.6E-12	6.1E-16	1.9E-16	-	-	-	-	-	-	-	-	-	-	1.6E-10	1.0E-09
PCB-157	3.7E-12	1.2E-12	2.1E-12	6.7E-13	1.5E-16	4.9E-17	-	-	-	-	-	-	-	-	-	-	4.1E-11	2.6E-10
PCB-167	6.5E-12	2.1E-12	3.6E-12	1.2E-12	2.7E-16	8.5E-17	-	-	-	-	-	-	-	-	-	-	7.0E-11	4.5E-10
PCB-169	1.0E-13	3.3E-14	5.7E-14	1.8E-14	4.2E-18	1.3E-18	-	-	-	-	-	-	-	-	-	-	1.1E-12	7.1E-12
PCB-189	9.6E-13	3.1E-13	5.4E-13	1.7E-13	4.0E-17	1.3E-17	-	-	-	-	-	-	-	-	-	-	1.0E-11	6.6E-11
PCB-77	3.6E-12	1.2E-12	2.0E-12	6.5E-13	1.5E-16	4.8E-17	-	-	-	-	-	-	-	-	-	-	2.2E-11	1.4E-10
PCB-81	7.0E-13	2.2E-13	3.9E-13	1.3E-13	2.9E-17	9.2E-18	-	-	-	-	-	-	-	-	-	-	4.3E-12	2.8E-11

Estimated Human Intake for the Adult Resident
New Conservation Yard RFI Site

Notes:

Inhalation Indoor Air_s - Exposure associated with indoor air concentrations of COPCs modeled from soil.
Inhalation Ambient Air_s - Exposure associated with ambient air concentrations of COPCs modeled from soil.
Inhalation Indoor Air_{gw} - Exposure associated with indoor air concentrations of COPCs modeled from groundwater.
Inhalation Ambient Air_{gw} - Exposure associated with ambient air concentrations of COPCs modeled from groundwater.
ADD - Average daily dose, as defined in the SRAM (MWH 2005).
LADD - Lifetime average daily dose, as defined in the SRAM (MWH 2005).
The chemicals presented in this table are comprehensive for all media sampled. Not all chemicals were analyzed for or detected in all media.
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyls
COPC - chemical of potential concern
"-" indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
mg/kg-day - milligrams per kilogram day

Estimated Human Intake for the Child Recreator
New Conservation Yard RFI Site

Central Tendancy Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation Ambient Air_s		Inhalation Ambient Air_{gw}	
	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)
Inorganic Compounds										
Barium	-	-	-	-	-	-	-	-	-	-
Cadmium	1.6E-06	1.3E-07	2.8E-09	2.2E-10	3.0E-11	2.4E-12	-	-	-	-
Chromium	-	-	-	-	-	-	-	-	-	-
Copper	2.6E-05	2.1E-06	4.4E-07	3.5E-08	4.8E-10	3.9E-11	-	-	-	-
Lead	2.3E-05	1.9E-06	3.9E-07	3.2E-08	4.3E-10	3.4E-11	-	-	-	-
Mercury	1.1E-07	8.9E-09	1.9E-09	1.5E-10	2.0E-12	1.6E-13	-	-	-	-
Molybdenum	3.1E-06	2.5E-07	5.2E-08	4.1E-09	5.6E-11	4.5E-12	-	-	-	-
Nickel	2.0E-05	1.6E-06	3.4E-07	2.7E-08	3.7E-10	3.0E-11	-	-	-	-
Nitrate	-	-	-	-	-	-	-	-	-	-
Selenium	1.5E-06	1.2E-07	2.6E-08	2.0E-09	2.8E-11	2.2E-12	-	-	-	-
Silver	1.4E-05	1.1E-06	2.4E-07	1.9E-08	2.6E-10	2.1E-11	-	-	-	-
Thallium	-	-	-	-	-	-	-	-	-	-
Zinc	5.0E-04	4.0E-05	8.3E-06	6.7E-07	9.1E-09	7.3E-10	-	-	-	-
Energetic Constituents										
VOCs										
1,1-Dichloroethane	-	-	-	-	-	-	-	-	-	-
1,2-Dichloroethane	-	-	-	-	-	-	-	-	-	-
Acetone	-	-	-	-	-	-	-	-	2.9E-13	2.3E-14
Benzene	-	-	-	-	-	-	-	-	-	-
Carbon disulfide	-	-	-	-	-	-	-	-	-	-
Chloromethane	-	-	-	-	-	-	-	-	-	-
cis-1,2-Dichloroethene	-	-	-	-	-	-	-	-	-	-
Methylene chloride	-	-	-	-	-	-	-	-	-	-
Toluene	4.9E-08	3.9E-09	8.2E-09	6.5E-10	-	-	2.8E-05	2.2E-06	1.1E-08	8.5E-10
Trichloroethene	-	-	-	-	-	-	-	-	4.5E-09	3.6E-10
SVOCs										
Benzo(a)anthracene	3.3E-08	2.7E-09	7.3E-09	5.8E-10	6.1E-13	4.9E-14	-	-	-	-
Benzo(a)pyrene	3.6E-08	2.9E-09	7.9E-09	6.3E-10	6.6E-13	5.3E-14	-	-	-	-
Benzo(b)fluoranthene	4.0E-08	3.2E-09	8.6E-09	6.9E-10	7.3E-13	5.8E-14	-	-	-	-
Benzo(g,h,i)perylene	3.6E-08	2.8E-09	7.8E-09	6.2E-10	6.5E-13	5.2E-14	-	-	-	-
Benzo(k)fluoranthene	3.3E-08	2.7E-09	7.3E-09	5.8E-10	6.1E-13	4.9E-14	-	-	-	-
Chrysene	3.6E-08	2.9E-09	7.9E-09	6.3E-10	6.6E-13	5.3E-14	-	-	-	-
Dibenz(a,h)anthracene	3.3E-08	2.6E-09	7.2E-09	5.7E-10	6.0E-13	4.8E-14	-	-	-	-
Fluoranthene	3.9E-08	3.1E-09	8.5E-09	6.8E-10	7.2E-13	5.7E-14	-	-	-	-
Indeno(1,2,3-cd)pyrene	3.7E-08	3.0E-09	8.2E-09	6.5E-10	6.9E-13	5.5E-14	-	-	-	-
Phenanthrene	3.3E-08	2.7E-09	7.3E-09	5.9E-10	6.1E-13	4.9E-14	-	-	-	-
Pyrene	3.9E-08	3.1E-09	8.5E-09	6.8E-10	7.2E-13	5.7E-14	-	-	-	-
Total Petroleum Hydrocarbons										
C20-C30(Lubricant Oil Range)	-	-	-	-	-	-	-	-	-	-

Estimated Human Intake for the Child Recreator
New Conservation Yard RFI Site

Central Tendancy Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation of Indoor Air		Inhalation Ambient Air_{s-gw}	
	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)
PCDD/PCDFs										
2,3,7,8-TCDD	5.1E-12	4.1E-13	2.6E-13	2.1E-14	9.4E-17	7.5E-18	-	-	-	-
1,2,3,7,8-PeCDD	1.5E-11	1.2E-12	7.5E-13	6.0E-14	2.7E-16	2.2E-17	-	-	-	-
1,2,3,4,7,8-HxCDD	3.7E-11	3.0E-12	1.9E-12	1.5E-13	6.8E-16	5.5E-17	-	-	-	-
1,2,3,6,7,8-HxCDD	1.8E-10	1.5E-11	9.3E-12	7.4E-13	3.4E-15	2.7E-16	-	-	-	-
1,2,3,7,8,9-HxCDD	6.5E-11	5.2E-12	3.3E-12	2.6E-13	1.2E-15	9.5E-17	-	-	-	-
1,2,3,4,6,7,8-HpCDD	4.3E-09	3.4E-10	2.2E-10	1.7E-11	7.9E-14	6.3E-15	-	-	-	-
OCDD	5.0E-08	4.0E-09	2.5E-09	2.0E-10	9.1E-13	7.3E-14	-	-	-	-
2,3,7,8-TCDF	2.8E-12	2.3E-13	1.4E-13	1.1E-14	5.2E-17	4.2E-18	-	-	-	-
1,2,3,7,8-PeCDF	3.3E-12	2.6E-13	1.6E-13	1.3E-14	6.0E-17	4.8E-18	-	-	-	-
2,3,4,7,8-PeCDF	8.0E-12	6.4E-13	4.0E-13	3.2E-14	1.5E-16	1.2E-17	-	-	-	-
1,2,3,4,7,8-HxCDF	2.5E-11	2.0E-12	1.2E-12	1.0E-13	4.5E-16	3.6E-17	-	-	-	-
1,2,3,6,7,8-HxCDF	1.9E-11	1.5E-12	9.6E-13	7.7E-14	3.5E-16	2.8E-17	-	-	-	-
2,3,4,6,7,8-HxCDF	3.9E-11	3.2E-12	2.0E-12	1.6E-13	7.2E-16	5.8E-17	-	-	-	-
1,2,3,7,8,9-HxCDF	6.3E-12	5.0E-13	3.2E-13	2.5E-14	1.2E-16	9.2E-18	-	-	-	-
1,2,3,4,6,7,8-HpCDF	7.1E-10	5.6E-11	3.6E-11	2.8E-12	1.3E-14	1.0E-15	-	-	-	-
1,2,3,4,7,8,9-HpCDF	6.6E-11	5.3E-12	3.3E-12	2.7E-13	1.2E-15	9.7E-17	-	-	-	-
OCDF	1.8E-09	1.5E-10	9.3E-11	7.5E-12	3.4E-14	2.7E-15	-	-	-	-
PCBs										
Aroclor-1254	6.5E-08	5.2E-09	1.5E-08	1.2E-09	1.2E-12	9.5E-14	-	-	-	-
Aroclor-1260	-	-	-	-	-	-	-	-	-	-
PCB-105	1.4E-11	1.1E-12	3.3E-12	2.7E-13	2.6E-16	2.1E-17	-	-	-	-
PCB-114	5.2E-13	4.1E-14	1.2E-13	9.7E-15	9.5E-18	7.6E-19	-	-	-	-
PCB-118	3.1E-11	2.4E-12	7.2E-12	5.8E-13	5.6E-16	4.5E-17	-	-	-	-
PCB-123	3.4E-13	2.7E-14	8.0E-14	6.4E-15	6.3E-18	5.0E-19	-	-	-	-
PCB-126	8.6E-13	6.9E-14	2.0E-13	1.6E-14	1.6E-17	1.3E-18	-	-	-	-
PCB-156	7.2E-12	5.7E-13	1.7E-12	1.4E-13	1.3E-16	1.1E-17	-	-	-	-
PCB-157	2.3E-12	1.9E-13	5.5E-13	4.4E-14	4.3E-17	3.4E-18	-	-	-	-
PCB-167	4.0E-12	3.2E-13	9.5E-13	7.6E-14	7.4E-17	5.9E-18	-	-	-	-
PCB-169	6.2E-14	5.0E-15	1.5E-14	1.2E-15	1.1E-18	9.1E-20	-	-	-	-
PCB-189	6.0E-13	4.8E-14	1.4E-13	1.1E-14	1.1E-17	8.8E-19	-	-	-	-
PCB-77	1.8E-12	1.4E-13	4.2E-13	3.3E-14	3.2E-17	2.6E-18	-	-	-	-
PCB-81	3.4E-13	2.7E-14	8.0E-14	6.4E-15	6.3E-18	5.0E-19	-	-	-	-

Estimated Human Intake for the Child Recreator
New Conservation Yard RFI Site

Reasonable Maximum Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation of Indoor Air		Inhalation Ambient Air_{s-gw}	
	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)
Inorganic Compounds										
Barium	3.5E-03	2.8E-04	9.8E-05	7.8E-06	6.4E-08	5.1E-09	-	-	-	-
Cadmium	4.9E-05	3.9E-06	1.4E-07	1.1E-08	8.9E-10	7.1E-11	-	-	-	-
Chromium	1.5E-04	1.2E-05	4.2E-06	3.3E-07	2.7E-09	2.2E-10	-	-	-	-
Copper	3.0E-04	2.4E-05	8.4E-06	6.7E-07	5.5E-09	4.4E-10	-	-	-	-
Lead	1.3E-04	1.0E-05	3.6E-06	2.9E-07	2.3E-09	1.9E-10	-	-	-	-
Mercury	2.4E-06	1.9E-07	6.6E-08	5.3E-09	4.3E-11	3.5E-12	-	-	-	-
Molybdenum	2.2E-05	1.8E-06	6.1E-07	4.9E-08	4.0E-10	3.2E-11	-	-	-	-
Nickel	2.1E-04	1.7E-05	5.8E-06	4.6E-07	3.8E-09	3.0E-10	-	-	-	-
Nitrate	-	-	-	-	-	-	-	-	-	-
Selenium	1.1E-05	8.8E-07	3.1E-07	2.5E-08	2.0E-10	1.6E-11	-	-	-	-
Silver	3.5E-04	2.8E-05	9.8E-06	7.9E-07	6.4E-09	5.1E-10	-	-	-	-
Thallium	-	-	-	-	-	-	-	-	-	-
Zinc	1.0E-02	8.1E-04	2.9E-04	2.3E-05	1.9E-07	1.5E-08	-	-	-	-
VOCs										
1,1-Dichloroethane	-	-	-	-	-	-	-	-	-	-
1,2-Dichloroethane	-	-	-	-	-	-	-	-	-	-
Acetone	-	-	-	-	-	-	-	-	1.2E-12	9.4E-14
Benzene	-	-	-	-	-	-	-	-	-	-
Carbon disulfide	-	-	-	-	-	-	-	-	-	-
Chloromethane	-	-	-	-	-	-	-	-	-	-
cis-1,2-Dichloroethene	-	-	-	-	-	-	-	-	-	-
Methylene chloride	-	-	-	-	-	-	-	-	-	-
Toluene	4.0E-07	3.2E-08	1.1E-07	9.0E-09	-	-	1.1E-04	8.9E-06	4.2E-08	3.4E-09
Trichloroethene	-	-	-	-	-	-	-	-	1.8E-08	1.4E-09
SVOCs										
Benzo(a)anthracene	4.4E-08	3.5E-09	1.6E-08	1.3E-09	8.0E-13	6.4E-14	-	-	-	-
Benzo(a)pyrene	1.6E-07	1.3E-08	5.7E-08	4.6E-09	2.9E-12	2.3E-13	-	-	-	-
Benzo(b)fluoranthene	2.4E-07	1.9E-08	8.6E-08	6.9E-09	4.4E-12	3.5E-13	-	-	-	-
Benzo(g,h,i)perylene	1.1E-07	9.1E-09	4.1E-08	3.3E-09	2.1E-12	1.7E-13	-	-	-	-
Benzo(k)fluoranthene	4.4E-08	3.5E-09	1.6E-08	1.3E-09	8.0E-13	6.4E-14	-	-	-	-
Chrysene	9.9E-08	7.9E-09	3.6E-08	2.9E-09	1.8E-12	1.4E-13	-	-	-	-
Dibenz(a,h)anthracene	2.9E-08	2.3E-09	1.1E-08	8.5E-10	5.4E-13	4.3E-14	-	-	-	-
Fluoranthene	1.3E-07	1.1E-08	4.8E-08	3.8E-09	2.4E-12	1.9E-13	-	-	-	-
Indeno(1,2,3-cd)pyrene	1.9E-07	1.5E-08	7.0E-08	5.6E-09	3.5E-12	2.8E-13	-	-	-	-
Phenanthrene	5.1E-08	4.1E-09	1.9E-08	1.5E-09	9.4E-13	7.5E-14	-	-	-	-
Pyrene	1.6E-07	1.3E-08	5.7E-08	4.6E-09	2.9E-12	2.3E-13	-	-	-	-
Total Petroleum Hydrocarbons										
C20-C30(Lubricant Oil Range)	-	-	-	-	-	-	-	-	-	-

Estimated Human Intake for the Child Recreator
New Conservation Yard RFI Site

Reasonable Maximum Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation of Indoor Air		Inhalation Ambient Air_{s-gw}	
	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)
PCDD/PCDFs										
2,3,7,8-TCDD	1.3E-10	1.0E-11	1.1E-11	8.5E-13	2.3E-15	1.8E-16	-	-	-	-
1,2,3,7,8-PeCDD	3.3E-10	2.6E-11	2.8E-11	2.2E-12	6.0E-15	4.8E-16	-	-	-	-
1,2,3,4,7,8-HxCDD	3.8E-10	3.0E-11	3.2E-11	2.6E-12	7.0E-15	5.6E-16	-	-	-	-
1,2,3,6,7,8-HxCDD	2.0E-09	1.6E-10	1.6E-10	1.3E-11	3.6E-14	2.9E-15	-	-	-	-
1,2,3,7,8,9-HxCDD	1.7E-09	1.4E-10	1.4E-10	1.2E-11	3.1E-14	2.5E-15	-	-	-	-
1,2,3,4,6,7,8-HpCDD	4.4E-08	3.5E-09	3.7E-09	2.9E-10	8.0E-13	6.4E-14	-	-	-	-
OCDD	5.0E-07	4.0E-08	4.2E-08	3.4E-09	9.2E-12	7.4E-13	-	-	-	-
2,3,7,8-TCDF	2.1E-11	1.7E-12	1.7E-12	1.4E-13	3.8E-16	3.0E-17	-	-	-	-
1,2,3,7,8-PeCDF	3.7E-11	2.9E-12	3.1E-12	2.5E-13	6.7E-16	5.4E-17	-	-	-	-
2,3,4,7,8-PeCDF	6.3E-11	5.1E-12	5.3E-12	4.3E-13	1.2E-15	9.3E-17	-	-	-	-
1,2,3,4,7,8-HxCDF	2.3E-10	1.8E-11	1.9E-11	1.5E-12	4.2E-15	3.4E-16	-	-	-	-
1,2,3,6,7,8-HxCDF	1.8E-10	1.4E-11	1.5E-11	1.2E-12	3.3E-15	2.6E-16	-	-	-	-
2,3,4,6,7,8-HxCDF	3.9E-10	3.1E-11	3.3E-11	2.6E-12	7.1E-15	5.7E-16	-	-	-	-
1,2,3,7,8,9-HxCDF	5.2E-11	4.1E-12	4.3E-12	3.5E-13	9.5E-16	7.6E-17	-	-	-	-
1,2,3,4,6,7,8-HpCDF	7.3E-09	5.8E-10	6.1E-10	4.9E-11	1.3E-13	1.1E-14	-	-	-	-
1,2,3,4,7,8,9-HpCDF	6.7E-10	5.3E-11	5.6E-11	4.5E-12	1.2E-14	9.8E-16	-	-	-	-
OCDF	1.9E-08	1.5E-09	1.6E-09	1.3E-10	3.4E-13	2.7E-14	-	-	-	-
PCBs										
Aroclor-1254	2.6E-07	2.1E-08	1.0E-07	8.1E-09	4.8E-12	3.8E-13	-	-	-	-
Aroclor-1260	-	-	-	-	-	-	-	-	-	-
PCB-105	7.7E-11	6.2E-12	3.0E-11	2.4E-12	1.4E-15	1.1E-16	-	-	-	-
PCB-114	2.8E-12	2.3E-13	1.1E-12	8.9E-14	5.2E-17	4.2E-18	-	-	-	-
PCB-118	1.7E-10	1.3E-11	6.6E-11	5.2E-12	3.1E-15	2.5E-16	-	-	-	-
PCB-123	1.9E-12	1.5E-13	7.3E-13	5.9E-14	3.4E-17	2.7E-18	-	-	-	-
PCB-126	4.7E-12	3.8E-13	1.8E-12	1.5E-13	8.6E-17	6.9E-18	-	-	-	-
PCB-156	3.9E-11	3.1E-12	1.5E-11	1.2E-12	7.2E-16	5.8E-17	-	-	-	-
PCB-157	1.0E-11	8.0E-13	3.9E-12	3.1E-13	1.8E-16	1.5E-17	-	-	-	-
PCB-167	1.7E-11	1.4E-12	6.8E-12	5.4E-13	3.2E-16	2.5E-17	-	-	-	-
PCB-169	2.7E-13	2.2E-14	1.1E-13	8.5E-15	5.0E-18	4.0E-19	-	-	-	-
PCB-189	2.6E-12	2.0E-13	1.0E-12	8.0E-14	4.7E-17	3.8E-18	-	-	-	-
PCB-77	9.7E-12	7.7E-13	3.8E-12	3.0E-13	1.8E-16	1.4E-17	-	-	-	-
PCB-81	1.9E-12	1.5E-13	7.3E-13	5.9E-14	3.4E-17	2.7E-18	-	-	-	-

Notes:
Inhalation Ambient Air_s - Exposure associated with ambient air concentrations of COPCs modeled from soil.
Inhalation Ambient Air_{gw} - Exposure associated with ambient air concentrations of COPCs modeled from groundwater.
ADD - Average daily dose, as defined in the SRAM (MWH 2005).
LADD - Lifetime average daily dose, as defined in the SRAM (MWH 2005).
The chemicals presented in this table are comprehensive for all media sampled. Not all chemicals were analyzed for or detected in all media.
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyls
COPC - chemical of potential concern
"-" indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
mg/kg-day - milligrams per kilogram per day

Estimated Human Intake for the Adult Recreator
New Conservation Yard RFI Site

Central Tendancy Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation Ambient Air_s		Inhalation Ambient Air_{gw}	
	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)
Inorganic Compounds										
Barium	1.1E-05	1.3E-06	1.2E-07	1.5E-08	4.6E-10	5.5E-11	-	-	-	-
Cadmium	8.8E-08	1.1E-08	1.0E-10	1.2E-11	3.8E-12	4.6E-13	-	-	-	-
Chromium	1.1E-06	1.4E-07	1.3E-08	1.6E-09	4.9E-11	5.9E-12	-	-	-	-
Copper	1.4E-06	1.7E-07	1.6E-08	1.9E-09	6.1E-11	7.3E-12	-	-	-	-
Lead	1.3E-06	1.5E-07	1.4E-08	1.7E-09	5.4E-11	6.5E-12	-	-	-	-
Mercury	6.0E-09	7.2E-10	6.8E-11	8.2E-12	2.6E-13	3.1E-14	-	-	-	-
Molybdenum	1.6E-07	2.0E-08	1.9E-09	2.3E-10	7.1E-12	8.6E-13	-	-	-	-
Nickel	1.1E-06	1.3E-07	1.2E-08	1.5E-09	4.7E-11	5.7E-12	-	-	-	-
Nitrate	-	-	-	-	-	-	-	-	-	-
Selenium	8.1E-08	9.8E-09	9.3E-10	1.1E-10	3.5E-12	4.2E-13	-	-	-	-
Silver	7.6E-07	9.1E-08	8.6E-09	1.0E-09	3.3E-11	3.9E-12	-	-	-	-
Thallium	-	-	-	-	-	-	-	-	-	-
Zinc	2.7E-05	3.2E-06	3.0E-07	3.6E-08	-	-	-	-	-	-
VOCs										
1,1-Dichloroethane	-	-	-	-	-	-	-	-	-	-
1,2-Dichloroethane	-	-	-	-	-	-	-	-	-	-
Acetone	-	-	-	-	-	-	-	-	3.7E-14	4.5E-15
Benzene	-	-	-	-	-	-	-	-	-	-
Chloromethane	-	-	-	-	-	-	-	-	-	-
cis-1,2-Dichloroethene	-	-	-	-	-	-	-	-	-	-
Methylene chloride	-	-	-	-	-	-	-	-	-	-
Toluene	2.6E-09	3.1E-10	3.0E-10	3.6E-11	-	-	3.5E-06	4.2E-07	1.3E-09	1.6E-10
Trichloroethene	-	-	-	-	-	-	-	-	5.7E-10	6.8E-11
SVOCs										
Benzo(a)anthracene	1.8E-09	2.1E-10	2.6E-10	3.2E-11	7.7E-14	9.3E-15	-	-	-	-
Benzo(a)pyrene	1.9E-09	2.3E-10	2.9E-10	3.5E-11	8.4E-14	1.0E-14	-	-	-	-
Benzo(b)fluoranthene	2.1E-09	2.5E-10	3.1E-10	3.8E-11	9.2E-14	1.1E-14	-	-	-	-
Benzo(g,h,i)perylene	1.9E-09	2.3E-10	2.8E-10	3.4E-11	8.2E-14	9.9E-15	-	-	-	-
Benzo(k)fluoranthene	1.8E-09	2.1E-10	2.6E-10	3.2E-11	7.7E-14	9.3E-15	-	-	-	-
Chrysene	1.9E-09	2.3E-10	2.9E-10	3.4E-11	8.4E-14	1.0E-14	-	-	-	-
Dibenz(a,h)anthracene	1.8E-09	2.1E-10	2.6E-10	3.1E-11	7.6E-14	9.2E-15	-	-	-	-
Fluoranthene	2.1E-09	2.5E-10	3.1E-10	3.7E-11	9.1E-14	1.1E-14	-	-	-	-
Indeno(1,2,3-cd)pyrene	2.0E-09	2.4E-10	3.0E-10	3.6E-11	8.7E-14	1.0E-14	-	-	-	-
Phenanthrene	1.8E-09	2.2E-10	2.7E-10	3.2E-11	7.8E-14	9.3E-15	-	-	-	-
Pyrene	2.1E-09	2.5E-10	3.1E-10	3.7E-11	9.1E-14	1.1E-14	-	-	-	-
Total Petroleum Hydrocarbons										
C20-C30(Lubricant Oil Range)	-	-	-	-	-	-	-	-	-	-

Estimated Human Intake for the Adult Recreator
New Conservation Yard RFI Site

Central Tendancy Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation Ambient Air_s		Inhalation Ambient Air_{gw}	
	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)
PCDD/PCDFs										
2,3,7,8-TCDD	2.8E-13	3.3E-14	9.4E-15	1.1E-15	1.2E-17	1.4E-18	-	-	-	-
1,2,3,7,8-PeCDD	8.0E-13	9.6E-14	2.7E-14	3.3E-15	3.5E-17	4.1E-18	-	-	-	-
1,2,3,4,7,8-HxCDD	2.0E-12	2.4E-13	6.8E-14	8.2E-15	8.6E-17	1.0E-17	-	-	-	-
1,2,3,6,7,8-HxCDD	9.8E-12	1.2E-12	3.4E-13	4.0E-14	4.3E-16	5.1E-17	-	-	-	-
1,2,3,7,8,9-HxCDD	3.5E-12	4.2E-13	1.2E-13	1.4E-14	1.5E-16	1.8E-17	-	-	-	-
1,2,3,4,6,7,8-HpCDD	2.3E-10	2.8E-11	7.9E-12	9.4E-13	1.0E-14	1.2E-15	-	-	-	-
OCDD	2.7E-09	3.2E-10	9.1E-11	1.1E-11	1.2E-13	1.4E-14	-	-	-	-
2,3,7,8-TCDF	1.5E-13	1.8E-14	5.2E-15	6.2E-16	6.6E-18	7.9E-19	-	-	-	-
1,2,3,7,8-PeCDF	1.8E-13	2.1E-14	6.0E-15	7.2E-16	7.6E-18	9.1E-19	-	-	-	-
2,3,4,7,8-PeCDF	4.3E-13	5.1E-14	1.5E-14	1.8E-15	1.9E-17	2.2E-18	-	-	-	-
1,2,3,4,7,8-HxCDF	1.3E-12	1.6E-13	4.5E-14	5.4E-15	5.7E-17	6.9E-18	-	-	-	-
1,2,3,6,7,8-HxCDF	1.0E-12	1.2E-13	3.5E-14	4.2E-15	4.4E-17	5.3E-18	-	-	-	-
2,3,4,6,7,8-HxCDF	2.1E-12	2.5E-13	7.2E-14	8.7E-15	9.2E-17	1.1E-17	-	-	-	-
1,2,3,7,8,9-HxCDF	3.4E-13	4.0E-14	1.2E-14	1.4E-15	1.5E-17	1.8E-18	-	-	-	-
1,2,3,4,6,7,8-HpCDF	3.8E-11	4.5E-12	1.3E-12	1.6E-13	1.6E-15	2.0E-16	-	-	-	-
1,2,3,4,7,8,9-HpCDF	3.5E-12	4.3E-13	1.2E-13	1.5E-14	1.5E-16	1.8E-17	-	-	-	-
OCDF	9.9E-11	1.2E-11	3.4E-12	4.1E-13	4.3E-15	5.2E-16	-	-	-	-
PCBs										
Aroclor-1254	3.5E-09	4.2E-10	5.5E-10	6.7E-11	1.5E-13	1.8E-14	-	-	-	-
PCB-105	7.6E-13	9.1E-14	1.2E-13	1.4E-14	3.3E-17	3.9E-18	-	-	-	-
PCB-114	2.8E-14	3.3E-15	4.4E-15	5.3E-16	1.2E-18	1.4E-19	-	-	-	-
PCB-118	1.6E-12	2.0E-13	2.6E-13	3.1E-14	7.1E-17	8.5E-18	-	-	-	-
PCB-123	1.8E-14	2.2E-15	2.9E-15	3.5E-16	7.9E-19	9.5E-20	-	-	-	-
PCB-126	4.6E-14	5.5E-15	7.3E-15	8.8E-16	2.0E-18	2.4E-19	-	-	-	-
PCB-156	3.8E-13	4.6E-14	6.1E-14	7.4E-15	1.7E-17	2.0E-18	-	-	-	-
PCB-157	1.3E-13	1.5E-14	2.0E-14	2.4E-15	5.4E-18	6.5E-19	-	-	-	-
PCB-167	2.2E-13	2.6E-14	3.4E-14	4.1E-15	9.4E-18	1.1E-18	-	-	-	-
PCB-169	3.3E-15	4.0E-16	5.3E-16	6.4E-17	1.4E-19	1.7E-20	-	-	-	-
PCB-189	3.2E-14	3.8E-15	5.1E-15	6.1E-16	1.4E-18	1.7E-19	-	-	-	-
PCB-77	9.5E-14	1.1E-14	1.5E-14	1.8E-15	4.1E-18	4.9E-19	-	-	-	-
PCB-81	1.8E-14	2.2E-15	2.9E-15	3.5E-16	7.9E-19	9.5E-20	-	-	-	-

Estimated Human Intake for the Adult Recreator
New Conservation Yard RFI Site

Reasonable Maximum Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation Ambient Air_s		Inhalation Ambient Air_{gw}	
	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)
Inorganic Compounds										
Barium	1.9E-04	6.0E-05	9.6E-05	3.1E-05	4.1E-09	1.3E-09	-	-	-	-
Cadmium	2.6E-06	8.3E-07	1.3E-07	4.3E-08	5.6E-11	1.8E-11	-	-	-	-
Chromium	7.9E-06	2.5E-06	4.1E-06	1.3E-06	1.7E-10	5.5E-11	-	-	-	-
Copper	1.6E-05	5.1E-06	8.2E-06	2.6E-06	3.5E-10	1.1E-10	-	-	-	-
Lead	6.8E-06	2.2E-06	3.5E-06	1.1E-06	1.5E-10	4.7E-11	-	-	-	-
Mercury	1.3E-07	4.0E-08	6.5E-08	2.1E-08	2.7E-12	8.7E-13	-	-	-	-
Molybdenum	1.2E-06	3.8E-07	6.0E-07	1.9E-07	2.5E-11	8.1E-12	-	-	-	-
Nickel	1.1E-05	3.6E-06	5.7E-06	1.8E-06	2.4E-10	7.7E-11	-	-	-	-
Nitrate	-	-	-	-	-	-	-	-	-	-
Selenium	5.9E-07	1.9E-07	3.0E-07	9.6E-08	1.3E-11	4.1E-12	-	-	-	-
Silver	1.9E-05	6.0E-06	9.6E-06	3.1E-06	4.1E-10	1.3E-10	-	-	-	-
Thallium	-	-	-	-	-	-	-	-	-	-
Zinc	5.5E-04	1.7E-04	2.8E-04	9.0E-05	-	-	-	-	-	-
VOCs										
1,1-Dichloroethane	-	-	-	-	-	-	-	-	-	-
1,2-Dichloroethane	-	-	-	-	-	-	-	-	-	-
Acetone	-	-	-	-	-	-	-	-	7.4E-14	2.4E-14
Benzene	-	-	-	-	-	-	-	-	-	-
Carbon disulfide	-	-	-	-	-	-	-	-	-	-
Chloromethane	-	-	-	-	-	-	-	-	-	-
cis-1,2-Dichloroethene	-	-	-	-	-	-	-	-	-	-
Methylene chloride	-	-	-	-	-	-	-	-	-	-
Toluene	2.2E-08	6.9E-09	1.1E-07	3.5E-08	-	-	7.0E-06	2.2E-06	2.7E-09	8.6E-10
Trichloroethene	-	-	-	-	-	-	-	-	1.1E-09	3.6E-10
SVOCs										
Benzo(a)anthracene	2.3E-09	7.5E-10	1.6E-08	5.0E-09	5.1E-14	1.6E-14	-	-	-	-
Benzo(a)pyrene	8.4E-09	2.7E-09	5.6E-08	1.8E-08	1.8E-13	5.8E-14	-	-	-	-
Benzo(b)fluoranthene	1.3E-08	4.1E-09	8.5E-08	2.7E-08	2.8E-13	8.8E-14	-	-	-	-
Benzo(g,h,i)perylene	6.1E-09	1.9E-09	4.0E-08	1.3E-08	1.3E-13	4.2E-14	-	-	-	-
Benzo(k)fluoranthene	2.3E-09	7.5E-10	1.6E-08	5.0E-09	5.1E-14	1.6E-14	-	-	-	-
Chrysene	5.3E-09	1.7E-09	3.5E-08	1.1E-08	1.1E-13	3.7E-14	-	-	-	-
Dibenz(a,h)anthracene	1.6E-09	5.0E-10	1.0E-08	3.3E-09	3.4E-14	1.1E-14	-	-	-	-
Fluoranthene	7.0E-09	2.3E-09	4.7E-08	1.5E-08	1.5E-13	4.9E-14	-	-	-	-
Indeno(1,2,3-cd)pyrene	1.0E-08	3.3E-09	6.9E-08	2.2E-08	2.2E-13	7.2E-14	-	-	-	-
Phenanthrene	2.7E-09	8.8E-10	1.8E-08	5.8E-09	5.9E-14	1.9E-14	-	-	-	-
Pyrene	8.4E-09	2.7E-09	5.6E-08	1.8E-08	1.8E-13	5.8E-14	-	-	-	-
Total Petroleum Hydrocarbons										
C20-C30(Lubricant Oil Range)	-	-	-	-	-	-	-	-	-	-

Estimated Human Intake for the Adult Recreator
New Conservation Yard RFI Site

Reasonable Maximum Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation Ambient Air_s		Inhalation Ambient Air_{gw}	
	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)
PCDD/PCDFs										
2,3,7,8-TCDD	6.7E-12	2.2E-12	1.0E-11	3.3E-12	1.5E-16	4.7E-17	-	-	-	-
1,2,3,7,8-PeCDD	1.8E-11	5.6E-12	2.7E-11	8.7E-12	3.8E-16	1.2E-16	-	-	-	-
1,2,3,4,7,8-HxCDD	2.0E-11	6.5E-12	3.1E-11	1.0E-11	4.4E-16	1.4E-16	-	-	-	-
1,2,3,6,7,8-HxCDD	1.0E-10	3.4E-11	1.6E-10	5.2E-11	2.3E-15	7.3E-16	-	-	-	-
1,2,3,7,8,9-HxCDD	9.2E-11	2.9E-11	1.4E-10	4.5E-11	2.0E-15	6.4E-16	-	-	-	-
1,2,3,4,6,7,8-HpCDD	2.3E-09	7.5E-10	3.6E-09	1.1E-09	5.1E-14	1.6E-14	-	-	-	-
OCDD	2.7E-08	8.6E-09	4.1E-08	1.3E-08	5.8E-13	1.9E-13	-	-	-	-
2,3,7,8-TCDF	1.1E-12	3.6E-13	1.7E-12	5.5E-13	2.4E-17	7.7E-18	-	-	-	-
1,2,3,7,8-PeCDF	2.0E-12	6.3E-13	3.0E-12	9.6E-13	4.2E-17	1.4E-17	-	-	-	-
2,3,4,7,8-PeCDF	3.4E-12	1.1E-12	5.2E-12	1.7E-12	7.3E-17	2.4E-17	-	-	-	-
1,2,3,4,7,8-HxCDF	1.2E-11	3.9E-12	1.9E-11	6.1E-12	2.7E-16	8.5E-17	-	-	-	-
1,2,3,6,7,8-HxCDF	9.5E-12	3.1E-12	1.5E-11	4.7E-12	2.1E-16	6.6E-17	-	-	-	-
2,3,4,6,7,8-HxCDF	2.1E-11	6.7E-12	3.2E-11	1.0E-11	4.5E-16	1.4E-16	-	-	-	-
1,2,3,7,8,9-HxCDF	2.8E-12	8.8E-13	4.3E-12	1.4E-12	6.0E-17	1.9E-17	-	-	-	-
1,2,3,4,6,7,8-HpCDF	3.9E-10	1.3E-10	6.0E-10	1.9E-10	8.5E-15	2.7E-15	-	-	-	-
1,2,3,4,7,8,9-HpCDF	3.6E-11	1.1E-11	5.5E-11	1.8E-11	7.7E-16	2.5E-16	-	-	-	-
OCDF	1.0E-09	3.2E-10	1.5E-09	4.9E-10	2.2E-14	6.9E-15	-	-	-	-
PCBs										
Aroclor-1254	1.4E-08	4.4E-09	1.0E-07	3.2E-08	3.0E-13	9.6E-14	-	-	-	-
Aroclor-1260	-	-	-	-	-	-	-	-	-	-
Aroclor-1262	-	-	-	-	-	-	-	-	-	-
PCB-105	4.1E-12	1.3E-12	3.0E-11	9.5E-12	9.0E-17	2.9E-17	-	-	-	-
PCB-114	1.5E-13	4.9E-14	1.1E-12	3.5E-13	3.3E-18	1.1E-18	-	-	-	-
PCB-118	9.0E-12	2.9E-12	6.4E-11	2.1E-11	1.9E-16	6.2E-17	-	-	-	-
PCB-123	1.0E-13	3.2E-14	7.2E-13	2.3E-13	2.2E-18	6.9E-19	-	-	-	-
PCB-126	2.5E-13	8.1E-14	1.8E-12	5.8E-13	5.5E-18	1.7E-18	-	-	-	-
PCB-156	2.1E-12	6.7E-13	1.5E-11	4.8E-12	4.6E-17	1.5E-17	-	-	-	-
PCB-157	5.3E-13	1.7E-13	3.8E-12	1.2E-12	1.2E-17	3.7E-18	-	-	-	-
PCB-167	9.2E-13	3.0E-13	6.6E-12	2.1E-12	2.0E-17	6.4E-18	-	-	-	-
PCB-169	1.5E-14	4.7E-15	1.0E-13	3.4E-14	3.2E-19	1.0E-19	-	-	-	-
PCB-189	1.4E-13	4.4E-14	9.8E-13	3.2E-13	3.0E-18	9.5E-19	-	-	-	-
PCB-77	5.2E-13	1.7E-13	3.7E-12	1.2E-12	1.1E-17	3.6E-18	-	-	-	-
PCB-81	1.0E-13	3.2E-14	7.2E-13	2.3E-13	2.2E-18	6.9E-19	-	-	-	-

Notes:
Inhalation Ambient Air_s - Exposure associated with ambient air concentrations of COPCs modeled from soil.
Inhalation Ambient Air_{gw} - Exposure associated with ambient air concentrations of COPCs modeled from groundwater.
ADD - Average daily dose, as defined in the SRAM (MWH 2005).
LADD - Lifetime average daily dose, as defined in the SRAM (MWH 2005).
The chemicals presented in this table are comprehensive for all media sampled. Not all chemicals were analyzed for or detected in all media.
VOC - volatile organic compound

Estimated Human Intake for the Adult Recreator
New Conservation Yard RFI Site

SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyls
COPC - chemical of potential concern
"-" indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
mg/kg-day - milligrams per kilogram per day

Estimated Human Intake for the Adult Worker
New Conservation Yard RFI Site

Central Tendancy Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation of Indoor Air$_s$		Inhalation Ambient Air$_s$		Inhalation of Indoor Air$_{gw}$		Inhalation Ambient Air$_{gw}$	
	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)
Inorganic Compounds														
Barium	9.3E-05	1.1E-05	9.3E-07	1.1E-07	4.0E-09	4.8E-10	-	-	-	-	-	-	-	-
Cadmium	7.7E-07	9.3E-08	7.7E-10	9.3E-11	3.3E-11	4.0E-12	-	-	-	-	-	-	-	-
Chromium	1.0E-05	1.2E-06	1.0E-07	1.2E-08	4.3E-10	5.2E-11	-	-	-	-	-	-	-	-
Copper	1.2E-05	1.5E-06	1.2E-07	1.5E-08	5.3E-10	6.4E-11	-	-	-	-	-	-	-	-
Lead	1.1E-05	1.3E-06	1.1E-07	1.3E-08	4.8E-10	5.7E-11	-	-	-	-	-	-	-	-
Mercury	5.2E-08	6.3E-09	5.2E-10	6.3E-11	2.3E-12	2.7E-13	-	-	-	-	-	-	-	-
Molybdenum	1.4E-06	1.7E-07	1.4E-08	1.7E-09	6.2E-11	7.5E-12	-	-	-	-	-	-	-	-
Nickel	9.5E-06	1.1E-06	9.5E-08	1.1E-08	4.1E-10	5.0E-11	-	-	-	-	-	-	-	-
Nitrate	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Selenium	7.1E-07	8.6E-08	7.1E-09	8.6E-10	3.1E-11	3.7E-12	-	-	-	-	-	-	-	-
Silver	6.6E-06	8.0E-07	6.6E-08	8.0E-09	2.9E-10	3.4E-11	-	-	-	-	-	-	-	-
Thallium	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Zinc	2.3E-04	2.8E-05	2.3E-06	2.8E-07	1.0E-08	1.2E-09	-	-	-	-	-	-	-	-
VOCs														
1,1-Dichloroethane	-	-	-	-	-	-	-	-	-	-	-	-	-	-
1,2-Dichloroethane	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Acetone	-	-	-	-	-	-	-	-	-	-	6.4E-09	7.6E-10	3.3E-13	3.9E-14
Benzene	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Chloromethane	-	-	-	-	-	-	-	-	-	-	-	-	-	-
cis-1,2-Dichloroethene	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Methylene chloride	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Toluene	2.3E-08	2.7E-09	2.3E-09	2.7E-10	-	-	5.3E-04	6.4E-05	3.1E-05	3.7E-06	1.1E-07	1.4E-08	1.2E-08	1.4E-09
Trichloroethene	-	-	-	-	-	-	-	-	-	-	5.3E-08	6.4E-09	5.0E-09	6.0E-10
SVOCs														
Benzo(a)anthracene	1.6E-08	1.9E-09	2.0E-09	2.4E-10	6.8E-13	8.1E-14	-	-	-	-	-	-	-	-
Benzo(a)pyrene	1.7E-08	2.0E-09	2.2E-09	2.7E-10	7.4E-13	8.8E-14	-	-	-	-	-	-	-	-
Benzo(b)fluoranthene	1.9E-08	2.2E-09	2.4E-09	2.9E-10	8.0E-13	9.7E-14	-	-	-	-	-	-	-	-
Benzo(g,h,i)perylene	1.7E-08	2.0E-09	2.2E-09	2.6E-10	7.2E-13	8.7E-14	-	-	-	-	-	-	-	-
Benzo(k)fluoranthene	1.6E-08	1.9E-09	2.0E-09	2.4E-10	6.8E-13	8.1E-14	-	-	-	-	-	-	-	-
Chrysene	1.7E-08	2.0E-09	2.2E-09	2.6E-10	7.3E-13	8.8E-14	-	-	-	-	-	-	-	-
Dibenz(a,h)anthracene	1.5E-08	1.9E-09	2.0E-09	2.4E-10	6.7E-13	8.0E-14	-	-	-	-	-	-	-	-
Fluoranthene	1.8E-08	2.2E-09	2.4E-09	2.9E-10	7.9E-13	9.5E-14	-	-	-	-	-	-	-	-
Indeno(1,2,3-cd)pyrene	1.8E-08	2.1E-09	2.3E-09	2.7E-10	7.6E-13	9.1E-14	-	-	-	-	-	-	-	-
Phenanthrene	1.6E-08	1.9E-09	2.0E-09	2.5E-10	6.8E-13	8.2E-14	-	-	-	-	-	-	-	-
Pyrene	1.8E-08	2.2E-09	2.4E-09	2.9E-10	7.9E-13	9.5E-14	-	-	-	-	-	-	-	-
Total Petroleum Hydrocarbons														
C20-C30(Lubricant Oil Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-

Spreadsheet C1-32 (2 of 4)

Estimated Human Intake for the Adult Worker
New Conservation Yard RFI Site

Central Tendancy Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation of Indoor Air$_s$		Inhalation Ambient Air$_s$		Inhalation of Indoor Air$_{gw}$		Inhalation Ambient Air$_{gw}$	
	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)
PCDD/PCDFs														
2,3,7,8-TCDD	2.4E-12	2.9E-13	7.2E-14	8.7E-15	1.0E-16	1.3E-17	-	-	-	-	-	-	-	-
1,2,3,7,8-PeCDD	7.0E-12	8.4E-13	2.1E-13	2.5E-14	3.0E-16	3.6E-17	-	-	-	-	-	-	-	-
1,2,3,4,7,8-HxCDD	1.7E-11	2.1E-12	5.2E-13	6.3E-14	7.6E-16	9.1E-17	-	-	-	-	-	-	-	-
1,2,3,6,7,8-HxCDD	8.6E-11	1.0E-11	2.6E-12	3.1E-13	3.7E-15	4.5E-16	-	-	-	-	-	-	-	-
1,2,3,7,8,9-HxCDD	3.1E-11	3.7E-12	9.2E-13	1.1E-13	1.3E-15	1.6E-16	-	-	-	-	-	-	-	-
1,2,3,4,6,7,8-HpCDD	2.0E-09	2.4E-10	6.0E-11	7.3E-12	8.7E-14	1.0E-14	-	-	-	-	-	-	-	-
OCDD	2.3E-08	2.8E-09	7.0E-10	8.4E-11	1.0E-12	1.2E-13	-	-	-	-	-	-	-	-
2,3,7,8-TCDF	1.3E-12	1.6E-13	4.0E-14	4.8E-15	5.8E-17	6.9E-18	-	-	-	-	-	-	-	-
1,2,3,7,8-PeCDF	1.5E-12	1.8E-13	4.6E-14	5.5E-15	6.6E-17	8.0E-18	-	-	-	-	-	-	-	-
2,3,4,7,8-PeCDF	3.8E-12	4.5E-13	1.1E-13	1.4E-14	1.6E-16	2.0E-17	-	-	-	-	-	-	-	-
1,2,3,4,7,8-HxCDF	1.2E-11	1.4E-12	3.5E-13	4.2E-14	5.0E-16	6.0E-17	-	-	-	-	-	-	-	-
1,2,3,6,7,8-HxCDF	9.0E-12	1.1E-12	2.7E-13	3.2E-14	3.9E-16	4.7E-17	-	-	-	-	-	-	-	-
2,3,4,6,7,8-HxCDF	1.9E-11	2.2E-12	5.6E-13	6.7E-14	8.0E-16	9.6E-17	-	-	-	-	-	-	-	-
1,2,3,7,8,9-HxCDF	3.0E-12	3.5E-13	8.9E-14	1.1E-14	1.3E-16	1.5E-17	-	-	-	-	-	-	-	-
1,2,3,4,6,7,8-HpCDF	3.3E-10	4.0E-11	9.9E-12	1.2E-12	1.4E-14	1.7E-15	-	-	-	-	-	-	-	-
1,2,3,4,7,8,9-HpCDF	3.1E-11	3.7E-12	9.3E-13	1.1E-13	1.3E-15	1.6E-16	-	-	-	-	-	-	-	-
OCDF	8.7E-10	1.0E-10	2.6E-11	3.1E-12	3.8E-14	4.5E-15	-	-	-	-	-	-	-	-
PCBs														
Aroclor-1254	3.0E-08	3.7E-09	4.3E-09	5.1E-10	1.3E-12	1.6E-13	-	-	-	-	-	-	-	-
PCB-105	6.6E-12	8.0E-13	9.3E-13	1.1E-13	2.9E-16	3.4E-17	-	-	-	-	-	-	-	-
PCB-114	2.4E-13	2.9E-14	3.4E-14	4.1E-15	1.1E-17	1.3E-18	-	-	-	-	-	-	-	-
PCB-118	1.4E-11	1.7E-12	2.0E-12	2.4E-13	6.2E-16	7.5E-17	-	-	-	-	-	-	-	-
PCB-123	1.6E-13	1.9E-14	2.2E-14	2.7E-15	6.9E-18	8.3E-19	-	-	-	-	-	-	-	-
PCB-126	4.0E-13	4.8E-14	5.6E-14	6.8E-15	1.7E-17	2.1E-18	-	-	-	-	-	-	-	-
PCB-156	3.4E-12	4.0E-13	4.7E-13	5.7E-14	1.5E-16	1.8E-17	-	-	-	-	-	-	-	-
PCB-157	1.1E-12	1.3E-13	1.5E-13	1.8E-14	4.7E-17	5.7E-18	-	-	-	-	-	-	-	-
PCB-167	1.9E-12	2.3E-13	2.6E-13	3.2E-14	8.2E-17	9.8E-18	-	-	-	-	-	-	-	-
PCB-169	2.9E-14	3.5E-15	4.1E-15	4.9E-16	1.3E-18	1.5E-19	-	-	-	-	-	-	-	-
PCB-189	2.8E-13	3.4E-14	3.9E-14	4.7E-15	1.2E-17	1.5E-18	-	-	-	-	-	-	-	-
PCB-77	8.3E-13	9.9E-14	1.2E-13	1.4E-14	3.6E-17	4.3E-18	-	-	-	-	-	-	-	-
PCB-81	1.6E-13	1.9E-14	2.2E-14	2.7E-15	6.9E-18	8.3E-19	-	-	-	-	-	-	-	-

Spreadsheet C1-32 (3 of 4)

Estimated Human Intake for the Adult Worker
New Conservation Yard RFI Site

Reasonable Maximum Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation of Indoor Air_s		Inhalation Ambient Air_s		Inhalation of Indoor Air_{gw}		Inhalation Ambient Air_{gw}	
	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)
Inorganic Compounds														
Barium	1.9E-03	6.3E-04	4.7E-05	1.6E-05	4.7E-08	1.6E-08	-	-	-	-	-	-	-	-
Cadmium	2.6E-05	8.7E-06	6.5E-08	2.2E-08	6.5E-10	2.2E-10	-	-	-	-	-	-	-	-
Chromium	7.9E-05	2.6E-05	2.0E-06	6.6E-07	2.0E-09	6.6E-10	-	-	-	-	-	-	-	-
Copper	1.6E-04	5.3E-05	4.0E-06	1.3E-06	4.0E-09	1.3E-09	-	-	-	-	-	-	-	-
Lead	6.8E-05	2.3E-05	1.7E-06	5.7E-07	1.7E-09	5.7E-10	-	-	-	-	-	-	-	-
Mercury	1.3E-06	4.2E-07	3.2E-08	1.1E-08	3.2E-11	1.1E-11	-	-	-	-	-	-	-	-
Molybdenum	1.2E-05	3.9E-06	2.9E-07	9.8E-08	2.9E-10	9.8E-11	-	-	-	-	-	-	-	-
Nickel	1.1E-04	3.7E-05	2.8E-06	9.3E-07	2.8E-09	9.3E-10	-	-	-	-	-	-	-	-
Nitrate	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Selenium	5.9E-06	2.0E-06	1.5E-07	4.9E-08	1.5E-10	4.9E-11	-	-	-	-	-	-	-	-
Silver	1.9E-04	6.3E-05	4.7E-06	1.6E-06	4.7E-09	1.6E-09	-	-	-	-	-	-	-	-
Thallium	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Zinc	5.5E-03	1.8E-03	1.4E-04	4.5E-05	1.4E-07	4.5E-08	-	-	-	-	-	-	-	-
VOCs														
1,1-Dichloroethane	-	-	-	-	-	-	-	-	-	-	-	-	-	-
1,2-Dichloroethane	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Acetone	-	-	-	-	-	-	-	-	-	-	1.7E-08	5.6E-09	8.6E-13	2.9E-13
Benzene	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Carbon disulfide	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Chloromethane	-	-	-	-	-	-	-	-	-	-	-	-	-	-
cis-1,2-Dichloroethene	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Methylene chloride	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Toluene	2.2E-07	7.2E-08	5.4E-08	1.8E-08	-	-	2.9E-03	9.7E-04	8.1E-05	2.7E-05	3.0E-07	1.0E-07	3.1E-08	1.0E-08
Trichloroethene	-	-	-	-	-	-	-	-	-	-	1.4E-07	4.7E-08	1.3E-08	4.4E-09
SVOCs														
Benzo(a)anthracene	2.3E-08	7.8E-09	7.6E-09	2.5E-09	5.9E-13	2.0E-13	-	-	-	-	-	-	-	-
Benzo(a)pyrene	8.4E-08	2.8E-08	2.7E-08	9.1E-09	2.1E-12	7.0E-13	-	-	-	-	-	-	-	-
Benzo(b)fluoranthene	1.3E-07	4.2E-08	4.1E-08	1.4E-08	3.2E-12	1.1E-12	-	-	-	-	-	-	-	-
Benzo(g,h,i)perylene	6.1E-08	2.0E-08	2.0E-08	6.6E-09	1.5E-12	5.1E-13	-	-	-	-	-	-	-	-
Benzo(k)fluoranthene	2.3E-08	7.8E-09	7.6E-09	2.5E-09	5.9E-13	2.0E-13	-	-	-	-	-	-	-	-
Chrysene	5.3E-08	1.8E-08	1.7E-08	5.7E-09	1.3E-12	4.4E-13	-	-	-	-	-	-	-	-
Dibenz(a,h)anthracene	1.6E-08	5.2E-09	5.1E-09	1.7E-09	3.9E-13	1.3E-13	-	-	-	-	-	-	-	-
Fluoranthene	7.0E-08	2.3E-08	2.3E-08	7.6E-09	1.8E-12	5.9E-13	-	-	-	-	-	-	-	-
Indeno(1,2,3-cd)pyrene	1.0E-07	3.5E-08	3.4E-08	1.1E-08	2.6E-12	8.6E-13	-	-	-	-	-	-	-	-
Phenanthrene	2.7E-08	9.1E-09	8.9E-09	3.0E-09	6.8E-13	2.3E-13	-	-	-	-	-	-	-	-
Pyrene	8.4E-08	2.8E-08	2.7E-08	9.1E-09	2.1E-12	7.0E-13	-	-	-	-	-	-	-	-
Total Petroleum Hydrocarbons														
C20-C30(Lubricant Oil Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-

Spreadsheet C1-32 (4 of 4)

Estimated Human Intake for the Adult Worker
New Conservation Yard RFI Site

Reasonable Maximum Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation of Indoor Air$_s$		Inhalation Ambient Air$_s$		Inhalation of Indoor Air$_{gw}$		Inhalation Ambient Air$_{gw}$	
	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)
PCDD/PCDFs														
2,3,7,8-TCDD	6.7E-11	2.2E-11	5.1E-12	1.7E-12	1.7E-15	5.6E-16	-	-	-	-	-	-	-	-
1,2,3,7,8-PeCDD	1.8E-10	5.9E-11	1.3E-11	4.4E-12	4.4E-15	1.5E-15	-	-	-	-	-	-	-	-
1,2,3,4,7,8-HxCDD	2.0E-10	6.8E-11	1.5E-11	5.1E-12	5.1E-15	1.7E-15	-	-	-	-	-	-	-	-
1,2,3,6,7,8-HxCDD	1.0E-09	3.5E-10	7.9E-11	2.6E-11	2.6E-14	8.7E-15	-	-	-	-	-	-	-	-
1,2,3,7,8,9-HxCDD	9.2E-10	3.1E-10	6.9E-11	2.3E-11	2.3E-14	7.7E-15	-	-	-	-	-	-	-	-
1,2,3,4,6,7,8-HpCDD	2.3E-08	7.8E-09	1.7E-09	5.8E-10	5.8E-13	1.9E-13	-	-	-	-	-	-	-	-
OCDD	2.7E-07	9.0E-08	2.0E-08	6.7E-09	6.7E-12	2.2E-12	-	-	-	-	-	-	-	-
2,3,7,8-TCDF	1.1E-11	3.7E-12	8.4E-13	2.8E-13	2.8E-16	9.3E-17	-	-	-	-	-	-	-	-
1,2,3,7,8-PeCDF	2.0E-11	6.5E-12	1.5E-12	4.9E-13	4.9E-16	1.6E-16	-	-	-	-	-	-	-	-
2,3,4,7,8-PeCDF	3.4E-11	1.1E-11	2.5E-12	8.5E-13	8.5E-16	2.8E-16	-	-	-	-	-	-	-	-
1,2,3,4,7,8-HxCDF	1.2E-10	4.1E-11	9.2E-12	3.1E-12	3.1E-15	1.0E-15	-	-	-	-	-	-	-	-
1,2,3,6,7,8-HxCDF	9.5E-11	3.2E-11	7.2E-12	2.4E-12	2.4E-15	8.0E-16	-	-	-	-	-	-	-	-
2,3,4,6,7,8-HxCDF	2.1E-10	6.9E-11	1.6E-11	5.2E-12	5.2E-15	1.7E-15	-	-	-	-	-	-	-	-
1,2,3,7,8,9-HxCDF	2.8E-11	9.2E-12	2.1E-12	6.9E-13	6.9E-16	2.3E-16	-	-	-	-	-	-	-	-
1,2,3,4,6,7,8-HpCDF	3.9E-09	1.3E-09	2.9E-10	9.8E-11	9.8E-14	3.3E-14	-	-	-	-	-	-	-	-
1,2,3,4,7,8,9-HpCDF	3.6E-10	1.2E-10	2.7E-11	8.9E-12	8.9E-15	3.0E-15	-	-	-	-	-	-	-	-
OCDF	1.0E-08	3.3E-09	7.5E-10	2.5E-10	2.5E-13	8.3E-14	-	-	-	-	-	-	-	-
PCBs														
Aroclor-1254	1.4E-07	4.6E-08	4.9E-08	1.6E-08	3.5E-12	1.2E-12	-	-	-	-	-	-	-	-
PCB-105	4.1E-11	1.4E-11	1.4E-11	4.8E-12	1.0E-15	3.4E-16	-	-	-	-	-	-	-	-
PCB-114	1.5E-12	5.1E-13	5.3E-13	1.8E-13	3.8E-17	1.3E-17	-	-	-	-	-	-	-	-
PCB-118	9.0E-11	3.0E-11	3.1E-11	1.0E-11	2.2E-15	7.5E-16	-	-	-	-	-	-	-	-
PCB-123	1.0E-12	3.3E-13	3.5E-13	1.2E-13	2.5E-17	8.3E-18	-	-	-	-	-	-	-	-
PCB-126	2.5E-12	8.4E-13	8.8E-13	2.9E-13	6.3E-17	2.1E-17	-	-	-	-	-	-	-	-
PCB-156	2.1E-11	7.0E-12	7.4E-12	2.5E-12	5.3E-16	1.8E-16	-	-	-	-	-	-	-	-
PCB-157	5.3E-12	1.8E-12	1.9E-12	6.2E-13	1.3E-16	4.5E-17	-	-	-	-	-	-	-	-
PCB-167	9.2E-12	3.1E-12	3.2E-12	1.1E-12	2.3E-16	7.7E-17	-	-	-	-	-	-	-	-
PCB-169	1.5E-13	4.9E-14	5.1E-14	1.7E-14	3.7E-18	1.2E-18	-	-	-	-	-	-	-	-
PCB-189	1.4E-12	4.6E-13	4.8E-13	1.6E-13	3.4E-17	1.1E-17	-	-	-	-	-	-	-	-
PCB-77	5.2E-12	1.7E-12	1.8E-12	6.0E-13	1.3E-16	4.3E-17	-	-	-	-	-	-	-	-
PCB-81	1.0E-12	3.3E-13	3.5E-13	1.2E-13	2.5E-17	8.3E-18	-	-	-	-	-	-	-	-

Notes:
Inhalation Indoor Air $_s$ - Exposure associated with indoor air concentrations of COPCs modeled from soil.
Inhalation Ambient Air $_s$ - Exposure associated with ambient air concentrations of COPCs modeled from soil.
Inhalation Indoor Air $_{gw}$ - Exposure associated with indoor air concentrations of COPCs modeled from groundwater.
Inhalation Ambient Air $_{gw}$ - Exposure associated with ambient air concentrations of COPCs modeled from groundwater.
ADD - Average daily dose, as defined in the SRAM (MWH 2005).
LADD - Lifetime average daily dose, as defined in the SRAM (MWH 2005).
The chemicals presented in this table are comprehensive for all media sampled. Not all chemicals were analyzed for or detected in all media.
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyls
COPC - chemical of potential concern
"-" indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
mg/kg-day - milligrams per kilogram per day

Concentration-Toxicity Screen for Soil Depth Intervals[a]
New Conservation Yard RFI Site

Central Tendancy Exposure

Chemical	Soil (0-2 feet bgs)		Soil (0-10 feet bgs)	
	Noncancer (unitless)	Cancer (unitless)	Noncancer (unitless)	Cancer (unitless)
Inorganic Compounds				
Barium	1.1E+03	NTV	9.8E+02	NTV
Cadmium	1.8E+03	6.8E-01	1.6E+03	5.9E-01
Chromium	1.5E+01	NTV	1.5E+01	NTV
Copper	7.2E+02	NTV	6.3E+02	NTV
Lead	6.0E+04	NTV	5.3E+04	NTV
Mercury	4.1E+02	NTV	3.9E+02	NTV
Molybdenum	6.7E+02	NTV	7.5E+02	NTV
Nickel	1.1E+03	NTV	1.0E+03	NTV
Nitrate	NC	NC	NC	NC
Selenium	3.3E+02	NTV	3.7E+02	NTV
Silver	3.1E+03	NTV	2.7E+03	NTV
Thallium	NC	NC	NC	NC
Zinc	1.8E+03	NTV	1.5E+03	NTV
VOCs				
1,1-Dichloroethane	NC	NC	NC	NC
1,2-Dichloroethane	NC	NC	NC	NC
Acetone	NC	NC	NC	NC
Benzene	NC	NC	NC	NC
Chloromethane	NC	NC	NC	NC
cis-1,2-Dichloroethene	NC	NC	NC	NC
Methylene chloride	NC	NC	NC	NC
Toluene	6.7E-01	NTV	4.9E-01	NTV
Trichloroethene	NC	NC	NC	NC
SVOCs				
Benzo(a)anthracene	NTV	4.4E-02	NTV	5.5E-02
Benzo(a)pyrene	NTV	4.8E-01	NTV	5.8E-01
Benzo(b)fluoranthene	NTV	5.2E-02	NTV	6.1E-02
Benzo(g,h,i)perylene	NTV	NTV	NTV	NTV
Benzo(k)fluoranthene	NTV	4.4E-02	NTV	5.5E-02
Chrysene	NTV	4.7E-03	NTV	5.7E-03
Dibenz(a,h)anthracene	NTV	1.5E-01	NTV	1.9E-01
Fluoranthene	1.1E+00	NTV	1.3E+00	NTV
Indeno(1,2,3-cd)pyrene	NTV	4.9E-02	NTV	5.9E-02
Phenanthrene	1.2E+00	NTV	1.5E+00	NTV
Pyrene	1.4E+00	NTV	1.7E+00	NTV
Total Petroleum Hydrocarbons				
C20-C30(Lubricant Oil Range)	NC	NC	NC	NC

Concentration-Toxicity Screen for Soil Depth Intervals[a]
New Conservation Yard RFI Site

Central Tendancy Exposure

Chemical	Soil (0-2 ft)		Soil (0-10 ft)	
	Noncancer (unitless)	Cancer (unitless)	Noncancer (unitless)	Cancer (unitless)
PCDD/PCDFs				
2,3,7,8-TCDD	NTV	7.3E-01	NTV	6.5E-01
1,2,3,7,8-PeCDD	NTV	2.1E+00	NTV	1.9E+00
1,2,3,4,7,8-HxCDD	NTV	5.3E-01	NTV	4.7E-01
1,2,3,6,7,8-HxCDD	NTV	2.6E+00	NTV	2.3E+00
1,2,3,7,8,9-HxCDD	NTV	9.3E-01	NTV	8.3E-01
1,2,3,4,6,7,8-HpCDD	NTV	6.1E+00	NTV	5.8E+00
OCDD	NTV	2.1E+00	NTV	1.9E+00
2,3,7,8-TCDF	NTV	4.0E-02	NTV	3.6E-02
1,2,3,7,8-PeCDF	NTV	1.4E-02	NTV	1.2E-02
2,3,4,7,8-PeCDF	NTV	3.4E-01	NTV	3.1E-01
1,2,3,4,7,8-HxCDF	NTV	3.5E-01	NTV	3.2E-01
1,2,3,6,7,8-HxCDF	NTV	2.7E-01	NTV	2.4E-01
2,3,4,6,7,8-HxCDF	NTV	5.6E-01	NTV	5.1E-01
1,2,3,7,8,9-HxCDF	NTV	9.0E-02	NTV	8.0E-02
1,2,3,4,6,7,8-HpCDF	NTV	1.0E+00	NTV	1.0E+00
1,2,3,4,7,8,9-HpCDF	NTV	9.4E-02	NTV	2.3E-01
OCDF	NTV	7.9E-02	NTV	7.1E-02
PCBs				
Aroclor-1254	3.6E+03	1.4E-01	3.6E+03	1.4E-01
PCB-105	NTV	6.0E-05	NTV	6.0E-05
PCB-114	NTV	2.2E-06	NTV	2.2E-06
PCB-118	NTV	1.3E-04	NTV	1.3E-04
PCB-123	NTV	1.5E-06	NTV	1.5E-06
PCB-126	NTV	1.2E-02	NTV	1.2E-02
PCB-156	NTV	3.1E-05	NTV	3.1E-05
PCB-157	NTV	1.0E-05	NTV	1.0E-05
PCB-167	NTV	1.7E-05	NTV	1.7E-05
PCB-169	NTV	2.7E-04	NTV	2.7E-04
PCB-189	NTV	2.5E-06	NTV	2.5E-06
PCB-77	NTV	2.5E-05	NTV	2.5E-05
PCB-81	NTV	1.5E-05	NTV	1.5E-05
Cumulative Risk	7.4E+04	2.0E+01	6.7E+04	1.8E+01

Concentration-Toxicity Screen for Soil Depth Intervals[a]
New Conservation Yard RFI Site

Reasonable Maximum Exposure

Chemical	Soil (0-2 feet bgs)		Soil (0-10 feet bgs)	
	Noncancer (unitless)	Cancer (unitless)	Noncancer (unitless)	Cancer (unitless)
Inorganic Compounds				
Barium	4.8E+03	NTV	2.3E+03	NTV
Cadmium	1.3E+04	5.1E+00	1.1E+04	4.1E+00
Chromium	2.7E+01	NTV	1.9E+01	NTV
Copper	2.0E+03	NTV	1.7E+03	NTV
Lead	8.1E+04	NTV	7.3E+04	NTV
Mercury	2.1E+03	NTV	1.8E+03	NTV
Molybdenum	1.2E+03	NTV	1.2E+03	NTV
Nickel	2.8E+03	NTV	2.4E+03	NTV
Nitrate	NC	NC	NC	NC
Selenium	6.0E+02	NTV	6.0E+02	NTV
Silver	1.9E+04	NTV	1.7E+04	NTV
Thallium	NC	NC	NC	NC
Zinc	9.3E+03	NTV	7.6E+03	NTV
VOCs				
1,1-Dichloroethane	NC	NC	NC	NC
1,2-Dichloroethane	NC	NC	NC	NC
Acetone	NC	NC	NC	NC
Benzene	NC	NC	NC	NC
Carbon disulfide	NC	NC	NC	NC
Chloromethane	NC	NC	NC	NC
cis-1,2-Dichloroethene	NC	NC	NC	NC
Methylene chloride	NC	NC	NC	NC
Toluene	1.4E+00	NTV	1.3E+00	NTV
Trichloroethene	NC	NC	NC	NC
SVOCs				
Benzo(a)anthracene	NTV	1.4E-02	NTV	1.4E-02
Benzo(a)pyrene	NTV	5.2E-01	NTV	5.2E-01
Benzo(b)fluoranthene	NTV	7.8E-02	NTV	7.8E-02
Benzo(g,h,i)perylene	NTV	NTV	NTV	NTV
Benzo(k)fluoranthene	NTV	1.4E-02	NTV	1.4E-02
Chrysene	NTV	3.2E-03	NTV	3.2E-03
Dibenz(a,h)anthracene	NTV	3.3E-02	NTV	3.3E-02
Fluoranthene	9.0E-01	NTV	9.0E-01	NTV
Indeno(1,2,3-cd)pyrene	NTV	6.4E-02	NTV	6.4E-02
Phenanthrene	4.7E-01	NTV	4.7E-01	NTV
Pyrene	1.4E+00	NTV	1.4E+00	NTV
Total Petroleum Hydrocarbons				
C20-C30(Lubricant Oil Range)	NC	NC	NC	NC

Concentration-Toxicity Screen for Soil Depth Intervals[a]
New Conservation Yard RFI Site

Reasonable Maximum Exposure

Chemical	Soil (0-2 ft)		Soil (0-10 ft)	
	Noncancer (unitless)	Cancer (unitless)	Noncancer (unitless)	Cancer (unitless)
PCDD/PCDFs				
2,3,7,8-TCDD	NTV	4.5E+00	NTV	3.8E+00
1,2,3,7,8-PeCDD	NTV	1.2E+01	NTV	1.2E+01
1,2,3,4,7,8-HxCDD	NTV	1.4E+00	NTV	1.1E+00
1,2,3,6,7,8-HxCDD	NTV	7.0E+00	NTV	5.9E+00
1,2,3,7,8,9-HxCDD	NTV	6.1E+00	NTV	6.1E+00
1,2,3,4,6,7,8-HpCDD	NTV	1.5E+01	NTV	1.3E+01
OCDD	NTV	5.4E+00	NTV	4.6E+00
2,3,7,8-TCDF	NTV	7.4E-02	NTV	6.8E-02
1,2,3,7,8-PeCDF	NTV	3.9E-02	NTV	3.9E-02
2,3,4,7,8-PeCDF	NTV	6.8E-01	NTV	6.0E-01
1,2,3,4,7,8-HxCDF	NTV	8.2E-01	NTV	7.0E-01
1,2,3,6,7,8-HxCDF	NTV	6.3E-01	NTV	5.5E-01
2,3,4,6,7,8-HxCDF	NTV	1.4E+00	NTV	1.2E+00
1,2,3,7,8,9-HxCDF	NTV	1.8E-01	NTV	1.6E-01
1,2,3,4,6,7,8-HpCDF	NTV	2.6E+00	NTV	2.5E+00
1,2,3,4,7,8,9-HpCDF	NTV	2.4E-01	NTV	6.4E-01
OCDF	NTV	2.0E-01	NTV	1.7E-01
PCBs				
Aroclor-1254	3.6E+03	1.4E-01	3.6E+03	1.4E-01
PCB-105	NTV	8.2E-05	NTV	8.2E-05
PCB-114	NTV	3.0E-06	NTV	3.0E-06
PCB-118	NTV	1.8E-04	NTV	1.8E-04
PCB-123	NTV	2.0E-06	NTV	2.0E-06
PCB-126	NTV	1.7E-02	NTV	1.7E-02
PCB-156	NTV	4.2E-05	NTV	4.2E-05
PCB-157	NTV	1.1E-05	NTV	1.1E-05
PCB-167	NTV	1.8E-05	NTV	1.8E-05
PCB-169	NTV	2.9E-04	NTV	2.9E-04
PCB-189	NTV	2.7E-06	NTV	2.7E-06
PCB-77	NTV	3.4E-05	NTV	3.4E-05
PCB-81	NTV	2.0E-05	NTV	2.0E-05
Cumulative Risk	1.4E+05	6.4E+01	1.2E+05	5.8E+01

Notes:

a. Cancer concentration-toxicity screen value = soil concentration x oral cancer slope factor. Noncancer concentration-toxicity screen value = soil concentration / oral reference dose. Concentration-toxicity screen values are for comparative purposes only and are not an indication of risk.

NTV - indicates that adequate toxicity data were not available for a chemical.

NC - indicates that a chemical was not selected as a soil COPC at the specified depth interval.

VOC - volatile organic compound

SVOC - semi-volatile organic compound

PCB - polychlorinated biphenyls

bgs - below ground surface

Exposure Point Concentrations in Plants

New Conservation Yard RFI Site

Chemical	Soil Concentrations at 0 to 2 Feet bgs		Soil to Plant Biotransfer Factors[a]		Below Ground Plant Concentrations[b]		Above Ground Plant Concentrations[b]	
	CTE (mg/kg)	RME (mg/kg)	Below Ground Plants (unitless)	Above Ground Plants (unitless)	CTE (mg/kg)	RME (mg/kg)	CTE (mg/kg)	RME (mg/kg)
Inorganic Compounds								
Barium	2.2E+02	9.6E+02	1.4E-01	1.9E-02	2.9E+01	1.3E+02	4.1E+00	1.8E+01
Cadmium	1.8E+00	1.3E+01	3.3E-02	6.9E-02	6.0E-02	4.4E-01	1.2E-01	9.2E-01
Chromium	2.3E+01	4.1E+01	1.0E-03	9.5E-04	2.3E-02	4.1E-02	2.2E-02	3.8E-02
Copper	2.9E+01	8.2E+01	5.6E-02	5.0E-02	1.6E+00	4.6E+00	1.4E+00	4.1E+00
Lead	2.6E+01	3.5E+01	2.0E-03	5.7E-03	5.1E-02	7.0E-02	1.5E-01	2.0E-01
Mercury	1.2E-01	6.4E-01	4.4E-02	1.1E-01	5.4E-03	2.9E-02	1.4E-02	7.3E-02
Molybdenum	3.4E+00	6.0E+00	1.3E-02	3.2E-02	4.5E-02	8.0E-02	1.1E-01	1.9E-01
Nickel	2.2E+01	5.7E+01	1.3E-02	7.6E-03	3.0E-01	7.6E-01	1.7E-01	4.3E-01
Selenium	1.7E+00	3.0E+00	2.2E-02	5.0E-02	3.7E-02	6.7E-02	8.4E-02	1.5E-01
Silver	1.5E+01	9.6E+01	4.4E-05	5.0E-04	6.9E-04	4.3E-03	7.8E-03	4.8E-02
Zinc	5.4E+02	2.8E+03	2.0E-01	1.9E-01	1.1E+02	5.6E+02	1.0E+02	5.3E+02
VOCs								
Toluene	5.3E-02	1.1E-01	7.0E+00	2.0E-01	3.8E-01	7.7E-01	1.1E-02	2.2E-02
SVOCs								
Benzo(a)anthracene	3.6E-02	1.2E-02	1.3E-01	3.8E-03	4.9E-03	1.6E-03	1.4E-04	4.6E-05
Benzo(a)pyrene	4.0E-02	4.3E-02	5.7E-02	1.6E-03	2.2E-03	2.4E-03	6.4E-05	6.9E-05
Benzo(b)fluoranthene	4.3E-02	6.5E-02	6.1E-02	1.8E-03	2.7E-03	4.0E-03	7.6E-05	1.1E-04
Benzo(g,h,i)perylene	3.9E-02	3.1E-02	4.6E-02	1.3E-03	1.8E-03	1.4E-03	5.1E-05	4.1E-05
Benzo(k)fluoranthene	3.6E-02	1.2E-02	8.2E-02	2.4E-03	3.0E-03	9.9E-04	8.6E-05	2.8E-05
Chrysene	4.0E-02	2.7E-02	1.2E-01	3.6E-03	4.9E-03	3.4E-03	1.4E-04	9.6E-05
Dibenz(a,h)anthracene	3.6E-02	8.0E-03	2.9E-02	8.3E-04	1.0E-03	2.3E-04	3.0E-05	6.6E-06
Fluoranthene	4.3E-02	3.6E-02	3.0E-01	8.4E-03	1.3E-02	1.1E-02	3.6E-04	3.0E-04
Indeno(1,2,3-cd)pyrene	4.1E-02	5.3E-02	1.7E-02	4.8E-04	6.9E-04	9.0E-04	2.0E-05	2.6E-05
Phenanthrene	3.7E-02	1.4E-02	6.0E-01	1.7E-02	2.2E-02	8.4E-03	6.3E-04	2.4E-04
Pyrene	4.3E-02	4.3E-02	3.3E-01	9.5E-03	1.4E-02	1.4E-02	4.0E-04	4.1E-04
Total Petroleum Hydrocarbons								
C20-C30(Lubricant Oil Range)	NC	NC	8.9E-02	2.5E-03	NC	NC	NC	NC
PCDD/PCDFs								
2,3,7,8-TCDD	5.6E-06	3.4E-05	2.3E-02	6.7E-04	1.3E-07	8.1E-07	3.8E-09	2.3E-08
1,2,3,7,8-PeCDD	1.6E-05	9.0E-05	3.8E-02	1.1E-03	6.2E-07	3.4E-06	1.8E-08	9.8E-08
1,2,3,4,7,8-HxCDD	4.1E-05	1.0E-04	1.1E-04	3.2E-06	4.6E-09	1.2E-08	1.3E-10	3.3E-10
1,2,3,6,7,8-HxCDD	2.0E-04	5.4E-04	1.6E-02	4.5E-04	3.2E-06	8.4E-06	9.0E-08	2.4E-07
1,2,3,7,8,9-HxCDD	7.1E-05	4.7E-04	1.6E-02	4.5E-04	1.1E-06	7.4E-06	3.2E-08	2.1E-07
1,2,3,4,6,7,8-HpCDD	4.7E-03	1.2E-02	3.0E-05	8.4E-07	1.4E-07	3.5E-07	4.0E-09	1.0E-08
OCDD	5.4E-02	1.4E-01	7.8E-06	2.2E-07	4.2E-07	1.1E-06	1.2E-08	3.1E-08
2,3,7,8-TCDF	3.1E-06	5.7E-06	4.4E-02	1.3E-03	1.4E-07	2.5E-07	3.9E-09	7.1E-09
1,2,3,7,8-PeCDF	3.6E-06	1.0E-05	3.1E-02	8.9E-04	1.1E-07	3.1E-07	3.2E-09	8.9E-09
2,3,4,7,8-PeCDF	8.8E-06	1.7E-05	2.6E-02	7.5E-04	2.3E-07	4.5E-07	6.5E-09	1.3E-08
1,2,3,4,7,8-HxCDF	2.7E-05	6.3E-05	1.1E-04	3.2E-06	3.0E-09	7.1E-09	8.7E-11	2.0E-10
1,2,3,6,7,8-HxCDF	2.1E-05	4.9E-05	1.6E-02	4.5E-04	3.3E-07	7.7E-07	9.4E-09	2.2E-08
2,3,4,6,7,8-HxCDF	4.3E-05	1.1E-04	1.6E-02	4.5E-04	6.8E-07	1.7E-06	1.9E-08	4.8E-08
1,2,3,7,8,9-HxCDF	6.9E-06	1.4E-05	1.6E-02	4.5E-04	1.1E-07	2.2E-07	3.1E-09	6.3E-09
1,2,3,4,6,7,8-HpCDF	7.7E-04	2.0E-03	7.1E-03	2.0E-04	5.5E-06	1.4E-05	1.6E-07	4.0E-07
1,2,3,4,7,8,9-HpCDF	7.2E-05	1.8E-04	7.1E-03	2.0E-04	5.1E-07	1.3E-06	1.5E-08	3.7E-08
OCDF	2.0E-03	5.1E-03	7.8E-06	2.2E-07	1.6E-08	4.0E-08	4.5E-10	1.1E-09
Aroclor-1254	9.7E-02	7.1E-02	6.0E-02	1.7E-03	5.8E-03	4.2E-03	1.7E-04	1.2E-04
PCB-105	1.5E-05	2.1E-05	6.0E-02	1.7E-03	9.2E-07	1.3E-06	2.6E-08	3.6E-08
PCB-114	5.7E-07	7.7E-07	6.0E-02	1.7E-03	3.4E-08	4.6E-08	9.7E-10	1.3E-09
PCB-118	3.4E-05	4.6E-05	6.0E-02	1.7E-03	2.0E-06	2.7E-06	5.7E-08	7.8E-08
PCB-123	3.7E-07	5.1E-07	6.0E-02	1.7E-03	2.2E-08	3.1E-08	6.4E-10	8.7E-10
PCB-126	9.4E-07	1.3E-06	6.0E-02	1.7E-03	5.6E-08	7.7E-08	1.6E-09	2.2E-09
PCB-156	7.9E-06	1.1E-05	6.0E-02	1.7E-03	4.7E-07	6.4E-07	1.3E-08	1.8E-08
PCB-157	2.6E-06	2.7E-06	6.0E-02	1.7E-03	1.5E-07	1.6E-07	4.4E-09	4.7E-09
PCB-167	4.4E-06	4.7E-06	6.0E-02	1.7E-03	2.6E-07	2.8E-07	7.5E-09	8.1E-09
PCB-169	6.8E-08	7.5E-08	6.0E-02	1.7E-03	4.1E-09	4.5E-09	1.2E-10	1.3E-10

Spreadsheet C1-30 (2 of 2)

Exposure Point Concentrations in Plants

New Conservation Yard RFI Site

Chemical	Soil Concentrations at 0 to 2 Feet bgs		Soil to Plant Biotransfer Factors[a]		Below Ground Plant Concentrations[b]		Above Ground Plant Concentrations[b]	
	CTE (mg/kg)	RME (mg/kg)	Below Ground Plants (unitless)	Above Ground Plants (unitless)	CTE (mg/kg)	RME (mg/kg)	CTE (mg/kg)	RME (mg/kg)
PCB-189	6.5E-07	7.0E-07	6.0E-02	1.7E-03	3.9E-08	4.2E-08	1.1E-09	1.2E-09
PCB-77	1.9E-06	2.6E-06	3.4E-02	9.7E-04	6.6E-08	9.0E-08	1.9E-09	2.6E-09
PCB-81	3.7E-07	5.1E-07	3.4E-02	9.7E-04	1.3E-08	1.7E-08	3.6E-10	5.0E-10

Notes:

a. Soil to plant biotransfer factors (PBF) for organic chemicals were estimated using the procedures described by DTSC (1994). For above-ground plants, PBF = 7.7Kow-0.58. For below-ground plants, PBF = 35(7.7Kow-0.58). PBFs reported by Baes et al (1984) were used for inorganic chemicals.

b. Plant exposure point concentrations are in units of milligram per kilogram (mg/kg) wet weight.

c. Kow value otained from the Hazardous Substance Data Base (HSDB).

d. Kow value obtained from DTSC (1994).

e. Kow value obtained from ATSDR.

f. Fluoranthene Kow used as surrogate.

CTE- Central Tendency Exposure

RME- Reasonable Maximum Exposure

VOC - volatile organic compound

SVOC - semi-volatile organic compound

PCDD/PCDF - polychlorinated dibenzo-p-dioxins and dibenzofurans

mg/kg - milligrams per kilogram

bgs - below ground surface

mg/kg - milligram per kilogram

Migration of Volatile COPC from Groundwater to Residential Building Indoor Air
New Conservation Yard RFI Site

Chemical -Specific Values [a]	CTE Groundwater Concentration[b] C_r^{CTE} (mg/L)	RME Groundwater Concentration[b] C_r^{RME} (mg/L)	CTE Indoor Air Concentration[c] $C_{building}^{CTE}$ (µg/m3)	RME Indoor Air Concentration[c] $C_{building}^{RME}$ (µg/m3)
VOCs				
Acetone	1.6E-02	1.6E-02	4.5E-04	4.5E-04
Toluene	1.8E-03	1.8E-03	8.0E-03	8.0E-03
Trichloroethene	5.3E-04	5.3E-04	3.7E-03	3.7E-03

Site-Specific and Default Values			
Average soil Temperature (T_s)	1.8E+01	C°	Region-specific, estimated from graph presented in USEPA (200
Depth below grade to bottom of enclosed space floor (L_f)	1.5E+01	cm	USEPA (2002) default for slab-on-grade construction
Depth below grade to water table (L_w^t)	1.7E+03	cm	See note (d)
Thickness of soil stratum A (h_A)	3.0E+02	cm	As defined by USEPA (2002), equal to Lwt.
Soil Stratum A SCS soil type	SL		Site-specific - sandy loam
Soil bulk density for soil stratum A (ρ_b^A)	1.7E+00	g/cm³	Site-specific - as per SRAM (MWH, 2005)
Soil porosity for soil stratum A (n^A)	3.7E-01	cm^3/cm^3	Site-specific - as per SRAM (MWH, 2005)
Soil water filled porosity for soil stratum A (θ_w^A)	1.1E-01	cm³/cm³	Site-specific - as per SRAM (MWH, 2005)
Thickness of soil stratum B (h_B)	3.0E+02	cm	Conservatively assumed to be 10 feet
Soil Stratum B SCS soil type	Weathered Bedrock		
Soil bulk density for soil stratum B (ρ_b^B)	1.7E+00	g/cm³	Site-specific - as per SRAM (MWH, 2005)
Soil porosity for soil stratum B (n^B)	2.0E-01	cm^3/cm^3	Site-specific - as per SRAM (MWH, 2005)
Soil water filled porosity for soil stratum B (θ_w^B)	5.3E-02	cm³/cm³	Site-specific - as per SRAM (MWH, 2005)
Weathered bedrock fractures (ϕwbr)	1.0E-04	cm^3/cm^3	MWH (2003)
Thickness of soil stratum C (h_C)	1.1E+03	cm	L_w-h_A - h_B
Soil Stratum C SCS soil type	nweathered Bedrock		
Soil bulk density for soil stratum C (ρ_b^C)	1.7E+00	g/cm³	Site-specific - as per SRAM (MWH, 2005)
Soil porosity for soil stratum C (n^C)	1.3E-01	cm^3/cm^3	Site-specific - as per SRAM (MWH, 2005)
Soil water filled porosity for soil stratum C (θ_w^C)	5.1E-02	cm³/cm³	Site-specific - as per SRAM (MWH, 2005)
Unweathered bedrock fractures (ϕubr)	5.0E-05	cm^3/cm^3	MWH (2003)
Enclosed space floor length (L_B)	1.0E+03	cm	USEPA (2002) default value.
Enclosed space floor width (W_B)	1.0E+03	cm	USEPA (2002) default value.
Enclosed space height (H_B)	2.4E+02	cm	USEPA (2002) default value.
Soil gas advection rate (Qsoil)	5	L/min	DTSC (2005) default value.
Indoor air exchange rate (ER)	5.0E-01	(1/hour)	DTSC (2005) default value.

Notes:

a. Chemical-specific physical/chemical property values used to model soil to indoor air COPC concentrations as presented in the SRAM (MWH 2005.)

b. Exposure point concentrations (EPC) for soil at 0 to 10 feet bgs, as presented in Spreadsheet C1-11.

c. Indoor air concentrations estimated using vapor migration modeling methodology provided in the SRAM (MWH 2005).

CTE - Central Tendency Exposure

RME - Reasonable Maximum Exposure

VOC - volatile organic compound

mg/kg - milligram per kilogram

µg/m3 - micrograms per cubic meter

Migration of Volatile COPC from Groundwater to Commercial Building Indoor Air
New Conservation Yard RFI Site

Chemical -Specific Values[a]	CTE Groundwater Concentration[b] C_{rCTE} (mg/L)	RME Groundwater Concentration[b] C_{rRME} (mg/L)	CTE Indoor Air Concentration[c] $C_{buildingCTE}$ (µg/m3)	RME Indoor Air Concentration[c] $C_{buildingRME}$ (µg/m3)
VOCs				
Acetone	1.6E-02	1.6E-02	1.4E-04	1.4E-04
Toluene	1.8E-03	1.8E-03	2.6E-03	2.6E-03
Trichloroethene	5.3E-04	5.3E-04	1.2E-03	1.2E-03

Site-Specific and Default Values			
Average soil Temperature (T_s)	1.8E+01	C°	Region-specific, estimated from graph presented in USEPA (2002
Depth below grade to bottom of enclosed space floor (L_f)	1.5E+01	cm	USEPA (2002) default for slab-on-grade construction
Depth below grade to water table (L_w[d])	1.7E+03	cm	See note (d)
Thickness of soil stratum A (h_A)	3.0E+02	cm	Conservatively assumed to be 10 fee
Soil Stratum A SCS soil type	SL		Site-specific - sandy loam
Soil bulk density for soil stratum A (ρ_b^A)	1.7E+00	g/cm³	Site-specific - as per SRAM (MWH, 2005)
Soil porosity for soil stratum A (n^A)	3.7E-01	cm^3/cm^3	Site-specific - as per SRAM (MWH, 2005)
Soil water filled porosity for soil stratum A (θ_w^A)	1.1E-01	cm³/cm³	Site-specific - as per SRAM (MWH, 2005)
Thickness of soil stratum B (h_B)	3.0E+02	cm	Conservatively assumed to be 10 fee
Soil Stratum B SCS soil type	Weathered Bedrock		
Soil bulk density for soil stratum B (ρ_b^B)	1.7E+00	g/cm³	Site-specific - as per SRAM (MWH, 2005)
Soil porosity for soil stratum B (n^B)	2.0E-01	cm^3/cm^3	Site-specific - as per SRAM (MWH, 2005)
Soil water filled porosity for soil stratum B (θ_w^B)	5.3E-02	cm³/cm³	Site-specific - as per SRAM (MWH, 2005)
Weathered bedrock fractures (ϕ_{wbr})	1.0E-04	cm^3/cm^3	MWH (2003)
Thickness of soil stratum C (h_C)	1.1E+03	cm	L_w-h_A - h_B
Soil Stratum C SCS soil type	Unweathered Bedrock		
Soil bulk density for soil stratum C (ρ_b^C)	1.7E+00	g/cm³	Site-specific - as per SRAM (MWH, 2005)
Soil porosity for soil stratum C (n^C)	1.3E-01	cm^3/cm^3	Site-specific - as per SRAM (MWH, 2005)
Soil water filled porosity for soil stratum C (θ_w^C)	5.1E-02	cm³/cm³	Site-specific - as per SRAM (MWH, 2005)
Unweathered bedrock fractures (ϕ_{ubr})	5.0E-05	cm^3/cm^3	MWH (2003)
Enclosed space floor length (L_B)	3.0E+03	cm	Site-specific - based on 10,000 f² commercial building
Enclosed space floor width (W_B)	3.0E+03	cm	Site-specific - based on 10,000 f² commercial building
Enclosed space height (H_B)	3.7E+02	cm	Site-specific - based single story building with 12 foot ceilings.
Soil gas advection rate (Qsoil)	46	L/min	Default residential Qsoil (5 L/min) adjusted for larger commercial building area.
Indoor air exchange rate (ER)	1.0E+00	(1/hour)	DTSC (2005) default value.

Notes:

a. Chemical-specific physical/chemical property values used to model soil to indoor air COPC concentrations as presented in the SRAM (MWH 2005.)

b. Exposure point concentrations (EPC) for soil at 0 to 10 feet bgs, as presented in Spreadsheet C1-11.

c. Indoor air concentrations estimated using vapor migration modeling methodology provided in the SRAM (MWH 2005).

CTE - Central Tendency Exposure

RME - Reasonable Maximum Exposure

VOC - volatile organic compound

mg/kg - milligram per kilogram

µg/m3 - micrograms per cubic meter

Migration of Volatile COPC from Soil to Residential Building Indoor Air
New Conservation Yard RFI Site

Chemical -Specific Values[a]

	CTE Soil Soil Concentration[b] C_r^{CTE} (mg/kg)	RME Soil Concentration[b] C_r^{RME} (mg/kg)	CTE Indoor Air Concentration[c] $C_{building}^{CTE}$ (µg/m3)	RME Indoor Air Concentration[c] $C_{building}^{RME}$ (µg/m3)
VOCs				
Toluene	5.3E-02	1.1E-01	3.6E+01	7.4E+01

Site-Specific and Default Values

Average soil Temperature (T_s)	18	C°	Region-specific, estimated from graph presented in USEPA (1997)
Depth below grade to bottom of enclosed space floor (L_f)	15	cm	USEPA (1997) default for slab-on-grade construction.
Depth below grade to top of contamination (L_t)	61	cm	As defined by USEPA (1997), equal to L_f when top of contamination is at soil surface.
Thickness of soil stratum A (h_A)	61	cm	As defined by USEPA (1997), equal to L_t.
Soil Stratum A SCS soil type	SL		Site-specific - sandy loam
Soil bulk density for soil stratum A (P_b^A)	1.7	g/cm³	USEPA default - mean of range, from USEPA (1997) EMSOFT Users Guide.
Soil porosity for soil stratum A (n^A)	0.37	cm^3/cm^3	Jury et al. (1984) default value.
Soil water filled porosity for soil stratum A (0_w^A)	0.11	cm³/cm³	EPA default - low end of range for fine-grained soils, from EPA (1997) EMSOFT Users Guide
Organic carbon content for soil stratum A (f_{oc}^A)	0.0020	fraction	Site-specific - mean total organic carbon content.
Enclosed space floor length (L_B)	1363	cm	Site-specific - based on 2,000 ft² home typical of smaller homes in surrounding neighborhoods
Enclosed space floor width (W_B)	1363	cm	Site-specific - based on 2,000 ft² home typical of smaller homes in surrounding neighborhoods
Enclosed space height (H_B)	488	cm	USEPA (1997) default value for 2-story home with 8 foot ceilings.
Soil gas advection rate (Qsoil)	5	L/min	DTSC (2005) default value.
Indoor air exchange rate (ER)	0.50	(1/hour)	USEPA (1997) default value.

Notes:

a. Chemical-specific physical/chemical property values used to model soil to indoor air COPC concentrations as presented in the SRAM (MWH 2005.)

b. Exposure point concentrations (EPC) for soil at 0 to 10 feet bgs, as presented in Spreadsheet C1-11.

c. Indoor air concentrations estimated using vapor migration modeling methodology provided in the SRAM (MWH 2005).

CTE - Central Tendency Exposure

RME - Reasonable Maximum Exposure

VOC - volatile organic compound

mg/kg - milligram per kilogram

µg/m3 - micrograms per cubic meter

Spreadsheet C1-26 (1 of 1)

Migration of Volatile COPC from Soil to Commercial Building Indoor Air
New Conservation Yard RFI Site

Chemical -Specific Values [a]	CTE Soil Concentration[b] C_r^{CTE} (mg/kg)	RME Soil Concentration[b] C_r^{RME} (mg/kg)	CTE Indoor Air Concentration[c] $C_{building}^{CTE}$ (µg/m3)	RME Indoor Air Concentration[c] $C_{building}^{RME}$ (µg/m3)
VOCs				
Toluene	5.3E-02	1.1E-01	1.2E+01	2.5E+01

Site-Specific and Default Values			
Average soil Temperature (T_s)	18	C°	Region-specific, estimated from graph presented in USEPA (1997)
Depth below grade to bottom of enclosed space floor (L_f)	15	cm	USEPA (1997) default for slab-on-grade construction.
Depth below grade to top of contamination (L_t)	61	cm	As defined by USEPA (1997), equal to L_f when top of contamination is at soil surface.
Depth below grade to bottom of contamination (L_b)	305	cm	Site-specific - based on 0-10 foot depth interval as defined in the SRAM (MWH 2005)
Thickness of soil stratum A (h_A)	15	cm	As defined by USEPA (1997), equal to L_t.
Soil bulk density for soil stratum A (P_b^A)	1.7	g/cm³	USEPA default - mean of range, from USEPA (1997) EMSOFT Users Guide.
Soil porosity for soil stratum A (n^A)	0.37	cm^3/cm^3	Jury et al. (1984) default value.
Soil water filled porosity for soil stratum A (0_w^A)	0.11	cm³/cm³	EPA default - low end of range for fine-grained soils, from EPA (1997) EMSOFT Users Guide
Enclosed space floor length (L_B)	3048	cm	Site-specific - based on 10,000 ft² commercial building.
Enclosed space floor width (W_B)	3048	cm	Site-specific - based on 10,000 ft² commercial building.
Enclosed space height (H_B)	366	cm	Site-specific - based single story building with 12 foot ceilings
Soil gas advection rate (Qsoil)	46	L/min	Default residential Qsoil (5 L/min) adjusted for larger commercial building area.
Indoor air exchange rate (ER)	1.00	(1/hour)	USEPA (1997) default value.

Notes:

a. Chemical-specific physical/chemical property values used to model soil to indoor air COPC concentrations as presented in the SRAM (MWH 2005.)

b. Exposure point concentrations (EPC) for soil at 0 to 10 feet bgs, as presented in Spreadsheet C1-11.

c. Indoor air concentrations estimated using vapor migration modeling methodology provided in the SRAM (MWH 2005).

CTE - Central Tendency Exposure

RME - Reasonable Maximum Exposure

VOC - volatile organic compound

mg/kg - milligram per kilogram

µg/m3 - micrograms per cubic meter

Spreadsheet C1-23 (1 of 1)

Flux Rates and Ambient Air Concentrations Estimated for Volatile COPC in Groundwater
New Conservation Yard RFI Site

Volatile COPC	6-Year[a] Exposure Flux Rate Js (mg/sec-m^2)	9-Year[b] Exposure Flux Rate Js (mg/sec-m^2)	24-Year[c] Exposure Flux Rate Js (mg/sec-m^2)	25-Year[d] Exposure Flux Rate Js (mg/sec-m^2)	6-Year[a] Time-Averaged Air Concentration Ca (mg/m^3)	9-Year[b] Time-Averaged Air Concentration Ca (mg/m^3)	Time-Averaged Air Concentration Ca (mg/m^3)	Time-Averaged Air Concentration Ca (mg/m^3)
VOCs								
Acetone	3.9E-10	3.9E-10	3.9E-10	3.9E-10	7.3E-12	7.3E-12	7.3E-12	7.3E-12
Toluene	1.4E-05	1.4E-05	1.4E-05	1.4E-05	2.6E-07	2.6E-07	2.6E-07	2.6E-07
Trichloroethene	6.0E-06	6.0E-06	6.0E-06	6.0E-06	1.1E-07	1.1E-07	1.1E-07	1.1E-07

Site-Specific Values		
Length of box (L)	198 m	[e]
Mixing height (H)	2 m	[f]
Wind speed (WS)	2 m/s	[g]

Notes:

a. 6-year exposure is applicable to average and RME residential and recreational child scenario.
b. 9-year exposure is applicable to average worker scenario.
c. 24-year exposure is applicable to average and RME residential and recreational adult scenario.
d. 25-year exposure is applicable to RME worker scenario.
e. Site-specific; equal to the square root of the total area of the RFI site.
f. EPA default value.
g. Site-specific value, as presented in the SRAM (MWH 2005).
COPC - chemical of potential concern
VOC - volatile organic compound
mg/sec-m^2 - milligram per second per square meter
mg/m^3 - milligram per cubic meter

Parameter Values Used for Migration of Volatile COPC from Groundwater to Ambient Air
New Conservation Yard RFI Site

Constituent	RME Soil Vapor Concentration Cs (ug/m^3)	Diffusivity in air D_a (cm^2/s)	Diffusivity in water D_w (cm^2/s)	Henry's law constant at reference temperature H ($atm\text{-}m^3/mol$)	Organic carbon partition coefficient K_{oc} (cm^3/g)	Effective diffusion coefficient D^{eff}_A (cm^2/s)
Acetone	19	1.24E-01	1.14E-05	3.87E-05	5.75E-01	1.05E-02
Toluene	345	8.70E-02	8.60E-06	6.62E-03	1.82E+02	7.34E-03
Trichloroethene	162	7.90E-02	9.10E-06	1.03E-02	1.66E+02	6.67E-03

Site-Specific and Default Values			
Organic carbon content of soil (f_{oc})	2.3E-03	fraction	Site-specific - as per SRAM (MWH, 2005)
Soil bulk density for soil stratum (P_b)	1.7E+00	g/cm^3	Site-specific - as per SRAM (MWH, 2005)
Soil porosity (n)	3.7E-01	cm^3/cm^3	Site-specific - as per SRAM (MWH, 2005)
Soil water filled porosity (0_w)	1.1E-01	cm^3/cm^3	Site-specific - as per SRAM (MWH, 2005)
Soil depth (L)	91	cm	Site-specific
Site Area (A)	2.0	acres	Site-specific
Q/C coefficient A	12	unitless	USEPA (2002) default
Q/C coefficient B	18	unitless	USEPA (2002) default
Q/C coefficient C	210	unitless	USEPA (2002) default
Q/C	53	g/m2-s/kg/m3	USEPA (2002)
Water recharge (R)	1.0E-09	m/s	Site-specific - as per SRAM (MWH, 2005)

Flux Rates and Ambient Air Concentrations Estimated for Volatile COPC in Soils at 0 to 10 Feet bgs
New Conservation Yard RFI Site

Volatile COPC	6-Year[a] Exposure Flux Rate Js (mg/sec-m^2)	9-Year[b] Exposure Flux Rate Js (mg/sec-m^2)	24-Year[c] Exposure Flux Rate Js (mg/sec-m^2)	25-Year[d] Exposure Flux Rate Js (mg/sec-m^2)	6-Year[a] Time-Averaged Air Concentration Ca (mg/m^3)	9-Year[b] Time-Averaged Air Concentration Ca (mg/m^3)	Time-Averaged Air Concentration Ca (mg/m^3)	Time-Averaged Air Concentration Ca (mg/m^3)
VOCs								
Toluene	3.7E-02	3.7E-02	3.7E-02	3.7E-02	6.9E-04	6.9E-04	6.9E-04	6.9E-04
Site-Specific Values								
Length of box (L)	198 m [e]							
Mixing height (H)	2 m [f]							
Wind speed (WS)	2 m/s [g]							

Notes:
a. 6-year exposure is applicable to average and RME residential and recreational child scenario.
b. 9-year exposure is applicable to average worker scenario.
c. 24-year exposure is applicable to CTE and RME residential and recreational adult scenario.
d. 25-year exposure is applicable to RME worker scenario.
e. Site-specific; equal to the square root of the total area of the RFI site.
f. USEPA default value.
g. Site-specific value, as presented in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyl
PCDD/PCDF - polychlorinated dibenzo-p-dioxins and dibenzofurans
COPC - chemical of potential concern
bgs - below ground surface
mg/sec-m^2 - milligram per second per square meter
mg/m^3 - milligram per cubic

Parameter Values Used for Migration of Volatile COPC from Soil to Ambient Air
New Conservation Yard RFI Site

Constituent	RME Soil Vapor Concentration Cs (ug/m^3)	Diffusivity in air D_a (cm^2/s)	Diffusivity in water D_w (cm^2/s)	Henry's law constant at reference temperature H ($atm\text{-}m^3/mol$)	Organic carbon partition coefficient K_{oc} (cm^3/g)	Effective diffusion coefficient D^{eff}_A (cm^2/s)
Toluene	4.59E+04	8.70E-02	8.60E-06	6.62E-03	1.82E+02	7.34E-03

Site-Specific and Default Values			
Organic carbon content of soil (f_{oc})	2.3E-03	fraction	Site-specific - as per SRAM (MWH, 2005)
Soil bulk density for soil stratum (P_b)	1.68E+00	g/cm^3	Site-specific - as per SRAM (MWH, 2005)
Soil porosity (n)	3.7E-01	cm^3/cm^3	Site-specific - as per SRAM (MWH, 2005)
Soil water filled porosity (0_w)	1.1E-01	cm^3/cm^3	Site-specific - as per SRAM (MWH, 2005)
Soil depth (L)	91	cm	Site-specific
Site Area (A)	2.0	acres	Site-specific
Q/C coefficient A	12	unitless	USEPA (2002) default
Q/C coefficient B	18	unitless	USEPA (2002) default
Q/C coefficient C	210	unitless	USEPA (2002) default
Q/C	53	g/m2-s/kg/m3	USEPA (2002)
Water recharge (R)	1.0E-09	m/s	Site-specific - as per SRAM (MWH, 2005)

Estimation of Fugitive Dust Exposure Point Concentrations
New Conservation Yard RFI Site

$$Ca = \frac{Cs}{PEF}$$

Where,

Ca = concentration of COPC in air (mg/m^3)
Cs = concentration of COPC in soil (mg/kg)
PEF = particulate emission factor (m^3/kg)

Chemical	CTE Soil Concentration[a] (mg/kg)	RME Soil Concentration[a] (mg/kg)	CTE Air Concentration (mg/m^3)	RME Air Concentration (mg/m^3)
Non-Volatile COPCs in Soils (0-2 feet bgs)				
Inorganic Compounds				
Barium	2.2E+02	9.6E+02	4.1E-08	1.8E-07
Cadmium	1.8E+00	1.3E+01	3.4E-10	2.5E-09
Chromium	2.3E+01	4.1E+01	4.4E-09	7.7E-09
Copper	2.9E+01	8.2E+01	5.5E-09	1.6E-08
Lead	2.6E+01	3.5E+01	4.9E-09	6.7E-09
Mercury	1.2E-01	6.4E-01	2.3E-11	1.2E-10
Molybdenum	3.4E+00	6.0E+00	6.4E-10	1.1E-09
Nickel	2.2E+01	5.7E+01	4.2E-09	1.1E-08
Selenium	1.7E+00	3.0E+00	3.2E-10	5.7E-10
Silver	1.5E+01	9.6E+01	2.9E-09	1.8E-08
Zinc	5.4E+02	2.8E+03	1.0E-07	5.3E-07
SVOCs				
Benzo(a)anthracene	3.6E-02	1.2E-02	6.9E-12	2.3E-12
Benzo(a)pyrene	4.0E-02	4.3E-02	7.6E-12	8.2E-12
Benzo(b)fluoranthene	4.3E-02	6.5E-02	8.3E-12	1.2E-11
Benzo(g,h,i)perylene	3.9E-02	3.1E-02	7.4E-12	5.9E-12
Benzo(k)fluoranthene	3.6E-02	1.2E-02	6.9E-12	2.3E-12
Chrysene	4.0E-02	2.7E-02	7.5E-12	5.1E-12
Dibenz(a,h)anthracene	3.6E-02	8.0E-03	6.9E-12	1.5E-12
Fluoranthene	4.3E-02	3.6E-02	8.1E-12	6.9E-12
Indeno(1,2,3-cd)pyrene	4.1E-02	5.3E-02	7.8E-12	1.0E-11
Phenanthrene	3.7E-02	1.4E-02	7.0E-12	2.7E-12
Pyrene	4.3E-02	4.3E-02	8.1E-12	8.2E-12
PCDD/PCDFs				
2,3,7,8-TCDD	5.6E-06	3.4E-05	1.1E-15	6.6E-15
1,2,3,7,8-PeCDD	1.6E-05	9.0E-05	3.1E-15	1.7E-14
1,2,3,4,7,8-HxCDD	4.1E-05	1.0E-04	7.8E-15	2.0E-14
1,2,3,6,7,8-HxCDD	2.0E-04	5.4E-04	3.8E-14	1.0E-13
1,2,3,7,8,9-HxCDD	7.1E-05	4.7E-04	1.4E-14	9.0E-14
1,2,3,4,6,7,8-HpCDD	4.7E-03	1.2E-02	9.0E-13	2.3E-12
OCDD	5.4E-02	1.4E-01	1.0E-11	2.6E-11
2,3,7,8-TCDF	3.1E-06	5.7E-06	5.9E-16	1.1E-15
1,2,3,7,8-PeCDF	3.6E-06	1.0E-05	6.8E-16	1.9E-15
2,3,4,7,8-PeCDF	8.8E-06	1.7E-05	1.7E-15	3.3E-15
1,2,3,4,7,8-HxCDF	2.7E-05	6.3E-05	5.2E-15	1.2E-14
1,2,3,6,7,8-HxCDF	2.1E-05	4.9E-05	4.0E-15	9.3E-15
2,3,4,6,7,8-HxCDF	4.3E-05	1.1E-04	8.2E-15	2.0E-14
1,2,3,7,8,9-HxCDF	6.9E-06	1.4E-05	1.3E-15	2.7E-15
1,2,3,4,6,7,8-HpCDF	7.7E-04	2.0E-03	1.5E-13	3.8E-13
1,2,3,4,7,8,9-HpCDF	7.2E-05	1.8E-04	1.4E-14	3.5E-14
OCDF	2.0E-03	5.1E-03	3.9E-13	9.7E-13

Estimation of Fugitive Dust Exposure Point Concentrations
New Conservation Yard RFI Site

$$Ca = \frac{Cs}{PEF}$$

Where,

Ca = concentration of COPC in air (mg/m^3)
Cs = concentration of COPC in soil (mg/kg)
PEF = particulate emission factor (m^3/kg)

Chemical	CTE Soil Concentration[a] (mg/kg)	RME Soil Concentration[a] (mg/kg)	CTE Air Concentration (mg/m^3)	RME Air Concentration (mg/m^3)
Aroclor-1254	9.7E-02	7.1E-02	1.9E-11	1.4E-11
PCB-105	1.5E-05	2.1E-05	2.9E-15	4.0E-15
PCB-114	5.7E-07	7.7E-07	1.1E-16	1.5E-16
PCB-118	3.4E-05	4.6E-05	6.4E-15	8.7E-15
PCB-123	3.7E-07	5.1E-07	7.1E-17	9.7E-17
PCB-126	9.4E-07	1.3E-06	1.8E-16	2.5E-16
PCB-156	7.9E-06	1.1E-05	1.5E-15	2.0E-15
PCB-157	2.6E-06	2.7E-06	4.9E-16	5.2E-16
PCB-167	4.4E-06	4.7E-06	8.4E-16	9.0E-16
PCB-169	6.8E-08	7.5E-08	1.3E-17	1.4E-17
PCB-189	6.5E-07	7.0E-07	1.2E-16	1.3E-16
PCB-77	1.9E-06	2.6E-06	3.7E-16	5.0E-16
PCB-81	3.7E-07	5.1E-07	7.1E-17	9.7E-17

Estimation of Fugitive Dust Exposure Point Concentrations
New Conservation Yard RFI Site

$$Ca = \frac{Cs}{PEF}$$

Where,

Ca = concentration of COPC in air (mg/m^3)
Cs = concentration of COPC in soil (mg/kg)
PEF = particulate emission factor (m^3/kg)

Chemical	CTE Soil Concentration[a] (mg/kg)	RME Soil Concentration[a] (mg/kg)	CTE Air Concentration (mg/m^3)	RME Air Concentration (mg/m^3)
Non-Volatile COPCs in Soils (0-10 feet bgs)				
Inorganic Compounds				
Barium	2.0E+02	4.7E+02	3.7E-08	8.9E-08
Cadmium	1.6E+00	1.1E+01	3.0E-10	2.1E-09
Chromium	2.2E+01	2.8E+01	4.3E-09	5.3E-09
Copper	2.5E+01	6.9E+01	4.8E-09	1.3E-08
Lead	2.3E+01	3.1E+01	4.4E-09	6.0E-09
Mercury	1.2E-01	5.4E-01	2.3E-11	1.0E-10
Molybdenum	3.7E+00	6.0E+00	7.1E-10	1.1E-09
Nickel	2.0E+01	4.8E+01	3.9E-09	9.2E-09
Selenium	1.9E+00	3.0E+00	3.6E-10	5.7E-10
Silver	1.3E+01	8.3E+01	2.5E-09	1.6E-08
Zinc	4.5E+02	2.3E+03	8.5E-08	4.3E-07
SVOCs				
Benzo(a)anthracene	4.6E-02	1.2E-02	8.7E-12	2.3E-12
Benzo(a)pyrene	4.8E-02	4.3E-02	9.1E-12	8.2E-12
Benzo(b)fluoranthene	5.0E-02	6.5E-02	9.6E-12	1.2E-11
Benzo(g,h,i)perylene	4.7E-02	3.1E-02	9.0E-12	5.9E-12
Benzo(k)fluoranthene	4.6E-02	1.2E-02	8.7E-12	2.3E-12
Chrysene	4.8E-02	2.7E-02	9.1E-12	5.1E-12
Dibenz(a,h)anthracene	4.5E-02	8.0E-03	8.7E-12	1.5E-12
Fluoranthene	5.0E-02	3.6E-02	9.5E-12	6.9E-12
Indeno(1,2,3-cd)pyrene	4.9E-02	5.3E-02	9.3E-12	1.0E-11
Phenanthrene	4.6E-02	1.4E-02	8.7E-12	2.7E-12
Pyrene	5.0E-02	4.3E-02	9.5E-12	8.2E-12
Total Petroleum Hydrocarbons				
PCDD/PCDFs				
2,3,7,8-TCDD	5.0E-06	2.9E-05	9.6E-16	5.6E-15
1,2,3,7,8-PeCDD	1.5E-05	9.0E-05	2.8E-15	1.7E-14
1,2,3,4,7,8-HxCDD	3.6E-05	8.8E-05	6.9E-15	1.7E-14
1,2,3,6,7,8-HxCDD	1.8E-04	4.6E-04	3.4E-14	8.7E-14
1,2,3,7,8,9-HxCDD	6.4E-05	4.7E-04	1.2E-14	9.0E-14
1,2,3,4,6,7,8-HpCDD	4.4E-03	1.0E-02	8.5E-13	1.9E-12
OCDD	4.9E-02	1.2E-01	9.3E-12	2.2E-11
2,3,7,8-TCDF	2.8E-06	5.2E-06	5.3E-16	9.9E-16
1,2,3,7,8-PeCDF	3.2E-06	1.0E-05	6.1E-16	1.9E-15
2,3,4,7,8-PeCDF	7.8E-06	1.5E-05	1.5E-15	2.9E-15
1,2,3,4,7,8-HxCDF	2.4E-05	5.4E-05	4.6E-15	1.0E-14
1,2,3,6,7,8-HxCDF	1.9E-05	4.2E-05	3.6E-15	8.0E-15
2,3,4,6,7,8-HxCDF	3.9E-05	9.1E-05	7.4E-15	1.7E-14
1,2,3,7,8,9-HxCDF	6.2E-06	1.2E-05	1.2E-15	2.3E-15
1,2,3,4,6,7,8-HpCDF	8.0E-04	1.9E-03	1.5E-13	3.6E-13
1,2,3,4,7,8,9-HpCDF	1.8E-04	4.9E-04	3.4E-14	9.3E-14
OCDF	1.8E-03	4.4E-03	3.5E-13	8.4E-13
Total Tetra	7.8E-06	1.5E-05	1.5E-15	2.9E-15
Total Penta	2.6E-05	1.3E-04	4.9E-15	2.5E-14
Total Hexa	3.7E-04	8.7E-04	7.0E-14	1.7E-13
Total Hepta	5.0E-03	1.2E-02	9.5E-13	2.3E-12
Total Octa	5.1E-02	1.2E-01	9.6E-12	2.3E-11
Aroclor-1254	9.7E-02	7.1E-02	1.9E-11	1.4E-11

Estimation of Fugitive Dust Exposure Point Concentrations
New Conservation Yard RFI Site

$$Ca = \frac{Cs}{PEF}$$

Where,

Ca = concentration of COPC in air (mg/m^3)
Cs = concentration of COPC in soil (mg/kg)
PEF = particulate emission factor (m^3/kg)

Chemical	CTE Soil Concentration[a] (mg/kg)	RME Soil Concentration[a] (mg/kg)	CTE Air Concentration (mg/m^3)	RME Air Concentration (mg/m^3)
PCB-105	1.5E-05	2.1E-05	2.9E-15	4.0E-15
PCB-114	5.7E-07	7.7E-07	1.1E-16	1.5E-16
PCB-118	3.4E-05	4.6E-05	6.4E-15	8.7E-15
PCB-123	3.7E-07	5.1E-07	7.1E-17	9.7E-17
PCB-126	9.4E-07	1.3E-06	1.8E-16	2.5E-16
PCB-156	7.9E-06	1.1E-05	1.5E-15	2.0E-15
PCB-157	2.6E-06	2.7E-06	4.9E-16	5.2E-16
PCB-167	4.4E-06	4.7E-06	8.4E-16	9.0E-16
PCB-169	6.8E-08	7.5E-08	1.3E-17	1.4E-17
PCB-189	6.5E-07	7.0E-07	1.2E-16	1.3E-16
PCB-77	1.9E-06	2.6E-06	3.7E-16	5.0E-16
PCB-81	3.7E-07	5.1E-07	7.1E-17	9.7E-17

Notes:
a. Exposure point concentrations as presented in Spreadsheets C1-10 and C1-11 for soil at 0 to 2 and 0 to 10 feet bgs, respectively.
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyl
PCDD/PCDF - polychlorinated dibenzo-p-dioxins and dibenzofurans
CTE - Central Tendency Exposure
RME - Reasonable Maximum Exposure
bgs - below ground surface
mg/kg - milligram per kilogram
mg/m^3 - milligram per cubic meter

Spreadsheet C1-18 (1 of 1)

Estimation of Particulate Emission Factor (PEF)
New Conservation Yard RFI Site

$$PEF = \frac{LS\,x\,V\,x\,3{,}600\,\mathrm{sec}/hour}{A}\,x\,\frac{1{,}000\,g/kg}{0.036\,x\,(1-G)\,x\left(\frac{U_m}{U_t}\right)3\,x\,F(x)}$$

PEF Parameters	Value	Units
PEF = particulate emission factor	5.2E+09	m^3/kg
LS = width of the contaminated area (site-specific)[a]	90	m
V = wind speed in the mixing zone (site specific)[b]	1.78	m/s
A = area of contaminated area (site-specific)[a]	8,094	m^2
G = fraction of vegetative/paved road/building cover (USEPA default)[b]	0.50	unitless
0.036 = respirable fraction (USEPA default)[b]	0.036	g/m^2-hr
U_m = annual windspeed (site-specific)[b]	1.78	m/s
U_t = equivalent threshold of windspeed at 7 m (USEPA default)[b]	11.32	m/s
F(x) = function dependent on Um/Ut (USEPA default)[b]	0.19	unitless

Notes:
a. Based on the total area of non-volatile COPC contamination.
b. SRAM (MWH 2005)
COPC - chemical of potential concern

Aroclor to PCB Congener Extrapolation for Soil/Sediment (0-10 feet bgs)
New Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentrations (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF_{1254}	EF_{1260}	Estimated Concentrations Aroclor-1254 (mg/kg)	Estimated Concentrations Aroclor-1260 (mg/kg)	Estimated Concentrations PCB_{MAX} (mg/kg)
Aroclor-1254	MJ775	1.9E-01	9.5E-02	U	-	-	-	-	-
Aroclor-1260	MJ775	1.9E-01	9.5E-02	U	-	-	-	-	-
PCB-105	MJ775	-	-	-	1.2E-01	8.2E-02	1.2E-05	7.8E-06	1.2E-05
PCB-114	MJ775	-	-	-	4.5E-03	1.5E-03	4.3E-07	1.4E-07	4.3E-07
PCB-118	MJ775	-	-	-	2.7E-01	1.6E-01	2.5E-05	1.6E-05	2.5E-05
PCB-123	MJ775	-	-	-	3.0E-03	2.3E-03	2.8E-07	2.2E-07	2.8E-07
PCB-126	MJ775	-	-	-	7.5E-03	6.4E-03	7.1E-07	6.0E-07	7.1E-07
PCB-156	MJ775	-	-	-	6.3E-02	5.5E-02	6.0E-06	5.2E-06	6.0E-06
PCB-157	MJ775	-	-	-	1.2E-02	2.5E-02	1.2E-06	2.3E-06	2.3E-06
PCB-167	MJ775	-	-	-	2.1E-02	4.3E-02	2.0E-06	4.1E-06	4.1E-06
PCB-169	MJ775	-	-	-	3.7E-04	6.4E-04	3.5E-08	6.0E-08	6.0E-08
PCB-189	MJ775	-	-	-	3.0E-03	6.4E-03	2.8E-07	6.0E-07	6.0E-07
PCB-77	MJ775	-	-	-	1.5E-02	1.3E-02	1.5E-06	1.2E-06	1.5E-06
PCB-81	MJ775	-	-	-	3.0E-03	2.3E-03	2.8E-07	2.1E-07	2.8E-07
Aroclor-1254	MJ724	2.0E-01	1.0E-01	U	-	-	-	-	-
Aroclor-1260	MJ724	2.0E-01	1.0E-01	U	-	-	-	-	-
PCB-105	MJ724	-	-	-	1.2E-01	8.2E-02	1.2E-05	8.2E-06	1.2E-05
PCB-114	MJ724	-	-	-	4.5E-03	1.5E-03	4.5E-07	1.5E-07	4.5E-07
PCB-118	MJ724	-	-	-	2.7E-01	1.6E-01	2.7E-05	1.6E-05	2.7E-05
PCB-123	MJ724	-	-	-	3.0E-03	2.3E-03	3.0E-07	2.3E-07	3.0E-07
PCB-126	MJ724	-	-	-	7.5E-03	6.4E-03	7.5E-07	6.4E-07	7.5E-07
PCB-156	MJ724	-	-	-	6.3E-02	5.5E-02	6.3E-06	5.5E-06	6.3E-06
PCB-157	MJ724	-	-	-	1.2E-02	2.5E-02	1.2E-06	2.5E-06	2.5E-06
PCB-167	MJ724	-	-	-	2.1E-02	4.3E-02	2.1E-06	4.3E-06	4.3E-06
PCB-169	MJ724	-	-	-	3.7E-04	6.4E-04	3.7E-08	6.4E-08	6.4E-08
PCB-189	MJ724	-	-	-	3.0E-03	6.4E-03	3.0E-07	6.4E-07	6.4E-07
PCB-77	MJ724	-	-	-	1.5E-02	1.3E-02	1.5E-06	1.3E-06	1.5E-06
PCB-81	MJ724	-	-	-	3.0E-03	2.3E-03	3.0E-07	2.3E-07	3.0E-07
Aroclor-1254	MJ734	2.1E-01	1.1E-01	U	-	-	-	-	-
Aroclor-1260	MJ734	2.1E-01	1.1E-01	U	-	-	-	-	-
PCB-105	MJ734	-	-	-	1.2E-01	8.2E-02	1.3E-05	8.6E-06	1.3E-05
PCB-114	MJ734	-	-	-	4.5E-03	1.5E-03	4.8E-07	1.5E-07	4.8E-07
PCB-118	MJ734	-	-	-	2.7E-01	1.6E-01	2.8E-05	1.7E-05	2.8E-05
PCB-123	MJ734	-	-	-	3.0E-03	2.3E-03	3.1E-07	2.4E-07	3.1E-07
PCB-126	MJ734	-	-	-	7.5E-03	6.4E-03	7.9E-07	6.7E-07	7.9E-07
PCB-156	MJ734	-	-	-	6.3E-02	5.5E-02	6.6E-06	5.7E-06	6.6E-06
PCB-157	MJ734	-	-	-	1.2E-02	2.5E-02	1.3E-06	2.6E-06	2.6E-06
PCB-167	MJ734	-	-	-	2.1E-02	4.3E-02	2.2E-06	4.5E-06	4.5E-06
PCB-169	MJ734	-	-	-	3.7E-04	6.4E-04	3.8E-08	6.7E-08	6.7E-08
PCB-189	MJ734	-	-	-	3.0E-03	6.4E-03	3.1E-07	6.7E-07	6.7E-07
PCB-77	MJ734	-	-	-	1.5E-02	1.3E-02	1.6E-06	1.3E-06	1.6E-06
PCB-81	MJ734	-	-	-	3.0E-03	2.3E-03	3.1E-07	2.4E-07	3.1E-07
Aroclor-1254	MJ619	2.1E-01	2.1E-01	J	-	-	-	-	-
Aroclor-1260	MJ619	0.0E+00	0.0E+00	U	-	-	-	-	-
PCB-105	MJ619	-	-	-	1.2E-01	8.2E-02	2.6E-05	0.0E+00	2.6E-05
PCB-114	MJ619	-	-	-	4.5E-03	1.5E-03	9.5E-07	0.0E+00	9.5E-07
PCB-118	MJ619	-	-	-	2.7E-01	1.6E-01	5.6E-05	0.0E+00	5.6E-05
PCB-123	MJ619	-	-	-	3.0E-03	2.3E-03	6.3E-07	0.0E+00	6.3E-07
PCB-126	MJ619	-	-	-	7.5E-03	6.4E-03	1.6E-06	0.0E+00	1.6E-06
PCB-156	MJ619	-	-	-	6.3E-02	5.5E-02	1.3E-05	0.0E+00	1.3E-05
PCB-157	MJ619	-	-	-	1.2E-02	2.5E-02	2.6E-06	0.0E+00	2.6E-06
PCB-167	MJ619	-	-	-	2.1E-02	4.3E-02	4.3E-06	0.0E+00	4.3E-06
PCB-169	MJ619	-	-	-	3.7E-04	6.4E-04	7.7E-08	0.0E+00	7.7E-08

Aroclor to PCB Congener Extrapolation for Soil/Sediment (0-10 feet bgs)
New Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentrations (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF_{1254}	EF_{1260}	Estimated Concentrations Aroclor-1254 (mg/kg)	Estimated Concentrations Aroclor-1260 (mg/kg)	Estimated Concentrations PCB_{MAX} (mg/kg)
PCB-189	MJ619	-	-	-	3.0E-03	6.4E-03	6.3E-07	0.0E+00	6.3E-07
PCB-77	MJ619	-	-	-	1.5E-02	1.3E-02	3.2E-06	0.0E+00	3.2E-06
PCB-81	MJ619	-	-	-	3.0E-03	2.3E-03	6.3E-07	0.0E+00	6.3E-07
Aroclor-1254	MJ728	2.3E-01	1.2E-01	U	-	-	-	-	-
Aroclor-1260	MJ728	2.3E-01	1.2E-01	U	-	-	-	-	-
PCB-105	MJ728	-	-	-	1.2E-01	8.2E-02	1.4E-05	9.4E-06	1.4E-05
PCB-114	MJ728	-	-	-	4.5E-03	1.5E-03	5.2E-07	1.7E-07	5.2E-07
PCB-118	MJ728	-	-	-	2.7E-01	1.6E-01	3.1E-05	1.9E-05	3.1E-05
PCB-123	MJ728	-	-	-	3.0E-03	2.3E-03	3.4E-07	2.7E-07	3.4E-07
PCB-126	MJ728	-	-	-	7.5E-03	6.4E-03	8.7E-07	7.3E-07	8.7E-07
PCB-156	MJ728	-	-	-	6.3E-02	5.5E-02	7.2E-06	6.3E-06	7.2E-06
PCB-157	MJ728	-	-	-	1.2E-02	2.5E-02	1.4E-06	2.8E-06	2.8E-06
PCB-167	MJ728	-	-	-	2.1E-02	4.3E-02	2.4E-06	4.9E-06	4.9E-06
PCB-169	MJ728	-	-	-	3.7E-04	6.4E-04	4.2E-08	7.3E-08	7.3E-08
PCB-189	MJ728	-	-	-	3.0E-03	6.4E-03	3.4E-07	7.3E-07	7.3E-07
PCB-77	MJ728	-	-	-	1.5E-02	1.3E-02	1.8E-06	1.5E-06	1.8E-06
PCB-81	MJ728	-	-	-	3.0E-03	2.3E-03	3.4E-07	2.6E-07	3.4E-07

Notes:
PCBs - polychlorinated biphenyls
EF- Extrapolation Factor (ng congener/kg soil)/(µg Aroclor/kg soil)
"-" not applicable
mg/kg - milligrams per kilogram
ug/kg - micrograms per kilogram
ng/kg - nanograms per kilogram
bgs- below ground surface
PCB_{MAX} = the maximum of the extrapolated 1254 and 1260 concentrations

Aroclor to PCB Congener Extrapolation for Soil/Sediment (0-2 feet bgs)
New Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentrations (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF_{1254}	EF_{1260}	Estimated Concentrations Aroclor 1254 (mg/kg)	Estimated Concentrations Aroclor 1260 (mg/kg)	Estimated Concentrations PCB_{MAX} (mg/kg)
Aroclor-1254	MJ775	1.9E-01	9.5E-02	U	-	-	-	-	-
Aroclor-1260	MJ775	1.9E-01	9.5E-02	U	-	-	-	-	-
PCB-105	MJ775	-	-	-	1.2E-01	8.2E-02	1.2E-05	7.8E-06	1.2E-05
PCB-114	MJ775	-	-	-	4.5E-03	1.5E-03	4.3E-07	1.4E-07	4.3E-07
PCB-118	MJ775	-	-	-	2.7E-01	1.6E-01	2.5E-05	1.6E-05	2.5E-05
PCB-123	MJ775	-	-	-	3.0E-03	2.3E-03	2.8E-07	2.2E-07	2.8E-07
PCB-126	MJ775	-	-	-	7.5E-03	6.4E-03	7.1E-07	6.0E-07	7.1E-07
PCB-156	MJ775	-	-	-	6.3E-02	5.5E-02	6.0E-06	5.2E-06	6.0E-06
PCB-157	MJ775	-	-	-	1.2E-02	2.5E-02	1.2E-06	2.3E-06	2.3E-06
PCB-167	MJ775	-	-	-	2.1E-02	4.3E-02	2.0E-06	4.1E-06	4.1E-06
PCB-169	MJ775	-	-	-	3.7E-04	6.4E-04	3.5E-08	6.0E-08	6.0E-08
PCB-189	MJ775	-	-	-	3.0E-03	6.4E-03	2.8E-07	6.0E-07	6.0E-07
PCB-77	MJ775	-	-	-	1.5E-02	1.3E-02	1.5E-06	1.2E-06	1.5E-06
PCB-81	MJ775	-	-	-	3.0E-03	2.3E-03	2.8E-07	2.1E-07	2.8E-07
Aroclor-1254	MJ724	2.0E-01	1.0E-01	U	-	-	-	-	-
Aroclor-1260	MJ724	2.0E-01	1.0E-01	U	-	-	-	-	-
PCB-105	MJ724	-	-	-	1.2E-01	8.2E-02	1.2E-05	8.2E-06	1.2E-05
PCB-114	MJ724	-	-	-	4.5E-03	1.5E-03	4.5E-07	1.5E-07	4.5E-07
PCB-118	MJ724	-	-	-	2.7E-01	1.6E-01	2.7E-05	1.6E-05	2.7E-05
PCB-123	MJ724	-	-	-	3.0E-03	2.3E-03	3.0E-07	2.3E-07	3.0E-07
PCB-126	MJ724	-	-	-	7.5E-03	6.4E-03	7.5E-07	6.4E-07	7.5E-07
PCB-156	MJ724	-	-	-	6.3E-02	5.5E-02	6.3E-06	5.5E-06	6.3E-06
PCB-157	MJ724	-	-	-	1.2E-02	2.5E-02	1.2E-06	2.5E-06	2.5E-06
PCB-167	MJ724	-	-	-	2.1E-02	4.3E-02	2.1E-06	4.3E-06	4.3E-06
PCB-169	MJ724	-	-	-	3.7E-04	6.4E-04	3.7E-08	6.4E-08	6.4E-08
PCB-189	MJ724	-	-	-	3.0E-03	6.4E-03	3.0E-07	6.4E-07	6.4E-07
PCB-77	MJ724	-	-	-	1.5E-02	1.3E-02	1.5E-06	1.3E-06	1.5E-06
PCB-81	MJ724	-	-	-	3.0E-03	2.3E-03	3.0E-07	2.3E-07	3.0E-07
Aroclor-1254	MJ734	2.1E-01	1.1E-01	U	-	-	-	-	-
Aroclor-1260	MJ734	2.1E-01	1.1E-01	U	-	-	-	-	-
PCB-105	MJ734	-	-	-	1.2E-01	8.2E-02	1.3E-05	8.6E-06	1.3E-05
PCB-114	MJ734	-	-	-	4.5E-03	1.5E-03	4.8E-07	1.5E-07	4.8E-07
PCB-118	MJ734	-	-	-	2.7E-01	1.6E-01	2.8E-05	1.7E-05	2.8E-05
PCB-123	MJ734	-	-	-	3.0E-03	2.3E-03	3.1E-07	2.4E-07	3.1E-07
PCB-126	MJ734	-	-	-	7.5E-03	6.4E-03	7.9E-07	6.7E-07	7.9E-07
PCB-156	MJ734	-	-	-	6.3E-02	5.5E-02	6.6E-06	5.7E-06	6.6E-06
PCB-157	MJ734	-	-	-	1.2E-02	2.5E-02	1.3E-06	2.6E-06	2.6E-06
PCB-167	MJ734	-	-	-	2.1E-02	4.3E-02	2.2E-06	4.5E-06	4.5E-06
PCB-169	MJ734	-	-	-	3.7E-04	6.4E-04	3.8E-08	6.7E-08	6.7E-08
PCB-189	MJ734	-	-	-	3.0E-03	6.4E-03	3.1E-07	6.7E-07	6.7E-07
PCB-77	MJ734	-	-	-	1.5E-02	1.3E-02	1.6E-06	1.3E-06	1.6E-06
PCB-81	MJ734	-	-	-	3.0E-03	2.3E-03	3.1E-07	2.4E-07	3.1E-07
Aroclor-1254	MJ619	2.1E-01	2.1E-01	J	-	-	-	-	-
Aroclor-1260	MJ619	0.0E+00	0.0E+00	U	-	-	-	-	-
PCB-105	MJ619	-	-	-	1.2E-01	8.2E-02	2.6E-05	0.0E+00	2.6E-05
PCB-114	MJ619	-	-	-	4.5E-03	1.5E-03	9.5E-07	0.0E+00	9.5E-07
PCB-118	MJ619	-	-	-	2.7E-01	1.6E-01	5.6E-05	0.0E+00	5.6E-05
PCB-123	MJ619	-	-	-	3.0E-03	2.3E-03	6.3E-07	0.0E+00	6.3E-07
PCB-126	MJ619	-	-	-	7.5E-03	6.4E-03	1.6E-06	0.0E+00	1.6E-06
PCB-156	MJ619	-	-	-	6.3E-02	5.5E-02	1.3E-05	0.0E+00	1.3E-05
PCB-157	MJ619	-	-	-	1.2E-02	2.5E-02	2.6E-06	0.0E+00	2.6E-06
PCB-167	MJ619	-	-	-	2.1E-02	4.3E-02	4.3E-06	0.0E+00	4.3E-06
PCB-169	MJ619	-	-	-	3.7E-04	6.4E-04	7.7E-08	0.0E+00	7.7E-08

Aroclor to PCB Congener Extrapolation for Soil/Sediment (0-2 feet bgs)
New Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentrations (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF_{1254}	EF_{1260}	Estimated Concentrations Aroclor 1254 (mg/kg)	Estimated Concentrations Aroclor 1260 (mg/kg)	Estimated Concentrations PCB_{MAX} (mg/kg)
PCB-189	MJ619	-	-	-	3.0E-03	6.4E-03	6.3E-07	0.0E+00	6.3E-07
PCB-77	MJ619	-	-	-	1.5E-02	1.3E-02	3.2E-06	0.0E+00	3.2E-06
PCB-81	MJ619	-	-	-	3.0E-03	2.3E-03	6.3E-07	0.0E+00	6.3E-07
Aroclor-1254	MJ728	2.3E-01	1.2E-01	U	-	-	-	-	-
Aroclor-1260	MJ728	2.3E-01	1.2E-01	U	-	-	-	-	-
PCB-105	MJ728	-	-	-	1.2E-01	8.2E-02	1.4E-05	9.4E-06	1.4E-05
PCB-114	MJ728	-	-	-	4.5E-03	1.5E-03	5.2E-07	1.7E-07	5.2E-07
PCB-118	MJ728	-	-	-	2.7E-01	1.6E-01	3.1E-05	1.9E-05	3.1E-05
PCB-123	MJ728	-	-	-	3.0E-03	2.3E-03	3.4E-07	2.7E-07	3.4E-07
PCB-126	MJ728	-	-	-	7.5E-03	6.4E-03	8.7E-07	7.3E-07	8.7E-07
PCB-156	MJ728	-	-	-	6.3E-02	5.5E-02	7.2E-06	6.3E-06	7.2E-06
PCB-157	MJ728	-	-	-	1.2E-02	2.5E-02	1.4E-06	2.8E-06	2.8E-06
PCB-167	MJ728	-	-	-	2.1E-02	4.3E-02	2.4E-06	4.9E-06	4.9E-06
PCB-169	MJ728	-	-	-	3.7E-04	6.4E-04	4.2E-08	7.3E-08	7.3E-08
PCB-189	MJ728	-	-	-	3.0E-03	6.4E-03	3.4E-07	7.3E-07	7.3E-07
PCB-77	MJ728	-	-	-	1.5E-02	1.3E-02	1.8E-06	1.5E-06	1.8E-06
PCB-81	MJ728	-	-	-	3.0E-03	2.3E-03	3.4E-07	2.6E-07	3.4E-07

Notes:
PCBs - polychlorinated biphenyls
EF- Extrapolation Factor (ng congener/kg soil)/(µg Aroclor/kg soil)
"-" not applicable
mg/kg - milligrams per kilogram
ug/kg - micrograms per kilogram
ng/kg - nanograms per kilogram
bgs- below ground surface
PCB_{MAX} = the maximum of the extrapolated 1254 and 1260 concentrations

Spreadsheet C1-13b (1 of 1)

Exposure Point Concentrations for COPCs in Chatsworth Groundwater - In-Direct Contact
New Conservation Yard RFI Site

Chemical	Distribution Type	EPCs	
		CTE[a] (mg/L)	RME[b] (mg/L)
VOCs			
Acetone	NT	1.6E-02	1.6E-02
Toluene	NT	1.8E-03	1.8E-03
Trichloroethene	NT	5.3E-04	5.3E-04

Notes:
a. Either the arithmetic mean concentration for two or more samples or the reported concentration for a single sample.
b. The maximum detected concentration.
COPC - chemical of potential concern
EPC - exposure point concentration
CTE - Central Tendency Exposure
RME - Reasonable Maximum Exposure
VOC - volatile organic compound
NT - data not tested for distribution due to sample size
"-" not applicable
mg/L - milligrams per liter
bgs - below ground surface

Spreadsheet C1-13a (1 of 1)

Exposure Point Concentrations for COPCs in Chatsworth Formation
Group 6 Bundle

Chemical	Distribution Type	EPCs	
		CTE[a] (mg/L)	RME[a] (mg/L)
Inorganic Compounds			
Copper	NT	1.8E-02	1.8E-02
Fluoride	NT	5.6E-01	5.6E-01
Nitrate	NT	1.4E+01	1.4E+01
Thallium	NT	5.4E-04	5.4E-04
VOCs			
1,1-Dichloroethane	NT	2.6E-03	2.6E-03
1,2-Dichloroethane	NT	9.0E-04	9.0E-04
Acetone	NT	1.6E-02	1.6E-02
Benzene	NT	5.8E-04	5.8E-04
Carbon disulfide	NT	2.6E-03	2.6E-03
Chloromethane	NT	3.2E-04	3.2E-04
cis-1,2-Dichloroethene	NT	5.1E-02	5.1E-02
Methylene chloride	NT	6.4E-04	6.4E-04
Toluene	NT	1.8E-03	1.8E-03
Trichloroethene	NT	1.0E-02	1.0E-02
Total Petroleum Hydrocarbons			
C14-C20(Diesel Range)	NT	5.0E-02	5.0E-02

Notes:
a. The maximum detected concentration.
COPC - chemical of potential concern
EPC - exposure point concentration
CTE - Central Tendency Exposure
RME - Reasonable Maximum Exposure
VOC - volatile organic compound
NT - data not tested for distribution due to sample size
"-" not applicable
mg/L - milligrams per liter
bgs - below ground surface

Exposure Point Concentrations for COPCs in Soil/Sediment (0-10 feet bgs)
New Conservation Yard RFI Site

Chemical	Distribution Type	EPCs CTE[a] (mg/kg)	EPCs RME[b] (mg/kg)	
Inorganic Compounds				
Barium	NP	2.0E+02	4.7E+02	
Cadmium	NP	1.6E+00	1.1E+01	
Chromium	NP	2.2E+01	2.8E+01	
Copper	NP	2.5E+01	6.9E+01	
Lead	LN	2.3E+01	3.1E+01	
Mercury	NP	1.2E-01	5.4E-01	
Molybdenum	NT	3.7E+00	6.0E+00	c
Nickel	NP	2.0E+01	4.8E+01	
Selenium	NT	1.9E+00	3.0E+00	c
Silver	NP	1.3E+01	8.3E+01	
Zinc	NP	4.5E+02	2.3E+03	
VOCs				
Toluene	NP	3.9E-02	1.0E-01	
SVOCs				
Benzo(a)anthracene	NP	4.6E-02	1.2E-02	
Benzo(a)pyrene	NP	4.8E-02	4.3E-02	
Benzo(b)fluoranthene	NP	5.0E-02	6.5E-02	
Benzo(g,h,i)perylene	NP	4.7E-02	3.1E-02	
Benzo(k)fluoranthene	NP	4.6E-02	1.2E-02	
Chrysene	NP	4.8E-02	2.7E-02	
Dibenz(a,h)anthracene	NP	4.5E-02	8.0E-03	
Fluoranthene	NP	5.0E-02	3.6E-02	
Indeno(1,2,3-cd)pyrene	NP	4.9E-02	5.3E-02	
Phenanthrene	NP	4.6E-02	1.4E-02	
Pyrene	NP	5.0E-02	4.3E-02	
Total Petroleum Hydrocarbons				
PCDD/PCDFs				
2,3,7,8-TCDD	LN	5.0E-06	2.9E-05	
1,2,3,7,8-PeCDD	LN	1.5E-05	9.0E-05	
1,2,3,4,7,8-HxCDD	G	3.6E-05	8.8E-05	
1,2,3,6,7,8-HxCDD	G	1.8E-04	4.6E-04	
1,2,3,7,8,9-HxCDD	LN	6.4E-05	4.7E-04	
1,2,3,4,6,7,8-HpCDD	G	4.4E-03	1.0E-02	
OCDD	G	4.9E-02	1.2E-01	
2,3,7,8-TCDF	G	2.8E-06	5.2E-06	
1,2,3,7,8-PeCDF	NT	3.2E-06	1.0E-05	
2,3,4,7,8-PeCDF	G	7.8E-06	1.5E-05	
1,2,3,4,7,8-HxCDF	G	2.4E-05	5.4E-05	
1,2,3,6,7,8-HxCDF	G	1.9E-05	4.2E-05	
2,3,4,6,7,8-HxCDF	G	3.9E-05	9.1E-05	
1,2,3,7,8,9-HxCDF	G	6.2E-06	1.2E-05	
1,2,3,4,6,7,8-HpCDF	G	8.0E-04	1.9E-03	
1,2,3,4,7,8,9-HpCDF	LN	1.8E-04	4.9E-04	
OCDF	G	1.8E-03	4.4E-03	
Aroclor-1254	N	7.1E-02	7.1E-02	
PCB-105	NP	1.5E-05	2.1E-05	
PCB-114	NP	5.7E-07	7.7E-07	
PCB-118	NP	3.4E-05	4.6E-05	
PCB-123	NP	3.7E-07	5.1E-07	
PCB-126	NP	9.4E-07	1.3E-06	
PCB-156	NP	7.9E-06	1.1E-05	
PCB-157	N	2.6E-06	2.7E-06	
PCB-167	N	4.4E-06	4.7E-06	
PCB-169	N	6.8E-08	7.5E-08	
PCB-189	N	6.5E-07	7.0E-07	

Exposure Point Concentrations for COPCs in Soil/Sediment (0-10 feet bgs)
New Conservation Yard RFI Site

Chemical	Distribution Type	EPCs	
		CTE[a] (mg/kg)	RME[b] (mg/kg)
PCB-77	NP	1.9E-06	2.6E-06
PCB-81	NP	3.7E-07	5.1E-07

Notes:

a. Either the arithmetic mean concentration for two or more samples or the reported concentration for a single sample.

b. Either the 95% upper confidence limit (95% UCL) on the arithmetic mean for three or more samples, or the maximum concentration for less than three samples, or the maximum concentration in cases where the 95% UCL exceeds the maximum concentration.

c. Exposure point concentrations estimated at one-half the sample quantitation limit for soil at 0 to 10 feet bgs.
the SRAM and as presented in Spreadsheet C1-15.

COPC - chemical of potential concern
EPC - exposure point concentration
CTE - Central Tendency Exposure
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCDD/PCDF - polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.
Type - distribution based on Omnibus test
N - normal distribution
LN - lognormal distribution
I - inderterminate
NT - data not tested for distribution due to sample size
mg/kg - milligrams per kilogram
bgs - below ground surface

Exposure Point Concentrations for COPCs in Soil/Sediment (0-2 feet bgs)
New Conservation Yard RFI Site

Chemical	Distribution Type	EPCs		
		CTE[a] (mg/kg)	RME[b] (mg/kg)	
Inorganic Compounds				
Barium	NP	2.2E+02	9.6E+02	
Cadmium	NP	1.8E+00	1.3E+01	
Chromium	NP	2.3E+01	4.1E+01	
Copper	NP	2.9E+01	8.2E+01	
Lead	G	2.6E+01	3.5E+01	
Mercury	NP	1.2E-01	6.4E-01	
Molybdenum	NT	3.4E+00	6.0E+00	c
Nickel	NP	2.2E+01	5.7E+01	
Selenium	NT	1.7E+00	3.0E+00	c
Silver	NP	1.5E+01	9.6E+01	
Zinc	NP	5.4E+02	2.8E+03	
VOCs				
Toluene	NT	5.3E-02	1.1E-01	
SVOCs				
Benzo(a)anthracene	NP	3.6E-02	1.2E-02	
Benzo(a)pyrene	NP	4.0E-02	4.3E-02	
Benzo(b)fluoranthene	G	4.3E-02	6.5E-02	
Benzo(g,h,i)perylene	G	3.9E-02	3.1E-02	
Benzo(k)fluoranthene	NP	3.6E-02	1.2E-02	
Chrysene	G	4.0E-02	2.7E-02	
Dibenz(a,h)anthracene	NP	3.6E-02	8.0E-03	
Fluoranthene	G	4.3E-02	3.6E-02	
Indeno(1,2,3-cd)pyrene	NP	4.1E-02	5.3E-02	
Phenanthrene	NP	3.7E-02	1.4E-02	
Pyrene	G	4.3E-02	4.3E-02	
Total Petroleum Hydrocarbons				
PCDD/PCDFs				
2,3,7,8-TCDD	LN	5.6E-06	3.4E-05	
1,2,3,7,8-PeCDD	LN	1.6E-05	9.0E-05	
1,2,3,4,7,8-HxCDD	G	4.1E-05	1.0E-04	
1,2,3,6,7,8-HxCDD	G	2.0E-04	5.4E-04	
1,2,3,7,8,9-HxCDD	LN	7.1E-05	4.7E-04	
1,2,3,4,6,7,8-HpCDD	G	4.7E-03	1.2E-02	
OCDD	G	5.4E-02	1.4E-01	
2,3,7,8-TCDF	G	3.1E-06	5.7E-06	
1,2,3,7,8-PeCDF	LN	3.6E-06	1.0E-05	
2,3,4,7,8-PeCDF	G	8.8E-06	1.7E-05	
1,2,3,4,7,8-HxCDF	G	2.7E-05	6.3E-05	
1,2,3,6,7,8-HxCDF	G	2.1E-05	4.9E-05	
2,3,4,6,7,8-HxCDF	G	4.3E-05	1.1E-04	
1,2,3,7,8,9-HxCDF	G	6.9E-06	1.4E-05	
1,2,3,4,6,7,8-HpCDF	G	7.7E-04	2.0E-03	
1,2,3,4,7,8,9-HpCDF	G	7.2E-05	1.8E-04	
OCDF	G	2.0E-03	5.1E-03	
Aroclor-1254	N	7.1E-02	7.1E-02	
PCB-105	NP	1.5E-05	2.1E-05	
PCB-114	NP	5.7E-07	7.7E-07	
PCB-118	NP	3.4E-05	4.6E-05	
PCB-123	NP	3.7E-07	5.1E-07	
PCB-126	NP	9.4E-07	1.3E-06	
PCB-156	NP	7.9E-06	1.1E-05	
PCB-157	N	2.6E-06	2.7E-06	
PCB-167	N	4.4E-06	4.7E-06	

Exposure Point Concentrations for COPCs in Soil/Sediment (0-2 feet bgs)
New Conservation Yard RFI Site

Chemical	Distribution Type	EPCs	
		CTE[a] (mg/kg)	RME[b] (mg/kg)
PCB-169	N	6.8E-08	7.5E-08
PCB-189	N	6.5E-07	7.0E-07
PCB-77	NP	1.9E-06	2.6E-06
PCB-81	NP	3.7E-07	5.1E-07

Notes:

a. Either the arithmetic mean concentration for two or more samples or the reported concentration for a single sample.

b. Either the 95% upper confidence limit (95% UCL) on the arithmetic mean for three or more samples, or the maximum concentration for less than three samples, or the maximum concentration in cases where the 95% UCL exceeds the maximum concentration.

c. Exposure point concentrations estimated at one-half the sample quantitation limit for soil at 0 to 2 feet bgs.

COPC - chemical of potential concern
EPC - exposure point concentration
CTE - central tendency exposure
RME - reasonable maximum exposure
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCDD/PCDF - polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.
N - normal distribution
LN - lognormal distribution
I - inderterminate
NT - data not tested for distribution due to sample size
mg/kg - milligrams per kilogram
bgs - below ground surface

PCDD/PCDF Congener Group Summation for Soil/Sediment (0-10 feet bgs)
New Conservation Yard RFI Site

EPA ID	PCDD/PCDF Congener	Measured Concentration [a] (mg/kg)	Data Qualifier	Adjusted Concentration [b] (mg/kg)	Sum of PCDD/PCDF Congener Concentrations				
					Total Tetra (mg/kg)	Total Penta (mg/kg)	Total Hexa (mg/kg)	Total Hepta (mg/kg)	Total Octa (mg/kg)
RJ011	1,2,3,4,6,7,8-HpCDD	3.2E-04		3.2E-04	2.6E-06	4.4E-06	3.7E-05	3.9E-04	4.0E-03
RJ011	1,2,3,4,6,7,8-HpCDF	1.1E-04	UJ	5.5E-05					
RJ011	1,2,3,4,7,8,9-HpCDF	1.0E-05	J	1.0E-05					
RJ011	1,2,3,4,7,8-HxCDD	9.6E-07	U	4.8E-07					
RJ011	1,2,3,4,7,8-HxCDF	1.0E-05	J	1.0E-05					
RJ011	1,2,3,6,7,8-HxCDD	1.0E-05	J	1.0E-05					
RJ011	1,2,3,6,7,8-HxCDF	1.0E-05	UJ	5.0E-06					
RJ011	1,2,3,7,8,9-HxCDD	3.2E-06	J	3.2E-06					
RJ011	1,2,3,7,8,9-HxCDF	3.7E-06	J	3.7E-06					
RJ011	1,2,3,7,8-PeCDD	5.5E-07	U	2.8E-07					
RJ011	1,2,3,7,8-PeCDF	1.7E-06	UJ	8.5E-07					
RJ011	2,3,4,6,7,8-HxCDF	4.2E-06	J	4.2E-06					
RJ011	2,3,4,7,8-PeCDF	3.3E-06	J	3.3E-06					
RJ011	2,3,7,8-TCDD	1.3E-06	U	6.5E-07					
RJ011	2,3,7,8-TCDF	1.9E-06	J	1.9E-06					
RJ011	OCDD	3.9E-03		3.9E-03					
RJ011	OCDF	1.2E-04		1.2E-04					
RJ011	Total HpCDD	6.1E-04		6.1E-04					
RJ011	Total HpCDF	1.8E-04		1.8E-04					
RJ011	Total HxCDD	9.0E-05		9.0E-05					
RJ011	Total HxCDF	1.5E-04		1.5E-04					
RJ011	Total PeCDD	4.6E-06	J	4.6E-06					
RJ011	Total PeCDF	1.0E-05	J	1.0E-05					
RJ011	Total TCDD	1.0E-05		1.0E-05					
RJ011	Total TCDF	2.0E-05		2.0E-05					
RJ012	1,2,3,4,6,7,8-HpCDD	2.0E-05		2.0E-05	6.3E-07	9.4E-07	3.4E-06	2.5E-05	2.5E-04
RJ012	1,2,3,4,6,7,8-HpCDF	1.0E-05	UJ	5.0E-06					
RJ012	1,2,3,4,7,8,9-HpCDF	9.2E-07	U	4.6E-07					
RJ012	1,2,3,4,7,8-HxCDD	1.7E-06	U	8.5E-07					
RJ012	1,2,3,4,7,8-HxCDF	4.0E-07	U	2.0E-07					
RJ012	1,2,3,6,7,8-HxCDD	1.4E-06	U	7.0E-07					
RJ012	1,2,3,6,7,8-HxCDF	7.9E-07	U	4.0E-07					
RJ012	1,2,3,7,8,9-HxCDD	1.2E-06	U	6.0E-07					
RJ012	1,2,3,7,8,9-HxCDF	6.0E-07	U	3.0E-07					
RJ012	1,2,3,7,8-PeCDD	5.8E-07	U	2.9E-07					
RJ012	1,2,3,7,8-PeCDF	8.6E-07	U	4.3E-07					
RJ012	2,3,4,6,7,8-HxCDF	6.4E-07	U	3.2E-07					
RJ012	2,3,4,7,8-PeCDF	4.4E-07	U	2.2E-07					
RJ012	2,3,7,8-TCDD	7.9E-07	U	4.0E-07					
RJ012	2,3,7,8-TCDF	4.6E-07	U	2.3E-07					
RJ012	OCDD	2.3E-04		2.3E-04					
RJ012	OCDF	2.0E-05	J	2.0E-05					
RJ012	Total HpCDD	4.0E-05		4.0E-05					
RJ012	Total HpCDF	1.0E-05	J	1.0E-05					
RJ012	Total HxCDD	1.5E-06	U	7.5E-07					
RJ012	Total HxCDF	6.1E-07	U	3.1E-07					
RJ012	Total PeCDD	5.8E-07	U	2.9E-07					
RJ012	Total PeCDF	6.5E-07	U	3.3E-07					
RJ012	Total TCDD	7.9E-07	U	4.0E-07					
RJ012	Total TCDF	4.6E-07	U	2.3E-07					
RJ014	1,2,3,4,6,7,8-HpCDD	6.0E-04		6.0E-04	1.1E-05	3.1E-05	7.9E-05	7.2E-04	7.2E-03
RJ014	1,2,3,4,6,7,8-HpCDF	2.2E-04	UJ	1.1E-04					
RJ014	1,2,3,4,7,8,9-HpCDF	1.0E-05	J	1.0E-05					
RJ014	1,2,3,4,7,8-HxCDD	4.4E-06	J	4.4E-06					

PCDD/PCDF Congener Group Summation for Soil/Sediment (0-10 feet bgs)
New Conservation Yard RFI Site

EPA ID	PCDD/PCDF Congener	Measured Concentration [a] (mg/kg)	Data Qualifier	Adjusted Concentration [b] (mg/kg)	Sum of PCDD/PCDF Congener Concentrations				
					Total Tetra (mg/kg)	Total Penta (mg/kg)	Total Hexa (mg/kg)	Total Hepta (mg/kg)	Total Octa (mg/kg)
RJ014	1,2,3,4,7,8-HxCDF	2.0E-05		2.0E-05					
RJ014	1,2,3,6,7,8-HxCDD	2.0E-05		2.0E-05					
RJ014	1,2,3,6,7,8-HxCDF	2.0E-05	UJ	1.0E-05					
RJ014	1,2,3,7,8,9-HxCDD	1.0E-05	J	1.0E-05					
RJ014	1,2,3,7,8,9-HxCDF	4.7E-06	J	4.7E-06					
RJ014	1,2,3,7,8-PeCDD	1.0E-06	U	5.0E-07					
RJ014	1,2,3,7,8-PeCDF	1.0E-05	J	1.0E-05					
RJ014	2,3,4,6,7,8-HxCDF	1.0E-05	J	1.0E-05					
RJ014	2,3,4,7,8-PeCDF	2.0E-05		2.0E-05					
RJ014	2,3,7,8-TCDD	1.4E-06	U	7.0E-07					
RJ014	2,3,7,8-TCDF	1.0E-05	J	1.0E-05					
RJ014	OCDD	6.9E-03		6.9E-03					
RJ014	OCDF	2.7E-04		2.7E-04					
RJ014	Total HpCDD	1.0E-03		1.0E-03					
RJ014	Total HpCDF	1.8E-04		1.8E-04					
RJ014	Total HxCDD	1.5E-04		1.5E-04					
RJ014	Total HxCDF	2.1E-04		2.1E-04					
RJ014	Total PeCDD	1.0E-05	J	1.0E-05					
RJ014	Total PeCDF	7.0E-05		7.0E-05					
RJ014	Total TCDD	4.0E-05		4.0E-05					
RJ014	Total TCDF	7.0E-05		7.0E-05					
RS888	1,2,3,4,6,7,8-HpCDD	3.3E-03		3.3E-03	1.0E-05	3.2E-05	1.9E-04	3.6E-03	4.1E-02
RS888	1,2,3,4,6,7,8-HpCDF	5.6E-04	UJ	2.8E-04					
RS888	1,2,3,4,7,8,9-HpCDF	6.0E-05		6.0E-05					
RS888	1,2,3,4,7,8-HxCDD	1.0E-05		1.0E-05					
RS888	1,2,3,4,7,8-HxCDF	4.0E-05		4.0E-05					
RS888	1,2,3,6,7,8-HxCDD	6.0E-05		6.0E-05					
RS888	1,2,3,6,7,8-HxCDF	3.0E-05		3.0E-05					
RS888	1,2,3,7,8,9-HxCDD	1.0E-05		1.0E-05					
RS888	1,2,3,7,8,9-HxCDF	2.0E-05		2.0E-05					
RS888	1,2,3,7,8-PeCDD	4.8E-06	U	2.4E-06					
RS888	1,2,3,7,8-PeCDF	1.0E-05		1.0E-05					
RS888	2,3,4,6,7,8-HxCDF	2.0E-05		2.0E-05					
RS888	2,3,4,7,8-PeCDF	2.0E-05		2.0E-05					
RS888	2,3,7,8-TCDD	9.8E-07	U	4.9E-07					
RS888	2,3,7,8-TCDF	1.0E-05		1.0E-05					
RS888	OCDD	4.0E-02	J	4.0E-02					
RS888	OCDF	8.4E-04		8.4E-04					
RS888	Total HpCDD	1.6E-02		1.6E-02					
RS888	Total HpCDF	2.7E-03	J	2.7E-03					
RS888	Total HxCDD	6.1E-04		6.1E-04					
RS888	Total HxCDF	8.1E-04	J	8.1E-04					
RS888	Total PeCDD	7.0E-05		7.0E-05					
RS888	Total PeCDF	1.6E-04	J	1.6E-04					
RS888	Total TCDD	1.1E-04		1.1E-04					
RS888	Total TCDF	1.0E-04	J	1.0E-04					
MJ610	1,2,3,4,6,7,8-HpCDD	1.0E-05		1.0E-05	2.5E-07	4.2E-07	1.6E-06	1.2E-05	1.5E-04
MJ610	1,2,3,4,6,7,8-HpCDF	1.9E-06	J	1.9E-06					
MJ610	1,2,3,4,7,8,9-HpCDF	1.9E-07	UJ	9.5E-08					
MJ610	1,2,3,4,7,8-HxCDD	3.4E-07	U	1.7E-07					
MJ610	1,2,3,4,7,8-HxCDF	4.0E-07	J	4.0E-07					
MJ610	1,2,3,6,7,8-HxCDD	3.3E-07	J	3.3E-07					
MJ610	1,2,3,6,7,8-HxCDF	1.8E-07	J	1.8E-07					
MJ610	1,2,3,7,8,9-HxCDD	2.0E-07	U	9.9E-08					

PCDD/PCDF Congener Group Summation for Soil/Sediment (0-10 feet bgs)
New Conservation Yard RFI Site

EPA ID	PCDD/PCDF Congener	Measured Concentration [a] (mg/kg)	Data Qualifier	Adjusted Concentration [b] (mg/kg)	Sum of PCDD/PCDF Congener Concentrations				
					Total Tetra (mg/kg)	Total Penta (mg/kg)	Total Hexa (mg/kg)	Total Hepta (mg/kg)	Total Octa (mg/kg)
MJ610	1,2,3,7,8,9-HxCDF	2.7E-07	U	1.3E-07					
MJ610	1,2,3,7,8-PeCDD	1.3E-07	U	6.4E-08					
MJ610	1,2,3,7,8-PeCDF	1.7E-07	J	1.7E-07					
MJ610	2,3,4,6,7,8-HxCDF	2.4E-07	J	2.4E-07					
MJ610	2,3,4,7,8-PeCDF	1.9E-07	J	1.9E-07					
MJ610	2,3,7,8-TCDD	1.3E-07	U	6.5E-08					
MJ610	2,3,7,8-TCDF	1.9E-07	J	1.9E-07					
MJ610	OCDD	1.5E-04		1.5E-04					
MJ610	OCDF	3.1E-06	J	3.1E-06					
MJ610	Total HpCDD	5.0E-05		5.0E-05					
MJ610	Total HpCDF	1.0E-05		1.0E-05					
MJ610	Total HxCDD	3.7E-06		3.7E-06					
MJ610	Total HxCDF	4.0E-06		4.0E-06					
MJ610	Total PeCDD	4.9E-07		4.9E-07					
MJ610	Total PeCDF	1.3E-06		1.3E-06					
MJ610	Total TCDD	7.3E-07		7.3E-07					
MJ610	Total TCDF	9.3E-07		9.3E-07					
MJ618	1,2,3,4,6,7,8-HpCDD	1.2E-04		1.2E-04	1.6E-06	2.8E-06	1.2E-05	1.4E-04	1.6E-03
MJ618	1,2,3,4,6,7,8-HpCDF	2.0E-05		2.0E-05					
MJ618	1,2,3,4,7,8,9-HpCDF	1.9E-06	J	1.9E-06					
MJ618	1,2,3,4,7,8-HxCDD	8.6E-07	J	8.6E-07					
MJ618	1,2,3,4,7,8-HxCDF	2.6E-06		2.6E-06					
MJ618	1,2,3,6,7,8-HxCDD	3.4E-06		3.4E-06					
MJ618	1,2,3,6,7,8-HxCDF	1.2E-06	J	1.2E-06					
MJ618	1,2,3,7,8,9-HxCDD	1.9E-06	J	1.9E-06					
MJ618	1,2,3,7,8,9-HxCDF	8.1E-07	J	8.1E-07					
MJ618	1,2,3,7,8-PeCDD	4.9E-07	J	4.9E-07					
MJ618	1,2,3,7,8-PeCDF	6.5E-07	J	6.5E-07					
MJ618	2,3,4,6,7,8-HxCDF	1.5E-06	J	1.5E-06					
MJ618	2,3,4,7,8-PeCDF	1.6E-06	J	1.6E-06					
MJ618	2,3,7,8-TCDD	2.5E-07	U	1.3E-07					
MJ618	2,3,7,8-TCDF	1.5E-06		1.5E-06					
MJ618	OCDD	1.5E-03		1.5E-03					
MJ618	OCDF	5.0E-05		5.0E-05					
MJ618	Total HpCDD	3.7E-04		3.7E-04					
MJ618	Total HpCDF	7.0E-05		7.0E-05					
MJ618	Total HxCDD	3.0E-05		3.0E-05					
MJ618	Total HxCDF	4.0E-05		4.0E-05					
MJ618	Total PeCDD	3.3E-06		3.3E-06					
MJ618	Total PeCDF	1.0E-05		1.0E-05					
MJ618	Total TCDD	4.0E-06		4.0E-06					
MJ618	Total TCDF	1.0E-05		1.0E-05					
MJ617	1,2,3,4,6,7,8-HpCDD	7.0E-05		7.0E-05	2.4E-07	1.1E-06	7.0E-06	8.1E-05	1.0E-03
MJ617	1,2,3,4,6,7,8-HpCDF	1.0E-05		1.0E-05					
MJ617	1,2,3,4,7,8,9-HpCDF	1.2E-06	J	1.2E-06					
MJ617	1,2,3,4,7,8-HxCDD	8.4E-07	J	8.4E-07					
MJ617	1,2,3,4,7,8-HxCDF	8.0E-07	J	8.0E-07					
MJ617	1,2,3,6,7,8-HxCDD	2.1E-06	J	2.1E-06					
MJ617	1,2,3,6,7,8-HxCDF	4.4E-07	J	4.4E-07					
MJ617	1,2,3,7,8,9-HxCDD	1.9E-06	J	1.9E-06					
MJ617	1,2,3,7,8,9-HxCDF	2.9E-07	UJ	1.4E-07					
MJ617	1,2,3,7,8-PeCDD	4.8E-07	J	4.8E-07					
MJ617	1,2,3,7,8-PeCDF	1.8E-07	UJ	9.1E-08					
MJ617	2,3,4,6,7,8-HxCDF	7.1E-07	J	7.1E-07					

PCDD/PCDF Congener Group Summation for Soil/Sediment (0-10 feet bgs)
New Conservation Yard RFI Site

EPA ID	PCDD/PCDF Congener	Measured Concentration [a] (mg/kg)	Data Qualifier	Adjusted Concentration [b] (mg/kg)	Sum of PCDD/PCDF Congener Concentrations				
					Total Tetra (mg/kg)	Total Penta (mg/kg)	Total Hexa (mg/kg)	Total Hepta (mg/kg)	Total Octa (mg/kg)
MJ617	2,3,4,7,8-PeCDF	5.3E-07	J	5.3E-07					
MJ617	2,3,7,8-TCDD	1.1E-07	U	5.6E-08					
MJ617	2,3,7,8-TCDF	3.7E-07	UJ	1.9E-07					
MJ617	OCDD	9.5E-04		9.5E-04					
MJ617	OCDF	9.0E-05		9.0E-05					
MJ617	Total HpCDD	1.5E-04		1.5E-04					
MJ617	Total HpCDF	6.0E-05		6.0E-05					
MJ617	Total HxCDD	2.0E-05		2.0E-05					
MJ617	Total HxCDF	2.0E-05		2.0E-05					
MJ617	Total PeCDD	1.2E-06		1.2E-06					
MJ617	Total PeCDF	4.8E-06		4.8E-06					
MJ617	Total TCDD	1.1E-07	U	5.6E-08					
MJ617	Total TCDF	2.0E-06		2.0E-06					
MJ775	1,2,3,4,6,7,8-HpCDD	2.7E-02		2.7E-02	4.5E-05	1.3E-04	1.9E-03	2.9E-02	2.8E-01
MJ775	1,2,3,4,6,7,8-HpCDF	2.5E-03		2.5E-03					
MJ775	1,2,3,4,7,8,9-HpCDF	2.3E-04		2.3E-04					
MJ775	1,2,3,4,7,8-HxCDD	2.4E-04		2.4E-04					
MJ775	1,2,3,4,7,8-HxCDF	8.0E-05		8.0E-05					
MJ775	1,2,3,6,7,8-HxCDD	9.0E-04		9.0E-04					
MJ775	1,2,3,6,7,8-HxCDF	8.0E-05	J	8.0E-05					
MJ775	1,2,3,7,8,9-HxCDD	4.7E-04		4.7E-04					
MJ775	1,2,3,7,8,9-HxCDF	2.0E-05		2.0E-05					
MJ775	1,2,3,7,8-PeCDD	9.0E-05		9.0E-05					
MJ775	1,2,3,7,8-PeCDF	1.0E-05		1.0E-05					
MJ775	2,3,4,6,7,8-HxCDF	1.4E-04		1.4E-04					
MJ775	2,3,4,7,8-PeCDF	3.0E-05		3.0E-05					
MJ775	2,3,7,8-TCDD	4.0E-05		4.0E-05					
MJ775	2,3,7,8-TCDF	4.8E-06		4.8E-06					
MJ775	OCDD	2.8E-01		2.8E-01					
MJ775	OCDF	6.9E-03		6.9E-03					
MJ775	Total HpCDD	5.5E-02		5.5E-02					
MJ775	Total HpCDF	1.1E-02		1.1E-02					
MJ775	Total HxCDD	6.0E-03		6.0E-03					
MJ775	Total HxCDF	3.9E-03	J	3.9E-03					
MJ775	Total PeCDD	4.7E-04		4.7E-04					
MJ775	Total PeCDF	6.6E-04	J	6.6E-04					
MJ775	Total TCDD	8.0E-05		8.0E-05					
MJ775	Total TCDF	1.9E-04		1.9E-04					
MJ724	1,2,3,4,6,7,8-HpCDD	1.1E-02		1.1E-02	1.5E-05	8.0E-05	1.2E-03	1.4E-02	1.3E-01
MJ724	1,2,3,4,6,7,8-HpCDF	2.2E-03		2.2E-03					
MJ724	1,2,3,4,7,8,9-HpCDF	2.1E-04		2.1E-04					
MJ724	1,2,3,4,7,8-HxCDD	1.3E-04		1.3E-04					
MJ724	1,2,3,4,7,8-HxCDF	8.0E-05		8.0E-05					
MJ724	1,2,3,6,7,8-HxCDD	5.9E-04		5.9E-04					
MJ724	1,2,3,6,7,8-HxCDF	6.0E-05	J	6.0E-05					
MJ724	1,2,3,7,8,9-HxCDD	1.8E-04		1.8E-04					
MJ724	1,2,3,7,8,9-HxCDF	2.0E-05		2.0E-05					
MJ724	1,2,3,7,8-PeCDD	5.0E-05		5.0E-05					
MJ724	1,2,3,7,8-PeCDF	1.0E-05		1.0E-05					
MJ724	2,3,4,6,7,8-HxCDF	1.4E-04		1.4E-04					
MJ724	2,3,4,7,8-PeCDF	2.0E-05		2.0E-05					
MJ724	2,3,7,8-TCDD	1.0E-05		1.0E-05					
MJ724	2,3,7,8-TCDF	4.9E-06		4.9E-06					
MJ724	OCDD	1.2E-01		1.2E-01					

PCDD/PCDF Congener Group Summation for Soil/Sediment (0-10 feet bgs)
New Conservation Yard RFI Site

EPA ID	PCDD/PCDF Congener	Measured Concentration [a] (mg/kg)	Data Qualifier	Adjusted Concentration [b] (mg/kg)	Sum of PCDD/PCDF Congener Concentrations				
					Total Tetra (mg/kg)	Total Penta (mg/kg)	Total Hexa (mg/kg)	Total Hepta (mg/kg)	Total Octa (mg/kg)
MJ724	OCDF	5.3E-03		5.3E-03					
MJ724	Total HpCDD	2.0E-02		2.0E-02					
MJ724	Total HpCDF	1.1E-02		1.1E-02					
MJ724	Total HxCDD	2.9E-03		2.9E-03					
MJ724	Total HxCDF	4.2E-03	J	4.2E-03					
MJ724	Total PeCDD	2.9E-04		2.9E-04					
MJ724	Total PeCDF	6.2E-04	J	6.2E-04					
MJ724	Total TCDD	4.0E-05		4.0E-05					
MJ724	Total TCDF	1.5E-04		1.5E-04					
MJ727	1,2,3,4,6,7,8-HpCDD	6.6E-04		6.6E-04	2.2E-07	2.5E-06	5.0E-05	7.6E-04	6.7E-03
MJ727	1,2,3,4,6,7,8-HpCDF	9.0E-05		9.0E-05					
MJ727	1,2,3,4,7,8,9-HpCDF	1.0E-05		1.0E-05					
MJ727	1,2,3,4,7,8-HxCDD	4.0E-06		4.0E-06					
MJ727	1,2,3,4,7,8-HxCDF	3.2E-06		3.2E-06					
MJ727	1,2,3,6,7,8-HxCDD	2.0E-05		2.0E-05					
MJ727	1,2,3,6,7,8-HxCDF	1.9E-06	J	1.9E-06					
MJ727	1,2,3,7,8,9-HxCDD	1.0E-05		1.0E-05					
MJ727	1,2,3,7,8,9-HxCDF	8.6E-07	J	8.6E-07					
MJ727	1,2,3,7,8-PeCDD	1.7E-06	J	1.7E-06					
MJ727	1,2,3,7,8-PeCDF	2.2E-07	J	2.2E-07					
MJ727	2,3,4,6,7,8-HxCDF	1.0E-05		1.0E-05					
MJ727	2,3,4,7,8-PeCDF	5.5E-07	J	5.5E-07					
MJ727	2,3,7,8-TCDD	3.9E-07	UJ	2.0E-07					
MJ727	2,3,7,8-TCDF	4.0E-08	U	2.0E-08					
MJ727	OCDD	6.4E-03		6.4E-03					
MJ727	OCDF	2.7E-04		2.7E-04					
MJ727	Total HpCDD	1.2E-03		1.2E-03					
MJ727	Total HpCDF	5.3E-04		5.3E-04					
MJ727	Total HxCDD	1.5E-04		1.5E-04					
MJ727	Total HxCDF	2.2E-04	J	2.2E-04					
MJ727	Total PeCDD	1.0E-05		1.0E-05					
MJ727	Total PeCDF	3.0E-05		3.0E-05					
MJ727	Total TCDD	5.0E-07		5.0E-07					
MJ727	Total TCDF	2.3E-06		2.3E-06					
MJ725	1,2,3,4,6,7,8-HpCDD	2.0E-04		2.0E-04	5.1E-07	1.0E-06	1.7E-05	2.3E-04	2.4E-03
MJ725	1,2,3,4,6,7,8-HpCDF	3.0E-05		3.0E-05					
MJ725	1,2,3,4,7,8,9-HpCDF	2.1E-06	J	2.1E-06					
MJ725	1,2,3,4,7,8-HxCDD	1.4E-06	J	1.4E-06					
MJ725	1,2,3,4,7,8-HxCDF	7.7E-07	J	7.7E-07					
MJ725	1,2,3,6,7,8-HxCDD	1.0E-05		1.0E-05					
MJ725	1,2,3,6,7,8-HxCDF	6.4E-07	J	6.4E-07					
MJ725	1,2,3,7,8,9-HxCDD	2.8E-06		2.8E-06					
MJ725	1,2,3,7,8,9-HxCDF	2.3E-07	J	2.3E-07					
MJ725	1,2,3,7,8-PeCDD	5.9E-07	J	5.9E-07					
MJ725	1,2,3,7,8-PeCDF	1.0E-07	J	1.0E-07					
MJ725	2,3,4,6,7,8-HxCDF	1.2E-06	J	1.2E-06					
MJ725	2,3,4,7,8-PeCDF	3.5E-07	J	3.5E-07					
MJ725	2,3,7,8-TCDD	2.7E-07	J	2.7E-07					
MJ725	2,3,7,8-TCDF	2.4E-07	J	2.4E-07					
MJ725	OCDD	2.3E-03		2.3E-03					
MJ725	OCDF	8.0E-05		8.0E-05					
MJ725	Total HpCDD	3.9E-04		3.9E-04					
MJ725	Total HpCDF	1.1E-04		1.1E-04					
MJ725	Total HxCDD	4.0E-05		4.0E-05					

PCDD/PCDF Congener Group Summation for Soil/Sediment (0-10 feet bgs)
New Conservation Yard RFI Site

EPA ID	PCDD/PCDF Congener	Measured Concentration [a] (mg/kg)	Data Qualifier	Adjusted Concentration [b] (mg/kg)	Sum of PCDD/PCDF Congener Concentrations				
					Total Tetra (mg/kg)	Total Penta (mg/kg)	Total Hexa (mg/kg)	Total Hepta (mg/kg)	Total Octa (mg/kg)
MJ725	Total HxCDF	4.0E-05	J	4.0E-05					
MJ725	Total PeCDD	3.3E-06		3.3E-06					
MJ725	Total PeCDF	1.0E-05		1.0E-05					
MJ725	Total TCDD	5.7E-07		5.7E-07					
MJ725	Total TCDF	3.2E-06		3.2E-06					
MJ726	1,2,3,4,6,7,8-HpCDD	2.2E-02		2.2E-02	3.0E-05	1.2E-04	2.2E-03	2.8E-02	3.1E-01
MJ726	1,2,3,4,6,7,8-HpCDF	5.7E-03	J	5.7E-03					
MJ726	1,2,3,4,7,8,9-HpCDF	4.9E-04		4.9E-04					
MJ726	1,2,3,4,7,8-HxCDD	1.7E-04		1.7E-04					
MJ726	1,2,3,4,7,8-HxCDF	1.5E-04		1.5E-04					
MJ726	1,2,3,6,7,8-HxCDD	1.2E-03		1.2E-03					
MJ726	1,2,3,6,7,8-HxCDF	1.1E-04	J	1.1E-04					
MJ726	1,2,3,7,8,9-HxCDD	2.9E-04		2.9E-04					
MJ726	1,2,3,7,8,9-HxCDF	3.0E-05		3.0E-05					
MJ726	1,2,3,7,8-PeCDD	8.0E-05		8.0E-05					
MJ726	1,2,3,7,8-PeCDF	1.0E-05		1.0E-05					
MJ726	2,3,4,6,7,8-HxCDF	2.8E-04		2.8E-04					
MJ726	2,3,4,7,8-PeCDF	3.0E-05		3.0E-05					
MJ726	2,3,7,8-TCDD	2.0E-05		2.0E-05					
MJ726	2,3,7,8-TCDF	1.0E-05	J	1.0E-05					
MJ726	OCDD	3.0E-01		3.0E-01					
MJ726	OCDF	1.5E-02		1.5E-02					
MJ726	Total HpCDD	3.7E-02		3.7E-02					
MJ726	Total HpCDF	2.7E-02	J	2.7E-02					
MJ726	Total HxCDD	5.8E-03		5.8E-03					
MJ726	Total HxCDF	1.1E-02	J	1.1E-02					
MJ726	Total PeCDD	3.9E-04		3.9E-04					
MJ726	Total PeCDF	1.4E-03	J	1.4E-03					
MJ726	Total TCDD	4.0E-05		4.0E-05					
MJ726	Total TCDF	1.7E-04	J	1.7E-04					
MJ729	1,2,3,4,6,7,8-HpCDD	4.5E-03		4.5E-03	1.1E-05	1.5E-05	3.2E-04	5.1E-03	5.4E-02
MJ729	1,2,3,4,6,7,8-HpCDF	5.4E-04		5.4E-04					
MJ729	1,2,3,4,7,8,9-HpCDF	5.0E-05		5.0E-05					
MJ729	1,2,3,4,7,8-HxCDD	3.0E-05		3.0E-05					
MJ729	1,2,3,4,7,8-HxCDF	2.0E-05		2.0E-05					
MJ729	1,2,3,6,7,8-HxCDD	1.6E-04		1.6E-04					
MJ729	1,2,3,6,7,8-HxCDF	1.0E-05		1.0E-05					
MJ729	1,2,3,7,8,9-HxCDD	7.0E-05		7.0E-05					
MJ729	1,2,3,7,8,9-HxCDF	3.5E-06		3.5E-06					
MJ729	1,2,3,7,8-PeCDD	1.0E-05		1.0E-05					
MJ729	1,2,3,7,8-PeCDF	1.4E-06	J	1.4E-06					
MJ729	2,3,4,6,7,8-HxCDF	3.0E-05		3.0E-05					
MJ729	2,3,4,7,8-PeCDF	3.9E-06		3.9E-06					
MJ729	2,3,7,8-TCDD	1.0E-05		1.0E-05					
MJ729	2,3,7,8-TCDF	1.0E-06		1.0E-06					
MJ729	OCDD	5.3E-02		5.3E-02					
MJ729	OCDF	1.5E-03		1.5E-03					
MJ729	Total HpCDD	8.2E-03		8.2E-03					
MJ729	Total HpCDF	2.6E-03		2.6E-03					
MJ729	Total HxCDD	8.5E-04		8.5E-04					
MJ729	Total HxCDF	8.4E-04	J	8.4E-04					
MJ729	Total PeCDD	6.0E-05		6.0E-05					
MJ729	Total PeCDF	1.0E-04		1.0E-04					
MJ729	Total TCDD	1.0E-05		1.0E-05					

PCDD/PCDF Congener Group Summation for Soil/Sediment (0-10 feet bgs)
New Conservation Yard RFI Site

EPA ID	PCDD/PCDF Congener	Measured Concentration [a] (mg/kg)	Data Qualifier	Adjusted Concentration [b] (mg/kg)	Sum of PCDD/PCDF Congener Concentrations				
					Total Tetra (mg/kg)	Total Penta (mg/kg)	Total Hexa (mg/kg)	Total Hepta (mg/kg)	Total Octa (mg/kg)
MJ729	Total TCDF	3.0E-05		3.0E-05					
MJ730	1,2,3,4,6,7,8-HpCDD	9.2E-04		9.2E-04	9.6E-07	3.6E-06	6.7E-05	1.1E-03	1.1E-02
MJ730	1,2,3,4,6,7,8-HpCDF	1.4E-04		1.4E-04					
MJ730	1,2,3,4,7,8,9-HpCDF	1.0E-05		1.0E-05					
MJ730	1,2,3,4,7,8-HxCDD	1.0E-05		1.0E-05					
MJ730	1,2,3,4,7,8-HxCDF	3.5E-06		3.5E-06					
MJ730	1,2,3,6,7,8-HxCDD	3.0E-05		3.0E-05					
MJ730	1,2,3,6,7,8-HxCDF	2.9E-06		2.9E-06					
MJ730	1,2,3,7,8,9-HxCDD	1.0E-05		1.0E-05					
MJ730	1,2,3,7,8,9-HxCDF	9.6E-07	J	9.6E-07					
MJ730	1,2,3,7,8-PeCDD	2.3E-06	J	2.3E-06					
MJ730	1,2,3,7,8-PeCDF	3.8E-07	J	3.8E-07					
MJ730	2,3,4,6,7,8-HxCDF	1.0E-05		1.0E-05					
MJ730	2,3,4,7,8-PeCDF	9.5E-07	J	9.5E-07					
MJ730	2,3,7,8-TCDD	6.0E-07		6.0E-07					
MJ730	2,3,7,8-TCDF	3.6E-07	J	3.6E-07					
MJ730	OCDD	1.1E-02		1.1E-02					
MJ730	OCDF	3.8E-04		3.8E-04					
MJ730	Total HpCDD	1.6E-03		1.6E-03					
MJ730	Total HpCDF	6.3E-04		6.3E-04					
MJ730	Total HxCDD	1.5E-04		1.5E-04					
MJ730	Total HxCDF	1.9E-04	J	1.9E-04					
MJ730	Total PeCDD	1.0E-05		1.0E-05					
MJ730	Total PeCDF	2.0E-05		2.0E-05					
MJ730	Total TCDD	1.1E-06		1.1E-06					
MJ730	Total TCDF	1.0E-05		1.0E-05					
MJ732	1,2,3,4,6,7,8-HpCDD	4.1E-04		4.1E-04	6.3E-07	1.9E-06	2.9E-05	4.5E-04	4.7E-03
MJ732	1,2,3,4,6,7,8-HpCDF	4.0E-05		4.0E-05					
MJ732	1,2,3,4,7,8,9-HpCDF	4.3E-06		4.3E-06					
MJ732	1,2,3,4,7,8-HxCDD	3.0E-06		3.0E-06					
MJ732	1,2,3,4,7,8-HxCDF	1.5E-06	J	1.5E-06					
MJ732	1,2,3,6,7,8-HxCDD	1.0E-05		1.0E-05					
MJ732	1,2,3,6,7,8-HxCDF	1.4E-06	J	1.4E-06					
MJ732	1,2,3,7,8,9-HxCDD	1.0E-05		1.0E-05					
MJ732	1,2,3,7,8,9-HxCDF	4.3E-07	J	4.3E-07					
MJ732	1,2,3,7,8-PeCDD	1.1E-06	J	1.1E-06					
MJ732	1,2,3,7,8-PeCDF	1.9E-07	J	1.9E-07					
MJ732	2,3,4,6,7,8-HxCDF	2.8E-06		2.8E-06					
MJ732	2,3,4,7,8-PeCDF	5.7E-07	J	5.7E-07					
MJ732	2,3,7,8-TCDD	3.9E-07	J	3.9E-07					
MJ732	2,3,7,8-TCDF	2.5E-07	J	2.5E-07					
MJ732	OCDD	4.6E-03		4.6E-03					
MJ732	OCDF	1.0E-04		1.0E-04					
MJ732	Total HpCDD	7.9E-04		7.9E-04					
MJ732	Total HpCDF	1.7E-04		1.7E-04					
MJ732	Total HxCDD	9.0E-05		9.0E-05					
MJ732	Total HxCDF	7.0E-05	J	7.0E-05					
MJ732	Total PeCDD	1.0E-05		1.0E-05					
MJ732	Total PeCDF	1.0E-05		1.0E-05					
MJ732	Total TCDD	7.5E-07		7.5E-07					
MJ732	Total TCDF	3.5E-06		3.5E-06					
MJ620	1,2,3,4,6,7,8-HpCDD	1.9E-03		1.9E-03	3.9E-06	1.4E-05	1.8E-04	2.2E-03	2.1E-02
MJ620	1,2,3,4,6,7,8-HpCDF	3.0E-04		3.0E-04					
MJ620	1,2,3,4,7,8,9-HpCDF	3.0E-05		3.0E-05					

PCDD/PCDF Congener Group Summation for Soil/Sediment (0-10 feet bgs)
New Conservation Yard RFI Site

EPA ID	PCDD/PCDF Congener	Measured Concentration [a] (mg/kg)	Data Qualifier	Adjusted Concentration [b] (mg/kg)	Sum of PCDD/PCDF Congener Concentrations				
					Total Tetra (mg/kg)	Total Penta (mg/kg)	Total Hexa (mg/kg)	Total Hepta (mg/kg)	Total Octa (mg/kg)
MJ620	1,2,3,4,7,8-HxCDD	2.0E-05		2.0E-05					
MJ620	1,2,3,4,7,8-HxCDF	1.0E-05		1.0E-05					
MJ620	1,2,3,6,7,8-HxCDD	9.0E-05		9.0E-05					
MJ620	1,2,3,6,7,8-HxCDF	1.0E-05		1.0E-05					
MJ620	1,2,3,7,8,9-HxCDD	3.0E-05		3.0E-05					
MJ620	1,2,3,7,8,9-HxCDF	2.2E-06	J	2.2E-06					
MJ620	1,2,3,7,8-PeCDD	1.0E-05		1.0E-05					
MJ620	1,2,3,7,8-PeCDF	1.3E-06	J	1.3E-06					
MJ620	2,3,4,6,7,8-HxCDF	2.0E-05		2.0E-05					
MJ620	2,3,4,7,8-PeCDF	2.9E-06		2.9E-06					
MJ620	2,3,7,8-TCDD	2.8E-06		2.8E-06					
MJ620	2,3,7,8-TCDF	1.1E-06		1.1E-06					
MJ620	OCDD	2.0E-02		2.0E-02					
MJ620	OCDF	7.4E-04		7.4E-04					
MJ620	Total HpCDD	3.5E-03		3.5E-03					
MJ620	Total HpCDF	1.4E-03		1.4E-03					
MJ620	Total HxCDD	4.8E-04		4.8E-04					
MJ620	Total HxCDF	5.8E-04		5.8E-04					
MJ620	Total PeCDD	6.0E-05		6.0E-05					
MJ620	Total PeCDF	1.0E-04		1.0E-04					
MJ620	Total TCDD	1.0E-05		1.0E-05					
MJ620	Total TCDF	2.0E-05		2.0E-05					
MJ619	1,2,3,4,6,7,8-HpCDD	2.4E-03		2.4E-03	5.1E-06	1.6E-05	2.0E-04	2.8E-03	2.9E-02
MJ619	1,2,3,4,6,7,8-HpCDF	3.8E-04		3.8E-04					
MJ619	1,2,3,4,7,8,9-HpCDF	4.0E-05		4.0E-05					
MJ619	1,2,3,4,7,8-HxCDD	2.0E-05		2.0E-05					
MJ619	1,2,3,4,7,8-HxCDF	1.0E-05		1.0E-05					
MJ619	1,2,3,6,7,8-HxCDD	1.0E-04		1.0E-04					
MJ619	1,2,3,6,7,8-HxCDF	1.0E-05		1.0E-05					
MJ619	1,2,3,7,8,9-HxCDD	4.0E-05		4.0E-05					
MJ619	1,2,3,7,8,9-HxCDF	2.6E-06		2.6E-06					
MJ619	1,2,3,7,8-PeCDD	1.0E-05		1.0E-05					
MJ619	1,2,3,7,8-PeCDF	1.5E-06	J	1.5E-06					
MJ619	2,3,4,6,7,8-HxCDF	2.0E-05		2.0E-05					
MJ619	2,3,4,7,8-PeCDF	4.4E-06		4.4E-06					
MJ619	2,3,7,8-TCDD	2.9E-06		2.9E-06					
MJ619	2,3,7,8-TCDF	2.2E-06		2.2E-06					
MJ619	OCDD	2.8E-02		2.8E-02					
MJ619	OCDF	1.0E-03		1.0E-03					
MJ619	Total HpCDD	4.4E-03		4.4E-03					
MJ619	Total HpCDF	1.7E-03		1.7E-03					
MJ619	Total HxCDD	5.5E-04		5.5E-04					
MJ619	Total HxCDF	6.8E-04		6.8E-04					
MJ619	Total PeCDD	5.0E-05		5.0E-05					
MJ619	Total PeCDF	1.1E-04		1.1E-04					
MJ619	Total TCDD	1.0E-05		1.0E-05					
MJ619	Total TCDF	3.0E-05		3.0E-05					
MJ621	1,2,3,4,6,7,8-HpCDD	4.6E-04		4.6E-04	1.5E-06	3.9E-06	5.7E-05	5.5E-04	5.4E-03
MJ621	1,2,3,4,6,7,8-HpCDF	8.0E-05		8.0E-05					
MJ621	1,2,3,4,7,8,9-HpCDF	1.0E-05		1.0E-05					
MJ621	1,2,3,4,7,8-HxCDD	1.0E-05		1.0E-05					
MJ621	1,2,3,4,7,8-HxCDF	3.6E-06		3.6E-06					
MJ621	1,2,3,6,7,8-HxCDD	2.0E-05		2.0E-05					
MJ621	1,2,3,6,7,8-HxCDF	2.6E-06		2.6E-06					

PCDD/PCDF Congener Group Summation for Soil/Sediment (0-10 feet bgs)
New Conservation Yard RFI Site

EPA ID	PCDD/PCDF Congener	Measured Concentration [a] (mg/kg)	Data Qualifier	Adjusted Concentration [b] (mg/kg)	Sum of PCDD/PCDF Congener Concentrations				
					Total Tetra (mg/kg)	Total Penta (mg/kg)	Total Hexa (mg/kg)	Total Hepta (mg/kg)	Total Octa (mg/kg)
MJ621	1,2,3,7,8,9-HxCDD	1.0E-05		1.0E-05					
MJ621	1,2,3,7,8,9-HxCDF	6.6E-07	J	6.6E-07					
MJ621	1,2,3,7,8-PeCDD	2.2E-06	J	2.2E-06					
MJ621	1,2,3,7,8-PeCDF	4.6E-07	J	4.6E-07					
MJ621	2,3,4,6,7,8-HxCDF	1.0E-05		1.0E-05					
MJ621	2,3,4,7,8-PeCDF	1.3E-06	J	1.3E-06					
MJ621	2,3,7,8-TCDD	5.4E-07		5.4E-07					
MJ621	2,3,7,8-TCDF	9.8E-07	J	9.8E-07					
MJ621	OCDD	5.2E-03		5.2E-03					
MJ621	OCDF	2.3E-04		2.3E-04					
MJ621	Total HpCDD	8.9E-04		8.9E-04					
MJ621	Total HpCDF	3.3E-04		3.3E-04					
MJ621	Total HxCDD	1.1E-04		1.1E-04					
MJ621	Total HxCDF	1.4E-04		1.4E-04					
MJ621	Total PeCDD	1.0E-05		1.0E-05					
MJ621	Total PeCDF	2.0E-05		2.0E-05					
MJ621	Total TCDD	7.6E-07		7.6E-07					
MJ621	Total TCDF	1.0E-05		1.0E-05					
				MAX	4.5E-05	1.3E-04	2.2E-03	2.9E-02	3.1E-01

Maximum of Total Summed Congener Concentrations

Total Tetra	4.5E-05
Total Penta	1.3E-04
Total Hexa	2.2E-03
Total Hepta	2.9E-02
Total Octa	3.1E-01

Notes:

a. Measured concentration - concentration reported by the analytial laboratory

b. Adjusted concentration - concentration reported by the analytical laboratory if the chemical was detected, or estimated at one-half the sample quantitatio (SQL) limit if not detected.

PCDD/PCDF - polychlorinated dibenzo-p-dioxins and dibenzofurans

Total Tetra - sum of the 2,3,7,8-substituted tetraclorinated dibenzo-p-dioxin and dibenzofuran congeners.

Total Penta - sum of the 2,3,7,8-substituted pentaclorinated dibenzo-p-dioxin and dibenzofuran congeners.

Total Hexa - sum of the 2,3,7,8-substituted hexaclorinated dibenzo-p-dioxin and dibenzofuran congeners.

Total Hepta - sum of the 2,3,7,8-substituted heptaclorinated dibenzo-p-dioxin and dibenzofuran congeners.

Total Octa - sum of the 2,3,7,8-substituted Octaclorinated dibenzo-p-dioxin and dibenzofuran congeners.

J - concentration estimated

U - not detected. Concentration shown is the SQL.

UJ - not detected. Concentration shown is the estimated SQL.

mg/kg - milligrams per kilogram

bgs- below ground surface

PCDD/PCDF Congener Group Summation for Soil/Sediment (0-2 feet bgs)
New Conservation Yard RFI Site

EPA ID	PCDD/PCDF Congener	Measured Concentration [a] (mg/kg)	Data Qualifier	Adjusted Concentration [b] (mg/kg)	Sum of PCDD/PCDF Congener Concentrations				
					Total Tetra (mg/kg)	Total Penta (mg/kg)	Total Hexa (mg/kg)	Total Hepta (mg/kg)	Total Octa (mg/kg)
RJ011	1,2,3,4,6,7,8-HpCDD	3.2E-04		3.2E-04	2.6E-06	4.4E-06	3.7E-05	3.9E-04	4.0E-03
RJ011	1,2,3,4,6,7,8-HpCDF	1.1E-04	UJ	5.5E-05					
RJ011	1,2,3,4,7,8,9-HpCDF	1.0E-05	J	1.0E-05					
RJ011	1,2,3,4,7,8-HxCDD	9.6E-07	U	4.8E-07					
RJ011	1,2,3,4,7,8-HxCDF	1.0E-05	J	1.0E-05					
RJ011	1,2,3,6,7,8-HxCDD	1.0E-05	J	1.0E-05					
RJ011	1,2,3,6,7,8-HxCDF	1.0E-05	UJ	5.0E-06					
RJ011	1,2,3,7,8,9-HxCDD	3.2E-06	J	3.2E-06					
RJ011	1,2,3,7,8,9-HxCDF	3.7E-06	J	3.7E-06					
RJ011	1,2,3,7,8-PeCDD	5.5E-07	U	2.8E-07					
RJ011	1,2,3,7,8-PeCDF	1.7E-06	UJ	8.5E-07					
RJ011	2,3,4,6,7,8-HxCDF	4.2E-06	J	4.2E-06					
RJ011	2,3,4,7,8-PeCDF	3.3E-06	J	3.3E-06					
RJ011	2,3,7,8-TCDD	1.3E-06	U	6.5E-07					
RJ011	2,3,7,8-TCDF	1.9E-06	J	1.9E-06					
RJ011	OCDD	3.9E-03		3.9E-03					
RJ011	OCDF	1.2E-04		1.2E-04					
RJ011	Total HpCDD	6.1E-04		6.1E-04					
RJ011	Total HpCDF	1.8E-04		1.8E-04					
RJ011	Total HxCDD	9.0E-05		9.0E-05					
RJ011	Total HxCDF	1.5E-04		1.5E-04					
RJ011	Total PeCDD	4.6E-06	J	4.6E-06					
RJ011	Total PeCDF	1.0E-05	J	1.0E-05					
RJ011	Total TCDD	1.0E-05		1.0E-05					
RJ011	Total TCDF	2.0E-05		2.0E-05					
RJ012	1,2,3,4,6,7,8-HpCDD	2.0E-05		2.0E-05	6.3E-07	9.4E-07	3.4E-06	2.5E-05	2.5E-04
RJ012	1,2,3,4,6,7,8-HpCDF	1.0E-05	UJ	5.0E-06					
RJ012	1,2,3,4,7,8,9-HpCDF	9.2E-07	U	4.6E-07					
RJ012	1,2,3,4,7,8-HxCDD	1.7E-06	U	8.5E-07					
RJ012	1,2,3,4,7,8-HxCDF	4.0E-07	U	2.0E-07					
RJ012	1,2,3,6,7,8-HxCDD	1.4E-06	U	7.0E-07					
RJ012	1,2,3,6,7,8-HxCDF	7.9E-07	U	4.0E-07					
RJ012	1,2,3,7,8,9-HxCDD	1.2E-06	U	6.0E-07					
RJ012	1,2,3,7,8,9-HxCDF	6.0E-07	U	3.0E-07					
RJ012	1,2,3,7,8-PeCDD	5.8E-07	U	2.9E-07					
RJ012	1,2,3,7,8-PeCDF	8.6E-07	U	4.3E-07					
RJ012	2,3,4,6,7,8-HxCDF	6.4E-07	U	3.2E-07					
RJ012	2,3,4,7,8-PeCDF	4.4E-07	U	2.2E-07					
RJ012	2,3,7,8-TCDD	7.9E-07	U	4.0E-07					
RJ012	2,3,7,8-TCDF	4.6E-07	U	2.3E-07					
RJ012	OCDD	2.3E-04		2.3E-04					
RJ012	OCDF	2.0E-05	J	2.0E-05					
RJ012	Total HpCDD	4.0E-05		4.0E-05					
RJ012	Total HpCDF	1.0E-05	J	1.0E-05					
RJ012	Total HxCDD	1.5E-06	U	7.5E-07					
RJ012	Total HxCDF	6.1E-07	U	3.1E-07					
RJ012	Total PeCDD	5.8E-07	U	2.9E-07					
RJ012	Total PeCDF	6.5E-07	U	3.3E-07					
RJ012	Total TCDD	7.9E-07	U	4.0E-07					
RJ012	Total TCDF	4.6E-07	U	2.3E-07					
RJ014	1,2,3,4,6,7,8-HpCDD	6.0E-04		6.0E-04	1.1E-05	3.1E-05	7.9E-05	7.2E-04	7.2E-03
RJ014	1,2,3,4,6,7,8-HpCDF	2.2E-04	UJ	1.1E-04					
RJ014	1,2,3,4,7,8,9-HpCDF	1.0E-05	J	1.0E-05					
RJ014	1,2,3,4,7,8-HxCDD	4.4E-06	J	4.4E-06					

PCDD/PCDF Congener Group Summation for Soil/Sediment (0-2 feet bgs)
New Conservation Yard RFI Site

EPA ID	PCDD/PCDF Congener	Measured Concentration [a] (mg/kg)	Data Qualifier	Adjusted Concentration [b] (mg/kg)	Sum of PCDD/PCDF Congener Concentrations				
					Total Tetra (mg/kg)	Total Penta (mg/kg)	Total Hexa (mg/kg)	Total Hepta (mg/kg)	Total Octa (mg/kg)
RJ014	1,2,3,4,7,8-HxCDF	2.0E-05		2.0E-05					
RJ014	1,2,3,6,7,8-HxCDD	2.0E-05		2.0E-05					
RJ014	1,2,3,6,7,8-HxCDF	2.0E-05	UJ	1.0E-05					
RJ014	1,2,3,7,8,9-HxCDD	1.0E-05	J	1.0E-05					
RJ014	1,2,3,7,8,9-HxCDF	4.7E-06	J	4.7E-06					
RJ014	1,2,3,7,8-PeCDD	1.0E-06	U	5.0E-07					
RJ014	1,2,3,7,8-PeCDF	1.0E-05	J	1.0E-05					
RJ014	2,3,4,6,7,8-HxCDF	1.0E-05	J	1.0E-05					
RJ014	2,3,4,7,8-PeCDF	2.0E-05		2.0E-05					
RJ014	2,3,7,8-TCDD	1.4E-06	U	7.0E-07					
RJ014	2,3,7,8-TCDF	1.0E-05	J	1.0E-05					
RJ014	OCDD	6.9E-03		6.9E-03					
RJ014	OCDF	2.7E-04		2.7E-04					
RJ014	Total HpCDD	1.0E-03		1.0E-03					
RJ014	Total HpCDF	1.8E-04		1.8E-04					
RJ014	Total HxCDD	1.5E-04		1.5E-04					
RJ014	Total HxCDF	2.1E-04		2.1E-04					
RJ014	Total PeCDD	1.0E-05	J	1.0E-05					
RJ014	Total PeCDF	7.0E-05		7.0E-05					
RJ014	Total TCDD	4.0E-05		4.0E-05					
RJ014	Total TCDF	7.0E-05		7.0E-05					
RS888	1,2,3,4,6,7,8-HpCDD	3.3E-03		3.3E-03	1.0E-05	3.2E-05	1.9E-04	3.6E-03	4.1E-02
RS888	1,2,3,4,6,7,8-HpCDF	5.6E-04	UJ	2.8E-04					
RS888	1,2,3,4,7,8,9-HpCDF	6.0E-05		6.0E-05					
RS888	1,2,3,4,7,8-HxCDD	1.0E-05		1.0E-05					
RS888	1,2,3,4,7,8-HxCDF	4.0E-05		4.0E-05					
RS888	1,2,3,6,7,8-HxCDD	6.0E-05		6.0E-05					
RS888	1,2,3,6,7,8-HxCDF	3.0E-05		3.0E-05					
RS888	1,2,3,7,8,9-HxCDD	1.0E-05		1.0E-05					
RS888	1,2,3,7,8,9-HxCDF	2.0E-05		2.0E-05					
RS888	1,2,3,7,8-PeCDD	4.8E-06	U	2.4E-06					
RS888	1,2,3,7,8-PeCDF	1.0E-05		1.0E-05					
RS888	2,3,4,6,7,8-HxCDF	2.0E-05		2.0E-05					
RS888	2,3,4,7,8-PeCDF	2.0E-05		2.0E-05					
RS888	2,3,7,8-TCDD	9.8E-07	U	4.9E-07					
RS888	2,3,7,8-TCDF	1.0E-05		1.0E-05					
RS888	OCDD	4.0E-02	J	4.0E-02					
RS888	OCDF	8.4E-04		8.4E-04					
RS888	Total HpCDD	1.6E-02		1.6E-02					
RS888	Total HpCDF	2.7E-03	J	2.7E-03					
RS888	Total HxCDD	6.1E-04		6.1E-04					
RS888	Total HxCDF	8.1E-04	J	8.1E-04					
RS888	Total PeCDD	7.0E-05		7.0E-05					
RS888	Total PeCDF	1.6E-04	J	1.6E-04					
RS888	Total TCDD	1.1E-04		1.1E-04					
RS888	Total TCDF	1.0E-04	J	1.0E-04					
MJ618	1,2,3,4,6,7,8-HpCDD	1.2E-04		1.2E-04	1.6E-06	2.8E-06	1.2E-05	1.4E-04	1.6E-03
MJ618	1,2,3,4,6,7,8-HpCDF	2.0E-05		2.0E-05					
MJ618	1,2,3,4,7,8,9-HpCDF	1.9E-06	J	1.9E-06					
MJ618	1,2,3,4,7,8-HxCDD	8.6E-07	J	8.6E-07					
MJ618	1,2,3,4,7,8-HxCDF	2.6E-06		2.6E-06					
MJ618	1,2,3,6,7,8-HxCDD	3.4E-06		3.4E-06					
MJ618	1,2,3,6,7,8-HxCDF	1.2E-06	J	1.2E-06					
MJ618	1,2,3,7,8,9-HxCDD	1.9E-06	J	1.9E-06					

PCDD/PCDF Congener Group Summation for Soil/Sediment (0-2 feet bgs)
New Conservation Yard RFI Site

EPA ID	PCDD/PCDF Congener	Measured Concentration [a] (mg/kg)	Data Qualifier	Adjusted Concentration [b] (mg/kg)	Sum of PCDD/PCDF Congener Concentrations				
					Total Tetra (mg/kg)	Total Penta (mg/kg)	Total Hexa (mg/kg)	Total Hepta (mg/kg)	Total Octa (mg/kg)
MJ618	1,2,3,7,8,9-HxCDF	8.1E-07	J	8.1E-07					
MJ618	1,2,3,7,8-PeCDD	4.9E-07	J	4.9E-07					
MJ618	1,2,3,7,8-PeCDF	6.5E-07	J	6.5E-07					
MJ618	2,3,4,6,7,8-HxCDF	1.5E-06	J	1.5E-06					
MJ618	2,3,4,7,8-PeCDF	1.6E-06	J	1.6E-06					
MJ618	2,3,7,8-TCDD	2.5E-07	U	1.3E-07					
MJ618	2,3,7,8-TCDF	1.5E-06		1.5E-06					
MJ618	OCDD	1.5E-03		1.5E-03					
MJ618	OCDF	5.0E-05		5.0E-05					
MJ618	Total HpCDD	3.7E-04		3.7E-04					
MJ618	Total HpCDF	7.0E-05		7.0E-05					
MJ618	Total HxCDD	3.0E-05		3.0E-05					
MJ618	Total HxCDF	4.0E-05		4.0E-05					
MJ618	Total PeCDD	3.3E-06		3.3E-06					
MJ618	Total PeCDF	1.0E-05		1.0E-05					
MJ618	Total TCDD	4.0E-06		4.0E-06					
MJ618	Total TCDF	1.0E-05		1.0E-05					
MJ617	1,2,3,4,6,7,8-HpCDD	7.0E-05		7.0E-05	2.4E-07	1.1E-06	7.0E-06	8.1E-05	1.0E-03
MJ617	1,2,3,4,6,7,8-HpCDF	1.0E-05		1.0E-05					
MJ617	1,2,3,4,7,8,9-HpCDF	1.2E-06	J	1.2E-06					
MJ617	1,2,3,4,7,8-HxCDD	8.4E-07	J	8.4E-07					
MJ617	1,2,3,4,7,8-HxCDF	8.0E-07	J	8.0E-07					
MJ617	1,2,3,6,7,8-HxCDD	2.1E-06	J	2.1E-06					
MJ617	1,2,3,6,7,8-HxCDF	4.4E-07	J	4.4E-07					
MJ617	1,2,3,7,8,9-HxCDD	1.9E-06	J	1.9E-06					
MJ617	1,2,3,7,8,9-HxCDF	2.9E-07	UJ	1.4E-07					
MJ617	1,2,3,7,8-PeCDD	4.8E-07	J	4.8E-07					
MJ617	1,2,3,7,8-PeCDF	1.8E-07	UJ	9.1E-08					
MJ617	2,3,4,6,7,8-HxCDF	7.1E-07	J	7.1E-07					
MJ617	2,3,4,7,8-PeCDF	5.3E-07	J	5.3E-07					
MJ617	2,3,7,8-TCDD	1.1E-07	U	5.6E-08					
MJ617	2,3,7,8-TCDF	3.7E-07	UJ	1.9E-07					
MJ617	OCDD	9.5E-04		9.5E-04					
MJ617	OCDF	9.0E-05		9.0E-05					
MJ617	Total HpCDD	1.5E-04		1.5E-04					
MJ617	Total HpCDF	6.0E-05		6.0E-05					
MJ617	Total HxCDD	2.0E-05		2.0E-05					
MJ617	Total HxCDF	2.0E-05		2.0E-05					
MJ617	Total PeCDD	1.2E-06		1.2E-06					
MJ617	Total PeCDF	4.8E-06		4.8E-06					
MJ617	Total TCDD	1.1E-07	U	5.6E-08					
MJ617	Total TCDF	2.0E-06		2.0E-06					
MJ775	1,2,3,4,6,7,8-HpCDD	2.7E-02		2.7E-02	4.5E-05	1.3E-04	1.9E-03	2.9E-02	2.8E-01
MJ775	1,2,3,4,6,7,8-HpCDF	2.5E-03		2.5E-03					
MJ775	1,2,3,4,7,8,9-HpCDF	2.3E-04		2.3E-04					
MJ775	1,2,3,4,7,8-HxCDD	2.4E-04		2.4E-04					
MJ775	1,2,3,4,7,8-HxCDF	8.0E-05		8.0E-05					
MJ775	1,2,3,6,7,8-HxCDD	9.0E-04		9.0E-04					
MJ775	1,2,3,6,7,8-HxCDF	8.0E-05	J	8.0E-05					
MJ775	1,2,3,7,8,9-HxCDD	4.7E-04		4.7E-04					
MJ775	1,2,3,7,8,9-HxCDF	2.0E-05		2.0E-05					
MJ775	1,2,3,7,8-PeCDD	9.0E-05		9.0E-05					
MJ775	1,2,3,7,8-PeCDF	1.0E-05		1.0E-05					
MJ775	2,3,4,6,7,8-HxCDF	1.4E-04		1.4E-04					

PCDD/PCDF Congener Group Summation for Soil/Sediment (0-2 feet bgs)
New Conservation Yard RFI Site

EPA ID	PCDD/PCDF Congener	Measured Concentration [a] (mg/kg)	Data Qualifier	Adjusted Concentration [b] (mg/kg)	Sum of PCDD/PCDF Congener Concentrations				
					Total Tetra (mg/kg)	Total Penta (mg/kg)	Total Hexa (mg/kg)	Total Hepta (mg/kg)	Total Octa (mg/kg)
MJ775	2,3,4,7,8-PeCDF	3.0E-05		3.0E-05					
MJ775	2,3,7,8-TCDD	4.0E-05		4.0E-05					
MJ775	2,3,7,8-TCDF	4.8E-06		4.8E-06					
MJ775	OCDD	2.8E-01		2.8E-01					
MJ775	OCDF	6.9E-03		6.9E-03					
MJ775	Total HpCDD	5.5E-02		5.5E-02					
MJ775	Total HpCDF	1.1E-02		1.1E-02					
MJ775	Total HxCDD	6.0E-03		6.0E-03					
MJ775	Total HxCDF	3.9E-03	J	3.9E-03					
MJ775	Total PeCDD	4.7E-04		4.7E-04					
MJ775	Total PeCDF	6.6E-04	J	6.6E-04					
MJ775	Total TCDD	8.0E-05		8.0E-05					
MJ775	Total TCDF	1.9E-04		1.9E-04					
MJ724	1,2,3,4,6,7,8-HpCDD	1.1E-02		1.1E-02	1.5E-05	8.0E-05	1.2E-03	1.4E-02	1.3E-01
MJ724	1,2,3,4,6,7,8-HpCDF	2.2E-03		2.2E-03					
MJ724	1,2,3,4,7,8,9-HpCDF	2.1E-04		2.1E-04					
MJ724	1,2,3,4,7,8-HxCDD	1.3E-04		1.3E-04					
MJ724	1,2,3,4,7,8-HxCDF	8.0E-05		8.0E-05					
MJ724	1,2,3,6,7,8-HxCDD	5.9E-04		5.9E-04					
MJ724	1,2,3,6,7,8-HxCDF	6.0E-05	J	6.0E-05					
MJ724	1,2,3,7,8,9-HxCDD	1.8E-04		1.8E-04					
MJ724	1,2,3,7,8,9-HxCDF	2.0E-05		2.0E-05					
MJ724	1,2,3,7,8-PeCDD	5.0E-05		5.0E-05					
MJ724	1,2,3,7,8-PeCDF	1.0E-05		1.0E-05					
MJ724	2,3,4,6,7,8-HxCDF	1.4E-04		1.4E-04					
MJ724	2,3,4,7,8-PeCDF	2.0E-05		2.0E-05					
MJ724	2,3,7,8-TCDD	1.0E-05		1.0E-05					
MJ724	2,3,7,8-TCDF	4.9E-06		4.9E-06					
MJ724	OCDD	1.2E-01		1.2E-01					
MJ724	OCDF	5.3E-03		5.3E-03					
MJ724	Total HpCDD	2.0E-02		2.0E-02					
MJ724	Total HpCDF	1.1E-02		1.1E-02					
MJ724	Total HxCDD	2.9E-03		2.9E-03					
MJ724	Total HxCDF	4.2E-03	J	4.2E-03					
MJ724	Total PeCDD	2.9E-04		2.9E-04					
MJ724	Total PeCDF	6.2E-04	J	6.2E-04					
MJ724	Total TCDD	4.0E-05		4.0E-05					
MJ724	Total TCDF	1.5E-04		1.5E-04					
MJ725	1,2,3,4,6,7,8-HpCDD	2.0E-04		2.0E-04	5.1E-07	1.0E-06	1.7E-05	2.3E-04	2.4E-03
MJ725	1,2,3,4,6,7,8-HpCDF	3.0E-05		3.0E-05					
MJ725	1,2,3,4,7,8,9-HpCDF	2.1E-06	J	2.1E-06					
MJ725	1,2,3,4,7,8-HxCDD	1.4E-06	J	1.4E-06					
MJ725	1,2,3,4,7,8-HxCDF	7.7E-07	J	7.7E-07					
MJ725	1,2,3,6,7,8-HxCDD	1.0E-05		1.0E-05					
MJ725	1,2,3,6,7,8-HxCDF	6.4E-07	J	6.4E-07					
MJ725	1,2,3,7,8,9-HxCDD	2.8E-06		2.8E-06					
MJ725	1,2,3,7,8,9-HxCDF	2.3E-07	J	2.3E-07					
MJ725	1,2,3,7,8-PeCDD	5.9E-07	J	5.9E-07					
MJ725	1,2,3,7,8-PeCDF	1.0E-07	J	1.0E-07					
MJ725	2,3,4,6,7,8-HxCDF	1.2E-06	J	1.2E-06					
MJ725	2,3,4,7,8-PeCDF	3.5E-07	J	3.5E-07					
MJ725	2,3,7,8-TCDD	2.7E-07	J	2.7E-07					
MJ725	2,3,7,8-TCDF	2.4E-07	J	2.4E-07					
MJ725	OCDD	2.3E-03		2.3E-03					

PCDD/PCDF Congener Group Summation for Soil/Sediment (0-2 feet bgs)
New Conservation Yard RFI Site

EPA ID	PCDD/PCDF Congener	Measured Concentration [a] (mg/kg)	Data Qualifier	Adjusted Concentration [b] (mg/kg)	Sum of PCDD/PCDF Congener Concentrations Total Tetra (mg/kg)	Total Penta (mg/kg)	Total Hexa (mg/kg)	Total Hepta (mg/kg)	Total Octa (mg/kg)
MJ725	OCDF	8.0E-05		8.0E-05					
MJ725	Total HpCDD	3.9E-04		3.9E-04					
MJ725	Total HpCDF	1.1E-04		1.1E-04					
MJ725	Total HxCDD	4.0E-05		4.0E-05					
MJ725	Total HxCDF	4.0E-05	J	4.0E-05					
MJ725	Total PeCDD	3.3E-06		3.3E-06					
MJ725	Total PeCDF	1.0E-05		1.0E-05					
MJ725	Total TCDD	5.7E-07		5.7E-07					
MJ725	Total TCDF	3.2E-06		3.2E-06					
MJ726	1,2,3,4,6,7,8-HpCDD	2.2E-02		2.2E-02	3.0E-05	1.2E-04	2.2E-03	2.8E-02	3.1E-01
MJ726	1,2,3,4,6,7,8-HpCDF	5.7E-03	J	5.7E-03					
MJ726	1,2,3,4,7,8,9-HpCDF	4.9E-04		4.9E-04					
MJ726	1,2,3,4,7,8-HxCDD	1.7E-04		1.7E-04					
MJ726	1,2,3,4,7,8-HxCDF	1.5E-04		1.5E-04					
MJ726	1,2,3,6,7,8-HxCDD	1.2E-03		1.2E-03					
MJ726	1,2,3,6,7,8-HxCDF	1.1E-04	J	1.1E-04					
MJ726	1,2,3,7,8,9-HxCDD	2.9E-04		2.9E-04					
MJ726	1,2,3,7,8,9-HxCDF	3.0E-05		3.0E-05					
MJ726	1,2,3,7,8-PeCDD	8.0E-05		8.0E-05					
MJ726	1,2,3,7,8-PeCDF	1.0E-05		1.0E-05					
MJ726	2,3,4,6,7,8-HxCDF	2.8E-04		2.8E-04					
MJ726	2,3,4,7,8-PeCDF	3.0E-05		3.0E-05					
MJ726	2,3,7,8-TCDD	2.0E-05		2.0E-05					
MJ726	2,3,7,8-TCDF	1.0E-05	J	1.0E-05					
MJ726	OCDD	3.0E-01		3.0E-01					
MJ726	OCDF	1.5E-02		1.5E-02					
MJ726	Total HpCDD	3.7E-02		3.7E-02					
MJ726	Total HpCDF	2.7E-02	J	2.7E-02					
MJ726	Total HxCDD	5.8E-03		5.8E-03					
MJ726	Total HxCDF	1.1E-02	J	1.1E-02					
MJ726	Total PeCDD	3.9E-04		3.9E-04					
MJ726	Total PeCDF	1.4E-03	J	1.4E-03					
MJ726	Total TCDD	4.0E-05		4.0E-05					
MJ726	Total TCDF	1.7E-04	J	1.7E-04					
MJ729	1,2,3,4,6,7,8-HpCDD	4.5E-03		4.5E-03	1.1E-05	1.5E-05	3.2E-04	5.1E-03	5.4E-02
MJ729	1,2,3,4,6,7,8-HpCDF	5.4E-04		5.4E-04					
MJ729	1,2,3,4,7,8,9-HpCDF	5.0E-05		5.0E-05					
MJ729	1,2,3,4,7,8-HxCDD	3.0E-05		3.0E-05					
MJ729	1,2,3,4,7,8-HxCDF	2.0E-05		2.0E-05					
MJ729	1,2,3,6,7,8-HxCDD	1.6E-04		1.6E-04					
MJ729	1,2,3,6,7,8-HxCDF	1.0E-05		1.0E-05					
MJ729	1,2,3,7,8,9-HxCDD	7.0E-05		7.0E-05					
MJ729	1,2,3,7,8,9-HxCDF	3.5E-06		3.5E-06					
MJ729	1,2,3,7,8-PeCDD	1.0E-05		1.0E-05					
MJ729	1,2,3,7,8-PeCDF	1.4E-06	J	1.4E-06					
MJ729	2,3,4,6,7,8-HxCDF	3.0E-05		3.0E-05					
MJ729	2,3,4,7,8-PeCDF	3.9E-06		3.9E-06					
MJ729	2,3,7,8-TCDD	1.0E-05		1.0E-05					
MJ729	2,3,7,8-TCDF	1.0E-06		1.0E-06					
MJ729	OCDD	5.3E-02		5.3E-02					
MJ729	OCDF	1.5E-03		1.5E-03					
MJ729	Total HpCDD	8.2E-03		8.2E-03					
MJ729	Total HpCDF	2.6E-03		2.6E-03					
MJ729	Total HxCDD	8.5E-04		8.5E-04					

PCDD/PCDF Congener Group Summation for Soil/Sediment (0-2 feet bgs)
New Conservation Yard RFI Site

EPA ID	PCDD/PCDF Congener	Measured Concentration [a] (mg/kg)	Data Qualifier	Adjusted Concentration [b] (mg/kg)	Sum of PCDD/PCDF Congener Concentrations				
					Total Tetra (mg/kg)	Total Penta (mg/kg)	Total Hexa (mg/kg)	Total Hepta (mg/kg)	Total Octa (mg/kg)
MJ729	Total HxCDF	8.4E-04	J	8.4E-04					
MJ729	Total PeCDD	6.0E-05		6.0E-05					
MJ729	Total PeCDF	1.0E-04		1.0E-04					
MJ729	Total TCDD	1.0E-05		1.0E-05					
MJ729	Total TCDF	3.0E-05		3.0E-05					
MJ730	1,2,3,4,6,7,8-HpCDD	9.2E-04		9.2E-04	9.6E-07	3.6E-06	6.7E-05	1.1E-03	1.1E-02
MJ730	1,2,3,4,6,7,8-HpCDF	1.4E-04		1.4E-04					
MJ730	1,2,3,4,7,8,9-HpCDF	1.0E-05		1.0E-05					
MJ730	1,2,3,4,7,8-HxCDD	1.0E-05		1.0E-05					
MJ730	1,2,3,4,7,8-HxCDF	3.5E-06		3.5E-06					
MJ730	1,2,3,6,7,8-HxCDD	3.0E-05		3.0E-05					
MJ730	1,2,3,6,7,8-HxCDF	2.9E-06		2.9E-06					
MJ730	1,2,3,7,8,9-HxCDD	1.0E-05		1.0E-05					
MJ730	1,2,3,7,8,9-HxCDF	9.6E-07	J	9.6E-07					
MJ730	1,2,3,7,8-PeCDD	2.3E-06	J	2.3E-06					
MJ730	1,2,3,7,8-PeCDF	3.8E-07	J	3.8E-07					
MJ730	2,3,4,6,7,8-HxCDF	1.0E-05		1.0E-05					
MJ730	2,3,4,7,8-PeCDF	9.5E-07	J	9.5E-07					
MJ730	2,3,7,8-TCDD	6.0E-07		6.0E-07					
MJ730	2,3,7,8-TCDF	3.6E-07	J	3.6E-07					
MJ730	OCDD	1.1E-02		1.1E-02					
MJ730	OCDF	3.8E-04		3.8E-04					
MJ730	Total HpCDD	1.6E-03		1.6E-03					
MJ730	Total HpCDF	6.3E-04		6.3E-04					
MJ730	Total HxCDD	1.5E-04		1.5E-04					
MJ730	Total HxCDF	1.9E-04	J	1.9E-04					
MJ730	Total PeCDD	1.0E-05		1.0E-05					
MJ730	Total PeCDF	2.0E-05		2.0E-05					
MJ730	Total TCDD	1.1E-06		1.1E-06					
MJ730	Total TCDF	1.0E-05		1.0E-05					
MJ732	1,2,3,4,6,7,8-HpCDD	4.1E-04		4.1E-04	6.3E-07	1.9E-06	2.9E-05	4.5E-04	4.7E-03
MJ732	1,2,3,4,6,7,8-HpCDF	4.0E-05		4.0E-05					
MJ732	1,2,3,4,7,8,9-HpCDF	4.3E-06		4.3E-06					
MJ732	1,2,3,4,7,8-HxCDD	3.0E-06		3.0E-06					
MJ732	1,2,3,4,7,8-HxCDF	1.5E-06	J	1.5E-06					
MJ732	1,2,3,6,7,8-HxCDD	1.0E-05		1.0E-05					
MJ732	1,2,3,6,7,8-HxCDF	1.4E-06	J	1.4E-06					
MJ732	1,2,3,7,8,9-HxCDD	1.0E-05		1.0E-05					
MJ732	1,2,3,7,8,9-HxCDF	4.3E-07	J	4.3E-07					
MJ732	1,2,3,7,8-PeCDD	1.1E-06	J	1.1E-06					
MJ732	1,2,3,7,8-PeCDF	1.9E-07	J	1.9E-07					
MJ732	2,3,4,6,7,8-HxCDF	2.8E-06		2.8E-06					
MJ732	2,3,4,7,8-PeCDF	5.7E-07	J	5.7E-07					
MJ732	2,3,7,8-TCDD	3.9E-07	J	3.9E-07					
MJ732	2,3,7,8-TCDF	2.5E-07	J	2.5E-07					
MJ732	OCDD	4.6E-03		4.6E-03					
MJ732	OCDF	1.0E-04		1.0E-04					
MJ732	Total HpCDD	7.9E-04		7.9E-04					
MJ732	Total HpCDF	1.7E-04		1.7E-04					
MJ732	Total HxCDD	9.0E-05		9.0E-05					
MJ732	Total HxCDF	7.0E-05	J	7.0E-05					
MJ732	Total PeCDD	1.0E-05		1.0E-05					
MJ732	Total PeCDF	1.0E-05		1.0E-05					
MJ732	Total TCDD	7.5E-07		7.5E-07					

PCDD/PCDF Congener Group Summation for Soil/Sediment (0-2 feet bgs)
New Conservation Yard RFI Site

EPA ID	PCDD/PCDF Congener	Measured Concentration [a] (mg/kg)	Data Qualifier	Adjusted Concentration [b] (mg/kg)	Sum of PCDD/PCDF Congener Concentrations Total Tetra (mg/kg)	Total Penta (mg/kg)	Total Hexa (mg/kg)	Total Hepta (mg/kg)	Total Octa (mg/kg)
MJ732	Total TCDF	3.5E-06		3.5E-06					
MJ620	1,2,3,4,6,7,8-HpCDD	1.9E-03		1.9E-03	3.9E-06	1.4E-05	1.8E-04	2.2E-03	2.1E-02
MJ620	1,2,3,4,6,7,8-HpCDF	3.0E-04		3.0E-04					
MJ620	1,2,3,4,7,8,9-HpCDF	3.0E-05		3.0E-05					
MJ620	1,2,3,4,7,8-HxCDD	2.0E-05		2.0E-05					
MJ620	1,2,3,4,7,8-HxCDF	1.0E-05		1.0E-05					
MJ620	1,2,3,6,7,8-HxCDD	9.0E-05		9.0E-05					
MJ620	1,2,3,6,7,8-HxCDF	1.0E-05		1.0E-05					
MJ620	1,2,3,7,8,9-HxCDD	3.0E-05		3.0E-05					
MJ620	1,2,3,7,8,9-HxCDF	2.2E-06	J	2.2E-06					
MJ620	1,2,3,7,8-PeCDD	1.0E-05		1.0E-05					
MJ620	1,2,3,7,8-PeCDF	1.3E-06	J	1.3E-06					
MJ620	2,3,4,6,7,8-HxCDF	2.0E-05		2.0E-05					
MJ620	2,3,4,7,8-PeCDF	2.9E-06		2.9E-06					
MJ620	2,3,7,8-TCDD	2.8E-06		2.8E-06					
MJ620	2,3,7,8-TCDF	1.1E-06		1.1E-06					
MJ620	OCDD	2.0E-02		2.0E-02					
MJ620	OCDF	7.4E-04		7.4E-04					
MJ620	Total HpCDD	3.5E-03		3.5E-03					
MJ620	Total HpCDF	1.4E-03		1.4E-03					
MJ620	Total HxCDD	4.8E-04		4.8E-04					
MJ620	Total HxCDF	5.8E-04		5.8E-04					
MJ620	Total PeCDD	6.0E-05		6.0E-05					
MJ620	Total PeCDF	1.0E-04		1.0E-04					
MJ620	Total TCDD	1.0E-05		1.0E-05					
MJ620	Total TCDF	2.0E-05		2.0E-05					
MJ619	1,2,3,4,6,7,8-HpCDD	2.4E-03		2.4E-03	5.1E-06	1.6E-05	2.0E-04	2.8E-03	2.9E-02
MJ619	1,2,3,4,6,7,8-HpCDF	3.8E-04		3.8E-04					
MJ619	1,2,3,4,7,8,9-HpCDF	4.0E-05		4.0E-05					
MJ619	1,2,3,4,7,8-HxCDD	2.0E-05		2.0E-05					
MJ619	1,2,3,4,7,8-HxCDF	1.0E-05		1.0E-05					
MJ619	1,2,3,6,7,8-HxCDD	1.0E-04		1.0E-04					
MJ619	1,2,3,6,7,8-HxCDF	1.0E-05		1.0E-05					
MJ619	1,2,3,7,8,9-HxCDD	4.0E-05		4.0E-05					
MJ619	1,2,3,7,8,9-HxCDF	2.6E-06		2.6E-06					
MJ619	1,2,3,7,8-PeCDD	1.0E-05		1.0E-05					
MJ619	1,2,3,7,8-PeCDF	1.5E-06	J	1.5E-06					
MJ619	2,3,4,6,7,8-HxCDF	2.0E-05		2.0E-05					
MJ619	2,3,4,7,8-PeCDF	4.4E-06		4.4E-06					
MJ619	2,3,7,8-TCDD	2.9E-06		2.9E-06					
MJ619	2,3,7,8-TCDF	2.2E-06		2.2E-06					
MJ619	OCDD	2.8E-02		2.8E-02					
MJ619	OCDF	1.0E-03		1.0E-03					
MJ619	Total HpCDD	4.4E-03		4.4E-03					
MJ619	Total HpCDF	1.7E-03		1.7E-03					
MJ619	Total HxCDD	5.5E-04		5.5E-04					
MJ619	Total HxCDF	6.8E-04		6.8E-04					
MJ619	Total PeCDD	5.0E-05		5.0E-05					
MJ619	Total PeCDF	1.1E-04		1.1E-04					
MJ619	Total TCDD	1.0E-05		1.0E-05					
MJ619	Total TCDF	3.0E-05		3.0E-05					
MJ621	1,2,3,4,6,7,8-HpCDD	4.6E-04		4.6E-04	1.5E-06	3.9E-06	5.7E-05	5.5E-04	5.4E-03
MJ621	1,2,3,4,6,7,8-HpCDF	8.0E-05		8.0E-05					
MJ621	1,2,3,4,7,8,9-HpCDF	1.0E-05		1.0E-05					

PCDD/PCDF Congener Group Summation for Soil/Sediment (0-2 feet bgs)
New Conservation Yard RFI Site

EPA ID	PCDD/PCDF Congener	Measured Concentration [a] (mg/kg)	Data Qualifier	Adjusted Concentration [b] (mg/kg)	Sum of PCDD/PCDF Congener Concentrations Total Tetra (mg/kg)	Total Penta (mg/kg)	Total Hexa (mg/kg)	Total Hepta (mg/kg)	Total Octa (mg/kg)
MJ621	1,2,3,4,7,8-HxCDD	1.0E-05		1.0E-05					
MJ621	1,2,3,4,7,8-HxCDF	3.6E-06		3.6E-06					
MJ621	1,2,3,6,7,8-HxCDD	2.0E-05		2.0E-05					
MJ621	1,2,3,6,7,8-HxCDF	2.6E-06		2.6E-06					
MJ621	1,2,3,7,8,9-HxCDD	1.0E-05		1.0E-05					
MJ621	1,2,3,7,8,9-HxCDF	6.6E-07	J	6.6E-07					
MJ621	1,2,3,7,8-PeCDD	2.2E-06	J	2.2E-06					
MJ621	1,2,3,7,8-PeCDF	4.6E-07	J	4.6E-07					
MJ621	2,3,4,6,7,8-HxCDF	1.0E-05		1.0E-05					
MJ621	2,3,4,7,8-PeCDF	1.3E-06	J	1.3E-06					
MJ621	2,3,7,8-TCDD	5.4E-07		5.4E-07					
MJ621	2,3,7,8-TCDF	9.8E-07	J	9.8E-07					
MJ621	OCDD	5.2E-03		5.2E-03					
MJ621	OCDF	2.3E-04		2.3E-04					
MJ621	Total HpCDD	8.9E-04		8.9E-04					
MJ621	Total HpCDF	3.3E-04		3.3E-04					
MJ621	Total HxCDD	1.1E-04		1.1E-04					
MJ621	Total HxCDF	1.4E-04		1.4E-04					
MJ621	Total PeCDD	1.0E-05		1.0E-05					
MJ621	Total PeCDF	2.0E-05		2.0E-05					
MJ621	Total TCDD	7.6E-07		7.6E-07					
MJ621	Total TCDF	1.0E-05		1.0E-05					
				MAX	4.5E-05	1.3E-04	2.2E-03	2.9E-02	3.1E-01

Maximum of Total Summed Congener Concentrations

Total Tetra	4.5E-05
Total Penta	1.3E-04
Total Hexa	2.2E-03
Total Hepta	2.9E-02
Total Octa	3.1E-01

Notes:

a. Measured concentration - concentration reported by the analytial laboratory

b. Adjusted concentration - concentration reported by the analytical laboratory if the chemical was detected, or estimated at one-half the sample quantitation limit if not detected.

PCDD/PCDF - polychlorinated dibenzo-p-dioxins and dibenzofurans

Total Tetra - sum of the 2,3,7,8-substituted tetraclorinated dibenzo-p-dioxin and dibenzofuran congeners.

Total Penta - sum of the 2,3,7,8-substituted pentaclorinated dibenzo-p-dioxin and dibenzofuran congeners.

Total Hexa - sum of the 2,3,7,8-substituted hexaclorinated dibenzo-p-dioxin and dibenzofuran congeners.

Total Hepta - sum of the 2,3,7,8-substituted heptaclorinated dibenzo-p-dioxin and dibenzofuran congeners.

Total Octa - sum of the 2,3,7,8-substituted Octaclorinated dibenzo-p-dioxin and dibenzofuran congeners.

J - concentration estimated

U - not detected. Concentration shown is the SQL.

UJ - not detected. Concentration shown is the estimated SQL.

mg/kg - milligrams per kilogram

bgs- below ground surface

Comparison of Inorganic Compound and PCDD/PCDF Concentrations in Soil/Sediment (0-10 feet bgs) Against Background [a]
New Conservation Yard RFI Site

PCDD/PCDF Congener Groups	Maximum Background (mg/kg)	Maximum RFI Site (mg/kg)	Results of Wilcoxon-Rank Sum Test	RFI Site Ever Detected?	RFI Site Exceeds Background?
Total Tetra	9.5E-07	4.5E-05	Yes	Yes	Yes
Total Penta	8.7E-07	1.3E-04	Yes	Yes	Yes
Total Hexa	5.1E-06	2.2E-03	Yes	Yes	Yes
Total Hepta	1.6E-05	2.9E-02	Yes	Yes	Yes
Total Octa	1.5E-04	3.1E-01	Yes	Yes	Yes

Inorganic Compounds	Maximum Background [a] (mg/kg)	Maximum RFI Site (mg/kg)	Results of Wilcoxon-Rank Sum Test	RFI Site Ever Detected?	RFI Site Exceeds Background?
Aluminum	2.0E+04	1.4E+04	No	Yes	No [b]
Antimony	8.7E+00	< 12	No	No	No
Arsenic	1.5E+01	9.0E+00	No	Yes	No [b]
Barium	1.4E+02	1.0E+03	No	Yes	No [b]
Beryllium	1.1E+00	8.0E-01	No	Yes	No [b]
Boron	9.7E+00	0.0E+00	No	No	No
Cadmium	1.0E+00	2.0E+01	Yes	Yes	Yes
Chromium	3.7E+01	7.2E+01	No	Yes	No [b]
Hexavalent chromium		<2.2	No	No	No
Cobalt	2.1E+01	1.4E+01	No	Yes	No [b]
Copper	2.9E+01	2.0E+02	No	Yes	No [b]
Lead	3.4E+01	1.0E+02	No	Yes	No [b]
Mercury	9.0E-02	1.0E+00	No	Yes	No [b]
Molybdenum	5.3E+00	< 12	No	No	Yes [c]
Nickel	2.9E+01	1.3E+02	No	Yes	No [b]
Selenium	6.6E-01	< 6	No	No	Yes [c]
Silver	7.9E-01	1.5E+02	Yes	Yes	Yes
Thallium	4.6E-01	3.4E-01	No	Yes	No [b]
Vanadium	6.2E+01	3.9E+01	No	Yes	No [b]
Zinc	1.1E+02	3.4E+03	Yes	Yes	Yes

Notes:

a. The concentrations of inorganic compounds for which soil background data are not available are considered to be above background concentrations if they are detected and are potentially site-related.

b. Determined be within the range of background since the RFI site sample population for soils at 0 to 10 feet bgs was found to be no different than the background sample population at p=0.05 based on the Wilcoxon Rank Sum Test.

c. Although analyte was not detetected, it was conservatively assumed to exceed background because a concentration of one half the maximum SQL is greater than background concentrations.

PCDD/PCDF - polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.
Total Tetra - sum of the 2,3,7,8-substituted tetrachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations.
Total Penta - sum of the 2,3,7,8-substituted pentachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations.
Total Hexa - sum of the 2,3,7,8-substituted hexachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations.
Total Hepta - sum of the 2,3,7,8-substituted heptachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations.
Total Octa - sum of the octachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations.
95% UCL - 95 percent upper confidence limit on the mean
mg/kg - milligrams per kilogram
bgs- below ground surface

Comparison of Inorganic Compound and PCDD/PCDF Concentrations in Soil/Sediment (0-2 feet bgs) Against Background [a]
New Conservation Yard RFI Site

PCDD/PCDF Congener Groups	Maximum Background (mg/kg)	Maximum RFI Site (mg/kg)	Results of Wilcoxon-Rank Sum Test	RFI Site Ever Detected?	RFI Site Exceeds Background?
Total Tetra	9.5E-07	4.5E-05	Yes	Yes	Yes
Total Penta	8.7E-07	1.3E-04	Yes	Yes	Yes
Total Hexa	5.1E-06	2.2E-03	Yes	Yes	Yes
Total Hepta	1.6E-05	2.9E-02	Yes	Yes	Yes
Total Octa	1.5E-04	3.1E-01	Yes	Yes	Yes

Inorganic Compounds	Maximum Background [a] (mg/kg)	Maximum RFI Site (mg/kg)	Results of Wilcoxon-Rank Sum Test	RFI Site Ever Detected?	RFI Site Exceeds Background?
Aluminum	2.0E+04	1.4E+04	Yes	Yes	No [b]
Antimony	8.7E+00	<12	Yes	No	No
Arsenic	1.5E+01	9.0E+00	Yes	Yes	No [b]
Barium	1.4E+02	1.0E+03	Yes	Yes	No [b]
Beryllium	1.1E+00	7.0E-01	Yes	Yes	No [b]
Boron	9.7E+00	0.0E+00	Yes	No	No
Cadmium	1.0E+00	2.0E+01	Yes	Yes	Yes
Chromium	3.7E+01	7.2E+01	Yes	Yes	No [b]
Hexavalent chromium		<2.2	Yes	No	No
Cobalt	2.1E+01	1.4E+01	Yes	Yes	No [b]
Copper	2.9E+01	2.0E+02	Yes	Yes	No [b]
Lead	3.4E+01	1.0E+02	Yes	Yes	No [b]
Mercury	9.0E-02	1.0E+00	Yes	Yes	No [b]
Molybdenum	5.3E+00	<12	Yes	No	Yes [c]
Nickel	2.9E+01	1.3E+02	Yes	Yes	No [b]
Selenium	6.6E-01	<6	Yes	No	Yes [c]
Silver	7.9E-01	1.5E+02	Yes	Yes	Yes
Thallium	4.6E-01	3.4E-01	Yes	Yes	No [b]
Vanadium	6.2E+01	3.8E+01	Yes	Yes	No [b]
Zinc	1.1E+02	3.4E+03	Yes	Yes	Yes

Notes:

a. The concentrations of inorganic compounds for which soil background data are not available are considered to be above background concentrations if they are detected and are potentially site-related.

b. Determined be within the range of background since the RFI site sample population for soils at 0 to 2 feet bgs was found to be no different than the background sample population at p=0.05 based on the Wilcoxon Rank Sum Test.

c. Although analyte was not detetected, it was conservatively assumed to exceed background because a concentration of one half the maximum SQL is greater than background concentrations.

PCDD/PCDF - Polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.

Total Tetra - sum of the 2,3,7,8-substituted tetrachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations.

Total Penta - sum of the 2,3,7,8-substituted pentachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations.

Total Hexa - sum of the 2,3,7,8-substituted hexachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations.

Total Hepta - sum of the 2,3,7,8-substituted heptachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations.

Total Octa - sum of the octachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations.

mg/kg - milligrams per kilogram

bgs- below ground surface

Selection of Chemicals of Potential Concern in Chatsworth Groundwater - In-Direct Contact
New Conservation Yard RFI Site

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (mg/L)	Potentially Site Related	Chemical Detected in Laboratory Blanks [a]	Maximum Detected Concentration Exceeds Background [b]	COPC
VOCs								
Acetone	6	2	33	1.6E-02	Yes	No	-	Yes
Carbon disulfide	6	0	0	-	Yes	No	-	No
Toluene	6	1	17	1.8E-03	Yes	No	-	Yes
Trichloroethene	6	1	17	5.3E-04	Yes	No	-	Yes

Notes:
a. Any chemical eliminated as COPC due to laboratory blank contamination is discussed in Section 3.0.
b. Background comparision for inorganic compounds presented in Attachment 1 Spreadsheet C1-7.
c. Selected as a near-surface groundwater COPC since it was selected as a COPC in soil at 0 to 10 feet bgs.
COPC - chemical of potential concern
VOC - volatile organic chemicals
"-" not applicable
bgs- below ground surface

Selection of Chemicals of Potential Concern in Chatsworth Formation Groundwater
Group 6 Bundle

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (mg/L)	Potentially Site Related	Chemical Detected in Laboratory Blanks [a]	Maximum Detected Concentration Exceeds Background [b]	COPC
Inorganic Compounds								
Copper	10	9	90	1.8E-02	No	No	Yes	Yes
Fluoride	10	10	100	5.6E-01	No	No	Yes	Yes
Nitrate	10	5	50	1.4E+01	No	No	Yes	Yes
Thallium	8	2	25	5.4E-04	No	No	Yes	Yes
VOCs								
1,1,1-Trichloroethane	34	0	0	0.0E+00	No	No	-	No
1,1,2-Trichloro-1,2,2-trifluoroethane	28	0	0	0.0E+00	No	No	-	No
1,1-Dichloroethane	34	1	3	2.6E-03	No	No	-	No
1,1-Dichloroethene	34	0	0	0.0E+00	No	No	-	No
1,2-Dichloroethane	34	1	3	9.0E-04	No	No	-	No
2-Butanone	27	0	0	0.0E+00	No	No	-	No
2-Hexanone	26	0	0	0.0E+00	No	No	-	No
4-Isopropyltoluene	1	0	0	0.0E+00	No	No	-	No
Acetone	28	7	25	1.6E-02	No	No	-	Yes
Benzene	29	1	3	5.8E-04	No	No	-	No
Carbon disulfide	26	1	4	2.6E-03	No	No	-	No
Chloromethane	34	3	9	3.2E-04	No	No	-	Yes
cis-1,2-Dichloroethene	32	5	16	5.1E-02	No	No	-	Yes
Ethylbenzene	29	0	0	0.0E+00	No	No	-	No
m,p-Xylene	26	0	0	0.0E+00	No	No	-	No
Methylene chloride	34	1	3	6.4E-04	No	No	-	No
o-Xylene	26	0	0	0.0E+00	No	No	-	No
Tetrachloroethene	34	0	0	0.0E+00	No	No	-	No
Toluene	29	1	3	1.8E-03	No	No	-	No
trans-1,2-Dichloroethene	34	0	0	0.0E+00	No	No	-	No
Trichloroethene	34	12	35	1.0E-02	No	No	-	Yes
SVOCs								
2,4-Dinitrophenol	11	0	0	0.0E+00	No	No	-	No
2-Methylnaphthalene	1	0	0	0.0E+00	No	No	-	No
Acenaphthene	7	0	0	0.0E+00	No	No	-	No
Acenaphthylene	7	0	0	0.0E+00	No	No	-	No
Anthracene	7	0	0	0.0E+00	No	No	-	No
Benzo(a)anthracene	7	0	0	0.0E+00	No	No	-	No
Benzo(a)pyrene	7	0	0	0.0E+00	No	No	-	No
Benzo(b)fluoranthene	7	0	0	0.0E+00	No	No	-	No
Benzo(g,h,i)perylene	7	0	0	0.0E+00	No	No	-	No
Benzo(k)fluoranthene	7	0	0	0.0E+00	No	No	-	No
Chrysene	7	0	0	0.0E+00	No	No	-	No
Dibenz(a,h)anthracene	7	0	0	0.0E+00	No	No	-	No
Dibenzofuran	1	0	0	0.0E+00	No	No	-	No
Fluoranthene	7	0	0	0.0E+00	No	No	-	No
Fluorene	7	0	0	0.0E+00	No	No	-	No
Indeno(1,2,3-cd)pyrene	7	0	0	0.0E+00	No	No	-	No
Naphthalene	7	0	0	0.0E+00	No	No	-	No
Phenanthrene	7	0	0	0.0E+00	No	No	-	No
Pyrene	4	0	0	0.0E+00	No	No	-	No
Total Petroleum Hydrocarbons								
C14-C20(Diesel Range)	1	1	100	5.0E-02	No	No	-	Yes
PCDD/PCDFs								
2,3,7,8-TCDD	1	0	0	0.0E+00	No	No	-	No
1,2,3,7,8-PeCDD	1	0	0	0.0E+00	No	No	-	No
1,2,3,4,7,8-HxCDD	1	0	0	0.0E+00	No	No	-	No
1,2,3,6,7,8-HxCDD	1	0	0	0.0E+00	No	No	-	No

Selection of Chemicals of Potential Concern in Chatsworth Formation Groundwater
Group 6 Bundle

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (mg/L)	Potentially Site Related	Chemical Detected in Laboratory Blanks [a]	Maximum Detected Concentration Exceeds Background [b]	COPC
1,2,3,7,8,9-HxCDD	1	0	0	0.0E+00	No	No	-	No
1,2,3,4,6,7,8-HpCDD	1	0	0	0.0E+00	No	No	-	No
OCDD	1	0	0	0.0E+00	No	No	-	No
2,3,7,8-TCDF	1	0	0	0.0E+00	No	No	-	No
1,2,3,7,8-PeCDF	1	0	0	0.0E+00	No	No	-	No
2,3,4,7,8-PeCDF	1	0	0	0.0E+00	No	No	-	No
1,2,3,4,7,8-HxCDF	1	0	0	0.0E+00	No	No	-	No
1,2,3,6,7,8-HxCDF	1	0	0	0.0E+00	No	No	-	No
2,3,4,6,7,8-HxCDF	1	0	0	0.0E+00	No	No	-	No
1,2,3,7,8,9-HxCDF	1	0	0	0.0E+00	No	No	-	No
1,2,3,4,6,7,8-HpCDF	1	0	0	0.0E+00	No	No	-	No
1,2,3,4,7,8,9-HpCDF	1	0	0	0.0E+00	No	No	-	No
OCDF	1	0	0	0.0E+00	No	No	-	No
PCBs								
Aroclor-1248	1	0	0	0.0E+00	No	No	-	No
Aroclor-1254	1	0	0	0.0E+00	No	No	-	No
Aroclor-1260	1	0	0	0.0E+00	No	No	-	No

Notes:
a. Any chemical eliminated as COPC due to laboratory blank contamination is discussed in Section 3.0.
b. Background comparision for inorganic compounds presented in Appendix C Attachment 1 Spreadsheet 7.
COPC - chemical of potential concern
VOC - volatile organic chemicals
SVOC - semivolatile organic chemicals
PCDD/PDDFs - polychlorinated dibenzo-p-dioxins and dibenzofurans
"-" not applicable
mg/L - milligrams per liter
bgs- below ground surface

Selection of Chemicals of Potential Concern in Soil/Sediment (0-10 feet bgs)
New Conservation Yard RFI Site

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (mg/kg)	Potentially Site Related	Chemical Detected in Laboratory Blanks [a]	WRS Test Indicates Exceeds Background [b]	COPC
Inorganic Compounds								
Aluminum	7	7	100	1.4E+04	Yes	No	No	No [c]
Antimony	14	0	0	-	Yes	No	No	No
Arsenic	21	8	38	9.0E+00	Yes	No	No	No [c]
Barium	24	24	100	1.0E+03	Yes	No	No	Yes [d]
Beryllium	21	13	62	8.0E-01	Yes	No	No	No [c]
Boron	7	0	0	-	Yes	No	No	No
Cadmium	21	10	48	2.0E+01	Yes	No	Yes	Yes
Chromium	21	21	100	7.2E+01	Yes	No	No	Yes
Hexavalent chromium	1	0	0	0.0E+00	Yes	No	No	No
Cobalt	21	21	100	1.4E+01	Yes	No	No	No [c]
Copper	21	21	100	2.0E+02	Yes	No	No	Yes [d]
Lead	28	28	100	1.0E+02	Yes	No	No	Yes [d]
Mercury	22	5	23	1.0E+00	Yes	No	No	Yes [d]
Molybdenum	21	0	0	-	Yes	No	Yes	Yes [e]
Nickel	21	20	95	1.3E+02	Yes	No	No	Yes [d]
Selenium	21	0	0	-	Yes	No	Yes	Yes [e]
Silver	28	15	54	1.5E+02	Yes	No	Yes	Yes
Thallium	21	7	33	3.4E-01	Yes	No	No	No
Vanadium	21	21	100	3.9E+01	Yes	No	No	No
Zinc	25	25	100	3.4E+03	Yes	No	Yes	Yes
VOCs								
1,1,1-Trichloroethane	6	0	0	-	Yes	No	-	No
1,1,2,2-Tetrachloroethane	6	0	0	-	Yes	No	-	No
1,1,2-Trichloroethane	6	0	0	-	Yes	No	-	No
1,1-Dichloroethane	6	0	0	-	Yes	No	-	No
1,1-Dichloroethene	6	0	0	-	Yes	No	-	No
1,2,4-Trichlorobenzene	6	0	0	-	Yes	No	-	No
1,2-Dichlorobenzene	6	0	0	-	Yes	No	-	No
1,2-Dichloroethane	6	0	0	-	Yes	No	-	No
1,2-Dichloropropane	6	0	0	-	Yes	No	-	No
1,3-Dichlorobenzene	6	0	0	-	Yes	No	-	No
1,4-Dichlorobenzene	6	0	0	-	Yes	No	-	No
2-Butanone	6	0	0	-	Yes	No	-	No
2-Chloroethylvinylether	6	0	0	-	Yes	No	-	No
2-Hexanone	6	0	0	-	Yes	No	-	No
4-Methyl-2-pentanone	6	0	0	-	Yes	No	-	No
Acetone	6	0	0	-	Yes	No	-	No
Benzene	6	0	0	-	Yes	No	-	No
Bromodichloromethane	6	0	0	-	Yes	No	-	No
Bromoform	6	0	0	-	Yes	No	-	No
Bromomethane	6	0	0	-	Yes	No	-	No
Carbon disulfide	6	0	0	-	Yes	No	-	No
Carbon tetrachloride	6	0	0	-	Yes	No	-	No
Chlorobenzene	6	0	0	-	Yes	No	-	No
Chloroethane	6	0	0	-	Yes	No	-	No
Chloroform	6	0	0	-	Yes	No	-	No
Chloromethane	6	0	0	-	Yes	No	-	No
cis-1,2-Dichloroethene	-	-	-	-	Yes	No	-	No
cis-1,3-Dichloropropene	6	0	0	-	Yes	No	-	No
Dibromochloromethane	6	0	0	-	Yes	No	-	No

Selection of Chemicals of Potential Concern in Soil/Sediment (0-10 feet bgs)
New Conservation Yard RFI Site

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (mg/kg)	Potentially Site Related	Chemical Detected in Laboratory Blanks [a]	WRS Test Indicates Exceeds Background [b]	COPC
Ethylbenzene	6	0	0	-	Yes	No	-	No
Methylene chloride	6	0	0	-	Yes	No	-	No
Styrene	6	0	0	-	Yes	No	-	No
Tetrachloroethene	6	0	0	-	Yes	No	-	No
Toluene	6	1	17	1.1E-01	Yes	No	-	Yes
trans-1,2-Dichloroethene	6	0	0	-	Yes	No	-	No
trans-1,3-Dichloropropene	6	0	0	-	Yes	No	-	No
Trichloroethene	6	0	0	-	Yes	No	-	No
Vinyl acetate	6	0	0	-	Yes	No	-	No
Vinyl chloride	6	0	0	-	Yes	No	-	No
Xylenes (total)	6	0	0	-	Yes	No	-	No
SVOCs								
2,4,5-Trichlorophenol	6	0	0	-	No	No	-	No
2,4,6-Trichlorophenol	6	0	0	-	No	No	-	No
2,4-Dichlorophenol	6	0	0	-	No	No	-	No
2,4-Dimethylphenol	6	0	0	-	No	No	-	No
2,4-Dinitrophenol	6	0	0	-	No	No	-	No
2,4-Dinitrotoluene	6	0	0	-	No	No	-	No
2,6-Dinitrotoluene	6	0	0	-	No	No	-	No
2-Chloronaphthalene	6	0	0	-	No	No	-	No
2-Chlorophenol	6	0	0	-	No	No	-	No
2-Methylnaphthalene	12	0	0	-	No	No	-	No
2-Methylphenol	6	0	0	-	No	No	-	No
2-Nitroaniline	6	0	0	-	No	No	-	No
2-Nitrophenol	6	0	0	-	No	No	-	No
4-Methylphenol	6	0	0	-	No	No	-	No
3,3'-Dichlorobenzidine	6	0	0	-	No	No	-	No
3-Nitroaniline	6	0	0	-	No	No	-	No
4,6-Dinitro-2-methylphenol	6	0	0	-	No	No	-	No
4-Bromophenyl phenyl ether	6	0	0	-	No	No	-	No
4-Chloro-3-methylphenol	6	0	0	-	No	No	-	No
4-Chloroaniline	6	0	0	-	No	No	-	No
4-Chlorophenyl phenyl ether	6	0	0	-	No	No	-	No
4-Nitroaniline	6	0	0	-	No	No	-	No
4-Nitrophenol	6	0	0	-	No	No	-	No
Acenaphthene	13	0	0	-	Yes	No	-	No
Acenaphthylene	13	0	0	-	Yes	No	-	No
Aniline	6	0	0	-	No	No	-	No
Anthracene	13	0	0	-	Yes	No	-	No
Benzidine	6	0	0	-	No	No	-	No
Benzo(a)anthracene	13	1	8	1.2E-02	Yes	No	-	Yes
Benzo(a)pyrene	13	2	15	4.3E-02	Yes	No	-	Yes
Benzo(b)fluoranthene	13	2	15	6.5E-02	Yes	No	-	Yes
Benzo(g,h,i)perylene	13	2	15	3.1E-02	Yes	No	-	Yes
Benzo(k)fluoranthene	13	1	8	1.2E-02	Yes	No	-	Yes
Benzoic acid	6	0	0	-	No	No	-	No
Benzyl alcohol	6	0	0	-	No	No	-	No
bis(2-Chloroethoxy)methane	6	0	0	-	No	No	-	No
bis(2-Chloroethyl)ether	6	0	0	-	No	No	-	No
bis(2-Chloroisopropyl) ether	6	0	0	-	No	No	-	No
bis(2-Ethylhexyl)phthalate	7	0	0	-	No	No	-	No

Spreadsheet C1-2 (3 of 4)

Selection of Chemicals of Potential Concern in Soil/Sediment (0-10 feet bgs)
New Conservation Yard RFI Site

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (mg/kg)	Potentially Site Related	Chemical Detected in Laboratory Blanks [a]	WRS Test Indicates Exceeds Background [b]	COPC
Butyl benzyl phthalate	6	0	0	-	No	No	-	No
Chrysene	13	2	15	2.7E-02	Yes	No	-	Yes
Dibenz(a,h)anthracene	13	1	8	8.0E-03	Yes	No	-	Yes
Dibenzofuran	6	0	0	-	No	No	-	No
Diethylphthalate	7	0	0	-	No	No	-	No
Dimethyl phthalate	6	0	0	-	No	No	-	No
Di-n-butylphthalate	7	0	0	-	No	No	-	No
Di-n-octyl phthalate	6	0	0	-	No	No	-	No
Fluoranthene	13	3	23	3.6E-02	Yes	No	-	Yes
Fluorene	13	0	0	-	Yes	No	-	No
Hexachlorobenzene	6	0	0	-	No	No	-	No
Hexachlorobutadiene	6	0	0	-	No	No	-	No
Hexachlorocyclopentadiene	6	0	0	-	No	No	-	No
Hexachloroethane	6	0	0	-	No	No	-	No
Indeno(1,2,3-cd)pyrene	13	2	15	5.3E-02	No	No	-	Yes
Isophorone	6	0	0	-	No	No	-	No
Naphthalene	13	0	0	-	No	No	-	No
Nitrobenzene	6	0	0	-	No	No	-	No
N-Nitrosodimethylamine	13	0	0	-	No	No	-	No
N-Nitrosodi-n-propylamine	6	0	0	-	No	No	-	No
N-Nitrosodiphenylamine	7	0	0	-	No	No	-	No
Pentachlorophenol	6	0	0	-	No	No	-	No
Phenanthrene	13	1	8	1.4E-02	Yes	No	-	Yes
Phenol	6	0	0	-	No	No	-	No
Pyrene	13	3	23	4.3E-02	Yes	No	-	Yes
Total Petroleum Hydrocarbons								
Hydrocarbons	6	0	0	-	No	No	-	No
PCDD/PCDFs								
2,3,7,8-TCDD	18	10	56	4.0E-05	Yes	No	-	Yes
1,2,3,7,8-PeCDD	18	13	72	9.0E-05	Yes	No	-	Yes
1,2,3,4,7,8-HxCDD	18	15	83	2.4E-04	Yes	No	-	Yes
1,2,3,6,7,8-HxCDD	18	17	94	1.2E-03	Yes	No	-	Yes
1,2,3,7,8,9-HxCDD	18	16	89	4.7E-04	Yes	No	-	Yes
1,2,3,4,6,7,8-HpCDD	18	18	100	2.7E-02	Yes	No	-	Yes
OCDD	18	18	100	3.0E-01	Yes	No	-	Yes
2,3,7,8-TCDF	18	15	83	1.0E-05	Yes	No	-	Yes
1,2,3,7,8-PeCDF	18	15	83	1.0E-05	Yes	No	-	Yes
2,3,4,7,8-PeCDF	18	17	94	3.0E-05	Yes	No	-	Yes
1,2,3,4,7,8-HxCDF	18	17	94	1.5E-04	Yes	No	-	Yes
1,2,3,6,7,8-HxCDF	18	15	83	1.1E-04	Yes	No	-	Yes
2,3,4,6,7,8-HxCDF	18	17	94	2.8E-04	Yes	No	-	Yes
1,2,3,7,8,9-HxCDF	18	15	83	3.0E-05	Yes	No	-	Yes
1,2,3,4,6,7,8-HpCDF	18	14	78	5.7E-03	Yes	No	-	Yes
1,2,3,4,7,8,9-HpCDF	18	16	89	4.9E-04	Yes	No	-	Yes
OCDF	18	18	100	1.5E-02	Yes	No	-	Yes
Total Tetra	-	-	-	-	-	-	Yes	Yes
Total Penta	-	-	-	-	-	-	Yes	Yes
Total Hexa	-	-	-	-	-	-	Yes	Yes
Total Hepta	-	-	-	-	-	-	Yes	Yes
Total Octa	-	-	-	-	-	-	Yes	Yes
PCDD/PCDF	-	-	-	-	-	-	Yes	Yes

Selection of Chemicals of Potential Concern in Soil/Sediment (0-10 feet bgs)
New Conservation Yard RFI Site

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (mg/kg)	Potentially Site Related	Chemical Detected in Laboratory Blanks [a]	WRS Test Indicates Exceeds Background [b]	COPC
PCBs								
Aroclor-1016	4	0	0	-	No	No	-	No
Aroclor-1221	4	0	0	-	No	No	-	No
Aroclor-1232	4	0	0	-	No	No	-	No
Aroclor-1242	4	0	0	-	No	No	-	No
Aroclor-1248	4	0	0	-	No	No	-	No
Aroclor-1254	5	1	20	7.1E-02	Yes	No	-	Yes
Aroclor-1260	4	0	0	-	Yes	No	-	No
PCB-105	1	1	100	2.6E-05	Yes	No	-	Yes
PCB-114	1	1	100	9.5E-07	Yes	No	-	Yes
PCB-118	1	1	100	5.6E-05	Yes	No	-	Yes
PCB-123	1	1	100	6.3E-07	Yes	No	-	Yes
PCB-126	1	1	100	1.6E-06	Yes	No	-	Yes
PCB-156	1	1	100	1.3E-05	Yes	No	-	Yes
PCB-157	1	1	100	2.8E-06	Yes	No	-	Yes
PCB-167	1	1	100	4.9E-06	Yes	No	-	Yes
PCB-169	1	1	100	7.7E-08	Yes	No	-	Yes
PCB-189	1	1	100	7.3E-07	Yes	No	-	Yes
PCB-77	1	1	100	3.2E-06	Yes	No	-	Yes
PCB-81	1	1	100	6.3E-07	Yes	No	-	Yes

Notes:

a. Any chemical eliminated as COPC due to laboratory blank contamination is discussed in Section 3.0.

b. Background comparision for inorganic compounds presented in Attachment 1 Spreadsheet C1-5.

c. Not selected as COPC since the RFI site sample population for soils at 0 to 10 feet bgs was found to be no different than the background sample population at p=0.05 based on the Wilcoxon Rank Sum Test.

d. Although Wilcoxon Rank Sum Test indicates comparable to background, metal is present at maximum concentrations significantly larger than maximum background concentrations, and in areas of known metals debris contamination. It is subsequently selected as a COPC.

e. Although analyte was not detetected, a concentration of one half the maximum SQL is greater than background concentrations.

VOC - volatile organic chemicals
SVOC - semivolatile organic chemicals
PCBs - polychlorinated biphenyls
Total Tetra - sum of the 2,3,7,8-substituted tetrachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations
Total Penta - sum of the 2,3,7,8-substituted pentachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations
Total Hexa - sum of the 2,3,7,8-substituted hexachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations
Total Hepta - sum of the 2,3,7,8-substituted heptachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations
Total Octa - sum of the octachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations concentrations
PCDD/PDDFs - polychlorinated dibenzo-p-dioxins and dibenzofurans
"-" not applicable
mg/kg - milligrams per kilogram
bgs - below ground surface

Selection of Chemicals of Potential Concern in Soil/Sediment (0-2 feet bgs)
New Conservation Yard RFI Site

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (mg/kg)	Potentially Site Related	Chemical Detected in Laboratory Blanks [a]	WRS Test Indicates Exceeds Background [b]	COPC
Inorganic Compounds								
Aluminum	7	7	100	1.4E+04	Yes	No	No	No [c]
Antimony	10	0	0	-	Yes	No	No	No
Arsenic	17	8	47	9.0E+00	Yes	No	No	No [c]
Barium	20	20	100	1.0E+03	Yes	No	No	Yes [d]
Beryllium	17	9	53	7.0E-01	Yes	No	No	No [c]
Boron	7	0	0	0.0E+00	Yes	No	No	No
Cadmium	17	10	59	2.0E+01	Yes	No	Yes	Yes
Chromium	17	17	100	7.2E+01	Yes	No	No	Yes
Hexavalent chromium	1	0	0	0.0E+00	Yes	No	No	No
Cobalt	17	17	100	1.4E+01	Yes	No	No	No [c]
Copper	17	17	100	2.0E+02	Yes	No	No	Yes [d]
Lead	23	23	100	1.0E+02	Yes	No	No	Yes [d]
Mercury	18	5	28	1.0E+00	Yes	No	No	Yes [d]
Molybdenum	17	0	0	-	Yes	No	Yes	Yes [e]
Nickel	17	16	94	1.3E+02	Yes	No	No	Yes [d]
Selenium	17	0	0	-	Yes	No	Yes	Yes [e]
Silver	24	15	63	1.5E+02	Yes	No	Yes	Yes
Thallium	17	7	41	3.4E-01	Yes	No	No	No [c]
Vanadium	17	17	100	3.8E+01	Yes	No	No	No [c]
Zinc	20	20	100	3.4E+03	Yes	No	Yes	Yes
VOCs								
1,1,1-Trichloroethane	3	0	0	-	Yes	No	-	No
1,1,2,2-Tetrachloroethane	3	0	0	-	Yes	No	-	No
1,1,2-Trichloroethane	3	0	0	-	Yes	No	-	No
1,1-Dichloroethane	3	0	0	-	Yes	No	-	No
1,1-Dichloroethene	3	0	0	-	Yes	No	-	No
1,2,4-Trichlorobenzene	3	0	0	-	Yes	No	-	No
1,2-Dichlorobenzene	3	0	0	-	Yes	No	-	No
1,2-Dichloroethane	3	0	0	-	Yes	No	-	No
1,2-Dichloropropane	3	0	0	-	Yes	No	-	No
1,3-Dichlorobenzene	3	0	0	-	Yes	No	-	No
1,4-Dichlorobenzene	3	0	0	-	Yes	No	-	No
2-Butanone	3	0	0	-	Yes	No	-	No
2-Chloroethylvinylether	3	0	0	-	Yes	No	-	No
2-Hexanone	3	0	0	-	Yes	No	-	No
4-Methyl-2-pentanone	3	0	0	-	Yes	No	-	No
Acetone	3	0	0	-	Yes	No	-	No
Benzene	3	0	0	-	Yes	No	-	No
Bromodichloromethane	3	0	0	-	Yes	No	-	No
Bromoform	3	0	0	-	Yes	No	-	No
Bromomethane	3	0	0	-	Yes	No	-	No
Carbon disulfide	3	0	0	-	Yes	No	-	No
Carbon tetrachloride	3	0	0	-	Yes	No	-	No
Chlorobenzene	3	0	0	-	Yes	No	-	No
Chloroethane	3	0	0	-	Yes	No	-	No
Chloroform	3	0	0	-	Yes	No	-	No
Chloromethane	3	0	0	-	Yes	No	-	No
cis-1,3-Dichloropropene	3	0	0	-	Yes	No	-	No

Selection of Chemicals of Potential Concern in Soil/Sediment (0-2 feet bgs)
New Conservation Yard RFI Site

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (mg/kg)	Potentially Site Related	Chemical Detected in Laboratory Blanks [a]	WRS Test Indicates Exceeds Background [b]	COPC
bis(2-Chloroethyl)ether	3	0	0	-	Yes	No	-	No
bis(2-Chloroisopropyl) ether	3	0	0	-	Yes	No	-	No
bis(2-Ethylhexyl)phthalate	4	0	0	-	Yes	No	-	No
Butyl benzyl phthalate	3	0	0	-	Yes	No	-	No
Chrysene	9	2	22	2.7E-02	Yes	No	-	Yes
Dibenz(a,h)anthracene	9	1	11	8.0E-03	Yes	No	-	Yes
Dibenzofuran	3	0	0	-	Yes	No	-	No
Diethylphthalate	4	0	0	-	Yes	No	-	No
Dimethyl phthalate	3	0	0	-	Yes	No	-	No
Di-n-butylphthalate	4	0	0	-	Yes	No	-	No
Di-n-octyl phthalate	3	0	0	-	Yes	No	-	No
Fluoranthene	9	3	33	3.6E-02	Yes	No	-	Yes
Fluorene	9	0	0	-	Yes	No	-	No
Hexachlorobenzene	3	0	0	-	Yes	No	-	No
Hexachlorobutadiene	3	0	0	-	Yes	No	-	No
Hexachlorocyclopentadiene	3	0	0	-	Yes	No	-	No
Hexachloroethane	3	0	0	-	Yes	No	-	No
Indeno(1,2,3-cd)pyrene	9	2	22	5.3E-02	Yes	No	-	Yes
Isophorone	3	0	0	-	Yes	No	-	No
Naphthalene	9	0	0	-	Yes	No	-	No
Nitrobenzene	3	0	0	-	Yes	No	-	No
N-Nitrosodimethylamine	9	0	0	-	Yes	No	-	No
N-Nitrosodi-n-propylamine	3	0	0	-	Yes	No	-	No
N-Nitrosodiphenylamine	4	0	0	-	Yes	No	-	No
Pentachlorophenol	3	0	0	-	Yes	No	-	No
Phenanthrene	9	1	11	1.4E-02	Yes	No	-	Yes
Phenol	3	0	0	-	Yes	No	-	No
Pyrene	9	3	33	4.3E-02	Yes	No	-	Yes
Total Petroleum Hydrocarbons								
Hydrocarbons	3	0	0	-	No	No	-	No
PCDD/PCDFs								
2,3,7,8-TCDD	16	10	63	4.0E-05	Yes	No	-	Yes
1,2,3,7,8-PeCDD	16	12	75	9.0E-05	Yes	No	-	Yes
1,2,3,4,7,8-HxCDD	16	14	88	2.4E-04	Yes	No	-	Yes
1,2,3,6,7,8-HxCDD	16	15	94	1.2E-03	Yes	No	-	Yes
1,2,3,7,8,9-HxCDD	16	15	94	4.7E-04	Yes	No	-	Yes
1,2,3,4,6,7,8-HpCDD	16	16	100	2.7E-02	Yes	No	-	Yes
OCDD	16	16	100	3.0E-01	Yes	No	-	Yes
2,3,7,8-TCDF	16	14	88	1.0E-05	Yes	No	-	Yes
1,2,3,7,8-PeCDF	16	13	81	1.0E-05	Yes	No	-	Yes
2,3,4,7,8-PeCDF	16	15	94	3.0E-05	Yes	No	-	Yes
1,2,3,4,7,8-HxCDF	16	15	94	1.5E-04	Yes	No	-	Yes
1,2,3,6,7,8-HxCDF	16	13	81	1.1E-04	Yes	No	-	Yes
2,3,4,6,7,8-HxCDF	16	15	94	2.8E-04	Yes	No	-	Yes
1,2,3,7,8,9-HxCDF	16	14	88	3.0E-05	Yes	No	-	Yes
1,2,3,4,6,7,8-HpCDF	16	12	75	5.7E-03	Yes	No	-	Yes
1,2,3,4,7,8,9-HpCDF	16	15	94	4.9E-04	Yes	No	-	Yes
OCDF	16	16	100	1.5E-02	Yes	No	-	Yes
Total Tetra	-	-	-	-	-	-	Yes	-
Total Penta	-	-	-	-	-	-	Yes	-

Selection of Chemicals of Potential Concern in Soil/Sediment (0-2 feet bgs)
New Conservation Yard RFI Site

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (mg/kg)	Potentially Site Related	Chemical Detected in Laboratory Blanks [a]	WRS Test Indicates Exceeds Background [b]	COPC
Total Hexa	-	-	-	-	-	-	Yes	-
Total Hepta	-	-	-	-	-	-	Yes	-
Total Octa	-	-	-	-	-	-	Yes	-
PCDD/PCDF	-	-	-	-	-	-	-	Yes
PCBs								
Aroclor-1016	4	0	0	-	No	No	-	No
Aroclor-1221	4	0	0	-	No	No	-	No
Aroclor-1232	4	0	0	-	No	No	-	No
Aroclor-1242	4	0	0	-	No	No	-	No
Aroclor-1248	4	0	0	-	No	No	-	No
Aroclor-1254	5	1	20	7.1E-02	Yes	No	-	Yes
Aroclor-1260	4	0	0	-	Yes	No	-	No
PCB-105	1	1	100	2.6E-05	Yes	No	-	Yes
PCB-114	1	1	100	9.5E-07	Yes	No	-	Yes
PCB-118	1	1	100	5.6E-05	Yes	No	-	Yes
PCB-123	1	1	100	6.3E-07	Yes	No	-	Yes
PCB-126	1	1	100	1.6E-06	Yes	No	-	Yes
PCB-156	1	1	100	1.3E-05	Yes	No	-	Yes
PCB-157	1	1	100	2.8E-06	Yes	No	-	Yes
PCB-167	1	1	100	4.9E-06	Yes	No	-	Yes
PCB-169	1	1	100	7.7E-08	Yes	No	-	Yes
PCB-189	1	1	100	7.3E-07	Yes	No	-	Yes
PCB-77	1	1	100	3.2E-06	Yes	No	-	Yes
PCB-81	1	1	100	6.3E-07	Yes	No	-	Yes

Notes:
a. Any chemical eliminated as COPC due to laboratory blank contamination is discussed in Section 3.0.
b. Background comparision for inorganic compounds presented in Attachment 1 Spreadsheet C1-5.
c. Not selected as COPC since the RFI site sample population for soil/sediment at 0 to 2 feet bgs was found to be no different than the background sample population based on the Wilcoxon Rank Sum Test.
d. Although Wilcoxon Rank Sum Test indicates comparable to background, metal is present at maximum concentrations significantly larger than maximum background concentrations, and in areas of known metals debris contamination. It is subsequently selected as a COPC.
e. Although analyte was not detetected, a concentration of one half the maximum SQL is greater than background concentrations.
COPC - chemical of potential concern
VOC - volatile organic chemicals
PAH - polycyclic aromatic hydrocarbon
SVOC - semivolatile organic chemicals
PCBs - polychlorinated biphenyls
Total Tetra - sum of the 2,3,7,8-substituted tetrachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations
Total Penta - sum of the 2,3,7,8-substituted pentachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations
Total Hexa - sum of the 2,3,7,8-substituted hexachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations
Total Hepta - sum of the 2,3,7,8-substituted heptachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations
Total Octa - sum of the octachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations concentrations
PCDD/PDDFs - polychlorinated dibenzo-p-dioxins and dibenzofurans
"-" not applicable
mg/kg - milligrams per kilogram
bgs - below ground surface

APPENDIX C, ATTACHMENT C8

OCY Risk Assessment Calculation Tables

Parameter Values Used for EPV and ADD Calculations
Old Conservation Yard RFI Site

Species[a]	Fraction of Prey Item (unitless)				Body Weight	Food Intake Rate	Area Use[c]	Seasonality[c]	Lifespan	Inhalation Rate[d]	Fraction of Time Spent in Burrow[c]
	Terrestrial plants	Terrestrial Invertebrates	Terrestrial vertebrate	Incidental soil	(kg)	(kg/day)	(fraction)	(percent)	(year)	(m^3/day)	(percent)
Earthworm	0	0	0	1	NA	NA	NA	NA	NA	NA	NA
Deer mouse	0.70	0.30	0	0.020	0.018	0.0038	1	1	1.6	0.024	0.75
Thrush [b]	0.39 b	0.61 b	0	0.040	0.029	0.0063	1	1	1.4 b	NA	NA
Hawk	0	0	1	0	1.22	0.095	1	1	NA	NA	NA
Bobcat	0	0	1	0	10	0.33	1	1	NA	NA	NA
Mule deer[e]	1	0	0	0.02	39.1	1.6	1	1	NA	NA	NA

Notes:
a. Reference receptor species used for food chain model
b. Values for the thrush are estimated based on American robin
c. Value based on SRAM or professional judgment
d. Average of male and female values from U.S. EPA Wildlife Exposure Factors Handbook
e. Body weight from Nagy, 2001
kg - kilogram
kg/day - kilograms per day
cm^2 - square centimeters
m^3/day - cubic meters per day
NA - not applicable
EPV- exposure point values
ADD- applied daily dosage

Selection of Chemicals of Potential Concern in Soil/Sediment (0-2 feet bgs)
New Conservation Yard RFI Site

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (mg/kg)	Potentially Site Related	Chemical Detected in Laboratory Blanks [a]	WRS Test Indicates Exceeds Background [b]	COPC
Dibromochloromethane	3	0	0	-	Yes	No	-	No
Dichlorobenzenes	3	0	0	-	Yes	No	-	No
Ethylbenzene	3	0	0	-	Yes	No	-	No
Methylene chloride	3	0	0	-	Yes	No	-	No
Styrene	3	0	0	-	Yes	No	-	No
Tetrachloroethene	3	0	0	-	Yes	No	-	No
Toluene	3	1	33	1.1E-01	Yes	No	-	Yes
trans-1,2-Dichloroethene	3	0	0	-	Yes	No	-	No
trans-1,3-Dichloropropene	3	0	0	-	Yes	No	-	No
Trichloroethene	3	0	0	-	Yes	No	-	No
Vinyl acetate	3	0	0	-	Yes	No	-	No
Vinyl chloride	3	0	0	-	Yes	No	-	No
Xylenes (total)	3	0	0	-	Yes	No	-	No
SVOCs								
2,4,5-Trichlorophenol	3	0	0	-	Yes	No	-	No
2,4,6-Trichlorophenol	3	0	0	-	Yes	No	-	No
2,4-Dichlorophenol	3	0	0	-	Yes	No	-	No
2,4-Dimethylphenol	3	0	0	-	Yes	No	-	No
2,4-Dinitrophenol	3	0	0	-	Yes	No	-	No
2,4-Dinitrotoluene	3	0	0	-	Yes	No	-	No
2,6-Dinitrotoluene	3	0	0	-	Yes	No	-	No
2-Chloronaphthalene	3	0	0	-	Yes	No	-	No
2-Chlorophenol	3	0	0	-	Yes	No	-	No
2-Methylnaphthalene	8	0	0	-	Yes	No	-	No
2-Methylphenol	3	0	0	-	Yes	No	-	No
2-Nitroaniline	3	0	0	-	Yes	No	-	No
2-Nitrophenol	3	0	0	-	Yes	No	-	No
4-Methylphenol	3	0	0	-	Yes	No	-	No
3,3'-Dichlorobenzidine	3	0	0	-	Yes	No	-	No
3-Nitroaniline	3	0	0	-	Yes	No	-	No
4,6-Dinitro-2-methylphenol	3	0	0	-	Yes	No	-	No
4-Bromophenyl phenyl ether	3	0	0	-	Yes	No	-	No
4-Chloro-3-methylphenol	3	0	0	-	Yes	No	-	No
4-Chloroaniline	3	0	0	-	Yes	No	-	No
4-Chlorophenyl phenyl ether	3	0	0	-	Yes	No	-	No
4-Nitroaniline	3	0	0	-	Yes	No	-	No
4-Nitrophenol	3	0	0	-	Yes	No	-	No
Acenaphthene	9	0	0	-	Yes	No	-	No
Acenaphthylene	9	0	0	-	Yes	No	-	No
Aniline	3	0	0	-	Yes	No	-	No
Anthracene	9	0	0	-	Yes	No	-	No
Benzidine	3	0	0	-	Yes	No	-	No
Benzo(a)anthracene	9	1	11	1.2E-02	Yes	No	-	Yes
Benzo(a)pyrene	9	2	22	4.3E-02	Yes	No	-	Yes
Benzo(b)fluoranthene	9	2	22	6.5E-02	Yes	No	-	Yes
Benzo(g,h,i)perylene	9	2	22	3.1E-02	Yes	No	-	Yes
Benzo(k)fluoranthene	9	1	11	1.2E-02	Yes	No	-	Yes
Benzoic acid	3	0	0	-	Yes	No	-	No
Benzyl alcohol	3	0	0	-	Yes	No	-	No
bis(2-Chloroethoxy)methane	3	0	0	-	Yes	No	-	No

Spreadsheet C2-108 (1 of 2)

Applied Daily Dose for the Mule Deer
Ingestion Exposure Route

Old Conservation Yard RFI Site

Chemical	Soil Exposure Point Concentration [a]		EPV in Terrestrial Plants[b]		Applied Daily Dose	
	CTE	RME	CTE	RME	CTE	RME
	(mg/kg)		(mg/kg)		(mg/kg-day)	
Inorganic Compounds						
Antimony	1.7E+00	5.4E+00	8.9E+00	2.9E+01	3.6E-01	1.2E+00
Barium	7.8E+01	8.3E+01	7.8E+01	8.4E+01	3.2E+00	3.4E+00
Boron	4.3E+00	5.2E+00	3.2E+01	3.9E+01	1.3E+00	1.6E+00
Cadmium	5.2E-01	9.9E-01	5.6E+00	1.1E+01	2.2E-01	4.3E-01
Copper	NC	NC	NC	NC	-	-
Lead	1.7E+01	2.1E+01	3.6E+01	4.4E+01	1.5E+00	1.8E+00
Mercury	5.0E-01	3.3E+00	4.1E-01	2.7E+00	1.7E-02	1.1E-01
Silver	8.6E-01	1.8E+00	1.5E+00	3.0E+00	5.9E-02	1.2E-01
Thallium	8.6E-01	1.7E+00	4.4E-01	8.7E-01	1.8E-02	3.6E-02
Zinc	6.6E+01	7.4E+01	1.1E+02	1.2E+02	4.4E+00	4.9E+00
VOCs						
1,1,1-Trichloroethane	3.0E-03	5.5E-03	3.0E-03	5.5E-03	1.2E-04	2.2E-04
1,1,2-Trichloro-1,2,2-trifluoroethane	1.2E-02	2.1E-02	1.2E-02	2.1E-02	5.0E-04	8.4E-04
1,1-Dichloroethene	3.2E-03	5.5E-03	3.2E-03	5.5E-03	1.3E-04	2.2E-04
2-Butanone	2.2E-02	1.1E-02	2.2E-02	1.1E-02	9.1E-04	4.5E-04
Acetone	3.5E-01	3.5E+00	3.5E-01	3.5E+00	1.4E-02	1.4E-01
Benzene	1.1E-03	2.5E-03	1.1E-03	2.5E-03	4.6E-05	1.0E-04
Ethylbenzene	1.1E-03	2.5E-03	1.1E-03	2.5E-03	4.6E-05	1.0E-04
m,p-Xylene	3.2E-03	7.2E-03	3.2E-03	7.2E-03	1.3E-04	3.0E-04
Methylene chloride	4.1E-02	2.4E-01	4.1E-02	2.4E-01	1.7E-03	1.0E-02
o-Xylene	7.8E-04	1.7E-03	7.8E-04	1.7E-03	3.2E-05	7.0E-05
p-Isopropyltoluene	1.9E-03	1.9E-03	1.9E-03	1.9E-03	7.8E-05	7.8E-05
Toluene	1.5E-03	3.6E-03	1.5E-03	3.6E-03	6.3E-05	1.5E-04
Trichloroethene	3.0E-03	5.5E-03	3.0E-03	5.5E-03	1.2E-04	2.2E-04
Xylenes (total)	4.7E-03	9.9E-03	4.7E-03	9.9E-03	1.9E-04	4.1E-04
SVOCs						
1-Methylnaphthalene	1.2E-02	1.3E-02	1.2E-02	1.3E-02	4.9E-04	5.4E-04
2,4-Dinitrophenol	6.7E-01	1.0E+00	6.7E-01	1.0E+00	2.7E-02	4.1E-02
2-Methylnaphthalene	1.7E-01	5.6E-01	1.7E-01	5.6E-01	7.0E-03	2.3E-02
Acenaphthene	1.7E-01	7.0E-01	1.7E-01	7.0E-01	6.9E-03	2.9E-02
Acenaphthylene	4.0E-02	1.4E-01	4.0E-02	1.4E-01	1.6E-03	5.8E-03
Anthracene	1.2E-01	4.7E-01	1.2E-01	4.7E-01	4.8E-03	1.9E-02
Benzo(a)anthracene	3.9E-02	1.8E-01	2.0E-01	9.6E-01	8.1E-03	3.8E-02
Benzo(a)pyrene	3.6E-02	1.8E-01	3.6E-02	1.8E-01	1.5E-03	7.2E-03
Benzo(b)fluoranthene	4.4E-02	2.0E-01	4.4E-02	2.0E-01	1.8E-03	8.1E-03
Benzo(e)pyrene	7.1E-02	3.1E-01	7.1E-02	3.1E-01	2.9E-03	1.3E-02
Benzo(g,h,i)perylene	8.4E-02	3.0E-01	8.4E-02	3.0E-01	3.4E-03	1.2E-02
Benzo(k)fluoranthene	3.6E-02	1.8E-01	3.6E-02	1.8E-01	1.5E-03	7.2E-03
Chrysene	5.9E-02	2.4E-01	1.6E-01	6.7E-01	6.7E-03	2.7E-02
Dibenz(a,h)anthracene	2.6E-02	1.0E-01	2.6E-02	1.0E-01	1.1E-03	4.3E-03
Fluoranthene	9.0E-02	4.3E-01	2.6E-01	1.2E+00	1.0E-02	5.0E-02
Fluorene	1.7E-01	6.9E-01	1.7E-01	6.9E-01	6.8E-03	2.8E-02
Indeno(1,2,3-cd)pyrene	3.2E-02	1.7E-01	3.2E-02	1.7E-01	1.3E-03	6.8E-03
Naphthalene	6.3E-02	1.6E-01	6.3E-02	1.6E-01	2.6E-03	6.4E-03
Perylene	4.0E-02	1.8E-01	4.0E-02	1.8E-01	1.6E-03	7.2E-03
Phenanthrene	4.4E-01	1.9E+00	3.2E+00	1.3E+01	1.3E-01	5.3E-01
Pyrene	8.9E-02	3.7E-01	1.7E-01	7.1E-01	6.9E-03	2.9E-02
Total Petroleum Hydrocarbons						
C08-C11(Gasoline Range)	9.7E+00	2.2E+01	9.7E+00	2.2E+01	4.0E-01	8.8E-01
C11-C14(Kerosene Range)	1.1E+01	2.2E+01	1.1E+01	2.2E+01	4.5E-01	8.9E-01

Spreadsheet C2-108 (2 of 2)

Applied Daily Dose for the Mule Deer
Ingestion Exposure Route

Old Conservation Yard RFI Site

Chemical	Soil Exposure Point Concentration [a]		EPV in Terrestrial Plants[b]		Applied Daily Dose	
	CTE	RME	CTE	RME	CTE	RME
	(mg/kg)		(mg/kg)		(mg/kg-day)	
C14-C20(Diesel Range)	6.5E+01	2.6E+02	6.5E+01	2.6E+02	2.7E+00	1.0E+01
C20-C30(Lubricant Oil Range)	2.9E+02	1.4E+03	2.9E+02	1.4E+03	1.2E+01	5.6E+01
PCDD/PCDFs						
2,3,7,8-TCDD	1.0E-06	1.8E-06	1.0E-06	1.8E-06	4.1E-08	7.2E-08
1,2,3,7,8-PeCDD	6.6E-06	5.2E-05	6.6E-06	5.2E-05	2.7E-07	2.1E-06
1,2,3,4,7,8-HxCDD	1.4E-05	5.3E-05	1.4E-05	5.3E-05	5.9E-07	2.2E-06
1,2,3,6,7,8-HxCDD	2.0E-05	1.0E-04	3.3E-06	1.7E-05	1.5E-07	7.5E-07
1,2,3,7,8,9-HxCDD	1.8E-05	8.6E-05	1.8E-05	8.6E-05	7.3E-07	3.5E-06
1,2,3,4,6,7,8-HpCDD	4.9E-04	2.9E-03	1.6E-04	9.4E-04	6.7E-06	4.0E-05
OCDD	3.7E-03	8.2E-03	8.7E-04	1.9E-03	3.8E-05	8.4E-05
2,3,7,8-TCDF	2.2E-06	1.0E-05	2.2E-06	1.0E-05	9.0E-08	4.1E-07
1,2,3,7,8-PeCDF	1.8E-06	9.5E-06	1.8E-06	9.5E-06	7.4E-08	3.9E-07
2,3,4,7,8-PeCDF	5.1E-06	3.0E-05	5.1E-06	3.0E-05	2.1E-07	1.2E-06
1,2,3,4,7,8-HxCDF	1.3E-05	6.2E-05	1.3E-05	6.2E-05	5.3E-07	2.5E-06
1,2,3,6,7,8-HxCDF	4.9E-06	1.0E-05	4.9E-06	1.0E-05	2.0E-07	4.1E-07
2,3,4,6,7,8-HxCDF	5.2E-06	2.9E-05	5.2E-06	2.9E-05	2.1E-07	1.2E-06
1,2,3,7,8,9-HxCDF	2.3E-06	1.0E-05	2.3E-06	1.0E-05	9.4E-08	4.1E-07
1,2,3,4,6,7,8-HpCDF	5.5E-05	1.2E-04	1.2E-05	2.6E-05	5.4E-07	1.2E-06
1,2,3,4,7,8,9-HpCDF	7.2E-06	3.0E-05	7.2E-06	3.0E-05	2.9E-07	1.2E-06
OCDF	1.8E-04	4.1E-04	6.0E-05	1.4E-04	2.6E-06	5.8E-06
PCBs						
Aroclor-1248	5.0E+02	5.5E+03	5.0E+02	5.5E+03	2.0E+01	2.2E+02
Aroclor-1254	1.2E+00	5.4E+00	1.2E+00	5.4E+00	5.0E-02	2.2E-01
Aroclor-1260	1.3E+01	1.4E+02	1.3E+01	1.4E+02	5.4E-01	5.9E+00
PCB-105	1.1E-03	1.2E-02	3.7E-03	3.9E-02	1.5E-04	1.6E-03
PCB-114	2.1E-05	2.1E-04	7.6E-05	7.7E-04	3.1E-06	3.1E-05
PCB-118	2.2E-03	2.4E-02	7.0E-03	7.4E-02	2.8E-04	3.0E-03
PCB-123	3.1E-05	3.3E-04	1.1E-04	1.1E-03	4.3E-06	4.6E-05
PCB-126	8.6E-05	9.2E-04	1.9E-04	2.0E-03	7.7E-06	8.2E-05
PCB-156	7.4E-04	7.9E-03	1.8E-03	2.0E-02	7.4E-05	7.9E-04
PCB-157	3.3E-04	3.5E-03	8.6E-04	9.3E-03	3.5E-05	3.7E-04
PCB-167	5.7E-04	6.1E-03	1.6E-03	1.7E-02	6.4E-05	6.9E-04
PCB-169	8.5E-06	9.2E-05	8.5E-06	9.2E-05	3.5E-07	3.7E-06
PCB-189	8.5E-05	9.2E-04	1.8E-04	2.0E-03	7.4E-06	8.0E-05
PCB-77	1.7E-04	1.8E-03	4.1E-04	4.4E-03	1.7E-05	1.8E-04
PCB-81	3.1E-05	3.2E-04	9.2E-05	9.7E-04	3.7E-06	3.9E-05

Notes:

a. Exposure point concentration (EPC) for soil 0 to 2 feet bgs, from Spreadsheet C2-90.

b. Terrestrial plant exposure point values were estimated by application of site-specific bioaccumulation factors (BAFs) to soil exposure point concentration when available, or by application of a BAF of 1 when site-specific BAFs were not available.

CTE - central tendancy exposure

RME - reasonable maximum exposure

EPV - exposure point value

NC - not selected as a CPEC in the indicated media, per the SRAM (MWH 2005).

CPEC - chemical of potential ecological concern

VOC - volatile organic compund

SVOC - semi-volatile organic compound

PCB - polychlorinated biphenyls

"-" not applicable

mg/kg - milligram per kilogram

mg/kg-day - milligram per kilogram per day

Spreadsheet C2-107 (1 of 2)

Applied Daily Dose for the Bobcat
Ingestion Exposure Route
Old Conservation Yard RFI Site

Chemical	Soil Exposure Point Concentration [a]		EPV in Deer Mouse[b]		Applied Daily Dose	
	CTE	RME	CTE	RME	CTE	RME
	(mg/kg)		(mg/kg)		(mg/kg-day)	
Inorganic Compounds						
Antimony	1.7E+00	5.4E+00	9.6E-01	3.1E+00	3.2E-02	1.0E-01
Barium	7.8E+01	8.3E+01	2.8E+01	3.0E+01	9.3E-01	9.9E-01
Boron	4.3E+00	5.2E+00	4.9E+01	6.0E+01	1.6E+00	2.0E+00
Cadmium	5.2E-01	9.9E-01	5.2E-01	9.9E-01	1.7E-02	3.3E-02
Copper	NC	NC	NC	NC	-	-
Lead	1.7E+01	2.1E+01	1.7E+01	2.1E+01	5.6E-01	6.9E-01
Mercury	5.0E-01	3.3E+00	5.0E-01	3.3E+00	1.7E-02	1.1E-01
Silver	8.6E-01	1.8E+00	8.6E-01	1.8E+00	2.8E-02	5.9E-02
Thallium	8.6E-01	1.7E+00	8.6E-01	1.7E+00	2.9E-02	5.6E-02
Zinc	6.6E+01	7.4E+01	2.3E+02	2.6E+02	7.7E+00	8.5E+00
VOCs						
1,1,1-Trichloroethane	3.0E-03	5.5E-03	3.0E-03	5.5E-03	9.9E-05	1.8E-04
1,1,2-Trichloro-1,2,2-trifluoroethane	1.2E-02	2.1E-02	1.2E-02	2.1E-02	4.1E-04	6.8E-04
1,1-Dichloroethene	3.2E-03	5.5E-03	3.2E-03	5.5E-03	1.0E-04	1.8E-04
2-Butanone	2.2E-02	1.1E-02	2.2E-02	1.1E-02	7.4E-04	3.6E-04
Acetone	3.5E-01	3.5E+00	3.5E-01	3.5E+00	1.2E-02	1.2E-01
Benzene	1.1E-03	2.5E-03	1.1E-03	2.5E-03	3.8E-05	8.2E-05
Ethylbenzene	1.1E-03	2.5E-03	1.1E-03	2.5E-03	3.8E-05	8.2E-05
m,p-Xylene	3.2E-03	7.2E-03	3.2E-03	7.2E-03	1.1E-04	2.4E-04
Methylene chloride	4.1E-02	2.4E-01	4.1E-02	2.4E-01	1.4E-03	8.1E-03
o-Xylene	7.8E-04	1.7E-03	7.8E-04	1.7E-03	2.6E-05	5.6E-05
p-Isopropyltoluene	1.9E-03	1.9E-03	1.9E-03	1.9E-03	6.3E-05	6.3E-05
Toluene	1.5E-03	3.6E-03	1.5E-03	3.6E-03	5.1E-05	1.2E-04
Trichloroethene	3.0E-03	5.5E-03	3.0E-03	5.5E-03	9.9E-05	1.8E-04
Xylenes (total)	4.7E-03	9.9E-03	4.7E-03	9.9E-03	1.5E-04	3.3E-04
SVOCs						
1-Methylnaphthalene	1.2E-02	1.3E-02	1.2E-02	1.3E-02	3.9E-04	4.4E-04
2,4-Dinitrophenol	6.7E-01	1.0E+00	6.7E-01	1.0E+00	2.2E-02	3.3E-02
2-Methylnaphthalene	1.7E-01	5.6E-01	1.7E-01	5.6E-01	5.7E-03	1.9E-02
Acenaphthene	1.7E-01	7.0E-01	1.7E-01	7.0E-01	5.6E-03	2.3E-02
Acenaphthylene	4.0E-02	1.4E-01	4.0E-02	1.4E-01	1.3E-03	4.7E-03
Anthracene	1.2E-01	4.7E-01	1.2E-01	4.7E-01	3.9E-03	1.6E-02
Benzo(a)anthracene	3.9E-02	1.8E-01	6.2E-01	2.9E+00	2.1E-02	9.7E-02
Benzo(a)pyrene	3.6E-02	1.8E-01	2.2E-01	1.0E+00	7.1E-03	3.5E-02
Benzo(b)fluoranthene	4.4E-02	2.0E-01	2.3E-01	1.0E+00	7.6E-03	3.5E-02
Benzo(e)pyrene	7.1E-02	3.1E-01	7.1E-02	3.1E-01	2.3E-03	1.0E-02
Benzo(g,h,i)perylene	8.4E-02	3.0E-01	3.8E-01	1.4E+00	1.3E-02	4.5E-02
Benzo(k)fluoranthene	3.6E-02	1.8E-01	2.8E-01	1.4E+00	9.4E-03	4.5E-02
Chrysene	5.9E-02	2.4E-01	3.8E-01	1.5E+00	1.3E-02	5.1E-02
Dibenz(a,h)anthracene	2.6E-02	1.0E-01	4.3E-01	1.7E+00	1.4E-02	5.7E-02
Fluoranthene	9.0E-02	4.3E-01	2.1E-01	1.0E+00	7.0E-03	3.4E-02
Fluorene	1.7E-01	6.9E-01	1.7E-01	6.9E-01	5.5E-03	2.3E-02
Indeno(1,2,3-cd)pyrene	3.2E-02	1.7E-01	2.3E-01	1.2E+00	7.6E-03	4.0E-02
Naphthalene	6.3E-02	1.6E-01	6.3E-02	1.6E-01	2.1E-03	5.2E-03
Perylene	4.0E-02	1.8E-01	4.0E-02	1.8E-01	1.3E-03	5.9E-03
Phenanthrene	4.4E-01	1.9E+00	1.5E+00	6.2E+00	4.9E-02	2.1E-01
Pyrene	8.9E-02	3.7E-01	3.2E-01	1.3E+00	1.1E-02	4.5E-02
Total Petroleum Hydrocarbons						
C08-C11(Gasoline Range)	9.7E+00	2.2E+01	9.7E+00	2.2E+01	3.2E-01	7.1E-01
C11-C14(Kerosene Range)	1.1E+01	2.2E+01	1.1E+01	2.2E+01	3.7E-01	7.2E-01

Spreadsheet C2-107 (2 of 2)

Applied Daily Dose for the Bobcat
Ingestion Exposure Route
Old Conservation Yard RFI Site

Chemical	Soil Exposure Point Concentration [a]		EPV in Deer Mouse[b]		Applied Daily Dose	
	CTE	RME	CTE	RME	CTE	RME
	(mg/kg)		(mg/kg)		(mg/kg-day)	
C14-C20(Diesel Range)	6.5E+01	2.6E+02	6.5E+01	2.6E+02	2.2E+00	8.5E+00
C20-C30(Lubricant Oil Range)	2.9E+02	1.4E+03	2.9E+02	1.4E+03	9.7E+00	4.5E+01
PCDD/PCDFs						
2,3,7,8-TCDD	1.0E-06	1.8E-06	1.0E-06	1.8E-06	3.4E-08	5.9E-08
1,2,3,7,8-PeCDD	6.6E-06	5.2E-05	6.6E-06	5.2E-05	2.2E-07	1.7E-06
1,2,3,4,7,8-HxCDD	1.4E-05	5.3E-05	3.4E-06	1.3E-05	1.1E-07	4.2E-07
1,2,3,6,7,8-HxCDD	2.0E-05	1.0E-04	4.3E-06	2.2E-05	1.4E-07	7.3E-07
1,2,3,7,8,9-HxCDD	1.8E-05	8.6E-05	3.2E-06	1.5E-05	1.1E-07	5.1E-07
1,2,3,4,6,7,8-HpCDD	4.9E-04	2.9E-03	1.4E-04	8.4E-04	4.7E-06	2.8E-05
OCDD	3.7E-03	8.2E-03	7.9E-04	1.8E-03	2.6E-05	5.8E-05
2,3,7,8-TCDF	2.2E-06	1.0E-05	4.1E-07	1.9E-06	1.4E-08	6.2E-08
1,2,3,7,8-PeCDF	1.8E-06	9.5E-06	1.8E-06	9.5E-06	6.0E-08	3.1E-07
2,3,4,7,8-PeCDF	5.1E-06	3.0E-05	2.3E-06	1.3E-05	7.5E-08	4.4E-07
1,2,3,4,7,8-HxCDF	1.3E-05	6.2E-05	1.1E-06	5.1E-06	3.5E-08	1.7E-07
1,2,3,6,7,8-HxCDF	4.9E-06	1.0E-05	3.2E-06	6.5E-06	1.1E-07	2.2E-07
2,3,4,6,7,8-HxCDF	5.2E-06	2.9E-05	2.8E-06	1.5E-05	9.3E-08	5.1E-07
1,2,3,7,8,9-HxCDF	2.3E-06	1.0E-05	2.3E-06	1.0E-05	7.6E-08	3.4E-07
1,2,3,4,6,7,8-HpCDF	5.5E-05	1.2E-04	2.4E-05	5.1E-05	7.9E-07	1.7E-06
1,2,3,4,7,8,9-HpCDF	7.2E-06	3.0E-05	7.2E-06	3.0E-05	2.4E-07	1.0E-06
OCDF	1.8E-04	4.1E-04	1.7E-04	3.9E-04	5.7E-06	1.3E-05
PCBs						
Aroclor-1248	5.0E+02	5.5E+03	5.0E+02	5.5E+03	1.7E+01	1.8E+02
Aroclor-1254	1.2E+00	5.4E+00	1.2E+00	5.4E+00	4.1E-02	1.8E-01
Aroclor-1260	1.3E+01	1.4E+02	1.3E+01	1.4E+02	4.4E-01	4.8E+00
PCB-105	1.1E-03	1.2E-02	3.0E-03	3.2E-02	1.0E-04	1.1E-03
PCB-114	2.1E-05	2.1E-04	1.4E-04	1.4E-03	4.5E-06	4.6E-05
PCB-118	2.2E-03	2.4E-02	6.3E-03	6.6E-02	2.1E-04	2.2E-03
PCB-123	3.1E-05	3.3E-04	1.1E-04	1.1E-03	3.5E-06	3.7E-05
PCB-126	8.6E-05	9.2E-04	1.6E-04	1.7E-03	5.3E-06	5.6E-05
PCB-156	7.4E-04	7.9E-03	2.9E-03	3.1E-02	9.6E-05	1.0E-03
PCB-157	3.3E-04	3.5E-03	8.7E-03	9.4E-02	2.9E-04	3.1E-03
PCB-167	5.7E-04	6.1E-03	2.8E-03	3.0E-02	9.2E-05	1.0E-03
PCB-169	8.5E-06	9.2E-05	8.5E-06	9.2E-05	2.8E-07	3.0E-06
PCB-189	8.5E-05	9.2E-04	6.0E-04	6.4E-03	2.0E-05	2.1E-04
PCB-77	1.7E-04	1.8E-03	1.3E-04	1.4E-03	4.4E-06	4.7E-05
PCB-81	3.1E-05	3.2E-04	3.1E-05	3.2E-04	1.0E-06	1.1E-05

Notes:

a. Exposure point concentration (EPC) for soil 0 to 2 feet bgs, from Spreadsheet C2-90.

b. Deer mouse exposure point values were estimated by application of site-specific bioaccumulation factors (BAFs) to soil exposure point concentration when available, or by application of a BAF of 1 when site-specific BAFs were not available.

CTE - central tendancy exposure

RME - reasonable maximum exposure

NC - not selected as a CPEC in the indicated media, per the SRAM (MWH 2005).

EPV - exposure point value

CPEC - chemical of potential ecological concern

VOC - volatile organic compund

SVOC - semi-volatile organic compound

PCB - polychlorinated biphenyls

"-" not applicable

mg/kg - milligram per kilogram

mg/kg-day - milligram per kilogram per day

Applied Daily Dose for the Hawk
Ingestion Exposure Route
Old Conservation Yard RFI Site

Chemical	Soil Exposure Point Concentration [a]		EPV in Deer Mouse[b]		Applied Daily Dose	
	CTE	RME	CTE	RME	CTE	RME
	(mg/kg)		(mg/kg)		(mg/kg-day)	
Inorganic Compounds						
Antimony	1.7E+00	5.4E+00	9.6E-01	3.1E+00	7.5E-02	2.4E-01
Barium	7.8E+01	8.3E+01	2.8E+01	3.0E+01	2.2E+00	2.3E+00
Boron	4.3E+00	5.2E+00	4.9E+01	6.0E+01	3.8E+00	4.7E+00
Cadmium	5.2E-01	9.9E-01	5.2E-01	9.9E-01	4.0E-02	7.7E-02
Copper	NC	NC	NC	NC	-	-
Lead	1.7E+01	2.1E+01	1.7E+01	2.1E+01	1.3E+00	1.6E+00
Mercury	5.0E-01	3.3E+00	5.0E-01	3.3E+00	3.9E-02	2.5E-01
Silver	8.6E-01	1.8E+00	8.6E-01	1.8E+00	6.6E-02	1.4E-01
Thallium	8.6E-01	1.7E+00	8.6E-01	1.7E+00	6.7E-02	1.3E-01
Zinc	6.6E+01	7.4E+01	2.3E+02	2.6E+02	1.8E+01	2.0E+01
VOCs						
1,1,1-Trichloroethane	3.0E-03	5.5E-03	3.0E-03	5.5E-03	2.3E-04	4.3E-04
1,1,2-Trichloro-1,2,2-trifluoroethane	1.2E-02	2.1E-02	1.2E-02	2.1E-02	9.5E-04	1.6E-03
1,1-Dichloroethene	3.2E-03	5.5E-03	3.2E-03	5.5E-03	2.4E-04	4.3E-04
2-Butanone	2.2E-02	1.1E-02	2.2E-02	1.1E-02	1.7E-03	8.5E-04
Acetone	3.5E-01	3.5E+00	3.5E-01	3.5E+00	2.7E-02	2.7E-01
Benzene	1.1E-03	2.5E-03	1.1E-03	2.5E-03	8.8E-05	1.9E-04
Ethylbenzene	1.1E-03	2.5E-03	1.1E-03	2.5E-03	8.8E-05	1.9E-04
m,p-Xylene	3.2E-03	7.2E-03	3.2E-03	7.2E-03	2.5E-04	5.6E-04
Methylene chloride	4.1E-02	2.4E-01	4.1E-02	2.4E-01	3.2E-03	1.9E-02
o-Xylene	7.8E-04	1.7E-03	7.8E-04	1.7E-03	6.0E-05	1.3E-04
p-Isopropyltoluene	1.9E-03	1.9E-03	1.9E-03	1.9E-03	1.5E-04	1.5E-04
Toluene	1.5E-03	3.6E-03	1.5E-03	3.6E-03	1.2E-04	2.8E-04
Trichloroethene	3.0E-03	5.5E-03	3.0E-03	5.5E-03	2.3E-04	4.3E-04
Xylenes (total)	4.7E-03	9.9E-03	4.7E-03	9.9E-03	3.6E-04	7.7E-04
SVOCs						
1-Methylnaphthalene	1.2E-02	1.3E-02	1.2E-02	1.3E-02	9.2E-04	1.0E-03
2,4-Dinitrophenol	6.7E-01	1.0E+00	6.7E-01	1.0E+00	5.2E-02	7.7E-02
2-Methylnaphthalene	1.7E-01	5.6E-01	1.7E-01	5.6E-01	1.3E-02	4.3E-02
Acenaphthene	1.7E-01	7.0E-01	1.7E-01	7.0E-01	1.3E-02	5.4E-02
Acenaphthylene	4.0E-02	1.4E-01	4.0E-02	1.4E-01	3.1E-03	1.1E-02
Anthracene	1.2E-01	4.7E-01	1.2E-01	4.7E-01	9.2E-03	3.6E-02
Benzo(a)anthracene	3.9E-02	1.8E-01	6.2E-01	2.9E+00	4.8E-02	2.3E-01
Benzo(a)pyrene	3.6E-02	1.8E-01	2.2E-01	1.0E+00	1.7E-02	8.1E-02
Benzo(b)fluoranthene	4.4E-02	2.0E-01	2.3E-01	1.0E+00	1.8E-02	8.0E-02
Benzo(e)pyrene	7.1E-02	3.1E-01	7.1E-02	3.1E-01	5.5E-03	2.4E-02
Benzo(g,h,i)perylene	8.4E-02	3.0E-01	3.8E-01	1.4E+00	2.9E-02	1.0E-01
Benzo(k)fluoranthene	3.6E-02	1.8E-01	2.8E-01	1.4E+00	2.2E-02	1.1E-01
Chrysene	5.9E-02	2.4E-01	3.8E-01	1.5E+00	2.9E-02	1.2E-01
Dibenz(a,h)anthracene	2.6E-02	1.0E-01	4.3E-01	1.7E+00	3.3E-02	1.3E-01
Fluoranthene	9.0E-02	4.3E-01	2.1E-01	1.0E+00	1.6E-02	7.9E-02
Fluorene	1.7E-01	6.9E-01	1.7E-01	6.9E-01	1.3E-02	5.4E-02
Indeno(1,2,3-cd)pyrene	3.2E-02	1.7E-01	2.3E-01	1.2E+00	1.8E-02	9.2E-02
Naphthalene	6.3E-02	1.6E-01	6.3E-02	1.6E-01	4.8E-03	1.2E-02
Perylene	4.0E-02	1.8E-01	4.0E-02	1.8E-01	3.1E-03	1.4E-02
Phenanthrene	4.4E-01	1.9E+00	1.5E+00	6.2E+00	1.1E-01	4.8E-01
Pyrene	8.9E-02	3.7E-01	3.2E-01	1.3E+00	2.5E-02	1.0E-01
Total Petroleum Hydrocarbons						
C08-C11(Gasoline Range)	9.7E+00	2.2E+01	9.7E+00	2.2E+01	7.5E-01	1.7E+00
C11-C14(Kerosene Range)	1.1E+01	2.2E+01	1.1E+01	2.2E+01	8.6E-01	1.7E+00
C14-C20(Diesel Range)	6.5E+01	2.6E+02	6.5E+01	2.6E+02	5.0E+00	2.0E+01

Spreadsheet C2-106 (2 of 2)

Applied Daily Dose for the Hawk
Ingestion Exposure Route
Old Conservation Yard RFI Site

Chemical	Soil Exposure Point Concentration [a]		EPV in Deer Mouse[b]		Applied Daily Dose	
	CTE	RME	CTE	RME	CTE	RME
	(mg/kg)		(mg/kg)		(mg/kg-day)	
C20-C30(Lubricant Oil Range)	2.9E+02	1.4E+03	2.9E+02	1.4E+03	2.3E+01	1.1E+02
PCDD/PCDFs						
2,3,7,8-TCDD	1.0E-06	1.8E-06	1.0E-06	1.8E-06	7.8E-08	1.4E-07
1,2,3,7,8-PeCDD	6.6E-06	5.2E-05	6.6E-06	5.2E-05	5.1E-07	4.0E-06
1,2,3,4,7,8-HxCDD	1.4E-05	5.3E-05	3.4E-06	1.3E-05	2.7E-07	9.7E-07
1,2,3,6,7,8-HxCDD	2.0E-05	1.0E-04	4.3E-06	2.2E-05	3.3E-07	1.7E-06
1,2,3,7,8,9-HxCDD	1.8E-05	8.6E-05	3.2E-06	1.5E-05	2.5E-07	1.2E-06
1,2,3,4,6,7,8-HpCDD	4.9E-04	2.9E-03	1.4E-04	8.4E-04	1.1E-05	6.5E-05
OCDD	3.7E-03	8.2E-03	7.9E-04	1.8E-03	6.1E-05	1.4E-04
2,3,7,8-TCDF	2.2E-06	1.0E-05	4.1E-07	1.9E-06	3.2E-08	1.4E-07
1,2,3,7,8-PeCDF	1.8E-06	9.5E-06	1.8E-06	9.5E-06	1.4E-07	7.3E-07
2,3,4,7,8-PeCDF	5.1E-06	3.0E-05	2.3E-06	1.3E-05	1.7E-07	1.0E-06
1,2,3,4,7,8-HxCDF	1.3E-05	6.2E-05	1.1E-06	5.1E-06	8.1E-08	3.9E-07
1,2,3,6,7,8-HxCDF	4.9E-06	1.0E-05	3.2E-06	6.5E-06	2.5E-07	5.1E-07
2,3,4,6,7,8-HxCDF	5.2E-06	2.9E-05	2.8E-06	1.5E-05	2.2E-07	1.2E-06
1,2,3,7,8,9-HxCDF	2.3E-06	1.0E-05	2.3E-06	1.0E-05	1.8E-07	7.8E-07
1,2,3,4,6,7,8-HpCDF	5.5E-05	1.2E-04	2.4E-05	5.1E-05	1.9E-06	3.9E-06
1,2,3,4,7,8,9-HpCDF	7.2E-06	3.0E-05	7.2E-06	3.0E-05	5.6E-07	2.3E-06
OCDF	1.8E-04	4.1E-04	1.7E-04	3.9E-04	1.3E-05	3.0E-05
PCBs						
Aroclor-1248	5.0E+02	5.5E+03	5.0E+02	5.5E+03	3.9E+01	4.2E+02
Aroclor-1254	1.2E+00	5.4E+00	1.2E+00	5.4E+00	9.5E-02	4.2E-01
Aroclor-1260	1.3E+01	1.4E+02	1.3E+01	1.4E+02	1.0E+00	1.1E+01
PCB-105	1.1E-03	1.2E-02	3.0E-03	3.2E-02	2.3E-04	2.5E-03
PCB-114	2.1E-05	2.1E-04	1.4E-04	1.4E-03	1.0E-05	1.1E-04
PCB-118	2.2E-03	2.4E-02	6.3E-03	6.6E-02	4.8E-04	5.1E-03
PCB-123	3.1E-05	3.3E-04	1.1E-04	1.1E-03	8.2E-06	8.7E-05
PCB-126	8.6E-05	9.2E-04	1.6E-04	1.7E-03	1.2E-05	1.3E-04
PCB-156	7.4E-04	7.9E-03	2.9E-03	3.1E-02	2.2E-04	2.4E-03
PCB-157	3.3E-04	3.5E-03	8.7E-03	9.4E-02	6.7E-04	7.3E-03
PCB-167	5.7E-04	6.1E-03	2.8E-03	3.0E-02	2.2E-04	2.3E-03
PCB-169	8.5E-06	9.2E-05	8.5E-06	9.2E-05	6.6E-07	7.1E-06
PCB-189	8.5E-05	9.2E-04	6.0E-04	6.4E-03	4.6E-05	5.0E-04
PCB-77	1.7E-04	1.8E-03	1.3E-04	1.4E-03	1.0E-05	1.1E-04
PCB-81	3.1E-05	3.2E-04	3.1E-05	3.2E-04	2.4E-06	2.5E-05

Notes:

a. Exposure point concentration (EPC) for soil 0 to 2 feet bgs, from Spreadsheet C2-90.

b. Deer mouse exposure point values were estimated by application of site-specific bioaccumulation factors (BAFs) to soil exposure point concentration when available, or by application of a BAF of 1 when site-specific BAFs were not available.

CTE - central tendancy exposure

RME - reasonable maximum exposure

EPV - exposure point value

VOC - volatile organic compund

SVOC - semi-volatile organic compound

PCB - polychlorinated biphenyls

"-" not applicable

mg/kg - milligram per kilogram

mg/kg-day - milligram per kilogram per day

Applied Daily Dose for the Thrush
Ingestion Exposure Route
Old Conservation Yard RFI Site

Chemical	Soil Exposure Point Concentration [a]		EPV in Earthworms[b]		EPV in Terrestrial Plants[b]		Applied Daily Dose	
	CTE	RME	CTE	RME	CTE	RME	CTE	RME
	(mg/kg)		(mg/kg)		(mg/kg)		(mg/kg-day)	
Inorganic Compounds								
Antimony	1.7E+00	5.4E+00	1.3E+01	4.2E+01	8.9E+00	2.9E+01	2.5E+00	8.0E+00
Barium	7.8E+01	8.3E+01	2.2E+02	2.3E+02	7.8E+01	8.4E+01	3.6E+01	3.9E+01
Boron	4.3E+00	5.2E+00	2.0E+01	2.4E+01	3.2E+01	3.9E+01	5.4E+00	6.5E+00
Cadmium	5.2E-01	9.9E-01	1.0E+01	2.0E+01	5.6E+00	1.1E+01	1.8E+00	3.5E+00
Copper	NC	NC	NC	NC	NC	NC	-	-
Lead	1.7E+01	2.1E+01	4.1E+00	5.0E+00	3.6E+01	4.4E+01	3.8E+00	4.6E+00
Mercury	5.0E-01	3.3E+00	1.7E+00	1.1E+01	4.1E-01	2.7E+00	2.6E-01	1.7E+00
Silver	8.6E-01	1.8E+00	5.7E+00	1.2E+01	1.5E+00	3.0E+00	8.8E-01	1.8E+00
Thallium	8.6E-01	1.7E+00	9.4E-01	1.8E+00	4.4E-01	8.7E-01	1.7E-01	3.3E-01
Zinc	6.6E+01	7.4E+01	2.1E+02	2.3E+02	1.1E+02	1.2E+02	3.7E+01	4.1E+01
VOCs								
1,1,1-Trichloroethane	3.0E-03	5.5E-03	3.0E-03	5.5E-03	3.0E-03	5.5E-03	6.8E-04	1.2E-03
1,1,2-Trichloro-1,2,2-trifluoroethane	1.2E-02	2.1E-02	1.2E-02	2.1E-02	1.2E-02	2.1E-02	2.8E-03	4.6E-03
1,1-Dichloroethene	3.2E-03	5.5E-03	3.2E-03	5.5E-03	3.2E-03	5.5E-03	7.1E-04	1.2E-03
2-Butanone	2.2E-02	1.1E-02	2.2E-02	1.1E-02	2.2E-02	1.1E-02	5.0E-03	2.5E-03
Acetone	3.5E-01	3.5E+00	3.5E-01	3.5E+00	3.5E-01	3.5E+00	7.9E-02	7.9E-01
Benzene	1.1E-03	2.5E-03	1.1E-03	2.5E-03	1.1E-03	2.5E-03	2.6E-04	5.6E-04
Ethylbenzene	1.1E-03	2.5E-03	1.1E-03	2.5E-03	1.1E-03	2.5E-03	2.6E-04	5.6E-04
m,p-Xylene	3.2E-03	7.2E-03	3.2E-03	7.2E-03	3.2E-03	7.2E-03	7.3E-04	1.6E-03
Methylene chloride	4.1E-02	2.4E-01	4.1E-02	2.4E-01	4.1E-02	2.4E-01	9.2E-03	5.5E-02
o-Xylene	7.8E-04	1.7E-03	7.8E-04	1.7E-03	7.8E-04	1.7E-03	1.8E-04	3.8E-04
p-Isopropyltoluene	1.9E-03	1.9E-03	1.9E-03	1.9E-03	1.9E-03	1.9E-03	4.3E-04	4.3E-04
Toluene	1.5E-03	3.6E-03	1.5E-03	3.6E-03	1.5E-03	3.6E-03	3.5E-04	8.0E-04
Trichloroethene	3.0E-03	5.5E-03	3.0E-03	5.5E-03	3.0E-03	5.5E-03	6.8E-04	1.2E-03
Xylenes (total)	4.7E-03	9.9E-03	4.7E-03	9.9E-03	4.7E-03	9.9E-03	1.1E-03	2.2E-03
SVOCs								
1-Methylnaphthalene	1.2E-02	1.3E-02	1.2E-02	1.3E-02	1.2E-02	1.3E-02	2.7E-03	3.0E-03
2,4-Dinitrophenol	6.7E-01	1.0E+00	6.7E-01	1.0E+00	6.7E-01	1.0E+00	1.5E-01	2.3E-01
2-Methylnaphthalene	1.7E-01	5.6E-01	1.7E-01	5.6E-01	1.7E-01	5.6E-01	3.8E-02	1.3E-01
Acenaphthene	1.7E-01	7.0E-01	4.1E-01	1.7E+00	1.7E-01	7.0E-01	6.9E-02	2.9E-01
Acenaphthylene	4.0E-02	1.4E-01	4.0E-02	1.4E-01	4.0E-02	1.4E-01	9.0E-03	3.2E-02
Anthracene	1.2E-01	4.7E-01	3.3E-01	1.3E+00	1.2E-01	4.7E-01	5.5E-02	2.2E-01
Benzo(a)anthracene	3.9E-02	1.8E-01	7.3E-02	3.5E-01	2.0E-01	9.6E-01	2.7E-02	1.3E-01
Benzo(a)pyrene	3.6E-02	1.8E-01	3.6E-02	1.8E-01	3.6E-02	1.8E-01	8.2E-03	4.0E-02
Benzo(b)fluoranthene	4.4E-02	2.0E-01	9.0E-02	4.0E-01	4.4E-02	2.0E-01	1.6E-02	7.2E-02
Benzo(e)pyrene	7.1E-02	3.1E-01	7.7E-02	3.4E-01	7.1E-02	3.1E-01	1.7E-02	7.3E-02
Benzo(g,h,i)perylene	8.4E-02	3.0E-01	4.4E-02	1.6E-01	8.4E-02	3.0E-01	1.4E-02	4.9E-02
Benzo(k)fluoranthene	3.6E-02	1.8E-01	3.2E-02	1.6E-01	3.6E-02	1.8E-01	7.6E-03	3.7E-02
Chrysene	5.9E-02	2.4E-01	1.1E-01	4.5E-01	1.6E-01	6.7E-01	2.9E-02	1.2E-01
Dibenz(a,h)anthracene	2.6E-02	1.0E-01	2.6E-02	1.0E-01	2.6E-02	1.0E-01	5.8E-03	2.4E-02
Fluoranthene	9.0E-02	4.3E-01	8.2E-02	3.9E-01	2.6E-01	1.2E+00	3.3E-02	1.6E-01
Fluorene	1.7E-01	6.9E-01	6.6E-01	2.7E+00	1.7E-01	6.9E-01	1.0E-01	4.3E-01
Indeno(1,2,3-cd)pyrene	3.2E-02	1.7E-01	2.7E-02	1.4E-01	3.2E-02	1.7E-01	6.6E-03	3.4E-02
Naphthalene	6.3E-02	1.6E-01	6.3E-02	1.6E-01	6.3E-02	1.6E-01	1.4E-02	3.5E-02
Perylene	4.0E-02	1.8E-01	4.0E-02	1.8E-01	4.0E-02	1.8E-01	9.1E-03	4.0E-02
Phenanthrene	4.4E-01	1.9E+00	8.1E-01	3.4E+00	3.2E+00	1.3E+01	3.8E-01	1.6E+00
Pyrene	8.9E-02	3.7E-01	2.6E-01	1.1E+00	1.7E-01	7.1E-01	4.9E-02	2.1E-01
Total Petroleum Hydrocarbons								
C08-C11(Gasoline Range)	9.7E+00	2.2E+01	9.7E+00	2.2E+01	9.7E+00	2.2E+01	2.2E+00	4.8E+00
C11-C14(Kerosene Range)	1.1E+01	2.2E+01	1.1E+01	2.2E+01	1.1E+01	2.2E+01	2.5E+00	4.9E+00

Spreadsheet C2-105 (2 of 2)

Applied Daily Dose for the Thrush
Ingestion Exposure Route
Old Conservation Yard RFI Site

Chemical	Soil Exposure Point Concentration [a]		EPV in Earthworms[b]		EPV in Terrestrial Plants[b]		Applied Daily Dose	
	CTE	RME	CTE	RME	CTE	RME	CTE	RME
	(mg/kg)		(mg/kg)		(mg/kg)		(mg/kg-day)	
C14-C20(Diesel Range)	6.5E+01	2.6E+02	6.5E+01	2.6E+02	6.5E+01	2.6E+02	1.5E+01	5.8E+01
C20-C30(Lubricant Oil Range)	2.9E+02	1.4E+03	2.9E+02	1.4E+03	2.9E+02	1.4E+03	6.6E+01	3.1E+02
PCDD/PCDFs								
2,3,7,8-TCDD	1.0E-06	1.8E-06	1.0E-06	1.8E-06	1.0E-06	1.8E-06	2.3E-07	4.0E-07
1,2,3,7,8-PeCDD	6.6E-06	5.2E-05	5.8E-06	4.6E-05	6.6E-06	5.2E-05	1.4E-06	1.1E-05
1,2,3,4,7,8-HxCDD	1.4E-05	5.3E-05	1.1E-05	4.1E-05	1.4E-05	5.3E-05	2.8E-06	1.0E-05
1,2,3,6,7,8-HxCDD	2.0E-05	1.0E-04	1.5E-05	7.9E-05	3.3E-06	1.7E-05	2.5E-06	1.3E-05
1,2,3,7,8,9-HxCDD	1.8E-05	8.6E-05	1.7E-05	8.1E-05	1.8E-05	8.6E-05	3.9E-06	1.9E-05
1,2,3,4,6,7,8-HpCDD	4.9E-04	2.9E-03	2.7E-04	1.6E-03	1.6E-04	9.4E-04	5.3E-05	3.1E-04
OCDD	3.7E-03	8.2E-03	1.7E-03	3.9E-03	8.7E-04	1.9E-03	3.4E-04	7.5E-04
2,3,7,8-TCDF	2.2E-06	1.0E-05	2.2E-06	1.0E-05	2.2E-06	1.0E-05	5.0E-07	2.3E-06
1,2,3,7,8-PeCDF	1.8E-06	9.5E-06	7.8E-07	4.0E-06	1.8E-06	9.5E-06	2.7E-07	1.4E-06
2,3,4,7,8-PeCDF	5.1E-06	3.0E-05	2.6E-06	1.5E-05	5.1E-06	3.0E-05	8.2E-07	4.8E-06
1,2,3,4,7,8-HxCDF	1.3E-05	6.2E-05	8.4E-06	4.1E-05	1.3E-05	6.2E-05	2.3E-06	1.1E-05
1,2,3,6,7,8-HxCDF	4.9E-06	1.0E-05	1.3E-06	2.6E-06	4.9E-06	1.0E-05	6.3E-07	1.3E-06
2,3,4,6,7,8-HxCDF	5.2E-06	2.9E-05	2.9E-06	1.6E-05	5.2E-06	2.9E-05	8.7E-07	4.8E-06
1,2,3,7,8,9-HxCDF	2.3E-06	1.0E-05	2.3E-06	1.0E-05	2.3E-06	1.0E-05	5.2E-07	2.3E-06
1,2,3,4,6,7,8-HpCDF	5.5E-05	1.2E-04	3.0E-05	6.3E-05	1.2E-05	2.6E-05	5.5E-06	1.2E-05
1,2,3,4,7,8,9-HpCDF	7.2E-06	3.0E-05	7.2E-06	3.0E-05	7.2E-06	3.0E-05	1.6E-06	6.8E-06
OCDF	1.8E-04	4.1E-04	9.1E-05	2.1E-04	6.0E-05	1.4E-04	1.9E-05	4.2E-05
PCBs								
Aroclor-1248	5.0E+02	5.5E+03	5.0E+02	5.5E+03	5.0E+02	5.5E+03	1.1E+02	1.2E+03
Aroclor-1254	1.2E+00	5.4E+00	1.2E+00	5.4E+00	1.2E+00	5.4E+00	2.8E-01	1.2E+00
Aroclor-1260	1.3E+01	1.4E+02	1.3E+01	1.4E+02	1.3E+01	1.4E+02	3.0E+00	3.2E+01
PCB-105	1.1E-03	1.2E-02	1.2E-02	1.2E-01	3.7E-03	3.9E-02	1.8E-03	2.0E-02
PCB-114	2.1E-05	2.1E-04	5.5E-04	5.6E-03	7.6E-05	7.7E-04	7.9E-05	8.1E-04
PCB-118	2.2E-03	2.4E-02	2.6E-02	2.7E-01	7.0E-03	7.4E-02	4.0E-03	4.2E-02
PCB-123	3.1E-05	3.3E-04	4.0E-04	4.2E-03	1.1E-04	1.1E-03	6.2E-05	6.5E-04
PCB-126	8.6E-05	9.2E-04	4.6E-04	4.9E-03	1.9E-04	2.0E-03	7.7E-05	8.3E-04
PCB-156	7.4E-04	7.9E-03	4.3E-03	4.6E-02	1.8E-03	2.0E-02	7.3E-04	7.7E-03
PCB-157	3.3E-04	3.5E-03	1.9E-03	2.1E-02	8.6E-04	9.3E-03	3.3E-04	3.6E-03
PCB-167	5.7E-04	6.1E-03	3.4E-03	3.6E-02	1.6E-03	1.7E-02	5.8E-04	6.3E-03
PCB-169	8.5E-06	9.2E-05	8.5E-06	9.2E-05	8.5E-06	9.2E-05	1.9E-06	2.1E-05
PCB-189	8.5E-05	9.2E-04	2.0E-04	2.2E-03	1.8E-04	2.0E-03	4.3E-05	4.6E-04
PCB-77	1.7E-04	1.8E-03	1.1E-03	1.1E-02	4.1E-04	4.4E-03	1.8E-04	1.9E-03
PCB-81	3.1E-05	3.2E-04	1.8E-04	1.9E-03	9.2E-05	9.7E-04	3.2E-05	3.4E-04

Notes:

a. Exposure point concentration (EPC) for soil 0 to 2 feet bgs, from Spreadsheet C2-90.

b. Earthworm and terrestrial plant exposure point values were estimated by application of site-specific bioaccumulation factors (BAFs) to soil exposure point concentration when available, or by application of a BAF of 1 when site-specific BAFs were not available.

CTE - central tendancy exposure

RME - reasonable maximum exposure

EPV - exposure point value

NC - not selected as a CPEC in the indicated media, per the SRAM (MWH 2005).

CPEC - chemical of potential ecological concern

VOC - volatile organic compund

SVOC - semi-volatile organic compound

PCB - polychlorinated biphenyls

"-" not applicable

mg/kg - milligram per kilogram

mg/kg-day - milligram per kilogram per day

Spreadsheet C2-104 (1 of 1)

Applied Daily Dose for the Deer Mouse
Inhalation Exposure Route
Old Conservation Yard RFI Site

Chemical	Burrow Air Concentration [a]		Applied Daily Dose	
	CTE (mg/m^3)	RME (mg/m^3)	CTE (mg/kg-day)	RME (mg/kg-day)
VOCs				
1,1,1-Trichloroethane	6.1E-01	8.0E-01	6.1E-01	8.0E-01
1,1,2-Trichloro-1,2,2-trifluoroethane	8.9E-01	1.8E+00	8.9E-01	1.8E+00
1,1-Dichloroethene	5.9E-01	7.6E-01	6.0E-01	7.6E-01
Benzene	5.0E-01	5.0E-01	5.0E-01	5.0E-01
Ethylbenzene	2.4E-01	4.8E-01	2.4E-01	4.8E-01
m,p-Xylene	5.0E-01	1.0E+00	5.0E-01	1.0E+00
Methylene chloride	5.0E-01	1.0E+01	5.0E-01	1.0E+01
o-Xylene	1.1E-01	2.2E-01	1.1E-01	2.2E-01
p-Isopropyltoluene	3.8E-01	3.8E-01	3.8E-01	3.8E-01
Toluene	4.9E-01	5.0E-01	5.0E-01	5.0E-01
Trichloroethene	1.3E+00	4.5E+00	1.3E+00	4.5E+00
Xylenes (total)	5.0E-01	1.0E+00	5.0E-01	1.0E+00

Notes:

a. Based on exposure point concentrations in soil vapor, from Spreadsheet C2-93.

CTE - central tendancy exposure

RME - reasonable maximum exposure

VOC - volatile organic compound

"-" not applicable

mg/m^3 - milligrams per cubic meter

mg/kg-day - milligram per kilogram per day

Spreadsheet C2-103 (1 of 2)

Applied Daily Dose for the Deer Mouse
Ingestion Exposure Route
Old Conservation Yard RFI Site

Chemical	Soil Exposure Point Concentration [a]		EPV in Earthworms[b]		EPV in Terrestrial Plants[b]		Applied Daily Dose	
	CTE	RME	CTE	RME	CTE	RME	CTE	RME
	(mg/kg)		(mg/kg)		(mg/kg)		(mg/kg-day)	
Inorganic Compounds								
Antimony	1.7E+00	5.4E+00	1.3E+01	4.2E+01	8.9E+00	2.9E+01	2.1E+00	7.0E+00
Barium	7.8E+01	8.3E+01	2.2E+02	2.3E+02	7.8E+01	8.4E+01	2.6E+01	2.8E+01
Boron	4.3E+00	5.2E+00	2.0E+01	2.4E+01	3.2E+01	3.9E+01	6.0E+00	7.4E+00
Cadmium	5.2E-01	9.9E-01	1.0E+01	2.0E+01	5.6E+00	1.1E+01	1.5E+00	2.9E+00
Copper	NC	NC	NC	NC	NC	NC	-	-
Lead	1.7E+01	2.1E+01	4.1E+00	5.0E+00	3.6E+01	4.4E+01	5.8E+00	7.0E+00
Mercury	5.0E-01	3.3E+00	1.7E+00	1.1E+01	4.1E-01	2.7E+00	1.7E-01	1.1E+00
Silver	8.6E-01	1.8E+00	5.7E+00	1.2E+01	1.5E+00	3.0E+00	5.8E-01	1.2E+00
Thallium	8.6E-01	1.7E+00	9.4E-01	1.8E+00	4.4E-01	8.7E-01	1.3E-01	2.5E-01
Zinc	6.6E+01	7.4E+01	2.1E+02	2.3E+02	1.1E+02	1.2E+02	3.0E+01	3.3E+01
VOCs								
1,1,1-Trichloroethane	3.0E-03	5.5E-03	3.0E-03	5.5E-03	3.0E-03	5.5E-03	6.5E-04	1.2E-03
1,1,2-Trichloro-1,2,2-trifluoroethane	1.2E-02	2.1E-02	1.2E-02	2.1E-02	1.2E-02	2.1E-02	2.7E-03	4.5E-03
1,1-Dichloroethene	3.2E-03	5.5E-03	3.2E-03	5.5E-03	3.2E-03	5.5E-03	6.8E-04	1.2E-03
2-Butanone	2.2E-02	1.1E-02	2.2E-02	1.1E-02	2.2E-02	1.1E-02	4.8E-03	2.4E-03
Acetone	3.5E-01	3.5E+00	3.5E-01	3.5E+00	3.5E-01	3.5E+00	7.7E-02	7.6E-01
Benzene	1.1E-03	2.5E-03	1.1E-03	2.5E-03	1.1E-03	2.5E-03	2.5E-04	5.4E-04
Ethylbenzene	1.1E-03	2.5E-03	1.1E-03	2.5E-03	1.1E-03	2.5E-03	2.5E-04	5.4E-04
m,p-Xylene	3.2E-03	7.2E-03	3.2E-03	7.2E-03	3.2E-03	7.2E-03	7.0E-04	1.6E-03
Methylene chloride	4.1E-02	2.4E-01	4.1E-02	2.4E-01	4.1E-02	2.4E-01	8.9E-03	5.3E-02
o-Xylene	7.8E-04	1.7E-03	7.8E-04	1.7E-03	7.8E-04	1.7E-03	1.7E-04	3.7E-04
p-Isopropyltoluene	1.9E-03	1.9E-03	1.9E-03	1.9E-03	1.9E-03	1.9E-03	4.1E-04	4.1E-04
Toluene	1.5E-03	3.6E-03	1.5E-03	3.6E-03	1.5E-03	3.6E-03	3.4E-04	7.7E-04
Trichloroethene	3.0E-03	5.5E-03	3.0E-03	5.5E-03	3.0E-03	5.5E-03	6.5E-04	1.2E-03
Xylenes (total)	4.7E-03	9.9E-03	4.7E-03	9.9E-03	4.7E-03	9.9E-03	1.0E-03	2.2E-03
SVOCs								
1-Methylnaphthalene	1.2E-02	1.3E-02	1.2E-02	1.3E-02	1.2E-02	1.3E-02	2.6E-03	2.9E-03
2,4-Dinitrophenol	6.7E-01	1.0E+00	6.7E-01	1.0E+00	6.7E-01	1.0E+00	1.4E-01	2.2E-01
2-Methylnaphthalene	1.7E-01	5.6E-01	1.7E-01	5.6E-01	1.7E-01	5.6E-01	3.7E-02	1.2E-01
Acenaphthene	1.7E-01	7.0E-01	4.1E-01	1.7E+00	1.7E-01	7.0E-01	5.2E-02	2.1E-01
Acenaphthylene	4.0E-02	1.4E-01	4.0E-02	1.4E-01	4.0E-02	1.4E-01	8.7E-03	3.1E-02
Anthracene	1.2E-01	4.7E-01	3.3E-01	1.3E+00	1.2E-01	4.7E-01	3.9E-02	1.6E-01
Benzo(a)anthracene	3.9E-02	1.8E-01	7.3E-02	3.5E-01	2.0E-01	9.6E-01	3.5E-02	1.7E-01
Benzo(a)pyrene	3.6E-02	1.8E-01	3.6E-02	1.8E-01	3.6E-02	1.8E-01	7.9E-03	3.8E-02
Benzo(b)fluoranthene	4.4E-02	2.0E-01	9.0E-02	4.0E-01	4.4E-02	2.0E-01	1.2E-02	5.6E-02
Benzo(e)pyrene	7.1E-02	3.1E-01	7.7E-02	3.4E-01	7.1E-02	3.1E-01	1.6E-02	6.9E-02
Benzo(g,h,i)perylene	8.4E-02	3.0E-01	4.4E-02	1.6E-01	8.4E-02	3.0E-01	1.6E-02	5.6E-02
Benzo(k)fluoranthene	3.6E-02	1.8E-01	3.2E-02	1.6E-01	3.6E-02	1.8E-01	7.6E-03	3.7E-02
Chrysene	5.9E-02	2.4E-01	1.1E-01	4.5E-01	1.6E-01	6.7E-01	3.2E-02	1.3E-01
Dibenz(a,h)anthracene	2.6E-02	1.0E-01	2.6E-02	1.0E-01	2.6E-02	1.0E-01	5.6E-03	2.3E-02
Fluoranthene	9.0E-02	4.3E-01	8.2E-02	3.9E-01	2.6E-01	1.2E+00	4.4E-02	2.1E-01
Fluorene	1.7E-01	6.9E-01	6.6E-01	2.7E+00	1.7E-01	6.9E-01	6.7E-02	2.8E-01
Indeno(1,2,3-cd)pyrene	3.2E-02	1.7E-01	2.7E-02	1.4E-01	3.2E-02	1.7E-01	6.6E-03	3.4E-02
Naphthalene	6.3E-02	1.6E-01	6.3E-02	1.6E-01	6.3E-02	1.6E-01	1.4E-02	3.4E-02
Perylene	4.0E-02	1.8E-01	4.0E-02	1.8E-01	4.0E-02	1.8E-01	8.8E-03	3.8E-02
Phenanthrene	4.4E-01	1.9E+00	8.1E-01	3.4E+00	3.2E+00	1.3E+01	5.2E-01	2.2E+00
Pyrene	8.9E-02	3.7E-01	2.6E-01	1.1E+00	1.7E-01	7.1E-01	4.2E-02	1.8E-01
Total Petroleum Hydrocarbons								
C08-C11(Gasoline Range)	9.7E+00	2.2E+01	9.7E+00	2.2E+01	9.7E+00	2.2E+01	2.1E+00	4.7E+00
C11-C14(Kerosene Range)	1.1E+01	2.2E+01	1.1E+01	2.2E+01	1.1E+01	2.2E+01	2.4E+00	4.7E+00

Spreadsheet C2-103 (2 of 2)

Applied Daily Dose for the Deer Mouse
Ingestion Exposure Route
Old Conservation Yard RFI Site

Chemical	Soil Exposure Point Concentration [a]		EPV in Earthworms[b]		EPV in Terrestrial Plants[b]		Applied Daily Dose	
	CTE	RME	CTE	RME	CTE	RME	CTE	RME
	(mg/kg)		(mg/kg)		(mg/kg)		(mg/kg-day)	
C14-C20(Diesel Range)	6.5E+01	2.6E+02	6.5E+01	2.6E+02	6.5E+01	2.6E+02	1.4E+01	5.5E+01
C20-C30(Lubricant Oil Range)	2.9E+02	1.4E+03	2.9E+02	1.4E+03	2.9E+02	1.4E+03	6.4E+01	3.0E+02
PCDD/PCDFs								
2,3,7,8-TCDD	1.0E-06	1.8E-06	1.0E-06	1.8E-06	1.0E-06	1.8E-06	2.2E-07	3.8E-07
1,2,3,7,8-PeCDD	6.6E-06	5.2E-05	5.8E-06	4.6E-05	6.6E-06	5.2E-05	1.4E-06	1.1E-05
1,2,3,4,7,8-HxCDD	1.4E-05	5.3E-05	1.1E-05	4.1E-05	1.4E-05	5.3E-05	2.9E-06	1.1E-05
1,2,3,6,7,8-HxCDD	2.0E-05	1.0E-04	1.5E-05	7.9E-05	3.3E-06	1.7E-05	1.6E-06	7.9E-06
1,2,3,7,8,9-HxCDD	1.8E-05	8.6E-05	1.7E-05	8.1E-05	1.8E-05	8.6E-05	3.8E-06	1.8E-05
1,2,3,4,6,7,8-HpCDD	4.9E-04	2.9E-03	2.7E-04	1.6E-03	1.6E-04	9.4E-04	4.3E-05	2.5E-04
OCDD	3.7E-03	8.2E-03	1.7E-03	3.9E-03	8.7E-04	1.9E-03	2.6E-04	5.7E-04
2,3,7,8-TCDF	2.2E-06	1.0E-05	2.2E-06	1.0E-05	2.2E-06	1.0E-05	4.8E-07	2.2E-06
1,2,3,7,8-PeCDF	1.8E-06	9.5E-06	7.8E-07	4.0E-06	1.8E-06	9.5E-06	3.3E-07	1.7E-06
2,3,4,7,8-PeCDF	5.1E-06	3.0E-05	2.6E-06	1.5E-05	5.1E-06	3.0E-05	9.5E-07	5.6E-06
1,2,3,4,7,8-HxCDF	1.3E-05	6.2E-05	8.4E-06	4.1E-05	1.3E-05	6.2E-05	2.5E-06	1.2E-05
1,2,3,6,7,8-HxCDF	4.9E-06	1.0E-05	1.3E-06	2.6E-06	4.9E-06	1.0E-05	8.4E-07	1.7E-06
2,3,4,6,7,8-HxCDF	5.2E-06	2.9E-05	2.9E-06	1.6E-05	5.2E-06	2.9E-05	9.9E-07	5.5E-06
1,2,3,7,8,9-HxCDF	2.3E-06	1.0E-05	2.3E-06	1.0E-05	2.3E-06	1.0E-05	5.0E-07	2.2E-06
1,2,3,4,6,7,8-HpCDF	5.5E-05	1.2E-04	3.0E-05	6.3E-05	1.2E-05	2.6E-05	4.0E-06	8.5E-06
1,2,3,4,7,8,9-HpCDF	7.2E-06	3.0E-05	7.2E-06	3.0E-05	7.2E-06	3.0E-05	1.6E-06	6.6E-06
OCDF	1.8E-04	4.1E-04	9.1E-05	2.1E-04	6.0E-05	1.4E-04	1.6E-05	3.5E-05
PCBs								
Aroclor-1248	5.0E+02	5.5E+03	5.0E+02	5.5E+03	5.0E+02	5.5E+03	1.1E+02	1.2E+03
Aroclor-1254	1.2E+00	5.4E+00	1.2E+00	5.4E+00	1.2E+00	5.4E+00	2.7E-01	1.2E+00
Aroclor-1260	1.3E+01	1.4E+02	1.3E+01	1.4E+02	1.3E+01	1.4E+02	2.9E+00	3.1E+01
PCB-105	1.1E-03	1.2E-02	1.2E-02	1.2E-01	3.7E-03	3.9E-02	1.3E-03	1.4E-02
PCB-114	2.1E-05	2.1E-04	5.5E-04	5.6E-03	7.6E-05	7.7E-04	4.6E-05	4.7E-04
PCB-118	2.2E-03	2.4E-02	2.6E-02	2.7E-01	7.0E-03	7.4E-02	2.7E-03	2.8E-02
PCB-123	3.1E-05	3.3E-04	4.0E-04	4.2E-03	1.1E-04	1.1E-03	4.1E-05	4.4E-04
PCB-126	8.6E-05	9.2E-04	4.6E-04	4.9E-03	1.9E-04	2.0E-03	5.8E-05	6.2E-04
PCB-156	7.4E-04	7.9E-03	4.3E-03	4.6E-02	1.8E-03	2.0E-02	5.5E-04	5.9E-03
PCB-157	3.3E-04	3.5E-03	1.9E-03	2.1E-02	8.6E-04	9.3E-03	2.5E-04	2.7E-03
PCB-167	5.7E-04	6.1E-03	3.4E-03	3.6E-02	1.6E-03	1.7E-02	4.5E-04	4.9E-03
PCB-169	8.5E-06	9.2E-05	8.5E-06	9.2E-05	8.5E-06	9.2E-05	1.8E-06	2.0E-05
PCB-189	8.5E-05	9.2E-04	2.0E-04	2.2E-03	1.8E-04	2.0E-03	4.1E-05	4.4E-04
PCB-77	1.7E-04	1.8E-03	1.1E-03	1.1E-02	4.1E-04	4.4E-03	1.3E-04	1.4E-03
PCB-81	3.1E-05	3.2E-04	1.8E-04	1.9E-03	9.2E-05	9.7E-04	2.5E-05	2.7E-04

Notes:

a. Exposure point concentration (EPC) for soil 0 to 4 feet bgs, from Spreadsheet C2-92.

b. Earthworm and terrestrial plant exposure point values were estimated by application of site-specific bioaccumulation factors (BAFs) to soil exposure point concentration when available, or by application of a BAF of 1 when site-specific BAFs were not available.

CTE - central tendancy exposure

RME - reasonable maximum exposure

EPV - exposure point value

NC - not selected as a CPEC in the indicated media, per the SRAM (MWH 2005).

CPEC - chemical of potential ecological concern

VOC - volatile organic compund

SVOC - semi-volatile organic compound

PCB - polychlorinated biphenyls

CPEC - chemical of potential ecological concern

"-" not applicable

mg/kg - milligram per kilogram

mg/kg-day - milligram per kilogram per day

Spreadsheet C2-102 (1 of 2)

Exposure Point Values for Plants
Old Conservation Yard RFI Site

Chemical	Soil EPC		BAF	Plant EPV	
	CTE (mg/kg)	RME (mg/kg)	(unitless)	CTE (mg/kg)	RME (mg/kg)
Inorganic Compounds					
Antimony	1.7E+00	5.4E+00	5	8.9E+00	2.9E+01
Barium	7.8E+01	8.3E+01	1	7.8E+01	8.4E+01
Boron	4.3E+00	5.2E+00	7	3.2E+01	3.9E+01
Cadmium	5.2E-01	9.9E-01	11	5.6E+00	1.1E+01
Copper	NC	NC	2	NC	NC
Lead	1.7E+01	2.1E+01	2	3.6E+01	4.4E+01
Mercury	5.0E-01	3.3E+00	1	4.1E-01	2.7E+00
Silver	8.6E-01	1.8E+00	2	1.5E+00	3.0E+00
Thallium	8.6E-01	1.7E+00	1	4.4E-01	8.7E-01
Zinc	6.6E+01	7.4E+01	2	1.1E+02	1.2E+02
VOCs					
1,1,1-Trichloroethane	3.0E-03	5.5E-03	1	3.0E-03	5.5E-03
1,1,2-Trichloro-1,2,2-trifluoroethane	1.2E-02	2.1E-02	1	1.2E-02	2.1E-02
1,1-Dichloroethene	3.2E-03	5.5E-03	1	3.2E-03	5.5E-03
2-Butanone	2.2E-02	1.1E-02	1	2.2E-02	1.1E-02
Acetone	3.5E-01	3.5E+00	1	3.5E-01	3.5E+00
Benzene	1.1E-03	2.5E-03	1	1.1E-03	2.5E-03
Ethylbenzene	1.1E-03	2.5E-03	1	1.1E-03	2.5E-03
m,p-Xylene	3.2E-03	7.2E-03	1	3.2E-03	7.2E-03
Methylene chloride	4.1E-02	2.4E-01	1	4.1E-02	2.4E-01
o-Xylene	7.8E-04	1.7E-03	1	7.8E-04	1.7E-03
p-Isopropyltoluene	1.9E-03	1.9E-03	1	1.9E-03	1.9E-03
Toluene	1.5E-03	3.6E-03	1	1.5E-03	3.6E-03
Trichloroethene	3.0E-03	5.5E-03	1	3.0E-03	5.5E-03
Xylenes (total)	4.7E-03	9.9E-03	1	4.7E-03	9.9E-03
SVOCs					
1-Methylnaphthalene	1.2E-02	1.3E-02	1	1.2E-02	1.3E-02
2,4-Dinitrophenol	6.7E-01	1.0E+00	1	6.7E-01	1.0E+00
2-Methylnaphthalene	1.7E-01	5.6E-01	1	1.7E-01	5.6E-01
Acenaphthene	1.7E-01	7.0E-01	1	1.7E-01	7.0E-01
Acenaphthylene	4.0E-02	1.4E-01	1	4.0E-02	1.4E-01
Anthracene	1.2E-01	4.7E-01	1	1.2E-01	4.7E-01
Benzo(a)anthracene	3.9E-02	1.8E-01	5	2.0E-01	9.6E-01
Benzo(a)pyrene	3.6E-02	1.8E-01	1	3.6E-02	1.8E-01
Benzo(b)fluoranthene	4.4E-02	2.0E-01	1	4.4E-02	2.0E-01
Benzo(e)pyrene	7.1E-02	3.1E-01	1	7.1E-02	3.1E-01
Benzo(g,h,i)perylene	8.4E-02	3.0E-01	1	8.4E-02	3.0E-01
Benzo(k)fluoranthene	3.6E-02	1.8E-01	1	3.6E-02	1.8E-01
Chrysene	5.9E-02	2.4E-01	3	1.6E-01	6.7E-01
Dibenz(a,h)anthracene	2.6E-02	1.0E-01	1	2.6E-02	1.0E-01
Fluoranthene	9.0E-02	4.3E-01	3	2.6E-01	1.2E+00
Fluorene	1.7E-01	6.9E-01	1	1.7E-01	6.9E-01
Indeno(1,2,3-cd)pyrene	3.2E-02	1.7E-01	1	3.2E-02	1.7E-01
Naphthalene	6.3E-02	1.6E-01	1	6.3E-02	1.6E-01
Perylene	4.0E-02	1.8E-01	1	4.0E-02	1.8E-01
Phenanthrene	4.4E-01	1.9E+00	7	3.2E+00	1.3E+01
Pyrene	8.9E-02	3.7E-01	2	1.7E-01	7.1E-01
Total Petroleum Hydrocarbons					
C08-C11(Gasoline Range)	9.7E+00	2.2E+01	1	9.7E+00	2.2E+01
C11-C14(Kerosene Range)	1.1E+01	2.2E+01	1	1.1E+01	2.2E+01
C14-C20(Diesel Range)	6.5E+01	2.6E+02	1	6.5E+01	2.6E+02
C20-C30(Lubricant Oil Range)	2.9E+02	1.4E+03	1	2.9E+02	1.4E+03

Exposure Point Values for Plants
Old Conservation Yard RFI Site

Chemical	Soil EPC		BAF	Plant EPV	
	CTE (mg/kg)	RME (mg/kg)	(unitless)	CTE (mg/kg)	RME (mg/kg)
PCDD/PCDFs					
2,3,7,8-TCDD	1.0E-06	1.8E-06	1	1.0E-06	1.8E-06
1,2,3,7,8-PeCDD	6.6E-06	5.2E-05	1	6.6E-06	5.2E-05
1,2,3,4,7,8-HxCDD	1.4E-05	5.3E-05	1	1.4E-05	5.3E-05
1,2,3,6,7,8-HxCDD	2.0E-05	1.0E-04	0	3.3E-06	1.7E-05
1,2,3,7,8,9-HxCDD	1.8E-05	8.6E-05	1	1.8E-05	8.6E-05
1,2,3,4,6,7,8-HpCDD	4.9E-04	2.9E-03	0	1.6E-04	9.4E-04
OCDD	3.7E-03	8.2E-03	0	8.7E-04	1.9E-03
2,3,7,8-TCDF	2.2E-06	1.0E-05	1	2.2E-06	1.0E-05
1,2,3,7,8-PeCDF	1.8E-06	9.5E-06	1	1.8E-06	9.5E-06
2,3,4,7,8-PeCDF	5.1E-06	3.0E-05	1	5.1E-06	3.0E-05
1,2,3,4,7,8-HxCDF	1.3E-05	6.2E-05	1	1.3E-05	6.2E-05
1,2,3,6,7,8-HxCDF	4.9E-06	1.0E-05	1	4.9E-06	1.0E-05
2,3,4,6,7,8-HxCDF	5.2E-06	2.9E-05	1	5.2E-06	2.9E-05
1,2,3,7,8,9-HxCDF	2.3E-06	1.0E-05	1	2.3E-06	1.0E-05
1,2,3,4,6,7,8-HpCDF	5.5E-05	1.2E-04	0	1.2E-05	2.6E-05
1,2,3,4,7,8,9-HpCDF	7.2E-06	3.0E-05	1	7.2E-06	3.0E-05
OCDF	1.8E-04	4.1E-04	0	6.0E-05	1.4E-04
PCBs					
Aroclor-1248	5.0E+02	5.5E+03	1	5.0E+02	5.5E+03
Aroclor-1254	1.2E+00	5.4E+00	1	1.2E+00	5.4E+00
Aroclor-1260	1.3E+01	1.4E+02	1	1.3E+01	1.4E+02
PCB-105	1.1E-03	1.2E-02	3	3.7E-03	3.9E-02
PCB-114	2.1E-05	2.1E-04	4	7.6E-05	7.7E-04
PCB-118	2.2E-03	2.4E-02	3	7.0E-03	7.4E-02
PCB-123	3.1E-05	3.3E-04	3	1.1E-04	1.1E-03
PCB-126	8.6E-05	9.2E-04	2	1.9E-04	2.0E-03
PCB-156	7.4E-04	7.9E-03	2	1.8E-03	2.0E-02
PCB-157	3.3E-04	3.5E-03	3	8.6E-04	9.3E-03
PCB-167	5.7E-04	6.1E-03	3	1.6E-03	1.7E-02
PCB-169	8.5E-06	9.2E-05	1	8.5E-06	9.2E-05
PCB-189	8.5E-05	9.2E-04	2	1.8E-04	2.0E-03
PCB-77	1.7E-04	1.8E-03	2	4.1E-04	4.4E-03
PCB-81	3.1E-05	3.2E-04	3	9.2E-05	9.7E-04

Notes:
EPC - exposure point concentration (based on 0 to 2 feet bgs data) as presented in Spreadsheet C2-90.
EPV - exposure point value
BAF - bioaccumulation factor approximates the 75th percentile of BAFs measured at SSFL;
if no BAF was available a default of 1 is used.
CTE - central tendancy exposure
RME - reasonable maximum exposure
NC - not selected as a CPEC in the indicated media, per the SRAM (MWH 2005).
CPEC - chemical of potential ecological concern
VOC - volatile organic compound
SVOC - semi-volatile organic compounds
PCB - polychlorinated biphenyls
mg/kg - milligram per kilogram

Exposure Point Values for Earthworms
Old Conservation Yard RFI Site

Chemical	Soil EPC		BAF	Earthworm EPV	
	CTE (mg/kg)	RME (mg/kg)	(unitless)	CTE (mg/kg)	RME (mg/kg)
Inorganic Compounds					
Antimony	1.7E+00	5.4E+00	8	1.3E+01	4.2E+01
Barium	7.8E+01	8.3E+01	3	2.2E+02	2.3E+02
Boron	4.3E+00	5.2E+00	5	2.0E+01	2.4E+01
Cadmium	5.2E-01	9.9E-01	20	1.0E+01	2.0E+01
Copper	NC	NC	15	NC	NC
Lead	1.7E+01	2.1E+01	0	4.1E+00	5.0E+00
Mercury	5.0E-01	3.3E+00	3	1.7E+00	1.1E+01
Silver	8.6E-01	1.8E+00	7	5.7E+00	1.2E+01
Thallium	8.6E-01	1.7E+00	1	9.4E-01	1.8E+00
Zinc	6.6E+01	7.4E+01	3	2.1E+02	2.3E+02
VOCs					
1,1,1-Trichloroethane	3.0E-03	5.5E-03	1	3.0E-03	5.5E-03
1,1,2-Trichloro-1,2,2-trifluoroethane	1.2E-02	2.1E-02	1	1.2E-02	2.1E-02
1,1-Dichloroethene	3.2E-03	5.5E-03	1	3.2E-03	5.5E-03
2-Butanone	2.2E-02	1.1E-02	1	2.2E-02	1.1E-02
Acetone	3.5E-01	3.5E+00	1	3.5E-01	3.5E+00
Benzene	1.1E-03	2.5E-03	1	1.1E-03	2.5E-03
Ethylbenzene	1.1E-03	2.5E-03	1	1.1E-03	2.5E-03
m,p-Xylene	3.2E-03	7.2E-03	1	3.2E-03	7.2E-03
Methylene chloride	4.1E-02	2.4E-01	1	4.1E-02	2.4E-01
o-Xylene	7.8E-04	1.7E-03	1	7.8E-04	1.7E-03
p-Isopropyltoluene	1.9E-03	1.9E-03	1	1.9E-03	1.9E-03
Toluene	1.5E-03	3.6E-03	1	1.5E-03	3.6E-03
Trichloroethene	3.0E-03	5.5E-03	1	3.0E-03	5.5E-03
Xylenes (total)	4.7E-03	9.9E-03	1	4.7E-03	9.9E-03
SVOCs					
1-Methylnaphthalene	1.2E-02	1.3E-02	1	1.2E-02	1.3E-02
2,4-Dinitrophenol	6.7E-01	1.0E+00	1	6.7E-01	1.0E+00
2-Methylnaphthalene	1.7E-01	5.6E-01	1	1.7E-01	5.6E-01
Acenaphthene	1.7E-01	7.0E-01	2	4.1E-01	1.7E+00
Acenaphthylene	4.0E-02	1.4E-01	1	4.0E-02	1.4E-01
Anthracene	1.2E-01	4.7E-01	3	3.3E-01	1.3E+00
Benzo(a)anthracene	3.9E-02	1.8E-01	2	7.3E-02	3.5E-01
Benzo(a)pyrene	3.6E-02	1.8E-01	1	3.6E-02	1.8E-01
Benzo(b)fluoranthene	4.4E-02	2.0E-01	2	9.0E-02	4.0E-01
Benzo(e)pyrene	7.1E-02	3.1E-01	1	7.7E-02	3.4E-01
Benzo(g,h,i)perylene	8.4E-02	3.0E-01	1	4.4E-02	1.6E-01
Benzo(k)fluoranthene	3.6E-02	1.8E-01	1	3.2E-02	1.6E-01
Chrysene	5.9E-02	2.4E-01	2	1.1E-01	4.5E-01
Dibenz(a,h)anthracene	2.6E-02	1.0E-01	1	2.6E-02	1.0E-01
Fluoranthene	9.0E-02	4.3E-01	1	8.2E-02	3.9E-01
Fluorene	1.7E-01	6.9E-01	4	6.6E-01	2.7E+00
Indeno(1,2,3-cd)pyrene	3.2E-02	1.7E-01	1	2.7E-02	1.4E-01
Naphthalene	6.3E-02	1.6E-01	1	6.3E-02	1.6E-01
Perylene	4.0E-02	1.8E-01	1	4.0E-02	1.8E-01
Phenanthrene	4.4E-01	1.9E+00	2	8.1E-01	3.4E+00
Pyrene	8.9E-02	3.7E-01	3	2.6E-01	1.1E+00
Total Petroleum Hydrocarbons					
C08-C11(Gasoline Range)	9.7E+00	2.2E+01	1	9.7E+00	2.2E+01
C11-C14(Kerosene Range)	1.1E+01	2.2E+01	1	1.1E+01	2.2E+01
C14-C20(Diesel Range)	6.5E+01	2.6E+02	1	6.5E+01	2.6E+02

Exposure Point Values for Earthworms
Old Conservation Yard RFI Site

Chemical	Soil EPC		BAF	Earthworm EPV	
	CTE (mg/kg)	RME (mg/kg)	(unitless)	CTE (mg/kg)	RME (mg/kg)
C20-C30(Lubricant Oil Range)	2.9E+02	1.4E+03	1	2.9E+02	1.4E+03
PCDD/PCDFs					
2,3,7,8-TCDD	1.0E-06	1.8E-06	1	1.0E-06	1.8E-06
1,2,3,7,8-PeCDD	6.6E-06	5.2E-05	1	5.8E-06	4.6E-05
1,2,3,4,7,8-HxCDD	1.4E-05	5.3E-05	1	1.1E-05	4.1E-05
1,2,3,6,7,8-HxCDD	2.0E-05	1.0E-04	1	1.5E-05	7.9E-05
1,2,3,7,8,9-HxCDD	1.8E-05	8.6E-05	1	1.7E-05	8.1E-05
1,2,3,4,6,7,8-HpCDD	4.9E-04	2.9E-03	1	2.7E-04	1.6E-03
OCDD	3.7E-03	8.2E-03	0	1.7E-03	3.9E-03
2,3,7,8-TCDF	2.2E-06	1.0E-05	1	2.2E-06	1.0E-05
1,2,3,7,8-PeCDF	1.8E-06	9.5E-06	0	7.8E-07	4.0E-06
2,3,4,7,8-PeCDF	5.1E-06	3.0E-05	1	2.6E-06	1.5E-05
1,2,3,4,7,8-HxCDF	1.3E-05	6.2E-05	1	8.4E-06	4.1E-05
1,2,3,6,7,8-HxCDF	4.9E-06	1.0E-05	0	1.3E-06	2.6E-06
2,3,4,6,7,8-HxCDF	5.2E-06	2.9E-05	1	2.9E-06	1.6E-05
1,2,3,7,8,9-HxCDF	2.3E-06	1.0E-05	1	2.3E-06	1.0E-05
1,2,3,4,6,7,8-HpCDF	5.5E-05	1.2E-04	1	3.0E-05	6.3E-05
1,2,3,4,7,8,9-HpCDF	7.2E-06	3.0E-05	1	7.2E-06	3.0E-05
OCDF	1.8E-04	4.1E-04	1	9.1E-05	2.1E-04
PCBs					
Aroclor-1248	5.0E+02	5.5E+03	1	5.0E+02	5.5E+03
Aroclor-1254	1.2E+00	5.4E+00	1	1.2E+00	5.4E+00
Aroclor-1260	1.3E+01	1.4E+02	1	1.3E+01	1.4E+02
PCB-105	1.1E-03	1.2E-02	10	1.2E-02	1.2E-01
PCB-114	2.1E-05	2.1E-04	27	5.5E-04	5.6E-03
PCB-118	2.2E-03	2.4E-02	11	2.6E-02	2.7E-01
PCB-123	3.1E-05	3.3E-04	13	4.0E-04	4.2E-03
PCB-126	8.6E-05	9.2E-04	5	4.6E-04	4.9E-03
PCB-156	7.4E-04	7.9E-03	6	4.3E-03	4.6E-02
PCB-157	3.3E-04	3.5E-03	6	1.9E-03	2.1E-02
PCB-167	5.7E-04	6.1E-03	6	3.4E-03	3.6E-02
PCB-169	8.5E-06	9.2E-05	1	8.5E-06	9.2E-05
PCB-189	8.5E-05	9.2E-04	2	2.0E-04	2.2E-03
PCB-77	1.7E-04	1.8E-03	6	1.1E-03	1.1E-02
PCB-81	3.1E-05	3.2E-04	6	1.8E-04	1.9E-03

Notes:
EPC - exposure point concentration (based on 0 to 2 feet bgs data) as presented in Spreadsheet C2-90.
EPV - exposure point value
BAF - bioaccumulation factor approximates the 75th percentile of BAFs measured at SSFL;
if no BAF was available a default of 1 is used.
CTE - central tendancy exposure
RME - reasonable maximum exposure
NC - not selected as a CPEC in the indicated media, per the SRAM (MWH 2005).
CPEC - chemical of potential ecological concern
VOC - volatile organic compound
SVOC - semi-volatile organic compounds
PCB - polychlorinated biphenyls
mg/kg - milligram per kilogram

Ecological Concentration-Toxicity Screen
for Determination of Applicable Soil Depth [a]
Old Conservation Yard RFI Site

Chemical	Mammalian ESL (mg/kg)	Concentration-Toxicity Screen Values: Soil 0 to 2 feet bgs Normal (mg/kg)	Soil 0 to 4 feet bgs Normal (mg/kg)	Soil 0 to 6 feet bgs Normal (mg/kg)
Inorganic Compounds				
Antimony	9.5E-02	5.7E+01	5.6E+01	8.0E+01
Barium	1.5E+01	5.7E+00	6.1E+00	6.1E+00
Boron	9.2E+00	5.7E-01	5.6E-01	5.6E-01
Cadmium	2.1E-02	4.8E+01	3.9E+01	4.3E+01
Copper	2.1E+00	-	-	8.3E+00
Lead	2.8E+00	7.4E+00	6.9E+00	1.1E+01
Mercury	2.9E+00	1.1E+00	1.1E+00	9.9E-01
Silver	5.4E-01	3.3E+00	3.2E+00	3.8E+00
Thallium	2.9E+00	5.9E-01	5.9E-01	5.9E-01
Zinc	2.1E+01	3.6E+00	3.5E+00	6.2E+00
VOCs				
1,1,1-Trichloroethane	4.3E+03	1.3E-06	1.3E-06	3.2E-06
1,1,2-Trichloro-1,2,2-trifluoroethane	2.1E+02	9.7E-05	9.7E-05	2.6E-04
1,1-Dichloroethene	2.9E-01	1.9E-02	1.9E-02	4.6E-02
2-Butanone	7.6E+03	1.5E-06	5.0E-06	1.5E-06
Acetone	4.3E+01	8.2E-02	7.3E-02	6.3E-02
Benzene	4.3E+00	5.8E-04	5.3E-04	4.8E-04
Ethylbenzene	2.1E+02	1.2E-05	1.1E-05	9.9E-06
m,p-Xylene	1.3E+02	5.6E-05	5.1E-05	4.7E-05
Methylene chloride	2.5E+01	9.8E-03	8.7E-03	7.7E-03
o-Xylene	1.3E+02	1.3E-05	1.2E-05	1.1E-05
p-Isopropyltoluene	1.3E+02	1.5E-05	1.5E-05	1.5E-05
Toluene	2.5E+00	1.4E-03	1.3E-03	1.2E-03
Trichloroethene	3.0E+00	1.8E-03	1.8E-03	4.5E-03
Xylenes (total)	1.3E+02	7.8E-05	7.1E-05	6.4E-05
SVOCs				
1-Methylnaphthalene	2.1E+02	6.2E-05	6.2E-05	6.2E-05
2,4-Dinitrophenol	1.2E+01	8.7E-02	8.7E-01	8.7E-01
2-Methylnaphthalene	2.1E+02	2.6E-03	1.8E-03	1.6E-03
Acenaphthene	2.7E+02	2.6E-03	2.4E-03	2.1E-03
Acenaphthylene	7.5E+02	1.9E-04	1.8E-04	1.6E-04
Anthracene	1.4E+03	3.3E-04	3.2E-04	2.8E-04
Benzo(a)anthracene	1.4E+00	1.3E-01	1.2E-01	1.0E-01
Benzo(a)pyrene	5.6E+00	3.1E-02	2.8E-02	2.6E-02
Benzo(b)fluoranthene	4.4E+00	4.5E-02	4.1E-02	3.7E-02
Benzo(e)pyrene	NA	-	-	-
Benzo(g,h,i)perylene	6.4E+00	4.7E-02	4.5E-02	4.1E-02
Benzo(k)fluoranthene	5.8E+00	3.0E-02	2.7E-02	4.4E-02
Chrysene	2.4E+00	1.0E-01	9.2E-02	8.3E-02
Dibenz(a,h)anthracene	5.6E+00	1.9E-02	1.9E-02	1.9E-02
Fluoranthene	1.2E+02	3.5E-03	3.2E-03	2.8E-03
Fluorene	1.5E+02	4.7E-03	4.4E-03	3.9E-03
Indeno(1,2,3-cd)pyrene	5.8E+00	2.8E-02	2.6E-02	2.3E-02
Naphthalene	2.1E+02	7.3E-04	6.7E-04	6.2E-04
Perylene	NA	-	-	-
Phenanthrene	6.2E+01	3.0E-02	2.7E-02	2.4E-02
Pyrene	7.6E+01	4.9E-03	4.5E-03	4.0E-03
Total Petroleum Hydrocarbons				
C08-C11(Gasoline Range)	NA	-	-	-

Ecological Concentration-Toxicity Screen
for Determination of Applicable Soil Depth [a]
Old Conservation Yard RFI Site

Chemical	Mammalian ESL (mg/kg)	Concentration-Toxicity Screen Values		
		Soil 0 to 2 feet bgs Normal (mg/kg)	Soil 0 to 4 feet bgs Normal (mg/kg)	Soil 0 to 6 feet bgs Normal (mg/kg)
C11-C14(Kerosene Range)	NA	-	-	-
C14-C20(Diesel Range)	NA	-	-	-
C20-C30(Lubricant Oil Range)	NA	-	-	-
Dioxins				
2,3,7,8-TCDD	4.3E-06	4.1E-01	4.8E-01	5.4E-01
1,2,3,7,8-PeCDD	4.4E-06	1.2E+01	7.7E+00	3.8E+00
1,2,3,4,7,8-HxCDD	4.5E-05	1.2E+00	1.6E+00	1.6E+00
1,2,3,6,7,8-HxCDD	1.1E-04	9.7E-01	1.1E+00	4.3E-01
1,2,3,7,8,9-HxCDD	4.3E-05	2.0E+00	2.5E+00	1.1E+00
1,2,3,4,6,7,8-HpCDD	9.6E-04	3.0E+00	1.3E+00	3.2E+00
OCDD	1.2E-01	7.1E-02	6.5E-02	6.4E-02
2,3,7,8-TCDF	4.3E-05	2.4E-01	2.4E-01	2.4E-01
1,2,3,7,8-PeCDF	1.0E-04	9.4E-02	3.7E-02	4.4E-02
2,3,4,7,8-PeCDF	9.8E-06	3.0E+00	1.1E+00	1.2E+00
1,2,3,4,7,8-HxCDF	4.7E-05	1.3E+00	7.9E-01	2.5E+00
1,2,3,6,7,8-HxCDF	5.4E-05	1.9E-01	1.9E-01	2.0E-01
2,3,4,6,7,8-HxCDF	4.9E-05	5.9E-01	6.2E-01	6.2E-01
1,2,3,7,8,9-HxCDF	4.3E-05	2.4E-01	1.4E-01	3.4E-01
1,2,3,4,6,7,8-HpCDF	1.1E-03	1.0E-01	9.8E-02	9.6E-02
1,2,3,4,7,8,9-HpCDF	4.3E-04	7.1E-02	8.0E-02	7.0E-02
OCDF	9.7E-02	4.2E-03	3.9E-03	3.5E-03
PCBs				
Aroclor-1248	6.0E-02	9.1E+04	8.6E+04	7.4E+04
Aroclor-1254	2.9E-01	1.9E+01	1.9E+01	1.9E+01
Aroclor-1260	2.9E-01	5.0E+02	3.1E+02	2.7E+02
PCB-105	8.5E-03	1.4E+00	8.6E-01	7.5E-01
PCB-114	8.8E-04	2.4E-01	1.5E-01	1.3E-01
PCB-118	8.2E-03	2.9E+00	1.8E+00	1.6E+00
PCB-123	7.5E-03	4.5E-02	2.8E-02	2.4E-02
PCB-126	1.4E-05	6.4E+01	4.0E+01	3.4E+01
PCB-156	2.6E-03	3.0E+00	1.9E+00	1.6E+00
PCB-157	2.5E-03	1.4E+00	8.7E-01	7.5E-01
PCB-167	1.2E-01	5.0E-02	3.1E-02	2.7E-02
PCB-169	4.3E-04	2.1E-01	1.3E-01	1.2E-01
PCB-189	2.0E-02	4.5E-02	2.8E-02	2.4E-02
PCB-77	1.3E-02	1.4E-01	8.9E-02	7.7E-02
PCB-81	1.2E-02	2.8E-02	1.7E-02	1.5E-02
Total Depth-Specific Concentration-Toxicity Screen Value		9.2E+04	8.7E+04	7.5E+04

Notes:

a. Ecological concentration-toxicity screen value
= RME soil concentration / mammalian ecological screening level.
Concentration-toxicity screen values are for comparative purposes only and are not an indication of risk.

VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyls
ESL - ecological screening level
RME - reasonable maximum exposure
NC - Not Calculated
"-" not applicable
mg/kg - milligram per kilogram
bgs - below ground surface

TPH to Petroleum Constituent Extrapolation for Soil (0-6 feet bgs) [a]
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
C08-C11 (Gasoline Range)	MJ110	1.40E+02	7.0E+01	U		-	-
C11-C14 (Kerosene Range)	MJ110	1.40E+02	7.0E+01	U		-	-
C14-C20 (Diesel Range)	MJ110	9.20E+01	9.2E+01	J		-	-
C20-C30 (Lubricant Oil Range)	MJ110	6.70E+02	6.7E+02			-	-
C11-C30	MJ110	-	8.3E+02	-		-	-
Benzene	MJ110	-	-	-	1.2E-04	8.4E-03	8.4E-03
Ethylbenzene	MJ110	-	-	-	1.2E-04	8.4E-03	8.4E-03
Toluene	MJ110	-	-	-	1.2E-04	8.4E-03	8.4E-03
m,p-Xylene	MJ110	-	-	-	3.6E-04	2.5E-02	2.5E-02
o-Xylene	MJ110	-	-	-	8.0E-05	5.6E-03	5.6E-03
Xylene (total)	MJ110	-	-	-	4.4E-04	3.1E-02	3.1E-02
2-Methylnaphthalene	MJ110	6.48E-03	3.2E-03	UJ	2.8E-02	1.9E+00	3.2E-03
Acenaphthene	MJ110	1.96E-03	9.8E-04	U	5.7E-04	4.8E-01	9.8E-04
Acenaphthylene	MJ110	1.96E-03	9.8E-04	U	7.0E-05	5.8E-02	9.8E-04
Anthracene	MJ110	1.96E-03	9.8E-04	UJ	3.7E-04	3.1E-01	9.8E-04
Benzo(a)anthracene	MJ110	1.96E-03	9.8E-04	U	2.7E-05	2.2E-02	9.8E-04
Benzo(a)pyrene	MJ110	1.96E-03	9.8E-04	U	2.7E-05	2.3E-02	9.8E-04
Benzo(b)fluoranthene	MJ110	1.96E-03	9.8E-04	U	4.3E-05	3.6E-02	9.8E-04
Benzo(e)pyrene	MJ110	1.72E-01	1.7E-01		2.1E-04	1.7E-01	1.7E-01
Benzo(g,h,i)perylene	MJ110	1.84E-01	1.8E-01		2.2E-04	1.8E-01	1.8E-01
Benzo(k)fluoranthene	MJ110	4.63E-03	4.6E-03		2.1E-05	1.7E-02	4.6E-03
Chrysene	MJ110	2.01E-02	2.0E-02		5.9E-05	4.9E-02	2.0E-02
Dibenz(a,h)anthracene	MJ110	9.21E-03	9.2E-03		1.1E-05	9.2E-03	9.2E-03
Fluoranthene	MJ110	5.60E-03	5.6E-03		7.5E-05	6.2E-02	5.6E-03
Fluorene	MJ110	4.28E-03	2.1E-03	UJ	5.7E-04	4.7E-01	2.1E-03
Indeno(1,2,3-cd)pyrene	MJ110	1.23E-02	1.2E-02		2.4E-05	2.0E-02	1.2E-02
Naphthalene	MJ110	1.08E-02	5.4E-03	UJ	6.9E-03	4.9E-01	5.4E-03
Perylene	MJ110	9.81E-02	9.8E-02		1.2E-04	9.8E-02	9.8E-02
Phenanthrene	MJ110	9.11E-03	9.1E-03	J	1.5E-03	1.3E+00	9.1E-03
Pyrene	MJ110	5.87E-03	5.9E-03		1.4E-04	1.1E-01	5.9E-03
C08-C11 (Gasoline Range)	OLDCONS1	1.00E-01	5.0E-02	U		-	-
C11-C14 (Kerosene Range)	OLDCONS1	1.00E-01	5.0E-02	U		-	-
C14-C20 (Diesel Range)	OLDCONS1	6.40E+01	6.4E+01			-	-
C20-C30 (Lubricant Oil Range)	OLDCONS1	1.00E-01	5.0E-02	U		-	-
C11-C30	OLDCONS1	-	6.4E+01	-		-	-
Benzene	OLDCONS1	5.00E-03	2.5E-03	U	1.2E-04	6.0E-06	6.0E-06
Ethylbenzene	OLDCONS1	5.00E-03	2.5E-03	U	1.2E-04	6.0E-06	6.0E-06
Toluene	OLDCONS1	3.00E-03	3.0E-03	J	1.2E-04	6.0E-06	3.0E-03
m,p-Xylene	OLDCONS1	-	-	-	3.6E-04	1.8E-05	1.8E-05
o-Xylene	OLDCONS1	-	-	-	8.0E-05	4.0E-06	4.0E-06
Xylene (total)	OLDCONS1	5.00E-03	2.5E-03	U	4.4E-04	2.2E-05	2.2E-05
2-Methylnaphthalene	OLDCONS1	3.00E-01	1.5E-01	U	2.8E-02	1.4E-03	1.4E-03
Acenaphthene	OLDCONS1	3.00E-01	1.5E-01	U	5.7E-04	3.7E-02	3.7E-02
Acenaphthylene	OLDCONS1	3.00E-01	1.5E-01	U	7.0E-05	4.5E-03	4.5E-03
Anthracene	OLDCONS1	3.00E-01	1.5E-01	U	3.7E-04	2.4E-02	2.4E-02
Benzo(a)anthracene	OLDCONS1	3.00E-01	1.5E-01	U	2.7E-05	1.7E-03	1.7E-03
Benzo(a)pyrene	OLDCONS1	3.00E-01	1.5E-01	U	2.7E-05	1.7E-03	1.7E-03
Benzo(b)fluoranthene	OLDCONS1	3.00E-01	1.5E-01	U	4.3E-05	2.8E-03	2.8E-03
Benzo(e)pyrene	OLDCONS1	-	-	-	2.1E-04	1.3E-02	1.3E-02
Benzo(g,h,i)perylene	OLDCONS1	3.00E-01	1.5E-01	U	2.2E-04	1.4E-02	1.4E-02
Benzo(k)fluoranthene	OLDCONS1	3.00E-01	1.5E-01	U	2.1E-05	1.3E-03	1.3E-03
Chrysene	OLDCONS1	5.00E-01	5.0E-01		5.9E-05	3.8E-03	5.0E-01
Dibenz(a,h)anthracene	OLDCONS1	3.00E-01	1.5E-01	U	1.1E-05	7.1E-04	7.1E-04
Fluoranthene	OLDCONS1	2.10E+00	2.1E+00		7.5E-05	4.8E-03	2.1E+00
Fluorene	OLDCONS1	3.00E-01	1.5E-01	U	5.7E-04	3.6E-02	3.6E-02
Indeno(1,2,3-cd)pyrene	OLDCONS1	3.00E-01	1.5E-01	U	2.4E-05	1.5E-03	1.5E-03

TPH to Petroleum Constituent Extrapolation for Soil (0-6 feet bgs) [a]
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Naphthalene	OLDCONS1	3.00E-01	1.5E-01	U	6.9E-03	3.5E-04	3.5E-04
Perylene	OLDCONS1	-	-	-	1.2E-04	7.6E-03	7.6E-03
Phenanthrene	OLDCONS1	1.60E+00	1.6E+00		1.5E-03	9.8E-02	1.6E+00
Pyrene	OLDCONS1	1.00E+00	1.0E+00		1.4E-04	8.7E-03	1.0E+00
C08-C11 (Gasoline Range)	OLDCONS2	1.00E-01	5.0E-02	U		-	-
C11-C14 (Kerosene Range)	OLDCONS2	1.00E-01	5.0E-02	U		-	-
C14-C20 (Diesel Range)	OLDCONS2	4.00E+00	4.0E+00			-	-
C20-C30 (Lubricant Oil Range)	OLDCONS2	-	-	-		-	-
C11-C30	OLDCONS2	-	4.1E+00	-		-	-
Benzene	OLDCONS2	5.00E-03	2.5E-03	U	1.2E-04	6.0E-06	6.0E-06
Ethylbenzene	OLDCONS2	5.00E-03	2.5E-03	U	1.2E-04	6.0E-06	6.0E-06
Toluene	OLDCONS2	7.00E-03	7.0E-03	J	1.2E-04	6.0E-06	7.0E-03
m,p-Xylene	OLDCONS2	-	-	-	3.6E-04	1.8E-05	1.8E-05
o-Xylene	OLDCONS2	-	-	-	8.0E-05	4.0E-06	4.0E-06
Xylene (total)	OLDCONS2	1.30E-02	1.3E-02		4.4E-04	2.2E-05	1.3E-02
2-Methylnaphthalene	OLDCONS2	3.00E-01	1.5E-01	U	2.8E-02	1.4E-03	1.4E-03
Acenaphthene	OLDCONS2	3.00E-01	1.5E-01	U	5.7E-04	2.3E-03	2.3E-03
Acenaphthylene	OLDCONS2	3.00E-01	1.5E-01	U	7.0E-05	2.8E-04	2.8E-04
Anthracene	OLDCONS2	3.00E-01	1.5E-01	U	3.7E-04	1.5E-03	1.5E-03
Benzo(a)anthracene	OLDCONS2	3.00E-01	1.5E-01	U	2.7E-05	1.1E-04	1.1E-04
Benzo(a)pyrene	OLDCONS2	3.00E-01	1.5E-01	U	2.7E-05	1.1E-04	1.1E-04
Benzo(b)fluoranthene	OLDCONS2	3.00E-01	1.5E-01	U	4.3E-05	1.8E-04	1.8E-04
Benzo(e)pyrene	OLDCONS2	-	-	-	2.1E-04	8.4E-04	8.4E-04
Benzo(g,h,i)perylene	OLDCONS2	3.00E-01	1.5E-01	U	2.2E-04	9.0E-04	9.0E-04
Benzo(k)fluoranthene	OLDCONS2	3.00E-01	1.5E-01	U	2.1E-05	8.3E-05	8.3E-05
Chrysene	OLDCONS2	3.00E-01	1.5E-01	U	5.9E-05	2.4E-04	2.4E-04
Dibenz(a,h)anthracene	OLDCONS2	3.00E-01	1.5E-01	U	1.1E-05	4.5E-05	4.5E-05
Fluoranthene	OLDCONS2	3.00E-01	1.5E-01	U	7.5E-05	3.0E-04	3.0E-04
Fluorene	OLDCONS2	3.00E-01	1.5E-01	U	5.7E-04	2.3E-03	2.3E-03
Indeno(1,2,3-cd)pyrene	OLDCONS2	3.00E-01	1.5E-01	U	2.4E-05	9.7E-05	9.7E-05
Naphthalene	OLDCONS2	3.00E-01	1.5E-01	U	6.9E-03	3.5E-04	3.5E-04
Perylene	OLDCONS2	-	-	-	1.2E-04	4.8E-04	4.8E-04
Phenanthrene	OLDCONS2	3.00E-01	1.5E-01	U	1.5E-03	6.2E-03	6.2E-03
Pyrene	OLDCONS2	3.00E-01	1.5E-01	U	1.4E-04	5.5E-04	5.5E-04
C08-C11 (Gasoline Range)	OLDCONS3	1.00E-01	5.0E-02	U		-	-
C11-C14 (Kerosene Range)	OLDCONS3	1.00E-01	5.0E-02	U		-	-
C14-C20 (Diesel Range)	OLDCONS3	1.00E-01	5.0E-02	U		-	-
C20-C30 (Lubricant Oil Range)	OLDCONS3	4.00E+03	4.0E+03			-	-
C11-C30	OLDCONS3	-	4.0E+03	-		-	-
Benzene	OLDCONS3	5.00E-03	2.5E-03	U	1.2E-04	6.0E-06	6.0E-06
Ethylbenzene	OLDCONS3	5.00E-03	2.5E-03	U	1.2E-04	6.0E-06	6.0E-06
Toluene	OLDCONS3	5.00E-03	2.5E-03	U	1.2E-04	6.0E-06	6.0E-06
m,p-Xylene	OLDCONS3	-	-	-	3.6E-04	1.8E-05	1.8E-05
o-Xylene	OLDCONS3	-	-	-	8.0E-05	4.0E-06	4.0E-06
Xylene (total)	OLDCONS3	6.00E-03	6.0E-03		4.4E-04	2.2E-05	6.0E-03
2-Methylnaphthalene	OLDCONS3	3.00E+00	1.5E+00	U	2.8E-02	1.4E-03	1.4E-03
Acenaphthene	OLDCONS3	3.00E+00	1.5E+00	U	5.7E-04	2.3E+00	1.5E+00
Acenaphthylene	OLDCONS3	3.00E+00	1.5E+00	U	7.0E-05	2.8E-01	2.8E-01
Anthracene	OLDCONS3	3.00E+00	1.5E+00	U	3.7E-04	1.5E+00	1.5E+00
Benzo(a)anthracene	OLDCONS3	3.00E+00	1.5E+00	U	2.7E-05	1.1E-01	1.1E-01
Benzo(a)pyrene	OLDCONS3	3.00E+00	1.5E+00	U	2.7E-05	1.1E-01	1.1E-01
Benzo(b)fluoranthene	OLDCONS3	3.00E+00	1.5E+00	U	4.3E-05	1.7E-01	1.7E-01
Benzo(e)pyrene	OLDCONS3	-	-	-	2.1E-04	8.3E-01	8.3E-01
Benzo(g,h,i)perylene	OLDCONS3	3.00E+00	1.5E+00	U	2.2E-04	8.8E-01	8.8E-01
Benzo(k)fluoranthene	OLDCONS3	3.00E+00	1.5E+00	U	2.1E-05	8.2E-02	8.2E-02
Chrysene	OLDCONS3	3.00E+00	1.5E+00	U	5.9E-05	2.3E-01	2.3E-01

TPH to Petroleum Constituent Extrapolation for Soil (0-6 feet bgs) [a]
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Dibenz(a,h)anthracene	OLDCONS3	3.00E+00	1.5E+00	U	1.1E-05	4.4E-02	4.4E-02
Fluoranthene	OLDCONS3	3.00E+00	1.5E+00	U	7.5E-05	3.0E-01	3.0E-01
Fluorene	OLDCONS3	3.00E+00	1.5E+00	U	5.7E-04	2.3E+00	1.5E+00
Indeno(1,2,3-cd)pyrene	OLDCONS3	3.00E+00	1.5E+00	U	2.4E-05	9.6E-02	9.6E-02
Naphthalene	OLDCONS3	3.00E+00	1.5E+00	U	6.9E-03	3.5E-04	3.5E-04
Perylene	OLDCONS3	-	-	-	1.2E-04	4.7E-01	4.7E-01
Phenanthrene	OLDCONS3	3.00E+00	1.5E+00	U	1.5E-03	6.1E+00	1.5E+00
Pyrene	OLDCONS3	3.00E+00	1.5E+00	U	1.4E-04	5.5E-01	5.5E-01
C08-C11 (Gasoline Range)	OLDCONS4	1.00E-01	5.0E-02	U		-	-
C11-C14 (Kerosene Range)	OLDCONS4	1.00E-01	5.0E-02	U		-	-
C14-C20 (Diesel Range)	OLDCONS4	2.00E+00	2.0E+00			-	-
C20-C30 (Lubricant Oil Range)	OLDCONS4	-	-			-	-
C11-C30	OLDCONS4	-	2.1E+00	-		-	-
Benzene	OLDCONS4	5.00E-03	2.5E-03	U	1.2E-04	6.0E-06	6.0E-06
Ethylbenzene	OLDCONS4	5.00E-03	2.5E-03	U	1.2E-04	6.0E-06	6.0E-06
Toluene	OLDCONS4	5.00E-03	2.5E-03	U	1.2E-04	6.0E-06	6.0E-06
m,p-Xylene	OLDCONS4	-	-	-	3.6E-04	1.8E-05	1.8E-05
o-Xylene	OLDCONS4	-	-	-	8.0E-05	4.0E-06	4.0E-06
Xylene (total)	OLDCONS4	5.00E-03	2.5E-03	U	4.4E-04	2.2E-05	2.2E-05
2-Methylnaphthalene	OLDCONS4	2.00E-02	1.0E-02	U	2.8E-02	1.4E-03	1.4E-03
Acenaphthene	OLDCONS4	3.00E-02	1.5E-02	U	5.7E-04	1.2E-03	1.2E-03
Acenaphthylene	OLDCONS4	3.00E-02	1.5E-02	U	7.0E-05	1.4E-04	1.4E-04
Anthracene	OLDCONS4	3.00E-02	1.5E-02	U	3.7E-04	7.7E-04	7.7E-04
Benzo(a)anthracene	OLDCONS4	3.00E-02	1.5E-02	U	2.7E-05	5.5E-05	5.5E-05
Benzo(a)pyrene	OLDCONS4	3.00E-02	1.5E-02	U	2.7E-05	5.6E-05	5.6E-05
Benzo(b)fluoranthene	OLDCONS4	3.00E-02	1.5E-02	U	4.3E-05	8.9E-05	8.9E-05
Benzo(e)pyrene	OLDCONS4	-	-	-	2.1E-04	4.2E-04	4.2E-04
Benzo(g,h,i)perylene	OLDCONS4	3.00E-02	1.5E-02	U	2.2E-04	4.5E-04	4.5E-04
Benzo(k)fluoranthene	OLDCONS4	3.00E-02	1.5E-02	U	2.1E-05	4.2E-05	4.2E-05
Chrysene	OLDCONS4	3.00E-02	1.5E-02	U	5.9E-05	1.2E-04	1.2E-04
Dibenz(a,h)anthracene	OLDCONS4	3.00E-02	1.5E-02	U	1.1E-05	2.3E-05	2.3E-05
Fluoranthene	OLDCONS4	3.00E-02	1.5E-02	U	7.5E-05	1.5E-04	1.5E-04
Fluorene	OLDCONS4	3.00E-02	1.5E-02	U	5.7E-04	1.2E-03	1.2E-03
Indeno(1,2,3-cd)pyrene	OLDCONS4	3.00E-02	1.5E-02	U	2.4E-05	4.9E-05	4.9E-05
Naphthalene	OLDCONS4	2.00E-02	1.0E-02	U	6.9E-03	3.5E-04	3.5E-04
Perylene	OLDCONS4	-	-	-	1.2E-04	2.4E-04	2.4E-04
Phenanthrene	OLDCONS4	3.00E-02	1.5E-02	U	1.5E-03	3.1E-03	3.1E-03
Pyrene	OLDCONS4	3.00E-02	1.5E-02	U	1.4E-04	2.8E-04	2.8E-04
C08-C11 (Gasoline Range)	OLDCONS5	1.00E-01	5.0E-02	U		-	-
C11-C14 (Kerosene Range)	OLDCONS5	1.00E-01	5.0E-02	U		-	-
C14-C20 (Diesel Range)	OLDCONS5	3.00E-01	3.0E-01			-	-
C20-C30 (Lubricant Oil Range)	OLDCONS5	-	-			-	-
C11-C30	OLDCONS5	-	3.5E-01	-		-	-
Benzene	OLDCONS5	5.00E-03	2.5E-03	U	1.2E-04	6.0E-06	6.0E-06
Ethylbenzene	OLDCONS5	5.00E-03	2.5E-03	U	1.2E-04	6.0E-06	6.0E-06
Toluene	OLDCONS5	1.40E-02	1.4E-02	J	1.2E-04	6.0E-06	1.4E-02
m,p-Xylene	OLDCONS5	-	-	-	3.6E-04	1.8E-05	1.8E-05
o-Xylene	OLDCONS5	-	-	-	8.0E-05	4.0E-06	4.0E-06
Xylene (total)	OLDCONS5	1.00E-02	1.0E-02		4.4E-04	2.2E-05	1.0E-02
2-Methylnaphthalene	OLDCONS5	3.00E-01	1.5E-01	U	2.8E-02	1.4E-03	1.4E-03
Acenaphthene	OLDCONS5	3.00E-01	1.5E-01	U	5.7E-04	2.0E-04	2.0E-04
Acenaphthylene	OLDCONS5	3.00E-01	1.5E-01	U	7.0E-05	2.5E-05	2.5E-05
Anthracene	OLDCONS5	3.00E-01	1.5E-01	U	3.7E-04	1.3E-04	1.3E-04
Benzo(a)anthracene	OLDCONS5	3.00E-01	1.5E-01	U	2.7E-05	9.4E-06	9.4E-06
Benzo(a)pyrene	OLDCONS5	3.00E-01	1.5E-01	U	2.7E-05	9.5E-06	9.5E-06
Benzo(b)fluoranthene	OLDCONS5	3.00E-01	1.5E-01	U	4.3E-05	1.5E-05	1.5E-05

TPH to Petroleum Constituent Extrapolation for Soil (0-6 feet bgs) [a]
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Benzo(e)pyrene	OLDCONS5	-	-	-	2.1E-04	7.2E-05	7.2E-05
Benzo(g,h,i)perylene	OLDCONS5	3.00E-01	1.5E-01	U	2.2E-04	7.7E-05	7.7E-05
Benzo(k)fluoranthene	OLDCONS5	3.00E-01	1.5E-01	U	2.1E-05	7.2E-06	7.2E-06
Chrysene	OLDCONS5	3.00E-01	1.5E-01	U	5.9E-05	2.1E-05	2.1E-05
Dibenz(a,h)anthracene	OLDCONS5	3.00E-01	1.5E-01	U	1.1E-05	3.9E-06	3.9E-06
Fluoranthene	OLDCONS5	3.00E-01	1.5E-01	U	7.5E-05	2.6E-05	2.6E-05
Fluorene	OLDCONS5	3.00E-01	1.5E-01	U	5.7E-04	2.0E-04	2.0E-04
Indeno(1,2,3-cd)pyrene	OLDCONS5	3.00E-01	1.5E-01	U	2.4E-05	8.4E-06	8.4E-06
Naphthalene	OLDCONS5	3.00E-01	1.5E-01	U	6.9E-03	3.5E-04	3.5E-04
Perylene	OLDCONS5	-	-	-	1.2E-04	4.1E-05	4.1E-05
Phenanthrene	OLDCONS5	3.00E-01	1.5E-01	U	1.5E-03	5.4E-04	5.4E-04
Pyrene	OLDCONS5	3.00E-01	1.5E-01	U	1.4E-04	4.8E-05	4.8E-05
C08-C11 (Gasoline Range)	OLDCONS6	1.00E-01	5.0E-02	U		-	-
C11-C14 (Kerosene Range)	OLDCONS6	1.00E-01	5.0E-02	U		-	-
C14-C20 (Diesel Range)	OLDCONS6	1.00E-01	5.0E-02	U		-	-
C20-C30 (Lubricant Oil Range)	OLDCONS6	5.00E+00	5.0E+00			-	-
C11-C30	OLDCONS6	-	5.1E+00	-		-	-
Benzene	OLDCONS6	5.00E-03	2.5E-03	U	1.2E-04	6.0E-06	6.0E-06
Ethylbenzene	OLDCONS6	5.00E-03	2.5E-03	U	1.2E-04	6.0E-06	6.0E-06
Toluene	OLDCONS6	5.00E-03	2.5E-03	U	1.2E-04	6.0E-06	6.0E-06
m,p-Xylene	OLDCONS6	-	-	-	3.6E-04	1.8E-05	1.8E-05
o-Xylene	OLDCONS6	-	-	-	8.0E-05	4.0E-06	4.0E-06
Xylene (total)	OLDCONS6	5.00E-03	2.5E-03	U	4.4E-04	2.2E-05	2.2E-05
2-Methylnaphthalene	OLDCONS6	3.00E-02	1.5E-02	U	2.8E-02	1.4E-03	1.4E-03
Acenaphthene	OLDCONS6	3.00E-02	1.5E-02	U	5.7E-04	2.9E-03	2.9E-03
Acenaphthylene	OLDCONS6	3.00E-02	1.5E-02	U	7.0E-05	3.6E-04	3.6E-04
Anthracene	OLDCONS6	3.00E-02	1.5E-02	U	3.7E-04	1.9E-03	1.9E-03
Benzo(a)anthracene	OLDCONS6	3.00E-02	1.5E-02	U	2.7E-05	1.4E-04	1.4E-04
Benzo(a)pyrene	OLDCONS6	3.00E-02	1.5E-02	U	2.7E-05	1.4E-04	1.4E-04
Benzo(b)fluoranthene	OLDCONS6	3.00E-02	1.5E-02	U	4.3E-05	2.2E-04	2.2E-04
Benzo(e)pyrene	OLDCONS6	-	-	-	2.1E-04	1.1E-03	1.1E-03
Benzo(g,h,i)perylene	OLDCONS6	3.00E-02	1.5E-02	U	2.2E-04	1.1E-03	1.1E-03
Benzo(k)fluoranthene	OLDCONS6	3.00E-02	1.5E-02	U	2.1E-05	1.0E-04	1.0E-04
Chrysene	OLDCONS6	3.00E-02	1.5E-02	U	5.9E-05	3.0E-04	3.0E-04
Dibenz(a,h)anthracene	OLDCONS6	3.00E-02	1.5E-02	U	1.1E-05	5.6E-05	5.6E-05
Fluoranthene	OLDCONS6	3.00E-02	1.5E-02	U	7.5E-05	3.8E-04	3.8E-04
Fluorene	OLDCONS6	3.00E-02	1.5E-02	U	5.7E-04	2.9E-03	2.9E-03
Indeno(1,2,3-cd)pyrene	OLDCONS6	3.00E-02	1.5E-02	U	2.4E-05	1.2E-04	1.2E-04
Naphthalene	OLDCONS6	3.00E-02	1.5E-02	U	6.9E-03	3.5E-04	3.5E-04
Perylene	OLDCONS6	-	-	-	1.2E-04	6.0E-04	6.0E-04
Phenanthrene	OLDCONS6	3.00E-02	1.5E-02	U	1.5E-03	7.8E-03	7.8E-03
Pyrene	OLDCONS6	3.00E-02	1.5E-02	U	1.4E-04	7.0E-04	7.0E-04
C08-C11 (Gasoline Range)	RD033	1.10E+01	5.5E+00	UJ		-	-
C11-C14 (Kerosene Range)	RD033	1.10E+01	5.5E+00	UJ		-	-
C14-C20 (Diesel Range)	RD033	1.10E+01	5.5E+00	UJ		-	-
C20-C30 (Lubricant Oil Range)	RD033	1.10E+01	5.5E+00	UJ		-	-
C11-C30	RD033	-	1.7E+01	-		-	-
Benzene	RD033	1.10E-02	5.5E-03	U	1.2E-04	6.6E-04	6.6E-04
Ethylbenzene	RD033	1.10E-02	5.5E-03	U	1.2E-04	6.6E-04	6.6E-04
Toluene	RD033	1.10E-02	5.5E-03	U	1.2E-04	6.6E-04	6.6E-04
m,p-Xylene	RD033	1.10E-02	5.5E-03	U	3.6E-04	2.0E-03	2.0E-03
o-Xylene	RD033	1.10E-02	5.5E-03	U	8.0E-05	4.4E-04	4.4E-04
Xylene (total)	RD033	-	-	-	4.4E-04	2.4E-03	2.4E-03
2-Methylnaphthalene	RD033	-	-	-	2.8E-02	1.5E-01	1.5E-01
Acenaphthene	RD033	-	-	-	5.7E-04	9.5E-03	9.5E-03
Acenaphthylene	RD033	-	-	-	7.0E-05	1.2E-03	1.2E-03

TPH to Petroleum Constituent Extrapolation for Soil (0-6 feet bgs) [a]
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Anthracene	RD033	-	-	-	3.7E-04	6.2E-03	6.2E-03
Benzo(a)anthracene	RD033	-	-	-	2.7E-05	4.4E-04	4.4E-04
Benzo(a)pyrene	RD033	-	-	-	2.7E-05	4.5E-04	4.5E-04
Benzo(b)fluoranthene	RD033	-	-	-	4.3E-05	7.1E-04	7.1E-04
Benzo(e)pyrene	RD033	-	-	-	2.1E-04	3.4E-03	3.4E-03
Benzo(g,h,i)perylene	RD033	-	-	-	2.2E-04	3.6E-03	3.6E-03
Benzo(k)fluoranthene	RD033	-	-	-	2.1E-05	3.4E-04	3.4E-04
Chrysene	RD033	-	-	-	5.9E-05	9.7E-04	9.7E-04
Dibenz(a,h)anthracene	RD033	-	-	-	1.1E-05	1.8E-04	1.8E-04
Fluoranthene	RD033	-	-	-	7.5E-05	1.2E-03	1.2E-03
Fluorene	RD033	-	-	-	5.7E-04	9.4E-03	9.4E-03
Indeno(1,2,3-cd)pyrene	RD033	-	-	-	2.4E-05	4.0E-04	4.0E-04
Naphthalene	RD033	-	-	-	6.9E-03	3.8E-02	3.8E-02
Perylene	RD033	-	-	-	1.2E-04	1.9E-03	1.9E-03
Phenanthrene	RD033	-	-	-	1.5E-03	2.5E-02	2.5E-02
Pyrene	RD033	-	-	-	1.4E-04	2.2E-03	2.2E-03
C08-C11 (Gasoline Range)	RD035RE	1.10E+01	5.5E+00	UJ		-	-
C11-C14 (Kerosene Range)	RD035RE	1.10E+01	5.5E+00	UJ		-	-
C14-C20 (Diesel Range)	RD035RE	1.10E+01	5.5E+00	UJ		-	-
C20-C30 (Lubricant Oil Range)	RD035RE	1.10E+01	5.5E+00	UJ		-	-
C11-C30	RD035RE	-	1.7E+01	-		-	-
Benzene	RD035RE	6.00E-03	3.0E-03	U	1.2E-04	6.6E-04	6.6E-04
Ethylbenzene	RD035RE	6.00E-03	3.0E-03	U	1.2E-04	6.6E-04	6.6E-04
Toluene	RD035RE	6.00E-03	3.0E-03	U	1.2E-04	6.6E-04	6.6E-04
m,p-Xylene	RD035RE	6.00E-03	3.0E-03	U	3.6E-04	2.0E-03	2.0E-03
o-Xylene	RD035RE	6.00E-03	3.0E-03	U	8.0E-05	4.4E-04	4.4E-04
Xylene (total)	RD035RE	-	-	-	4.4E-04	2.4E-03	2.4E-03
2-Methylnaphthalene	RD035RE	-	-	-	2.8E-02	1.5E-01	1.5E-01
Acenaphthene	RD035RE	-	-	-	5.7E-04	9.5E-03	9.5E-03
Acenaphthylene	RD035RE	-	-	-	7.0E-05	1.2E-03	1.2E-03
Anthracene	RD035RE	-	-	-	3.7E-04	6.2E-03	6.2E-03
Benzo(a)anthracene	RD035RE	-	-	-	2.7E-05	4.4E-04	4.4E-04
Benzo(a)pyrene	RD035RE	-	-	-	2.7E-05	4.5E-04	4.5E-04
Benzo(b)fluoranthene	RD035RE	-	-	-	4.3E-05	7.1E-04	7.1E-04
Benzo(e)pyrene	RD035RE	-	-	-	2.1E-04	3.4E-03	3.4E-03
Benzo(g,h,i)perylene	RD035RE	-	-	-	2.2E-04	3.6E-03	3.6E-03
Benzo(k)fluoranthene	RD035RE	-	-	-	2.1E-05	3.4E-04	3.4E-04
Chrysene	RD035RE	-	-	-	5.9E-05	9.7E-04	9.7E-04
Dibenz(a,h)anthracene	RD035RE	-	-	-	1.1E-05	1.8E-04	1.8E-04
Fluoranthene	RD035RE	-	-	-	7.5E-05	1.2E-03	1.2E-03
Fluorene	RD035RE	-	-	-	5.7E-04	9.4E-03	9.4E-03
Indeno(1,2,3-cd)pyrene	RD035RE	-	-	-	2.4E-05	4.0E-04	4.0E-04
Naphthalene	RD035RE	-	-	-	6.9E-03	3.8E-02	3.8E-02
Perylene	RD035RE	-	-	-	1.2E-04	1.9E-03	1.9E-03
Phenanthrene	RD035RE	-	-	-	1.5E-03	2.5E-02	2.5E-02
Pyrene	RD035RE	-	-	-	1.4E-04	2.2E-03	2.2E-03
C08-C11 (Gasoline Range)	RD037	1.10E+01	5.5E+00	UJ		-	-
C11-C14 (Kerosene Range)	RD037	1.10E+01	5.5E+00	UJ		-	-
C14-C20 (Diesel Range)	RD037	1.10E+01	5.5E+00	UJ		-	-
C20-C30 (Lubricant Oil Range)	RD037	1.10E+01	5.5E+00	UJ		-	-
C11-C30	RD037	-	1.7E+01	-		-	-
Benzene	RD037	6.00E-03	3.0E-03	U	1.2E-04	6.6E-04	6.6E-04
Ethylbenzene	RD037	6.00E-03	3.0E-03	U	1.2E-04	6.6E-04	6.6E-04
Toluene	RD037	6.00E-03	3.0E-03	U	1.2E-04	6.6E-04	6.6E-04
m,p-Xylene	RD037	6.00E-03	3.0E-03	U	3.6E-04	2.0E-03	2.0E-03
o-Xylene	RD037	6.00E-03	3.0E-03	U	8.0E-05	4.4E-04	4.4E-04

TPH to Petroleum Constituent Extrapolation for Soil (0-6 feet bgs) [a]
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Xylene (total)	RD037	-	-	-	4.4E-04	2.4E-03	2.4E-03
2-Methylnaphthalene	RD037	-	-	-	2.8E-02	1.5E-01	1.5E-01
Acenaphthene	RD037	-	-	-	5.7E-04	9.5E-03	9.5E-03
Acenaphthylene	RD037	-	-	-	7.0E-05	1.2E-03	1.2E-03
Anthracene	RD037	-	-	-	3.7E-04	6.2E-03	6.2E-03
Benzo(a)anthracene	RD037	-	-	-	2.7E-05	4.4E-04	4.4E-04
Benzo(a)pyrene	RD037	-	-	-	2.7E-05	4.5E-04	4.5E-04
Benzo(b)fluoranthene	RD037	-	-	-	4.3E-05	7.1E-04	7.1E-04
Benzo(e)pyrene	RD037	-	-	-	2.1E-04	3.4E-03	3.4E-03
Benzo(g,h,i)perylene	RD037	-	-	-	2.2E-04	3.6E-03	3.6E-03
Benzo(k)fluoranthene	RD037	-	-	-	2.1E-05	3.4E-04	3.4E-04
Chrysene	RD037	-	-	-	5.9E-05	9.7E-04	9.7E-04
Dibenz(a,h)anthracene	RD037	-	-	-	1.1E-05	1.8E-04	1.8E-04
Fluoranthene	RD037	-	-	-	7.5E-05	1.2E-03	1.2E-03
Fluorene	RD037	-	-	-	5.7E-04	9.4E-03	9.4E-03
Indeno(1,2,3-cd)pyrene	RD037	-	-	-	2.4E-05	4.0E-04	4.0E-04
Naphthalene	RD037	-	-	-	6.9E-03	3.8E-02	3.8E-02
Perylene	RD037	-	-	-	1.2E-04	1.9E-03	1.9E-03
Phenanthrene	RD037	-	-	-	1.5E-03	2.5E-02	2.5E-02
Pyrene	RD037	-	-	-	1.4E-04	2.2E-03	2.2E-03
C08-C11 (Gasoline Range)	RD038RE	1.10E+01	5.5E+00	UJ		-	-
C11-C14 (Kerosene Range)	RD038RE	1.10E+01	5.5E+00	UJ		-	-
C14-C20 (Diesel Range)	RD038RE	1.10E+01	5.5E+00	UJ		-	-
C20-C30 (Lubricant Oil Range)	RD038RE	1.10E+01	5.5E+00	UJ		-	-
C11-C30	RD038RE	-	1.7E+01	-		-	-
Benzene	RD038RE	6.00E-03	3.0E-03	U	1.2E-04	6.6E-04	6.6E-04
Ethylbenzene	RD038RE	6.00E-03	3.0E-03	U	1.2E-04	6.6E-04	6.6E-04
Toluene	RD038RE	6.00E-03	3.0E-03	U	1.2E-04	6.6E-04	6.6E-04
m,p-Xylene	RD038RE	6.00E-03	3.0E-03	U	3.6E-04	2.0E-03	2.0E-03
o-Xylene	RD038RE	6.00E-03	3.0E-03	U	8.0E-05	4.4E-04	4.4E-04
Xylene (total)	RD038RE	-	-	-	4.4E-04	2.4E-03	2.4E-03
2-Methylnaphthalene	RD038RE	-	-	-	2.8E-02	1.5E-01	1.5E-01
Acenaphthene	RD038RE	-	-	-	5.7E-04	9.5E-03	9.5E-03
Acenaphthylene	RD038RE	-	-	-	7.0E-05	1.2E-03	1.2E-03
Anthracene	RD038RE	-	-	-	3.7E-04	6.2E-03	6.2E-03
Benzo(a)anthracene	RD038RE	-	-	-	2.7E-05	4.4E-04	4.4E-04
Benzo(a)pyrene	RD038RE	-	-	-	2.7E-05	4.5E-04	4.5E-04
Benzo(b)fluoranthene	RD038RE	-	-	-	4.3E-05	7.1E-04	7.1E-04
Benzo(e)pyrene	RD038RE	-	-	-	2.1E-04	3.4E-03	3.4E-03
Benzo(g,h,i)perylene	RD038RE	-	-	-	2.2E-04	3.6E-03	3.6E-03
Benzo(k)fluoranthene	RD038RE	-	-	-	2.1E-05	3.4E-04	3.4E-04
Chrysene	RD038RE	-	-	-	5.9E-05	9.7E-04	9.7E-04
Dibenz(a,h)anthracene	RD038RE	-	-	-	1.1E-05	1.8E-04	1.8E-04
Fluoranthene	RD038RE	-	-	-	7.5E-05	1.2E-03	1.2E-03
Fluorene	RD038RE	-	-	-	5.7E-04	9.4E-03	9.4E-03
Indeno(1,2,3-cd)pyrene	RD038RE	-	-	-	2.4E-05	4.0E-04	4.0E-04
Naphthalene	RD038RE	-	-	-	6.9E-03	3.8E-02	3.8E-02
Perylene	RD038RE	-	-	-	1.2E-04	1.9E-03	1.9E-03
Phenanthrene	RD038RE	-	-	-	1.5E-03	2.5E-02	2.5E-02
Pyrene	RD038RE	-	-	-	1.4E-04	2.2E-03	2.2E-03
C08-C11 (Gasoline Range)	RD063	4.20E+01	4.2E+01	J		-	-
C11-C14 (Kerosene Range)	RD063	1.10E+01	5.5E+00	UJ		-	-
C14-C20 (Diesel Range)	RD063	1.10E+01	5.5E+00	UJ		-	-
C20-C30 (Lubricant Oil Range)	RD063	1.10E+01	5.5E+00	UJ		-	-
C11-C30	RD063	-	1.7E+01	-		-	-
Benzene	RD063	6.00E-03	3.0E-03	U	1.2E-04	5.0E-03	3.0E-03

TPH to Petroleum Constituent Extrapolation for Soil (0-6 feet bgs) [a]
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Ethylbenzene	RD063	6.00E-03	3.0E-03	U	1.2E-04	5.0E-03	3.0E-03
Toluene	RD063	6.00E-03	3.0E-03	U	1.2E-04	5.0E-03	3.0E-03
m,p-Xylene	RD063	6.00E-03	3.0E-03	U	3.6E-04	1.5E-02	3.0E-03
o-Xylene	RD063	6.00E-03	3.0E-03	U	8.0E-05	3.4E-03	3.0E-03
Xylene (total)	RD063	-	-	-	4.4E-04	1.8E-02	1.8E-02
2-Methylnaphthalene	RD063	-	-	-	2.8E-02	1.2E+00	1.2E+00
Acenaphthene	RD063	-	-	-	5.7E-04	9.5E-03	9.5E-03
Acenaphthylene	RD063	-	-	-	7.0E-05	1.2E-03	1.2E-03
Anthracene	RD063	-	-	-	3.7E-04	6.2E-03	6.2E-03
Benzo(a)anthracene	RD063	-	-	-	2.7E-05	4.4E-04	4.4E-04
Benzo(a)pyrene	RD063	-	-	-	2.7E-05	4.5E-04	4.5E-04
Benzo(b)fluoranthene	RD063	-	-	-	4.3E-05	7.1E-04	7.1E-04
Benzo(e)pyrene	RD063	-	-	-	2.1E-04	3.4E-03	3.4E-03
Benzo(g,h,i)perylene	RD063	-	-	-	2.2E-04	3.6E-03	3.6E-03
Benzo(k)fluoranthene	RD063	-	-	-	2.1E-05	3.4E-04	3.4E-04
Chrysene	RD063	-	-	-	5.9E-05	9.7E-04	9.7E-04
Dibenz(a,h)anthracene	RD063	-	-	-	1.1E-05	1.8E-04	1.8E-04
Fluoranthene	RD063	-	-	-	7.5E-05	1.2E-03	1.2E-03
Fluorene	RD063	-	-	-	5.7E-04	9.4E-03	9.4E-03
Indeno(1,2,3-cd)pyrene	RD063	-	-	-	2.4E-05	4.0E-04	4.0E-04
Naphthalene	RD063	-	-	-	6.9E-03	2.9E-01	2.9E-01
Perylene	RD063	-	-	-	1.2E-04	1.9E-03	1.9E-03
Phenanthrene	RD063	-	-	-	1.5E-03	2.5E-02	2.5E-02
Pyrene	RD063	-	-	-	1.4E-04	2.2E-03	2.2E-03
C08-C11 (Gasoline Range)	RD064	1.10E+01	5.5E+00	UJ		-	-
C11-C14 (Kerosene Range)	RD064	1.10E+01	5.5E+00	UJ		-	-
C14-C20 (Diesel Range)	RD064	1.60E+02	1.6E+02	J		-	-
C20-C30 (Lubricant Oil Range)	RD064	8.30E+01	8.3E+01	J		-	-
C11-C30	RD064	-	2.5E+02	-		-	-
Benzene	RD064	2.70E-02	1.4E-02	U	1.2E-04	6.6E-04	6.6E-04
Ethylbenzene	RD064	2.70E-02	1.4E-02	U	1.2E-04	6.6E-04	6.6E-04
Toluene	RD064	2.70E-02	1.4E-02	U	1.2E-04	6.6E-04	6.6E-04
m,p-Xylene	RD064	2.70E-02	1.4E-02	U	3.6E-04	2.0E-03	2.0E-03
o-Xylene	RD064	2.70E-02	1.4E-02	U	8.0E-05	4.4E-04	4.4E-04
Xylene (total)	RD064	-	-	-	4.4E-04	2.4E-03	2.4E-03
2-Methylnaphthalene	RD064	-	-	-	2.8E-02	1.5E-01	1.5E-01
Acenaphthene	RD064	-	-	-	5.7E-04	1.4E-01	1.4E-01
Acenaphthylene	RD064	-	-	-	7.0E-05	1.7E-02	1.7E-02
Anthracene	RD064	-	-	-	3.7E-04	9.3E-02	9.3E-02
Benzo(a)anthracene	RD064	-	-	-	2.7E-05	6.7E-03	6.7E-03
Benzo(a)pyrene	RD064	-	-	-	2.7E-05	6.8E-03	6.8E-03
Benzo(b)fluoranthene	RD064	-	-	-	4.3E-05	1.1E-02	1.1E-02
Benzo(e)pyrene	RD064	-	-	-	2.1E-04	5.1E-02	5.1E-02
Benzo(g,h,i)perylene	RD064	-	-	-	2.2E-04	5.5E-02	5.5E-02
Benzo(k)fluoranthene	RD064	-	-	-	2.1E-05	5.1E-03	5.1E-03
Chrysene	RD064	-	-	-	5.9E-05	1.5E-02	1.5E-02
Dibenz(a,h)anthracene	RD064	-	-	-	1.1E-05	2.8E-03	2.8E-03
Fluoranthene	RD064	-	-	-	7.5E-05	1.9E-02	1.9E-02
Fluorene	RD064	-	-	-	5.7E-04	1.4E-01	1.4E-01
Indeno(1,2,3-cd)pyrene	RD064	-	-	-	2.4E-05	6.0E-03	6.0E-03
Naphthalene	RD064	-	-	-	6.9E-03	3.8E-02	3.8E-02
Perylene	RD064	-	-	-	1.2E-04	2.9E-02	2.9E-02
Phenanthrene	RD064	-	-	-	1.5E-03	3.8E-01	3.8E-01
Pyrene	RD064	-	-	-	1.4E-04	3.4E-02	3.4E-02
C08-C11 (Gasoline Range)	RD065	1.10E+01	5.5E+00	UJ		-	-
C11-C14 (Kerosene Range)	RD065	1.10E+01	5.5E+00	UJ		-	-

TPH to Petroleum Constituent Extrapolation for Soil (0-6 feet bgs) [a]
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
C14-C20 (Diesel Range)	RD065	1.10E+01	5.5E+00	UJ		-	-
C20-C30 (Lubricant Oil Range)	RD065	8.50E+01	8.5E+01	J		-	-
C11-C30	RD065	-	9.6E+01	-		-	-
Benzene	RD065	-	-	-	1.2E-04	6.6E-04	6.6E-04
Ethylbenzene	RD065	-	-	-	1.2E-04	6.6E-04	6.6E-04
Toluene	RD065	-	-	-	1.2E-04	6.6E-04	6.6E-04
m,p-Xylene	RD065	-	-	-	3.6E-04	2.0E-03	2.0E-03
o-Xylene	RD065	-	-	-	8.0E-05	4.4E-04	4.4E-04
Xylene (total)	RD065	-	-	-	4.4E-04	2.4E-03	2.4E-03
2-Methylnaphthalene	RD065	-	-	-	2.8E-02	1.5E-01	1.5E-01
Acenaphthene	RD065	-	-	-	5.7E-04	5.5E-02	5.5E-02
Acenaphthylene	RD065	-	-	-	7.0E-05	6.7E-03	6.7E-03
Anthracene	RD065	-	-	-	3.7E-04	3.6E-02	3.6E-02
Benzo(a)anthracene	RD065	-	-	-	2.7E-05	2.6E-03	2.6E-03
Benzo(a)pyrene	RD065	-	-	-	2.7E-05	2.6E-03	2.6E-03
Benzo(b)fluoranthene	RD065	-	-	-	4.3E-05	4.2E-03	4.2E-03
Benzo(e)pyrene	RD065	-	-	-	2.1E-04	2.0E-02	2.0E-02
Benzo(g,h,i)perylene	RD065	-	-	-	2.2E-04	2.1E-02	2.1E-02
Benzo(k)fluoranthene	RD065	-	-	-	2.1E-05	2.0E-03	2.0E-03
Chrysene	RD065	-	-	-	5.9E-05	5.6E-03	5.6E-03
Dibenz(a,h)anthracene	RD065	-	-	-	1.1E-05	1.1E-03	1.1E-03
Fluoranthene	RD065	-	-	-	7.5E-05	7.2E-03	7.2E-03
Fluorene	RD065	-	-	-	5.7E-04	5.5E-02	5.5E-02
Indeno(1,2,3-cd)pyrene	RD065	-	-	-	2.4E-05	2.3E-03	2.3E-03
Naphthalene	RD065	-	-	-	6.9E-03	3.8E-02	3.8E-02
Perylene	RD065	-	-	-	1.2E-04	1.1E-02	1.1E-02
Phenanthrene	RD065	-	-	-	1.5E-03	1.5E-01	1.5E-01
Pyrene	RD065	-	-	-	1.4E-04	1.3E-02	1.3E-02
C08-C11 (Gasoline Range)	RD066	1.20E+01	6.0E+00	UJ		-	-
C11-C14 (Kerosene Range)	RD066	1.20E+01	6.0E+00	UJ		-	-
C14-C20 (Diesel Range)	RD066	1.20E+01	6.0E+00	UJ		-	-
C20-C30 (Lubricant Oil Range)	RD066	1.20E+01	6.0E+00	UJ		-	-
C11-C30	RD066	-	1.8E+01	-		-	-
Benzene	RD066	-	-	-	1.2E-04	7.2E-04	7.2E-04
Ethylbenzene	RD066	-	-	-	1.2E-04	7.2E-04	7.2E-04
Toluene	RD066	-	-	-	1.2E-04	7.2E-04	7.2E-04
m,p-Xylene	RD066	-	-	-	3.6E-04	2.2E-03	2.2E-03
o-Xylene	RD066	-	-	-	8.0E-05	4.8E-04	4.8E-04
Xylene (total)	RD066	-	-	-	4.4E-04	2.6E-03	2.6E-03
2-Methylnaphthalene	RD066	-	-	-	2.8E-02	1.7E-01	1.7E-01
Acenaphthene	RD066	-	-	-	5.7E-04	1.0E-02	1.0E-02
Acenaphthylene	RD066	-	-	-	7.0E-05	1.3E-03	1.3E-03
Anthracene	RD066	-	-	-	3.7E-04	6.7E-03	6.7E-03
Benzo(a)anthracene	RD066	-	-	-	2.7E-05	4.9E-04	4.9E-04
Benzo(a)pyrene	RD066	-	-	-	2.7E-05	4.9E-04	4.9E-04
Benzo(b)fluoranthene	RD066	-	-	-	4.3E-05	7.8E-04	7.8E-04
Benzo(e)pyrene	RD066	-	-	-	2.1E-04	3.7E-03	3.7E-03
Benzo(g,h,i)perylene	RD066	-	-	-	2.2E-04	4.0E-03	4.0E-03
Benzo(k)fluoranthene	RD066	-	-	-	2.1E-05	3.7E-04	3.7E-04
Chrysene	RD066	-	-	-	5.9E-05	1.1E-03	1.1E-03
Dibenz(a,h)anthracene	RD066	-	-	-	1.1E-05	2.0E-04	2.0E-04
Fluoranthene	RD066	-	-	-	7.5E-05	1.3E-03	1.3E-03
Fluorene	RD066	-	-	-	5.7E-04	1.0E-02	1.0E-02
Indeno(1,2,3-cd)pyrene	RD066	-	-	-	2.4E-05	4.3E-04	4.3E-04
Naphthalene	RD066	-	-	-	6.9E-03	4.2E-02	4.2E-02
Perylene	RD066	-	-	-	1.2E-04	2.1E-03	2.1E-03

TPH to Petroleum Constituent Extrapolation for Soil (0-6 feet bgs) [a]
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Phenanthrene	RD066	-	-	-	1.5E-03	2.8E-02	2.8E-02
Pyrene	RD066	-	-	-	1.4E-04	2.5E-03	2.5E-03
C08-C11 (Gasoline Range)	RD067	1.20E+01	6.0E+00	UJ		-	-
C11-C14 (Kerosene Range)	RD067	1.20E+01	6.0E+00	UJ		-	-
C14-C20 (Diesel Range)	RD067	1.20E+01	6.0E+00	UJ		-	-
C20-C30 (Lubricant Oil Range)	RD067	1.10E+02	1.1E+02	J		-	-
C11-C30	RD067	-	1.2E+02	-		-	-
Benzene	RD067	-	-	-	1.2E-04	7.2E-04	7.2E-04
Ethylbenzene	RD067	-	-	-	1.2E-04	7.2E-04	7.2E-04
Toluene	RD067	-	-	-	1.2E-04	7.2E-04	7.2E-04
m,p-Xylene	RD067	-	-	-	3.6E-04	2.2E-03	2.2E-03
o-Xylene	RD067	-	-	-	8.0E-05	4.8E-04	4.8E-04
Xylene (total)	RD067	-	-	-	4.4E-04	2.6E-03	2.6E-03
2-Methylnaphthalene	RD067	-	-	-	2.8E-02	1.7E-01	1.7E-01
Acenaphthene	RD067	-	-	-	5.7E-04	7.0E-02	7.0E-02
Acenaphthylene	RD067	-	-	-	7.0E-05	8.5E-03	8.5E-03
Anthracene	RD067	-	-	-	3.7E-04	4.6E-02	4.6E-02
Benzo(a)anthracene	RD067	-	-	-	2.7E-05	3.3E-03	3.3E-03
Benzo(a)pyrene	RD067	-	-	-	2.7E-05	3.3E-03	3.3E-03
Benzo(b)fluoranthene	RD067	-	-	-	4.3E-05	5.3E-03	5.3E-03
Benzo(e)pyrene	RD067	-	-	-	2.1E-04	2.5E-02	2.5E-02
Benzo(g,h,i)perylene	RD067	-	-	-	2.2E-04	2.7E-02	2.7E-02
Benzo(k)fluoranthene	RD067	-	-	-	2.1E-05	2.5E-03	2.5E-03
Chrysene	RD067	-	-	-	5.9E-05	7.2E-03	7.2E-03
Dibenz(a,h)anthracene	RD067	-	-	-	1.1E-05	1.4E-03	1.4E-03
Fluoranthene	RD067	-	-	-	7.5E-05	9.1E-03	9.1E-03
Fluorene	RD067	-	-	-	5.7E-04	6.9E-02	6.9E-02
Indeno(1,2,3-cd)pyrene	RD067	-	-	-	2.4E-05	2.9E-03	2.9E-03
Naphthalene	RD067	-	-	-	6.9E-03	4.2E-02	4.2E-02
Perylene	RD067	-	-	-	1.2E-04	1.4E-02	1.4E-02
Phenanthrene	RD067	-	-	-	1.5E-03	1.9E-01	1.9E-01
Pyrene	RD067	-	-	-	1.4E-04	1.7E-02	1.7E-02
C08-C11 (Gasoline Range)	RD068	1.09E+02	5.5E+01	UJ		-	-
C11-C14 (Kerosene Range)	RD068	1.09E+02	5.5E+01	UJ		-	-
C14-C20 (Diesel Range)	RD068	1.20E+03	1.2E+03	J		-	-
C20-C30 (Lubricant Oil Range)	RD068	3.50E+03	3.5E+03	J		-	-
C11-C30	RD068	-	4.8E+03	-		-	-
Benzene	RD068	-	-	-	1.2E-04	6.5E-03	6.5E-03
Ethylbenzene	RD068	-	-	-	1.2E-04	6.5E-03	6.5E-03
Toluene	RD068	-	-	-	1.2E-04	6.5E-03	6.5E-03
m,p-Xylene	RD068	-	-	-	3.6E-04	2.0E-02	2.0E-02
o-Xylene	RD068	-	-	-	8.0E-05	4.4E-03	4.4E-03
Xylene (total)	RD068	-	-	-	4.4E-04	2.4E-02	2.4E-02
2-Methylnaphthalene	RD068	-	-	-	2.8E-02	1.5E+00	1.5E+00
Acenaphthene	RD068	-	-	-	5.7E-04	2.7E+00	2.7E+00
Acenaphthylene	RD068	-	-	-	7.0E-05	3.3E-01	3.3E-01
Anthracene	RD068	-	-	-	3.7E-04	1.8E+00	1.8E+00
Benzo(a)anthracene	RD068	-	-	-	2.7E-05	1.3E-01	1.3E-01
Benzo(a)pyrene	RD068	-	-	-	2.7E-05	1.3E-01	1.3E-01
Benzo(b)fluoranthene	RD068	-	-	-	4.3E-05	2.1E-01	2.1E-01
Benzo(e)pyrene	RD068	-	-	-	2.1E-04	9.8E-01	9.8E-01
Benzo(g,h,i)perylene	RD068	-	-	-	2.2E-04	1.1E+00	1.1E+00
Benzo(k)fluoranthene	RD068	-	-	-	2.1E-05	9.8E-02	9.8E-02
Chrysene	RD068	-	-	-	5.9E-05	2.8E-01	2.8E-01
Dibenz(a,h)anthracene	RD068	-	-	-	1.1E-05	5.3E-02	5.3E-02
Fluoranthene	RD068	-	-	-	7.5E-05	3.6E-01	3.6E-01

TPH to Petroleum Constituent Extrapolation for Soil (0-6 feet bgs) [a]
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Fluorene	RD068	-	-	-	5.7E-04	2.7E+00	2.7E+00
Indeno(1,2,3-cd)pyrene	RD068	-	-	-	2.4E-05	1.1E-01	1.1E-01
Naphthalene	RD068	-	-	-	6.9E-03	3.8E-01	3.8E-01
Perylene	RD068	-	-	-	1.2E-04	5.6E-01	5.6E-01
Phenanthrene	RD068	-	-	-	1.5E-03	7.3E+00	7.3E+00
Pyrene	RD068	-	-	-	1.4E-04	6.5E-01	6.5E-01
C08-C11 (Gasoline Range)	RD069	1.10E+01	5.5E+00	UJ		-	-
C11-C14 (Kerosene Range)	RD069	1.10E+01	5.5E+00	UJ		-	-
C14-C20 (Diesel Range)	RD069	1.10E+01	5.5E+00	UJ		-	-
C20-C30 (Lubricant Oil Range)	RD069	1.10E+01	5.5E+00	UJ		-	-
C11-C30	RD069	-	1.7E+01	-		-	-
Benzene	RD069	-	-	-	1.2E-04	6.6E-04	6.6E-04
Ethylbenzene	RD069	-	-	-	1.2E-04	6.6E-04	6.6E-04
Toluene	RD069	-	-	-	1.2E-04	6.6E-04	6.6E-04
m,p-Xylene	RD069	-	-	-	3.6E-04	2.0E-03	2.0E-03
o-Xylene	RD069	-	-	-	8.0E-05	4.4E-04	4.4E-04
Xylene (total)	RD069	-	-	-	4.4E-04	2.4E-03	2.4E-03
2-Methylnaphthalene	RD069	-	-	-	2.8E-02	1.5E-01	1.5E-01
Acenaphthene	RD069	-	-	-	5.7E-04	9.5E-03	9.5E-03
Acenaphthylene	RD069	-	-	-	7.0E-05	1.2E-03	1.2E-03
Anthracene	RD069	-	-	-	3.7E-04	6.2E-03	6.2E-03
Benzo(a)anthracene	RD069	-	-	-	2.7E-05	4.4E-04	4.4E-04
Benzo(a)pyrene	RD069	-	-	-	2.7E-05	4.5E-04	4.5E-04
Benzo(b)fluoranthene	RD069	-	-	-	4.3E-05	7.1E-04	7.1E-04
Benzo(e)pyrene	RD069	-	-	-	2.1E-04	3.4E-03	3.4E-03
Benzo(g,h,i)perylene	RD069	-	-	-	2.2E-04	3.6E-03	3.6E-03
Benzo(k)fluoranthene	RD069	-	-	-	2.1E-05	3.4E-04	3.4E-04
Chrysene	RD069	-	-	-	5.9E-05	9.7E-04	9.7E-04
Dibenz(a,h)anthracene	RD069	-	-	-	1.1E-05	1.8E-04	1.8E-04
Fluoranthene	RD069	-	-	-	7.5E-05	1.2E-03	1.2E-03
Fluorene	RD069	-	-	-	5.7E-04	9.4E-03	9.4E-03
Indeno(1,2,3-cd)pyrene	RD069	-	-	-	2.4E-05	4.0E-04	4.0E-04
Naphthalene	RD069	-	-	-	6.9E-03	3.8E-02	3.8E-02
Perylene	RD069	-	-	-	1.2E-04	1.9E-03	1.9E-03
Phenanthrene	RD069	-	-	-	1.5E-03	2.5E-02	2.5E-02
Pyrene	RD069	-	-	-	1.4E-04	2.2E-03	2.2E-03
C08-C11 (Gasoline Range)	RD070	1.10E+01	5.5E+00	UJ		-	-
C11-C14 (Kerosene Range)	RD070	1.10E+01	5.5E+00	UJ		-	-
C14-C20 (Diesel Range)	RD070	1.10E+01	5.5E+00	UJ		-	-
C20-C30 (Lubricant Oil Range)	RD070	1.10E+01	5.5E+00	UJ		-	-
C11-C30	RD070	-	1.7E+01	-		-	-
Benzene	RD070	-	-	-	1.2E-04	6.6E-04	6.6E-04
Ethylbenzene	RD070	-	-	-	1.2E-04	6.6E-04	6.6E-04
Toluene	RD070	-	-	-	1.2E-04	6.6E-04	6.6E-04
m,p-Xylene	RD070	-	-	-	3.6E-04	2.0E-03	2.0E-03
o-Xylene	RD070	-	-	-	8.0E-05	4.4E-04	4.4E-04
Xylene (total)	RD070	-	-	-	4.4E-04	2.4E-03	2.4E-03
2-Methylnaphthalene	RD070	-	-	-	2.8E-02	1.5E-01	1.5E-01
Acenaphthene	RD070	-	-	-	5.7E-04	9.5E-03	9.5E-03
Acenaphthylene	RD070	-	-	-	7.0E-05	1.2E-03	1.2E-03
Anthracene	RD070	-	-	-	3.7E-04	6.2E-03	6.2E-03
Benzo(a)anthracene	RD070	-	-	-	2.7E-05	4.4E-04	4.4E-04
Benzo(a)pyrene	RD070	-	-	-	2.7E-05	4.5E-04	4.5E-04
Benzo(b)fluoranthene	RD070	-	-	-	4.3E-05	7.1E-04	7.1E-04
Benzo(e)pyrene	RD070	-	-	-	2.1E-04	3.4E-03	3.4E-03
Benzo(g,h,i)perylene	RD070	-	-	-	2.2E-04	3.6E-03	3.6E-03

TPH to Petroleum Constituent Extrapolation for Soil (0-6 feet bgs) [a]
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Benzo(k)fluoranthene	RD070	-	-	-	2.1E-05	3.4E-04	3.4E-04
Chrysene	RD070	-	-	-	5.9E-05	9.7E-04	9.7E-04
Dibenz(a,h)anthracene	RD070	-	-	-	1.1E-05	1.8E-04	1.8E-04
Fluoranthene	RD070	-	-	-	7.5E-05	1.2E-03	1.2E-03
Fluorene	RD070	-	-	-	5.7E-04	9.4E-03	9.4E-03
Indeno(1,2,3-cd)pyrene	RD070	-	-	-	2.4E-05	4.0E-04	4.0E-04
Naphthalene	RD070	-	-	-	6.9E-03	3.8E-02	3.8E-02
Perylene	RD070	-	-	-	1.2E-04	1.9E-03	1.9E-03
Phenanthrene	RD070	-	-	-	1.5E-03	2.5E-02	2.5E-02
Pyrene	RD070	-	-	-	1.4E-04	2.2E-03	2.2E-03
C08-C11 (Gasoline Range)	RD071	1.10E+01	5.5E+00	UJ		-	-
C11-C14 (Kerosene Range)	RD071	1.10E+01	5.5E+00	UJ		-	-
C14-C20 (Diesel Range)	RD071	1.10E+01	5.5E+00	UJ		-	-
C20-C30 (Lubricant Oil Range)	RD071	1.10E+01	5.5E+00	UJ		-	-
C11-C30	RD071	-	1.7E+01	-		-	-
Benzene	RD071	-	-	-	1.2E-04	6.6E-04	6.6E-04
Ethylbenzene	RD071	-	-	-	1.2E-04	6.6E-04	6.6E-04
Toluene	RD071	-	-	-	1.2E-04	6.6E-04	6.6E-04
m,p-Xylene	RD071	-	-	-	3.6E-04	2.0E-03	2.0E-03
o-Xylene	RD071	-	-	-	8.0E-05	4.4E-04	4.4E-04
Xylene (total)	RD071	-	-	-	4.4E-04	2.4E-03	2.4E-03
2-Methylnaphthalene	RD071	-	-	-	2.8E-02	1.5E-01	1.5E-01
Acenaphthene	RD071	-	-	-	5.7E-04	9.5E-03	9.5E-03
Acenaphthylene	RD071	-	-	-	7.0E-05	1.2E-03	1.2E-03
Anthracene	RD071	-	-	-	3.7E-04	6.2E-03	6.2E-03
Benzo(a)anthracene	RD071	-	-	-	2.7E-05	4.4E-04	4.4E-04
Benzo(a)pyrene	RD071	-	-	-	2.7E-05	4.5E-04	4.5E-04
Benzo(b)fluoranthene	RD071	-	-	-	4.3E-05	7.1E-04	7.1E-04
Benzo(e)pyrene	RD071	-	-	-	2.1E-04	3.4E-03	3.4E-03
Benzo(g,h,i)perylene	RD071	-	-	-	2.2E-04	3.6E-03	3.6E-03
Benzo(k)fluoranthene	RD071	-	-	-	2.1E-05	3.4E-04	3.4E-04
Chrysene	RD071	-	-	-	5.9E-05	9.7E-04	9.7E-04
Dibenz(a,h)anthracene	RD071	-	-	-	1.1E-05	1.8E-04	1.8E-04
Fluoranthene	RD071	-	-	-	7.5E-05	1.2E-03	1.2E-03
Fluorene	RD071	-	-	-	5.7E-04	9.4E-03	9.4E-03
Indeno(1,2,3-cd)pyrene	RD071	-	-	-	2.4E-05	4.0E-04	4.0E-04
Naphthalene	RD071	-	-	-	6.9E-03	3.8E-02	3.8E-02
Perylene	RD071	-	-	-	1.2E-04	1.9E-03	1.9E-03
Phenanthrene	RD071	-	-	-	1.5E-03	2.5E-02	2.5E-02
Pyrene	RD071	-	-	-	1.4E-04	2.2E-03	2.2E-03
C08-C11 (Gasoline Range)	RD072	1.10E+01	5.5E+00	UJ		-	-
C11-C14 (Kerosene Range)	RD072	1.10E+01	5.5E+00	UJ		-	-
C14-C20 (Diesel Range)	RD072	1.10E+01	5.5E+00	UJ		-	-
C20-C30 (Lubricant Oil Range)	RD072	1.10E+01	5.5E+00	UJ		-	-
C11-C30	RD072	-	1.7E+01	-		-	-
Benzene	RD072	-	-	-	1.2E-04	6.6E-04	6.6E-04
Ethylbenzene	RD072	-	-	-	1.2E-04	6.6E-04	6.6E-04
Toluene	RD072	-	-	-	1.2E-04	6.6E-04	6.6E-04
m,p-Xylene	RD072	-	-	-	3.6E-04	2.0E-03	2.0E-03
o-Xylene	RD072	-	-	-	8.0E-05	4.4E-04	4.4E-04
Xylene (total)	RD072	-	-	-	4.4E-04	2.4E-03	2.4E-03
2-Methylnaphthalene	RD072	-	-	-	2.8E-02	1.5E-01	1.5E-01
Acenaphthene	RD072	-	-	-	5.7E-04	9.5E-03	9.5E-03
Acenaphthylene	RD072	-	-	-	7.0E-05	1.2E-03	1.2E-03
Anthracene	RD072	-	-	-	3.7E-04	6.2E-03	6.2E-03
Benzo(a)anthracene	RD072	-	-	-	2.7E-05	4.4E-04	4.4E-04

TPH to Petroleum Constituent Extrapolation for Soil (0-6 feet bgs) [a]
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Benzo(a)pyrene	RD072	-	-	-	2.7E-05	4.5E-04	4.5E-04
Benzo(b)fluoranthene	RD072	-	-	-	4.3E-05	7.1E-04	7.1E-04
Benzo(e)pyrene	RD072	-	-	-	2.1E-04	3.4E-03	3.4E-03
Benzo(g,h,i)perylene	RD072	-	-	-	2.2E-04	3.6E-03	3.6E-03
Benzo(k)fluoranthene	RD072	-	-	-	2.1E-05	3.4E-04	3.4E-04
Chrysene	RD072	-	-	-	5.9E-05	9.7E-04	9.7E-04
Dibenz(a,h)anthracene	RD072	-	-	-	1.1E-05	1.8E-04	1.8E-04
Fluoranthene	RD072	-	-	-	7.5E-05	1.2E-03	1.2E-03
Fluorene	RD072	-	-	-	5.7E-04	9.4E-03	9.4E-03
Indeno(1,2,3-cd)pyrene	RD072	-	-	-	2.4E-05	4.0E-04	4.0E-04
Naphthalene	RD072	-	-	-	6.9E-03	3.8E-02	3.8E-02
Perylene	RD072	-	-	-	1.2E-04	1.9E-03	1.9E-03
Phenanthrene	RD072	-	-	-	1.5E-03	2.5E-02	2.5E-02
Pyrene	RD072	-	-	-	1.4E-04	2.2E-03	2.2E-03
C08-C11 (Gasoline Range)	RD176	1.20E+01	6.0E+00	UJ		-	-
C11-C14 (Kerosene Range)	RD176	1.20E+01	6.0E+00	UJ		-	-
C14-C20 (Diesel Range)	RD176	1.20E+01	6.0E+00	UJ		-	-
C20-C30 (Lubricant Oil Range)	RD176	1.20E+01	6.0E+00	UJ		-	-
C11-C30	RD176	-	1.8E+01	-		-	-
Benzene	RD176	-	-	-	1.2E-04	7.2E-04	7.2E-04
Ethylbenzene	RD176	-	-	-	1.2E-04	7.2E-04	7.2E-04
Toluene	RD176	-	-	-	1.2E-04	7.2E-04	7.2E-04
m,p-Xylene	RD176	-	-	-	3.6E-04	2.2E-03	2.2E-03
o-Xylene	RD176	-	-	-	8.0E-05	4.8E-04	4.8E-04
Xylene (total)	RD176	-	-	-	4.4E-04	2.6E-03	2.6E-03
2-Methylnaphthalene	RD176	-	-	-	2.8E-02	1.7E-01	1.7E-01
Acenaphthene	RD176	-	-	-	5.7E-04	1.0E-02	1.0E-02
Acenaphthylene	RD176	-	-	-	7.0E-05	1.3E-03	1.3E-03
Anthracene	RD176	-	-	-	3.7E-04	6.7E-03	6.7E-03
Benzo(a)anthracene	RD176	-	-	-	2.7E-05	4.9E-04	4.9E-04
Benzo(a)pyrene	RD176	-	-	-	2.7E-05	4.9E-04	4.9E-04
Benzo(b)fluoranthene	RD176	-	-	-	4.3E-05	7.8E-04	7.8E-04
Benzo(e)pyrene	RD176	-	-	-	2.1E-04	3.7E-03	3.7E-03
Benzo(g,h,i)perylene	RD176	-	-	-	2.2E-04	4.0E-03	4.0E-03
Benzo(k)fluoranthene	RD176	-	-	-	2.1E-05	3.7E-04	3.7E-04
Chrysene	RD176	-	-	-	5.9E-05	1.1E-03	1.1E-03
Dibenz(a,h)anthracene	RD176	-	-	-	1.1E-05	2.0E-04	2.0E-04
Fluoranthene	RD176	-	-	-	7.5E-05	1.3E-03	1.3E-03
Fluorene	RD176	-	-	-	5.7E-04	1.0E-02	1.0E-02
Indeno(1,2,3-cd)pyrene	RD176	-	-	-	2.4E-05	4.3E-04	4.3E-04
Naphthalene	RD176	-	-	-	6.9E-03	4.2E-02	4.2E-02
Perylene	RD176	-	-	-	1.2E-04	2.1E-03	2.1E-03
Phenanthrene	RD176	-	-	-	1.5E-03	2.8E-02	2.8E-02
Pyrene	RD176	-	-	-	1.4E-04	2.5E-03	2.5E-03
C08-C11 (Gasoline Range)	RD266	1.10E+01	5.5E+00	UJ		-	-
C11-C14 (Kerosene Range)	RD266	1.10E+01	5.5E+00	UJ		-	-
C14-C20 (Diesel Range)	RD266	1.10E+01	5.5E+00	UJ		-	-
C20-C30 (Lubricant Oil Range)	RD266	1.10E+01	5.5E+00	UJ		-	-
C11-C30	RD266	-	1.7E+01	-		-	-
Benzene	RD266	-	-	-	1.2E-04	6.6E-04	6.6E-04
Ethylbenzene	RD266	-	-	-	1.2E-04	6.6E-04	6.6E-04
Toluene	RD266	-	-	-	1.2E-04	6.6E-04	6.6E-04
m,p-Xylene	RD266	-	-	-	3.6E-04	2.0E-03	2.0E-03
o-Xylene	RD266	-	-	-	8.0E-05	4.4E-04	4.4E-04
Xylene (total)	RD266	-	-	-	4.4E-04	2.4E-03	2.4E-03
2-Methylnaphthalene	RD266	-	-	-	2.8E-02	1.5E-01	1.5E-01

TPH to Petroleum Constituent Extrapolation for Soil (0-6 feet bgs) [a]
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Acenaphthene	RD266	-	-	-	5.7E-04	9.5E-03	9.5E-03
Acenaphthylene	RD266	-	-	-	7.0E-05	1.2E-03	1.2E-03
Anthracene	RD266	-	-	-	3.7E-04	6.2E-03	6.2E-03
Benzo(a)anthracene	RD266	-	-	-	2.7E-05	4.4E-04	4.4E-04
Benzo(a)pyrene	RD266	-	-	-	2.7E-05	4.5E-04	4.5E-04
Benzo(b)fluoranthene	RD266	-	-	-	4.3E-05	7.1E-04	7.1E-04
Benzo(e)pyrene	RD266	-	-	-	2.1E-04	3.4E-03	3.4E-03
Benzo(g,h,i)perylene	RD266	-	-	-	2.2E-04	3.6E-03	3.6E-03
Benzo(k)fluoranthene	RD266	-	-	-	2.1E-05	3.4E-04	3.4E-04
Chrysene	RD266	-	-	-	5.9E-05	9.7E-04	9.7E-04
Dibenz(a,h)anthracene	RD266	-	-	-	1.1E-05	1.8E-04	1.8E-04
Fluoranthene	RD266	-	-	-	7.5E-05	1.2E-03	1.2E-03
Fluorene	RD266	-	-	-	5.7E-04	9.4E-03	9.4E-03
Indeno(1,2,3-cd)pyrene	RD266	-	-	-	2.4E-05	4.0E-04	4.0E-04
Naphthalene	RD266	-	-	-	6.9E-03	3.8E-02	3.8E-02
Perylene	RD266	-	-	-	1.2E-04	1.9E-03	1.9E-03
Phenanthrene	RD266	-	-	-	1.5E-03	2.5E-02	2.5E-02
Pyrene	RD266	-	-	-	1.4E-04	2.2E-03	2.2E-03
C08-C11 (Gasoline Range)	RD727	1.10E+01	5.5E+00	UJ		-	-
C11-C14 (Kerosene Range)	RD727	1.10E+01	5.5E+00	UJ		-	-
C14-C20 (Diesel Range)	RD727	1.10E+01	5.5E+00	UJ		-	-
C20-C30 (Lubricant Oil Range)	RD727	1.10E+01	5.5E+00	UJ		-	-
C11-C30	RD727	-	1.7E+01	-		-	-
Benzene	RD727	6.00E-03	3.0E-03	U	1.2E-04	6.6E-04	6.6E-04
Ethylbenzene	RD727	6.00E-03	3.0E-03	U	1.2E-04	6.6E-04	6.6E-04
Toluene	RD727	6.00E-03	3.0E-03	U	1.2E-04	6.6E-04	6.6E-04
m,p-Xylene	RD727	6.00E-03	3.0E-03	U	3.6E-04	2.0E-03	2.0E-03
o-Xylene	RD727	6.00E-03	3.0E-03	U	8.0E-05	4.4E-04	4.4E-04
Xylene (total)	RD727	-	-	-	4.4E-04	2.4E-03	2.4E-03
2-Methylnaphthalene	RD727	-	-	-	2.8E-02	1.5E-01	1.5E-01
Acenaphthene	RD727	-	-	-	5.7E-04	9.5E-03	9.5E-03
Acenaphthylene	RD727	-	-	-	7.0E-05	1.2E-03	1.2E-03
Anthracene	RD727	-	-	-	3.7E-04	6.2E-03	6.2E-03
Benzo(a)anthracene	RD727	-	-	-	2.7E-05	4.4E-04	4.4E-04
Benzo(a)pyrene	RD727	-	-	-	2.7E-05	4.5E-04	4.5E-04
Benzo(b)fluoranthene	RD727	-	-	-	4.3E-05	7.1E-04	7.1E-04
Benzo(e)pyrene	RD727	-	-	-	2.1E-04	3.4E-03	3.4E-03
Benzo(g,h,i)perylene	RD727	-	-	-	2.2E-04	3.6E-03	3.6E-03
Benzo(k)fluoranthene	RD727	-	-	-	2.1E-05	3.4E-04	3.4E-04
Chrysene	RD727	-	-	-	5.9E-05	9.7E-04	9.7E-04
Dibenz(a,h)anthracene	RD727	-	-	-	1.1E-05	1.8E-04	1.8E-04
Fluoranthene	RD727	-	-	-	7.5E-05	1.2E-03	1.2E-03
Fluorene	RD727	-	-	-	5.7E-04	9.4E-03	9.4E-03
Indeno(1,2,3-cd)pyrene	RD727	-	-	-	2.4E-05	4.0E-04	4.0E-04
Naphthalene	RD727	-	-	-	6.9E-03	3.8E-02	3.8E-02
Perylene	RD727	-	-	-	1.2E-04	1.9E-03	1.9E-03
Phenanthrene	RD727	-	-	-	1.5E-03	2.5E-02	2.5E-02
Pyrene	RD727	-	-	-	1.4E-04	2.2E-03	2.2E-03
C08-C11 (Gasoline Range)	RD728	5.80E+01	2.9E+01	UJ		-	-
C11-C14 (Kerosene Range)	RD728	5.80E+01	2.9E+01	UJ		-	-
C14-C20 (Diesel Range)	RD728	2.10E+02	2.1E+02	J		-	-
C20-C30 (Lubricant Oil Range)	RD728	9.20E+02	9.2E+02	J		-	-
C11-C30	RD728	-	1.2E+03	-		-	-
Benzene	RD728	-	-	-	1.2E-04	3.5E-03	3.5E-03
Ethylbenzene	RD728	-	-	-	1.2E-04	3.5E-03	3.5E-03
Toluene	RD728	-	-	-	1.2E-04	3.5E-03	3.5E-03

TPH to Petroleum Constituent Extrapolation for Soil (0-6 feet bgs) [a]
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
m,p-Xylene	RD728	-	-	-	3.6E-04	1.0E-02	1.0E-02
o-Xylene	RD728	-	-	-	8.0E-05	2.3E-03	2.3E-03
Xylene (total)	RD728	-	-	-	4.4E-04	1.3E-02	1.3E-02
2-Methylnaphthalene	RD728	-	-	-	2.8E-02	8.0E-01	8.0E-01
Acenaphthene	RD728	-	-	-	5.7E-04	6.6E-01	6.6E-01
Acenaphthylene	RD728	-	-	-	7.0E-05	8.1E-02	8.1E-02
Anthracene	RD728	-	-	-	3.7E-04	4.3E-01	4.3E-01
Benzo(a)anthracene	RD728	-	-	-	2.7E-05	3.1E-02	3.1E-02
Benzo(a)pyrene	RD728	-	-	-	2.7E-05	3.2E-02	3.2E-02
Benzo(b)fluoranthene	RD728	-	-	-	4.3E-05	5.0E-02	5.0E-02
Benzo(e)pyrene	RD728	-	-	-	2.1E-04	2.4E-01	2.4E-01
Benzo(g,h,i)perylene	RD728	-	-	-	2.2E-04	2.6E-01	2.6E-01
Benzo(k)fluoranthene	RD728	-	-	-	2.1E-05	2.4E-02	2.4E-02
Chrysene	RD728	-	-	-	5.9E-05	6.8E-02	6.8E-02
Dibenz(a,h)anthracene	RD728	-	-	-	1.1E-05	1.3E-02	1.3E-02
Fluoranthene	RD728	-	-	-	7.5E-05	8.7E-02	8.7E-02
Fluorene	RD728	-	-	-	5.7E-04	6.6E-01	6.6E-01
Indeno(1,2,3-cd)pyrene	RD728	-	-	-	2.4E-05	2.8E-02	2.8E-02
Naphthalene	RD728	-	-	-	6.9E-03	2.0E-01	2.0E-01
Perylene	RD728	-	-	-	1.2E-04	1.4E-01	1.4E-01
Phenanthrene	RD728	-	-	-	1.5E-03	1.8E+00	1.8E+00
Pyrene	RD728	-	-	-	1.4E-04	1.6E-01	1.6E-01
C08-C11 (Gasoline Range)	RD737	1.50E+01	7.5E+00	UJ		-	-
C11-C14 (Kerosene Range)	RD737	1.50E+01	7.5E+00	UJ		-	-
C14-C20 (Diesel Range)	RD737	1.50E+01	7.5E+00	UJ		-	-
C20-C30 (Lubricant Oil Range)	RD737	1.50E+01	7.5E+00	UJ		-	-
C11-C30	RD737	-	2.3E+01	-		-	-
Benzene	RD737	-	-	-	1.2E-04	9.0E-04	9.0E-04
Ethylbenzene	RD737	-	-	-	1.2E-04	9.0E-04	9.0E-04
Toluene	RD737	-	-	-	1.2E-04	9.0E-04	9.0E-04
m,p-Xylene	RD737	-	-	-	3.6E-04	2.7E-03	2.7E-03
o-Xylene	RD737	-	-	-	8.0E-05	6.0E-04	6.0E-04
Xylene (total)	RD737	-	-	-	4.4E-04	3.3E-03	3.3E-03
2-Methylnaphthalene	RD737	-	-	-	2.8E-02	2.1E-01	2.1E-01
Acenaphthene	RD737	-	-	-	5.7E-04	1.3E-02	1.3E-02
Acenaphthylene	RD737	-	-	-	7.0E-05	1.6E-03	1.6E-03
Anthracene	RD737	-	-	-	3.7E-04	8.4E-03	8.4E-03
Benzo(a)anthracene	RD737	-	-	-	2.7E-05	6.1E-04	6.1E-04
Benzo(a)pyrene	RD737	-	-	-	2.7E-05	6.1E-04	6.1E-04
Benzo(b)fluoranthene	RD737	-	-	-	4.3E-05	9.7E-04	9.7E-04
Benzo(e)pyrene	RD737	-	-	-	2.1E-04	4.7E-03	4.7E-03
Benzo(g,h,i)perylene	RD737	-	-	-	2.2E-04	5.0E-03	5.0E-03
Benzo(k)fluoranthene	RD737	-	-	-	2.1E-05	4.6E-04	4.6E-04
Chrysene	RD737	-	-	-	5.9E-05	1.3E-03	1.3E-03
Dibenz(a,h)anthracene	RD737	-	-	-	1.1E-05	2.5E-04	2.5E-04
Fluoranthene	RD737	-	-	-	7.5E-05	1.7E-03	1.7E-03
Fluorene	RD737	-	-	-	5.7E-04	1.3E-02	1.3E-02
Indeno(1,2,3-cd)pyrene	RD737	-	-	-	2.4E-05	5.4E-04	5.4E-04
Naphthalene	RD737	-	-	-	6.9E-03	5.2E-02	5.2E-02
Perylene	RD737	-	-	-	1.2E-04	2.7E-03	2.7E-03
Phenanthrene	RD737	-	-	-	1.5E-03	3.4E-02	3.4E-02
Pyrene	RD737	-	-	-	1.4E-04	3.1E-03	3.1E-03
C08-C11 (Gasoline Range)	RD738	1.10E+01	5.5E+00	UJ		-	-
C11-C14 (Kerosene Range)	RD738	1.10E+01	5.5E+00	UJ		-	-
C14-C20 (Diesel Range)	RD738	1.10E+01	5.5E+00	UJ		-	-
C20-C30 (Lubricant Oil Range)	RD738	1.10E+01	5.5E+00	UJ		-	-

TPH to Petroleum Constituent Extrapolation for Soil (0-6 feet bgs) [a]
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
C11-C30	RD738	-	1.7E+01	-		-	-
Benzene	RD738	6.00E-03	3.0E-03	U	1.2E-04	6.6E-04	6.6E-04
Ethylbenzene	RD738	6.00E-03	3.0E-03	U	1.2E-04	6.6E-04	6.6E-04
Toluene	RD738	6.00E-03	3.0E-03	U	1.2E-04	6.6E-04	6.6E-04
m,p-Xylene	RD738	6.00E-03	3.0E-03	U	3.6E-04	2.0E-03	2.0E-03
o-Xylene	RD738	6.00E-03	3.0E-03	U	8.0E-05	4.4E-04	4.4E-04
Xylene (total)	RD738	-	-	-	4.4E-04	2.4E-03	2.4E-03
2-Methylnaphthalene	RD738	-	-	-	2.8E-02	1.5E-01	1.5E-01
Acenaphthene	RD738	-	-	-	5.7E-04	9.5E-03	9.5E-03
Acenaphthylene	RD738	-	-	-	7.0E-05	1.2E-03	1.2E-03
Anthracene	RD738	-	-	-	3.7E-04	6.2E-03	6.2E-03
Benzo(a)anthracene	RD738	-	-	-	2.7E-05	4.4E-04	4.4E-04
Benzo(a)pyrene	RD738	-	-	-	2.7E-05	4.5E-04	4.5E-04
Benzo(b)fluoranthene	RD738	-	-	-	4.3E-05	7.1E-04	7.1E-04
Benzo(e)pyrene	RD738	-	-	-	2.1E-04	3.4E-03	3.4E-03
Benzo(g,h,i)perylene	RD738	-	-	-	2.2E-04	3.6E-03	3.6E-03
Benzo(k)fluoranthene	RD738	-	-	-	2.1E-05	3.4E-04	3.4E-04
Chrysene	RD738	-	-	-	5.9E-05	9.7E-04	9.7E-04
Dibenz(a,h)anthracene	RD738	-	-	-	1.1E-05	1.8E-04	1.8E-04
Fluoranthene	RD738	-	-	-	7.5E-05	1.2E-03	1.2E-03
Fluorene	RD738	-	-	-	5.7E-04	9.4E-03	9.4E-03
Indeno(1,2,3-cd)pyrene	RD738	-	-	-	2.4E-05	4.0E-04	4.0E-04
Naphthalene	RD738	-	-	-	6.9E-03	3.8E-02	3.8E-02
Perylene	RD738	-	-	-	1.2E-04	1.9E-03	1.9E-03
Phenanthrene	RD738	-	-	-	1.5E-03	2.5E-02	2.5E-02
Pyrene	RD738	-	-	-	1.4E-04	2.2E-03	2.2E-03
C08-C11 (Gasoline Range)	RJ772	3.40E+00	1.7E+00	U		-	-
C11-C14 (Kerosene Range)	RJ772	3.40E+00	1.7E+00	U		-	-
C14-C20 (Diesel Range)	RJ772	3.40E+00	1.7E+00	U		-	-
C20-C30 (Lubricant Oil Range)	RJ772	1.80E+01	1.8E+01			-	-
C11-C30	RJ772	-	2.1E+01	-		-	-
Benzene	RJ772	-	-	-	1.2E-04	2.0E-04	2.0E-04
Ethylbenzene	RJ772	-	-	-	1.2E-04	2.0E-04	2.0E-04
Toluene	RJ772	-	-	-	1.2E-04	2.0E-04	2.0E-04
m,p-Xylene	RJ772	-	-	-	3.6E-04	6.1E-04	6.1E-04
o-Xylene	RJ772	-	-	-	8.0E-05	1.4E-04	1.4E-04
Xylene (total)	RJ772	-	-	-	4.4E-04	7.5E-04	7.5E-04
2-Methylnaphthalene	RJ772	3.00E-03	1.5E-03	U	2.8E-02	4.7E-02	1.5E-03
Acenaphthene	RJ772	3.00E-03	1.5E-03	U	5.7E-04	1.2E-02	1.5E-03
Acenaphthylene	RJ772	3.00E-03	1.5E-03	U	7.0E-05	1.5E-03	1.5E-03
Anthracene	RJ772	3.00E-03	1.5E-03	U	3.7E-04	8.0E-03	1.5E-03
Benzo(a)anthracene	RJ772	9.00E-03	9.0E-03		2.7E-05	5.8E-04	9.0E-03
Benzo(a)pyrene	RJ772	8.00E-03	8.0E-03		2.7E-05	5.8E-04	8.0E-03
Benzo(b)fluoranthene	RJ772	1.80E-02	1.8E-02		4.3E-05	9.3E-04	1.8E-02
Benzo(e)pyrene	RJ772	-	-	-	2.1E-04	4.4E-03	4.4E-03
Benzo(g,h,i)perylene	RJ772	6.00E-03	6.0E-03		2.2E-04	4.7E-03	6.0E-03
Benzo(k)fluoranthene	RJ772	1.70E-02	1.7E-02		2.1E-05	4.4E-04	1.7E-02
Chrysene	RJ772	2.20E-02	2.2E-02		5.9E-05	1.3E-03	2.2E-02
Dibenz(a,h)anthracene	RJ772	3.00E-03	1.5E-03	U	1.1E-05	2.4E-04	2.4E-04
Fluoranthene	RJ772	1.80E-02	1.8E-02		7.5E-05	1.6E-03	1.8E-02
Fluorene	RJ772	3.00E-03	1.5E-03	U	5.7E-04	1.2E-02	1.5E-03
Indeno(1,2,3-cd)pyrene	RJ772	6.00E-03	6.0E-03		2.4E-05	5.1E-04	6.0E-03
Naphthalene	RJ772	3.00E-03	1.5E-03	U	6.9E-03	1.2E-02	1.5E-03
Perylene	RJ772	-	-	-	1.2E-04	2.5E-03	2.5E-03
Phenanthrene	RJ772	7.00E-03	7.0E-03		1.5E-03	3.3E-02	7.0E-03
Pyrene	RJ772	1.70E-02	1.7E-02		1.4E-04	2.9E-03	1.7E-02

TPH to Petroleum Constituent Extrapolation for Soil (0-6 feet bgs) [a]
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
C08-C11 (Gasoline Range)	RJ774	1.70E+01	8.5E+00	U		-	-
C11-C14 (Kerosene Range)	RJ774	1.70E+01	8.5E+00	U		-	-
C14-C20 (Diesel Range)	RJ774	6.50E+00	6.5E+00	J		-	-
C20-C30 (Lubricant Oil Range)	RJ774	5.50E+02	5.5E+02			-	-
C11-C30	RJ774	-	5.7E+02	-		-	-
Benzene	RJ774	-	-	-	1.2E-04	1.0E-03	1.0E-03
Ethylbenzene	RJ774	-	-	-	1.2E-04	1.0E-03	1.0E-03
Toluene	RJ774	-	-	-	1.2E-04	1.0E-03	1.0E-03
m,p-Xylene	RJ774	-	-	-	3.6E-04	3.1E-03	3.1E-03
o-Xylene	RJ774	-	-	-	8.0E-05	6.8E-04	6.8E-04
Xylene (total)	RJ774	-	-	-	4.4E-04	3.7E-03	3.7E-03
2-Methylnaphthalene	RJ774	3.00E-03	1.5E-03	U	2.8E-02	2.3E-01	1.5E-03
Acenaphthene	RJ774	3.00E-03	1.5E-03	U	5.7E-04	3.2E-01	1.5E-03
Acenaphthylene	RJ774	3.00E-03	1.5E-03	U	7.0E-05	4.0E-02	1.5E-03
Anthracene	RJ774	3.00E-03	1.5E-03	U	3.7E-04	2.1E-01	1.5E-03
Benzo(a)anthracene	RJ774	3.00E-03	1.5E-03	U	2.7E-05	1.5E-02	1.5E-03
Benzo(a)pyrene	RJ774	3.00E-03	1.5E-03	U	2.7E-05	1.5E-02	1.5E-03
Benzo(b)fluoranthene	RJ774	3.00E-03	1.5E-03	U	4.3E-05	2.4E-02	1.5E-03
Benzo(e)pyrene	RJ774	-	-	-	2.1E-04	1.2E-01	1.2E-01
Benzo(g,h,i)perylene	RJ774	3.00E-03	1.5E-03	U	2.2E-04	1.2E-01	1.5E-03
Benzo(k)fluoranthene	RJ774	3.00E-03	1.5E-03	U	2.1E-05	1.2E-02	1.5E-03
Chrysene	RJ774	4.00E-03	4.0E-03		5.9E-05	3.3E-02	4.0E-03
Dibenz(a,h)anthracene	RJ774	3.00E-03	1.5E-03	U	1.1E-05	6.3E-03	1.5E-03
Fluoranthene	RJ774	4.00E-03	4.0E-03		7.5E-05	4.2E-02	4.0E-03
Fluorene	RJ774	3.00E-03	1.5E-03	U	5.7E-04	3.2E-01	1.5E-03
Indeno(1,2,3-cd)pyrene	RJ774	3.00E-03	1.5E-03	U	2.4E-05	1.4E-02	1.5E-03
Naphthalene	RJ774	3.00E-03	1.5E-03	U	6.9E-03	5.9E-02	1.5E-03
Perylene	RJ774	-	-	-	1.2E-04	6.7E-02	6.7E-02
Phenanthrene	RJ774	6.00E-03	6.0E-03		1.5E-03	8.7E-01	6.0E-03
Pyrene	RJ774	5.00E-03	5.0E-03		1.4E-04	7.7E-02	5.0E-03
C08-C11 (Gasoline Range)	RJ782	1.70E+01	8.5E+00	U		-	-
C11-C14 (Kerosene Range)	RJ782	1.70E+01	8.5E+00	U		-	-
C14-C20 (Diesel Range)	RJ782	1.70E+00	1.7E+00	J		-	-
C20-C30 (Lubricant Oil Range)	RJ782	1.20E+02	1.2E+02			-	-
C11-C30	RJ782	-	1.3E+02	-		-	-
Benzene	RJ782	-	-	-	1.2E-04	1.0E-03	1.0E-03
Ethylbenzene	RJ782	-	-	-	1.2E-04	1.0E-03	1.0E-03
Toluene	RJ782	-	-	-	1.2E-04	1.0E-03	1.0E-03
m,p-Xylene	RJ782	-	-	-	3.6E-04	3.1E-03	3.1E-03
o-Xylene	RJ782	-	-	-	8.0E-05	6.8E-04	6.8E-04
Xylene (total)	RJ782	-	-	-	4.4E-04	3.7E-03	3.7E-03
2-Methylnaphthalene	RJ782	3.00E-03	1.5E-03	U	2.8E-02	2.3E-01	1.5E-03
Acenaphthene	RJ782	3.00E-03	1.5E-03	U	5.7E-04	7.5E-02	1.5E-03
Acenaphthylene	RJ782	3.00E-03	1.5E-03	U	7.0E-05	9.1E-03	1.5E-03
Anthracene	RJ782	3.00E-03	1.5E-03	U	3.7E-04	4.9E-02	1.5E-03
Benzo(a)anthracene	RJ782	4.00E-03	4.0E-03		2.7E-05	3.5E-03	4.0E-03
Benzo(a)pyrene	RJ782	6.00E-03	6.0E-03		2.7E-05	3.5E-03	6.0E-03
Benzo(b)fluoranthene	RJ782	8.00E-03	8.0E-03		4.3E-05	5.6E-03	8.0E-03
Benzo(e)pyrene	RJ782	-	-	-	2.1E-04	2.7E-02	2.7E-02
Benzo(g,h,i)perylene	RJ782	3.00E-03	1.5E-03	U	2.2E-04	2.9E-02	1.5E-03
Benzo(k)fluoranthene	RJ782	7.00E-03	7.0E-03		2.1E-05	2.7E-03	7.0E-03
Chrysene	RJ782	8.00E-03	8.0E-03		5.9E-05	7.6E-03	8.0E-03
Dibenz(a,h)anthracene	RJ782	3.00E-03	1.5E-03	U	1.1E-05	1.4E-03	1.4E-03
Fluoranthene	RJ782	9.00E-03	9.0E-03		7.5E-05	9.7E-03	9.0E-03
Fluorene	RJ782	3.00E-03	1.5E-03	U	5.7E-04	7.4E-02	1.5E-03
Indeno(1,2,3-cd)pyrene	RJ782	3.00E-03	1.5E-03	U	2.4E-05	3.1E-03	1.5E-03

TPH to Petroleum Constituent Extrapolation for Soil (0-6 feet bgs) [a]
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Naphthalene	RJ782	3.00E-03	1.5E-03	U	6.9E-03	5.9E-02	1.5E-03
Perylene	RJ782	-	-	-	1.2E-04	1.5E-02	1.5E-02
Phenanthrene	RJ782	4.00E-03	4.0E-03		1.5E-03	2.0E-01	4.0E-03
Pyrene	RJ782	9.00E-03	9.0E-03		1.4E-04	1.8E-02	9.0E-03
C08-C11 (Gasoline Range)	RS287	1.10E+01	5.5E+00	U		-	-
C11-C14 (Kerosene Range)	RS287	1.10E+01	5.5E+00	U		-	-
C14-C20 (Diesel Range)	RS287	1.10E+01	5.5E+00	U		-	-
C20-C30 (Lubricant Oil Range)	RS287	1.10E+01	5.5E+00	U		-	-
C11-C30	RS287	-	1.7E+01	-		-	-
Benzene	RS287	5.00E-03	2.5E-03	U	1.2E-04	6.6E-04	6.6E-04
Ethylbenzene	RS287	5.00E-03	2.5E-03	U	1.2E-04	6.6E-04	6.6E-04
Toluene	RS287	5.00E-03	2.5E-03	U	1.2E-04	6.6E-04	6.6E-04
m,p-Xylene	RS287	5.00E-03	2.5E-03	U	3.6E-04	2.0E-03	2.0E-03
o-Xylene	RS287	5.00E-03	2.5E-03	U	8.0E-05	4.4E-04	4.4E-04
Xylene (total)	RS287	-	-	-	4.4E-04	2.4E-03	2.4E-03
2-Methylnaphthalene	RS287	-	-	-	2.8E-02	1.5E-01	1.5E-01
Acenaphthene	RS287	3.20E-02	1.6E-02	U	5.7E-04	9.5E-03	9.5E-03
Acenaphthylene	RS287	3.20E-02	1.6E-02	U	7.0E-05	1.2E-03	1.2E-03
Anthracene	RS287	3.20E-02	1.6E-02	U	3.7E-04	6.2E-03	6.2E-03
Benzo(a)anthracene	RS287	3.20E-02	1.6E-02	U	2.7E-05	4.4E-04	4.4E-04
Benzo(a)pyrene	RS287	3.20E-02	1.6E-02	U	2.7E-05	4.5E-04	4.5E-04
Benzo(b)fluoranthene	RS287	3.20E-02	1.6E-02	U	4.3E-05	7.1E-04	7.1E-04
Benzo(e)pyrene	RS287	-	-	-	2.1E-04	3.4E-03	3.4E-03
Benzo(g,h,i)perylene	RS287	3.20E-02	1.6E-02	U	2.2E-04	3.6E-03	3.6E-03
Benzo(k)fluoranthene	RS287	3.20E-02	1.6E-02	U	2.1E-05	3.4E-04	3.4E-04
Chrysene	RS287	3.20E-02	1.6E-02	U	5.9E-05	9.7E-04	9.7E-04
Dibenz(a,h)anthracene	RS287	3.20E-02	1.6E-02	U	1.1E-05	1.8E-04	1.8E-04
Fluoranthene	RS287	3.20E-02	1.6E-02	U	7.5E-05	1.2E-03	1.2E-03
Fluorene	RS287	3.20E-02	1.6E-02	U	5.7E-04	9.4E-03	9.4E-03
Indeno(1,2,3-cd)pyrene	RS287	3.20E-02	1.6E-02	U	2.4E-05	4.0E-04	4.0E-04
Naphthalene	RS287	3.20E-02	1.6E-02	U	6.9E-03	3.8E-02	1.6E-02
Perylene	RS287	-	-	-	1.2E-04	1.9E-03	1.9E-03
Phenanthrene	RS287	3.20E-02	1.6E-02	U	1.5E-03	2.5E-02	1.6E-02
Pyrene	RS287	3.20E-02	1.6E-02	U	1.4E-04	2.2E-03	2.2E-03
C08-C11 (Gasoline Range)	RS288	5.40E+01	2.7E+01	U		-	-
C11-C14 (Kerosene Range)	RS288	5.40E+01	2.7E+01	U		-	-
C14-C20 (Diesel Range)	RS288	7.60E+01	7.6E+01			-	-
C20-C30 (Lubricant Oil Range)	RS288	2.50E+02	2.5E+02			-	-
C11-C30	RS288	-	3.5E+02	-		-	-
Benzene	RS288	-	-	-	1.2E-04	3.2E-03	3.2E-03
Ethylbenzene	RS288	-	-	-	1.2E-04	3.2E-03	3.2E-03
Toluene	RS288	-	-	-	1.2E-04	3.2E-03	3.2E-03
m,p-Xylene	RS288	-	-	-	3.6E-04	9.7E-03	9.7E-03
o-Xylene	RS288	-	-	-	8.0E-05	2.2E-03	2.2E-03
Xylene (total)	RS288	-	-	-	4.4E-04	1.2E-02	1.2E-02
2-Methylnaphthalene	RS288DL	-	-	-	2.8E-02	7.4E-01	7.4E-01
Acenaphthene	RS288DL	3.20E+00	1.6E+00	U	5.7E-04	2.0E-01	2.0E-01
Acenaphthylene	RS288DL	3.20E+00	1.6E+00	U	7.0E-05	2.5E-02	2.5E-02
Anthracene	RS288DL	3.20E+00	1.6E+00	U	3.7E-04	1.3E-01	1.3E-01
Benzo(a)anthracene	RS288DL	3.20E+00	1.6E+00	U	2.7E-05	9.5E-03	9.5E-03
Benzo(a)pyrene	RS288DL	3.20E+00	1.6E+00	U	2.7E-05	9.6E-03	9.6E-03
Benzo(b)fluoranthene	RS288DL	3.20E+00	1.6E+00	U	4.3E-05	1.5E-02	1.5E-02
Benzo(e)pyrene	RS288DL	-	-	-	2.1E-04	7.3E-02	7.3E-02
Benzo(g,h,i)perylene	RS288DL	3.20E+00	1.6E+00	U	2.2E-04	7.8E-02	7.8E-02
Benzo(k)fluoranthene	RS288DL	3.20E+00	1.6E+00	U	2.1E-05	7.2E-03	7.2E-03
Chrysene	RS288DL	3.20E+00	1.6E+00	U	5.9E-05	2.1E-02	2.1E-02

TPH to Petroleum Constituent Extrapolation for Soil (0-6 feet bgs) [a]
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Dibenz(a,h)anthracene	RS288DL	3.20E+00	1.6E+00	U	1.1E-05	3.9E-03	3.9E-03
Fluoranthene	RS288DL	3.20E+00	1.6E+00	U	7.5E-05	2.6E-02	2.6E-02
Fluorene	RS288DL	3.20E+00	1.6E+00	U	5.7E-04	2.0E-01	2.0E-01
Indeno(1,2,3-cd)pyrene	RS288DL	3.20E+00	1.6E+00	U	2.4E-05	8.5E-03	8.5E-03
Naphthalene	RS288DL	3.20E+00	1.6E+00	U	6.9E-03	1.9E-01	1.9E-01
Perylene	RS288DL	-	-	-	1.2E-04	4.2E-02	4.2E-02
Phenanthrene	RS288DL	3.20E+00	1.6E+00	U	1.5E-03	5.4E-01	5.4E-01
Pyrene	RS288DL	3.20E+00	1.6E+00	U	1.4E-04	4.8E-02	4.8E-02
C08-C11 (Gasoline Range)	RS289	1.00E+01	5.0E+00	U		-	-
C11-C14 (Kerosene Range)	RS289	1.00E+01	5.0E+00	U		-	-
C14-C20 (Diesel Range)	RS289	1.00E+01	5.0E+00	U		-	-
C20-C30 (Lubricant Oil Range)	RS289	3.90E+01	3.9E+01			-	-
C11-C30	RS289	-	4.9E+01	-		-	-
Benzene	RS289	-	-	-	1.2E-04	6.0E-04	6.0E-04
Ethylbenzene	RS289	-	-	-	1.2E-04	6.0E-04	6.0E-04
Toluene	RS289	-	-	-	1.2E-04	6.0E-04	6.0E-04
m,p-Xylene	RS289	-	-	-	3.6E-04	1.8E-03	1.8E-03
o-Xylene	RS289	-	-	-	8.0E-05	4.0E-04	4.0E-04
Xylene (total)	RS289	-	-	-	4.4E-04	2.2E-03	2.2E-03
2-Methylnaphthalene	RS289	-	-	-	2.8E-02	1.4E-01	1.4E-01
Acenaphthene	RS289	3.20E-01	1.6E-01	U	5.7E-04	2.8E-02	2.8E-02
Acenaphthylene	RS289	3.20E-01	1.6E-01	U	7.0E-05	3.4E-03	3.4E-03
Anthracene	RS289	3.20E-01	1.6E-01	U	3.7E-04	1.8E-02	1.8E-02
Benzo(a)anthracene	RS289	3.20E-01	1.6E-01	U	2.7E-05	1.3E-03	1.3E-03
Benzo(a)pyrene	RS289	3.20E-01	1.6E-01	U	2.7E-05	1.3E-03	1.3E-03
Benzo(b)fluoranthene	RS289	3.20E-01	1.6E-01	U	4.3E-05	2.1E-03	2.1E-03
Benzo(e)pyrene	RS289	-	-	-	2.1E-04	1.0E-02	1.0E-02
Benzo(g,h,i)perylene	RS289	3.20E-01	1.6E-01	U	2.2E-04	1.1E-02	1.1E-02
Benzo(k)fluoranthene	RS289	3.20E-01	1.6E-01	U	2.1E-05	1.0E-03	1.0E-03
Chrysene	RS289	3.20E-01	1.6E-01	U	5.9E-05	2.9E-03	2.9E-03
Dibenz(a,h)anthracene	RS289	3.20E-01	1.6E-01	U	1.1E-05	5.4E-04	5.4E-04
Fluoranthene	RS289	3.20E-01	1.6E-01	U	7.5E-05	3.7E-03	3.7E-03
Fluorene	RS289	3.20E-01	1.6E-01	U	5.7E-04	2.8E-02	2.8E-02
Indeno(1,2,3-cd)pyrene	RS289	3.20E-01	1.6E-01	U	2.4E-05	1.2E-03	1.2E-03
Naphthalene	RS289	3.20E-01	1.6E-01	U	6.9E-03	3.5E-02	3.5E-02
Perylene	RS289	-	-	-	1.2E-04	5.8E-03	5.8E-03
Phenanthrene	RS289	3.20E-01	1.6E-01	U	1.5E-03	7.5E-02	7.5E-02
Pyrene	RS289	3.20E-01	1.6E-01	U	1.4E-04	6.7E-03	6.7E-03
C08-C11 (Gasoline Range)	RS290	1.10E+01	5.5E+00	U		-	-
C11-C14 (Kerosene Range)	RS290	1.10E+01	5.5E+00	U		-	-
C14-C20 (Diesel Range)	RS290	1.10E+01	5.5E+00	U		-	-
C20-C30 (Lubricant Oil Range)	RS290	4.20E+01	4.2E+01			-	-
C11-C30	RS290	-	5.3E+01	-		-	-
Benzene	RS290	-	-	-	1.2E-04	6.6E-04	6.6E-04
Ethylbenzene	RS290	-	-	-	1.2E-04	6.6E-04	6.6E-04
Toluene	RS290	-	-	-	1.2E-04	6.6E-04	6.6E-04
m,p-Xylene	RS290	-	-	-	3.6E-04	2.0E-03	2.0E-03
o-Xylene	RS290	-	-	-	8.0E-05	4.4E-04	4.4E-04
Xylene (total)	RS290	-	-	-	4.4E-04	2.4E-03	2.4E-03
2-Methylnaphthalene	RS290	-	-	-	2.8E-02	1.5E-01	1.5E-01
Acenaphthene	RS290	3.30E-02	1.7E-02	U	5.7E-04	3.0E-02	1.7E-02
Acenaphthylene	RS290	3.30E-02	1.7E-02	U	7.0E-05	3.7E-03	3.7E-03
Anthracene	RS290	3.30E-02	1.7E-02	U	3.7E-04	2.0E-02	1.7E-02
Benzo(a)anthracene	RS290	3.30E-02	1.7E-02	U	2.7E-05	1.4E-03	1.4E-03
Benzo(a)pyrene	RS290	3.30E-02	1.7E-02	U	2.7E-05	1.4E-03	1.4E-03
Benzo(b)fluoranthene	RS290	3.30E-02	1.7E-02	U	4.3E-05	2.3E-03	2.3E-03

TPH to Petroleum Constituent Extrapolation for Soil (0-6 feet bgs) [a]
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Benzo(e)pyrene	RS290	-	-	-	2.1E-04	1.1E-02	1.1E-02
Benzo(g,h,i)perylene	RS290	3.30E-02	1.7E-02	U	2.2E-04	1.2E-02	1.2E-02
Benzo(k)fluoranthene	RS290	3.30E-02	1.7E-02	U	2.1E-05	1.1E-03	1.1E-03
Chrysene	RS290	3.30E-02	1.7E-02	U	5.9E-05	3.1E-03	3.1E-03
Dibenz(a,h)anthracene	RS290	3.30E-02	1.7E-02	U	1.1E-05	5.9E-04	5.9E-04
Fluoranthene	RS290	3.30E-02	1.7E-02	U	7.5E-05	4.0E-03	4.0E-03
Fluorene	RS290	3.30E-02	1.7E-02	U	5.7E-04	3.0E-02	1.7E-02
Indeno(1,2,3-cd)pyrene	RS290	3.30E-02	1.7E-02	U	2.4E-05	1.3E-03	1.3E-03
Naphthalene	RS290	3.30E-02	1.7E-02	U	6.9E-03	3.8E-02	1.7E-02
Perylene	RS290	-	-	-	1.2E-04	6.2E-03	6.2E-03
Phenanthrene	RS290	3.30E-02	1.7E-02	U	1.5E-03	8.1E-02	1.7E-02
Pyrene	RS290	3.30E-02	1.7E-02	U	1.4E-04	7.2E-03	7.2E-03
C08-C11 (Gasoline Range)	RS291	1.10E+01	5.5E+00	U		-	-
C11-C14 (Kerosene Range)	RS291	1.10E+01	5.5E+00	U		-	-
C14-C20 (Diesel Range)	RS291	1.10E+01	5.5E+00	U		-	-
C20-C30 (Lubricant Oil Range)	RS291	1.10E+01	5.5E+00	U		-	-
C11-C30	RS291	-	1.7E+01	-		-	-
Benzene	RS291	5.00E-03	2.5E-03	U	1.2E-04	6.6E-04	6.6E-04
Ethylbenzene	RS291	5.00E-03	2.5E-03	U	1.2E-04	6.6E-04	6.6E-04
Toluene	RS291	5.00E-03	2.5E-03	U	1.2E-04	6.6E-04	6.6E-04
m,p-Xylene	RS291	5.00E-03	2.5E-03	U	3.6E-04	2.0E-03	2.0E-03
o-Xylene	RS291	5.00E-03	2.5E-03	U	8.0E-05	4.4E-04	4.4E-04
Xylene (total)	RS291	-	-	-	4.4E-04	2.4E-03	2.4E-03
2-Methylnaphthalene	RS291	-	-	-	2.8E-02	1.5E-01	1.5E-01
Acenaphthene	RS291	3.20E-02	1.6E-02	U	5.7E-04	9.5E-03	9.5E-03
Acenaphthylene	RS291	3.20E-02	1.6E-02	U	7.0E-05	1.2E-03	1.2E-03
Anthracene	RS291	3.20E-02	1.6E-02	U	3.7E-04	6.2E-03	6.2E-03
Benzo(a)anthracene	RS291	3.20E-02	1.6E-02	U	2.7E-05	4.4E-04	4.4E-04
Benzo(a)pyrene	RS291	3.20E-02	1.6E-02	U	2.7E-05	4.5E-04	4.5E-04
Benzo(b)fluoranthene	RS291	3.20E-02	1.6E-02	U	4.3E-05	7.1E-04	7.1E-04
Benzo(e)pyrene	RS291	-	-	-	2.1E-04	3.4E-03	3.4E-03
Benzo(g,h,i)perylene	RS291	3.20E-02	1.6E-02	U	2.2E-04	3.6E-03	3.6E-03
Benzo(k)fluoranthene	RS291	3.20E-02	1.6E-02	U	2.1E-05	3.4E-04	3.4E-04
Chrysene	RS291	3.20E-02	1.6E-02	U	5.9E-05	9.7E-04	9.7E-04
Dibenz(a,h)anthracene	RS291	3.20E-02	1.6E-02	U	1.1E-05	1.8E-04	1.8E-04
Fluoranthene	RS291	3.20E-02	1.6E-02	U	7.5E-05	1.2E-03	1.2E-03
Fluorene	RS291	3.20E-02	1.6E-02	U	5.7E-04	9.4E-03	9.4E-03
Indeno(1,2,3-cd)pyrene	RS291	3.20E-02	1.6E-02	U	2.4E-05	4.0E-04	4.0E-04
Naphthalene	RS291	3.20E-02	1.6E-02	U	6.9E-03	3.8E-02	1.6E-02
Perylene	RS291	-	-	-	1.2E-04	1.9E-03	1.9E-03
Phenanthrene	RS291	3.20E-02	1.6E-02	U	1.5E-03	2.5E-02	1.6E-02
Pyrene	RS291	3.20E-02	1.6E-02	U	1.4E-04	2.2E-03	2.2E-03
C08-C11 (Gasoline Range)	RS292	1.10E+01	5.5E+00	U		-	-
C11-C14 (Kerosene Range)	RS292	1.10E+01	5.5E+00	U		-	-
C14-C20 (Diesel Range)	RS292	1.10E+01	5.5E+00	U		-	-
C20-C30 (Lubricant Oil Range)	RS292	1.10E+01	5.5E+00	U		-	-
C11-C30	RS292	-	1.7E+01	-		-	-
Benzene	RS292	-	-	-	1.2E-04	6.6E-04	6.6E-04
Ethylbenzene	RS292	-	-	-	1.2E-04	6.6E-04	6.6E-04
Toluene	RS292	-	-	-	1.2E-04	6.6E-04	6.6E-04
m,p-Xylene	RS292	-	-	-	3.6E-04	2.0E-03	2.0E-03
o-Xylene	RS292	-	-	-	8.0E-05	4.4E-04	4.4E-04
Xylene (total)	RS292	-	-	-	4.4E-04	2.4E-03	2.4E-03
2-Methylnaphthalene	RS292	-	-	-	2.8E-02	1.5E-01	1.5E-01
Acenaphthene	RS292	3.40E-02	1.7E-02	U	5.7E-04	9.5E-03	9.5E-03
Acenaphthylene	RS292	3.40E-02	1.7E-02	U	7.0E-05	1.2E-03	1.2E-03

TPH to Petroleum Constituent Extrapolation for Soil (0-6 feet bgs) [a]
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Anthracene	RS292	3.40E-02	1.7E-02	U	3.7E-04	6.2E-03	6.2E-03
Benzo(a)anthracene	RS292	3.40E-02	1.7E-02	U	2.7E-05	4.4E-04	4.4E-04
Benzo(a)pyrene	RS292	3.40E-02	1.7E-02	U	2.7E-05	4.5E-04	4.5E-04
Benzo(b)fluoranthene	RS292	3.40E-02	1.7E-02	U	4.3E-05	7.1E-04	7.1E-04
Benzo(e)pyrene	RS292	-	-	-	2.1E-04	3.4E-03	3.4E-03
Benzo(g,h,i)perylene	RS292	3.40E-02	1.7E-02	U	2.2E-04	3.6E-03	3.6E-03
Benzo(k)fluoranthene	RS292	3.40E-02	1.7E-02	U	2.1E-05	3.4E-04	3.4E-04
Chrysene	RS292	3.40E-02	1.7E-02	U	5.9E-05	9.7E-04	9.7E-04
Dibenz(a,h)anthracene	RS292	3.40E-02	1.7E-02	U	1.1E-05	1.8E-04	1.8E-04
Fluoranthene	RS292	3.40E-02	1.7E-02	U	7.5E-05	1.2E-03	1.2E-03
Fluorene	RS292	3.40E-02	1.7E-02	U	5.7E-04	9.4E-03	9.4E-03
Indeno(1,2,3-cd)pyrene	RS292	3.40E-02	1.7E-02	U	2.4E-05	4.0E-04	4.0E-04
Naphthalene	RS292	3.40E-02	1.7E-02	U	6.9E-03	3.8E-02	1.7E-02
Perylene	RS292	-	-	-	1.2E-04	1.9E-03	1.9E-03
Phenanthrene	RS292	3.40E-02	1.7E-02	U	1.5E-03	2.5E-02	1.7E-02
Pyrene	RS292	3.40E-02	1.7E-02	U	1.4E-04	2.2E-03	2.2E-03
C08-C11 (Gasoline Range)	RS293	5.20E+01	2.6E+01	U		-	-
C11-C14 (Kerosene Range)	RS293	8.90E+01	8.9E+01			-	-
C14-C20 (Diesel Range)	RS293	7.00E+02	7.0E+02			-	-
C20-C30 (Lubricant Oil Range)	RS293	7.20E+02	7.2E+02			-	-
C11-C30	RS293	-	1.5E+03	-		-	-
Benzene	RS293	-	-	-	1.2E-04	3.1E-03	3.1E-03
Ethylbenzene	RS293	-	-	-	1.2E-04	3.1E-03	3.1E-03
Toluene	RS293	-	-	-	1.2E-04	3.1E-03	3.1E-03
m,p-Xylene	RS293	-	-	-	3.6E-04	9.4E-03	9.4E-03
o-Xylene	RS293	-	-	-	8.0E-05	2.1E-03	2.1E-03
Xylene (total)	RS293	-	-	-	4.4E-04	1.1E-02	1.1E-02
2-Methylnaphthalene	RS293	-	-	-	2.8E-02	7.2E-01	7.2E-01
Acenaphthene	RS293	-	-	-	5.7E-04	8.6E-01	8.6E-01
Acenaphthylene	RS293	-	-	-	7.0E-05	1.1E-01	1.1E-01
Anthracene	RS293	-	-	-	3.7E-04	5.6E-01	5.6E-01
Benzo(a)anthracene	RS293	-	-	-	2.7E-05	4.1E-02	4.1E-02
Benzo(a)pyrene	RS293	-	-	-	2.7E-05	4.1E-02	4.1E-02
Benzo(b)fluoranthene	RS293	-	-	-	4.3E-05	6.5E-02	6.5E-02
Benzo(e)pyrene	RS293	-	-	-	2.1E-04	3.1E-01	3.1E-01
Benzo(g,h,i)perylene	RS293	-	-	-	2.2E-04	3.3E-01	3.3E-01
Benzo(k)fluoranthene	RS293	-	-	-	2.1E-05	3.1E-02	3.1E-02
Chrysene	RS293	-	-	-	5.9E-05	8.9E-02	8.9E-02
Dibenz(a,h)anthracene	RS293	-	-	-	1.1E-05	1.7E-02	1.7E-02
Fluoranthene	RS293	-	-	-	7.5E-05	1.1E-01	1.1E-01
Fluorene	RS293	-	-	-	5.7E-04	8.6E-01	8.6E-01
Indeno(1,2,3-cd)pyrene	RS293	-	-	-	2.4E-05	3.6E-02	3.6E-02
Naphthalene	RS293	-	-	-	6.9E-03	1.8E-01	1.8E-01
Perylene	RS293	-	-	-	1.2E-04	1.8E-01	1.8E-01
Phenanthrene	RS293	-	-	-	1.5E-03	2.3E+00	2.3E+00
Pyrene	RS293	-	-	-	1.4E-04	2.1E-01	2.1E-01
C08-C11 (Gasoline Range)	RS294	1.10E+01	5.5E+00	U		-	-
C11-C14 (Kerosene Range)	RS294	1.10E+01	5.5E+00	U		-	-
C14-C20 (Diesel Range)	RS294	1.10E+01	5.5E+00	U		-	-
C20-C30 (Lubricant Oil Range)	RS294	1.10E+01	5.5E+00	U		-	-
C11-C30	RS294	-	1.7E+01	-		-	-
Benzene	RS294	-	-	-	1.2E-04	6.6E-04	6.6E-04
Ethylbenzene	RS294	-	-	-	1.2E-04	6.6E-04	6.6E-04
Toluene	RS294	-	-	-	1.2E-04	6.6E-04	6.6E-04
m,p-Xylene	RS294	-	-	-	3.6E-04	2.0E-03	2.0E-03
o-Xylene	RS294	-	-	-	8.0E-05	4.4E-04	4.4E-04

TPH to Petroleum Constituent Extrapolation for Soil (0-6 feet bgs) [a]
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Xylene (total)	RS294	-	-	-	4.4E-04	2.4E-03	2.4E-03
2-Methylnaphthalene	RS294	-	-	-	2.8E-02	1.5E-01	1.5E-01
Acenaphthene	RS294	-	-	-	5.7E-04	9.5E-03	9.5E-03
Acenaphthylene	RS294	-	-	-	7.0E-05	1.2E-03	1.2E-03
Anthracene	RS294	-	-	-	3.7E-04	6.2E-03	6.2E-03
Benzo(a)anthracene	RS294	-	-	-	2.7E-05	4.4E-04	4.4E-04
Benzo(a)pyrene	RS294	-	-	-	2.7E-05	4.5E-04	4.5E-04
Benzo(b)fluoranthene	RS294	-	-	-	4.3E-05	7.1E-04	7.1E-04
Benzo(e)pyrene	RS294	-	-	-	2.1E-04	3.4E-03	3.4E-03
Benzo(g,h,i)perylene	RS294	-	-	-	2.2E-04	3.6E-03	3.6E-03
Benzo(k)fluoranthene	RS294	-	-	-	2.1E-05	3.4E-04	3.4E-04
Chrysene	RS294	-	-	-	5.9E-05	9.7E-04	9.7E-04
Dibenz(a,h)anthracene	RS294	-	-	-	1.1E-05	1.8E-04	1.8E-04
Fluoranthene	RS294	-	-	-	7.5E-05	1.2E-03	1.2E-03
Fluorene	RS294	-	-	-	5.7E-04	9.4E-03	9.4E-03
Indeno(1,2,3-cd)pyrene	RS294	-	-	-	2.4E-05	4.0E-04	4.0E-04
Naphthalene	RS294	-	-	-	6.9E-03	3.8E-02	3.8E-02
Perylene	RS294	-	-	-	1.2E-04	1.9E-03	1.9E-03
Phenanthrene	RS294	-	-	-	1.5E-03	2.5E-02	2.5E-02
Pyrene	RS294	-	-	-	1.4E-04	2.2E-03	2.2E-03
C08-C11 (Gasoline Range)	RS295	1.10E+01	5.5E+00	U		-	-
C11-C14 (Kerosene Range)	RS295	1.10E+01	5.5E+00	U		-	-
C14-C20 (Diesel Range)	RS295	1.10E+01	5.5E+00	U		-	-
C20-C30 (Lubricant Oil Range)	RS295	1.10E+01	5.5E+00	U		-	-
C11-C30	RS295	-	1.7E+01	-		-	-
Benzene	RS295	-	-	-	1.2E-04	6.6E-04	6.6E-04
Ethylbenzene	RS295	-	-	-	1.2E-04	6.6E-04	6.6E-04
Toluene	RS295	-	-	-	1.2E-04	6.6E-04	6.6E-04
m,p-Xylene	RS295	-	-	-	3.6E-04	2.0E-03	2.0E-03
o-Xylene	RS295	-	-	-	8.0E-05	4.4E-04	4.4E-04
Xylene (total)	RS295	-	-	-	4.4E-04	2.4E-03	2.4E-03
2-Methylnaphthalene	RS295	-	-	-	2.8E-02	1.5E-01	1.5E-01
Acenaphthene	RS295	-	-	-	5.7E-04	9.5E-03	9.5E-03
Acenaphthylene	RS295	-	-	-	7.0E-05	1.2E-03	1.2E-03
Anthracene	RS295	-	-	-	3.7E-04	6.2E-03	6.2E-03
Benzo(a)anthracene	RS295	-	-	-	2.7E-05	4.4E-04	4.4E-04
Benzo(a)pyrene	RS295	-	-	-	2.7E-05	4.5E-04	4.5E-04
Benzo(b)fluoranthene	RS295	-	-	-	4.3E-05	7.1E-04	7.1E-04
Benzo(e)pyrene	RS295	-	-	-	2.1E-04	3.4E-03	3.4E-03
Benzo(g,h,i)perylene	RS295	-	-	-	2.2E-04	3.6E-03	3.6E-03
Benzo(k)fluoranthene	RS295	-	-	-	2.1E-05	3.4E-04	3.4E-04
Chrysene	RS295	-	-	-	5.9E-05	9.7E-04	9.7E-04
Dibenz(a,h)anthracene	RS295	-	-	-	1.1E-05	1.8E-04	1.8E-04
Fluoranthene	RS295	-	-	-	7.5E-05	1.2E-03	1.2E-03
Fluorene	RS295	-	-	-	5.7E-04	9.4E-03	9.4E-03
Indeno(1,2,3-cd)pyrene	RS295	-	-	-	2.4E-05	4.0E-04	4.0E-04
Naphthalene	RS295	-	-	-	6.9E-03	3.8E-02	3.8E-02
Perylene	RS295	-	-	-	1.2E-04	1.9E-03	1.9E-03
Phenanthrene	RS295	-	-	-	1.5E-03	2.5E-02	2.5E-02
Pyrene	RS295	-	-	-	1.4E-04	2.2E-03	2.2E-03
C08-C11 (Gasoline Range)	RS296	1.10E+01	5.5E+00	U		-	-
C11-C14 (Kerosene Range)	RS296	1.10E+01	5.5E+00	U		-	-
C14-C20 (Diesel Range)	RS296	1.10E+01	5.5E+00	U		-	-
C20-C30 (Lubricant Oil Range)	RS296	1.10E+01	5.5E+00	U		-	-
C11-C30	RS296	-	1.7E+01	-		-	-
Benzene	RS296	-	-	-	1.2E-04	6.6E-04	6.6E-04

TPH to Petroleum Constituent Extrapolation for Soil (0-6 feet bgs) [a]
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Ethylbenzene	RS296	-	-	-	1.2E-04	6.6E-04	6.6E-04
Toluene	RS296	-	-	-	1.2E-04	6.6E-04	6.6E-04
m,p-Xylene	RS296	-	-	-	3.6E-04	2.0E-03	2.0E-03
o-Xylene	RS296	-	-	-	8.0E-05	4.4E-04	4.4E-04
Xylene (total)	RS296	-	-	-	4.4E-04	2.4E-03	2.4E-03
2-Methylnaphthalene	RS296	-	-	-	2.8E-02	1.5E-01	1.5E-01
Acenaphthene	RS296	-	-	-	5.7E-04	9.5E-03	9.5E-03
Acenaphthylene	RS296	-	-	-	7.0E-05	1.2E-03	1.2E-03
Anthracene	RS296	-	-	-	3.7E-04	6.2E-03	6.2E-03
Benzo(a)anthracene	RS296	-	-	-	2.7E-05	4.4E-04	4.4E-04
Benzo(a)pyrene	RS296	-	-	-	2.7E-05	4.5E-04	4.5E-04
Benzo(b)fluoranthene	RS296	-	-	-	4.3E-05	7.1E-04	7.1E-04
Benzo(e)pyrene	RS296	-	-	-	2.1E-04	3.4E-03	3.4E-03
Benzo(g,h,i)perylene	RS296	-	-	-	2.2E-04	3.6E-03	3.6E-03
Benzo(k)fluoranthene	RS296	-	-	-	2.1E-05	3.4E-04	3.4E-04
Chrysene	RS296	-	-	-	5.9E-05	9.7E-04	9.7E-04
Dibenz(a,h)anthracene	RS296	-	-	-	1.1E-05	1.8E-04	1.8E-04
Fluoranthene	RS296	-	-	-	7.5E-05	1.2E-03	1.2E-03
Fluorene	RS296	-	-	-	5.7E-04	9.4E-03	9.4E-03
Indeno(1,2,3-cd)pyrene	RS296	-	-	-	2.4E-05	4.0E-04	4.0E-04
Naphthalene	RS296	-	-	-	6.9E-03	3.8E-02	3.8E-02
Perylene	RS296	-	-	-	1.2E-04	1.9E-03	1.9E-03
Phenanthrene	RS296	-	-	-	1.5E-03	2.5E-02	2.5E-02
Pyrene	RS296	-	-	-	1.4E-04	2.2E-03	2.2E-03
C08-C11 (Gasoline Range)	RS297	1.20E+01	6.0E+00	U		-	-
C11-C14 (Kerosene Range)	RS297	1.20E+01	6.0E+00	U		-	-
C14-C20 (Diesel Range)	RS297	1.20E+01	6.0E+00	U		-	-
C20-C30 (Lubricant Oil Range)	RS297	1.20E+01	6.0E+00	U		-	-
C11-C30	RS297	-	1.8E+01	-		-	-
Benzene	RS297	-	-	-	1.2E-04	7.2E-04	7.2E-04
Ethylbenzene	RS297	-	-	-	1.2E-04	7.2E-04	7.2E-04
Toluene	RS297	-	-	-	1.2E-04	7.2E-04	7.2E-04
m,p-Xylene	RS297	-	-	-	3.6E-04	2.2E-03	2.2E-03
o-Xylene	RS297	-	-	-	8.0E-05	4.8E-04	4.8E-04
Xylene (total)	RS297	-	-	-	4.4E-04	2.6E-03	2.6E-03
2-Methylnaphthalene	RS297	-	-	-	2.8E-02	1.7E-01	1.7E-01
Acenaphthene	RS297	-	-	-	5.7E-04	1.0E-02	1.0E-02
Acenaphthylene	RS297	-	-	-	7.0E-05	1.3E-03	1.3E-03
Anthracene	RS297	-	-	-	3.7E-04	6.7E-03	6.7E-03
Benzo(a)anthracene	RS297	-	-	-	2.7E-05	4.9E-04	4.9E-04
Benzo(a)pyrene	RS297	-	-	-	2.7E-05	4.9E-04	4.9E-04
Benzo(b)fluoranthene	RS297	-	-	-	4.3E-05	7.8E-04	7.8E-04
Benzo(e)pyrene	RS297	-	-	-	2.1E-04	3.7E-03	3.7E-03
Benzo(g,h,i)perylene	RS297	-	-	-	2.2E-04	4.0E-03	4.0E-03
Benzo(k)fluoranthene	RS297	-	-	-	2.1E-05	3.7E-04	3.7E-04
Chrysene	RS297	-	-	-	5.9E-05	1.1E-03	1.1E-03
Dibenz(a,h)anthracene	RS297	-	-	-	1.1E-05	2.0E-04	2.0E-04
Fluoranthene	RS297	-	-	-	7.5E-05	1.3E-03	1.3E-03
Fluorene	RS297	-	-	-	5.7E-04	1.0E-02	1.0E-02
Indeno(1,2,3-cd)pyrene	RS297	-	-	-	2.4E-05	4.3E-04	4.3E-04
Naphthalene	RS297	-	-	-	6.9E-03	4.2E-02	4.2E-02
Perylene	RS297	-	-	-	1.2E-04	2.1E-03	2.1E-03
Phenanthrene	RS297	-	-	-	1.5E-03	2.8E-02	2.8E-02
Pyrene	RS297	-	-	-	1.4E-04	2.5E-03	2.5E-03
C08-C11 (Gasoline Range)	RS298	1.20E+01	6.0E+00	U		-	-
C11-C14 (Kerosene Range)	RS298	1.20E+01	6.0E+00	U		-	-

TPH to Petroleum Constituent Extrapolation for Soil (0-6 feet bgs) [a]
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
C14-C20 (Diesel Range)	RS298	1.20E+01	6.0E+00	U		-	-
C20-C30 (Lubricant Oil Range)	RS298	1.20E+01	6.0E+00	U		-	-
C11-C30	RS298	-	1.8E+01	-		-	-
Benzene	RS298	-	-	-	1.2E-04	7.2E-04	7.2E-04
Ethylbenzene	RS298	-	-	-	1.2E-04	7.2E-04	7.2E-04
Toluene	RS298	-	-	-	1.2E-04	7.2E-04	7.2E-04
m,p-Xylene	RS298	-	-	-	3.6E-04	2.2E-03	2.2E-03
o-Xylene	RS298	-	-	-	8.0E-05	4.8E-04	4.8E-04
Xylene (total)	RS298	-	-	-	4.4E-04	2.6E-03	2.6E-03
2-Methylnaphthalene	RS298	-	-	-	2.8E-02	1.7E-01	1.7E-01
Acenaphthene	RS298	-	-	-	5.7E-04	1.0E-02	1.0E-02
Acenaphthylene	RS298	-	-	-	7.0E-05	1.3E-03	1.3E-03
Anthracene	RS298	-	-	-	3.7E-04	6.7E-03	6.7E-03
Benzo(a)anthracene	RS298	-	-	-	2.7E-05	4.9E-04	4.9E-04
Benzo(a)pyrene	RS298	-	-	-	2.7E-05	4.9E-04	4.9E-04
Benzo(b)fluoranthene	RS298	-	-	-	4.3E-05	7.8E-04	7.8E-04
Benzo(e)pyrene	RS298	-	-	-	2.1E-04	3.7E-03	3.7E-03
Benzo(g,h,i)perylene	RS298	-	-	-	2.2E-04	4.0E-03	4.0E-03
Benzo(k)fluoranthene	RS298	-	-	-	2.1E-05	3.7E-04	3.7E-04
Chrysene	RS298	-	-	-	5.9E-05	1.1E-03	1.1E-03
Dibenz(a,h)anthracene	RS298	-	-	-	1.1E-05	2.0E-04	2.0E-04
Fluoranthene	RS298	-	-	-	7.5E-05	1.3E-03	1.3E-03
Fluorene	RS298	-	-	-	5.7E-04	1.0E-02	1.0E-02
Indeno(1,2,3-cd)pyrene	RS298	-	-	-	2.4E-05	4.3E-04	4.3E-04
Naphthalene	RS298	-	-	-	6.9E-03	4.2E-02	4.2E-02
Perylene	RS298	-	-	-	1.2E-04	2.1E-03	2.1E-03
Phenanthrene	RS298	-	-	-	1.5E-03	2.8E-02	2.8E-02
Pyrene	RS298	-	-	-	1.4E-04	2.5E-03	2.5E-03
C08-C11 (Gasoline Range)	RS302	1.20E+01	6.0E+00	U		-	-
C11-C14 (Kerosene Range)	RS302	1.20E+01	6.0E+00	U		-	-
C14-C20 (Diesel Range)	RS302	1.20E+01	6.0E+00	U		-	-
C20-C30 (Lubricant Oil Range)	RS302	1.20E+01	6.0E+00	U		-	-
C11-C30	RS302	-	1.8E+01	-		-	-
Benzene	RS302	6.00E-03	3.0E-03	U	1.2E-04	7.2E-04	7.2E-04
Ethylbenzene	RS302	6.00E-03	3.0E-03	U	1.2E-04	7.2E-04	7.2E-04
Toluene	RS302	6.00E-03	3.0E-03	U	1.2E-04	7.2E-04	7.2E-04
m,p-Xylene	RS302	6.00E-03	3.0E-03	U	3.6E-04	2.2E-03	2.2E-03
o-Xylene	RS302	6.00E-03	3.0E-03	U	8.0E-05	4.8E-04	4.8E-04
Xylene (total)	RS302	-	-	-	4.4E-04	2.6E-03	2.6E-03
2-Methylnaphthalene	RS302	-	-	-	2.8E-02	1.7E-01	1.7E-01
Acenaphthene	RS302	3.60E-02	1.8E-02	U	5.7E-04	1.0E-02	1.0E-02
Acenaphthylene	RS302	3.60E-02	1.8E-02	U	7.0E-05	1.3E-03	1.3E-03
Anthracene	RS302	3.60E-02	1.8E-02	U	3.7E-04	6.7E-03	6.7E-03
Benzo(a)anthracene	RS302	3.60E-02	1.8E-02	U	2.7E-05	4.9E-04	4.9E-04
Benzo(a)pyrene	RS302	3.60E-02	1.8E-02	U	2.7E-05	4.9E-04	4.9E-04
Benzo(b)fluoranthene	RS302	3.60E-02	1.8E-02	U	4.3E-05	7.8E-04	7.8E-04
Benzo(e)pyrene	RS302	-	-	-	2.1E-04	3.7E-03	3.7E-03
Benzo(g,h,i)perylene	RS302	3.60E-02	1.8E-02	U	2.2E-04	4.0E-03	4.0E-03
Benzo(k)fluoranthene	RS302	3.60E-02	1.8E-02	U	2.1E-05	3.7E-04	3.7E-04
Chrysene	RS302	3.60E-02	1.8E-02	U	5.9E-05	1.1E-03	1.1E-03
Dibenz(a,h)anthracene	RS302	3.60E-02	1.8E-02	U	1.1E-05	2.0E-04	2.0E-04
Fluoranthene	RS302	3.60E-02	1.8E-02	U	7.5E-05	1.3E-03	1.3E-03
Fluorene	RS302	3.60E-02	1.8E-02	U	5.7E-04	1.0E-02	1.0E-02
Indeno(1,2,3-cd)pyrene	RS302	3.60E-02	1.8E-02	U	2.4E-05	4.3E-04	4.3E-04
Naphthalene	RS302	3.60E-02	1.8E-02	U	6.9E-03	4.2E-02	1.8E-02
Perylene	RS302	-	-	-	1.2E-04	2.1E-03	2.1E-03

TPH to Petroleum Constituent Extrapolation for Soil (0-6 feet bgs) [a]
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Phenanthrene	RS302	3.60E-02	1.8E-02	U	1.5E-03	2.8E-02	1.8E-02
Pyrene	RS302	3.60E-02	1.8E-02	U	1.4E-04	2.5E-03	2.5E-03
C08-C11 (Gasoline Range)	RS303	1.10E+01	5.5E+00	U		-	-
C11-C14 (Kerosene Range)	RS303	1.10E+01	5.5E+00	U		-	-
C14-C20 (Diesel Range)	RS303	1.10E+01	5.5E+00	U		-	-
C20-C30 (Lubricant Oil Range)	RS303	1.10E+01	5.5E+00	U		-	-
C11-C30	RS303	-	1.7E+01	-		-	-
Benzene	RS303	-	-	-	1.2E-04	6.6E-04	6.6E-04
Ethylbenzene	RS303	-	-	-	1.2E-04	6.6E-04	6.6E-04
Toluene	RS303	-	-	-	1.2E-04	6.6E-04	6.6E-04
m,p-Xylene	RS303	-	-	-	3.6E-04	2.0E-03	2.0E-03
o-Xylene	RS303	-	-	-	8.0E-05	4.4E-04	4.4E-04
Xylene (total)	RS303	-	-	-	4.4E-04	2.4E-03	2.4E-03
2-Methylnaphthalene	RS303	-	-	-	2.8E-02	1.5E-01	1.5E-01
Acenaphthene	RS303	-	-	-	5.7E-04	9.5E-03	9.5E-03
Acenaphthylene	RS303	-	-	-	7.0E-05	1.2E-03	1.2E-03
Anthracene	RS303	-	-	-	3.7E-04	6.2E-03	6.2E-03
Benzo(a)anthracene	RS303	-	-	-	2.7E-05	4.4E-04	4.4E-04
Benzo(a)pyrene	RS303	-	-	-	2.7E-05	4.5E-04	4.5E-04
Benzo(b)fluoranthene	RS303	-	-	-	4.3E-05	7.1E-04	7.1E-04
Benzo(e)pyrene	RS303	-	-	-	2.1E-04	3.4E-03	3.4E-03
Benzo(g,h,i)perylene	RS303	-	-	-	2.2E-04	3.6E-03	3.6E-03
Benzo(k)fluoranthene	RS303	-	-	-	2.1E-05	3.4E-04	3.4E-04
Chrysene	RS303	-	-	-	5.9E-05	9.7E-04	9.7E-04
Dibenz(a,h)anthracene	RS303	-	-	-	1.1E-05	1.8E-04	1.8E-04
Fluoranthene	RS303	-	-	-	7.5E-05	1.2E-03	1.2E-03
Fluorene	RS303	-	-	-	5.7E-04	9.4E-03	9.4E-03
Indeno(1,2,3-cd)pyrene	RS303	-	-	-	2.4E-05	4.0E-04	4.0E-04
Naphthalene	RS303	-	-	-	6.9E-03	3.8E-02	3.8E-02
Perylene	RS303	-	-	-	1.2E-04	1.9E-03	1.9E-03
Phenanthrene	RS303	-	-	-	1.5E-03	2.5E-02	2.5E-02
Pyrene	RS303	-	-	-	1.4E-04	2.2E-03	2.2E-03
C08-C11 (Gasoline Range)	RS321	1.10E+01	5.5E+00	U		-	-
C11-C14 (Kerosene Range)	RS321	1.10E+01	5.5E+00	U		-	-
C14-C20 (Diesel Range)	RS321	1.10E+01	5.5E+00	U		-	-
C20-C30 (Lubricant Oil Range)	RS321	1.10E+01	5.5E+00	U		-	-
C11-C30	RS321	-	1.7E+01	-		-	-
Benzene	RS321	-	-	-	1.2E-04	6.6E-04	6.6E-04
Ethylbenzene	RS321	-	-	-	1.2E-04	6.6E-04	6.6E-04
Toluene	RS321	-	-	-	1.2E-04	6.6E-04	6.6E-04
m,p-Xylene	RS321	-	-	-	3.6E-04	2.0E-03	2.0E-03
o-Xylene	RS321	-	-	-	8.0E-05	4.4E-04	4.4E-04
Xylene (total)	RS321	-	-	-	4.4E-04	2.4E-03	2.4E-03
2-Methylnaphthalene	RS321	-	-	-	2.8E-02	1.5E-01	1.5E-01
Acenaphthene	RS321	-	-	-	5.7E-04	9.5E-03	9.5E-03
Acenaphthylene	RS321	-	-	-	7.0E-05	1.2E-03	1.2E-03
Anthracene	RS321	-	-	-	3.7E-04	6.2E-03	6.2E-03
Benzo(a)anthracene	RS321	-	-	-	2.7E-05	4.4E-04	4.4E-04
Benzo(a)pyrene	RS321	-	-	-	2.7E-05	4.5E-04	4.5E-04
Benzo(b)fluoranthene	RS321	-	-	-	4.3E-05	7.1E-04	7.1E-04
Benzo(e)pyrene	RS321	-	-	-	2.1E-04	3.4E-03	3.4E-03
Benzo(g,h,i)perylene	RS321	-	-	-	2.2E-04	3.6E-03	3.6E-03
Benzo(k)fluoranthene	RS321	-	-	-	2.1E-05	3.4E-04	3.4E-04
Chrysene	RS321	-	-	-	5.9E-05	9.7E-04	9.7E-04
Dibenz(a,h)anthracene	RS321	-	-	-	1.1E-05	1.8E-04	1.8E-04
Fluoranthene	RS321	-	-	-	7.5E-05	1.2E-03	1.2E-03

TPH to Petroleum Constituent Extrapolation for Soil (0-6 feet bgs) [a]
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Fluorene	RS321	-	-	-	5.7E-04	9.4E-03	9.4E-03
Indeno(1,2,3-cd)pyrene	RS321	-	-	-	2.4E-05	4.0E-04	4.0E-04
Naphthalene	RS321	-	-	-	6.9E-03	3.8E-02	3.8E-02
Perylene	RS321	-	-	-	1.2E-04	1.9E-03	1.9E-03
Phenanthrene	RS321	-	-	-	1.5E-03	2.5E-02	2.5E-02
Pyrene	RS321	-	-	-	1.4E-04	2.2E-03	2.2E-03
C08-C11 (Gasoline Range)	RS581	1.40E+01	7.0E+00	UJ		-	-
C11-C14 (Kerosene Range)	RS581	1.40E+01	7.0E+00	UJ		-	-
C14-C20 (Diesel Range)	RS581	1.40E+01	7.0E+00	UJ		-	-
C20-C30 (Lubricant Oil Range)	RS581	1.40E+01	7.0E+00	UJ		-	-
C11-C30	RS581	-	2.1E+01	-		-	-
Benzene	RS581	-	-	-	1.2E-04	8.4E-04	8.4E-04
Ethylbenzene	RS581	-	-	-	1.2E-04	8.4E-04	8.4E-04
Toluene	RS581	-	-	-	1.2E-04	8.4E-04	8.4E-04
m,p-Xylene	RS581	-	-	-	3.6E-04	2.5E-03	2.5E-03
o-Xylene	RS581	-	-	-	8.0E-05	5.6E-04	5.6E-04
Xylene (total)	RS581	-	-	-	4.4E-04	3.1E-03	3.1E-03
2-Methylnaphthalene	RS581	-	-	-	2.8E-02	1.9E-01	1.9E-01
Acenaphthene	RS581	-	-	-	5.7E-04	1.2E-02	1.2E-02
Acenaphthylene	RS581	-	-	-	7.0E-05	1.5E-03	1.5E-03
Anthracene	RS581	-	-	-	3.7E-04	7.8E-03	7.8E-03
Benzo(a)anthracene	RS581	-	-	-	2.7E-05	5.7E-04	5.7E-04
Benzo(a)pyrene	RS581	-	-	-	2.7E-05	5.7E-04	5.7E-04
Benzo(b)fluoranthene	RS581	-	-	-	4.3E-05	9.1E-04	9.1E-04
Benzo(e)pyrene	RS581	-	-	-	2.1E-04	4.3E-03	4.3E-03
Benzo(g,h,i)perylene	RS581	-	-	-	2.2E-04	4.6E-03	4.6E-03
Benzo(k)fluoranthene	RS581	-	-	-	2.1E-05	4.3E-04	4.3E-04
Chrysene	RS581	-	-	-	5.9E-05	1.2E-03	1.2E-03
Dibenz(a,h)anthracene	RS581	-	-	-	1.1E-05	2.3E-04	2.3E-04
Fluoranthene	RS581	-	-	-	7.5E-05	1.6E-03	1.6E-03
Fluorene	RS581	-	-	-	5.7E-04	1.2E-02	1.2E-02
Indeno(1,2,3-cd)pyrene	RS581	-	-	-	2.4E-05	5.1E-04	5.1E-04
Naphthalene	RS581	-	-	-	6.9E-03	4.9E-02	4.9E-02
Perylene	RS581	-	-	-	1.2E-04	2.5E-03	2.5E-03
Phenanthrene	RS581	-	-	-	1.5E-03	3.2E-02	3.2E-02
Pyrene	RS581	-	-	-	1.4E-04	2.9E-03	2.9E-03
C08-C11 (Gasoline Range)	RS668	1.30E+01	6.5E+00	UJ		-	-
C11-C14 (Kerosene Range)	RS668	1.30E+01	6.5E+00	UJ		-	-
C14-C20 (Diesel Range)	RS668	1.30E+01	6.5E+00	UJ		-	-
C20-C30 (Lubricant Oil Range)	RS668	1.30E+01	6.5E+00	UJ		-	-
C11-C30	RS668	-	2.0E+01	-		-	-
Benzene	RS668	-	-	-	1.2E-04	7.8E-04	7.8E-04
Ethylbenzene	RS668	-	-	-	1.2E-04	7.8E-04	7.8E-04
Toluene	RS668	-	-	-	1.2E-04	7.8E-04	7.8E-04
m,p-Xylene	RS668	-	-	-	3.6E-04	2.3E-03	2.3E-03
o-Xylene	RS668	-	-	-	8.0E-05	5.2E-04	5.2E-04
Xylene (total)	RS668	-	-	-	4.4E-04	2.9E-03	2.9E-03
2-Methylnaphthalene	RS668	-	-	-	2.8E-02	1.8E-01	1.8E-01
Acenaphthene	RS668	-	-	-	5.7E-04	1.1E-02	1.1E-02
Acenaphthylene	RS668	-	-	-	7.0E-05	1.4E-03	1.4E-03
Anthracene	RS668	-	-	-	3.7E-04	7.3E-03	7.3E-03
Benzo(a)anthracene	RS668	-	-	-	2.7E-05	5.3E-04	5.3E-04
Benzo(a)pyrene	RS668	-	-	-	2.7E-05	5.3E-04	5.3E-04
Benzo(b)fluoranthene	RS668	-	-	-	4.3E-05	8.4E-04	8.4E-04
Benzo(e)pyrene	RS668	-	-	-	2.1E-04	4.0E-03	4.0E-03
Benzo(g,h,i)perylene	RS668	-	-	-	2.2E-04	4.3E-03	4.3E-03

TPH to Petroleum Constituent Extrapolation for Soil (0-6 feet bgs) [a]
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Benzo(k)fluoranthene	RS668	-	-	-	2.1E-05	4.0E-04	4.0E-04
Chrysene	RS668	-	-	-	5.9E-05	1.1E-03	1.1E-03
Dibenz(a,h)anthracene	RS668	-	-	-	1.1E-05	2.2E-04	2.2E-04
Fluoranthene	RS668	-	-	-	7.5E-05	1.5E-03	1.5E-03
Fluorene	RS668	-	-	-	5.7E-04	1.1E-02	1.1E-02
Indeno(1,2,3-cd)pyrene	RS668	-	-	-	2.4E-05	4.7E-04	4.7E-04
Naphthalene	RS668	-	-	-	6.9E-03	4.5E-02	4.5E-02
Perylene	RS668	-	-	-	1.2E-04	2.3E-03	2.3E-03
Phenanthrene	RS668	-	-	-	1.5E-03	3.0E-02	3.0E-02
Pyrene	RS668	-	-	-	1.4E-04	2.7E-03	2.7E-03
C08-C11 (Gasoline Range)	RS669	1.20E+01	6.0E+00	UJ		-	-
C11-C14 (Kerosene Range)	RS669	1.20E+01	6.0E+00	UJ		-	-
C14-C20 (Diesel Range)	RS669	1.20E+01	6.0E+00	UJ		-	-
C20-C30 (Lubricant Oil Range)	RS669	1.20E+01	6.0E+00	UJ		-	-
C11-C30	RS669	-	1.8E+01	-		-	-
Benzene	RS669	-	-	-	1.2E-04	7.2E-04	7.2E-04
Ethylbenzene	RS669	-	-	-	1.2E-04	7.2E-04	7.2E-04
Toluene	RS669	-	-	-	1.2E-04	7.2E-04	7.2E-04
m,p-Xylene	RS669	-	-	-	3.6E-04	2.2E-03	2.2E-03
o-Xylene	RS669	-	-	-	8.0E-05	4.8E-04	4.8E-04
Xylene (total)	RS669	-	-	-	4.4E-04	2.6E-03	2.6E-03
2-Methylnaphthalene	RS669	-	-	-	2.8E-02	1.7E-01	1.7E-01
Acenaphthene	RS669	-	-	-	5.7E-04	1.0E-02	1.0E-02
Acenaphthylene	RS669	-	-	-	7.0E-05	1.3E-03	1.3E-03
Anthracene	RS669	-	-	-	3.7E-04	6.7E-03	6.7E-03
Benzo(a)anthracene	RS669	-	-	-	2.7E-05	4.9E-04	4.9E-04
Benzo(a)pyrene	RS669	-	-	-	2.7E-05	4.9E-04	4.9E-04
Benzo(b)fluoranthene	RS669	-	-	-	4.3E-05	7.8E-04	7.8E-04
Benzo(e)pyrene	RS669	-	-	-	2.1E-04	3.7E-03	3.7E-03
Benzo(g,h,i)perylene	RS669	-	-	-	2.2E-04	4.0E-03	4.0E-03
Benzo(k)fluoranthene	RS669	-	-	-	2.1E-05	3.7E-04	3.7E-04
Chrysene	RS669	-	-	-	5.9E-05	1.1E-03	1.1E-03
Dibenz(a,h)anthracene	RS669	-	-	-	1.1E-05	2.0E-04	2.0E-04
Fluoranthene	RS669	-	-	-	7.5E-05	1.3E-03	1.3E-03
Fluorene	RS669	-	-	-	5.7E-04	1.0E-02	1.0E-02
Indeno(1,2,3-cd)pyrene	RS669	-	-	-	2.4E-05	4.3E-04	4.3E-04
Naphthalene	RS669	-	-	-	6.9E-03	4.2E-02	4.2E-02
Perylene	RS669	-	-	-	1.2E-04	2.1E-03	2.1E-03
Phenanthrene	RS669	-	-	-	1.5E-03	2.8E-02	2.8E-02
Pyrene	RS669	-	-	-	1.4E-04	2.5E-03	2.5E-03
C08-C11 (Gasoline Range)	RS670	1.10E+01	5.5E+00	UJ		-	-
C11-C14 (Kerosene Range)	RS670	1.10E+01	5.5E+00	UJ		-	-
C14-C20 (Diesel Range)	RS670	1.10E+01	5.5E+00	UJ		-	-
C20-C30 (Lubricant Oil Range)	RS670	1.10E+01	5.5E+00	UJ		-	-
C11-C30	RS670	-	1.7E+01	-		-	-
Benzene	RS670	-	-	-	1.2E-04	6.6E-04	6.6E-04
Ethylbenzene	RS670	-	-	-	1.2E-04	6.6E-04	6.6E-04
Toluene	RS670	-	-	-	1.2E-04	6.6E-04	6.6E-04
m,p-Xylene	RS670	-	-	-	3.6E-04	2.0E-03	2.0E-03
o-Xylene	RS670	-	-	-	8.0E-05	4.4E-04	4.4E-04
Xylene (total)	RS670	-	-	-	4.4E-04	2.4E-03	2.4E-03
2-Methylnaphthalene	RS670	-	-	-	2.8E-02	1.5E-01	1.5E-01
Acenaphthene	RS670	-	-	-	5.7E-04	9.5E-03	9.5E-03
Acenaphthylene	RS670	-	-	-	7.0E-05	1.2E-03	1.2E-03
Anthracene	RS670	-	-	-	3.7E-04	6.2E-03	6.2E-03
Benzo(a)anthracene	RS670	-	-	-	2.7E-05	4.4E-04	4.4E-04

TPH to Petroleum Constituent Extrapolation for Soil (0-6 feet bgs) [a]
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Benzo(a)pyrene	RS670	-	-	-	2.7E-05	4.5E-04	4.5E-04
Benzo(b)fluoranthene	RS670	-	-	-	4.3E-05	7.1E-04	7.1E-04
Benzo(e)pyrene	RS670	-	-	-	2.1E-04	3.4E-03	3.4E-03
Benzo(g,h,i)perylene	RS670	-	-	-	2.2E-04	3.6E-03	3.6E-03
Benzo(k)fluoranthene	RS670	-	-	-	2.1E-05	3.4E-04	3.4E-04
Chrysene	RS670	-	-	-	5.9E-05	9.7E-04	9.7E-04
Dibenz(a,h)anthracene	RS670	-	-	-	1.1E-05	1.8E-04	1.8E-04
Fluoranthene	RS670	-	-	-	7.5E-05	1.2E-03	1.2E-03
Fluorene	RS670	-	-	-	5.7E-04	9.4E-03	9.4E-03
Indeno(1,2,3-cd)pyrene	RS670	-	-	-	2.4E-05	4.0E-04	4.0E-04
Naphthalene	RS670	-	-	-	6.9E-03	3.8E-02	3.8E-02
Perylene	RS670	-	-	-	1.2E-04	1.9E-03	1.9E-03
Phenanthrene	RS670	-	-	-	1.5E-03	2.5E-02	2.5E-02
Pyrene	RS670	-	-	-	1.4E-04	2.2E-03	2.2E-03
C08-C11 (Gasoline Range)	RS671DL	1.09E+02	5.5E+01	UJ		-	-
C11-C14 (Kerosene Range)	RS671DL	1.09E+02	5.5E+01	UJ		-	-
C14-C20 (Diesel Range)	RS671DL	1.10E+03	1.1E+03	J		-	-
C20-C30 (Lubricant Oil Range)	RS671DL	8.30E+03	8.3E+03	J		-	-
C11-C30	RS671DL	-	9.5E+03	-		-	-
Benzene	RS671DL	-	-	-	1.2E-04	6.5E-03	6.5E-03
Ethylbenzene	RS671DL	-	-	-	1.2E-04	6.5E-03	6.5E-03
Toluene	RS671DL	-	-	-	1.2E-04	6.5E-03	6.5E-03
m,p-Xylene	RS671DL	-	-	-	3.6E-04	2.0E-02	2.0E-02
o-Xylene	RS671DL	-	-	-	8.0E-05	4.4E-03	4.4E-03
Xylene (total)	RS671DL	-	-	-	4.4E-04	2.4E-02	2.4E-02
2-Methylnaphthalene	RS671DL	-	-	-	2.8E-02	1.5E+00	1.5E+00
Acenaphthene	RS671DL	-	-	-	5.7E-04	5.4E+00	5.4E+00
Acenaphthylene	RS671DL	-	-	-	7.0E-05	6.6E-01	6.6E-01
Anthracene	RS671DL	-	-	-	3.7E-04	3.5E+00	3.5E+00
Benzo(a)anthracene	RS671DL	-	-	-	2.7E-05	2.5E-01	2.5E-01
Benzo(a)pyrene	RS671DL	-	-	-	2.7E-05	2.6E-01	2.6E-01
Benzo(b)fluoranthene	RS671DL	-	-	-	4.3E-05	4.1E-01	4.1E-01
Benzo(e)pyrene	RS671DL	-	-	-	2.1E-04	2.0E+00	2.0E+00
Benzo(g,h,i)perylene	RS671DL	-	-	-	2.2E-04	2.1E+00	2.1E+00
Benzo(k)fluoranthene	RS671DL	-	-	-	2.1E-05	1.9E-01	1.9E-01
Chrysene	RS671DL	-	-	-	5.9E-05	5.5E-01	5.5E-01
Dibenz(a,h)anthracene	RS671DL	-	-	-	1.1E-05	1.0E-01	1.0E-01
Fluoranthene	RS671DL	-	-	-	7.5E-05	7.1E-01	7.1E-01
Fluorene	RS671DL	-	-	-	5.7E-04	5.4E+00	5.4E+00
Indeno(1,2,3-cd)pyrene	RS671DL	-	-	-	2.4E-05	2.3E-01	2.3E-01
Naphthalene	RS671DL	-	-	-	6.9E-03	3.8E-01	3.8E-01
Perylene	RS671DL	-	-	-	1.2E-04	1.1E+00	1.1E+00
Phenanthrene	RS671DL	-	-	-	1.5E-03	1.4E+01	1.4E+01
Pyrene	RS671DL	-	-	-	1.4E-04	1.3E+00	1.3E+00
C08-C11 (Gasoline Range)	RS878	1.00E+01	5.0E+00	UJ		-	-
C11-C14 (Kerosene Range)	RS878	1.00E+01	5.0E+00	UJ		-	-
C14-C20 (Diesel Range)	RS878	1.00E+01	5.0E+00	UJ		-	-
C20-C30 (Lubricant Oil Range)	RS878	1.00E+01	5.0E+00	UJ		-	-
C11-C30	RS878	-	1.5E+01	-		-	-
Benzene	RS878	-	-	-	1.2E-04	6.0E-04	6.0E-04
Ethylbenzene	RS878	-	-	-	1.2E-04	6.0E-04	6.0E-04
Toluene	RS878	-	-	-	1.2E-04	6.0E-04	6.0E-04
m,p-Xylene	RS878	-	-	-	3.6E-04	1.8E-03	1.8E-03
o-Xylene	RS878	-	-	-	8.0E-05	4.0E-04	4.0E-04
Xylene (total)	RS878	-	-	-	4.4E-04	2.2E-03	2.2E-03
2-Methylnaphthalene	RS878	-	-	-	2.8E-02	1.4E-01	1.4E-01

TPH to Petroleum Constituent Extrapolation for Soil (0-6 feet bgs) [a]
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Acenaphthene	RS878	3.10E-02	1.6E-02	U	5.7E-04	8.6E-03	8.6E-03
Acenaphthylene	RS878	3.10E-02	1.6E-02	U	7.0E-05	1.1E-03	1.1E-03
Anthracene	RS878	3.10E-02	1.6E-02	U	3.7E-04	5.6E-03	5.6E-03
Benzo(a)anthracene	RS878	3.10E-02	1.6E-02	U	2.7E-05	4.0E-04	4.0E-04
Benzo(a)pyrene	RS878	3.10E-02	1.6E-02	U	2.7E-05	4.1E-04	4.1E-04
Benzo(b)fluoranthene	RS878	3.10E-02	1.6E-02	U	4.3E-05	6.5E-04	6.5E-04
Benzo(e)pyrene	RS878	-	-	-	2.1E-04	3.1E-03	3.1E-03
Benzo(g,h,i)perylene	RS878	3.10E-02	1.6E-02	U	2.2E-04	3.3E-03	3.3E-03
Benzo(k)fluoranthene	RS878	3.10E-02	1.6E-02	U	2.1E-05	3.1E-04	3.1E-04
Chrysene	RS878	3.10E-02	1.6E-02	U	5.9E-05	8.8E-04	8.8E-04
Dibenz(a,h)anthracene	RS878	3.10E-02	1.6E-02	U	1.1E-05	1.7E-04	1.7E-04
Fluoranthene	RS878	3.10E-02	1.6E-02	U	7.5E-05	1.1E-03	1.1E-03
Fluorene	RS878	3.10E-02	1.6E-02	U	5.7E-04	8.5E-03	8.5E-03
Indeno(1,2,3-cd)pyrene	RS878	3.10E-02	1.6E-02	U	2.4E-05	3.6E-04	3.6E-04
Naphthalene	RS878	3.10E-02	1.6E-02	U	6.9E-03	3.5E-02	1.6E-02
Perylene	RS878	-	-	-	1.2E-04	1.8E-03	1.8E-03
Phenanthrene	RS878	3.10E-02	1.6E-02	U	1.5E-03	2.3E-02	1.6E-02
Pyrene	RS878	3.10E-02	1.6E-02	U	1.4E-04	2.0E-03	2.0E-03
C08-C11 (Gasoline Range)	RS879	1.00E+01	5.0E+00	UJ		-	-
C11-C14 (Kerosene Range)	RS879	1.00E+01	5.0E+00	UJ		-	-
C14-C20 (Diesel Range)	RS879	1.00E+01	5.0E+00	UJ		-	-
C20-C30 (Lubricant Oil Range)	RS879	1.00E+01	5.0E+00	UJ		-	-
C11-C30	RS879	-	1.5E+01	-		-	-
Benzene	RS879	1.00E-02	5.0E-03	U	1.2E-04	6.0E-04	6.0E-04
Ethylbenzene	RS879	1.00E-02	5.0E-03	U	1.2E-04	6.0E-04	6.0E-04
Toluene	RS879	1.00E-02	5.0E-03	U	1.2E-04	6.0E-04	6.0E-04
m,p-Xylene	RS879	1.00E-02	5.0E-03	U	3.6E-04	1.8E-03	1.8E-03
o-Xylene	RS879	1.00E-02	5.0E-03	U	8.0E-05	4.0E-04	4.0E-04
Xylene (total)	RS879	-	-	-	4.4E-04	2.2E-03	2.2E-03
2-Methylnaphthalene	RS879	-	-	-	2.8E-02	1.4E-01	1.4E-01
Acenaphthene	RS879	3.10E-02	1.6E-02	U	5.7E-04	8.6E-03	8.6E-03
Acenaphthylene	RS879	3.10E-02	1.6E-02	U	7.0E-05	1.1E-03	1.1E-03
Anthracene	RS879	3.10E-02	1.6E-02	U	3.7E-04	5.6E-03	5.6E-03
Benzo(a)anthracene	RS879	3.10E-02	1.6E-02	U	2.7E-05	4.0E-04	4.0E-04
Benzo(a)pyrene	RS879	3.10E-02	1.6E-02	U	2.7E-05	4.1E-04	4.1E-04
Benzo(b)fluoranthene	RS879	3.10E-02	1.6E-02	U	4.3E-05	6.5E-04	6.5E-04
Benzo(e)pyrene	RS879	-	-	-	2.1E-04	3.1E-03	3.1E-03
Benzo(g,h,i)perylene	RS879	3.10E-02	1.6E-02	U	2.2E-04	3.3E-03	3.3E-03
Benzo(k)fluoranthene	RS879	3.10E-02	1.6E-02	U	2.1E-05	3.1E-04	3.1E-04
Chrysene	RS879	3.10E-02	1.6E-02	U	5.9E-05	8.8E-04	8.8E-04
Dibenz(a,h)anthracene	RS879	3.10E-02	1.6E-02	U	1.1E-05	1.7E-04	1.7E-04
Fluoranthene	RS879	3.10E-02	1.6E-02	U	7.5E-05	1.1E-03	1.1E-03
Fluorene	RS879	3.10E-02	1.6E-02	U	5.7E-04	8.5E-03	8.5E-03
Indeno(1,2,3-cd)pyrene	RS879	3.10E-02	1.6E-02	U	2.4E-05	3.6E-04	3.6E-04
Naphthalene	RS879	3.10E-02	1.6E-02	U	6.9E-03	3.5E-02	1.6E-02
Perylene	RS879	-	-	-	1.2E-04	1.8E-03	1.8E-03
Phenanthrene	RS879	3.10E-02	1.6E-02	U	1.5E-03	2.3E-02	1.6E-02
Pyrene	RS879	3.10E-02	1.6E-02	U	1.4E-04	2.0E-03	2.0E-03
C08-C11 (Gasoline Range)	RS880	1.10E+01	5.5E+00	UJ		-	-
C11-C14 (Kerosene Range)	RS880	1.10E+01	5.5E+00	UJ		-	-
C14-C20 (Diesel Range)	RS880	1.10E+01	5.5E+00	UJ		-	-
C20-C30 (Lubricant Oil Range)	RS880	1.10E+01	5.5E+00	UJ		-	-
C11-C30	RS880	-	1.7E+01	-		-	-
Benzene	RS880	6.00E-03	3.0E-03	U	1.2E-04	6.6E-04	6.6E-04
Ethylbenzene	RS880	6.00E-03	3.0E-03	U	1.2E-04	6.6E-04	6.6E-04
Toluene	RS880	6.00E-03	3.0E-03	U	1.2E-04	6.6E-04	6.6E-04

TPH to Petroleum Constituent Extrapolation for Soil (0-6 feet bgs) [a]
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
m,p-Xylene	RS880	6.00E-03	3.0E-03	U	3.6E-04	2.0E-03	2.0E-03
o-Xylene	RS880	6.00E-03	3.0E-03	U	8.0E-05	4.4E-04	4.4E-04
Xylene (total)	RS880	-	-	-	4.4E-04	2.4E-03	2.4E-03
2-Methylnaphthalene	RS880	-	-	-	2.8E-02	1.5E-01	1.5E-01
Acenaphthene	RS880	3.40E-02	1.7E-02	U	5.7E-04	9.5E-03	9.5E-03
Acenaphthylene	RS880	3.40E-02	1.7E-02	U	7.0E-05	1.2E-03	1.2E-03
Anthracene	RS880	3.40E-02	1.7E-02	U	3.7E-04	6.2E-03	6.2E-03
Benzo(a)anthracene	RS880	3.40E-02	1.7E-02	U	2.7E-05	4.4E-04	4.4E-04
Benzo(a)pyrene	RS880	3.40E-02	1.7E-02	U	2.7E-05	4.5E-04	4.5E-04
Benzo(b)fluoranthene	RS880	3.40E-02	1.7E-02	U	4.3E-05	7.1E-04	7.1E-04
Benzo(e)pyrene	RS880	-	-	-	2.1E-04	3.4E-03	3.4E-03
Benzo(g,h,i)perylene	RS880	3.40E-02	1.7E-02	U	2.2E-04	3.6E-03	3.6E-03
Benzo(k)fluoranthene	RS880	3.40E-02	1.7E-02	U	2.1E-05	3.4E-04	3.4E-04
Chrysene	RS880	3.40E-02	1.7E-02	U	5.9E-05	9.7E-04	9.7E-04
Dibenz(a,h)anthracene	RS880	3.40E-02	1.7E-02	U	1.1E-05	1.8E-04	1.8E-04
Fluoranthene	RS880	3.40E-02	1.7E-02	U	7.5E-05	1.2E-03	1.2E-03
Fluorene	RS880	3.40E-02	1.7E-02	U	5.7E-04	9.4E-03	9.4E-03
Indeno(1,2,3-cd)pyrene	RS880	3.40E-02	1.7E-02	U	2.4E-05	4.0E-04	4.0E-04
Naphthalene	RS880	3.40E-02	1.7E-02	U	6.9E-03	3.8E-02	1.7E-02
Perylene	RS880	-	-	-	1.2E-04	1.9E-03	1.9E-03
Phenanthrene	RS880	3.40E-02	1.7E-02	U	1.5E-03	2.5E-02	1.7E-02
Pyrene	RS880	3.40E-02	1.7E-02	U	1.4E-04	2.2E-03	2.2E-03
C08-C11 (Gasoline Range)	RS881	5.30E+01	2.7E+01	UJ		-	-
C11-C14 (Kerosene Range)	RS881	5.30E+01	2.7E+01	UJ		-	-
C14-C20 (Diesel Range)	RS881	5.30E+01	2.7E+01	UJ		-	-
C20-C30 (Lubricant Oil Range)	RS881	9.50E+01	9.5E+01			-	-
C11-C30	RS881	-	1.5E+02	-		-	-
Benzene	RS881	-	-	-	1.2E-04	3.2E-03	3.2E-03
Ethylbenzene	RS881	-	-	-	1.2E-04	3.2E-03	3.2E-03
Toluene	RS881	-	-	-	1.2E-04	3.2E-03	3.2E-03
m,p-Xylene	RS881	-	-	-	3.6E-04	9.5E-03	9.5E-03
o-Xylene	RS881	-	-	-	8.0E-05	2.1E-03	2.1E-03
Xylene (total)	RS881	-	-	-	4.4E-04	1.2E-02	1.2E-02
2-Methylnaphthalene	RS881	-	-	-	2.8E-02	7.3E-01	7.3E-01
Acenaphthene	RS881	-	-	-	5.7E-04	8.5E-02	8.5E-02
Acenaphthylene	RS881	-	-	-	7.0E-05	1.0E-02	1.0E-02
Anthracene	RS881	-	-	-	3.7E-04	5.5E-02	5.5E-02
Benzo(a)anthracene	RS881	-	-	-	2.7E-05	4.0E-03	4.0E-03
Benzo(a)pyrene	RS881	-	-	-	2.7E-05	4.0E-03	4.0E-03
Benzo(b)fluoranthene	RS881	-	-	-	4.3E-05	6.4E-03	6.4E-03
Benzo(e)pyrene	RS881	-	-	-	2.1E-04	3.1E-02	3.1E-02
Benzo(g,h,i)perylene	RS881	-	-	-	2.2E-04	3.3E-02	3.3E-02
Benzo(k)fluoranthene	RS881	-	-	-	2.1E-05	3.0E-03	3.0E-03
Chrysene	RS881	-	-	-	5.9E-05	8.7E-03	8.7E-03
Dibenz(a,h)anthracene	RS881	-	-	-	1.1E-05	1.6E-03	1.6E-03
Fluoranthene	RS881	-	-	-	7.5E-05	1.1E-02	1.1E-02
Fluorene	RS881	-	-	-	5.7E-04	8.4E-02	8.4E-02
Indeno(1,2,3-cd)pyrene	RS881	-	-	-	2.4E-05	3.6E-03	3.6E-03
Naphthalene	RS881	-	-	-	6.9E-03	1.8E-01	1.8E-01
Perylene	RS881	-	-	-	1.2E-04	1.7E-02	1.7E-02
Phenanthrene	RS881	-	-	-	1.5E-03	2.3E-01	2.3E-01
Pyrene	RS881	-	-	-	1.4E-04	2.0E-02	2.0E-02
C08-C11 (Gasoline Range)	MJ683	1.10E+01	5.5E+00	U		-	-
C11-C14 (Kerosene Range)	MJ683	1.10E+01	5.5E+00	U		-	-
C14-C20 (Diesel Range)	MJ683	8.80E+00	8.8E+00	J		-	-
C20-C30 (Lubricant Oil Range)	MJ683	5.20E+01	5.2E+01			-	-

TPH to Petroleum Constituent Extrapolation for Soil (0-6 feet bgs) [a]
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
C11-C30	MJ683	-	6.6E+01	-		-	-
Benzene	MJ683	-	-	-	1.2E-04	6.6E-04	6.6E-04
Ethylbenzene	MJ683	-	-	-	1.2E-04	6.6E-04	6.6E-04
Toluene	MJ683	-	-	-	1.2E-04	6.6E-04	6.6E-04
m,p-Xylene	MJ683	-	-	-	3.6E-04	2.0E-03	2.0E-03
o-Xylene	MJ683	-	-	-	8.0E-05	4.4E-04	4.4E-04
Xylene (total)	MJ683	-	-	-	4.4E-04	2.4E-03	2.4E-03
2-Methylnaphthalene	MJ683	4.00E-01	4.0E-01		2.8E-02	1.5E-01	4.0E-01
Acenaphthene	MJ683	2.40E-02	1.2E-02	U	5.7E-04	3.8E-02	1.2E-02
Acenaphthylene	MJ683	2.40E-02	1.2E-02	U	7.0E-05	4.6E-03	4.6E-03
Anthracene	MJ683	3.80E-02	3.8E-02		3.7E-04	2.5E-02	3.8E-02
Benzo(a)anthracene	MJ683	2.70E-01	2.7E-01		2.7E-05	1.8E-03	2.7E-01
Benzo(a)pyrene	MJ683	2.60E-01	2.6E-01		2.7E-05	1.8E-03	2.6E-01
Benzo(b)fluoranthene	MJ683	4.20E-01	4.2E-01		4.3E-05	2.9E-03	4.2E-01
Benzo(e)pyrene	MJ683	-	-	-	2.1E-04	1.4E-02	1.4E-02
Benzo(g,h,i)perylene	MJ683	7.30E-02	7.3E-02		2.2E-04	1.5E-02	7.3E-02
Benzo(k)fluoranthene	MJ683	3.00E-01	3.0E-01		2.1E-05	1.4E-03	3.0E-01
Chrysene	MJ683	4.40E-01	4.4E-01		5.9E-05	3.9E-03	4.4E-01
Dibenz(a,h)anthracene	MJ683	2.50E-02	2.5E-02		1.1E-05	7.3E-04	2.5E-02
Fluoranthene	MJ683	5.80E-01	5.8E-01		7.5E-05	5.0E-03	5.8E-01
Fluorene	MJ683	2.40E-02	1.2E-02	U	5.7E-04	3.8E-02	1.2E-02
Indeno(1,2,3-cd)pyrene	MJ683	1.00E-01	1.0E-01		2.4E-05	1.6E-03	1.0E-01
Naphthalene	MJ683	3.10E-02	3.1E-02		6.9E-03	3.8E-02	3.1E-02
Perylene	MJ683	-	-	-	1.2E-04	7.8E-03	7.8E-03
Phenanthrene	MJ683	2.50E-01	2.5E-01		1.5E-03	1.0E-01	2.5E-01
Pyrene	MJ683	6.00E-01	6.0E-01		1.4E-04	9.0E-03	6.0E-01
C08-C11 (Gasoline Range)	MJ704	5.20E+00	2.6E+00	U		-	-
C11-C14 (Kerosene Range)	MJ704	5.20E+00	2.6E+00	U		-	-
C14-C20 (Diesel Range)	MJ704	5.20E+00	2.6E+00	U		-	-
C20-C30 (Lubricant Oil Range)	MJ704	5.20E+00	2.6E+00	U		-	-
C11-C30	MJ704	-	7.8E+00	-		-	-
Benzene	MJ704	-	-	-	1.2E-04	3.1E-04	3.1E-04
Ethylbenzene	MJ704	-	-	-	1.2E-04	3.1E-04	3.1E-04
Toluene	MJ704	-	-	-	1.2E-04	3.1E-04	3.1E-04
m,p-Xylene	MJ704	-	-	-	3.6E-04	9.4E-04	9.4E-04
o-Xylene	MJ704	-	-	-	8.0E-05	2.1E-04	2.1E-04
Xylene (total)	MJ704	-	-	-	4.4E-04	1.1E-03	1.1E-03
2-Methylnaphthalene	MJ704	2.10E-02	1.1E-02	U	2.8E-02	7.2E-02	1.1E-02
Acenaphthene	MJ704	2.10E-02	1.1E-02	U	5.7E-04	4.5E-03	4.5E-03
Acenaphthylene	MJ704	2.10E-02	1.1E-02	U	7.0E-05	5.5E-04	5.5E-04
Anthracene	MJ704	3.90E-02	3.9E-02		3.7E-04	2.9E-03	3.9E-02
Benzo(a)anthracene	MJ704	3.30E-01	3.3E-01		2.7E-05	2.1E-04	3.3E-01
Benzo(a)pyrene	MJ704	1.90E-01	1.9E-01		2.7E-05	2.1E-04	1.9E-01
Benzo(b)fluoranthene	MJ704	2.50E-01	2.5E-01		4.3E-05	3.4E-04	2.5E-01
Benzo(e)pyrene	MJ704	-	-	-	2.1E-04	1.6E-03	1.6E-03
Benzo(g,h,i)perylene	MJ704	8.70E-02	8.7E-02		2.2E-04	1.7E-03	8.7E-02
Benzo(k)fluoranthene	MJ704	2.10E-01	2.1E-01		2.1E-05	1.6E-04	2.1E-01
Chrysene	MJ704	4.00E-01	4.0E-01		5.9E-05	4.6E-04	4.0E-01
Dibenz(a,h)anthracene	MJ704	3.30E-02	3.3E-02		1.1E-05	8.6E-05	3.3E-02
Fluoranthene	MJ704	5.90E-01	5.9E-01		7.5E-05	5.8E-04	5.9E-01
Fluorene	MJ704	2.10E-02	1.1E-02	U	5.7E-04	4.4E-03	4.4E-03
Indeno(1,2,3-cd)pyrene	MJ704	1.10E-01	1.1E-01		2.4E-05	1.9E-04	1.1E-01
Naphthalene	MJ704	2.10E-02	1.1E-02	U	6.9E-03	1.8E-02	1.1E-02
Perylene	MJ704	-	-	-	1.2E-04	9.2E-04	9.2E-04
Phenanthrene	MJ704	3.30E-01	3.3E-01		1.5E-03	1.2E-02	3.3E-01
Pyrene	MJ704	4.80E-01	4.8E-01		1.4E-04	1.1E-03	4.8E-01

TPH to Petroleum Constituent Extrapolation for Soil (0-6 feet bgs) [a]
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
C08-C11 (Gasoline Range)	MJ705	5.40E+00	2.7E+00	U		-	-
C11-C14 (Kerosene Range)	MJ705	5.40E+00	2.7E+00	U		-	-
C14-C20 (Diesel Range)	MJ705	5.40E+00	2.7E+00	U		-	-
C20-C30 (Lubricant Oil Range)	MJ705	5.40E+00	2.7E+00	U		-	-
C11-C30	MJ705	-	8.1E+00	-		-	-
Benzene	MJ705	-	-	-	1.2E-04	3.2E-04	3.2E-04
Ethylbenzene	MJ705	-	-	-	1.2E-04	3.2E-04	3.2E-04
Toluene	MJ705	-	-	-	1.2E-04	3.2E-04	3.2E-04
m,p-Xylene	MJ705	-	-	-	3.6E-04	9.7E-04	9.7E-04
o-Xylene	MJ705	-	-	-	8.0E-05	2.2E-04	2.2E-04
Xylene (total)	MJ705	-	-	-	4.4E-04	1.2E-03	1.2E-03
2-Methylnaphthalene	MJ705	2.20E-02	1.1E-02	U	2.8E-02	7.4E-02	1.1E-02
Acenaphthene	MJ705	2.20E-02	1.1E-02	U	5.7E-04	4.6E-03	4.6E-03
Acenaphthylene	MJ705	2.20E-02	1.1E-02	U	7.0E-05	5.7E-04	5.7E-04
Anthracene	MJ705	2.20E-02	1.1E-02	U	3.7E-04	3.0E-03	3.0E-03
Benzo(a)anthracene	MJ705	2.20E-02	1.1E-02	U	2.7E-05	2.2E-04	2.2E-04
Benzo(a)pyrene	MJ705	2.20E-02	1.1E-02	U	2.7E-05	2.2E-04	2.2E-04
Benzo(b)fluoranthene	MJ705	2.20E-02	1.1E-02	U	4.3E-05	3.5E-04	3.5E-04
Benzo(e)pyrene	MJ705	-	-	-	2.1E-04	1.7E-03	1.7E-03
Benzo(g,h,i)perylene	MJ705	2.20E-02	1.1E-02	U	2.2E-04	1.8E-03	1.8E-03
Benzo(k)fluoranthene	MJ705	2.20E-02	1.1E-02	U	2.1E-05	1.7E-04	1.7E-04
Chrysene	MJ705	2.20E-02	1.1E-02	U	5.9E-05	4.8E-04	4.8E-04
Dibenz(a,h)anthracene	MJ705	2.20E-02	1.1E-02	U	1.1E-05	9.0E-05	9.0E-05
Fluoranthene	MJ705	2.20E-02	1.1E-02	U	7.5E-05	6.1E-04	6.1E-04
Fluorene	MJ705	2.20E-02	1.1E-02	U	5.7E-04	4.6E-03	4.6E-03
Indeno(1,2,3-cd)pyrene	MJ705	2.20E-02	1.1E-02	U	2.4E-05	1.9E-04	1.9E-04
Naphthalene	MJ705	2.20E-02	1.1E-02	U	6.9E-03	1.9E-02	1.1E-02
Perylene	MJ705	-	-	-	1.2E-04	9.6E-04	9.6E-04
Phenanthrene	MJ705	2.20E-02	1.1E-02	U	1.5E-03	1.2E-02	1.1E-02
Pyrene	MJ705	2.20E-02	1.1E-02	U	1.4E-04	1.1E-03	1.1E-03
C08-C11 (Gasoline Range)	MJ707	1.00E+01	5.0E+00	U		-	-
C11-C14 (Kerosene Range)	MJ707	1.00E+01	5.0E+00	U		-	-
C14-C20 (Diesel Range)	MJ707	1.00E+01	5.0E+00	U		-	-
C20-C30 (Lubricant Oil Range)	MJ707	1.00E+01	5.0E+00	U		-	-
C11-C30	MJ707	-	1.5E+01	-		-	-
Benzene	MJ707	-	-	-	1.2E-04	6.0E-04	6.0E-04
Ethylbenzene	MJ707	-	-	-	1.2E-04	6.0E-04	6.0E-04
Toluene	MJ707	-	-	-	1.2E-04	6.0E-04	6.0E-04
m,p-Xylene	MJ707	-	-	-	3.6E-04	1.8E-03	1.8E-03
o-Xylene	MJ707	-	-	-	8.0E-05	4.0E-04	4.0E-04
Xylene (total)	MJ707	-	-	-	4.4E-04	2.2E-03	2.2E-03
2-Methylnaphthalene	MJ707	2.00E-02	1.0E-02	U	2.8E-02	1.4E-01	1.0E-02
Acenaphthene	MJ707	2.00E-02	1.0E-02	U	5.7E-04	8.6E-03	8.6E-03
Acenaphthylene	MJ707	2.00E-02	1.0E-02	U	7.0E-05	1.1E-03	1.1E-03
Anthracene	MJ707	2.00E-02	1.0E-02	U	3.7E-04	5.6E-03	5.6E-03
Benzo(a)anthracene	MJ707	2.00E-02	1.0E-02	U	2.7E-05	4.0E-04	4.0E-04
Benzo(a)pyrene	MJ707	2.00E-02	1.0E-02	U	2.7E-05	4.1E-04	4.1E-04
Benzo(b)fluoranthene	MJ707	2.00E-02	1.0E-02	U	4.3E-05	6.5E-04	6.5E-04
Benzo(e)pyrene	MJ707	-	-	-	2.1E-04	3.1E-03	3.1E-03
Benzo(g,h,i)perylene	MJ707	2.00E-02	1.0E-02	U	2.2E-04	3.3E-03	3.3E-03
Benzo(k)fluoranthene	MJ707	2.00E-02	1.0E-02	U	2.1E-05	3.1E-04	3.1E-04
Chrysene	MJ707	2.00E-02	1.0E-02	U	5.9E-05	8.8E-04	8.8E-04
Dibenz(a,h)anthracene	MJ707	2.00E-02	1.0E-02	U	1.1E-05	1.7E-04	1.7E-04
Fluoranthene	MJ707	2.00E-02	1.0E-02	U	7.5E-05	1.1E-03	1.1E-03
Fluorene	MJ707	2.00E-02	1.0E-02	U	5.7E-04	8.5E-03	8.5E-03
Indeno(1,2,3-cd)pyrene	MJ707	2.00E-02	1.0E-02	U	2.4E-05	3.6E-04	3.6E-04

TPH to Petroleum Constituent Extrapolation for Soil (0-6 feet bgs) [a]
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Naphthalene	MJ707	2.00E-02	1.0E-02	U	6.9E-03	3.5E-02	1.0E-02
Perylene	MJ707	-	-	-	1.2E-04	1.8E-03	1.8E-03
Phenanthrene	MJ707	2.00E-02	1.0E-02	U	1.5E-03	2.3E-02	1.0E-02
Pyrene	MJ707	2.00E-02	1.0E-02	U	1.4E-04	2.0E-03	2.0E-03
C08-C11 (Gasoline Range)	MJ708	1.10E+01	5.5E+00	U		-	-
C11-C14 (Kerosene Range)	MJ708	1.10E+01	5.5E+00	U		-	-
C14-C20 (Diesel Range)	MJ708	1.10E+01	5.5E+00	U		-	-
C20-C30 (Lubricant Oil Range)	MJ708	4.50E+00	4.5E+00	J		-	-
C11-C30	MJ708	-	1.6E+01	-		-	-
Benzene	MJ708	-	-	-	1.2E-04	6.6E-04	6.6E-04
Ethylbenzene	MJ708	-	-	-	1.2E-04	6.6E-04	6.6E-04
Toluene	MJ708	-	-	-	1.2E-04	6.6E-04	6.6E-04
m,p-Xylene	MJ708	-	-	-	3.6E-04	2.0E-03	2.0E-03
o-Xylene	MJ708	-	-	-	8.0E-05	4.4E-04	4.4E-04
Xylene (total)	MJ708	-	-	-	4.4E-04	2.4E-03	2.4E-03
2-Methylnaphthalene	MJ708	2.10E-02	1.1E-02	U	2.8E-02	1.5E-01	1.1E-02
Acenaphthene	MJ708	2.10E-02	1.1E-02	U	5.7E-04	8.9E-03	8.9E-03
Acenaphthylene	MJ708	2.10E-02	1.1E-02	U	7.0E-05	1.1E-03	1.1E-03
Anthracene	MJ708	2.10E-02	1.1E-02	U	3.7E-04	5.8E-03	5.8E-03
Benzo(a)anthracene	MJ708	2.10E-02	1.1E-02	U	2.7E-05	4.2E-04	4.2E-04
Benzo(a)pyrene	MJ708	2.10E-02	1.1E-02	U	2.7E-05	4.2E-04	4.2E-04
Benzo(b)fluoranthene	MJ708	2.10E-02	1.1E-02	U	4.3E-05	6.7E-04	6.7E-04
Benzo(e)pyrene	MJ708	-	-	-	2.1E-04	3.2E-03	3.2E-03
Benzo(g,h,i)perylene	MJ708	2.10E-02	1.1E-02	U	2.2E-04	3.4E-03	3.4E-03
Benzo(k)fluoranthene	MJ708	2.10E-02	1.1E-02	U	2.1E-05	3.2E-04	3.2E-04
Chrysene	MJ708	2.10E-02	1.1E-02	U	5.9E-05	9.1E-04	9.1E-04
Dibenz(a,h)anthracene	MJ708	2.10E-02	1.1E-02	U	1.1E-05	1.7E-04	1.7E-04
Fluoranthene	MJ708	2.10E-02	1.1E-02	U	7.5E-05	1.2E-03	1.2E-03
Fluorene	MJ708	2.10E-02	1.1E-02	U	5.7E-04	8.8E-03	8.8E-03
Indeno(1,2,3-cd)pyrene	MJ708	2.10E-02	1.1E-02	U	2.4E-05	3.7E-04	3.7E-04
Naphthalene	MJ708	2.10E-02	1.1E-02	U	6.9E-03	3.8E-02	1.1E-02
Perylene	MJ708	-	-	-	1.2E-04	1.8E-03	1.8E-03
Phenanthrene	MJ708	2.10E-02	1.1E-02	U	1.5E-03	2.4E-02	1.1E-02
Pyrene	MJ708	2.10E-02	1.1E-02	U	1.4E-04	2.1E-03	2.1E-03
C08-C11 (Gasoline Range)	MJ710	5.30E+00	2.7E+00	U		-	-
C11-C14 (Kerosene Range)	MJ710	5.30E+00	2.7E+00	U		-	-
C14-C20 (Diesel Range)	MJ710	5.30E+00	2.7E+00	U		-	-
C20-C30 (Lubricant Oil Range)	MJ710	2.20E+00	2.2E+00	J		-	-
C11-C30	MJ710	-	7.5E+00	-		-	-
Benzene	MJ710	-	-	-	1.2E-04	3.2E-04	3.2E-04
Ethylbenzene	MJ710	-	-	-	1.2E-04	3.2E-04	3.2E-04
Toluene	MJ710	-	-	-	1.2E-04	3.2E-04	3.2E-04
m,p-Xylene	MJ710	-	-	-	3.6E-04	9.5E-04	9.5E-04
o-Xylene	MJ710	-	-	-	8.0E-05	2.1E-04	2.1E-04
Xylene (total)	MJ710	-	-	-	4.4E-04	1.2E-03	1.2E-03
2-Methylnaphthalene	MJ710	2.10E-02	1.1E-02	U	2.8E-02	7.3E-02	1.1E-02
Acenaphthene	MJ710	2.10E-02	1.1E-02	U	5.7E-04	4.3E-03	4.3E-03
Acenaphthylene	MJ710	2.10E-02	1.1E-02	U	7.0E-05	5.3E-04	5.3E-04
Anthracene	MJ710	2.10E-02	1.1E-02	U	3.7E-04	2.8E-03	2.8E-03
Benzo(a)anthracene	MJ710	2.10E-02	1.1E-02	U	2.7E-05	2.0E-04	2.0E-04
Benzo(a)pyrene	MJ710	2.10E-02	1.1E-02	U	2.7E-05	2.0E-04	2.0E-04
Benzo(b)fluoranthene	MJ710	2.10E-02	1.1E-02	U	4.3E-05	3.2E-04	3.2E-04
Benzo(e)pyrene	MJ710	-	-	-	2.1E-04	1.6E-03	1.6E-03
Benzo(g,h,i)perylene	MJ710	2.10E-02	1.1E-02	U	2.2E-04	1.7E-03	1.7E-03
Benzo(k)fluoranthene	MJ710	2.10E-02	1.1E-02	U	2.1E-05	1.5E-04	1.5E-04
Chrysene	MJ710	2.10E-02	1.1E-02	U	5.9E-05	4.4E-04	4.4E-04

TPH to Petroleum Constituent Extrapolation for Soil (0-6 feet bgs) [a]
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Dibenz(a,h)anthracene	MJ710	2.10E-02	1.1E-02	U	1.1E-05	8.3E-05	8.3E-05
Fluoranthene	MJ710	2.10E-02	1.1E-02	U	7.5E-05	5.6E-04	5.6E-04
Fluorene	MJ710	2.10E-02	1.1E-02	U	5.7E-04	4.3E-03	4.3E-03
Indeno(1,2,3-cd)pyrene	MJ710	2.10E-02	1.1E-02	U	2.4E-05	1.8E-04	1.8E-04
Naphthalene	MJ710	2.10E-02	1.1E-02	U	6.9E-03	1.8E-02	1.1E-02
Perylene	MJ710	-	-	-	1.2E-04	8.8E-04	8.8E-04
Phenanthrene	MJ710	2.10E-02	1.1E-02	U	1.5E-03	1.1E-02	1.1E-02
Pyrene	MJ710	2.10E-02	1.1E-02	U	1.4E-04	1.0E-03	1.0E-03
C08-C11 (Gasoline Range)	MJ720	6.00E+00	3.0E+00	U		-	-
C11-C14 (Kerosene Range)	MJ720	6.00E+00	3.0E+00	U		-	-
C14-C20 (Diesel Range)	MJ720	6.00E+00	3.0E+00	U		-	-
C20-C30 (Lubricant Oil Range)	MJ720	6.00E+00	3.0E+00	U		-	-
C11-C30	MJ720	-	9.0E+00	-		-	-
Benzene	MJ720	-	-	-	1.2E-04	3.6E-04	3.6E-04
Ethylbenzene	MJ720	-	-	-	1.2E-04	3.6E-04	3.6E-04
Toluene	MJ720	-	-	-	1.2E-04	3.6E-04	3.6E-04
m,p-Xylene	MJ720	-	-	-	3.6E-04	1.1E-03	1.1E-03
o-Xylene	MJ720	-	-	-	8.0E-05	2.4E-04	2.4E-04
Xylene (total)	MJ720	-	-	-	4.4E-04	1.3E-03	1.3E-03
2-Methylnaphthalene	MJ720	-	-	-	2.8E-02	8.3E-02	8.3E-02
Acenaphthene	MJ720	-	-	-	5.7E-04	5.2E-03	5.2E-03
Acenaphthylene	MJ720	-	-	-	7.0E-05	6.3E-04	6.3E-04
Anthracene	MJ720	-	-	-	3.7E-04	3.4E-03	3.4E-03
Benzo(a)anthracene	MJ720	-	-	-	2.7E-05	2.4E-04	2.4E-04
Benzo(a)pyrene	MJ720	-	-	-	2.7E-05	2.4E-04	2.4E-04
Benzo(b)fluoranthene	MJ720	-	-	-	4.3E-05	3.9E-04	3.9E-04
Benzo(e)pyrene	MJ720	-	-	-	2.1E-04	1.9E-03	1.9E-03
Benzo(g,h,i)perylene	MJ720	-	-	-	2.2E-04	2.0E-03	2.0E-03
Benzo(k)fluoranthene	MJ720	-	-	-	2.1E-05	1.8E-04	1.8E-04
Chrysene	MJ720	-	-	-	5.9E-05	5.3E-04	5.3E-04
Dibenz(a,h)anthracene	MJ720	-	-	-	1.1E-05	1.0E-04	1.0E-04
Fluoranthene	MJ720	-	-	-	7.5E-05	6.7E-04	6.7E-04
Fluorene	MJ720	-	-	-	5.7E-04	5.1E-03	5.1E-03
Indeno(1,2,3-cd)pyrene	MJ720	-	-	-	2.4E-05	2.2E-04	2.2E-04
Naphthalene	MJ720	-	-	-	6.9E-03	2.1E-02	2.1E-02
Perylene	MJ720	-	-	-	1.2E-04	1.1E-03	1.1E-03
Phenanthrene	MJ720	-	-	-	1.5E-03	1.4E-02	1.4E-02
Pyrene	MJ720	-	-	-	1.4E-04	1.2E-03	1.2E-03
C08-C11 (Gasoline Range)	MJ739	5.60E+00	2.8E+00	U		-	-
C11-C14 (Kerosene Range)	MJ739	5.60E+00	2.8E+00	U		-	-
C14-C20 (Diesel Range)	MJ739	5.60E+00	2.8E+00	U		-	-
C20-C30 (Lubricant Oil Range)	MJ739	5.60E+00	2.8E+00	U		-	-
C11-C30	MJ739	-	8.4E+00	-		-	-
Benzene	MJ739	-	-	-	1.2E-04	3.4E-04	3.4E-04
Ethylbenzene	MJ739	-	-	-	1.2E-04	3.4E-04	3.4E-04
Toluene	MJ739	-	-	-	1.2E-04	3.4E-04	3.4E-04
m,p-Xylene	MJ739	-	-	-	3.6E-04	1.0E-03	1.0E-03
o-Xylene	MJ739	-	-	-	8.0E-05	2.2E-04	2.2E-04
Xylene (total)	MJ739	-	-	-	4.4E-04	1.2E-03	1.2E-03
2-Methylnaphthalene	MJ739	-	-	-	2.8E-02	7.7E-02	7.7E-02
Acenaphthene	MJ739	-	-	-	5.7E-04	4.8E-03	4.8E-03
Acenaphthylene	MJ739	-	-	-	7.0E-05	5.9E-04	5.9E-04
Anthracene	MJ739	-	-	-	3.7E-04	3.1E-03	3.1E-03
Benzo(a)anthracene	MJ739	-	-	-	2.7E-05	2.3E-04	2.3E-04
Benzo(a)pyrene	MJ739	-	-	-	2.7E-05	2.3E-04	2.3E-04
Benzo(b)fluoranthene	MJ739	-	-	-	4.3E-05	3.6E-04	3.6E-04

TPH to Petroleum Constituent Extrapolation for Soil (0-6 feet bgs) [a]
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Benzo(e)pyrene	MJ739	-	-	-	2.1E-04	1.7E-03	1.7E-03
Benzo(g,h,i)perylene	MJ739	-	-	-	2.2E-04	1.9E-03	1.9E-03
Benzo(k)fluoranthene	MJ739	-	-	-	2.1E-05	1.7E-04	1.7E-04
Chrysene	MJ739	-	-	-	5.9E-05	4.9E-04	4.9E-04
Dibenz(a,h)anthracene	MJ739	-	-	-	1.1E-05	9.3E-05	9.3E-05
Fluoranthene	MJ739	-	-	-	7.5E-05	6.3E-04	6.3E-04
Fluorene	MJ739	-	-	-	5.7E-04	4.8E-03	4.8E-03
Indeno(1,2,3-cd)pyrene	MJ739	-	-	-	2.4E-05	2.0E-04	2.0E-04
Naphthalene	MJ739	-	-	-	6.9E-03	1.9E-02	1.9E-02
Perylene	MJ739	-	-	-	1.2E-04	9.9E-04	9.9E-04
Phenanthrene	MJ739	-	-	-	1.5E-03	1.3E-02	1.3E-02
Pyrene	MJ739	-	-	-	1.4E-04	1.1E-03	1.1E-03
C08-C11 (Gasoline Range)	MJ787	3.00E+00	3.0E+00	J		-	-
C11-C14 (Kerosene Range)	MJ787	6.40E+00	3.2E+00	U		-	-
C14-C20 (Diesel Range)	MJ787	6.00E+00	6.0E+00	J		-	-
C20-C30 (Lubricant Oil Range)	MJ787	2.20E+01	2.2E+01	J		-	-
C11-C30	MJ787	-	3.1E+01	-		-	-
Benzene	MJ787	-	-	-	1.2E-04	3.6E-04	3.6E-04
Ethylbenzene	MJ787	-	-	-	1.2E-04	3.6E-04	3.6E-04
Toluene	MJ787	-	-	-	1.2E-04	3.6E-04	3.6E-04
m,p-Xylene	MJ787	-	-	-	3.6E-04	1.1E-03	1.1E-03
o-Xylene	MJ787	-	-	-	8.0E-05	2.4E-04	2.4E-04
Xylene (total)	MJ787	-	-	-	4.4E-04	1.3E-03	1.3E-03
2-Methylnaphthalene	MJ787	5.20E-03	5.2E-03	J	2.8E-02	8.3E-02	5.2E-03
Acenaphthene	MJ787	2.70E-02	1.4E-02	U	5.7E-04	1.8E-02	1.4E-02
Acenaphthylene	MJ787	2.70E-02	1.4E-02	U	7.0E-05	2.2E-03	2.2E-03
Anthracene	MJ787	2.70E-02	1.4E-02	U	3.7E-04	1.2E-02	1.2E-02
Benzo(a)anthracene	MJ787	9.00E-03	9.0E-03	J	2.7E-05	8.4E-04	9.0E-03
Benzo(a)pyrene	MJ787	3.60E-03	3.6E-03	J	2.7E-05	8.5E-04	3.6E-03
Benzo(b)fluoranthene	MJ787	3.90E-03	3.9E-03	J	4.3E-05	1.4E-03	3.9E-03
Benzo(e)pyrene	MJ787	-	-	-	2.1E-04	6.5E-03	6.5E-03
Benzo(g,h,i)perylene	MJ787	4.80E-03	4.8E-03	J	2.2E-04	6.9E-03	4.8E-03
Benzo(k)fluoranthene	MJ787	2.70E-02	1.4E-02	U	2.1E-05	6.4E-04	6.4E-04
Chrysene	MJ787	2.80E-02	2.8E-02		5.9E-05	1.8E-03	2.8E-02
Dibenz(a,h)anthracene	MJ787	2.70E-02	1.4E-02	U	1.1E-05	3.5E-04	3.5E-04
Fluoranthene	MJ787	1.20E-02	1.2E-02	J	7.5E-05	2.3E-03	1.2E-02
Fluorene	MJ787	2.70E-02	1.4E-02	U	5.7E-04	1.8E-02	1.4E-02
Indeno(1,2,3-cd)pyrene	MJ787	2.70E-02	1.4E-02	U	2.4E-05	7.5E-04	7.5E-04
Naphthalene	MJ787	1.10E-02	1.1E-02	J	6.9E-03	2.1E-02	1.1E-02
Perylene	MJ787	-	-	-	1.2E-04	3.7E-03	3.7E-03
Phenanthrene	MJ787	1.00E-02	1.0E-02	J	1.5E-03	4.8E-02	1.0E-02
Pyrene	MJ787	1.20E-02	1.2E-02	J	1.4E-04	4.3E-03	1.2E-02
C08-C11 (Gasoline Range)	MJ788	6.10E+00	3.1E+00	U		-	-
C11-C14 (Kerosene Range)	MJ788	6.10E+00	3.1E+00	U		-	-
C14-C20 (Diesel Range)	MJ788	6.10E+00	3.1E+00	U		-	-
C20-C30 (Lubricant Oil Range)	MJ788	2.50E+00	2.5E+00	J		-	-
C11-C30	MJ788	-	8.6E+00	-		-	-
Benzene	MJ788	-	-	-	1.2E-04	3.7E-04	3.7E-04
Ethylbenzene	MJ788	-	-	-	1.2E-04	3.7E-04	3.7E-04
Toluene	MJ788	-	-	-	1.2E-04	3.7E-04	3.7E-04
m,p-Xylene	MJ788	-	-	-	3.6E-04	1.1E-03	1.1E-03
o-Xylene	MJ788	-	-	-	8.0E-05	2.4E-04	2.4E-04
Xylene (total)	MJ788	-	-	-	4.4E-04	1.3E-03	1.3E-03
2-Methylnaphthalene	MJ788	2.40E-02	1.2E-02	U	2.8E-02	8.4E-02	1.2E-02
Acenaphthene	MJ788	2.40E-02	1.2E-02	U	5.7E-04	4.9E-03	4.9E-03
Acenaphthylene	MJ788	2.40E-02	1.2E-02	U	7.0E-05	6.0E-04	6.0E-04

TPH to Petroleum Constituent Extrapolation for Soil (0-6 feet bgs) [a]
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Anthracene	MJ788	2.40E-02	1.2E-02	U	3.7E-04	3.2E-03	3.2E-03
Benzo(a)anthracene	MJ788	4.10E-03	4.1E-03	J	2.7E-05	2.3E-04	4.1E-03
Benzo(a)pyrene	MJ788	2.40E-02	1.2E-02	U	2.7E-05	2.3E-04	2.3E-04
Benzo(b)fluoranthene	MJ788	2.40E-02	1.2E-02	U	4.3E-05	3.7E-04	3.7E-04
Benzo(e)pyrene	MJ788	-	-	-	2.1E-04	1.8E-03	1.8E-03
Benzo(g,h,i)perylene	MJ788	2.40E-02	1.2E-02	U	2.2E-04	1.9E-03	1.9E-03
Benzo(k)fluoranthene	MJ788	2.40E-02	1.2E-02	U	2.1E-05	1.8E-04	1.8E-04
Chrysene	MJ788	2.40E-02	1.2E-02	U	5.9E-05	5.0E-04	5.0E-04
Dibenz(a,h)anthracene	MJ788	2.40E-02	1.2E-02	U	1.1E-05	9.5E-05	9.5E-05
Fluoranthene	MJ788	2.40E-02	1.2E-02	U	7.5E-05	6.4E-04	6.4E-04
Fluorene	MJ788	2.40E-02	1.2E-02	U	5.7E-04	4.9E-03	4.9E-03
Indeno(1,2,3-cd)pyrene	MJ788	2.40E-02	1.2E-02	U	2.4E-05	2.1E-04	2.1E-04
Naphthalene	MJ788	2.40E-02	1.2E-02	U	6.9E-03	2.1E-02	1.2E-02
Perylene	MJ788	-	-	-	1.2E-04	1.0E-03	1.0E-03
Phenanthrene	MJ788	2.40E-02	1.2E-02	U	1.5E-03	1.3E-02	1.2E-02
Pyrene	MJ788	2.40E-02	1.2E-02	U	1.4E-04	1.2E-03	1.2E-03
C08-C11 (Gasoline Range)	MJ789	2.30E+00	2.3E+00	J		-	-
C11-C14 (Kerosene Range)	MJ789	5.60E+00	2.8E+00	U		-	-
C14-C20 (Diesel Range)	MJ789	3.30E+00	3.3E+00	J		-	-
C20-C30 (Lubricant Oil Range)	MJ789	1.40E+01	1.4E+01	J		-	-
C11-C30	MJ789	-	2.0E+01	-		-	-
Benzene	MJ789	-	-	-	1.2E-04	2.8E-04	2.8E-04
Ethylbenzene	MJ789	-	-	-	1.2E-04	2.8E-04	2.8E-04
Toluene	MJ789	-	-	-	1.2E-04	2.8E-04	2.8E-04
m,p-Xylene	MJ789	-	-	-	3.6E-04	8.3E-04	8.3E-04
o-Xylene	MJ789	-	-	-	8.0E-05	1.8E-04	1.8E-04
Xylene (total)	MJ789	-	-	-	4.4E-04	1.0E-03	1.0E-03
2-Methylnaphthalene	MJ789	2.20E-02	1.1E-02	U	2.8E-02	6.3E-02	1.1E-02
Acenaphthene	MJ789	2.20E-02	1.1E-02	U	5.7E-04	1.2E-02	1.1E-02
Acenaphthylene	MJ789	2.20E-02	1.1E-02	U	7.0E-05	1.4E-03	1.4E-03
Anthracene	MJ789	2.20E-02	1.1E-02	U	3.7E-04	7.5E-03	7.5E-03
Benzo(a)anthracene	MJ789	2.20E-02	1.1E-02	U	2.7E-05	5.4E-04	5.4E-04
Benzo(a)pyrene	MJ789	2.20E-02	1.1E-02	U	2.7E-05	5.5E-04	5.5E-04
Benzo(b)fluoranthene	MJ789	2.20E-02	1.1E-02	U	4.3E-05	8.7E-04	8.7E-04
Benzo(e)pyrene	MJ789	-	-	-	2.1E-04	4.2E-03	4.2E-03
Benzo(g,h,i)perylene	MJ789	2.20E-02	1.1E-02	U	2.2E-04	4.4E-03	4.4E-03
Benzo(k)fluoranthene	MJ789	2.20E-02	1.1E-02	U	2.1E-05	4.1E-04	4.1E-04
Chrysene	MJ789	2.20E-02	1.1E-02	U	5.9E-05	1.2E-03	1.2E-03
Dibenz(a,h)anthracene	MJ789	2.20E-02	1.1E-02	U	1.1E-05	2.2E-04	2.2E-04
Fluoranthene	MJ789	2.20E-02	1.1E-02	U	7.5E-05	1.5E-03	1.5E-03
Fluorene	MJ789	2.20E-02	1.1E-02	U	5.7E-04	1.1E-02	1.1E-02
Indeno(1,2,3-cd)pyrene	MJ789	2.20E-02	1.1E-02	U	2.4E-05	4.8E-04	4.8E-04
Naphthalene	MJ789	2.20E-02	1.1E-02	U	6.9E-03	1.6E-02	1.1E-02
Perylene	MJ789	2.20E-02	1.1E-02	U	1.2E-04	2.4E-03	2.4E-03
Phenanthrene	MJ789	2.20E-02	1.1E-02	U	1.5E-03	3.1E-02	1.1E-02
Pyrene	MJ789	2.20E-02	1.1E-02	U	1.4E-04	2.7E-03	2.7E-03
C08-C11 (Gasoline Range)	MJ790	2.70E+00	2.7E+00	J		-	-
C11-C14 (Kerosene Range)	MJ790	6.10E+00	3.1E+00	U		-	-
C14-C20 (Diesel Range)	MJ790	3.10E+00	3.1E+00	J		-	-
C20-C30 (Lubricant Oil Range)	MJ790	1.00E+01	1.0E+01	J		-	-
C11-C30	MJ790	-	1.6E+01	-		-	-
Benzene	MJ790	-	-	-	1.2E-04	3.2E-04	3.2E-04
Ethylbenzene	MJ790	-	-	-	1.2E-04	3.2E-04	3.2E-04
Toluene	MJ790	-	-	-	1.2E-04	3.2E-04	3.2E-04
m,p-Xylene	MJ790	-	-	-	3.6E-04	9.7E-04	9.7E-04
o-Xylene	MJ790	-	-	-	8.0E-05	2.2E-04	2.2E-04

TPH to Petroleum Constituent Extrapolation for Soil (0-6 feet bgs) [a]
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Xylene (total)	MJ790	-	-	-	4.4E-04	1.2E-03	1.2E-03
2-Methylnaphthalene	MJ790	2.40E-02	1.2E-02	U	2.8E-02	7.4E-02	1.2E-02
Acenaphthene	MJ790	2.40E-02	1.2E-02	U	5.7E-04	9.3E-03	9.3E-03
Acenaphthylene	MJ790	2.40E-02	1.2E-02	U	7.0E-05	1.1E-03	1.1E-03
Anthracene	MJ790	2.40E-02	1.2E-02	U	3.7E-04	6.0E-03	6.0E-03
Benzo(a)anthracene	MJ790	2.40E-02	1.2E-02	U	2.7E-05	4.4E-04	4.4E-04
Benzo(a)pyrene	MJ790	2.40E-02	1.2E-02	U	2.7E-05	4.4E-04	4.4E-04
Benzo(b)fluoranthene	MJ790	2.40E-02	1.2E-02	U	4.3E-05	7.0E-04	7.0E-04
Benzo(e)pyrene	MJ790	-	-	-	2.1E-04	3.3E-03	3.3E-03
Benzo(g,h,i)perylene	MJ790	2.40E-02	1.2E-02	U	2.2E-04	3.6E-03	3.6E-03
Benzo(k)fluoranthene	MJ790	2.40E-02	1.2E-02	U	2.1E-05	3.3E-04	3.3E-04
Chrysene	MJ790	2.40E-02	1.2E-02	U	5.9E-05	9.5E-04	9.5E-04
Dibenz(a,h)anthracene	MJ790	2.40E-02	1.2E-02	U	1.1E-05	1.8E-04	1.8E-04
Fluoranthene	MJ790	2.40E-02	1.2E-02	U	7.5E-05	1.2E-03	1.2E-03
Fluorene	MJ790	2.40E-02	1.2E-02	U	5.7E-04	9.2E-03	9.2E-03
Indeno(1,2,3-cd)pyrene	MJ790	2.40E-02	1.2E-02	U	2.4E-05	3.9E-04	3.9E-04
Naphthalene	MJ790	2.40E-02	1.2E-02	U	6.9E-03	1.9E-02	1.2E-02
Perylene	MJ790	-	-	-	1.2E-04	1.9E-03	1.9E-03
Phenanthrene	MJ790	2.40E-02	1.2E-02	U	1.5E-03	2.5E-02	1.2E-02
Pyrene	MJ790	2.40E-02	1.2E-02	U	1.4E-04	2.2E-03	2.2E-03
C08-C11 (Gasoline Range)	MJ791	5.80E+00	2.9E+00	U		-	-
C11-C14 (Kerosene Range)	MJ791	5.80E+00	2.9E+00	U		-	-
C14-C20 (Diesel Range)	MJ791	5.80E+00	2.9E+00	U		-	-
C20-C30 (Lubricant Oil Range)	MJ791	5.80E+00	2.9E+00	U		-	-
C11-C30	MJ791	-	8.7E+00	-		-	-
Benzene	MJ791	-	-	-	1.2E-04	3.5E-04	3.5E-04
Ethylbenzene	MJ791	-	-	-	1.2E-04	3.5E-04	3.5E-04
Toluene	MJ791	-	-	-	1.2E-04	3.5E-04	3.5E-04
m,p-Xylene	MJ791	-	-	-	3.6E-04	1.0E-03	1.0E-03
o-Xylene	MJ791	-	-	-	8.0E-05	2.3E-04	2.3E-04
Xylene (total)	MJ791	-	-	-	4.4E-04	1.3E-03	1.3E-03
2-Methylnaphthalene	MJ791	2.30E-02	1.2E-02	U	2.8E-02	8.0E-02	1.2E-02
Acenaphthene	MJ791	2.30E-02	1.2E-02	U	5.7E-04	5.0E-03	5.0E-03
Acenaphthylene	MJ791	2.30E-02	1.2E-02	U	7.0E-05	6.1E-04	6.1E-04
Anthracene	MJ791	2.30E-02	1.2E-02	U	3.7E-04	3.2E-03	3.2E-03
Benzo(a)anthracene	MJ791	3.30E-03	3.3E-03	J	2.7E-05	2.3E-04	3.3E-03
Benzo(a)pyrene	MJ791	2.30E-02	1.2E-02	U	2.7E-05	2.4E-04	2.4E-04
Benzo(b)fluoranthene	MJ791	2.30E-02	1.2E-02	U	4.3E-05	3.8E-04	3.8E-04
Benzo(e)pyrene	MJ791	-	-	-	2.1E-04	1.8E-03	1.8E-03
Benzo(g,h,i)perylene	MJ791	2.30E-02	1.2E-02	U	2.2E-04	1.9E-03	1.9E-03
Benzo(k)fluoranthene	MJ791	2.30E-02	1.2E-02	U	2.1E-05	1.8E-04	1.8E-04
Chrysene	MJ791	2.30E-02	1.2E-02	U	5.9E-05	5.1E-04	5.1E-04
Dibenz(a,h)anthracene	MJ791	2.30E-02	1.2E-02	U	1.1E-05	9.6E-05	9.6E-05
Fluoranthene	MJ791	2.30E-02	1.2E-02	U	7.5E-05	6.5E-04	6.5E-04
Fluorene	MJ791	2.30E-02	1.2E-02	U	5.7E-04	4.9E-03	4.9E-03
Indeno(1,2,3-cd)pyrene	MJ791	2.30E-02	1.2E-02	U	2.4E-05	2.1E-04	2.1E-04
Naphthalene	MJ791	2.30E-02	1.2E-02	U	6.9E-03	2.0E-02	1.2E-02
Perylene	MJ791	-	-	-	1.2E-04	1.0E-03	1.0E-03
Phenanthrene	MJ791	2.30E-02	1.2E-02	U	1.5E-03	1.3E-02	1.2E-02
Pyrene	MJ791	2.30E-02	1.2E-02	U	1.4E-04	1.2E-03	1.2E-03
C08-C11 (Gasoline Range)	MJ794	6.00E+00	3.0E+00	U		-	-
C11-C14 (Kerosene Range)	MJ794	6.00E+00	3.0E+00	U		-	-
C14-C20 (Diesel Range)	MJ794	6.00E+00	3.0E+00	U		-	-
C20-C30 (Lubricant Oil Range)	MJ794	7.70E+00	7.7E+00	J		-	-
C11-C30	MJ794	-	1.4E+01	-		-	-
Benzene	MJ794	-	-	-	1.2E-04	3.6E-04	3.6E-04

TPH to Petroleum Constituent Extrapolation for Soil (0-6 feet bgs) [a]
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Ethylbenzene	MJ794	-	-	-	1.2E-04	3.6E-04	3.6E-04
Toluene	MJ794	-	-	-	1.2E-04	3.6E-04	3.6E-04
m,p-Xylene	MJ794	-	-	-	3.6E-04	1.1E-03	1.1E-03
o-Xylene	MJ794	-	-	-	8.0E-05	2.4E-04	2.4E-04
Xylene (total)	MJ794	-	-	-	4.4E-04	1.3E-03	1.3E-03
2-Methylnaphthalene	MJ794	2.40E-02	1.2E-02	U	2.8E-02	8.3E-02	1.2E-02
Acenaphthene	MJ794	2.40E-02	1.2E-02	U	5.7E-04	7.8E-03	7.8E-03
Acenaphthylene	MJ794	2.40E-02	1.2E-02	U	7.0E-05	9.6E-04	9.6E-04
Anthracene	MJ794	2.40E-02	1.2E-02	U	3.7E-04	5.1E-03	5.1E-03
Benzo(a)anthracene	MJ794	4.40E-03	4.4E-03	J	2.7E-05	3.7E-04	4.4E-03
Benzo(a)pyrene	MJ794	2.40E-02	1.2E-02	U	2.7E-05	3.7E-04	3.7E-04
Benzo(b)fluoranthene	MJ794	2.40E-02	1.2E-02	U	4.3E-05	5.9E-04	5.9E-04
Benzo(e)pyrene	MJ794	-	-	-	2.1E-04	2.8E-03	2.8E-03
Benzo(g,h,i)perylene	MJ794	2.40E-02	1.2E-02	U	2.2E-04	3.0E-03	3.0E-03
Benzo(k)fluoranthene	MJ794	2.40E-02	1.2E-02	U	2.1E-05	2.8E-04	2.8E-04
Chrysene	MJ794	2.40E-02	1.2E-02	U	5.9E-05	8.0E-04	8.0E-04
Dibenz(a,h)anthracene	MJ794	2.40E-02	1.2E-02	U	1.1E-05	1.5E-04	1.5E-04
Fluoranthene	MJ794	2.40E-02	1.2E-02	U	7.5E-05	1.0E-03	1.0E-03
Fluorene	MJ794	2.40E-02	1.2E-02	U	5.7E-04	7.8E-03	7.8E-03
Indeno(1,2,3-cd)pyrene	MJ794	2.40E-02	1.2E-02	U	2.4E-05	3.3E-04	3.3E-04
Naphthalene	MJ794	2.40E-02	1.2E-02	U	6.9E-03	2.1E-02	1.2E-02
Perylene	MJ794	-	-	-	1.2E-04	1.6E-03	1.6E-03
Phenanthrene	MJ794	2.40E-02	1.2E-02	U	1.5E-03	2.1E-02	1.2E-02
Pyrene	MJ794	2.40E-02	1.2E-02	U	1.4E-04	1.9E-03	1.9E-03
C08-C11 (Gasoline Range)	MJ795	2.10E+01	1.1E+01	U		-	-
C11-C14 (Kerosene Range)	MJ795	2.10E+01	1.1E+01	U		-	-
C14-C20 (Diesel Range)	MJ795	2.10E+01	1.1E+01	U		-	-
C20-C30 (Lubricant Oil Range)	MJ795	2.80E+01	2.8E+01	J		-	-
C11-C30	MJ795	-	4.9E+01	-		-	-
Benzene	MJ795	-	-	-	1.2E-04	1.3E-03	1.3E-03
Ethylbenzene	MJ795	-	-	-	1.2E-04	1.3E-03	1.3E-03
Toluene	MJ795	-	-	-	1.2E-04	1.3E-03	1.3E-03
m,p-Xylene	MJ795	-	-	-	3.6E-04	3.8E-03	3.8E-03
o-Xylene	MJ795	-	-	-	8.0E-05	8.4E-04	8.4E-04
Xylene (total)	MJ795	-	-	-	4.4E-04	4.6E-03	4.6E-03
2-Methylnaphthalene	MJ795	1.10E-02	1.1E-02	J	2.8E-02	2.9E-01	1.1E-02
Acenaphthene	MJ795	1.50E-02	1.5E-02	J	5.7E-04	2.8E-02	1.5E-02
Acenaphthylene	MJ795	2.80E-02	1.4E-02	U	7.0E-05	3.4E-03	3.4E-03
Anthracene	MJ795	2.80E-02	1.4E-02	U	3.7E-04	1.8E-02	1.4E-02
Benzo(a)anthracene	MJ795	6.30E-03	6.3E-03	J	2.7E-05	1.3E-03	6.3E-03
Benzo(a)pyrene	MJ795	2.80E-02	1.4E-02	U	2.7E-05	1.3E-03	1.3E-03
Benzo(b)fluoranthene	MJ795	2.80E-02	1.4E-02	U	4.3E-05	2.1E-03	2.1E-03
Benzo(e)pyrene	MJ795	-	-	-	2.1E-04	1.0E-02	1.0E-02
Benzo(g,h,i)perylene	MJ795	2.80E-02	1.4E-02	U	2.2E-04	1.1E-02	1.1E-02
Benzo(k)fluoranthene	MJ795	2.80E-02	1.4E-02	U	2.1E-05	1.0E-03	1.0E-03
Chrysene	MJ795	2.80E-02	1.4E-02	U	5.9E-05	2.9E-03	2.9E-03
Dibenz(a,h)anthracene	MJ795	2.80E-02	1.4E-02	U	1.1E-05	5.4E-04	5.4E-04
Fluoranthene	MJ795	5.80E-03	5.8E-03	J	7.5E-05	3.7E-03	5.8E-03
Fluorene	MJ795	2.80E-02	1.4E-02	U	5.7E-04	2.8E-02	1.4E-02
Indeno(1,2,3-cd)pyrene	MJ795	2.80E-02	1.4E-02	U	2.4E-05	1.2E-03	1.2E-03
Naphthalene	MJ795	2.20E-02	2.2E-02	J	6.9E-03	7.3E-02	2.2E-02
Perylene	MJ795	-	-	-	1.2E-04	5.8E-03	5.8E-03
Phenanthrene	MJ795	9.40E-03	9.4E-03	J	1.5E-03	7.5E-02	9.4E-03
Pyrene	MJ795	1.90E-02	1.9E-02	J	1.4E-04	6.7E-03	1.9E-02
C08-C11 (Gasoline Range)	MJ796	1.30E+01	6.5E+00	U		-	-
C11-C14 (Kerosene Range)	MJ796	1.30E+01	6.5E+00	U		-	-

TPH to Petroleum Constituent Extrapolation for Soil (0-6 feet bgs) [a]
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
C14-C20 (Diesel Range)	MJ796	8.50E+00	8.5E+00	J		-	-
C20-C30 (Lubricant Oil Range)	MJ796	2.10E+01	2.1E+01	J		-	-
C11-C30	MJ796	-	3.6E+01	-		-	-
Benzene	MJ796	-	-	-	1.2E-04	7.8E-04	7.8E-04
Ethylbenzene	MJ796	-	-	-	1.2E-04	7.8E-04	7.8E-04
Toluene	MJ796	-	-	-	1.2E-04	7.8E-04	7.8E-04
m,p-Xylene	MJ796	-	-	-	3.6E-04	2.3E-03	2.3E-03
o-Xylene	MJ796	-	-	-	8.0E-05	5.2E-04	5.2E-04
Xylene (total)	MJ796	-	-	-	4.4E-04	2.9E-03	2.9E-03
2-Methylnaphthalene	MJ796	2.60E-02	1.3E-02	U	2.8E-02	1.8E-01	1.3E-02
Acenaphthene	MJ796	2.60E-02	1.3E-02	U	5.7E-04	2.1E-02	1.3E-02
Acenaphthylene	MJ796	2.60E-02	1.3E-02	U	7.0E-05	2.5E-03	2.5E-03
Anthracene	MJ796	2.60E-02	1.3E-02	U	3.7E-04	1.3E-02	1.3E-02
Benzo(a)anthracene	MJ796	5.70E-03	5.7E-03	J	2.7E-05	9.7E-04	5.7E-03
Benzo(a)pyrene	MJ796	2.60E-02	1.3E-02	U	2.7E-05	9.8E-04	9.8E-04
Benzo(b)fluoranthene	MJ796	2.60E-02	1.3E-02	U	4.3E-05	1.6E-03	1.6E-03
Benzo(e)pyrene	MJ796	-	-	-	2.1E-04	7.4E-03	7.4E-03
Benzo(g,h,i)perylene	MJ796	2.60E-02	1.3E-02	U	2.2E-04	8.0E-03	8.0E-03
Benzo(k)fluoranthene	MJ796	2.60E-02	1.3E-02	U	2.1E-05	7.4E-04	7.4E-04
Chrysene	MJ796	7.20E-03	7.2E-03	J	5.9E-05	2.1E-03	7.2E-03
Dibenz(a,h)anthracene	MJ796	2.60E-02	1.3E-02	U	1.1E-05	4.0E-04	4.0E-04
Fluoranthene	MJ796	5.50E-03	5.5E-03	J	7.5E-05	2.7E-03	5.5E-03
Fluorene	MJ796	2.60E-02	1.3E-02	U	5.7E-04	2.0E-02	1.3E-02
Indeno(1,2,3-cd)pyrene	MJ796	2.60E-02	1.3E-02	U	2.4E-05	8.7E-04	8.7E-04
Naphthalene	MJ796	6.20E-03	6.2E-03	J	6.9E-03	4.5E-02	6.2E-03
Perylene	MJ796	-	-	-	1.2E-04	4.2E-03	4.2E-03
Phenanthrene	MJ796	2.60E-02	1.3E-02	U	1.5E-03	5.5E-02	1.3E-02
Pyrene	MJ796	5.90E-03	5.9E-03	J	1.4E-04	4.9E-03	5.9E-03
C08-C11 (Gasoline Range)	MJ798	7.30E+00	7.3E+00	J		-	-
C11-C14 (Kerosene Range)	MJ798	3.30E+00	3.3E+00	J		-	-
C14-C20 (Diesel Range)	MJ798	1.10E+01	1.1E+01	J		-	-
C20-C30 (Lubricant Oil Range)	MJ798	6.40E+01	6.4E+01			-	-
C11-C30	MJ798	-	7.8E+01	-		-	-
Benzene	MJ798	-	-	-	1.2E-04	8.8E-04	8.8E-04
Ethylbenzene	MJ798	-	-	-	1.2E-04	8.8E-04	8.8E-04
Toluene	MJ798	-	-	-	1.2E-04	8.8E-04	8.8E-04
m,p-Xylene	MJ798	-	-	-	3.6E-04	2.6E-03	2.6E-03
o-Xylene	MJ798	-	-	-	8.0E-05	5.8E-04	5.8E-04
Xylene (total)	MJ798	-	-	-	4.4E-04	3.2E-03	3.2E-03
2-Methylnaphthalene	MJ798	7.10E-03	7.1E-03	J	2.8E-02	2.0E-01	7.1E-03
Acenaphthene	MJ798	1.30E-02	1.3E-02	J	5.7E-04	4.5E-02	1.3E-02
Acenaphthylene	MJ798	2.20E-02	1.1E-02	U	7.0E-05	5.5E-03	5.5E-03
Anthracene	MJ798	2.20E-02	1.1E-02	U	3.7E-04	2.9E-02	1.1E-02
Benzo(a)anthracene	MJ798	2.20E-02	1.1E-02	U	2.7E-05	2.1E-03	2.1E-03
Benzo(a)pyrene	MJ798	5.90E-03	5.9E-03	J	2.7E-05	2.1E-03	5.9E-03
Benzo(b)fluoranthene	MJ798	2.20E-02	1.1E-02	U	4.3E-05	3.4E-03	3.4E-03
Benzo(e)pyrene	MJ798	-	-	-	2.1E-04	1.6E-02	1.6E-02
Benzo(g,h,i)perylene	MJ798	4.90E-03	4.9E-03	J	2.2E-04	1.7E-02	4.9E-03
Benzo(k)fluoranthene	MJ798	1.40E-02	1.4E-02	J	2.1E-05	1.6E-03	1.4E-02
Chrysene	MJ798	5.30E-02	5.3E-02		5.9E-05	4.6E-03	5.3E-02
Dibenz(a,h)anthracene	MJ798	2.20E-02	1.1E-02	U	1.1E-05	8.7E-04	8.7E-04
Fluoranthene	MJ798	2.10E-02	2.1E-02	J	7.5E-05	5.9E-03	2.1E-02
Fluorene	MJ798	2.20E-02	1.1E-02	U	5.7E-04	4.4E-02	1.1E-02
Indeno(1,2,3-cd)pyrene	MJ798	2.20E-02	1.1E-02	U	2.4E-05	1.9E-03	1.9E-03
Naphthalene	MJ798	9.10E-03	9.1E-03	J	6.9E-03	5.1E-02	9.1E-03
Perylene	MJ798	-	-	-	1.2E-04	9.2E-03	9.2E-03

TPH to Petroleum Constituent Extrapolation for Soil (0-6 feet bgs) [a]
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Phenanthrene	MJ798	1.10E-02	1.1E-02	J	1.5E-03	1.2E-01	1.1E-02
Pyrene	MJ798	1.80E-02	1.8E-02	J	1.4E-04	1.1E-02	1.8E-02
C08-C11 (Gasoline Range)	MJ799	5.40E+00	2.7E+00	U		-	-
C11-C14 (Kerosene Range)	MJ799	5.40E+00	2.7E+00	U		-	-
C14-C20 (Diesel Range)	MJ799	2.70E+00	2.7E+00	J		-	-
C20-C30 (Lubricant Oil Range)	MJ799	1.60E+01	1.6E+01	J		-	-
C11-C30	MJ799	-	2.1E+01	-		-	-
Benzene	MJ799	-	-	-	1.2E-04	3.2E-04	3.2E-04
Ethylbenzene	MJ799	-	-	-	1.2E-04	3.2E-04	3.2E-04
Toluene	MJ799	-	-	-	1.2E-04	3.2E-04	3.2E-04
m,p-Xylene	MJ799	-	-	-	3.6E-04	9.7E-04	9.7E-04
o-Xylene	MJ799	-	-	-	8.0E-05	2.2E-04	2.2E-04
Xylene (total)	MJ799	-	-	-	4.4E-04	1.2E-03	1.2E-03
2-Methylnaphthalene	MJ799	2.20E-02	1.1E-02	U	2.8E-02	7.4E-02	1.1E-02
Acenaphthene	MJ799	2.20E-02	1.1E-02	U	5.7E-04	1.2E-02	1.1E-02
Acenaphthylene	MJ799	2.20E-02	1.1E-02	U	7.0E-05	1.5E-03	1.5E-03
Anthracene	MJ799	2.20E-02	1.1E-02	U	3.7E-04	8.0E-03	8.0E-03
Benzo(a)anthracene	MJ799	3.40E-03	3.4E-03	J	2.7E-05	5.8E-04	3.4E-03
Benzo(a)pyrene	MJ799	2.20E-02	1.1E-02	U	2.7E-05	5.8E-04	5.8E-04
Benzo(b)fluoranthene	MJ799	2.20E-02	1.1E-02	U	4.3E-05	9.3E-04	9.3E-04
Benzo(e)pyrene	MJ799	-	-	-	2.1E-04	4.4E-03	4.4E-03
Benzo(g,h,i)perylene	MJ799	2.20E-02	1.1E-02	U	2.2E-04	4.7E-03	4.7E-03
Benzo(k)fluoranthene	MJ799	2.20E-02	1.1E-02	U	2.1E-05	4.4E-04	4.4E-04
Chrysene	MJ799	2.20E-02	1.1E-02	U	5.9E-05	1.3E-03	1.3E-03
Dibenz(a,h)anthracene	MJ799	2.20E-02	1.1E-02	U	1.1E-05	2.4E-04	2.4E-04
Fluoranthene	MJ799	2.20E-02	1.1E-02	U	7.5E-05	1.6E-03	1.6E-03
Fluorene	MJ799	2.20E-02	1.1E-02	U	5.7E-04	1.2E-02	1.1E-02
Indeno(1,2,3-cd)pyrene	MJ799	2.20E-02	1.1E-02	U	2.4E-05	5.1E-04	5.1E-04
Naphthalene	MJ799	2.20E-02	1.1E-02	U	6.9E-03	1.9E-02	1.1E-02
Perylene	MJ799	-	-	-	1.2E-04	2.5E-03	2.5E-03
Phenanthrene	MJ799	2.20E-02	1.1E-02	U	1.5E-03	3.3E-02	1.1E-02
Pyrene	MJ799	2.20E-02	1.1E-02	U	1.4E-04	2.9E-03	2.9E-03
C08-C11 (Gasoline Range)	MJ800	1.10E+01	5.5E+00	U		-	-
C11-C14 (Kerosene Range)	MJ800	1.10E+01	5.5E+00	U		-	-
C14-C20 (Diesel Range)	MJ800	1.10E+01	5.5E+00	U		-	-
C20-C30 (Lubricant Oil Range)	MJ800	5.20E+00	5.2E+00	J		-	-
C11-C30	MJ800	-	1.6E+01	-		-	-
Benzene	MJ800	-	-	-	1.2E-04	6.6E-04	6.6E-04
Ethylbenzene	MJ800	-	-	-	1.2E-04	6.6E-04	6.6E-04
Toluene	MJ800	-	-	-	1.2E-04	6.6E-04	6.6E-04
m,p-Xylene	MJ800	-	-	-	3.6E-04	2.0E-03	2.0E-03
o-Xylene	MJ800	-	-	-	8.0E-05	4.4E-04	4.4E-04
Xylene (total)	MJ800	-	-	-	4.4E-04	2.4E-03	2.4E-03
2-Methylnaphthalene	MJ800	2.20E-02	1.1E-02	U	2.8E-02	1.5E-01	1.1E-02
Acenaphthene	MJ800	2.20E-02	1.1E-02	U	5.7E-04	9.3E-03	9.3E-03
Acenaphthylene	MJ800	2.20E-02	1.1E-02	U	7.0E-05	1.1E-03	1.1E-03
Anthracene	MJ800	2.20E-02	1.1E-02	U	3.7E-04	6.0E-03	6.0E-03
Benzo(a)anthracene	MJ800	2.20E-02	1.1E-02	U	2.7E-05	4.4E-04	4.4E-04
Benzo(a)pyrene	MJ800	2.20E-02	1.1E-02	U	2.7E-05	4.4E-04	4.4E-04
Benzo(b)fluoranthene	MJ800	2.20E-02	1.1E-02	U	4.3E-05	7.0E-04	7.0E-04
Benzo(e)pyrene	MJ800	-	-	-	2.1E-04	3.3E-03	3.3E-03
Benzo(g,h,i)perylene	MJ800	2.20E-02	1.1E-02	U	2.2E-04	3.6E-03	3.6E-03
Benzo(k)fluoranthene	MJ800	2.20E-02	1.1E-02	U	2.1E-05	3.3E-04	3.3E-04
Chrysene	MJ800	2.20E-02	1.1E-02	U	5.9E-05	9.5E-04	9.5E-04
Dibenz(a,h)anthracene	MJ800	2.20E-02	1.1E-02	U	1.1E-05	1.8E-04	1.8E-04
Fluoranthene	MJ800	2.20E-02	1.1E-02	U	7.5E-05	1.2E-03	1.2E-03

TPH to Petroleum Constituent Extrapolation for Soil (0-6 feet bgs) [a]
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Fluorene	MJ800	2.20E-02	1.1E-02	U	5.7E-04	9.2E-03	9.2E-03
Indeno(1,2,3-cd)pyrene	MJ800	2.20E-02	1.1E-02	U	2.4E-05	3.9E-04	3.9E-04
Naphthalene	MJ800	2.20E-02	1.1E-02	U	6.9E-03	3.8E-02	1.1E-02
Perylene	MJ800	-	-	-	1.2E-04	1.9E-03	1.9E-03
Phenanthrene	MJ800	2.20E-02	1.1E-02	U	1.5E-03	2.5E-02	1.1E-02
Pyrene	MJ800	2.20E-02	1.1E-02	U	1.4E-04	2.2E-03	2.2E-03
C08-C11 (Gasoline Range)	MJ806	5.70E+00	2.9E+00	U		-	-
C11-C14 (Kerosene Range)	MJ806	5.70E+00	2.9E+00	U		-	-
C14-C20 (Diesel Range)	MJ806	5.70E+00	2.9E+00	U		-	-
C20-C30 (Lubricant Oil Range)	MJ806	1.80E+01	1.8E+01	J		-	-
C11-C30	MJ806	-	2.4E+01	-		-	-
Benzene	MJ806	-	-	-	1.2E-04	3.4E-04	3.4E-04
Ethylbenzene	MJ806	-	-	-	1.2E-04	3.4E-04	3.4E-04
Toluene	MJ806	-	-	-	1.2E-04	3.4E-04	3.4E-04
m,p-Xylene	MJ806	-	-	-	3.6E-04	1.0E-03	1.0E-03
o-Xylene	MJ806	-	-	-	8.0E-05	2.3E-04	2.3E-04
Xylene (total)	MJ806	-	-	-	4.4E-04	1.3E-03	1.3E-03
2-Methylnaphthalene	MJ806	7.50E-03	7.5E-03	J	2.8E-02	7.9E-02	7.5E-03
Acenaphthene	MJ806	2.30E-02	1.2E-02	U	5.7E-04	1.4E-02	1.2E-02
Acenaphthylene	MJ806	2.30E-02	1.2E-02	U	7.0E-05	1.7E-03	1.7E-03
Anthracene	MJ806	2.30E-02	1.2E-02	U	3.7E-04	8.8E-03	8.8E-03
Benzo(a)anthracene	MJ806	2.30E-02	1.2E-02	U	2.7E-05	6.4E-04	6.4E-04
Benzo(a)pyrene	MJ806	2.60E-03	2.6E-03	J	2.7E-05	6.4E-04	2.6E-03
Benzo(b)fluoranthene	MJ806	2.20E-03	2.2E-03	J	4.3E-05	1.0E-03	2.2E-03
Benzo(e)pyrene	MJ806	-	-	-	2.1E-04	4.9E-03	4.9E-03
Benzo(g,h,i)perylene	MJ806	2.30E-02	1.2E-02	U	2.2E-04	5.2E-03	5.2E-03
Benzo(k)fluoranthene	MJ806	2.30E-02	1.2E-02	U	2.1E-05	4.9E-04	4.9E-04
Chrysene	MJ806	1.00E-02	1.0E-02	J	5.9E-05	1.4E-03	1.0E-02
Dibenz(a,h)anthracene	MJ806	2.30E-02	1.2E-02	U	1.1E-05	2.6E-04	2.6E-04
Fluoranthene	MJ806	3.90E-03	3.9E-03	J	7.5E-05	1.8E-03	3.9E-03
Fluorene	MJ806	2.30E-02	1.2E-02	U	5.7E-04	1.3E-02	1.2E-02
Indeno(1,2,3-cd)pyrene	MJ806	2.30E-02	1.2E-02	U	2.4E-05	5.7E-04	5.7E-04
Naphthalene	MJ806	7.90E-03	7.9E-03	J	6.9E-03	2.0E-02	7.9E-03
Perylene	MJ806	-	-	-	1.2E-04	2.8E-03	2.8E-03
Phenanthrene	MJ806	2.30E-02	1.2E-02	U	1.5E-03	3.6E-02	1.2E-02
Pyrene	MJ806	9.30E-03	9.3E-03	J	1.4E-04	3.2E-03	9.3E-03
C08-C11 (Gasoline Range)	MJ808	5.90E+00	3.0E+00	U		-	-
C11-C14 (Kerosene Range)	MJ808	5.90E+00	3.0E+00	U		-	-
C14-C20 (Diesel Range)	MJ808	7.00E+00	7.0E+00	J		-	-
C20-C30 (Lubricant Oil Range)	MJ808	8.80E+00	8.8E+00	J		-	-
C11-C30	MJ808	-	1.9E+01	-		-	-
Benzene	MJ808	-	-	-	1.2E-04	3.5E-04	3.5E-04
Ethylbenzene	MJ808	-	-	-	1.2E-04	3.5E-04	3.5E-04
Toluene	MJ808	-	-	-	1.2E-04	3.5E-04	3.5E-04
m,p-Xylene	MJ808	-	-	-	3.6E-04	1.1E-03	1.1E-03
o-Xylene	MJ808	-	-	-	8.0E-05	2.4E-04	2.4E-04
Xylene (total)	MJ808	-	-	-	4.4E-04	1.3E-03	1.3E-03
2-Methylnaphthalene	MJ808	2.50E-02	1.3E-02	U	2.8E-02	8.1E-02	1.3E-02
Acenaphthene	MJ808	2.50E-02	1.3E-02	U	5.7E-04	1.1E-02	1.1E-02
Acenaphthylene	MJ808	2.50E-02	1.3E-02	U	7.0E-05	1.3E-03	1.3E-03
Anthracene	MJ808	2.50E-02	1.3E-02	U	3.7E-04	7.0E-03	7.0E-03
Benzo(a)anthracene	MJ808	5.50E-03	5.5E-03	J	2.7E-05	5.1E-04	5.5E-03
Benzo(a)pyrene	MJ808	2.50E-02	1.3E-02	U	2.7E-05	5.1E-04	5.1E-04
Benzo(b)fluoranthene	MJ808	2.30E-03	2.3E-03	J	4.3E-05	8.1E-04	2.3E-03
Benzo(e)pyrene	MJ808	-	-	-	2.1E-04	3.9E-03	3.9E-03
Benzo(g,h,i)perylene	MJ808	2.50E-02	1.3E-02	U	2.2E-04	4.1E-03	4.1E-03

TPH to Petroleum Constituent Extrapolation for Soil (0-6 feet bgs) [a]
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Benzo(k)fluoranthene	MJ808	2.50E-02	1.3E-02	U	2.1E-05	3.8E-04	3.8E-04
Chrysene	MJ808	7.80E-03	7.8E-03	J	5.9E-05	1.1E-03	7.8E-03
Dibenz(a,h)anthracene	MJ808	2.50E-02	1.3E-02	U	1.1E-05	2.1E-04	2.1E-04
Fluoranthene	MJ808	6.10E-03	6.1E-03	J	7.5E-05	1.4E-03	6.1E-03
Fluorene	MJ808	2.50E-02	1.3E-02	U	5.7E-04	1.1E-02	1.1E-02
Indeno(1,2,3-cd)pyrene	MJ808	2.50E-02	1.3E-02	U	2.4E-05	4.5E-04	4.5E-04
Naphthalene	MJ808	2.50E-02	1.3E-02	U	6.9E-03	2.0E-02	1.3E-02
Perylene	MJ808	-	-	-	1.2E-04	2.2E-03	2.2E-03
Phenanthrene	MJ808	2.50E-02	1.3E-02	U	1.5E-03	2.9E-02	1.3E-02
Pyrene	MJ808	5.10E-03	5.1E-03	J	1.4E-04	2.6E-03	5.1E-03

Notes:
a. Petroleum constituent concentrations estimated and selected as described in Section 2.8 of the SRAM.
"-" not applicable
mg/kg - milligrams per kilogram

Aroclor to PCB Congener Extrapolation (0-6 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentrations (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF_{1254}	EF_{1260}	Estimated Concentrations Aroclor-1254 (mg/kg)	Estimated Concentrations Aroclor-1260 (mg/kg)	Estimated Concentrations PCB_{MAX} (mg/kg)
Aroclor-1254	MJ669	7.5E-02	7.5E-02	J	-	-	-	-	-
Aroclor-1260	MJ669	4.3E-02	4.3E-02	J	-	-	-	-	-
PCB-105	MJ669	-	-	-	1.2E-01	8.2E-02	9.3E-06	3.5E-06	9.3E-06
PCB-114	MJ669	-	-	-	4.5E-03	1.5E-03	3.4E-07	6.3E-08	3.4E-07
PCB-118	MJ669	-	-	-	2.7E-01	1.6E-01	2.0E-05	7.0E-06	2.0E-05
PCB-123	MJ669	-	-	-	3.0E-03	2.3E-03	2.2E-07	1.0E-07	2.2E-07
PCB-126	MJ669	-	-	-	7.5E-03	6.4E-03	5.6E-07	2.7E-07	5.6E-07
PCB-156	MJ669	-	-	-	6.3E-02	5.5E-02	4.7E-06	2.3E-06	4.7E-06
PCB-157	MJ669	-	-	-	1.2E-02	2.5E-02	9.3E-07	1.1E-06	1.1E-06
PCB-167	MJ669	-	-	-	2.1E-02	4.3E-02	1.5E-06	1.8E-06	1.8E-06
PCB-169	MJ669	-	-	-	3.7E-04	6.4E-04	2.7E-08	2.7E-08	2.7E-08
PCB-189	MJ669	-	-	-	3.0E-03	6.4E-03	2.2E-07	2.7E-07	2.7E-07
PCB-77	MJ669	-	-	-	1.5E-02	1.3E-02	1.2E-06	5.5E-07	1.2E-06
PCB-81	MJ669	-	-	-	3.0E-03	2.3E-03	2.2E-07	9.7E-08	2.2E-07
Aroclor-1254	MJ670	3.7E-02	3.7E-02	J	-	-	-	-	-
Aroclor-1260	MJ670	4.6E-02	4.6E-02	J	-	-	-	-	-
PCB-105	MJ670	-	-	-	1.2E-01	8.2E-02	4.6E-06	3.8E-06	4.6E-06
PCB-114	MJ670	-	-	-	4.5E-03	1.5E-03	1.7E-07	6.7E-08	1.7E-07
PCB-118	MJ670	-	-	-	2.7E-01	1.6E-01	9.9E-06	7.5E-06	9.9E-06
PCB-123	MJ670	-	-	-	3.0E-03	2.3E-03	1.1E-07	1.1E-07	1.1E-07
PCB-126	MJ670	-	-	-	7.5E-03	6.4E-03	2.8E-07	2.9E-07	2.9E-07
PCB-156	MJ670	-	-	-	6.3E-02	5.5E-02	2.3E-06	2.5E-06	2.5E-06
PCB-157	MJ670	-	-	-	1.2E-02	2.5E-02	4.6E-07	1.1E-06	1.1E-06
PCB-167	MJ670	-	-	-	2.1E-02	4.3E-02	7.6E-07	2.0E-06	2.0E-06
PCB-169	MJ670	-	-	-	3.7E-04	6.4E-04	1.4E-08	2.9E-08	2.9E-08
PCB-189	MJ670	-	-	-	3.0E-03	6.4E-03	1.1E-07	2.9E-07	2.9E-07
PCB-77	MJ670	-	-	-	1.5E-02	1.3E-02	5.7E-07	5.9E-07	5.9E-07
PCB-81	MJ670	-	-	-	3.0E-03	2.3E-03	1.1E-07	1.0E-07	1.1E-07
Aroclor-1254	MJ671	1.2E-01	1.2E-01	J	-	-	-	-	-
Aroclor-1260	MJ671	8.5E-02	8.5E-02	J	-	-	-	-	-
PCB-105	MJ671	-	-	-	1.2E-01	8.2E-02	1.5E-05	7.0E-06	1.5E-05
PCB-114	MJ671	-	-	-	4.5E-03	1.5E-03	5.4E-07	1.2E-07	5.4E-07
PCB-118	MJ671	-	-	-	2.7E-01	1.6E-01	3.2E-05	1.4E-05	3.2E-05
PCB-123	MJ671	-	-	-	3.0E-03	2.3E-03	3.6E-07	2.0E-07	3.6E-07
PCB-126	MJ671	-	-	-	7.5E-03	6.4E-03	9.0E-07	5.4E-07	9.0E-07
PCB-156	MJ671	-	-	-	6.3E-02	5.5E-02	7.5E-06	4.6E-06	7.5E-06
PCB-157	MJ671	-	-	-	1.2E-02	2.5E-02	1.5E-06	2.1E-06	2.1E-06
PCB-167	MJ671	-	-	-	2.1E-02	4.3E-02	2.5E-06	3.6E-06	3.6E-06
PCB-169	MJ671	-	-	-	3.7E-04	6.4E-04	4.4E-08	5.4E-08	5.4E-08
PCB-189	MJ671	-	-	-	3.0E-03	6.4E-03	3.6E-07	5.4E-07	5.4E-07
PCB-77	MJ671	-	-	-	1.5E-02	1.3E-02	1.9E-06	1.1E-06	1.9E-06
PCB-81	MJ671	-	-	-	3.0E-03	2.3E-03	3.6E-07	1.9E-07	3.6E-07
Aroclor-1254	MJ683	4.0E-01	2.0E-01	U	-	-	-	-	-
Aroclor-1260	MJ683	9.5E-02	9.5E-02		-	-	-	-	-
PCB-105	MJ683	-	-	-	1.2E-01	8.2E-02	2.5E-05	7.8E-06	2.5E-05
PCB-114	MJ683	-	-	-	4.5E-03	1.5E-03	9.1E-07	1.4E-07	9.1E-07
PCB-118	MJ683	-	-	-	2.7E-01	1.6E-01	5.4E-05	1.6E-05	5.4E-05
PCB-123	MJ683	-	-	-	3.0E-03	2.3E-03	6.0E-07	2.2E-07	6.0E-07
PCB-126	MJ683	-	-	-	7.5E-03	6.4E-03	1.5E-06	6.0E-07	1.5E-06
PCB-156	MJ683	-	-	-	6.3E-02	5.5E-02	1.3E-05	5.2E-06	1.3E-05
PCB-157	MJ683	-	-	-	1.2E-02	2.5E-02	2.5E-06	2.3E-06	2.5E-06
PCB-167	MJ683	-	-	-	2.1E-02	4.3E-02	4.1E-06	4.1E-06	4.1E-06
PCB-169	MJ683	-	-	-	3.7E-04	6.4E-04	7.3E-08	6.0E-08	7.3E-08
PCB-189	MJ683	-	-	-	3.0E-03	6.4E-03	6.0E-07	6.0E-07	6.0E-07
PCB-77	MJ683	-	-	-	1.5E-02	1.3E-02	3.1E-06	1.2E-06	3.1E-06
PCB-81	MJ683	-	-	-	3.0E-03	2.3E-03	6.0E-07	2.1E-07	6.0E-07

Aroclor to PCB Congener Extrapolation (0-6 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentrations (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF_{1254}	EF_{1260}	Estimated Concentrations Aroclor-1254 (mg/kg)	Estimated Concentrations Aroclor-1260 (mg/kg)	Estimated Concentrations PCB_{MAX} (mg/kg)
Aroclor-1254	MJ688	5.4E-02	2.7E-02	UJ	-	-	-	-	-
Aroclor-1260	MJ688	5.4E-02	2.7E-02	UJ	-	-	-	-	-
PCB-105	MJ688	-	-	-	1.2E-01	8.2E-02	3.3E-06	2.2E-06	3.3E-06
PCB-114	MJ688	-	-	-	4.5E-03	1.5E-03	1.2E-07	3.9E-08	1.2E-07
PCB-118	MJ688	-	-	-	2.7E-01	1.6E-01	7.2E-06	4.4E-06	7.2E-06
PCB-123	MJ688	-	-	-	3.0E-03	2.3E-03	8.1E-08	6.3E-08	8.1E-08
PCB-126	MJ688	-	-	-	7.5E-03	6.4E-03	2.0E-07	1.7E-07	2.0E-07
PCB-156	MJ688	-	-	-	6.3E-02	5.5E-02	1.7E-06	1.5E-06	1.7E-06
PCB-157	MJ688	-	-	-	1.2E-02	2.5E-02	3.3E-07	6.6E-07	6.6E-07
PCB-167	MJ688	-	-	-	2.1E-02	4.3E-02	5.6E-07	1.2E-06	1.2E-06
PCB-169	MJ688	-	-	-	3.7E-04	6.4E-04	9.9E-09	1.7E-08	1.7E-08
PCB-189	MJ688	-	-	-	3.0E-03	6.4E-03	8.1E-08	1.7E-07	1.7E-07
PCB-77	MJ688	-	-	-	1.5E-02	1.3E-02	4.2E-07	3.4E-07	4.2E-07
PCB-81	MJ688	-	-	-	3.0E-03	2.3E-03	8.1E-08	6.1E-08	8.1E-08
Aroclor-1254	MJ689	5.5E-02	2.8E-02	UJ	-	-	-	-	-
Aroclor-1260	MJ689	5.5E-02	2.8E-02	UJ	-	-	-	-	-
PCB-105	MJ689	-	-	-	1.2E-01	8.2E-02	3.4E-06	2.3E-06	3.4E-06
PCB-114	MJ689	-	-	-	4.5E-03	1.5E-03	1.2E-07	4.0E-08	1.2E-07
PCB-118	MJ689	-	-	-	2.7E-01	1.6E-01	7.4E-06	4.5E-06	7.4E-06
PCB-123	MJ689	-	-	-	3.0E-03	2.3E-03	8.2E-08	6.4E-08	8.2E-08
PCB-126	MJ689	-	-	-	7.5E-03	6.4E-03	2.1E-07	1.8E-07	2.1E-07
PCB-156	MJ689	-	-	-	6.3E-02	5.5E-02	1.7E-06	1.5E-06	1.7E-06
PCB-157	MJ689	-	-	-	1.2E-02	2.5E-02	3.4E-07	6.8E-07	6.8E-07
PCB-167	MJ689	-	-	-	2.1E-02	4.3E-02	5.7E-07	1.2E-06	1.2E-06
PCB-169	MJ689	-	-	-	3.7E-04	6.4E-04	1.0E-08	1.8E-08	1.8E-08
PCB-189	MJ689	-	-	-	3.0E-03	6.4E-03	8.2E-08	1.8E-07	1.8E-07
PCB-77	MJ689	-	-	-	1.5E-02	1.3E-02	4.3E-07	3.5E-07	4.3E-07
PCB-81	MJ689	-	-	-	3.0E-03	2.3E-03	8.2E-08	6.2E-08	8.2E-08
Aroclor-1254	MJ690	5.5E-02	2.8E-02	UJ	-	-	-	-	-
Aroclor-1260	MJ690	3.2E-02	3.2E-02	J	-	-	-	-	-
PCB-105	MJ690	-	-	-	1.2E-01	8.2E-02	3.4E-06	2.6E-06	3.4E-06
PCB-114	MJ690	-	-	-	4.5E-03	1.5E-03	1.2E-07	4.7E-08	1.2E-07
PCB-118	MJ690	-	-	-	2.7E-01	1.6E-01	7.4E-06	5.2E-06	7.4E-06
PCB-123	MJ690	-	-	-	3.0E-03	2.3E-03	8.2E-08	7.4E-08	8.2E-08
PCB-126	MJ690	-	-	-	7.5E-03	6.4E-03	2.1E-07	2.0E-07	2.1E-07
PCB-156	MJ690	-	-	-	6.3E-02	5.5E-02	1.7E-06	1.7E-06	1.7E-06
PCB-157	MJ690	-	-	-	1.2E-02	2.5E-02	3.4E-07	7.9E-07	7.9E-07
PCB-167	MJ690	-	-	-	2.1E-02	4.3E-02	5.7E-07	1.4E-06	1.4E-06
PCB-169	MJ690	-	-	-	3.7E-04	6.4E-04	1.0E-08	2.0E-08	2.0E-08
PCB-189	MJ690	-	-	-	3.0E-03	6.4E-03	8.2E-08	2.0E-07	2.0E-07
PCB-77	MJ690	-	-	-	1.5E-02	1.3E-02	4.3E-07	4.1E-07	4.3E-07
PCB-81	MJ690	-	-	-	3.0E-03	2.3E-03	8.2E-08	7.2E-08	8.2E-08
Aroclor-1254	MJ704	5.2E-02	2.6E-02	U	-	-	-	-	-
Aroclor-1260	MJ704	5.2E-02	2.6E-02	U	-	-	-	-	-
PCB-105	MJ704	-	-	-	1.2E-01	8.2E-02	3.2E-06	2.1E-06	3.2E-06
PCB-114	MJ704	-	-	-	4.5E-03	1.5E-03	1.2E-07	3.8E-08	1.2E-07
PCB-118	MJ704	-	-	-	2.7E-01	1.6E-01	7.0E-06	4.3E-06	7.0E-06
PCB-123	MJ704	-	-	-	3.0E-03	2.3E-03	7.8E-08	6.0E-08	7.8E-08
PCB-126	MJ704	-	-	-	7.5E-03	6.4E-03	2.0E-07	1.7E-07	2.0E-07
PCB-156	MJ704	-	-	-	6.3E-02	5.5E-02	1.6E-06	1.4E-06	1.6E-06
PCB-157	MJ704	-	-	-	1.2E-02	2.5E-02	3.2E-07	6.4E-07	6.4E-07
PCB-167	MJ704	-	-	-	2.1E-02	4.3E-02	5.4E-07	1.1E-06	1.1E-06
PCB-169	MJ704	-	-	-	3.7E-04	6.4E-04	9.5E-09	1.7E-08	1.7E-08
PCB-189	MJ704	-	-	-	3.0E-03	6.4E-03	7.8E-08	1.7E-07	1.7E-07
PCB-77	MJ704	-	-	-	1.5E-02	1.3E-02	4.0E-07	3.3E-07	4.0E-07
PCB-81	MJ704	-	-	-	3.0E-03	2.3E-03	7.8E-08	5.9E-08	7.8E-08
Aroclor-1254	MJ705	8.1E-02	4.1E-02	U	-	-	-	-	-
Aroclor-1260	MJ705	8.1E-02	4.1E-02	U	-	-	-	-	-

Aroclor to PCB Congener Extrapolation (0-6 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentrations (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF_{1254}	EF_{1260}	Estimated Concentrations Aroclor-1254 (mg/kg)	Estimated Concentrations Aroclor-1260 (mg/kg)	Estimated Concentrations PCB_{MAX} (mg/kg)
PCB-105	MJ705	-	-	-	1.2E-01	8.2E-02	5.0E-06	3.3E-06	5.0E-06
PCB-114	MJ705	-	-	-	4.5E-03	1.5E-03	1.8E-07	5.9E-08	1.8E-07
PCB-118	MJ705	-	-	-	2.7E-01	1.6E-01	1.1E-05	6.6E-06	1.1E-05
PCB-123	MJ705	-	-	-	3.0E-03	2.3E-03	1.2E-07	9.4E-08	1.2E-07
PCB-126	MJ705	-	-	-	7.5E-03	6.4E-03	3.0E-07	2.6E-07	3.0E-07
PCB-156	MJ705	-	-	-	6.3E-02	5.5E-02	2.5E-06	2.2E-06	2.5E-06
PCB-157	MJ705	-	-	-	1.2E-02	2.5E-02	5.0E-07	9.9E-07	9.9E-07
PCB-167	MJ705	-	-	-	2.1E-02	4.3E-02	8.4E-07	1.7E-06	1.7E-06
PCB-169	MJ705	-	-	-	3.7E-04	6.4E-04	1.5E-08	2.6E-08	2.6E-08
PCB-189	MJ705	-	-	-	3.0E-03	6.4E-03	1.2E-07	2.6E-07	2.6E-07
PCB-77	MJ705	-	-	-	1.5E-02	1.3E-02	6.3E-07	5.2E-07	6.3E-07
PCB-81	MJ705	-	-	-	3.0E-03	2.3E-03	1.2E-07	9.1E-08	1.2E-07
Aroclor-1254	MJ707	5.1E-02	2.6E-02	U	-	-	-	-	-
Aroclor-1260	MJ707	5.1E-02	2.6E-02	U	-	-	-	-	-
PCB-105	MJ707	-	-	-	1.2E-01	8.2E-02	3.2E-06	2.1E-06	3.2E-06
PCB-114	MJ707	-	-	-	4.5E-03	1.5E-03	1.2E-07	3.7E-08	1.2E-07
PCB-118	MJ707	-	-	-	2.7E-01	1.6E-01	6.8E-06	4.2E-06	6.8E-06
PCB-123	MJ707	-	-	-	3.0E-03	2.3E-03	7.6E-08	5.9E-08	7.6E-08
PCB-126	MJ707	-	-	-	7.5E-03	6.4E-03	1.9E-07	1.6E-07	1.9E-07
PCB-156	MJ707	-	-	-	6.3E-02	5.5E-02	1.6E-06	1.4E-06	1.6E-06
PCB-157	MJ707	-	-	-	1.2E-02	2.5E-02	3.2E-07	6.3E-07	6.3E-07
PCB-167	MJ707	-	-	-	2.1E-02	4.3E-02	5.3E-07	1.1E-06	1.1E-06
PCB-169	MJ707	-	-	-	3.7E-04	6.4E-04	9.3E-09	1.6E-08	1.6E-08
PCB-189	MJ707	-	-	-	3.0E-03	6.4E-03	7.6E-08	1.6E-07	1.6E-07
PCB-77	MJ707	-	-	-	1.5E-02	1.3E-02	3.9E-07	3.2E-07	3.9E-07
PCB-81	MJ707	-	-	-	3.0E-03	2.3E-03	7.6E-08	5.7E-08	7.6E-08
Aroclor-1254	MJ708	7.9E-02	4.0E-02	U	-	-	-	-	-
Aroclor-1260	MJ708	7.9E-02	4.0E-02	U	-	-	-	-	-
PCB-105	MJ708	-	-	-	1.2E-01	8.2E-02	4.9E-06	3.2E-06	4.9E-06
PCB-114	MJ708	-	-	-	4.5E-03	1.5E-03	1.8E-07	5.7E-08	1.8E-07
PCB-118	MJ708	-	-	-	2.7E-01	1.6E-01	1.1E-05	6.5E-06	1.1E-05
PCB-123	MJ708	-	-	-	3.0E-03	2.3E-03	1.2E-07	9.2E-08	1.2E-07
PCB-126	MJ708	-	-	-	7.5E-03	6.4E-03	3.0E-07	2.5E-07	3.0E-07
PCB-156	MJ708	-	-	-	6.3E-02	5.5E-02	2.5E-06	2.2E-06	2.5E-06
PCB-157	MJ708	-	-	-	1.2E-02	2.5E-02	4.9E-07	9.7E-07	9.7E-07
PCB-167	MJ708	-	-	-	2.1E-02	4.3E-02	8.1E-07	1.7E-06	1.7E-06
PCB-169	MJ708	-	-	-	3.7E-04	6.4E-04	1.4E-08	2.5E-08	2.5E-08
PCB-189	MJ708	-	-	-	3.0E-03	6.4E-03	1.2E-07	2.5E-07	2.5E-07
PCB-77	MJ708	-	-	-	1.5E-02	1.3E-02	6.1E-07	5.0E-07	6.1E-07
PCB-81	MJ708	-	-	-	3.0E-03	2.3E-03	1.2E-07	8.9E-08	1.2E-07
Aroclor-1254	MJ709	5.4E-02	2.7E-02	UJ	-	-	-	-	-
Aroclor-1260	MJ709	5.4E-02	2.7E-02	UJ	-	-	-	-	-
PCB-105	MJ709	-	-	-	1.2E-01	8.2E-02	3.3E-06	2.2E-06	3.3E-06
PCB-114	MJ709	-	-	-	4.5E-03	1.5E-03	1.2E-07	3.9E-08	1.2E-07
PCB-118	MJ709	-	-	-	2.7E-01	1.6E-01	7.2E-06	4.4E-06	7.2E-06
PCB-123	MJ709	-	-	-	3.0E-03	2.3E-03	8.1E-08	6.3E-08	8.1E-08
PCB-126	MJ709	-	-	-	7.5E-03	6.4E-03	2.0E-07	1.7E-07	2.0E-07
PCB-156	MJ709	-	-	-	6.3E-02	5.5E-02	1.7E-06	1.5E-06	1.7E-06
PCB-157	MJ709	-	-	-	1.2E-02	2.5E-02	3.3E-07	6.6E-07	6.6E-07
PCB-167	MJ709	-	-	-	2.1E-02	4.3E-02	5.6E-07	1.2E-06	1.2E-06
PCB-169	MJ709	-	-	-	3.7E-04	6.4E-04	9.9E-09	1.7E-08	1.7E-08
PCB-189	MJ709	-	-	-	3.0E-03	6.4E-03	8.1E-08	1.7E-07	1.7E-07
PCB-77	MJ709	-	-	-	1.5E-02	1.3E-02	4.2E-07	3.4E-07	4.2E-07
PCB-81	MJ709	-	-	-	3.0E-03	2.3E-03	8.1E-08	6.1E-08	8.1E-08
Aroclor-1254	MJ710	7.9E-02	4.0E-02	U	-	-	-	-	-
Aroclor-1260	MJ710	2.3E-01	2.3E-01		-	-	-	-	-
PCB-105	MJ710	-	-	-	1.2E-01	8.2E-02	4.9E-06	1.9E-05	1.9E-05
PCB-114	MJ710	-	-	-	4.5E-03	1.5E-03	1.8E-07	3.3E-07	3.3E-07

Aroclor to PCB Congener Extrapolation (0-6 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentrations (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF_{1254}	EF_{1260}	Estimated Concentrations Aroclor-1254 (mg/kg)	Estimated Concentrations Aroclor-1260 (mg/kg)	Estimated Concentrations PCB_{MAX} (mg/kg)
PCB-118	MJ710	-	-	-	2.7E-01	1.6E-01	1.1E-05	3.8E-05	3.8E-05
PCB-123	MJ710	-	-	-	3.0E-03	2.3E-03	1.2E-07	5.3E-07	5.3E-07
PCB-126	MJ710	-	-	-	7.5E-03	6.4E-03	3.0E-07	1.5E-06	1.5E-06
PCB-156	MJ710	-	-	-	6.3E-02	5.5E-02	2.5E-06	1.3E-05	1.3E-05
PCB-157	MJ710	-	-	-	1.2E-02	2.5E-02	4.9E-07	5.6E-06	5.6E-06
PCB-167	MJ710	-	-	-	2.1E-02	4.3E-02	8.1E-07	9.8E-06	9.8E-06
PCB-169	MJ710	-	-	-	3.7E-04	6.4E-04	1.4E-08	1.5E-07	1.5E-07
PCB-189	MJ710	-	-	-	3.0E-03	6.4E-03	1.2E-07	1.5E-06	1.5E-06
PCB-77	MJ710	-	-	-	1.5E-02	1.3E-02	6.1E-07	2.9E-06	2.9E-06
PCB-81	MJ710	-	-	-	3.0E-03	2.3E-03	1.2E-07	5.2E-07	5.2E-07
Aroclor-1254	MJ739	8.4E-02	4.2E-02	U	-	-	-	-	-
Aroclor-1260	MJ739	8.4E-02	4.2E-02	U	-	-	-	-	-
PCB-105	MJ739	-	-	-	1.2E-01	8.2E-02	5.2E-06	3.4E-06	5.2E-06
PCB-114	MJ739	-	-	-	4.5E-03	1.5E-03	1.9E-07	6.1E-08	1.9E-07
PCB-118	MJ739	-	-	-	2.7E-01	1.6E-01	1.1E-05	6.9E-06	1.1E-05
PCB-123	MJ739	-	-	-	3.0E-03	2.3E-03	1.3E-07	9.7E-08	1.3E-07
PCB-126	MJ739	-	-	-	7.5E-03	6.4E-03	3.2E-07	2.7E-07	3.2E-07
PCB-156	MJ739	-	-	-	6.3E-02	5.5E-02	2.6E-06	2.3E-06	2.6E-06
PCB-157	MJ739	-	-	-	1.2E-02	2.5E-02	5.2E-07	1.0E-06	1.0E-06
PCB-167	MJ739	-	-	-	2.1E-02	4.3E-02	8.7E-07	1.8E-06	1.8E-06
PCB-169	MJ739	-	-	-	3.7E-04	6.4E-04	1.5E-08	2.7E-08	2.7E-08
PCB-189	MJ739	-	-	-	3.0E-03	6.4E-03	1.3E-07	2.7E-07	2.7E-07
PCB-77	MJ739	-	-	-	1.5E-02	1.3E-02	6.5E-07	5.3E-07	6.5E-07
PCB-81	MJ739	-	-	-	3.0E-03	2.3E-03	1.3E-07	9.5E-08	1.3E-07
Aroclor-1254	MJ744	2.6E-01	2.6E-01		-	-	-	-	-
Aroclor-1260	MJ744	9.2E-02	4.6E-02	U	-	-	-	-	-
PCB-105	MJ744	-	-	-	1.2E-01	8.2E-02	3.2E-05	3.8E-06	3.2E-05
PCB-114	MJ744	-	-	-	4.5E-03	1.5E-03	1.2E-06	6.7E-08	1.2E-06
PCB-118	MJ744	-	-	-	2.7E-01	1.6E-01	7.0E-05	7.5E-06	7.0E-05
PCB-123	MJ744	-	-	-	3.0E-03	2.3E-03	7.8E-07	1.1E-07	7.8E-07
PCB-126	MJ744	-	-	-	7.5E-03	6.4E-03	2.0E-06	2.9E-07	2.0E-06
PCB-156	MJ744	-	-	-	6.3E-02	5.5E-02	1.6E-05	2.5E-06	1.6E-05
PCB-157	MJ744	-	-	-	1.2E-02	2.5E-02	3.2E-06	1.1E-06	3.2E-06
PCB-167	MJ744	-	-	-	2.1E-02	4.3E-02	5.4E-06	2.0E-06	5.4E-06
PCB-169	MJ744	-	-	-	3.7E-04	6.4E-04	9.5E-08	2.9E-08	9.5E-08
PCB-189	MJ744	-	-	-	3.0E-03	6.4E-03	7.8E-07	2.9E-07	7.8E-07
PCB-77	MJ744	-	-	-	1.5E-02	1.3E-02	4.0E-06	5.9E-07	4.0E-06
PCB-81	MJ744	-	-	-	3.0E-03	2.3E-03	7.8E-07	1.0E-07	7.8E-07
Aroclor-1254	MJ745	3.5E-01	3.5E-01		-	-	-	-	-
Aroclor-1260	MJ745	1.0E-01	5.0E-02	U	-	-	-	-	-
PCB-105	MJ745	-	-	-	1.2E-01	8.2E-02	4.3E-05	4.1E-06	4.3E-05
PCB-114	MJ745	-	-	-	4.5E-03	1.5E-03	1.6E-06	7.3E-08	1.6E-06
PCB-118	MJ745	-	-	-	2.7E-01	1.6E-01	9.4E-05	8.2E-06	9.4E-05
PCB-123	MJ745	-	-	-	3.0E-03	2.3E-03	1.0E-06	1.2E-07	1.0E-06
PCB-126	MJ745	-	-	-	7.5E-03	6.4E-03	2.6E-06	3.2E-07	2.6E-06
PCB-156	MJ745	-	-	-	6.3E-02	5.5E-02	2.2E-05	2.7E-06	2.2E-05
PCB-157	MJ745	-	-	-	1.2E-02	2.5E-02	4.3E-06	1.2E-06	4.3E-06
PCB-167	MJ745	-	-	-	2.1E-02	4.3E-02	7.2E-06	2.1E-06	7.2E-06
PCB-169	MJ745	-	-	-	3.7E-04	6.4E-04	1.3E-07	3.2E-08	1.3E-07
PCB-189	MJ745	-	-	-	3.0E-03	6.4E-03	1.0E-06	3.2E-07	1.0E-06
PCB-77	MJ745	-	-	-	1.5E-02	1.3E-02	5.4E-06	6.4E-07	5.4E-06
PCB-81	MJ745	-	-	-	3.0E-03	2.3E-03	1.0E-06	1.1E-07	1.0E-06
Aroclor-1254	MJ746	1.8E-01	9.0E-02	UJ	-	-	-	-	-
Aroclor-1260	MJ746	1.8E-01	9.0E-02	UJ	-	-	-	-	-
PCB-105	MJ746	-	-	-	1.2E-01	8.2E-02	1.1E-05	7.4E-06	1.1E-05
PCB-114	MJ746	-	-	-	4.5E-03	1.5E-03	4.1E-07	1.3E-07	4.1E-07
PCB-118	MJ746	-	-	-	2.7E-01	1.6E-01	2.4E-05	1.5E-05	2.4E-05
PCB-123	MJ746	-	-	-	3.0E-03	2.3E-03	2.7E-07	2.1E-07	2.7E-07

Aroclor to PCB Congener Extrapolation (0-6 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentrations (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF_{1254}	EF_{1260}	Estimated Concentrations Aroclor-1254 (mg/kg)	Estimated Concentrations Aroclor-1260 (mg/kg)	Estimated Concentrations PCB_{MAX} (mg/kg)
PCB-126	MJ746	-	-	-	7.5E-03	6.4E-03	6.8E-07	5.7E-07	6.8E-07
PCB-156	MJ746	-	-	-	6.3E-02	5.5E-02	5.7E-06	4.9E-06	5.7E-06
PCB-157	MJ746	-	-	-	1.2E-02	2.5E-02	1.1E-06	2.2E-06	2.2E-06
PCB-167	MJ746	-	-	-	2.1E-02	4.3E-02	1.9E-06	3.8E-06	3.8E-06
PCB-169	MJ746	-	-	-	3.7E-04	6.4E-04	3.3E-08	5.7E-08	5.7E-08
PCB-189	MJ746	-	-	-	3.0E-03	6.4E-03	2.7E-07	5.7E-07	5.7E-07
PCB-77	MJ746	-	-	-	1.5E-02	1.3E-02	1.4E-06	1.1E-06	1.4E-06
PCB-81	MJ746	-	-	-	3.0E-03	2.3E-03	2.7E-07	2.0E-07	2.7E-07
Aroclor-1254	MJ747	1.8E-01	9.0E-02	UJ	-	-	-	-	-
Aroclor-1260	MJ747	1.8E-01	9.0E-02	UJ	-	-	-	-	-
PCB-105	MJ747	-	-	-	1.2E-01	8.2E-02	1.1E-05	7.4E-06	1.1E-05
PCB-114	MJ747	-	-	-	4.5E-03	1.5E-03	4.1E-07	1.3E-07	4.1E-07
PCB-118	MJ747	-	-	-	2.7E-01	1.6E-01	2.4E-05	1.5E-05	2.4E-05
PCB-123	MJ747	-	-	-	3.0E-03	2.3E-03	2.7E-07	2.1E-07	2.7E-07
PCB-126	MJ747	-	-	-	7.5E-03	6.4E-03	6.8E-07	5.7E-07	6.8E-07
PCB-156	MJ747	-	-	-	6.3E-02	5.5E-02	5.7E-06	4.9E-06	5.7E-06
PCB-157	MJ747	-	-	-	1.2E-02	2.5E-02	1.1E-06	2.2E-06	2.2E-06
PCB-167	MJ747	-	-	-	2.1E-02	4.3E-02	1.9E-06	3.8E-06	3.8E-06
PCB-169	MJ747	-	-	-	3.7E-04	6.4E-04	3.3E-08	5.7E-08	5.7E-08
PCB-189	MJ747	-	-	-	3.0E-03	6.4E-03	2.7E-07	5.7E-07	5.7E-07
PCB-77	MJ747	-	-	-	1.5E-02	1.3E-02	1.4E-06	1.1E-06	1.4E-06
PCB-81	MJ747	-	-	-	3.0E-03	2.3E-03	2.7E-07	2.0E-07	2.7E-07
Aroclor-1254	MJ748	2.2E-01	2.2E-01	J	-	-	-	-	-
Aroclor-1260	MJ748	2.0E-01	2.0E-01	J	-	-	-	-	-
PCB-105	MJ748	-	-	-	1.2E-01	8.2E-02	2.7E-05	1.6E-05	2.7E-05
PCB-114	MJ748	-	-	-	4.5E-03	1.5E-03	1.0E-06	2.9E-07	1.0E-06
PCB-118	MJ748	-	-	-	2.7E-01	1.6E-01	5.9E-05	3.3E-05	5.9E-05
PCB-123	MJ748	-	-	-	3.0E-03	2.3E-03	6.6E-07	4.6E-07	6.6E-07
PCB-126	MJ748	-	-	-	7.5E-03	6.4E-03	1.7E-06	1.3E-06	1.7E-06
PCB-156	MJ748	-	-	-	6.3E-02	5.5E-02	1.4E-05	1.1E-05	1.4E-05
PCB-157	MJ748	-	-	-	1.2E-02	2.5E-02	2.7E-06	4.9E-06	4.9E-06
PCB-167	MJ748	-	-	-	2.1E-02	4.3E-02	4.5E-06	8.5E-06	8.5E-06
PCB-169	MJ748	-	-	-	3.7E-04	6.4E-04	8.1E-08	1.3E-07	1.3E-07
PCB-189	MJ748	-	-	-	3.0E-03	6.4E-03	6.6E-07	1.3E-06	1.3E-06
PCB-77	MJ748	-	-	-	1.5E-02	1.3E-02	3.4E-06	2.5E-06	3.4E-06
PCB-81	MJ748	-	-	-	3.0E-03	2.3E-03	6.6E-07	4.5E-07	6.6E-07
Aroclor-1254	MJ750	4.6E-01	4.6E-01	J	-	-	-	-	-
Aroclor-1260	MJ750	2.0E-01	1.0E-01	UJ	-	-	-	-	-
PCB-105	MJ750	-	-	-	1.2E-01	8.2E-02	5.7E-05	8.2E-06	5.7E-05
PCB-114	MJ750	-	-	-	4.5E-03	1.5E-03	2.1E-06	1.5E-07	2.1E-06
PCB-118	MJ750	-	-	-	2.7E-01	1.6E-01	1.2E-04	1.6E-05	1.2E-04
PCB-123	MJ750	-	-	-	3.0E-03	2.3E-03	1.4E-06	2.3E-07	1.4E-06
PCB-126	MJ750	-	-	-	7.5E-03	6.4E-03	3.5E-06	6.4E-07	3.5E-06
PCB-156	MJ750	-	-	-	6.3E-02	5.5E-02	2.9E-05	5.5E-06	2.9E-05
PCB-157	MJ750	-	-	-	1.2E-02	2.5E-02	5.7E-06	2.5E-06	5.7E-06
PCB-167	MJ750	-	-	-	2.1E-02	4.3E-02	9.5E-06	4.3E-06	9.5E-06
PCB-169	MJ750	-	-	-	3.7E-04	6.4E-04	1.7E-07	6.4E-08	1.7E-07
PCB-189	MJ750	-	-	-	3.0E-03	6.4E-03	1.4E-06	6.4E-07	1.4E-06
PCB-77	MJ750	-	-	-	1.5E-02	1.3E-02	7.1E-06	1.3E-06	7.1E-06
PCB-81	MJ750	-	-	-	3.0E-03	2.3E-03	1.4E-06	2.3E-07	1.4E-06
Aroclor-1254	MJ752	8.9E-02	4.5E-02	UJ	-	-	-	-	-
Aroclor-1260	MJ752	8.9E-02	4.5E-02	UJ	-	-	-	-	-
PCB-105	MJ752	-	-	-	1.2E-01	8.2E-02	5.5E-06	3.6E-06	5.5E-06
PCB-114	MJ752	-	-	-	4.5E-03	1.5E-03	2.0E-07	6.5E-08	2.0E-07
PCB-118	MJ752	-	-	-	2.7E-01	1.6E-01	1.2E-05	7.3E-06	1.2E-05
PCB-123	MJ752	-	-	-	3.0E-03	2.3E-03	1.3E-07	1.0E-07	1.3E-07
PCB-126	MJ752	-	-	-	7.5E-03	6.4E-03	3.3E-07	2.8E-07	3.3E-07
PCB-156	MJ752	-	-	-	6.3E-02	5.5E-02	2.8E-06	2.4E-06	2.8E-06

Aroclor to PCB Congener Extrapolation (0-6 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentrations (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF_{1254}	EF_{1260}	Estimated Concentrations Aroclor-1254 (mg/kg)	Estimated Concentrations Aroclor-1260 (mg/kg)	Estimated Concentrations PCB_{MAX} (mg/kg)
PCB-157	MJ752	-	-	-	1.2E-02	2.5E-02	5.5E-07	1.1E-06	1.1E-06
PCB-167	MJ752	-	-	-	2.1E-02	4.3E-02	9.2E-07	1.9E-06	1.9E-06
PCB-169	MJ752	-	-	-	3.7E-04	6.4E-04	1.6E-08	2.8E-08	2.8E-08
PCB-189	MJ752	-	-	-	3.0E-03	6.4E-03	1.3E-07	2.8E-07	2.8E-07
PCB-77	MJ752	-	-	-	1.5E-02	1.3E-02	6.9E-07	5.7E-07	6.9E-07
PCB-81	MJ752	-	-	-	3.0E-03	2.3E-03	1.3E-07	1.0E-07	1.3E-07
Aroclor-1254	MJ754	2.4E-01	2.4E-01	J	-	-	-	-	-
Aroclor-1260	MJ754	1.1E-01	1.1E-01	J	-	-	-	-	-
PCB-105	MJ754	-	-	-	1.2E-01	8.2E-02	3.0E-05	9.0E-06	3.0E-05
PCB-114	MJ754	-	-	-	4.5E-03	1.5E-03	1.1E-06	1.6E-07	1.1E-06
PCB-118	MJ754	-	-	-	2.7E-01	1.6E-01	6.4E-05	1.8E-05	6.4E-05
PCB-123	MJ754	-	-	-	3.0E-03	2.3E-03	7.2E-07	2.6E-07	7.2E-07
PCB-126	MJ754	-	-	-	7.5E-03	6.4E-03	1.8E-06	7.0E-07	1.8E-06
PCB-156	MJ754	-	-	-	6.3E-02	5.5E-02	1.5E-05	6.0E-06	1.5E-05
PCB-157	MJ754	-	-	-	1.2E-02	2.5E-02	3.0E-06	2.7E-06	3.0E-06
PCB-167	MJ754	-	-	-	2.1E-02	4.3E-02	4.9E-06	4.7E-06	4.9E-06
PCB-169	MJ754	-	-	-	3.7E-04	6.4E-04	8.8E-08	7.0E-08	8.8E-08
PCB-189	MJ754	-	-	-	3.0E-03	6.4E-03	7.2E-07	7.0E-07	7.2E-07
PCB-77	MJ754	-	-	-	1.5E-02	1.3E-02	3.7E-06	1.4E-06	3.7E-06
PCB-81	MJ754	-	-	-	3.0E-03	2.3E-03	7.2E-07	2.5E-07	7.2E-07
Aroclor-1254	MJ756	6.0E-02	6.0E-02	J	-	-	-	-	-
Aroclor-1260	MJ756	8.4E-02	4.2E-02	UJ	-	-	-	-	-
PCB-105	MJ756	-	-	-	1.2E-01	8.2E-02	7.4E-06	3.4E-06	7.4E-06
PCB-114	MJ756	-	-	-	4.5E-03	1.5E-03	2.7E-07	6.1E-08	2.7E-07
PCB-118	MJ756	-	-	-	2.7E-01	1.6E-01	1.6E-05	6.9E-06	1.6E-05
PCB-123	MJ756	-	-	-	3.0E-03	2.3E-03	1.8E-07	9.7E-08	1.8E-07
PCB-126	MJ756	-	-	-	7.5E-03	6.4E-03	4.5E-07	2.7E-07	4.5E-07
PCB-156	MJ756	-	-	-	6.3E-02	5.5E-02	3.8E-06	2.3E-06	3.8E-06
PCB-157	MJ756	-	-	-	1.2E-02	2.5E-02	7.4E-07	1.0E-06	1.0E-06
PCB-167	MJ756	-	-	-	2.1E-02	4.3E-02	1.2E-06	1.8E-06	1.8E-06
PCB-169	MJ756	-	-	-	3.7E-04	6.4E-04	2.2E-08	2.7E-08	2.7E-08
PCB-189	MJ756	-	-	-	3.0E-03	6.4E-03	1.8E-07	2.7E-07	2.7E-07
PCB-77	MJ756	-	-	-	1.5E-02	1.3E-02	9.3E-07	5.3E-07	9.3E-07
PCB-81	MJ756	-	-	-	3.0E-03	2.3E-03	1.8E-07	9.5E-08	1.8E-07
Aroclor-1254	MJ759	4.8E-01	4.8E-01	J	-	-	-	-	-
Aroclor-1260	MJ759	1.8E-01	9.0E-02	UJ	-	-	-	-	-
PCB-105	MJ759	-	-	-	1.2E-01	8.2E-02	5.9E-05	7.4E-06	5.9E-05
PCB-114	MJ759	-	-	-	4.5E-03	1.5E-03	2.2E-06	1.3E-07	2.2E-06
PCB-118	MJ759	-	-	-	2.7E-01	1.6E-01	1.3E-04	1.5E-05	1.3E-04
PCB-123	MJ759	-	-	-	3.0E-03	2.3E-03	1.4E-06	2.1E-07	1.4E-06
PCB-126	MJ759	-	-	-	7.5E-03	6.4E-03	3.6E-06	5.7E-07	3.6E-06
PCB-156	MJ759	-	-	-	6.3E-02	5.5E-02	3.0E-05	4.9E-06	3.0E-05
PCB-157	MJ759	-	-	-	1.2E-02	2.5E-02	5.9E-06	2.2E-06	5.9E-06
PCB-167	MJ759	-	-	-	2.1E-02	4.3E-02	9.9E-06	3.8E-06	9.9E-06
PCB-169	MJ759	-	-	-	3.7E-04	6.4E-04	1.8E-07	5.7E-08	1.8E-07
PCB-189	MJ759	-	-	-	3.0E-03	6.4E-03	1.4E-06	5.7E-07	1.4E-06
PCB-77	MJ759	-	-	-	1.5E-02	1.3E-02	7.4E-06	1.1E-06	7.4E-06
PCB-81	MJ759	-	-	-	3.0E-03	2.3E-03	1.4E-06	2.0E-07	1.4E-06
Aroclor-1254	MJ761	6.6E-01	6.6E-01	J	-	-	-	-	-
Aroclor-1260	MJ761	1.8E-01	9.0E-02	UJ	-	-	-	-	-
PCB-105	MJ761	-	-	-	1.2E-01	8.2E-02	8.2E-05	7.4E-06	8.2E-05
PCB-114	MJ761	-	-	-	4.5E-03	1.5E-03	3.0E-06	1.3E-07	3.0E-06
PCB-118	MJ761	-	-	-	2.7E-01	1.6E-01	1.8E-04	1.5E-05	1.8E-04
PCB-123	MJ761	-	-	-	3.0E-03	2.3E-03	2.0E-06	2.1E-07	2.0E-06
PCB-126	MJ761	-	-	-	7.5E-03	6.4E-03	5.0E-06	5.7E-07	5.0E-06
PCB-156	MJ761	-	-	-	6.3E-02	5.5E-02	4.2E-05	4.9E-06	4.2E-05
PCB-157	MJ761	-	-	-	1.2E-02	2.5E-02	8.2E-06	2.2E-06	8.2E-06
PCB-167	MJ761	-	-	-	2.1E-02	4.3E-02	1.4E-05	3.8E-06	1.4E-05

Aroclor to PCB Congener Extrapolation (0-6 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentrations (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF_{1254}	EF_{1260}	Estimated Concentrations Aroclor-1254 (mg/kg)	Estimated Concentrations Aroclor-1260 (mg/kg)	Estimated Concentrations PCB_{MAX} (mg/kg)
PCB-169	MJ761	-	-	-	3.7E-04	6.4E-04	2.4E-07	5.7E-08	2.4E-07
PCB-189	MJ761	-	-	-	3.0E-03	6.4E-03	2.0E-06	5.7E-07	2.0E-06
PCB-77	MJ761	-	-	-	1.5E-02	1.3E-02	1.0E-05	1.1E-06	1.0E-05
PCB-81	MJ761	-	-	-	3.0E-03	2.3E-03	2.0E-06	2.0E-07	2.0E-06
Aroclor-1254	MJ763	1.9E-01	9.5E-02	UJ	-	-	-	-	-
Aroclor-1260	MJ763	1.9E-01	9.5E-02	UJ	-	-	-	-	-
PCB-105	MJ763	-	-	-	1.2E-01	8.2E-02	1.2E-05	7.8E-06	1.2E-05
PCB-114	MJ763	-	-	-	4.5E-03	1.5E-03	4.3E-07	1.4E-07	4.3E-07
PCB-118	MJ763	-	-	-	2.7E-01	1.6E-01	2.5E-05	1.6E-05	2.5E-05
PCB-123	MJ763	-	-	-	3.0E-03	2.3E-03	2.8E-07	2.2E-07	2.8E-07
PCB-126	MJ763	-	-	-	7.5E-03	6.4E-03	7.1E-07	6.0E-07	7.1E-07
PCB-156	MJ763	-	-	-	6.3E-02	5.5E-02	6.0E-06	5.2E-06	6.0E-06
PCB-157	MJ763	-	-	-	1.2E-02	2.5E-02	1.2E-06	2.3E-06	2.3E-06
PCB-167	MJ763	-	-	-	2.1E-02	4.3E-02	2.0E-06	4.1E-06	4.1E-06
PCB-169	MJ763	-	-	-	3.7E-04	6.4E-04	3.5E-08	6.0E-08	6.0E-08
PCB-189	MJ763	-	-	-	3.0E-03	6.4E-03	2.8E-07	6.0E-07	6.0E-07
PCB-77	MJ763	-	-	-	1.5E-02	1.3E-02	1.5E-06	1.2E-06	1.5E-06
PCB-81	MJ763	-	-	-	3.0E-03	2.3E-03	2.8E-07	2.1E-07	2.8E-07
Aroclor-1254	MJ781	8.9E-02	4.5E-02	U	-	-	-	-	-
Aroclor-1260	MJ781	8.9E-02	4.5E-02	U	-	-	-	-	-
PCB-105	MJ781	-	-	-	1.2E-01	8.2E-02	5.5E-06	3.6E-06	5.5E-06
PCB-114	MJ781	-	-	-	4.5E-03	1.5E-03	2.0E-07	6.5E-08	2.0E-07
PCB-118	MJ781	-	-	-	2.7E-01	1.6E-01	1.2E-05	7.3E-06	1.2E-05
PCB-123	MJ781	-	-	-	3.0E-03	2.3E-03	1.3E-07	1.0E-07	1.3E-07
PCB-126	MJ781	-	-	-	7.5E-03	6.4E-03	3.3E-07	2.8E-07	3.3E-07
PCB-156	MJ781	-	-	-	6.3E-02	5.5E-02	2.8E-06	2.4E-06	2.8E-06
PCB-157	MJ781	-	-	-	1.2E-02	2.5E-02	5.5E-07	1.1E-06	1.1E-06
PCB-167	MJ781	-	-	-	2.1E-02	4.3E-02	9.2E-07	1.9E-06	1.9E-06
PCB-169	MJ781	-	-	-	3.7E-04	6.4E-04	1.6E-08	2.8E-08	2.8E-08
PCB-189	MJ781	-	-	-	3.0E-03	6.4E-03	1.3E-07	2.8E-07	2.8E-07
PCB-77	MJ781	-	-	-	1.5E-02	1.3E-02	6.9E-07	5.7E-07	6.9E-07
PCB-81	MJ781	-	-	-	3.0E-03	2.3E-03	1.3E-07	1.0E-07	1.3E-07
Aroclor-1254	MJ782RE	5.4E+00	5.4E+00	J	-	-	-	-	-
Aroclor-1260	MJ782RE	4.3E-01	4.3E-01	J	-	-	-	-	-
PCB-105	MJ782RE	-	-	-	1.2E-01	8.2E-02	6.7E-04	3.5E-05	6.7E-04
PCB-114	MJ782RE	-	-	-	4.5E-03	1.5E-03	2.4E-05	6.3E-07	2.4E-05
PCB-118	MJ782RE	-	-	-	2.7E-01	1.6E-01	1.4E-03	7.0E-05	1.4E-03
PCB-123	MJ782RE	-	-	-	3.0E-03	2.3E-03	1.6E-05	1.0E-06	1.6E-05
PCB-126	MJ782RE	-	-	-	7.5E-03	6.4E-03	4.1E-05	2.7E-06	4.1E-05
PCB-156	MJ782RE	-	-	-	6.3E-02	5.5E-02	3.4E-04	2.3E-05	3.4E-04
PCB-157	MJ782RE	-	-	-	1.2E-02	2.5E-02	6.7E-05	1.1E-05	6.7E-05
PCB-167	MJ782RE	-	-	-	2.1E-02	4.3E-02	1.1E-04	1.8E-05	1.1E-04
PCB-169	MJ782RE	-	-	-	3.7E-04	6.4E-04	2.0E-06	2.7E-07	2.0E-06
PCB-189	MJ782RE	-	-	-	3.0E-03	6.4E-03	1.6E-05	2.7E-06	1.6E-05
PCB-77	MJ782RE	-	-	-	1.5E-02	1.3E-02	8.4E-05	5.5E-06	8.4E-05
PCB-81	MJ782RE	-	-	-	3.0E-03	2.3E-03	1.6E-05	9.7E-07	1.6E-05
Aroclor-1254	MJ783	8.9E-02	4.5E-02	U	-	-	-	-	-
Aroclor-1260	MJ783	8.9E-02	4.5E-02	U	-	-	-	-	-
PCB-105	MJ783	-	-	-	1.2E-01	8.2E-02	5.5E-06	3.6E-06	5.5E-06
PCB-114	MJ783	-	-	-	4.5E-03	1.5E-03	2.0E-07	6.5E-08	2.0E-07
PCB-118	MJ783	-	-	-	2.7E-01	1.6E-01	1.2E-05	7.3E-06	1.2E-05
PCB-123	MJ783	-	-	-	3.0E-03	2.3E-03	1.3E-07	1.0E-07	1.3E-07
PCB-126	MJ783	-	-	-	7.5E-03	6.4E-03	3.3E-07	2.8E-07	3.3E-07
PCB-156	MJ783	-	-	-	6.3E-02	5.5E-02	2.8E-06	2.4E-06	2.8E-06
PCB-157	MJ783	-	-	-	1.2E-02	2.5E-02	5.5E-07	1.1E-06	1.1E-06
PCB-167	MJ783	-	-	-	2.1E-02	4.3E-02	9.2E-07	1.9E-06	1.9E-06
PCB-169	MJ783	-	-	-	3.7E-04	6.4E-04	1.6E-08	2.8E-08	2.8E-08
PCB-189	MJ783	-	-	-	3.0E-03	6.4E-03	1.3E-07	2.8E-07	2.8E-07

Aroclor to PCB Congener Extrapolation (0-6 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentrations (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF_{1254}	EF_{1260}	Estimated Concentrations Aroclor-1254 (mg/kg)	Estimated Concentrations Aroclor-1260 (mg/kg)	Estimated Concentrations PCB_{MAX} (mg/kg)
PCB-77	MJ783	-	-	-	1.5E-02	1.3E-02	6.9E-07	5.7E-07	6.9E-07
PCB-81	MJ783	-	-	-	3.0E-03	2.3E-03	1.3E-07	1.0E-07	1.3E-07
Aroclor-1254	MJ784	8.6E+01	4.3E+01	U	-	-	-	-	-
Aroclor-1260	MJ784	6.3E+02	6.3E+02	J	-	-	-	-	-
PCB-105	MJ784	-	-	-	1.2E-01	8.2E-02	5.3E-03	5.2E-02	5.2E-02
PCB-114	MJ784	-	-	-	4.5E-03	1.5E-03	2.0E-04	9.2E-04	9.2E-04
PCB-118	MJ784	-	-	-	2.7E-01	1.6E-01	1.2E-02	1.0E-01	1.0E-01
PCB-123	MJ784	-	-	-	3.0E-03	2.3E-03	1.3E-04	1.5E-03	1.5E-03
PCB-126	MJ784	-	-	-	7.5E-03	6.4E-03	3.2E-04	4.0E-03	4.0E-03
PCB-156	MJ784	-	-	-	6.3E-02	5.5E-02	2.7E-03	3.4E-02	3.4E-02
PCB-157	MJ784	-	-	-	1.2E-02	2.5E-02	5.3E-04	1.5E-02	1.5E-02
PCB-167	MJ784	-	-	-	2.1E-02	4.3E-02	8.9E-04	2.7E-02	2.7E-02
PCB-169	MJ784	-	-	-	3.7E-04	6.4E-04	1.6E-05	4.0E-04	4.0E-04
PCB-189	MJ784	-	-	-	3.0E-03	6.4E-03	1.3E-04	4.0E-03	4.0E-03
PCB-77	MJ784	-	-	-	1.5E-02	1.3E-02	6.6E-04	8.0E-03	8.0E-03
PCB-81	MJ784	-	-	-	3.0E-03	2.3E-03	1.3E-04	1.4E-03	1.4E-03
Aroclor-1254	MJ786	9.4E-02	4.7E-02	U	-	-	-	-	-
Aroclor-1260	MJ786	9.4E-02	4.7E-02	U	-	-	-	-	-
PCB-105	MJ786	-	-	-	1.2E-01	8.2E-02	5.8E-06	3.8E-06	5.8E-06
PCB-114	MJ786	-	-	-	4.5E-03	1.5E-03	2.1E-07	6.8E-08	2.1E-07
PCB-118	MJ786	-	-	-	2.7E-01	1.6E-01	1.3E-05	7.7E-06	1.3E-05
PCB-123	MJ786	-	-	-	3.0E-03	2.3E-03	1.4E-07	1.1E-07	1.4E-07
PCB-126	MJ786	-	-	-	7.5E-03	6.4E-03	3.5E-07	3.0E-07	3.5E-07
PCB-156	MJ786	-	-	-	6.3E-02	5.5E-02	3.0E-06	2.6E-06	3.0E-06
PCB-157	MJ786	-	-	-	1.2E-02	2.5E-02	5.8E-07	1.2E-06	1.2E-06
PCB-167	MJ786	-	-	-	2.1E-02	4.3E-02	9.7E-07	2.0E-06	2.0E-06
PCB-169	MJ786	-	-	-	3.7E-04	6.4E-04	1.7E-08	3.0E-08	3.0E-08
PCB-189	MJ786	-	-	-	3.0E-03	6.4E-03	1.4E-07	3.0E-07	3.0E-07
PCB-77	MJ786	-	-	-	1.5E-02	1.3E-02	7.3E-07	6.0E-07	7.3E-07
PCB-81	MJ786	-	-	-	3.0E-03	2.3E-03	1.4E-07	1.1E-07	1.4E-07
Aroclor-1254	MJ787	2.5E-01	2.5E-01	J	-	-	-	-	-
Aroclor-1260	MJ787	9.6E-02	4.8E-02	U	-	-	-	-	-
PCB-105	MJ787	-	-	-	1.2E-01	8.2E-02	3.1E-05	3.9E-06	3.1E-05
PCB-114	MJ787	-	-	-	4.5E-03	1.5E-03	1.1E-06	7.0E-08	1.1E-06
PCB-118	MJ787	-	-	-	2.7E-01	1.6E-01	6.7E-05	7.9E-06	6.7E-05
PCB-123	MJ787	-	-	-	3.0E-03	2.3E-03	7.5E-07	1.1E-07	7.5E-07
PCB-126	MJ787	-	-	-	7.5E-03	6.4E-03	1.9E-06	3.1E-07	1.9E-06
PCB-156	MJ787	-	-	-	6.3E-02	5.5E-02	1.6E-05	2.6E-06	1.6E-05
PCB-157	MJ787	-	-	-	1.2E-02	2.5E-02	3.1E-06	1.2E-06	3.1E-06
PCB-167	MJ787	-	-	-	2.1E-02	4.3E-02	5.2E-06	2.1E-06	5.2E-06
PCB-169	MJ787	-	-	-	3.7E-04	6.4E-04	9.1E-08	3.1E-08	9.1E-08
PCB-189	MJ787	-	-	-	3.0E-03	6.4E-03	7.5E-07	3.1E-07	7.5E-07
PCB-77	MJ787	-	-	-	1.5E-02	1.3E-02	3.9E-06	6.1E-07	3.9E-06
PCB-81	MJ787	-	-	-	3.0E-03	2.3E-03	7.5E-07	1.1E-07	7.5E-07
Aroclor-1254	MJ788	9.1E-02	4.6E-02	U	-	-	-	-	-
Aroclor-1260	MJ788	9.1E-02	4.6E-02	U	-	-	-	-	-
PCB-105	MJ788	-	-	-	1.2E-01	8.2E-02	5.6E-06	3.7E-06	5.6E-06
PCB-114	MJ788	-	-	-	4.5E-03	1.5E-03	2.1E-07	6.6E-08	2.1E-07
PCB-118	MJ788	-	-	-	2.7E-01	1.6E-01	1.2E-05	7.4E-06	1.2E-05
PCB-123	MJ788	-	-	-	3.0E-03	2.3E-03	1.4E-07	1.1E-07	1.4E-07
PCB-126	MJ788	-	-	-	7.5E-03	6.4E-03	3.4E-07	2.9E-07	3.4E-07
PCB-156	MJ788	-	-	-	6.3E-02	5.5E-02	2.9E-06	2.5E-06	2.9E-06
PCB-157	MJ788	-	-	-	1.2E-02	2.5E-02	5.6E-07	1.1E-06	1.1E-06
PCB-167	MJ788	-	-	-	2.1E-02	4.3E-02	9.4E-07	1.9E-06	1.9E-06
PCB-169	MJ788	-	-	-	3.7E-04	6.4E-04	1.7E-08	2.9E-08	2.9E-08
PCB-189	MJ788	-	-	-	3.0E-03	6.4E-03	1.4E-07	2.9E-07	2.9E-07
PCB-77	MJ788	-	-	-	1.5E-02	1.3E-02	7.0E-07	5.8E-07	7.0E-07
PCB-81	MJ788	-	-	-	3.0E-03	2.3E-03	1.4E-07	1.0E-07	1.4E-07

Aroclor to PCB Congener Extrapolation (0-6 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentrations (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF_{1254}	EF_{1260}	Estimated Concentrations Aroclor-1254 (mg/kg)	Estimated Concentrations Aroclor-1260 (mg/kg)	Estimated Concentrations PCB_{MAX} (mg/kg)
Aroclor-1254	MJ789	5.6E-02	2.8E-02	U	-	-	-	-	-
Aroclor-1260	MJ789	5.6E-02	2.8E-02	U	-	-	-	-	-
PCB-105	MJ789	-	-	-	1.2E-01	8.2E-02	3.5E-06	2.3E-06	3.5E-06
PCB-114	MJ789	-	-	-	4.5E-03	1.5E-03	1.3E-07	4.1E-08	1.3E-07
PCB-118	MJ789	-	-	-	2.7E-01	1.6E-01	7.5E-06	4.6E-06	7.5E-06
PCB-123	MJ789	-	-	-	3.0E-03	2.3E-03	8.4E-08	6.5E-08	8.4E-08
PCB-126	MJ789	-	-	-	7.5E-03	6.4E-03	2.1E-07	1.8E-07	2.1E-07
PCB-156	MJ789	-	-	-	6.3E-02	5.5E-02	1.8E-06	1.5E-06	1.8E-06
PCB-157	MJ789	-	-	-	1.2E-02	2.5E-02	3.5E-07	6.9E-07	6.9E-07
PCB-167	MJ789	-	-	-	2.1E-02	4.3E-02	5.8E-07	1.2E-06	1.2E-06
PCB-169	MJ789	-	-	-	3.7E-04	6.4E-04	1.0E-08	1.8E-08	1.8E-08
PCB-189	MJ789	-	-	-	3.0E-03	6.4E-03	8.4E-08	1.8E-07	1.8E-07
PCB-77	MJ789	-	-	-	1.5E-02	1.3E-02	4.3E-07	3.6E-07	4.3E-07
PCB-81	MJ789	-	-	-	3.0E-03	2.3E-03	8.4E-08	6.3E-08	8.4E-08
Aroclor-1254	MJ790	9.1E-02	4.6E-02	U	-	-	-	-	-
Aroclor-1260	MJ790	9.1E-02	4.6E-02	U	-	-	-	-	-
PCB-105	MJ790	-	-	-	1.2E-01	8.2E-02	5.6E-06	3.7E-06	5.6E-06
PCB-114	MJ790	-	-	-	4.5E-03	1.5E-03	2.1E-07	6.6E-08	2.1E-07
PCB-118	MJ790	-	-	-	2.7E-01	1.6E-01	1.2E-05	7.4E-06	1.2E-05
PCB-123	MJ790	-	-	-	3.0E-03	2.3E-03	1.4E-07	1.1E-07	1.4E-07
PCB-126	MJ790	-	-	-	7.5E-03	6.4E-03	3.4E-07	2.9E-07	3.4E-07
PCB-156	MJ790	-	-	-	6.3E-02	5.5E-02	2.9E-06	2.5E-06	2.9E-06
PCB-157	MJ790	-	-	-	1.2E-02	2.5E-02	5.6E-07	1.1E-06	1.1E-06
PCB-167	MJ790	-	-	-	2.1E-02	4.3E-02	9.4E-07	1.9E-06	1.9E-06
PCB-169	MJ790	-	-	-	3.7E-04	6.4E-04	1.7E-08	2.9E-08	2.9E-08
PCB-189	MJ790	-	-	-	3.0E-03	6.4E-03	1.4E-07	2.9E-07	2.9E-07
PCB-77	MJ790	-	-	-	1.5E-02	1.3E-02	7.0E-07	5.8E-07	7.0E-07
PCB-81	MJ790	-	-	-	3.0E-03	2.3E-03	1.4E-07	1.0E-07	1.4E-07
Aroclor-1254	MJ791	8.6E-02	4.3E-02	U	-	-	-	-	-
Aroclor-1260	MJ791	8.6E-02	4.3E-02	U	-	-	-	-	-
PCB-105	MJ791	-	-	-	1.2E-01	8.2E-02	5.3E-06	3.5E-06	5.3E-06
PCB-114	MJ791	-	-	-	4.5E-03	1.5E-03	2.0E-07	6.3E-08	2.0E-07
PCB-118	MJ791	-	-	-	2.7E-01	1.6E-01	1.2E-05	7.0E-06	1.2E-05
PCB-123	MJ791	-	-	-	3.0E-03	2.3E-03	1.3E-07	1.0E-07	1.3E-07
PCB-126	MJ791	-	-	-	7.5E-03	6.4E-03	3.2E-07	2.7E-07	3.2E-07
PCB-156	MJ791	-	-	-	6.3E-02	5.5E-02	2.7E-06	2.3E-06	2.7E-06
PCB-157	MJ791	-	-	-	1.2E-02	2.5E-02	5.3E-07	1.1E-06	1.1E-06
PCB-167	MJ791	-	-	-	2.1E-02	4.3E-02	8.9E-07	1.8E-06	1.8E-06
PCB-169	MJ791	-	-	-	3.7E-04	6.4E-04	1.6E-08	2.7E-08	2.7E-08
PCB-189	MJ791	-	-	-	3.0E-03	6.4E-03	1.3E-07	2.7E-07	2.7E-07
PCB-77	MJ791	-	-	-	1.5E-02	1.3E-02	6.6E-07	5.5E-07	6.6E-07
PCB-81	MJ791	-	-	-	3.0E-03	2.3E-03	1.3E-07	9.7E-08	1.3E-07
Aroclor-1254	MJ794	9.0E-02	4.5E-02	U	-	-	-	-	-
Aroclor-1260	MJ794	9.0E-02	4.5E-02	U	-	-	-	-	-
PCB-105	MJ794	-	-	-	1.2E-01	8.2E-02	5.6E-06	3.7E-06	5.6E-06
PCB-114	MJ794	-	-	-	4.5E-03	1.5E-03	2.0E-07	6.5E-08	2.0E-07
PCB-118	MJ794	-	-	-	2.7E-01	1.6E-01	1.2E-05	7.4E-06	1.2E-05
PCB-123	MJ794	-	-	-	3.0E-03	2.3E-03	1.3E-07	1.0E-07	1.3E-07
PCB-126	MJ794	-	-	-	7.5E-03	6.4E-03	3.4E-07	2.9E-07	3.4E-07
PCB-156	MJ794	-	-	-	6.3E-02	5.5E-02	2.8E-06	2.5E-06	2.8E-06
PCB-157	MJ794	-	-	-	1.2E-02	2.5E-02	5.6E-07	1.1E-06	1.1E-06
PCB-167	MJ794	-	-	-	2.1E-02	4.3E-02	9.3E-07	1.9E-06	1.9E-06
PCB-169	MJ794	-	-	-	3.7E-04	6.4E-04	1.6E-08	2.9E-08	2.9E-08
PCB-189	MJ794	-	-	-	3.0E-03	6.4E-03	1.3E-07	2.9E-07	2.9E-07
PCB-77	MJ794	-	-	-	1.5E-02	1.3E-02	7.0E-07	5.7E-07	7.0E-07
PCB-81	MJ794	-	-	-	3.0E-03	2.3E-03	1.3E-07	1.0E-07	1.3E-07
Aroclor-1254	MJ795	1.0E-01	5.0E-02	U	-	-	-	-	-
Aroclor-1260	MJ795	1.0E-01	5.0E-02	U	-	-	-	-	-

Aroclor to PCB Congener Extrapolation (0-6 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentrations (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF_{1254}	EF_{1260}	Estimated Concentrations Aroclor-1254 (mg/kg)	Estimated Concentrations Aroclor-1260 (mg/kg)	Estimated Concentrations PCB_{MAX} (mg/kg)
PCB-105	MJ795	-	-	-	1.2E-01	8.2E-02	6.2E-06	4.1E-06	6.2E-06
PCB-114	MJ795	-	-	-	4.5E-03	1.5E-03	2.3E-07	7.3E-08	2.3E-07
PCB-118	MJ795	-	-	-	2.7E-01	1.6E-01	1.3E-05	8.2E-06	1.3E-05
PCB-123	MJ795	-	-	-	3.0E-03	2.3E-03	1.5E-07	1.2E-07	1.5E-07
PCB-126	MJ795	-	-	-	7.5E-03	6.4E-03	3.8E-07	3.2E-07	3.8E-07
PCB-156	MJ795	-	-	-	6.3E-02	5.5E-02	3.1E-06	2.7E-06	3.1E-06
PCB-157	MJ795	-	-	-	1.2E-02	2.5E-02	6.2E-07	1.2E-06	1.2E-06
PCB-167	MJ795	-	-	-	2.1E-02	4.3E-02	1.0E-06	2.1E-06	2.1E-06
PCB-169	MJ795	-	-	-	3.7E-04	6.4E-04	1.8E-08	3.2E-08	3.2E-08
PCB-189	MJ795	-	-	-	3.0E-03	6.4E-03	1.5E-07	3.2E-07	3.2E-07
PCB-77	MJ795	-	-	-	1.5E-02	1.3E-02	7.7E-07	6.4E-07	7.7E-07
PCB-81	MJ795	-	-	-	3.0E-03	2.3E-03	1.5E-07	1.1E-07	1.5E-07
Aroclor-1254	MJ796	1.9E-01	9.5E-02	U	-	-	-	-	-
Aroclor-1260	MJ796	1.9E-01	9.5E-02	U	-	-	-	-	-
PCB-105	MJ796	-	-	-	1.2E-01	8.2E-02	1.2E-05	7.8E-06	1.2E-05
PCB-114	MJ796	-	-	-	4.5E-03	1.5E-03	4.3E-07	1.4E-07	4.3E-07
PCB-118	MJ796	-	-	-	2.7E-01	1.6E-01	2.5E-05	1.6E-05	2.5E-05
PCB-123	MJ796	-	-	-	3.0E-03	2.3E-03	2.8E-07	2.2E-07	2.8E-07
PCB-126	MJ796	-	-	-	7.5E-03	6.4E-03	7.1E-07	6.0E-07	7.1E-07
PCB-156	MJ796	-	-	-	6.3E-02	5.5E-02	6.0E-06	5.2E-06	6.0E-06
PCB-157	MJ796	-	-	-	1.2E-02	2.5E-02	1.2E-06	2.3E-06	2.3E-06
PCB-167	MJ796	-	-	-	2.1E-02	4.3E-02	2.0E-06	4.1E-06	4.1E-06
PCB-169	MJ796	-	-	-	3.7E-04	6.4E-04	3.5E-08	6.0E-08	6.0E-08
PCB-189	MJ796	-	-	-	3.0E-03	6.4E-03	2.8E-07	6.0E-07	6.0E-07
PCB-77	MJ796	-	-	-	1.5E-02	1.3E-02	1.5E-06	1.2E-06	1.5E-06
PCB-81	MJ796	-	-	-	3.0E-03	2.3E-03	2.8E-07	2.1E-07	2.8E-07
Aroclor-1254	MJ798	8.4E-02	4.2E-02	U	-	-	-	-	-
Aroclor-1260	MJ798	8.4E-02	4.2E-02	U	-	-	-	-	-
PCB-105	MJ798	-	-	-	1.2E-01	8.2E-02	5.2E-06	3.4E-06	5.2E-06
PCB-114	MJ798	-	-	-	4.5E-03	1.5E-03	1.9E-07	6.1E-08	1.9E-07
PCB-118	MJ798	-	-	-	2.7E-01	1.6E-01	1.1E-05	6.9E-06	1.1E-05
PCB-123	MJ798	-	-	-	3.0E-03	2.3E-03	1.3E-07	9.7E-08	1.3E-07
PCB-126	MJ798	-	-	-	7.5E-03	6.4E-03	3.2E-07	2.7E-07	3.2E-07
PCB-156	MJ798	-	-	-	6.3E-02	5.5E-02	2.6E-06	2.3E-06	2.6E-06
PCB-157	MJ798	-	-	-	1.2E-02	2.5E-02	5.2E-07	1.0E-06	1.0E-06
PCB-167	MJ798	-	-	-	2.1E-02	4.3E-02	8.7E-07	1.8E-06	1.8E-06
PCB-169	MJ798	-	-	-	3.7E-04	6.4E-04	1.5E-08	2.7E-08	2.7E-08
PCB-189	MJ798	-	-	-	3.0E-03	6.4E-03	1.3E-07	2.7E-07	2.7E-07
PCB-77	MJ798	-	-	-	1.5E-02	1.3E-02	6.5E-07	5.3E-07	6.5E-07
PCB-81	MJ798	-	-	-	3.0E-03	2.3E-03	1.3E-07	9.5E-08	1.3E-07
Aroclor-1254	MJ799	8.2E-02	4.1E-02	U	-	-	-	-	-
Aroclor-1260	MJ799	8.2E-02	4.1E-02	U	-	-	-	-	-
PCB-105	MJ799	-	-	-	1.2E-01	8.2E-02	5.1E-06	3.4E-06	5.1E-06
PCB-114	MJ799	-	-	-	4.5E-03	1.5E-03	1.9E-07	6.0E-08	1.9E-07
PCB-118	MJ799	-	-	-	2.7E-01	1.6E-01	1.1E-05	6.7E-06	1.1E-05
PCB-123	MJ799	-	-	-	3.0E-03	2.3E-03	1.2E-07	9.5E-08	1.2E-07
PCB-126	MJ799	-	-	-	7.5E-03	6.4E-03	3.1E-07	2.6E-07	3.1E-07
PCB-156	MJ799	-	-	-	6.3E-02	5.5E-02	2.6E-06	2.2E-06	2.6E-06
PCB-157	MJ799	-	-	-	1.2E-02	2.5E-02	5.1E-07	1.0E-06	1.0E-06
PCB-167	MJ799	-	-	-	2.1E-02	4.3E-02	8.5E-07	1.8E-06	1.8E-06
PCB-169	MJ799	-	-	-	3.7E-04	6.4E-04	1.5E-08	2.6E-08	2.6E-08
PCB-189	MJ799	-	-	-	3.0E-03	6.4E-03	1.2E-07	2.6E-07	2.6E-07
PCB-77	MJ799	-	-	-	1.5E-02	1.3E-02	6.3E-07	5.2E-07	6.3E-07
PCB-81	MJ799	-	-	-	3.0E-03	2.3E-03	1.2E-07	9.2E-08	1.2E-07
Aroclor-1254	MJ800	8.1E-02	4.1E-02	U	-	-	-	-	-
Aroclor-1260	MJ800	8.1E-02	4.1E-02	U	-	-	-	-	-
PCB-105	MJ800	-	-	-	1.2E-01	8.2E-02	5.0E-06	3.3E-06	5.0E-06
PCB-114	MJ800	-	-	-	4.5E-03	1.5E-03	1.8E-07	5.9E-08	1.8E-07

Aroclor to PCB Congener Extrapolation (0-6 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentrations (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF_{1254}	EF_{1260}	Estimated Concentrations Aroclor-1254 (mg/kg)	Estimated Concentrations Aroclor-1260 (mg/kg)	Estimated Concentrations PCB_{MAX} (mg/kg)
PCB-118	MJ800	-	-	-	2.7E-01	1.6E-01	1.1E-05	6.6E-06	1.1E-05
PCB-123	MJ800	-	-	-	3.0E-03	2.3E-03	1.2E-07	9.4E-08	1.2E-07
PCB-126	MJ800	-	-	-	7.5E-03	6.4E-03	3.0E-07	2.6E-07	3.0E-07
PCB-156	MJ800	-	-	-	6.3E-02	5.5E-02	2.5E-06	2.2E-06	2.5E-06
PCB-157	MJ800	-	-	-	1.2E-02	2.5E-02	5.0E-07	9.9E-07	9.9E-07
PCB-167	MJ800	-	-	-	2.1E-02	4.3E-02	8.4E-07	1.7E-06	1.7E-06
PCB-169	MJ800	-	-	-	3.7E-04	6.4E-04	1.5E-08	2.6E-08	2.6E-08
PCB-189	MJ800	-	-	-	3.0E-03	6.4E-03	1.2E-07	2.6E-07	2.6E-07
PCB-77	MJ800	-	-	-	1.5E-02	1.3E-02	6.3E-07	5.2E-07	6.3E-07
PCB-81	MJ800	-	-	-	3.0E-03	2.3E-03	1.2E-07	9.1E-08	1.2E-07
Aroclor-1254	MJ803	9.6E-02	4.8E-02	U	-	-	-	-	-
Aroclor-1260	MJ803	9.6E-02	4.8E-02	U	-	-	-	-	-
PCB-105	MJ803	-	-	-	1.2E-01	8.2E-02	5.9E-06	3.9E-06	5.9E-06
PCB-114	MJ803	-	-	-	4.5E-03	1.5E-03	2.2E-07	7.0E-08	2.2E-07
PCB-118	MJ803	-	-	-	2.7E-01	1.6E-01	1.3E-05	7.9E-06	1.3E-05
PCB-123	MJ803	-	-	-	3.0E-03	2.3E-03	1.4E-07	1.1E-07	1.4E-07
PCB-126	MJ803	-	-	-	7.5E-03	6.4E-03	3.6E-07	3.1E-07	3.6E-07
PCB-156	MJ803	-	-	-	6.3E-02	5.5E-02	3.0E-06	2.6E-06	3.0E-06
PCB-157	MJ803	-	-	-	1.2E-02	2.5E-02	5.9E-07	1.2E-06	1.2E-06
PCB-167	MJ803	-	-	-	2.1E-02	4.3E-02	9.9E-07	2.1E-06	2.1E-06
PCB-169	MJ803	-	-	-	3.7E-04	6.4E-04	1.8E-08	3.1E-08	3.1E-08
PCB-189	MJ803	-	-	-	3.0E-03	6.4E-03	1.4E-07	3.1E-07	3.1E-07
PCB-77	MJ803	-	-	-	1.5E-02	1.3E-02	7.4E-07	6.1E-07	7.4E-07
PCB-81	MJ803	-	-	-	3.0E-03	2.3E-03	1.4E-07	1.1E-07	1.4E-07
Aroclor-1254	MJ805	9.4E-02	4.7E-02	U	-	-	-	-	-
Aroclor-1260	MJ805	9.4E-02	4.7E-02	U	-	-	-	-	-
PCB-105	MJ805	-	-	-	1.2E-01	8.2E-02	5.8E-06	3.8E-06	5.8E-06
PCB-114	MJ805	-	-	-	4.5E-03	1.5E-03	2.1E-07	6.8E-08	2.1E-07
PCB-118	MJ805	-	-	-	2.7E-01	1.6E-01	1.3E-05	7.7E-06	1.3E-05
PCB-123	MJ805	-	-	-	3.0E-03	2.3E-03	1.4E-07	1.1E-07	1.4E-07
PCB-126	MJ805	-	-	-	7.5E-03	6.4E-03	3.5E-07	3.0E-07	3.5E-07
PCB-156	MJ805	-	-	-	6.3E-02	5.5E-02	3.0E-06	2.6E-06	3.0E-06
PCB-157	MJ805	-	-	-	1.2E-02	2.5E-02	5.8E-07	1.2E-06	1.2E-06
PCB-167	MJ805	-	-	-	2.1E-02	4.3E-02	9.7E-07	2.0E-06	2.0E-06
PCB-169	MJ805	-	-	-	3.7E-04	6.4E-04	1.7E-08	3.0E-08	3.0E-08
PCB-189	MJ805	-	-	-	3.0E-03	6.4E-03	1.4E-07	3.0E-07	3.0E-07
PCB-77	MJ805	-	-	-	1.5E-02	1.3E-02	7.3E-07	6.0E-07	7.3E-07
PCB-81	MJ805	-	-	-	3.0E-03	2.3E-03	1.4E-07	1.1E-07	1.4E-07
Aroclor-1254	MJ806	8.6E-02	4.3E-02	U	-	-	-	-	-
Aroclor-1260	MJ806	8.6E-02	4.3E-02	U	-	-	-	-	-
PCB-105	MJ806	-	-	-	1.2E-01	8.2E-02	5.3E-06	3.5E-06	5.3E-06
PCB-114	MJ806	-	-	-	4.5E-03	1.5E-03	2.0E-07	6.3E-08	2.0E-07
PCB-118	MJ806	-	-	-	2.7E-01	1.6E-01	1.2E-05	7.0E-06	1.2E-05
PCB-123	MJ806	-	-	-	3.0E-03	2.3E-03	1.3E-07	1.0E-07	1.3E-07
PCB-126	MJ806	-	-	-	7.5E-03	6.4E-03	3.2E-07	2.7E-07	3.2E-07
PCB-156	MJ806	-	-	-	6.3E-02	5.5E-02	2.7E-06	2.3E-06	2.7E-06
PCB-157	MJ806	-	-	-	1.2E-02	2.5E-02	5.3E-07	1.1E-06	1.1E-06
PCB-167	MJ806	-	-	-	2.1E-02	4.3E-02	8.9E-07	1.8E-06	1.8E-06
PCB-169	MJ806	-	-	-	3.7E-04	6.4E-04	1.6E-08	2.7E-08	2.7E-08
PCB-189	MJ806	-	-	-	3.0E-03	6.4E-03	1.3E-07	2.7E-07	2.7E-07
PCB-77	MJ806	-	-	-	1.5E-02	1.3E-02	6.6E-07	5.5E-07	6.6E-07
PCB-81	MJ806	-	-	-	3.0E-03	2.3E-03	1.3E-07	9.7E-08	1.3E-07
Aroclor-1254	MJ808	8.9E+00	4.5E+00	U	-	-	-	-	-
Aroclor-1260	MJ808	8.9E+00	4.5E+00	U	-	-	-	-	-
PCB-105	MJ808	-	-	-	1.2E-01	8.2E-02	5.5E-04	3.6E-04	5.5E-04
PCB-114	MJ808	-	-	-	4.5E-03	1.5E-03	2.0E-05	6.5E-06	2.0E-05
PCB-118	MJ808	-	-	-	2.7E-01	1.6E-01	1.2E-03	7.3E-04	1.2E-03
PCB-123	MJ808	-	-	-	3.0E-03	2.3E-03	1.3E-05	1.0E-05	1.3E-05

Aroclor to PCB Congener Extrapolation (0-6 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentrations (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF_{1254}	EF_{1260}	Estimated Concentrations Aroclor-1254 (mg/kg)	Estimated Concentrations Aroclor-1260 (mg/kg)	Estimated Concentrations PCB_{MAX} (mg/kg)
PCB-126	MJ808	-	-	-	7.5E-03	6.4E-03	3.3E-05	2.8E-05	3.3E-05
PCB-156	MJ808	-	-	-	6.3E-02	5.5E-02	2.8E-04	2.4E-04	2.8E-04
PCB-157	MJ808	-	-	-	1.2E-02	2.5E-02	5.5E-05	1.1E-04	1.1E-04
PCB-167	MJ808	-	-	-	2.1E-02	4.3E-02	9.2E-05	1.9E-04	1.9E-04
PCB-169	MJ808	-	-	-	3.7E-04	6.4E-04	1.6E-06	2.8E-06	2.8E-06
PCB-189	MJ808	-	-	-	3.0E-03	6.4E-03	1.3E-05	2.8E-05	2.8E-05
PCB-77	MJ808	-	-	-	1.5E-02	1.3E-02	6.9E-05	5.7E-05	6.9E-05
PCB-81	MJ808	-	-	-	3.0E-03	2.3E-03	1.3E-05	1.0E-05	1.3E-05
Aroclor-1254	MJ814	5.6E-02	2.8E-02	U	-	-	-	-	-
Aroclor-1260	MJ814	5.6E-02	2.8E-02	U	-	-	-	-	-
PCB-105	MJ814	-	-	-	1.2E-01	8.2E-02	3.5E-06	2.3E-06	3.5E-06
PCB-114	MJ814	-	-	-	4.5E-03	1.5E-03	1.3E-07	4.1E-08	1.3E-07
PCB-118	MJ814	-	-	-	2.7E-01	1.6E-01	7.5E-06	4.6E-06	7.5E-06
PCB-123	MJ814	-	-	-	3.0E-03	2.3E-03	8.4E-08	6.5E-08	8.4E-08
PCB-126	MJ814	-	-	-	7.5E-03	6.4E-03	2.1E-07	1.8E-07	2.1E-07
PCB-156	MJ814	-	-	-	6.3E-02	5.5E-02	1.8E-06	1.5E-06	1.8E-06
PCB-157	MJ814	-	-	-	1.2E-02	2.5E-02	3.5E-07	6.9E-07	6.9E-07
PCB-167	MJ814	-	-	-	2.1E-02	4.3E-02	5.8E-07	1.2E-06	1.2E-06
PCB-169	MJ814	-	-	-	3.7E-04	6.4E-04	1.0E-08	1.8E-08	1.8E-08
PCB-189	MJ814	-	-	-	3.0E-03	6.4E-03	8.4E-08	1.8E-07	1.8E-07
PCB-77	MJ814	-	-	-	1.5E-02	1.3E-02	4.3E-07	3.6E-07	4.3E-07
PCB-81	MJ814	-	-	-	3.0E-03	2.3E-03	8.4E-08	6.3E-08	8.4E-08
Aroclor-1254	MT801	5.1E-02	2.6E-02	U	-	-	-	-	-
Aroclor-1260	MT801	5.1E-02	2.6E-02	U	-	-	-	-	-
PCB-105	MT801	-	-	-	1.2E-01	8.2E-02	3.2E-06	2.1E-06	3.2E-06
PCB-114	MT801	-	-	-	4.5E-03	1.5E-03	1.2E-07	3.7E-08	1.2E-07
PCB-118	MT801	-	-	-	2.7E-01	1.6E-01	6.8E-06	4.2E-06	6.8E-06
PCB-123	MT801	-	-	-	3.0E-03	2.3E-03	7.6E-08	5.9E-08	7.6E-08
PCB-126	MT801	-	-	-	7.5E-03	6.4E-03	1.9E-07	1.6E-07	1.9E-07
PCB-156	MT801	-	-	-	6.3E-02	5.5E-02	1.6E-06	1.4E-06	1.6E-06
PCB-157	MT801	-	-	-	1.2E-02	2.5E-02	3.2E-07	6.3E-07	6.3E-07
PCB-167	MT801	-	-	-	2.1E-02	4.3E-02	5.3E-07	1.1E-06	1.1E-06
PCB-169	MT801	-	-	-	3.7E-04	6.4E-04	9.3E-09	1.6E-08	1.6E-08
PCB-189	MT801	-	-	-	3.0E-03	6.4E-03	7.6E-08	1.6E-07	1.6E-07
PCB-77	MT801	-	-	-	1.5E-02	1.3E-02	3.9E-07	3.2E-07	3.9E-07
PCB-81	MT801	-	-	-	3.0E-03	2.3E-03	7.6E-08	5.7E-08	7.6E-08
Aroclor-1254	MT802	5.1E-02	2.6E-02	U	-	-	-	-	-
Aroclor-1260	MT802	5.1E-02	2.6E-02	U	-	-	-	-	-
PCB-105	MT802	-	-	-	1.2E-01	8.2E-02	3.2E-06	2.1E-06	3.2E-06
PCB-114	MT802	-	-	-	4.5E-03	1.5E-03	1.2E-07	3.7E-08	1.2E-07
PCB-118	MT802	-	-	-	2.7E-01	1.6E-01	6.8E-06	4.2E-06	6.8E-06
PCB-123	MT802	-	-	-	3.0E-03	2.3E-03	7.6E-08	5.9E-08	7.6E-08
PCB-126	MT802	-	-	-	7.5E-03	6.4E-03	1.9E-07	1.6E-07	1.9E-07
PCB-156	MT802	-	-	-	6.3E-02	5.5E-02	1.6E-06	1.4E-06	1.6E-06
PCB-157	MT802	-	-	-	1.2E-02	2.5E-02	3.2E-07	6.3E-07	6.3E-07
PCB-167	MT802	-	-	-	2.1E-02	4.3E-02	5.3E-07	1.1E-06	1.1E-06
PCB-169	MT802	-	-	-	3.7E-04	6.4E-04	9.3E-09	1.6E-08	1.6E-08
PCB-189	MT802	-	-	-	3.0E-03	6.4E-03	7.6E-08	1.6E-07	1.6E-07
PCB-77	MT802	-	-	-	1.5E-02	1.3E-02	3.9E-07	3.2E-07	3.9E-07
PCB-81	MT802	-	-	-	3.0E-03	2.3E-03	7.6E-08	5.7E-08	7.6E-08
Aroclor-1254	RJ772	9.4E-02	9.4E-02	J	-	-	-	-	-
Aroclor-1260	RJ772	2.0E-02	2.0E-02	J	-	-	-	-	-
PCB-105	RJ772	-	-	-	1.2E-01	8.2E-02	1.2E-05	1.6E-06	1.2E-05
PCB-114	RJ772	-	-	-	4.5E-03	1.5E-03	4.3E-07	2.9E-08	4.3E-07
PCB-118	RJ772	-	-	-	2.7E-01	1.6E-01	2.5E-05	3.3E-06	2.5E-05
PCB-123	RJ772	-	-	-	3.0E-03	2.3E-03	2.8E-07	4.6E-08	2.8E-07
PCB-126	RJ772	-	-	-	7.5E-03	6.4E-03	7.1E-07	1.3E-07	7.1E-07
PCB-156	RJ772	-	-	-	6.3E-02	5.5E-02	5.9E-06	1.1E-06	5.9E-06

Aroclor to PCB Congener Extrapolation (0-6 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentrations (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF_{1254}	EF_{1260}	Estimated Concentrations Aroclor-1254 (mg/kg)	Estimated Concentrations Aroclor-1260 (mg/kg)	Estimated Concentrations PCB_{MAX} (mg/kg)
PCB-157	RJ772	-	-	-	1.2E-02	2.5E-02	1.2E-06	4.9E-07	1.2E-06
PCB-167	RJ772	-	-	-	2.1E-02	4.3E-02	1.9E-06	8.5E-07	1.9E-06
PCB-169	RJ772	-	-	-	3.7E-04	6.4E-04	3.4E-08	1.3E-08	3.4E-08
PCB-189	RJ772	-	-	-	3.0E-03	6.4E-03	2.8E-07	1.3E-07	2.8E-07
PCB-77	RJ772	-	-	-	1.5E-02	1.3E-02	1.5E-06	2.5E-07	1.5E-06
PCB-81	RJ772	-	-	-	3.0E-03	2.3E-03	2.8E-07	4.5E-08	2.8E-07
Aroclor-1254	RJ774	3.4E-02	1.7E-02	U	-	-	-	-	-
Aroclor-1260	RJ774	3.4E-02	1.7E-02	U	-	-	-	-	-
PCB-105	RJ774	-	-	-	1.2E-01	8.2E-02	2.1E-06	1.4E-06	2.1E-06
PCB-114	RJ774	-	-	-	4.5E-03	1.5E-03	7.7E-08	2.5E-08	7.7E-08
PCB-118	RJ774	-	-	-	2.7E-01	1.6E-01	4.6E-06	2.8E-06	4.6E-06
PCB-123	RJ774	-	-	-	3.0E-03	2.3E-03	5.1E-08	3.9E-08	5.1E-08
PCB-126	RJ774	-	-	-	7.5E-03	6.4E-03	1.3E-07	1.1E-07	1.3E-07
PCB-156	RJ774	-	-	-	6.3E-02	5.5E-02	1.1E-06	9.3E-07	1.1E-06
PCB-157	RJ774	-	-	-	1.2E-02	2.5E-02	2.1E-07	4.2E-07	4.2E-07
PCB-167	RJ774	-	-	-	2.1E-02	4.3E-02	3.5E-07	7.3E-07	7.3E-07
PCB-169	RJ774	-	-	-	3.7E-04	6.4E-04	6.2E-09	1.1E-08	1.1E-08
PCB-189	RJ774	-	-	-	3.0E-03	6.4E-03	5.1E-08	1.1E-07	1.1E-07
PCB-77	RJ774	-	-	-	1.5E-02	1.3E-02	2.6E-07	2.2E-07	2.6E-07
PCB-81	RJ774	-	-	-	3.0E-03	2.3E-03	5.1E-08	3.8E-08	5.1E-08
Aroclor-1254	RJ777	3.5E-02	1.8E-02	U	-	-	-	-	-
Aroclor-1260	RJ777	3.5E-02	1.8E-02	U	-	-	-	-	-
PCB-105	RJ777	-	-	-	1.2E-01	8.2E-02	2.2E-06	1.4E-06	2.2E-06
PCB-114	RJ777	-	-	-	4.5E-03	1.5E-03	7.9E-08	2.5E-08	7.9E-08
PCB-118	RJ777	-	-	-	2.7E-01	1.6E-01	4.7E-06	2.9E-06	4.7E-06
PCB-123	RJ777	-	-	-	3.0E-03	2.3E-03	5.2E-08	4.1E-08	5.2E-08
PCB-126	RJ777	-	-	-	7.5E-03	6.4E-03	1.3E-07	1.1E-07	1.3E-07
PCB-156	RJ777	-	-	-	6.3E-02	5.5E-02	1.1E-06	9.5E-07	1.1E-06
PCB-157	RJ777	-	-	-	1.2E-02	2.5E-02	2.2E-07	4.3E-07	4.3E-07
PCB-167	RJ777	-	-	-	2.1E-02	4.3E-02	3.6E-07	7.5E-07	7.5E-07
PCB-169	RJ777	-	-	-	3.7E-04	6.4E-04	6.4E-09	1.1E-08	1.1E-08
PCB-189	RJ777	-	-	-	3.0E-03	6.4E-03	5.2E-08	1.1E-07	1.1E-07
PCB-77	RJ777	-	-	-	1.5E-02	1.3E-02	2.7E-07	2.2E-07	2.7E-07
PCB-81	RJ777	-	-	-	3.0E-03	2.3E-03	5.2E-08	3.9E-08	5.2E-08
Aroclor-1254	RJ782	6.7E-02	3.4E-02	U	-	-	-	-	-
Aroclor-1260	RJ782	6.7E-02	3.4E-02	U	-	-	-	-	-
PCB-105	RJ782	-	-	-	1.2E-01	8.2E-02	4.1E-06	2.7E-06	4.1E-06
PCB-114	RJ782	-	-	-	4.5E-03	1.5E-03	1.5E-07	4.9E-08	1.5E-07
PCB-118	RJ782	-	-	-	2.7E-01	1.6E-01	9.0E-06	5.5E-06	9.0E-06
PCB-123	RJ782	-	-	-	3.0E-03	2.3E-03	1.0E-07	7.8E-08	1.0E-07
PCB-126	RJ782	-	-	-	7.5E-03	6.4E-03	2.5E-07	2.1E-07	2.5E-07
PCB-156	RJ782	-	-	-	6.3E-02	5.5E-02	2.1E-06	1.8E-06	2.1E-06
PCB-157	RJ782	-	-	-	1.2E-02	2.5E-02	4.1E-07	8.2E-07	8.2E-07
PCB-167	RJ782	-	-	-	2.1E-02	4.3E-02	6.9E-07	1.4E-06	1.4E-06
PCB-169	RJ782	-	-	-	3.7E-04	6.4E-04	1.2E-08	2.1E-08	2.1E-08
PCB-189	RJ782	-	-	-	3.0E-03	6.4E-03	1.0E-07	2.1E-07	2.1E-07
PCB-77	RJ782	-	-	-	1.5E-02	1.3E-02	5.2E-07	4.3E-07	5.2E-07
PCB-81	RJ782	-	-	-	3.0E-03	2.3E-03	1.0E-07	7.5E-08	1.0E-07
Aroclor-1254	RS288	1.1E-01	5.5E-02	U	-	-	-	-	-
Aroclor-1260	RS288	1.1E-01	5.5E-02	U	-	-	-	-	-
PCB-105	RS288	-	-	-	1.2E-01	8.2E-02	6.8E-06	4.5E-06	6.8E-06
PCB-114	RS288	-	-	-	4.5E-03	1.5E-03	2.5E-07	8.0E-08	2.5E-07
PCB-118	RS288	-	-	-	2.7E-01	1.6E-01	1.5E-05	9.0E-06	1.5E-05
PCB-123	RS288	-	-	-	3.0E-03	2.3E-03	1.6E-07	1.3E-07	1.6E-07
PCB-126	RS288	-	-	-	7.5E-03	6.4E-03	4.1E-07	3.5E-07	4.1E-07
PCB-156	RS288	-	-	-	6.3E-02	5.5E-02	3.5E-06	3.0E-06	3.5E-06
PCB-157	RS288	-	-	-	1.2E-02	2.5E-02	6.8E-07	1.4E-06	1.4E-06
PCB-167	RS288	-	-	-	2.1E-02	4.3E-02	1.1E-06	2.4E-06	2.4E-06

Aroclor to PCB Congener Extrapolation (0-6 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentrations (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF_{1254}	EF_{1260}	Estimated Concentrations Aroclor-1254 (mg/kg)	Estimated Concentrations Aroclor-1260 (mg/kg)	Estimated Concentrations PCB_{MAX} (mg/kg)
PCB-169	RS288	-	-	-	3.7E-04	6.4E-04	2.0E-08	3.5E-08	3.5E-08
PCB-189	RS288	-	-	-	3.0E-03	6.4E-03	1.6E-07	3.5E-07	3.5E-07
PCB-77	RS288	-	-	-	1.5E-02	1.3E-02	8.5E-07	7.0E-07	8.5E-07
PCB-81	RS288	-	-	-	3.0E-03	2.3E-03	1.6E-07	1.2E-07	1.6E-07
Aroclor-1254	RS293	1.1E-01	5.5E-02	U	-	-	-	-	-
Aroclor-1260	RS293	1.1E-01	5.5E-02	U	-	-	-	-	-
PCB-105	RS293	-	-	-	1.2E-01	8.2E-02	6.8E-06	4.5E-06	6.8E-06
PCB-114	RS293	-	-	-	4.5E-03	1.5E-03	2.5E-07	8.0E-08	2.5E-07
PCB-118	RS293	-	-	-	2.7E-01	1.6E-01	1.5E-05	9.0E-06	1.5E-05
PCB-123	RS293	-	-	-	3.0E-03	2.3E-03	1.6E-07	1.3E-07	1.6E-07
PCB-126	RS293	-	-	-	7.5E-03	6.4E-03	4.1E-07	3.5E-07	4.1E-07
PCB-156	RS293	-	-	-	6.3E-02	5.5E-02	3.5E-06	3.0E-06	3.5E-06
PCB-157	RS293	-	-	-	1.2E-02	2.5E-02	6.8E-07	1.4E-06	1.4E-06
PCB-167	RS293	-	-	-	2.1E-02	4.3E-02	1.1E-06	2.4E-06	2.4E-06
PCB-169	RS293	-	-	-	3.7E-04	6.4E-04	2.0E-08	3.5E-08	3.5E-08
PCB-189	RS293	-	-	-	3.0E-03	6.4E-03	1.6E-07	3.5E-07	3.5E-07
PCB-77	RS293	-	-	-	1.5E-02	1.3E-02	8.5E-07	7.0E-07	8.5E-07
PCB-81	RS293	-	-	-	3.0E-03	2.3E-03	1.6E-07	1.2E-07	1.6E-07
Aroclor-1254	RS294	1.1E-01	5.5E-02	U	-	-	-	-	-
Aroclor-1260	RS294	1.1E-01	5.5E-02	U	-	-	-	-	-
PCB-105	RS294	-	-	-	1.2E-01	8.2E-02	6.8E-06	4.5E-06	6.8E-06
PCB-114	RS294	-	-	-	4.5E-03	1.5E-03	2.5E-07	8.0E-08	2.5E-07
PCB-118	RS294	-	-	-	2.7E-01	1.6E-01	1.5E-05	9.0E-06	1.5E-05
PCB-123	RS294	-	-	-	3.0E-03	2.3E-03	1.6E-07	1.3E-07	1.6E-07
PCB-126	RS294	-	-	-	7.5E-03	6.4E-03	4.1E-07	3.5E-07	4.1E-07
PCB-156	RS294	-	-	-	6.3E-02	5.5E-02	3.5E-06	3.0E-06	3.5E-06
PCB-157	RS294	-	-	-	1.2E-02	2.5E-02	6.8E-07	1.4E-06	1.4E-06
PCB-167	RS294	-	-	-	2.1E-02	4.3E-02	1.1E-06	2.4E-06	2.4E-06
PCB-169	RS294	-	-	-	3.7E-04	6.4E-04	2.0E-08	3.5E-08	3.5E-08
PCB-189	RS294	-	-	-	3.0E-03	6.4E-03	1.6E-07	3.5E-07	3.5E-07
PCB-77	RS294	-	-	-	1.5E-02	1.3E-02	8.5E-07	7.0E-07	8.5E-07
PCB-81	RS294	-	-	-	3.0E-03	2.3E-03	1.6E-07	1.2E-07	1.6E-07
Aroclor-1254	RS320	1.1E-01	5.5E-02	U	-	-	-	-	-
Aroclor-1260	RS320	1.1E-01	5.5E-02	U	-	-	-	-	-
PCB-105	RS320	-	-	-	1.2E-01	8.2E-02	6.8E-06	4.5E-06	6.8E-06
PCB-114	RS320	-	-	-	4.5E-03	1.5E-03	2.5E-07	8.0E-08	2.5E-07
PCB-118	RS320	-	-	-	2.7E-01	1.6E-01	1.5E-05	9.0E-06	1.5E-05
PCB-123	RS320	-	-	-	3.0E-03	2.3E-03	1.6E-07	1.3E-07	1.6E-07
PCB-126	RS320	-	-	-	7.5E-03	6.4E-03	4.1E-07	3.5E-07	4.1E-07
PCB-156	RS320	-	-	-	6.3E-02	5.5E-02	3.5E-06	3.0E-06	3.5E-06
PCB-157	RS320	-	-	-	1.2E-02	2.5E-02	6.8E-07	1.4E-06	1.4E-06
PCB-167	RS320	-	-	-	2.1E-02	4.3E-02	1.1E-06	2.4E-06	2.4E-06
PCB-169	RS320	-	-	-	3.7E-04	6.4E-04	2.0E-08	3.5E-08	3.5E-08
PCB-189	RS320	-	-	-	3.0E-03	6.4E-03	1.6E-07	3.5E-07	3.5E-07
PCB-77	RS320	-	-	-	1.5E-02	1.3E-02	8.5E-07	7.0E-07	8.5E-07
PCB-81	RS320	-	-	-	3.0E-03	2.3E-03	1.6E-07	1.2E-07	1.6E-07
Aroclor-1254	RS323	2.2E+00	2.2E+00		-	-	-	-	-
Aroclor-1260	RS323	1.0E+00	5.0E-01	U	-	-	-	-	-
PCB-105	RS323	-	-	-	1.2E-01	8.2E-02	2.7E-04	4.1E-05	2.7E-04
PCB-114	RS323	-	-	-	4.5E-03	1.5E-03	1.0E-05	7.3E-07	1.0E-05
PCB-118	RS323	-	-	-	2.7E-01	1.6E-01	5.9E-04	8.2E-05	5.9E-04
PCB-123	RS323	-	-	-	3.0E-03	2.3E-03	6.6E-06	1.2E-06	6.6E-06
PCB-126	RS323	-	-	-	7.5E-03	6.4E-03	1.7E-05	3.2E-06	1.7E-05
PCB-156	RS323	-	-	-	6.3E-02	5.5E-02	1.4E-04	2.7E-05	1.4E-04
PCB-157	RS323	-	-	-	1.2E-02	2.5E-02	2.7E-05	1.2E-05	2.7E-05
PCB-167	RS323	-	-	-	2.1E-02	4.3E-02	4.5E-05	2.1E-05	4.5E-05
PCB-169	RS323	-	-	-	3.7E-04	6.4E-04	8.1E-07	3.2E-07	8.1E-07
PCB-189	RS323	-	-	-	3.0E-03	6.4E-03	6.6E-06	3.2E-06	6.6E-06

Aroclor to PCB Congener Extrapolation (0-6 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentrations (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF_{1254}	EF_{1260}	Estimated Concentrations Aroclor-1254 (mg/kg)	Estimated Concentrations Aroclor-1260 (mg/kg)	Estimated Concentrations PCB_{MAX} (mg/kg)
PCB-77	RS323	-	-	-	1.5E-02	1.3E-02	3.4E-05	6.4E-06	3.4E-05
PCB-81	RS323	-	-	-	3.0E-03	2.3E-03	6.6E-06	1.1E-06	6.6E-06
Aroclor-1254	RS324	1.1E-01	5.5E-02	U	-	-	-	-	-
Aroclor-1260	RS324	1.1E-01	5.5E-02	U	-	-	-	-	-
PCB-105	RS324	-	-	-	1.2E-01	8.2E-02	6.8E-06	4.5E-06	6.8E-06
PCB-114	RS324	-	-	-	4.5E-03	1.5E-03	2.5E-07	8.0E-08	2.5E-07
PCB-118	RS324	-	-	-	2.7E-01	1.6E-01	1.5E-05	9.0E-06	1.5E-05
PCB-123	RS324	-	-	-	3.0E-03	2.3E-03	1.6E-07	1.3E-07	1.6E-07
PCB-126	RS324	-	-	-	7.5E-03	6.4E-03	4.1E-07	3.5E-07	4.1E-07
PCB-156	RS324	-	-	-	6.3E-02	5.5E-02	3.5E-06	3.0E-06	3.5E-06
PCB-157	RS324	-	-	-	1.2E-02	2.5E-02	6.8E-07	1.4E-06	1.4E-06
PCB-167	RS324	-	-	-	2.1E-02	4.3E-02	1.1E-06	2.4E-06	2.4E-06
PCB-169	RS324	-	-	-	3.7E-04	6.4E-04	2.0E-08	3.5E-08	3.5E-08
PCB-189	RS324	-	-	-	3.0E-03	6.4E-03	1.6E-07	3.5E-07	3.5E-07
PCB-77	RS324	-	-	-	1.5E-02	1.3E-02	8.5E-07	7.0E-07	8.5E-07
PCB-81	RS324	-	-	-	3.0E-03	2.3E-03	1.6E-07	1.2E-07	1.6E-07

Notes:
PCBs - polychlorinated biphenyls
EF- Extrapolation Factor (ng congener/kg soil)/(µg Aroclor/kg soil)
"-" not applicable
mg/kg - milligrams per kilogram
ug/kg - micrograms per kilogram
ng/kg - nanograms per kilogram
bgs- below ground surface
PCB_{MAX} = the maximum of the extrapolated 1254 and 1260 concentrations

TPH to Petroleum Constituent Extrapolation for Soil (0-4 feet bgs) [a]
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
C08-C11 (Gasoline Range)	MJ110	1.40E+02	7.0E+01	U		-	-
C11-C14 (Kerosene Range)	MJ110	1.40E+02	7.0E+01	U		-	-
C14-C20 (Diesel Range)	MJ110	9.20E+01	9.2E+01	J		-	-
C20-C30 (Lubricant Oil Range)	MJ110	6.70E+02	6.7E+02			-	-
C11-C30	MJ110	-	8.3E+02	-		-	-
Benzene	MJ110	-	-	-	1.9E-06	-	-
Ethylbenzene	MJ110	-	-	-	1.5E-05	-	-
Toluene	MJ110	-	-	-	1.1E-05	-	-
m,p-Xylene	MJ110	-	-	-	1.8E-05	-	-
o-Xylene	MJ110	-	-	-	6.9E-06	-	-
Xylene (total)	MJ110	-	-	-	2.6E-05	-	-
2-Methylnaphthalene	MJ110	6.48E-03	3.2E-03	UJ	2.8E-02	-	3.2E-03
Acenaphthene	MJ110	1.96E-03	9.8E-04	U	4.5E-04	3.7E-01	9.8E-04
Acenaphthylene	MJ110	1.96E-03	9.8E-04	U	9.3E-05	7.7E-02	9.8E-04
Anthracene	MJ110	1.96E-03	9.8E-04	UJ	2.4E-04	2.0E-01	9.8E-04
Benzo(a)anthracene	MJ110	1.96E-03	9.8E-04	U	9.5E-06	7.9E-03	9.8E-04
Benzo(a)pyrene	MJ110	1.96E-03	9.8E-04	U	1.2E-05	9.7E-03	9.8E-04
Benzo(b)fluoranthene	MJ110	1.96E-03	9.8E-04	U	5.2E-06	4.3E-03	9.8E-04
Benzo(e)pyrene	MJ110	1.72E-01	1.7E-01		1.5E-05	1.3E-02	1.7E-01
Benzo(g,h,i)perylene	MJ110	1.84E-01	1.8E-01		2.7E-04	2.3E-01	1.8E-01
Benzo(k)fluoranthene	MJ110	4.63E-03	4.6E-03		1.7E-06	1.4E-03	4.6E-03
Chrysene	MJ110	2.01E-02	2.0E-02		1.4E-05	1.1E-02	2.0E-02
Dibenz(a,h)anthracene	MJ110	9.21E-03	9.2E-03		1.4E-05	1.1E-02	9.2E-03
Fluoranthene	MJ110	5.60E-03	5.6E-03		4.8E-05	4.0E-02	5.6E-03
Fluorene	MJ110	4.28E-03	2.1E-03	UJ	6.0E-04	5.0E-01	2.1E-03
Indeno(1,2,3-cd)pyrene	MJ110	1.23E-02	1.2E-02		1.8E-05	1.5E-02	1.2E-02
Naphthalene	MJ110	1.08E-02	5.4E-03	UJ	6.9E-03	-	5.4E-03
Perylene	MJ110	9.81E-02	9.8E-02		1.1E-05	9.0E-03	9.8E-02
Phenanthrene	MJ110	9.11E-03	9.1E-03	J	1.2E-03	9.7E-01	9.1E-03
Pyrene	MJ110	5.87E-03	5.9E-03		2.1E-04	1.7E-01	5.9E-03
C08-C11 (Gasoline Range)	OLDCONS1	1.00E-01	5.0E-02	U		-	-
C11-C14 (Kerosene Range)	OLDCONS1	1.00E-01	5.0E-02	U		-	-
C14-C20 (Diesel Range)	OLDCONS1	6.40E+01	6.4E+01			-	-
C20-C30 (Lubricant Oil Range)	OLDCONS1	1.00E-01	5.0E-02	U		-	-
C11-C30	OLDCONS1	-	6.4E+01	-		-	-
Benzene	OLDCONS1	5.00E-03	2.5E-03	U	1.9E-06	-	2.5E-03
Ethylbenzene	OLDCONS1	5.00E-03	2.5E-03	U	1.5E-05	-	2.5E-03
Toluene	OLDCONS1	3.00E-03	3.0E-03	J	1.1E-05	-	3.0E-03
m,p-Xylene	OLDCONS1	-	-	-	1.8E-05	-	-
o-Xylene	OLDCONS1	-	-	-	6.9E-06	-	-
Xylene (total)	OLDCONS1	5.00E-03	2.5E-03	U	2.6E-05	-	2.5E-03
2-Methylnaphthalene	OLDCONS1	3.00E-01	1.5E-01	U	2.8E-02	-	1.5E-01
Acenaphthene	OLDCONS1	3.00E-01	1.5E-01	U	4.5E-04	2.9E-02	2.9E-02
Acenaphthylene	OLDCONS1	3.00E-01	1.5E-01	U	9.3E-05	5.9E-03	5.9E-03
Anthracene	OLDCONS1	3.00E-01	1.5E-01	U	2.4E-04	1.5E-02	1.5E-02
Benzo(a)anthracene	OLDCONS1	3.00E-01	1.5E-01	U	9.5E-06	6.1E-04	6.1E-04
Benzo(a)pyrene	OLDCONS1	3.00E-01	1.5E-01	U	1.2E-05	7.5E-04	7.5E-04
Benzo(b)fluoranthene	OLDCONS1	3.00E-01	1.5E-01	U	5.2E-06	3.3E-04	3.3E-04
Benzo(e)pyrene	OLDCONS1	-	-	-	1.5E-05	9.9E-04	9.9E-04
Benzo(g,h,i)perylene	OLDCONS1	3.00E-01	1.5E-01	U	2.7E-04	1.8E-02	1.8E-02
Benzo(k)fluoranthene	OLDCONS1	3.00E-01	1.5E-01	U	1.7E-06	1.1E-04	1.1E-04
Chrysene	OLDCONS1	5.00E-01	5.0E-01		1.4E-05	8.7E-04	5.0E-01
Dibenz(a,h)anthracene	OLDCONS1	3.00E-01	1.5E-01	U	1.4E-05	8.8E-04	8.8E-04
Fluoranthene	OLDCONS1	2.10E+00	2.1E+00		4.8E-05	3.1E-03	2.1E+00
Fluorene	OLDCONS1	3.00E-01	1.5E-01	U	6.0E-04	3.9E-02	3.9E-02
Indeno(1,2,3-cd)pyrene	OLDCONS1	3.00E-01	1.5E-01	U	1.8E-05	1.2E-03	1.2E-03

TPH to Petroleum Constituent Extrapolation for Soil (0-4 feet bgs) [a]
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Naphthalene	OLDCONS1	3.00E-01	1.5E-01	U	6.9E-03	-	1.5E-01
Perylene	OLDCONS1	-	-	-	1.1E-05	6.9E-04	6.9E-04
Phenanthrene	OLDCONS1	1.60E+00	1.6E+00		1.2E-03	7.5E-02	1.6E+00
Pyrene	OLDCONS1	1.00E+00	1.0E+00		2.1E-04	1.3E-02	1.0E+00
C08-C11 (Gasoline Range)	OLDCONS2	1.00E-01	5.0E-02	U		-	-
C11-C14 (Kerosene Range)	OLDCONS2	1.00E-01	5.0E-02	U		-	-
C14-C20 (Diesel Range)	OLDCONS2	4.00E+00	4.0E+00			-	-
C20-C30 (Lubricant Oil Range)	OLDCONS2	-	-	-		-	-
C11-C30	OLDCONS2	-	4.1E+00	-		-	-
Benzene	OLDCONS2	5.00E-03	2.5E-03	U	1.9E-06	-	2.5E-03
Ethylbenzene	OLDCONS2	5.00E-03	2.5E-03	U	1.5E-05	-	2.5E-03
Toluene	OLDCONS2	7.00E-03	7.0E-03	J	1.1E-05	-	7.0E-03
m,p-Xylene	OLDCONS2	-	-	-	1.8E-05	-	-
o-Xylene	OLDCONS2	-	-	-	6.9E-06	-	-
Xylene (total)	OLDCONS2	1.30E-02	1.3E-02		2.6E-05	-	1.3E-02
2-Methylnaphthalene	OLDCONS2	3.00E-01	1.5E-01	U	2.8E-02	-	1.5E-01
Acenaphthene	OLDCONS2	3.00E-01	1.5E-01	U	4.5E-04	1.8E-03	1.8E-03
Acenaphthylene	OLDCONS2	3.00E-01	1.5E-01	U	9.3E-05	3.8E-04	3.8E-04
Anthracene	OLDCONS2	3.00E-01	1.5E-01	U	2.4E-04	9.8E-04	9.8E-04
Benzo(a)anthracene	OLDCONS2	3.00E-01	1.5E-01	U	9.5E-06	3.8E-05	3.8E-05
Benzo(a)pyrene	OLDCONS2	3.00E-01	1.5E-01	U	1.2E-05	4.7E-05	4.7E-05
Benzo(b)fluoranthene	OLDCONS2	3.00E-01	1.5E-01	U	5.2E-06	2.1E-05	2.1E-05
Benzo(e)pyrene	OLDCONS2	-	-	-	1.5E-05	6.2E-05	6.2E-05
Benzo(g,h,i)perylene	OLDCONS2	3.00E-01	1.5E-01	U	2.7E-04	1.1E-03	1.1E-03
Benzo(k)fluoranthene	OLDCONS2	3.00E-01	1.5E-01	U	1.7E-06	6.7E-06	6.7E-06
Chrysene	OLDCONS2	3.00E-01	1.5E-01	U	1.4E-05	5.5E-05	5.5E-05
Dibenz(a,h)anthracene	OLDCONS2	3.00E-01	1.5E-01	U	1.4E-05	5.6E-05	5.6E-05
Fluoranthene	OLDCONS2	3.00E-01	1.5E-01	U	4.8E-05	1.9E-04	1.9E-04
Fluorene	OLDCONS2	3.00E-01	1.5E-01	U	6.0E-04	2.4E-03	2.4E-03
Indeno(1,2,3-cd)pyrene	OLDCONS2	3.00E-01	1.5E-01	U	1.8E-05	7.4E-05	7.4E-05
Naphthalene	OLDCONS2	3.00E-01	1.5E-01	U	6.9E-03	-	1.5E-01
Perylene	OLDCONS2	-	-	-	1.1E-05	4.4E-05	4.4E-05
Phenanthrene	OLDCONS2	3.00E-01	1.5E-01	U	1.2E-03	4.7E-03	4.7E-03
Pyrene	OLDCONS2	3.00E-01	1.5E-01	U	2.1E-04	8.3E-04	8.3E-04
C08-C11 (Gasoline Range)	OLDCONS3	1.00E-01	5.0E-02	U		-	-
C11-C14 (Kerosene Range)	OLDCONS3	1.00E-01	5.0E-02	U		-	-
C14-C20 (Diesel Range)	OLDCONS3	1.00E-01	5.0E-02	U		-	-
C20-C30 (Lubricant Oil Range)	OLDCONS3	4.00E+03	4.0E+03			-	-
C11-C30	OLDCONS3	-	4.0E+03	-		-	-
Benzene	OLDCONS3	5.00E-03	2.5E-03	U	1.9E-06	-	2.5E-03
Ethylbenzene	OLDCONS3	5.00E-03	2.5E-03	U	1.5E-05	-	2.5E-03
Toluene	OLDCONS3	5.00E-03	2.5E-03	U	1.1E-05	-	2.5E-03
m,p-Xylene	OLDCONS3	-	-	-	1.8E-05	-	-
o-Xylene	OLDCONS3	-	-	-	6.9E-06	-	-
Xylene (total)	OLDCONS3	6.00E-03	6.0E-03		2.6E-05	-	6.0E-03
2-Methylnaphthalene	OLDCONS3	3.00E+00	1.5E+00	U	2.8E-02	-	1.5E+00
Acenaphthene	OLDCONS3	3.00E+00	1.5E+00	U	4.5E-04	1.8E+00	1.5E+00
Acenaphthylene	OLDCONS3	3.00E+00	1.5E+00	U	9.3E-05	3.7E-01	3.7E-01
Anthracene	OLDCONS3	3.00E+00	1.5E+00	U	2.4E-04	9.6E-01	9.6E-01
Benzo(a)anthracene	OLDCONS3	3.00E+00	1.5E+00	U	9.5E-06	3.8E-02	3.8E-02
Benzo(a)pyrene	OLDCONS3	3.00E+00	1.5E+00	U	1.2E-05	4.7E-02	4.7E-02
Benzo(b)fluoranthene	OLDCONS3	3.00E+00	1.5E+00	U	5.2E-06	2.1E-02	2.1E-02
Benzo(e)pyrene	OLDCONS3	-	-	-	1.5E-05	6.2E-02	6.2E-02
Benzo(g,h,i)perylene	OLDCONS3	3.00E+00	1.5E+00	U	2.7E-04	1.1E+00	1.1E+00
Benzo(k)fluoranthene	OLDCONS3	3.00E+00	1.5E+00	U	1.7E-06	6.6E-03	6.6E-03
Chrysene	OLDCONS3	3.00E+00	1.5E+00	U	1.4E-05	5.4E-02	5.4E-02

TPH to Petroleum Constituent Extrapolation for Soil (0-4 feet bgs) [a]
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Dibenz(a,h)anthracene	OLDCONS3	3.00E+00	1.5E+00	U	1.4E-05	5.5E-02	5.5E-02
Fluoranthene	OLDCONS3	3.00E+00	1.5E+00	U	4.8E-05	1.9E-01	1.9E-01
Fluorene	OLDCONS3	3.00E+00	1.5E+00	U	6.0E-04	2.4E+00	1.5E+00
Indeno(1,2,3-cd)pyrene	OLDCONS3	3.00E+00	1.5E+00	U	1.8E-05	7.3E-02	7.3E-02
Naphthalene	OLDCONS3	3.00E+00	1.5E+00	U	6.9E-03	-	1.5E+00
Perylene	OLDCONS3	-	-	-	1.1E-05	4.3E-02	4.3E-02
Phenanthrene	OLDCONS3	3.00E+00	1.5E+00	U	1.2E-03	4.7E+00	1.5E+00
Pyrene	OLDCONS3	3.00E+00	1.5E+00	U	2.1E-04	8.2E-01	8.2E-01
C08-C11 (Gasoline Range)	OLDCONS4	1.00E-01	5.0E-02	U		-	-
C11-C14 (Kerosene Range)	OLDCONS4	1.00E-01	5.0E-02	U		-	-
C14-C20 (Diesel Range)	OLDCONS4	2.00E+00	2.0E+00			-	-
C20-C30 (Lubricant Oil Range)	OLDCONS4	-	-			-	-
C11-C30	OLDCONS4	-	2.1E+00	-		-	-
Benzene	OLDCONS4	5.00E-03	2.5E-03	U	1.9E-06	-	2.5E-03
Ethylbenzene	OLDCONS4	5.00E-03	2.5E-03	U	1.5E-05	-	2.5E-03
Toluene	OLDCONS4	5.00E-03	2.5E-03	U	1.1E-05	-	2.5E-03
m,p-Xylene	OLDCONS4	-	-	-	1.8E-05	-	-
o-Xylene	OLDCONS4	-	-	-	6.9E-06	-	-
Xylene (total)	OLDCONS4	5.00E-03	2.5E-03	U	2.6E-05	-	2.5E-03
2-Methylnaphthalene	OLDCONS4	2.00E-02	1.0E-02	U	2.8E-02	-	1.0E-02
Acenaphthene	OLDCONS4	3.00E-02	1.5E-02	U	4.5E-04	9.2E-04	9.2E-04
Acenaphthylene	OLDCONS4	3.00E-02	1.5E-02	U	9.3E-05	1.9E-04	1.9E-04
Anthracene	OLDCONS4	3.00E-02	1.5E-02	U	2.4E-04	4.9E-04	4.9E-04
Benzo(a)anthracene	OLDCONS4	3.00E-02	1.5E-02	U	9.5E-06	1.9E-05	1.9E-05
Benzo(a)pyrene	OLDCONS4	3.00E-02	1.5E-02	U	1.2E-05	2.4E-05	2.4E-05
Benzo(b)fluoranthene	OLDCONS4	3.00E-02	1.5E-02	U	5.2E-06	1.1E-05	1.1E-05
Benzo(e)pyrene	OLDCONS4	-	-	-	1.5E-05	3.2E-05	3.2E-05
Benzo(g,h,i)perylene	OLDCONS4	3.00E-02	1.5E-02	U	2.7E-04	5.6E-04	5.6E-04
Benzo(k)fluoranthene	OLDCONS4	3.00E-02	1.5E-02	U	1.7E-06	3.4E-06	3.4E-06
Chrysene	OLDCONS4	3.00E-02	1.5E-02	U	1.4E-05	2.8E-05	2.8E-05
Dibenz(a,h)anthracene	OLDCONS4	3.00E-02	1.5E-02	U	1.4E-05	2.8E-05	2.8E-05
Fluoranthene	OLDCONS4	3.00E-02	1.5E-02	U	4.8E-05	9.8E-05	9.8E-05
Fluorene	OLDCONS4	3.00E-02	1.5E-02	U	6.0E-04	1.2E-03	1.2E-03
Indeno(1,2,3-cd)pyrene	OLDCONS4	3.00E-02	1.5E-02	U	1.8E-05	3.8E-05	3.8E-05
Naphthalene	OLDCONS4	2.00E-02	1.0E-02	U	6.9E-03	-	1.0E-02
Perylene	OLDCONS4	-	-	-	1.1E-05	2.2E-05	2.2E-05
Phenanthrene	OLDCONS4	3.00E-02	1.5E-02	U	1.2E-03	2.4E-03	2.4E-03
Pyrene	OLDCONS4	3.00E-02	1.5E-02	U	2.1E-04	4.2E-04	4.2E-04
C08-C11 (Gasoline Range)	OLDCONS5	1.00E-01	5.0E-02	U		-	-
C11-C14 (Kerosene Range)	OLDCONS5	1.00E-01	5.0E-02	U		-	-
C14-C20 (Diesel Range)	OLDCONS5	3.00E-01	3.0E-01			-	-
C20-C30 (Lubricant Oil Range)	OLDCONS5	-	-			-	-
C11-C30	OLDCONS5	-	3.5E-01	-		-	-
Benzene	OLDCONS5	5.00E-03	2.5E-03	U	1.9E-06	-	2.5E-03
Ethylbenzene	OLDCONS5	5.00E-03	2.5E-03	U	1.5E-05	-	2.5E-03
Toluene	OLDCONS5	1.40E-02	1.4E-02	J	1.1E-05	-	1.4E-02
m,p-Xylene	OLDCONS5	-	-	-	1.8E-05	-	-
o-Xylene	OLDCONS5	-	-	-	6.9E-06	-	-
Xylene (total)	OLDCONS5	1.00E-02	1.0E-02		2.6E-05	-	1.0E-02
2-Methylnaphthalene	OLDCONS5	3.00E-01	1.5E-01	U	2.8E-02	-	1.5E-01
Acenaphthene	OLDCONS5	3.00E-01	1.5E-01	U	4.5E-04	1.6E-04	1.6E-04
Acenaphthylene	OLDCONS5	3.00E-01	1.5E-01	U	9.3E-05	3.2E-05	3.2E-05
Anthracene	OLDCONS5	3.00E-01	1.5E-01	U	2.4E-04	8.4E-05	8.4E-05
Benzo(a)anthracene	OLDCONS5	3.00E-01	1.5E-01	U	9.5E-06	3.3E-06	3.3E-06
Benzo(a)pyrene	OLDCONS5	3.00E-01	1.5E-01	U	1.2E-05	4.1E-06	4.1E-06
Benzo(b)fluoranthene	OLDCONS5	3.00E-01	1.5E-01	U	5.2E-06	1.8E-06	1.8E-06

TPH to Petroleum Constituent Extrapolation for Soil (0-4 feet bgs) [a]
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Benzo(e)pyrene	OLDCONS5	-	-	-	1.5E-05	5.4E-06	5.4E-06
Benzo(g,h,i)perylene	OLDCONS5	3.00E-01	1.5E-01	U	2.7E-04	9.6E-05	9.6E-05
Benzo(k)fluoranthene	OLDCONS5	3.00E-01	1.5E-01	U	1.7E-06	5.8E-07	5.8E-07
Chrysene	OLDCONS5	3.00E-01	1.5E-01	U	1.4E-05	4.8E-06	4.8E-06
Dibenz(a,h)anthracene	OLDCONS5	3.00E-01	1.5E-01	U	1.4E-05	4.8E-06	4.8E-06
Fluoranthene	OLDCONS5	3.00E-01	1.5E-01	U	4.8E-05	1.7E-05	1.7E-05
Fluorene	OLDCONS5	3.00E-01	1.5E-01	U	6.0E-04	2.1E-04	2.1E-04
Indeno(1,2,3-cd)pyrene	OLDCONS5	3.00E-01	1.5E-01	U	1.8E-05	6.4E-06	6.4E-06
Naphthalene	OLDCONS5	3.00E-01	1.5E-01	U	6.9E-03	-	1.5E-01
Perylene	OLDCONS5	-	-	-	1.1E-05	3.8E-06	3.8E-06
Phenanthrene	OLDCONS5	3.00E-01	1.5E-01	U	1.2E-03	4.1E-04	4.1E-04
Pyrene	OLDCONS5	3.00E-01	1.5E-01	U	2.1E-04	7.2E-05	7.2E-05
C08-C11 (Gasoline Range)	OLDCONS6	1.00E-01	5.0E-02	U		-	-
C11-C14 (Kerosene Range)	OLDCONS6	1.00E-01	5.0E-02	U		-	-
C14-C20 (Diesel Range)	OLDCONS6	1.00E-01	5.0E-02	U		-	-
C20-C30 (Lubricant Oil Range)	OLDCONS6	5.00E+00	5.0E+00			-	-
C11-C30	OLDCONS6	-	5.1E+00	-		-	-
Benzene	OLDCONS6	5.00E-03	2.5E-03	U	1.9E-06	-	2.5E-03
Ethylbenzene	OLDCONS6	5.00E-03	2.5E-03	U	1.5E-05	-	2.5E-03
Toluene	OLDCONS6	5.00E-03	2.5E-03	U	1.1E-05	-	2.5E-03
m,p-Xylene	OLDCONS6	-	-	-	1.8E-05	-	-
o-Xylene	OLDCONS6	-	-	-	6.9E-06	-	-
Xylene (total)	OLDCONS6	5.00E-03	2.5E-03	U	2.6E-05	-	2.5E-03
2-Methylnaphthalene	OLDCONS6	3.00E-02	1.5E-02	U	2.8E-02	-	1.5E-02
Acenaphthene	OLDCONS6	3.00E-02	1.5E-02	U	4.5E-04	2.3E-03	2.3E-03
Acenaphthylene	OLDCONS6	3.00E-02	1.5E-02	U	9.3E-05	4.7E-04	4.7E-04
Anthracene	OLDCONS6	3.00E-02	1.5E-02	U	2.4E-04	1.2E-03	1.2E-03
Benzo(a)anthracene	OLDCONS6	3.00E-02	1.5E-02	U	9.5E-06	4.8E-05	4.8E-05
Benzo(a)pyrene	OLDCONS6	3.00E-02	1.5E-02	U	1.2E-05	5.9E-05	5.9E-05
Benzo(b)fluoranthene	OLDCONS6	3.00E-02	1.5E-02	U	5.2E-06	2.6E-05	2.6E-05
Benzo(e)pyrene	OLDCONS6	-	-	-	1.5E-05	7.8E-05	7.8E-05
Benzo(g,h,i)perylene	OLDCONS6	3.00E-02	1.5E-02	U	2.7E-04	1.4E-03	1.4E-03
Benzo(k)fluoranthene	OLDCONS6	3.00E-02	1.5E-02	U	1.7E-06	8.5E-06	8.5E-06
Chrysene	OLDCONS6	3.00E-02	1.5E-02	U	1.4E-05	6.9E-05	6.9E-05
Dibenz(a,h)anthracene	OLDCONS6	3.00E-02	1.5E-02	U	1.4E-05	7.0E-05	7.0E-05
Fluoranthene	OLDCONS6	3.00E-02	1.5E-02	U	4.8E-05	2.4E-04	2.4E-04
Fluorene	OLDCONS6	3.00E-02	1.5E-02	U	6.0E-04	3.1E-03	3.1E-03
Indeno(1,2,3-cd)pyrene	OLDCONS6	3.00E-02	1.5E-02	U	1.8E-05	9.4E-05	9.4E-05
Naphthalene	OLDCONS6	3.00E-02	1.5E-02	U	6.9E-03	-	1.5E-02
Perylene	OLDCONS6	-	-	-	1.1E-05	5.5E-05	5.5E-05
Phenanthrene	OLDCONS6	3.00E-02	1.5E-02	U	1.2E-03	6.0E-03	6.0E-03
Pyrene	OLDCONS6	3.00E-02	1.5E-02	U	2.1E-04	1.0E-03	1.0E-03
C08-C11 (Gasoline Range)	RD033	1.10E+01	5.5E+00	UJ		-	-
C11-C14 (Kerosene Range)	RD033	1.10E+01	5.5E+00	UJ		-	-
C14-C20 (Diesel Range)	RD033	1.10E+01	5.5E+00	UJ		-	-
C20-C30 (Lubricant Oil Range)	RD033	1.10E+01	5.5E+00	UJ		-	-
C11-C30	RD033	-	1.7E+01	-		-	-
Benzene	RD033	1.10E-02	5.5E-03	U	1.9E-06	-	5.5E-03
Ethylbenzene	RD033	1.10E-02	5.5E-03	U	1.5E-05	-	5.5E-03
Toluene	RD033	1.10E-02	5.5E-03	U	1.1E-05	-	5.5E-03
m,p-Xylene	RD033	1.10E-02	5.5E-03	U	1.8E-05	-	5.5E-03
o-Xylene	RD033	1.10E-02	5.5E-03	U	6.9E-06	-	5.5E-03
Xylene (total)	RD033	-	-	-	2.6E-05	-	-
2-Methylnaphthalene	RD033	-	-	-	2.8E-02	-	-
Acenaphthene	RD033	-	-	-	4.5E-04	7.4E-03	7.4E-03
Acenaphthylene	RD033	-	-	-	9.3E-05	1.5E-03	1.5E-03

TPH to Petroleum Constituent Extrapolation for Soil (0-4 feet bgs) [a]
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Anthracene	RD033	-	-	-	2.4E-04	4.0E-03	4.0E-03
Benzo(a)anthracene	RD033	-	-	-	9.5E-06	1.6E-04	1.6E-04
Benzo(a)pyrene	RD033	-	-	-	1.2E-05	1.9E-04	1.9E-04
Benzo(b)fluoranthene	RD033	-	-	-	5.2E-06	8.5E-05	8.5E-05
Benzo(e)pyrene	RD033	-	-	-	1.5E-05	2.5E-04	2.5E-04
Benzo(g,h,i)perylene	RD033	-	-	-	2.7E-04	4.5E-03	4.5E-03
Benzo(k)fluoranthene	RD033	-	-	-	1.7E-06	2.7E-05	2.7E-05
Chrysene	RD033	-	-	-	1.4E-05	2.2E-04	2.2E-04
Dibenz(a,h)anthracene	RD033	-	-	-	1.4E-05	2.3E-04	2.3E-04
Fluoranthene	RD033	-	-	-	4.8E-05	7.9E-04	7.9E-04
Fluorene	RD033	-	-	-	6.0E-04	1.0E-02	1.0E-02
Indeno(1,2,3-cd)pyrene	RD033	-	-	-	1.8E-05	3.0E-04	3.0E-04
Naphthalene	RD033	-	-	-	6.9E-03	-	-
Perylene	RD033	-	-	-	1.1E-05	1.8E-04	1.8E-04
Phenanthrene	RD033	-	-	-	1.2E-03	1.9E-02	1.9E-02
Pyrene	RD033	-	-	-	2.1E-04	3.4E-03	3.4E-03
C08-C11 (Gasoline Range)	RD037DL	1.10E+01	5.5E+00	UJ		-	-
C11-C14 (Kerosene Range)	RD037DL	1.10E+01	5.5E+00	UJ		-	-
C14-C20 (Diesel Range)	RD037DL	1.10E+01	5.5E+00	UJ		-	-
C20-C30 (Lubricant Oil Range)	RD037DL	1.10E+01	5.5E+00	UJ		-	-
C11-C30	RD037DL	-	1.7E+01	-		-	-
Benzene	RD037DL	6.00E-03	3.0E-03	U	1.9E-06	-	3.0E-03
Ethylbenzene	RD037DL	6.00E-03	3.0E-03	U	1.5E-05	-	3.0E-03
Toluene	RD037DL	6.00E-03	3.0E-03	U	1.1E-05	-	3.0E-03
m,p-Xylene	RD037DL	6.00E-03	3.0E-03	U	1.8E-05	-	3.0E-03
o-Xylene	RD037DL	6.00E-03	3.0E-03	U	6.9E-06	-	3.0E-03
Xylene (total)	RD037DL	-	-	-	2.6E-05	-	-
2-Methylnaphthalene	RD037DL	-	-	-	2.8E-02	-	-
Acenaphthene	RD037DL	-	-	-	4.5E-04	7.4E-03	7.4E-03
Acenaphthylene	RD037DL	-	-	-	9.3E-05	1.5E-03	1.5E-03
Anthracene	RD037DL	-	-	-	2.4E-04	4.0E-03	4.0E-03
Benzo(a)anthracene	RD037DL	-	-	-	9.5E-06	1.6E-04	1.6E-04
Benzo(a)pyrene	RD037DL	-	-	-	1.2E-05	1.9E-04	1.9E-04
Benzo(b)fluoranthene	RD037DL	-	-	-	5.2E-06	8.5E-05	8.5E-05
Benzo(e)pyrene	RD037DL	-	-	-	1.5E-05	2.5E-04	2.5E-04
Benzo(g,h,i)perylene	RD037DL	-	-	-	2.7E-04	4.5E-03	4.5E-03
Benzo(k)fluoranthene	RD037DL	-	-	-	1.7E-06	2.7E-05	2.7E-05
Chrysene	RD037DL	-	-	-	1.4E-05	2.2E-04	2.2E-04
Dibenz(a,h)anthracene	RD037DL	-	-	-	1.4E-05	2.3E-04	2.3E-04
Fluoranthene	RD037DL	-	-	-	4.8E-05	7.9E-04	7.9E-04
Fluorene	RD037DL	-	-	-	6.0E-04	1.0E-02	1.0E-02
Indeno(1,2,3-cd)pyrene	RD037DL	-	-	-	1.8E-05	3.0E-04	3.0E-04
Naphthalene	RD037DL	-	-	-	6.9E-03	-	-
Perylene	RD037DL	-	-	-	1.1E-05	1.8E-04	1.8E-04
Phenanthrene	RD037DL	-	-	-	1.2E-03	1.9E-02	1.9E-02
Pyrene	RD037DL	-	-	-	2.1E-04	3.4E-03	3.4E-03
C08-C11 (Gasoline Range)	RD063	4.20E+01	4.2E+01	J		-	-
C11-C14 (Kerosene Range)	RD063	1.10E+01	5.5E+00	UJ		-	-
C14-C20 (Diesel Range)	RD063	1.10E+01	5.5E+00	UJ		-	-
C20-C30 (Lubricant Oil Range)	RD063	1.10E+01	5.5E+00	UJ		-	-
C11-C30	RD063	-	1.7E+01	-		-	-
Benzene	RD063	6.00E-03	3.0E-03	U	1.9E-06	-	3.0E-03
Ethylbenzene	RD063	6.00E-03	3.0E-03	U	1.5E-05	-	3.0E-03
Toluene	RD063	6.00E-03	3.0E-03	U	1.1E-05	-	3.0E-03
m,p-Xylene	RD063	6.00E-03	3.0E-03	U	1.8E-05	-	3.0E-03
o-Xylene	RD063	6.00E-03	3.0E-03	U	6.9E-06	-	3.0E-03

TPH to Petroleum Constituent Extrapolation for Soil (0-4 feet bgs) [a]
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Xylene (total)	RD063	-	-	-	2.6E-05	-	-
2-Methylnaphthalene	RD063	-	-	-	2.8E-02	-	-
Acenaphthene	RD063	-	-	-	4.5E-04	7.4E-03	7.4E-03
Acenaphthylene	RD063	-	-	-	9.3E-05	1.5E-03	1.5E-03
Anthracene	RD063	-	-	-	2.4E-04	4.0E-03	4.0E-03
Benzo(a)anthracene	RD063	-	-	-	9.5E-06	1.6E-04	1.6E-04
Benzo(a)pyrene	RD063	-	-	-	1.2E-05	1.9E-04	1.9E-04
Benzo(b)fluoranthene	RD063	-	-	-	5.2E-06	8.5E-05	8.5E-05
Benzo(e)pyrene	RD063	-	-	-	1.5E-05	2.5E-04	2.5E-04
Benzo(g,h,i)perylene	RD063	-	-	-	2.7E-04	4.5E-03	4.5E-03
Benzo(k)fluoranthene	RD063	-	-	-	1.7E-06	2.7E-05	2.7E-05
Chrysene	RD063	-	-	-	1.4E-05	2.2E-04	2.2E-04
Dibenz(a,h)anthracene	RD063	-	-	-	1.4E-05	2.3E-04	2.3E-04
Fluoranthene	RD063	-	-	-	4.8E-05	7.9E-04	7.9E-04
Fluorene	RD063	-	-	-	6.0E-04	1.0E-02	1.0E-02
Indeno(1,2,3-cd)pyrene	RD063	-	-	-	1.8E-05	3.0E-04	3.0E-04
Naphthalene	RD063	-	-	-	6.9E-03	-	-
Perylene	RD063	-	-	-	1.1E-05	1.8E-04	1.8E-04
Phenanthrene	RD063	-	-	-	1.2E-03	1.9E-02	1.9E-02
Pyrene	RD063	-	-	-	2.1E-04	3.4E-03	3.4E-03
C08-C11 (Gasoline Range)	RD065	1.10E+01	5.5E+00	UJ		-	-
C11-C14 (Kerosene Range)	RD065	1.10E+01	5.5E+00	UJ		-	-
C14-C20 (Diesel Range)	RD065	1.10E+01	5.5E+00	UJ		-	-
C20-C30 (Lubricant Oil Range)	RD065	8.50E+01	8.5E+01	J		-	-
C11-C30	RD065	-	9.6E+01	-		-	-
Benzene	RD065	-	-	-	1.9E-06	-	-
Ethylbenzene	RD065	-	-	-	1.5E-05	-	-
Toluene	RD065	-	-	-	1.1E-05	-	-
m,p-Xylene	RD065	-	-	-	1.8E-05	-	-
o-Xylene	RD065	-	-	-	6.9E-06	-	-
Xylene (total)	RD065	-	-	-	2.6E-05	-	-
2-Methylnaphthalene	RD065	-	-	-	2.8E-02	-	-
Acenaphthene	RD065	-	-	-	4.5E-04	4.3E-02	4.3E-02
Acenaphthylene	RD065	-	-	-	9.3E-05	8.9E-03	8.9E-03
Anthracene	RD065	-	-	-	2.4E-04	2.3E-02	2.3E-02
Benzo(a)anthracene	RD065	-	-	-	9.5E-06	9.1E-04	9.1E-04
Benzo(a)pyrene	RD065	-	-	-	1.2E-05	1.1E-03	1.1E-03
Benzo(b)fluoranthene	RD065	-	-	-	5.2E-06	4.9E-04	4.9E-04
Benzo(e)pyrene	RD065	-	-	-	1.5E-05	1.5E-03	1.5E-03
Benzo(g,h,i)perylene	RD065	-	-	-	2.7E-04	2.6E-02	2.6E-02
Benzo(k)fluoranthene	RD065	-	-	-	1.7E-06	1.6E-04	1.6E-04
Chrysene	RD065	-	-	-	1.4E-05	1.3E-03	1.3E-03
Dibenz(a,h)anthracene	RD065	-	-	-	1.4E-05	1.3E-03	1.3E-03
Fluoranthene	RD065	-	-	-	4.8E-05	4.6E-03	4.6E-03
Fluorene	RD065	-	-	-	6.0E-04	5.8E-02	5.8E-02
Indeno(1,2,3-cd)pyrene	RD065	-	-	-	1.8E-05	1.8E-03	1.8E-03
Naphthalene	RD065	-	-	-	6.9E-03	-	-
Perylene	RD065	-	-	-	1.1E-05	1.0E-03	1.0E-03
Phenanthrene	RD065	-	-	-	1.2E-03	1.1E-01	1.1E-01
Pyrene	RD065	-	-	-	2.1E-04	2.0E-02	2.0E-02
C08-C11 (Gasoline Range)	RD067	1.20E+01	6.0E+00	UJ		-	-
C11-C14 (Kerosene Range)	RD067	1.20E+01	6.0E+00	UJ		-	-
C14-C20 (Diesel Range)	RD067	1.20E+01	6.0E+00	UJ		-	-
C20-C30 (Lubricant Oil Range)	RD067	1.10E+02	1.1E+02	J		-	-
C11-C30	RD067	-	1.2E+02	-		-	-
Benzene	RD067	-	-	-	1.9E-06	-	-

TPH to Petroleum Constituent Extrapolation for Soil (0-4 feet bgs) [a]
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Ethylbenzene	RD067	-	-	-	1.5E-05	-	-
Toluene	RD067	-	-	-	1.1E-05	-	-
m,p-Xylene	RD067	-	-	-	1.8E-05	-	-
o-Xylene	RD067	-	-	-	6.9E-06	-	-
Xylene (total)	RD067	-	-	-	2.6E-05	-	-
2-Methylnaphthalene	RD067	-	-	-	2.8E-02	-	-
Acenaphthene	RD067	-	-	-	4.5E-04	5.4E-02	5.4E-02
Acenaphthylene	RD067	-	-	-	9.3E-05	1.1E-02	1.1E-02
Anthracene	RD067	-	-	-	2.4E-04	2.9E-02	2.9E-02
Benzo(a)anthracene	RD067	-	-	-	9.5E-06	1.2E-03	1.2E-03
Benzo(a)pyrene	RD067	-	-	-	1.2E-05	1.4E-03	1.4E-03
Benzo(b)fluoranthene	RD067	-	-	-	5.2E-06	6.3E-04	6.3E-04
Benzo(e)pyrene	RD067	-	-	-	1.5E-05	1.9E-03	1.9E-03
Benzo(g,h,i)perylene	RD067	-	-	-	2.7E-04	3.4E-02	3.4E-02
Benzo(k)fluoranthene	RD067	-	-	-	1.7E-06	2.0E-04	2.0E-04
Chrysene	RD067	-	-	-	1.4E-05	1.7E-03	1.7E-03
Dibenz(a,h)anthracene	RD067	-	-	-	1.4E-05	1.7E-03	1.7E-03
Fluoranthene	RD067	-	-	-	4.8E-05	5.8E-03	5.8E-03
Fluorene	RD067	-	-	-	6.0E-04	7.4E-02	7.4E-02
Indeno(1,2,3-cd)pyrene	RD067	-	-	-	1.8E-05	2.2E-03	2.2E-03
Naphthalene	RD067	-	-	-	6.9E-03	-	-
Perylene	RD067	-	-	-	1.1E-05	1.3E-03	1.3E-03
Phenanthrene	RD067	-	-	-	1.2E-03	1.4E-01	1.4E-01
Pyrene	RD067	-	-	-	2.1E-04	2.5E-02	2.5E-02
C08-C11 (Gasoline Range)	RD068	1.09E+02	5.5E+01	UJ		-	-
C11-C14 (Kerosene Range)	RD068	1.09E+02	5.5E+01	UJ		-	-
C14-C20 (Diesel Range)	RD068	1.20E+03	1.2E+03	J		-	-
C20-C30 (Lubricant Oil Range)	RD068	3.50E+03	3.5E+03	J		-	-
C11-C30	RD068	-	4.8E+03	-		-	-
Benzene	RD068	-	-	-	1.9E-06	-	-
Ethylbenzene	RD068	-	-	-	1.5E-05	-	-
Toluene	RD068	-	-	-	1.1E-05	-	-
m,p-Xylene	RD068	-	-	-	1.8E-05	-	-
o-Xylene	RD068	-	-	-	6.9E-06	-	-
Xylene (total)	RD068	-	-	-	2.6E-05	-	-
2-Methylnaphthalene	RD068	-	-	-	2.8E-02	-	-
Acenaphthene	RD068	-	-	-	4.5E-04	2.1E+00	2.1E+00
Acenaphthylene	RD068	-	-	-	9.3E-05	4.4E-01	4.4E-01
Anthracene	RD068	-	-	-	2.4E-04	1.1E+00	1.1E+00
Benzo(a)anthracene	RD068	-	-	-	9.5E-06	4.5E-02	4.5E-02
Benzo(a)pyrene	RD068	-	-	-	1.2E-05	5.5E-02	5.5E-02
Benzo(b)fluoranthene	RD068	-	-	-	5.2E-06	2.5E-02	2.5E-02
Benzo(e)pyrene	RD068	-	-	-	1.5E-05	7.3E-02	7.3E-02
Benzo(g,h,i)perylene	RD068	-	-	-	2.7E-04	1.3E+00	1.3E+00
Benzo(k)fluoranthene	RD068	-	-	-	1.7E-06	7.9E-03	7.9E-03
Chrysene	RD068	-	-	-	1.4E-05	6.5E-02	6.5E-02
Dibenz(a,h)anthracene	RD068	-	-	-	1.4E-05	6.5E-02	6.5E-02
Fluoranthene	RD068	-	-	-	4.8E-05	2.3E-01	2.3E-01
Fluorene	RD068	-	-	-	6.0E-04	2.9E+00	2.9E+00
Indeno(1,2,3-cd)pyrene	RD068	-	-	-	1.8E-05	8.7E-02	8.7E-02
Naphthalene	RD068	-	-	-	6.9E-03	-	-
Perylene	RD068	-	-	-	1.1E-05	5.1E-02	5.1E-02
Phenanthrene	RD068	-	-	-	1.2E-03	5.5E+00	5.5E+00
Pyrene	RD068	-	-	-	2.1E-04	9.7E-01	9.7E-01
C08-C11 (Gasoline Range)	RD069	1.10E+01	5.5E+00	UJ		-	-
C11-C14 (Kerosene Range)	RD069	1.10E+01	5.5E+00	UJ		-	-

TPH to Petroleum Constituent Extrapolation for Soil (0-4 feet bgs) [a]
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
C14-C20 (Diesel Range)	RD069	1.10E+01	5.5E+00	UJ		-	-
C20-C30 (Lubricant Oil Range)	RD069	1.10E+01	5.5E+00	UJ		-	-
C11-C30	RD069	-	1.7E+01	-		-	-
Benzene	RD069	-	-	-	1.9E-06	-	-
Ethylbenzene	RD069	-	-	-	1.5E-05	-	-
Toluene	RD069	-	-	-	1.1E-05	-	-
m,p-Xylene	RD069	-	-	-	1.8E-05	-	-
o-Xylene	RD069	-	-	-	6.9E-06	-	-
Xylene (total)	RD069	-	-	-	2.6E-05	-	-
2-Methylnaphthalene	RD069	-	-	-	2.8E-02	-	-
Acenaphthene	RD069	-	-	-	4.5E-04	7.4E-03	7.4E-03
Acenaphthylene	RD069	-	-	-	9.3E-05	1.5E-03	1.5E-03
Anthracene	RD069	-	-	-	2.4E-04	4.0E-03	4.0E-03
Benzo(a)anthracene	RD069	-	-	-	9.5E-06	1.6E-04	1.6E-04
Benzo(a)pyrene	RD069	-	-	-	1.2E-05	1.9E-04	1.9E-04
Benzo(b)fluoranthene	RD069	-	-	-	5.2E-06	8.5E-05	8.5E-05
Benzo(e)pyrene	RD069	-	-	-	1.5E-05	2.5E-04	2.5E-04
Benzo(g,h,i)perylene	RD069	-	-	-	2.7E-04	4.5E-03	4.5E-03
Benzo(k)fluoranthene	RD069	-	-	-	1.7E-06	2.7E-05	2.7E-05
Chrysene	RD069	-	-	-	1.4E-05	2.2E-04	2.2E-04
Dibenz(a,h)anthracene	RD069	-	-	-	1.4E-05	2.3E-04	2.3E-04
Fluoranthene	RD069	-	-	-	4.8E-05	7.9E-04	7.9E-04
Fluorene	RD069	-	-	-	6.0E-04	1.0E-02	1.0E-02
Indeno(1,2,3-cd)pyrene	RD069	-	-	-	1.8E-05	3.0E-04	3.0E-04
Naphthalene	RD069	-	-	-	6.9E-03	-	-
Perylene	RD069	-	-	-	1.1E-05	1.8E-04	1.8E-04
Phenanthrene	RD069	-	-	-	1.2E-03	1.9E-02	1.9E-02
Pyrene	RD069	-	-	-	2.1E-04	3.4E-03	3.4E-03
C08-C11 (Gasoline Range)	RD071	1.10E+01	5.5E+00	UJ		-	-
C11-C14 (Kerosene Range)	RD071	1.10E+01	5.5E+00	UJ		-	-
C14-C20 (Diesel Range)	RD071	1.10E+01	5.5E+00	UJ		-	-
C20-C30 (Lubricant Oil Range)	RD071	1.10E+01	5.5E+00	UJ		-	-
C11-C30	RD071	-	1.7E+01	-		-	-
Benzene	RD071	-	-	-	1.9E-06	-	-
Ethylbenzene	RD071	-	-	-	1.5E-05	-	-
Toluene	RD071	-	-	-	1.1E-05	-	-
m,p-Xylene	RD071	-	-	-	1.8E-05	-	-
o-Xylene	RD071	-	-	-	6.9E-06	-	-
Xylene (total)	RD071	-	-	-	2.6E-05	-	-
2-Methylnaphthalene	RD071	-	-	-	2.8E-02	-	-
Acenaphthene	RD071	-	-	-	4.5E-04	7.4E-03	7.4E-03
Acenaphthylene	RD071	-	-	-	9.3E-05	1.5E-03	1.5E-03
Anthracene	RD071	-	-	-	2.4E-04	4.0E-03	4.0E-03
Benzo(a)anthracene	RD071	-	-	-	9.5E-06	1.6E-04	1.6E-04
Benzo(a)pyrene	RD071	-	-	-	1.2E-05	1.9E-04	1.9E-04
Benzo(b)fluoranthene	RD071	-	-	-	5.2E-06	8.5E-05	8.5E-05
Benzo(e)pyrene	RD071	-	-	-	1.5E-05	2.5E-04	2.5E-04
Benzo(g,h,i)perylene	RD071	-	-	-	2.7E-04	4.5E-03	4.5E-03
Benzo(k)fluoranthene	RD071	-	-	-	1.7E-06	2.7E-05	2.7E-05
Chrysene	RD071	-	-	-	1.4E-05	2.2E-04	2.2E-04
Dibenz(a,h)anthracene	RD071	-	-	-	1.4E-05	2.3E-04	2.3E-04
Fluoranthene	RD071	-	-	-	4.8E-05	7.9E-04	7.9E-04
Fluorene	RD071	-	-	-	6.0E-04	1.0E-02	1.0E-02
Indeno(1,2,3-cd)pyrene	RD071	-	-	-	1.8E-05	3.0E-04	3.0E-04
Naphthalene	RD071	-	-	-	6.9E-03	-	-
Perylene	RD071	-	-	-	1.1E-05	1.8E-04	1.8E-04

TPH to Petroleum Constituent Extrapolation for Soil (0-4 feet bgs) [a]
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Phenanthrene	RD071	-	-	-	1.2E-03	1.9E-02	1.9E-02
Pyrene	RD071	-	-	-	2.1E-04	3.4E-03	3.4E-03
C08-C11 (Gasoline Range)	RD176	1.20E+01	6.0E+00	UJ		-	-
C11-C14 (Kerosene Range)	RD176	1.20E+01	6.0E+00	UJ		-	-
C14-C20 (Diesel Range)	RD176	1.20E+01	6.0E+00	UJ		-	-
C20-C30 (Lubricant Oil Range)	RD176	1.20E+01	6.0E+00	UJ		-	-
C11-C30	RD176	-	1.8E+01	-		-	-
Benzene	RD176	-	-	-	1.9E-06	-	-
Ethylbenzene	RD176	-	-	-	1.5E-05	-	-
Toluene	RD176	-	-	-	1.1E-05	-	-
m,p-Xylene	RD176	-	-	-	1.8E-05	-	-
o-Xylene	RD176	-	-	-	6.9E-06	-	-
Xylene (total)	RD176	-	-	-	2.6E-05	-	-
2-Methylnaphthalene	RD176	-	-	-	2.8E-02	-	-
Acenaphthene	RD176	-	-	-	4.5E-04	8.0E-03	8.0E-03
Acenaphthylene	RD176	-	-	-	9.3E-05	1.7E-03	1.7E-03
Anthracene	RD176	-	-	-	2.4E-04	4.3E-03	4.3E-03
Benzo(a)anthracene	RD176	-	-	-	9.5E-06	1.7E-04	1.7E-04
Benzo(a)pyrene	RD176	-	-	-	1.2E-05	2.1E-04	2.1E-04
Benzo(b)fluoranthene	RD176	-	-	-	5.2E-06	9.3E-05	9.3E-05
Benzo(e)pyrene	RD176	-	-	-	1.5E-05	2.8E-04	2.8E-04
Benzo(g,h,i)perylene	RD176	-	-	-	2.7E-04	4.9E-03	4.9E-03
Benzo(k)fluoranthene	RD176	-	-	-	1.7E-06	3.0E-05	3.0E-05
Chrysene	RD176	-	-	-	1.4E-05	2.5E-04	2.5E-04
Dibenz(a,h)anthracene	RD176	-	-	-	1.4E-05	2.5E-04	2.5E-04
Fluoranthene	RD176	-	-	-	4.8E-05	8.6E-04	8.6E-04
Fluorene	RD176	-	-	-	6.0E-04	1.1E-02	1.1E-02
Indeno(1,2,3-cd)pyrene	RD176	-	-	-	1.8E-05	3.3E-04	3.3E-04
Naphthalene	RD176	-	-	-	6.9E-03	-	-
Perylene	RD176	-	-	-	1.1E-05	1.9E-04	1.9E-04
Phenanthrene	RD176	-	-	-	1.2E-03	2.1E-02	2.1E-02
Pyrene	RD176	-	-	-	2.1E-04	3.7E-03	3.7E-03
C08-C11 (Gasoline Range)	RD727	1.10E+01	5.5E+00	UJ		-	-
C11-C14 (Kerosene Range)	RD727	1.10E+01	5.5E+00	UJ		-	-
C14-C20 (Diesel Range)	RD727	1.10E+01	5.5E+00	UJ		-	-
C20-C30 (Lubricant Oil Range)	RD727	1.10E+01	5.5E+00	UJ		-	-
C11-C30	RD727	-	1.7E+01	-		-	-
Benzene	RD727	6.00E-03	3.0E-03	U	1.9E-06	-	3.0E-03
Ethylbenzene	RD727	6.00E-03	3.0E-03	U	1.5E-05	-	3.0E-03
Toluene	RD727	6.00E-03	3.0E-03	U	1.1E-05	-	3.0E-03
m,p-Xylene	RD727	6.00E-03	3.0E-03	U	1.8E-05	-	3.0E-03
o-Xylene	RD727	6.00E-03	3.0E-03	U	6.9E-06	-	3.0E-03
Xylene (total)	RD727	-	-	-	2.6E-05	-	-
2-Methylnaphthalene	RD727	-	-	-	2.8E-02	-	-
Acenaphthene	RD727	-	-	-	4.5E-04	7.4E-03	7.4E-03
Acenaphthylene	RD727	-	-	-	9.3E-05	1.5E-03	1.5E-03
Anthracene	RD727	-	-	-	2.4E-04	4.0E-03	4.0E-03
Benzo(a)anthracene	RD727	-	-	-	9.5E-06	1.6E-04	1.6E-04
Benzo(a)pyrene	RD727	-	-	-	1.2E-05	1.9E-04	1.9E-04
Benzo(b)fluoranthene	RD727	-	-	-	5.2E-06	8.5E-05	8.5E-05
Benzo(e)pyrene	RD727	-	-	-	1.5E-05	2.5E-04	2.5E-04
Benzo(g,h,i)perylene	RD727	-	-	-	2.7E-04	4.5E-03	4.5E-03
Benzo(k)fluoranthene	RD727	-	-	-	1.7E-06	2.7E-05	2.7E-05
Chrysene	RD727	-	-	-	1.4E-05	2.2E-04	2.2E-04
Dibenz(a,h)anthracene	RD727	-	-	-	1.4E-05	2.3E-04	2.3E-04
Fluoranthene	RD727	-	-	-	4.8E-05	7.9E-04	7.9E-04

TPH to Petroleum Constituent Extrapolation for Soil (0-4 feet bgs) [a]
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Fluorene	RD727	-	-	-	6.0E-04	1.0E-02	1.0E-02
Indeno(1,2,3-cd)pyrene	RD727	-	-	-	1.8E-05	3.0E-04	3.0E-04
Naphthalene	RD727	-	-	-	6.9E-03	-	-
Perylene	RD727	-	-	-	1.1E-05	1.8E-04	1.8E-04
Phenanthrene	RD727	-	-	-	1.2E-03	1.9E-02	1.9E-02
Pyrene	RD727	-	-	-	2.1E-04	3.4E-03	3.4E-03
C08-C11 (Gasoline Range)	RD728	5.80E+01	2.9E+01	UJ		-	-
C11-C14 (Kerosene Range)	RD728	5.80E+01	2.9E+01	UJ		-	-
C14-C20 (Diesel Range)	RD728	2.10E+02	2.1E+02	J		-	-
C20-C30 (Lubricant Oil Range)	RD728	9.20E+02	9.2E+02	J		-	-
C11-C30	RD728	-	1.2E+03	-		-	-
Benzene	RD728	-	-	-	1.9E-06	-	-
Ethylbenzene	RD728	-	-	-	1.5E-05	-	-
Toluene	RD728	-	-	-	1.1E-05	-	-
m,p-Xylene	RD728	-	-	-	1.8E-05	-	-
o-Xylene	RD728	-	-	-	6.9E-06	-	-
Xylene (total)	RD728	-	-	-	2.6E-05	-	-
2-Methylnaphthalene	RD728	-	-	-	2.8E-02	-	-
Acenaphthene	RD728	-	-	-	4.5E-04	5.2E-01	5.2E-01
Acenaphthylene	RD728	-	-	-	9.3E-05	1.1E-01	1.1E-01
Anthracene	RD728	-	-	-	2.4E-04	2.8E-01	2.8E-01
Benzo(a)anthracene	RD728	-	-	-	9.5E-06	1.1E-02	1.1E-02
Benzo(a)pyrene	RD728	-	-	-	1.2E-05	1.4E-02	1.4E-02
Benzo(b)fluoranthene	RD728	-	-	-	5.2E-06	6.0E-03	6.0E-03
Benzo(e)pyrene	RD728	-	-	-	1.5E-05	1.8E-02	1.8E-02
Benzo(g,h,i)perylene	RD728	-	-	-	2.7E-04	3.2E-01	3.2E-01
Benzo(k)fluoranthene	RD728	-	-	-	1.7E-06	1.9E-03	1.9E-03
Chrysene	RD728	-	-	-	1.4E-05	1.6E-02	1.6E-02
Dibenz(a,h)anthracene	RD728	-	-	-	1.4E-05	1.6E-02	1.6E-02
Fluoranthene	RD728	-	-	-	4.8E-05	5.5E-02	5.5E-02
Fluorene	RD728	-	-	-	6.0E-04	7.0E-01	7.0E-01
Indeno(1,2,3-cd)pyrene	RD728	-	-	-	1.8E-05	2.1E-02	2.1E-02
Naphthalene	RD728	-	-	-	6.9E-03	-	-
Perylene	RD728	-	-	-	1.1E-05	1.2E-02	1.2E-02
Phenanthrene	RD728	-	-	-	1.2E-03	1.4E+00	1.4E+00
Pyrene	RD728	-	-	-	2.1E-04	2.4E-01	2.4E-01
C08-C11 (Gasoline Range)	RD737	1.50E+01	7.5E+00	UJ		-	-
C11-C14 (Kerosene Range)	RD737	1.50E+01	7.5E+00	UJ		-	-
C14-C20 (Diesel Range)	RD737	1.50E+01	7.5E+00	UJ		-	-
C20-C30 (Lubricant Oil Range)	RD737	1.50E+01	7.5E+00	UJ		-	-
C11-C30	RD737	-	2.3E+01	-		-	-
Benzene	RD737	-	-	-	1.9E-06	-	-
Ethylbenzene	RD737	-	-	-	1.5E-05	-	-
Toluene	RD737	-	-	-	1.1E-05	-	-
m,p-Xylene	RD737	-	-	-	1.8E-05	-	-
o-Xylene	RD737	-	-	-	6.9E-06	-	-
Xylene (total)	RD737	-	-	-	2.6E-05	-	-
2-Methylnaphthalene	RD737	-	-	-	2.8E-02	-	-
Acenaphthene	RD737	-	-	-	4.5E-04	1.0E-02	1.0E-02
Acenaphthylene	RD737	-	-	-	9.3E-05	2.1E-03	2.1E-03
Anthracene	RD737	-	-	-	2.4E-04	5.4E-03	5.4E-03
Benzo(a)anthracene	RD737	-	-	-	9.5E-06	2.1E-04	2.1E-04
Benzo(a)pyrene	RD737	-	-	-	1.2E-05	2.6E-04	2.6E-04
Benzo(b)fluoranthene	RD737	-	-	-	5.2E-06	1.2E-04	1.2E-04
Benzo(e)pyrene	RD737	-	-	-	1.5E-05	3.5E-04	3.5E-04
Benzo(g,h,i)perylene	RD737	-	-	-	2.7E-04	6.2E-03	6.2E-03

TPH to Petroleum Constituent Extrapolation for Soil (0-4 feet bgs) [a]
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Benzo(k)fluoranthene	RD737	-	-	-	1.7E-06	3.7E-05	3.7E-05
Chrysene	RD737	-	-	-	1.4E-05	3.1E-04	3.1E-04
Dibenz(a,h)anthracene	RD737	-	-	-	1.4E-05	3.1E-04	3.1E-04
Fluoranthene	RD737	-	-	-	4.8E-05	1.1E-03	1.1E-03
Fluorene	RD737	-	-	-	6.0E-04	1.4E-02	1.4E-02
Indeno(1,2,3-cd)pyrene	RD737	-	-	-	1.8E-05	4.1E-04	4.1E-04
Naphthalene	RD737	-	-	-	6.9E-03	-	-
Perylene	RD737	-	-	-	1.1E-05	2.4E-04	2.4E-04
Phenanthrene	RD737	-	-	-	1.2E-03	2.6E-02	2.6E-02
Pyrene	RD737	-	-	-	2.1E-04	4.6E-03	4.6E-03
C08-C11 (Gasoline Range)	RD738	1.10E+01	5.5E+00	UJ		-	-
C11-C14 (Kerosene Range)	RD738	1.10E+01	5.5E+00	UJ		-	-
C14-C20 (Diesel Range)	RD738	1.10E+01	5.5E+00	UJ		-	-
C20-C30 (Lubricant Oil Range)	RD738	1.10E+01	5.5E+00	UJ		-	-
C11-C30	RD738	-	1.7E+01	-		-	-
Benzene	RD738	6.00E-03	3.0E-03	U	1.9E-06	-	3.0E-03
Ethylbenzene	RD738	6.00E-03	3.0E-03	U	1.5E-05	-	3.0E-03
Toluene	RD738	6.00E-03	3.0E-03	U	1.1E-05	-	3.0E-03
m,p-Xylene	RD738	6.00E-03	3.0E-03	U	1.8E-05	-	3.0E-03
o-Xylene	RD738	6.00E-03	3.0E-03	U	6.9E-06	-	3.0E-03
Xylene (total)	RD738	-	-	-	2.6E-05	-	-
2-Methylnaphthalene	RD738	-	-	-	2.8E-02	-	-
Acenaphthene	RD738	-	-	-	4.5E-04	7.4E-03	7.4E-03
Acenaphthylene	RD738	-	-	-	9.3E-05	1.5E-03	1.5E-03
Anthracene	RD738	-	-	-	2.4E-04	4.0E-03	4.0E-03
Benzo(a)anthracene	RD738	-	-	-	9.5E-06	1.6E-04	1.6E-04
Benzo(a)pyrene	RD738	-	-	-	1.2E-05	1.9E-04	1.9E-04
Benzo(b)fluoranthene	RD738	-	-	-	5.2E-06	8.5E-05	8.5E-05
Benzo(e)pyrene	RD738	-	-	-	1.5E-05	2.5E-04	2.5E-04
Benzo(g,h,i)perylene	RD738	-	-	-	2.7E-04	4.5E-03	4.5E-03
Benzo(k)fluoranthene	RD738	-	-	-	1.7E-06	2.7E-05	2.7E-05
Chrysene	RD738	-	-	-	1.4E-05	2.2E-04	2.2E-04
Dibenz(a,h)anthracene	RD738	-	-	-	1.4E-05	2.3E-04	2.3E-04
Fluoranthene	RD738	-	-	-	4.8E-05	7.9E-04	7.9E-04
Fluorene	RD738	-	-	-	6.0E-04	1.0E-02	1.0E-02
Indeno(1,2,3-cd)pyrene	RD738	-	-	-	1.8E-05	3.0E-04	3.0E-04
Naphthalene	RD738	-	-	-	6.9E-03	-	-
Perylene	RD738	-	-	-	1.1E-05	1.8E-04	1.8E-04
Phenanthrene	RD738	-	-	-	1.2E-03	1.9E-02	1.9E-02
Pyrene	RD738	-	-	-	2.1E-04	3.4E-03	3.4E-03
C08-C11 (Gasoline Range)	RJ782	1.70E+01	8.5E+00	U		-	-
C11-C14 (Kerosene Range)	RJ782	1.70E+01	8.5E+00	U		-	-
C14-C20 (Diesel Range)	RJ782	1.70E+00	1.7E+00	J		-	-
C20-C30 (Lubricant Oil Range)	RJ782	1.20E+02	1.2E+02			-	-
C11-C30	RJ782	-	1.3E+02	-		-	-
Benzene	RJ782	-	-	-	1.9E-06	-	-
Ethylbenzene	RJ782	-	-	-	1.5E-05	-	-
Toluene	RJ782	-	-	-	1.1E-05	-	-
m,p-Xylene	RJ782	-	-	-	1.8E-05	-	-
o-Xylene	RJ782	-	-	-	6.9E-06	-	-
Xylene (total)	RJ782	-	-	-	2.6E-05	-	-
2-Methylnaphthalene	RJ782	3.00E-03	1.5E-03	U	2.8E-02	-	1.5E-03
Acenaphthene	RJ782	3.00E-03	1.5E-03	U	4.5E-04	5.8E-02	1.5E-03
Acenaphthylene	RJ782	3.00E-03	1.5E-03	U	9.3E-05	1.2E-02	1.5E-03
Anthracene	RJ782	3.00E-03	1.5E-03	U	2.4E-04	3.1E-02	1.5E-03
Benzo(a)anthracene	RJ782	4.00E-03	4.0E-03		9.5E-06	1.2E-03	4.0E-03

TPH to Petroleum Constituent Extrapolation for Soil (0-4 feet bgs) [a]
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Benzo(a)pyrene	RJ782	6.00E-03	6.0E-03		1.2E-05	1.5E-03	6.0E-03
Benzo(b)fluoranthene	RJ782	8.00E-03	8.0E-03		5.2E-06	6.7E-04	8.0E-03
Benzo(e)pyrene	RJ782	-	-	-	1.5E-05	2.0E-03	2.0E-03
Benzo(g,h,i)perylene	RJ782	3.00E-03	1.5E-03	U	2.7E-04	3.6E-02	1.5E-03
Benzo(k)fluoranthene	RJ782	7.00E-03	7.0E-03		1.7E-06	2.2E-04	7.0E-03
Chrysene	RJ782	8.00E-03	8.0E-03		1.4E-05	1.8E-03	8.0E-03
Dibenz(a,h)anthracene	RJ782	3.00E-03	1.5E-03	U	1.4E-05	1.8E-03	1.5E-03
Fluoranthene	RJ782	9.00E-03	9.0E-03		4.8E-05	6.2E-03	9.0E-03
Fluorene	RJ782	3.00E-03	1.5E-03	U	6.0E-04	7.9E-02	1.5E-03
Indeno(1,2,3-cd)pyrene	RJ782	3.00E-03	1.5E-03	U	1.8E-05	2.4E-03	1.5E-03
Naphthalene	RJ782	3.00E-03	1.5E-03	U	6.9E-03	-	1.5E-03
Perylene	RJ782	-	-	-	1.1E-05	1.4E-03	1.4E-03
Phenanthrene	RJ782	4.00E-03	4.0E-03		1.2E-03	1.5E-01	4.0E-03
Pyrene	RJ782	9.00E-03	9.0E-03		2.1E-04	2.7E-02	9.0E-03
C08-C11 (Gasoline Range)	RS287	1.10E+01	5.5E+00	U		-	-
C11-C14 (Kerosene Range)	RS287	1.10E+01	5.5E+00	U		-	-
C14-C20 (Diesel Range)	RS287	1.10E+01	5.5E+00	U		-	-
C20-C30 (Lubricant Oil Range)	RS287	1.10E+01	5.5E+00	U		-	-
C11-C30	RS287	-	1.7E+01	-		-	-
Benzene	RS287	5.00E-03	2.5E-03	U	1.9E-06	-	2.5E-03
Ethylbenzene	RS287	5.00E-03	2.5E-03	U	1.5E-05	-	2.5E-03
Toluene	RS287	5.00E-03	2.5E-03	U	1.1E-05	-	2.5E-03
m,p-Xylene	RS287	5.00E-03	2.5E-03	U	1.8E-05	-	2.5E-03
o-Xylene	RS287	5.00E-03	2.5E-03	U	6.9E-06	-	2.5E-03
Xylene (total)	RS287	-	-	-	2.6E-05	-	-
2-Methylnaphthalene	RS287	-	-	-	2.8E-02	-	-
Acenaphthene	RS287	3.20E-02	1.6E-02	U	4.5E-04	7.4E-03	7.4E-03
Acenaphthylene	RS287	3.20E-02	1.6E-02	U	9.3E-05	1.5E-03	1.5E-03
Anthracene	RS287	3.20E-02	1.6E-02	U	2.4E-04	4.0E-03	4.0E-03
Benzo(a)anthracene	RS287	3.20E-02	1.6E-02	U	9.5E-06	1.6E-04	1.6E-04
Benzo(a)pyrene	RS287	3.20E-02	1.6E-02	U	1.2E-05	1.9E-04	1.9E-04
Benzo(b)fluoranthene	RS287	3.20E-02	1.6E-02	U	5.2E-06	8.5E-05	8.5E-05
Benzo(e)pyrene	RS287	-	-	-	1.5E-05	2.5E-04	2.5E-04
Benzo(g,h,i)perylene	RS287	3.20E-02	1.6E-02	U	2.7E-04	4.5E-03	4.5E-03
Benzo(k)fluoranthene	RS287	3.20E-02	1.6E-02	U	1.7E-06	2.7E-05	2.7E-05
Chrysene	RS287	3.20E-02	1.6E-02	U	1.4E-05	2.2E-04	2.2E-04
Dibenz(a,h)anthracene	RS287	3.20E-02	1.6E-02	U	1.4E-05	2.3E-04	2.3E-04
Fluoranthene	RS287	3.20E-02	1.6E-02	U	4.8E-05	7.9E-04	7.9E-04
Fluorene	RS287	3.20E-02	1.6E-02	U	6.0E-04	1.0E-02	1.0E-02
Indeno(1,2,3-cd)pyrene	RS287	3.20E-02	1.6E-02	U	1.8E-05	3.0E-04	3.0E-04
Naphthalene	RS287	3.20E-02	1.6E-02	U	6.9E-03	-	1.6E-02
Perylene	RS287	-	-	-	1.1E-05	1.8E-04	1.8E-04
Phenanthrene	RS287	3.20E-02	1.6E-02	U	1.2E-03	1.9E-02	1.6E-02
Pyrene	RS287	3.20E-02	1.6E-02	U	2.1E-04	3.4E-03	3.4E-03
C08-C11 (Gasoline Range)	RS288	5.40E+01	2.7E+01	U		-	-
C11-C14 (Kerosene Range)	RS288	5.40E+01	2.7E+01	U		-	-
C14-C20 (Diesel Range)	RS288	7.60E+01	7.6E+01			-	-
C20-C30 (Lubricant Oil Range)	RS288	2.50E+02	2.5E+02			-	-
C11-C30	RS288	-	3.5E+02	-		-	-
Benzene	RS288	-	-	-	1.9E-06	-	-
Ethylbenzene	RS288	-	-	-	1.5E-05	-	-
Toluene	RS288	-	-	-	1.1E-05	-	-
m,p-Xylene	RS288	-	-	-	1.8E-05	-	-
o-Xylene	RS288	-	-	-	6.9E-06	-	-
Xylene (total)	RS288	-	-	-	2.6E-05	-	-
2-Methylnaphthalene	RS288	-	-	-	2.8E-02	-	-

TPH to Petroleum Constituent Extrapolation for Soil (0-4 feet bgs) [a]
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Acenaphthene	RS288	3.20E+00	1.6E+00	U	4.5E-04	1.6E-01	1.6E-01
Acenaphthylene	RS288	3.20E+00	1.6E+00	U	9.3E-05	3.3E-02	3.3E-02
Anthracene	RS288	3.20E+00	1.6E+00	U	2.4E-04	8.5E-02	8.5E-02
Benzo(a)anthracene	RS288	3.20E+00	1.6E+00	U	9.5E-06	3.3E-03	3.3E-03
Benzo(a)pyrene	RS288	3.20E+00	1.6E+00	U	1.2E-05	4.1E-03	4.1E-03
Benzo(b)fluoranthene	RS288	3.20E+00	1.6E+00	U	5.2E-06	1.8E-03	1.8E-03
Benzo(e)pyrene	RS288	-	-	-	1.5E-05	5.4E-03	5.4E-03
Benzo(g,h,i)perylene	RS288	3.20E+00	1.6E+00	U	2.7E-04	9.7E-02	9.7E-02
Benzo(k)fluoranthene	RS288	3.20E+00	1.6E+00	U	1.7E-06	5.9E-04	5.9E-04
Chrysene	RS288	3.20E+00	1.6E+00	U	1.4E-05	4.8E-03	4.8E-03
Dibenz(a,h)anthracene	RS288	3.20E+00	1.6E+00	U	1.4E-05	4.9E-03	4.9E-03
Fluoranthene	RS288	3.20E+00	1.6E+00	U	4.8E-05	1.7E-02	1.7E-02
Fluorene	RS288	3.20E+00	1.6E+00	U	6.0E-04	2.1E-01	2.1E-01
Indeno(1,2,3-cd)pyrene	RS288	3.20E+00	1.6E+00	U	1.8E-05	6.5E-03	6.5E-03
Naphthalene	RS288	3.20E+00	1.6E+00	U	6.9E-03	-	1.6E+00
Perylene	RS288	-	-	-	1.1E-05	3.8E-03	3.8E-03
Phenanthrene	RS288	3.20E+00	1.6E+00	U	1.2E-03	4.1E-01	4.1E-01
Pyrene	RS288	3.20E+00	1.6E+00	U	2.1E-04	7.2E-02	7.2E-02
C08-C11 (Gasoline Range)	RS289	1.00E+01	5.0E+00	U		-	-
C11-C14 (Kerosene Range)	RS289	1.00E+01	5.0E+00	U		-	-
C14-C20 (Diesel Range)	RS289	1.00E+01	5.0E+00	U		-	-
C20-C30 (Lubricant Oil Range)	RS289	3.90E+01	3.9E+01			-	-
C11-C30	RS289	-	4.9E+01	-		-	-
Benzene	RS289	-	-	-	1.9E-06	-	-
Ethylbenzene	RS289	-	-	-	1.5E-05	-	-
Toluene	RS289	-	-	-	1.1E-05	-	-
m,p-Xylene	RS289	-	-	-	1.8E-05	-	-
o-Xylene	RS289	-	-	-	6.9E-06	-	-
Xylene (total)	RS289	-	-	-	2.6E-05	-	-
2-Methylnaphthalene	RS289	-	-	-	2.8E-02	-	-
Acenaphthene	RS289	3.20E-01	1.6E-01	U	4.5E-04	2.2E-02	2.2E-02
Acenaphthylene	RS289	3.20E-01	1.6E-01	U	9.3E-05	4.5E-03	4.5E-03
Anthracene	RS289	3.20E-01	1.6E-01	U	2.4E-04	1.2E-02	1.2E-02
Benzo(a)anthracene	RS289	3.20E-01	1.6E-01	U	9.5E-06	4.6E-04	4.6E-04
Benzo(a)pyrene	RS289	3.20E-01	1.6E-01	U	1.2E-05	5.7E-04	5.7E-04
Benzo(b)fluoranthene	RS289	3.20E-01	1.6E-01	U	5.2E-06	2.5E-04	2.5E-04
Benzo(e)pyrene	RS289	-	-	-	1.5E-05	7.5E-04	7.5E-04
Benzo(g,h,i)perylene	RS289	3.20E-01	1.6E-01	U	2.7E-04	1.3E-02	1.3E-02
Benzo(k)fluoranthene	RS289	3.20E-01	1.6E-01	U	1.7E-06	8.1E-05	8.1E-05
Chrysene	RS289	3.20E-01	1.6E-01	U	1.4E-05	6.7E-04	6.7E-04
Dibenz(a,h)anthracene	RS289	3.20E-01	1.6E-01	U	1.4E-05	6.7E-04	6.7E-04
Fluoranthene	RS289	3.20E-01	1.6E-01	U	4.8E-05	2.3E-03	2.3E-03
Fluorene	RS289	3.20E-01	1.6E-01	U	6.0E-04	3.0E-02	3.0E-02
Indeno(1,2,3-cd)pyrene	RS289	3.20E-01	1.6E-01	U	1.8E-05	9.0E-04	9.0E-04
Naphthalene	RS289	3.20E-01	1.6E-01	U	6.9E-03	-	1.6E-01
Perylene	RS289	-	-	-	1.1E-05	5.3E-04	5.3E-04
Phenanthrene	RS289	3.20E-01	1.6E-01	U	1.2E-03	5.7E-02	5.7E-02
Pyrene	RS289	3.20E-01	1.6E-01	U	2.1E-04	1.0E-02	1.0E-02
C08-C11 (Gasoline Range)	RS290	1.10E+01	5.5E+00	U		-	-
C11-C14 (Kerosene Range)	RS290	1.10E+01	5.5E+00	U		-	-
C14-C20 (Diesel Range)	RS290	1.10E+01	5.5E+00	U		-	-
C20-C30 (Lubricant Oil Range)	RS290	4.20E+01	4.2E+01			-	-
C11-C30	RS290	-	5.3E+01	-		-	-
Benzene	RS290	-	-	-	1.9E-06	-	-
Ethylbenzene	RS290	-	-	-	1.5E-05	-	-
Toluene	RS290	-	-	-	1.1E-05	-	-

TPH to Petroleum Constituent Extrapolation for Soil (0-4 feet bgs) [a]
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
m,p-Xylene	RS290	-	-	-	1.8E-05	-	-
o-Xylene	RS290	-	-	-	6.9E-06	-	-
Xylene (total)	RS290	-	-	-	2.6E-05	-	-
2-Methylnaphthalene	RS290	-	-	-	2.8E-02	-	-
Acenaphthene	RS290	3.30E-02	1.7E-02	U	4.5E-04	2.4E-02	1.7E-02
Acenaphthylene	RS290	3.30E-02	1.7E-02	U	9.3E-05	4.9E-03	4.9E-03
Anthracene	RS290	3.30E-02	1.7E-02	U	2.4E-04	1.3E-02	1.3E-02
Benzo(a)anthracene	RS290	3.30E-02	1.7E-02	U	9.5E-06	5.0E-04	5.0E-04
Benzo(a)pyrene	RS290	3.30E-02	1.7E-02	U	1.2E-05	6.2E-04	6.2E-04
Benzo(b)fluoranthene	RS290	3.30E-02	1.7E-02	U	5.2E-06	2.7E-04	2.7E-04
Benzo(e)pyrene	RS290	-	-	-	1.5E-05	8.2E-04	8.2E-04
Benzo(g,h,i)perylene	RS290	3.30E-02	1.7E-02	U	2.7E-04	1.5E-02	1.5E-02
Benzo(k)fluoranthene	RS290	3.30E-02	1.7E-02	U	1.7E-06	8.8E-05	8.8E-05
Chrysene	RS290	3.30E-02	1.7E-02	U	1.4E-05	7.2E-04	7.2E-04
Dibenz(a,h)anthracene	RS290	3.30E-02	1.7E-02	U	1.4E-05	7.3E-04	7.3E-04
Fluoranthene	RS290	3.30E-02	1.7E-02	U	4.8E-05	2.5E-03	2.5E-03
Fluorene	RS290	3.30E-02	1.7E-02	U	6.0E-04	3.2E-02	1.7E-02
Indeno(1,2,3-cd)pyrene	RS290	3.30E-02	1.7E-02	U	1.8E-05	9.7E-04	9.7E-04
Naphthalene	RS290	3.30E-02	1.7E-02	U	6.9E-03	-	1.7E-02
Perylene	RS290	-	-	-	1.1E-05	5.7E-04	5.7E-04
Phenanthrene	RS290	3.30E-02	1.7E-02	U	1.2E-03	6.2E-02	1.7E-02
Pyrene	RS290	3.30E-02	1.7E-02	U	2.1E-04	1.1E-02	1.1E-02
C08-C11 (Gasoline Range)	RS291	1.10E+01	5.5E+00	U		-	-
C11-C14 (Kerosene Range)	RS291	1.10E+01	5.5E+00	U		-	-
C14-C20 (Diesel Range)	RS291	1.10E+01	5.5E+00	U		-	-
C20-C30 (Lubricant Oil Range)	RS291	1.10E+01	5.5E+00	U		-	-
C11-C30	RS291	-	1.7E+01	-		-	-
Benzene	RS291	5.00E-03	2.5E-03	U	1.9E-06	-	2.5E-03
Ethylbenzene	RS291	5.00E-03	2.5E-03	U	1.5E-05	-	2.5E-03
Toluene	RS291	5.00E-03	2.5E-03	U	1.1E-05	-	2.5E-03
m,p-Xylene	RS291	5.00E-03	2.5E-03	U	1.8E-05	-	2.5E-03
o-Xylene	RS291	5.00E-03	2.5E-03	U	6.9E-06	-	2.5E-03
Xylene (total)	RS291	-	-	-	2.6E-05	-	-
2-Methylnaphthalene	RS291	-	-	-	2.8E-02	-	-
Acenaphthene	RS291	3.20E-02	1.6E-02	U	4.5E-04	7.4E-03	7.4E-03
Acenaphthylene	RS291	3.20E-02	1.6E-02	U	9.3E-05	1.5E-03	1.5E-03
Anthracene	RS291	3.20E-02	1.6E-02	U	2.4E-04	4.0E-03	4.0E-03
Benzo(a)anthracene	RS291	3.20E-02	1.6E-02	U	9.5E-06	1.6E-04	1.6E-04
Benzo(a)pyrene	RS291	3.20E-02	1.6E-02	U	1.2E-05	1.9E-04	1.9E-04
Benzo(b)fluoranthene	RS291	3.20E-02	1.6E-02	U	5.2E-06	8.5E-05	8.5E-05
Benzo(e)pyrene	RS291	-	-	-	1.5E-05	2.5E-04	2.5E-04
Benzo(g,h,i)perylene	RS291	3.20E-02	1.6E-02	U	2.7E-04	4.5E-03	4.5E-03
Benzo(k)fluoranthene	RS291	3.20E-02	1.6E-02	U	1.7E-06	2.7E-05	2.7E-05
Chrysene	RS291	3.20E-02	1.6E-02	U	1.4E-05	2.2E-04	2.2E-04
Dibenz(a,h)anthracene	RS291	3.20E-02	1.6E-02	U	1.4E-05	2.3E-04	2.3E-04
Fluoranthene	RS291	3.20E-02	1.6E-02	U	4.8E-05	7.9E-04	7.9E-04
Fluorene	RS291	3.20E-02	1.6E-02	U	6.0E-04	1.0E-02	1.0E-02
Indeno(1,2,3-cd)pyrene	RS291	3.20E-02	1.6E-02	U	1.8E-05	3.0E-04	3.0E-04
Naphthalene	RS291	3.20E-02	1.6E-02	U	6.9E-03	-	1.6E-02
Perylene	RS291	-	-	-	1.1E-05	1.8E-04	1.8E-04
Phenanthrene	RS291	3.20E-02	1.6E-02	U	1.2E-03	1.9E-02	1.6E-02
Pyrene	RS291	3.20E-02	1.6E-02	U	2.1E-04	3.4E-03	3.4E-03
C08-C11 (Gasoline Range)	RS292	1.10E+01	5.5E+00	U		-	-
C11-C14 (Kerosene Range)	RS292	1.10E+01	5.5E+00	U		-	-
C14-C20 (Diesel Range)	RS292	1.10E+01	5.5E+00	U		-	-
C20-C30 (Lubricant Oil Range)	RS292	1.10E+01	5.5E+00	U		-	-

TPH to Petroleum Constituent Extrapolation for Soil (0-4 feet bgs) [a]
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
C11-C30	RS292	-	1.7E+01	-		-	-
Benzene	RS292	-	-	-	1.9E-06	-	-
Ethylbenzene	RS292	-	-	-	1.5E-05	-	-
Toluene	RS292	-	-	-	1.1E-05	-	-
m,p-Xylene	RS292	-	-	-	1.8E-05	-	-
o-Xylene	RS292	-	-	-	6.9E-06	-	-
Xylene (total)	RS292	-	-	-	2.6E-05	-	-
2-Methylnaphthalene	RS292	-	-	-	2.8E-02	-	-
Acenaphthene	RS292	3.40E-02	1.7E-02	U	4.5E-04	7.4E-03	7.4E-03
Acenaphthylene	RS292	3.40E-02	1.7E-02	U	9.3E-05	1.5E-03	1.5E-03
Anthracene	RS292	3.40E-02	1.7E-02	U	2.4E-04	4.0E-03	4.0E-03
Benzo(a)anthracene	RS292	3.40E-02	1.7E-02	U	9.5E-06	1.6E-04	1.6E-04
Benzo(a)pyrene	RS292	3.40E-02	1.7E-02	U	1.2E-05	1.9E-04	1.9E-04
Benzo(b)fluoranthene	RS292	3.40E-02	1.7E-02	U	5.2E-06	8.5E-05	8.5E-05
Benzo(e)pyrene	RS292	-	-	-	1.5E-05	2.5E-04	2.5E-04
Benzo(g,h,i)perylene	RS292	3.40E-02	1.7E-02	U	2.7E-04	4.5E-03	4.5E-03
Benzo(k)fluoranthene	RS292	3.40E-02	1.7E-02	U	1.7E-06	2.7E-05	2.7E-05
Chrysene	RS292	3.40E-02	1.7E-02	U	1.4E-05	2.2E-04	2.2E-04
Dibenz(a,h)anthracene	RS292	3.40E-02	1.7E-02	U	1.4E-05	2.3E-04	2.3E-04
Fluoranthene	RS292	3.40E-02	1.7E-02	U	4.8E-05	7.9E-04	7.9E-04
Fluorene	RS292	3.40E-02	1.7E-02	U	6.0E-04	1.0E-02	1.0E-02
Indeno(1,2,3-cd)pyrene	RS292	3.40E-02	1.7E-02	U	1.8E-05	3.0E-04	3.0E-04
Naphthalene	RS292	3.40E-02	1.7E-02	U	6.9E-03	-	1.7E-02
Perylene	RS292	-	-	-	1.1E-05	1.8E-04	1.8E-04
Phenanthrene	RS292	3.40E-02	1.7E-02	U	1.2E-03	1.9E-02	1.7E-02
Pyrene	RS292	3.40E-02	1.7E-02	U	2.1E-04	3.4E-03	3.4E-03
C08-C11 (Gasoline Range)	RS293	5.20E+01	2.6E+01	U		-	-
C11-C14 (Kerosene Range)	RS293	8.90E+01	8.9E+01			-	-
C14-C20 (Diesel Range)	RS293	7.00E+02	7.0E+02			-	-
C20-C30 (Lubricant Oil Range)	RS293	7.20E+02	7.2E+02			-	-
C11-C30	RS293	-	1.5E+03	-		-	-
Benzene	RS293	-	-	-	1.9E-06	-	-
Ethylbenzene	RS293	-	-	-	1.5E-05	-	-
Toluene	RS293	-	-	-	1.1E-05	-	-
m,p-Xylene	RS293	-	-	-	1.8E-05	-	-
o-Xylene	RS293	-	-	-	6.9E-06	-	-
Xylene (total)	RS293	-	-	-	2.6E-05	-	-
2-Methylnaphthalene	RS293	-	-	-	2.8E-02	-	-
Acenaphthene	RS293	-	-	-	4.5E-04	6.7E-01	6.7E-01
Acenaphthylene	RS293	-	-	-	9.3E-05	1.4E-01	1.4E-01
Anthracene	RS293	-	-	-	2.4E-04	3.6E-01	3.6E-01
Benzo(a)anthracene	RS293	-	-	-	9.5E-06	1.4E-02	1.4E-02
Benzo(a)pyrene	RS293	-	-	-	1.2E-05	1.8E-02	1.8E-02
Benzo(b)fluoranthene	RS293	-	-	-	5.2E-06	7.8E-03	7.8E-03
Benzo(e)pyrene	RS293	-	-	-	1.5E-05	2.3E-02	2.3E-02
Benzo(g,h,i)perylene	RS293	-	-	-	2.7E-04	4.1E-01	4.1E-01
Benzo(k)fluoranthene	RS293	-	-	-	1.7E-06	2.5E-03	2.5E-03
Chrysene	RS293	-	-	-	1.4E-05	2.1E-02	2.1E-02
Dibenz(a,h)anthracene	RS293	-	-	-	1.4E-05	2.1E-02	2.1E-02
Fluoranthene	RS293	-	-	-	4.8E-05	7.2E-02	7.2E-02
Fluorene	RS293	-	-	-	6.0E-04	9.1E-01	9.1E-01
Indeno(1,2,3-cd)pyrene	RS293	-	-	-	1.8E-05	2.8E-02	2.8E-02
Naphthalene	RS293	-	-	-	6.9E-03	-	-
Perylene	RS293	-	-	-	1.1E-05	1.6E-02	1.6E-02
Phenanthrene	RS293	-	-	-	1.2E-03	1.8E+00	1.8E+00
Pyrene	RS293	-	-	-	2.1E-04	3.1E-01	3.1E-01

TPH to Petroleum Constituent Extrapolation for Soil (0-4 feet bgs) [a]
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
C08-C11 (Gasoline Range)	RS294	1.10E+01	5.5E+00	U		-	-
C11-C14 (Kerosene Range)	RS294	1.10E+01	5.5E+00	U		-	-
C14-C20 (Diesel Range)	RS294	1.10E+01	5.5E+00	U		-	-
C20-C30 (Lubricant Oil Range)	RS294	1.10E+01	5.5E+00	U		-	-
C11-C30	RS294	-	1.7E+01	-		-	-
Benzene	RS294	-	-	-	1.9E-06	-	-
Ethylbenzene	RS294	-	-	-	1.5E-05	-	-
Toluene	RS294	-	-	-	1.1E-05	-	-
m,p-Xylene	RS294	-	-	-	1.8E-05	-	-
o-Xylene	RS294	-	-	-	6.9E-06	-	-
Xylene (total)	RS294	-	-	-	2.6E-05	-	-
2-Methylnaphthalene	RS294	-	-	-	2.8E-02	-	-
Acenaphthene	RS294	-	-	-	4.5E-04	7.4E-03	7.4E-03
Acenaphthylene	RS294	-	-	-	9.3E-05	1.5E-03	1.5E-03
Anthracene	RS294	-	-	-	2.4E-04	4.0E-03	4.0E-03
Benzo(a)anthracene	RS294	-	-	-	9.5E-06	1.6E-04	1.6E-04
Benzo(a)pyrene	RS294	-	-	-	1.2E-05	1.9E-04	1.9E-04
Benzo(b)fluoranthene	RS294	-	-	-	5.2E-06	8.5E-05	8.5E-05
Benzo(e)pyrene	RS294	-	-	-	1.5E-05	2.5E-04	2.5E-04
Benzo(g,h,i)perylene	RS294	-	-	-	2.7E-04	4.5E-03	4.5E-03
Benzo(k)fluoranthene	RS294	-	-	-	1.7E-06	2.7E-05	2.7E-05
Chrysene	RS294	-	-	-	1.4E-05	2.2E-04	2.2E-04
Dibenz(a,h)anthracene	RS294	-	-	-	1.4E-05	2.3E-04	2.3E-04
Fluoranthene	RS294	-	-	-	4.8E-05	7.9E-04	7.9E-04
Fluorene	RS294	-	-	-	6.0E-04	1.0E-02	1.0E-02
Indeno(1,2,3-cd)pyrene	RS294	-	-	-	1.8E-05	3.0E-04	3.0E-04
Naphthalene	RS294	-	-	-	6.9E-03	-	-
Perylene	RS294	-	-	-	1.1E-05	1.8E-04	1.8E-04
Phenanthrene	RS294	-	-	-	1.2E-03	1.9E-02	1.9E-02
Pyrene	RS294	-	-	-	2.1E-04	3.4E-03	3.4E-03
C08-C11 (Gasoline Range)	RS295	1.10E+01	5.5E+00	U		-	-
C11-C14 (Kerosene Range)	RS295	1.10E+01	5.5E+00	U		-	-
C14-C20 (Diesel Range)	RS295	1.10E+01	5.5E+00	U		-	-
C20-C30 (Lubricant Oil Range)	RS295	1.10E+01	5.5E+00	U		-	-
C11-C30	RS295	-	1.7E+01	-		-	-
Benzene	RS295	-	-	-	1.9E-06	-	-
Ethylbenzene	RS295	-	-	-	1.5E-05	-	-
Toluene	RS295	-	-	-	1.1E-05	-	-
m,p-Xylene	RS295	-	-	-	1.8E-05	-	-
o-Xylene	RS295	-	-	-	6.9E-06	-	-
Xylene (total)	RS295	-	-	-	2.6E-05	-	-
2-Methylnaphthalene	RS295	-	-	-	2.8E-02	-	-
Acenaphthene	RS295	-	-	-	4.5E-04	7.4E-03	7.4E-03
Acenaphthylene	RS295	-	-	-	9.3E-05	1.5E-03	1.5E-03
Anthracene	RS295	-	-	-	2.4E-04	4.0E-03	4.0E-03
Benzo(a)anthracene	RS295	-	-	-	9.5E-06	1.6E-04	1.6E-04
Benzo(a)pyrene	RS295	-	-	-	1.2E-05	1.9E-04	1.9E-04
Benzo(b)fluoranthene	RS295	-	-	-	5.2E-06	8.5E-05	8.5E-05
Benzo(e)pyrene	RS295	-	-	-	1.5E-05	2.5E-04	2.5E-04
Benzo(g,h,i)perylene	RS295	-	-	-	2.7E-04	4.5E-03	4.5E-03
Benzo(k)fluoranthene	RS295	-	-	-	1.7E-06	2.7E-05	2.7E-05
Chrysene	RS295	-	-	-	1.4E-05	2.2E-04	2.2E-04
Dibenz(a,h)anthracene	RS295	-	-	-	1.4E-05	2.3E-04	2.3E-04
Fluoranthene	RS295	-	-	-	4.8E-05	7.9E-04	7.9E-04
Fluorene	RS295	-	-	-	6.0E-04	1.0E-02	1.0E-02
Indeno(1,2,3-cd)pyrene	RS295	-	-	-	1.8E-05	3.0E-04	3.0E-04

TPH to Petroleum Constituent Extrapolation for Soil (0-4 feet bgs) [a]
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Naphthalene	RS295	-	-	-	6.9E-03	-	-
Perylene	RS295	-	-	-	1.1E-05	1.8E-04	1.8E-04
Phenanthrene	RS295	-	-	-	1.2E-03	1.9E-02	1.9E-02
Pyrene	RS295	-	-	-	2.1E-04	3.4E-03	3.4E-03
C08-C11 (Gasoline Range)	RS296	1.10E+01	5.5E+00	U		-	-
C11-C14 (Kerosene Range)	RS296	1.10E+01	5.5E+00	U		-	-
C14-C20 (Diesel Range)	RS296	1.10E+01	5.5E+00	U		-	-
C20-C30 (Lubricant Oil Range)	RS296	1.10E+01	5.5E+00	U		-	-
C11-C30	RS296	-	1.7E+01	-		-	-
Benzene	RS296	-	-	-	1.9E-06	-	-
Ethylbenzene	RS296	-	-	-	1.5E-05	-	-
Toluene	RS296	-	-	-	1.1E-05	-	-
m,p-Xylene	RS296	-	-	-	1.8E-05	-	-
o-Xylene	RS296	-	-	-	6.9E-06	-	-
Xylene (total)	RS296	-	-	-	2.6E-05	-	-
2-Methylnaphthalene	RS296	-	-	-	2.8E-02	-	-
Acenaphthene	RS296	-	-	-	4.5E-04	7.4E-03	7.4E-03
Acenaphthylene	RS296	-	-	-	9.3E-05	1.5E-03	1.5E-03
Anthracene	RS296	-	-	-	2.4E-04	4.0E-03	4.0E-03
Benzo(a)anthracene	RS296	-	-	-	9.5E-06	1.6E-04	1.6E-04
Benzo(a)pyrene	RS296	-	-	-	1.2E-05	1.9E-04	1.9E-04
Benzo(b)fluoranthene	RS296	-	-	-	5.2E-06	8.5E-05	8.5E-05
Benzo(e)pyrene	RS296	-	-	-	1.5E-05	2.5E-04	2.5E-04
Benzo(g,h,i)perylene	RS296	-	-	-	2.7E-04	4.5E-03	4.5E-03
Benzo(k)fluoranthene	RS296	-	-	-	1.7E-06	2.7E-05	2.7E-05
Chrysene	RS296	-	-	-	1.4E-05	2.2E-04	2.2E-04
Dibenz(a,h)anthracene	RS296	-	-	-	1.4E-05	2.3E-04	2.3E-04
Fluoranthene	RS296	-	-	-	4.8E-05	7.9E-04	7.9E-04
Fluorene	RS296	-	-	-	6.0E-04	1.0E-02	1.0E-02
Indeno(1,2,3-cd)pyrene	RS296	-	-	-	1.8E-05	3.0E-04	3.0E-04
Naphthalene	RS296	-	-	-	6.9E-03	-	-
Perylene	RS296	-	-	-	1.1E-05	1.8E-04	1.8E-04
Phenanthrene	RS296	-	-	-	1.2E-03	1.9E-02	1.9E-02
Pyrene	RS296	-	-	-	2.1E-04	3.4E-03	3.4E-03
C08-C11 (Gasoline Range)	RS297	1.20E+01	6.0E+00	U		-	-
C11-C14 (Kerosene Range)	RS297	1.20E+01	6.0E+00	U		-	-
C14-C20 (Diesel Range)	RS297	1.20E+01	6.0E+00	U		-	-
C20-C30 (Lubricant Oil Range)	RS297	1.20E+01	6.0E+00	U		-	-
C11-C30	RS297	-	1.8E+01	-		-	-
Benzene	RS297	-	-	-	1.9E-06	-	-
Ethylbenzene	RS297	-	-	-	1.5E-05	-	-
Toluene	RS297	-	-	-	1.1E-05	-	-
m,p-Xylene	RS297	-	-	-	1.8E-05	-	-
o-Xylene	RS297	-	-	-	6.9E-06	-	-
Xylene (total)	RS297	-	-	-	2.6E-05	-	-
2-Methylnaphthalene	RS297	-	-	-	2.8E-02	-	-
Acenaphthene	RS297	-	-	-	4.5E-04	8.0E-03	8.0E-03
Acenaphthylene	RS297	-	-	-	9.3E-05	1.7E-03	1.7E-03
Anthracene	RS297	-	-	-	2.4E-04	4.3E-03	4.3E-03
Benzo(a)anthracene	RS297	-	-	-	9.5E-06	1.7E-04	1.7E-04
Benzo(a)pyrene	RS297	-	-	-	1.2E-05	2.1E-04	2.1E-04
Benzo(b)fluoranthene	RS297	-	-	-	5.2E-06	9.3E-05	9.3E-05
Benzo(e)pyrene	RS297	-	-	-	1.5E-05	2.8E-04	2.8E-04
Benzo(g,h,i)perylene	RS297	-	-	-	2.7E-04	4.9E-03	4.9E-03
Benzo(k)fluoranthene	RS297	-	-	-	1.7E-06	3.0E-05	3.0E-05
Chrysene	RS297	-	-	-	1.4E-05	2.5E-04	2.5E-04

TPH to Petroleum Constituent Extrapolation for Soil (0-4 feet bgs) [a]
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Dibenz(a,h)anthracene	RS297	-	-	-	1.4E-05	2.5E-04	2.5E-04
Fluoranthene	RS297	-	-	-	4.8E-05	8.6E-04	8.6E-04
Fluorene	RS297	-	-	-	6.0E-04	1.1E-02	1.1E-02
Indeno(1,2,3-cd)pyrene	RS297	-	-	-	1.8E-05	3.3E-04	3.3E-04
Naphthalene	RS297	-	-	-	6.9E-03	-	-
Perylene	RS297	-	-	-	1.1E-05	1.9E-04	1.9E-04
Phenanthrene	RS297	-	-	-	1.2E-03	2.1E-02	2.1E-02
Pyrene	RS297	-	-	-	2.1E-04	3.7E-03	3.7E-03
C08-C11 (Gasoline Range)	RS298	1.20E+01	6.0E+00	U		-	-
C11-C14 (Kerosene Range)	RS298	1.20E+01	6.0E+00	U		-	-
C14-C20 (Diesel Range)	RS298	1.20E+01	6.0E+00	U		-	-
C20-C30 (Lubricant Oil Range)	RS298	1.20E+01	6.0E+00	U		-	-
C11-C30	RS298	-	1.8E+01	-		-	-
Benzene	RS298	-	-	-	1.9E-06	-	-
Ethylbenzene	RS298	-	-	-	1.5E-05	-	-
Toluene	RS298	-	-	-	1.1E-05	-	-
m,p-Xylene	RS298	-	-	-	1.8E-05	-	-
o-Xylene	RS298	-	-	-	6.9E-06	-	-
Xylene (total)	RS298	-	-	-	2.6E-05	-	-
2-Methylnaphthalene	RS298	-	-	-	2.8E-02	-	-
Acenaphthene	RS298	-	-	-	4.5E-04	8.0E-03	8.0E-03
Acenaphthylene	RS298	-	-	-	9.3E-05	1.7E-03	1.7E-03
Anthracene	RS298	-	-	-	2.4E-04	4.3E-03	4.3E-03
Benzo(a)anthracene	RS298	-	-	-	9.5E-06	1.7E-04	1.7E-04
Benzo(a)pyrene	RS298	-	-	-	1.2E-05	2.1E-04	2.1E-04
Benzo(b)fluoranthene	RS298	-	-	-	5.2E-06	9.3E-05	9.3E-05
Benzo(e)pyrene	RS298	-	-	-	1.5E-05	2.8E-04	2.8E-04
Benzo(g,h,i)perylene	RS298	-	-	-	2.7E-04	4.9E-03	4.9E-03
Benzo(k)fluoranthene	RS298	-	-	-	1.7E-06	3.0E-05	3.0E-05
Chrysene	RS298	-	-	-	1.4E-05	2.5E-04	2.5E-04
Dibenz(a,h)anthracene	RS298	-	-	-	1.4E-05	2.5E-04	2.5E-04
Fluoranthene	RS298	-	-	-	4.8E-05	8.6E-04	8.6E-04
Fluorene	RS298	-	-	-	6.0E-04	1.1E-02	1.1E-02
Indeno(1,2,3-cd)pyrene	RS298	-	-	-	1.8E-05	3.3E-04	3.3E-04
Naphthalene	RS298	-	-	-	6.9E-03	-	-
Perylene	RS298	-	-	-	1.1E-05	1.9E-04	1.9E-04
Phenanthrene	RS298	-	-	-	1.2E-03	2.1E-02	2.1E-02
Pyrene	RS298	-	-	-	2.1E-04	3.7E-03	3.7E-03
C08-C11 (Gasoline Range)	RS302	1.20E+01	6.0E+00	U		-	-
C11-C14 (Kerosene Range)	RS302	1.20E+01	6.0E+00	U		-	-
C14-C20 (Diesel Range)	RS302	1.20E+01	6.0E+00	U		-	-
C20-C30 (Lubricant Oil Range)	RS302	1.20E+01	6.0E+00	U		-	-
C11-C30	RS302	-	1.8E+01	-		-	-
Benzene	RS302	6.00E-03	3.0E-03	U	1.9E-06	-	3.0E-03
Ethylbenzene	RS302	6.00E-03	3.0E-03	U	1.5E-05	-	3.0E-03
Toluene	RS302	6.00E-03	3.0E-03	U	1.1E-05	-	3.0E-03
m,p-Xylene	RS302	6.00E-03	3.0E-03	U	1.8E-05	-	3.0E-03
o-Xylene	RS302	6.00E-03	3.0E-03	U	6.9E-06	-	3.0E-03
Xylene (total)	RS302	-	-	-	2.6E-05	-	-
2-Methylnaphthalene	RS302	-	-	-	2.8E-02	-	-
Acenaphthene	RS302	3.60E-02	1.8E-02	U	4.5E-04	8.0E-03	8.0E-03
Acenaphthylene	RS302	3.60E-02	1.8E-02	U	9.3E-05	1.7E-03	1.7E-03
Anthracene	RS302	3.60E-02	1.8E-02	U	2.4E-04	4.3E-03	4.3E-03
Benzo(a)anthracene	RS302	3.60E-02	1.8E-02	U	9.5E-06	1.7E-04	1.7E-04
Benzo(a)pyrene	RS302	3.60E-02	1.8E-02	U	1.2E-05	2.1E-04	2.1E-04
Benzo(b)fluoranthene	RS302	3.60E-02	1.8E-02	U	5.2E-06	9.3E-05	9.3E-05

TPH to Petroleum Constituent Extrapolation for Soil (0-4 feet bgs) [a]
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Benzo(e)pyrene	RS302	-	-	-	1.5E-05	2.8E-04	2.8E-04
Benzo(g,h,i)perylene	RS302	3.60E-02	1.8E-02	U	2.7E-04	4.9E-03	4.9E-03
Benzo(k)fluoranthene	RS302	3.60E-02	1.8E-02	U	1.7E-06	3.0E-05	3.0E-05
Chrysene	RS302	3.60E-02	1.8E-02	U	1.4E-05	2.5E-04	2.5E-04
Dibenz(a,h)anthracene	RS302	3.60E-02	1.8E-02	U	1.4E-05	2.5E-04	2.5E-04
Fluoranthene	RS302	3.60E-02	1.8E-02	U	4.8E-05	8.6E-04	8.6E-04
Fluorene	RS302	3.60E-02	1.8E-02	U	6.0E-04	1.1E-02	1.1E-02
Indeno(1,2,3-cd)pyrene	RS302	3.60E-02	1.8E-02	U	1.8E-05	3.3E-04	3.3E-04
Naphthalene	RS302	3.60E-02	1.8E-02	U	6.9E-03	-	1.8E-02
Perylene	RS302	-	-	-	1.1E-05	1.9E-04	1.9E-04
Phenanthrene	RS302	3.60E-02	1.8E-02	U	1.2E-03	2.1E-02	1.8E-02
Pyrene	RS302	3.60E-02	1.8E-02	U	2.1E-04	3.7E-03	3.7E-03
C08-C11 (Gasoline Range)	RS321	1.10E+01	5.5E+00	U		-	-
C11-C14 (Kerosene Range)	RS321	1.10E+01	5.5E+00	U		-	-
C14-C20 (Diesel Range)	RS321	1.10E+01	5.5E+00	U		-	-
C20-C30 (Lubricant Oil Range)	RS321	1.10E+01	5.5E+00	U		-	-
C11-C30	RS321	-	1.7E+01	-		-	-
Benzene	RS321	-	-	-	1.9E-06	-	-
Ethylbenzene	RS321	-	-	-	1.5E-05	-	-
Toluene	RS321	-	-	-	1.1E-05	-	-
m,p-Xylene	RS321	-	-	-	1.8E-05	-	-
o-Xylene	RS321	-	-	-	6.9E-06	-	-
Xylene (total)	RS321	-	-	-	2.6E-05	-	-
2-Methylnaphthalene	RS321	-	-	-	2.8E-02	-	-
Acenaphthene	RS321	-	-	-	4.5E-04	7.4E-03	7.4E-03
Acenaphthylene	RS321	-	-	-	9.3E-05	1.5E-03	1.5E-03
Anthracene	RS321	-	-	-	2.4E-04	4.0E-03	4.0E-03
Benzo(a)anthracene	RS321	-	-	-	9.5E-06	1.6E-04	1.6E-04
Benzo(a)pyrene	RS321	-	-	-	1.2E-05	1.9E-04	1.9E-04
Benzo(b)fluoranthene	RS321	-	-	-	5.2E-06	8.5E-05	8.5E-05
Benzo(e)pyrene	RS321	-	-	-	1.5E-05	2.5E-04	2.5E-04
Benzo(g,h,i)perylene	RS321	-	-	-	2.7E-04	4.5E-03	4.5E-03
Benzo(k)fluoranthene	RS321	-	-	-	1.7E-06	2.7E-05	2.7E-05
Chrysene	RS321	-	-	-	1.4E-05	2.2E-04	2.2E-04
Dibenz(a,h)anthracene	RS321	-	-	-	1.4E-05	2.3E-04	2.3E-04
Fluoranthene	RS321	-	-	-	4.8E-05	7.9E-04	7.9E-04
Fluorene	RS321	-	-	-	6.0E-04	1.0E-02	1.0E-02
Indeno(1,2,3-cd)pyrene	RS321	-	-	-	1.8E-05	3.0E-04	3.0E-04
Naphthalene	RS321	-	-	-	6.9E-03	-	-
Perylene	RS321	-	-	-	1.1E-05	1.8E-04	1.8E-04
Phenanthrene	RS321	-	-	-	1.2E-03	1.9E-02	1.9E-02
Pyrene	RS321	-	-	-	2.1E-04	3.4E-03	3.4E-03
C08-C11 (Gasoline Range)	RS581	1.40E+01	7.0E+00	UJ		-	-
C11-C14 (Kerosene Range)	RS581	1.40E+01	7.0E+00	UJ		-	-
C14-C20 (Diesel Range)	RS581	1.40E+01	7.0E+00	UJ		-	-
C20-C30 (Lubricant Oil Range)	RS581	1.40E+01	7.0E+00	UJ		-	-
C11-C30	RS581	-	2.1E+01	-		-	-
Benzene	RS581	-	-	-	1.9E-06	-	-
Ethylbenzene	RS581	-	-	-	1.5E-05	-	-
Toluene	RS581	-	-	-	1.1E-05	-	-
m,p-Xylene	RS581	-	-	-	1.8E-05	-	-
o-Xylene	RS581	-	-	-	6.9E-06	-	-
Xylene (total)	RS581	-	-	-	2.6E-05	-	-
2-Methylnaphthalene	RS581	-	-	-	2.8E-02	-	-
Acenaphthene	RS581	-	-	-	4.5E-04	9.4E-03	9.4E-03
Acenaphthylene	RS581	-	-	-	9.3E-05	1.9E-03	1.9E-03

TPH to Petroleum Constituent Extrapolation for Soil (0-4 feet bgs) [a]
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Anthracene	RS581	-	-	-	2.4E-04	5.1E-03	5.1E-03
Benzo(a)anthracene	RS581	-	-	-	9.5E-06	2.0E-04	2.0E-04
Benzo(a)pyrene	RS581	-	-	-	1.2E-05	2.4E-04	2.4E-04
Benzo(b)fluoranthene	RS581	-	-	-	5.2E-06	1.1E-04	1.1E-04
Benzo(e)pyrene	RS581	-	-	-	1.5E-05	3.2E-04	3.2E-04
Benzo(g,h,i)perylene	RS581	-	-	-	2.7E-04	5.8E-03	5.8E-03
Benzo(k)fluoranthene	RS581	-	-	-	1.7E-06	3.5E-05	3.5E-05
Chrysene	RS581	-	-	-	1.4E-05	2.9E-04	2.9E-04
Dibenz(a,h)anthracene	RS581	-	-	-	1.4E-05	2.9E-04	2.9E-04
Fluoranthene	RS581	-	-	-	4.8E-05	1.0E-03	1.0E-03
Fluorene	RS581	-	-	-	6.0E-04	1.3E-02	1.3E-02
Indeno(1,2,3-cd)pyrene	RS581	-	-	-	1.8E-05	3.9E-04	3.9E-04
Naphthalene	RS581	-	-	-	6.9E-03	-	-
Perylene	RS581	-	-	-	1.1E-05	2.3E-04	2.3E-04
Phenanthrene	RS581	-	-	-	1.2E-03	2.5E-02	2.5E-02
Pyrene	RS581	-	-	-	2.1E-04	4.3E-03	4.3E-03
C08-C11 (Gasoline Range)	RS668	1.30E+01	6.5E+00	UJ		-	-
C11-C14 (Kerosene Range)	RS668	1.30E+01	6.5E+00	UJ		-	-
C14-C20 (Diesel Range)	RS668	1.30E+01	6.5E+00	UJ		-	-
C20-C30 (Lubricant Oil Range)	RS668	1.30E+01	6.5E+00	UJ		-	-
C11-C30	RS668	-	2.0E+01	-		-	-
Benzene	RS668	-	-	-	1.9E-06	-	-
Ethylbenzene	RS668	-	-	-	1.5E-05	-	-
Toluene	RS668	-	-	-	1.1E-05	-	-
m,p-Xylene	RS668	-	-	-	1.8E-05	-	-
o-Xylene	RS668	-	-	-	6.9E-06	-	-
Xylene (total)	RS668	-	-	-	2.6E-05	-	-
2-Methylnaphthalene	RS668	-	-	-	2.8E-02	-	-
Acenaphthene	RS668	-	-	-	4.5E-04	8.7E-03	8.7E-03
Acenaphthylene	RS668	-	-	-	9.3E-05	1.8E-03	1.8E-03
Anthracene	RS668	-	-	-	2.4E-04	4.7E-03	4.7E-03
Benzo(a)anthracene	RS668	-	-	-	9.5E-06	1.8E-04	1.8E-04
Benzo(a)pyrene	RS668	-	-	-	1.2E-05	2.3E-04	2.3E-04
Benzo(b)fluoranthene	RS668	-	-	-	5.2E-06	1.0E-04	1.0E-04
Benzo(e)pyrene	RS668	-	-	-	1.5E-05	3.0E-04	3.0E-04
Benzo(g,h,i)perylene	RS668	-	-	-	2.7E-04	5.4E-03	5.4E-03
Benzo(k)fluoranthene	RS668	-	-	-	1.7E-06	3.2E-05	3.2E-05
Chrysene	RS668	-	-	-	1.4E-05	2.7E-04	2.7E-04
Dibenz(a,h)anthracene	RS668	-	-	-	1.4E-05	2.7E-04	2.7E-04
Fluoranthene	RS668	-	-	-	4.8E-05	9.3E-04	9.3E-04
Fluorene	RS668	-	-	-	6.0E-04	1.2E-02	1.2E-02
Indeno(1,2,3-cd)pyrene	RS668	-	-	-	1.8E-05	3.6E-04	3.6E-04
Naphthalene	RS668	-	-	-	6.9E-03	-	-
Perylene	RS668	-	-	-	1.1E-05	2.1E-04	2.1E-04
Phenanthrene	RS668	-	-	-	1.2E-03	2.3E-02	2.3E-02
Pyrene	RS668	-	-	-	2.1E-04	4.0E-03	4.0E-03
C08-C11 (Gasoline Range)	RS669	1.20E+01	6.0E+00	UJ		-	-
C11-C14 (Kerosene Range)	RS669	1.20E+01	6.0E+00	UJ		-	-
C14-C20 (Diesel Range)	RS669	1.20E+01	6.0E+00	UJ		-	-
C20-C30 (Lubricant Oil Range)	RS669	1.20E+01	6.0E+00	UJ		-	-
C11-C30	RS669	-	1.8E+01	-		-	-
Benzene	RS669	-	-	-	1.9E-06	-	-
Ethylbenzene	RS669	-	-	-	1.5E-05	-	-
Toluene	RS669	-	-	-	1.1E-05	-	-
m,p-Xylene	RS669	-	-	-	1.8E-05	-	-
o-Xylene	RS669	-	-	-	6.9E-06	-	-

TPH to Petroleum Constituent Extrapolation for Soil (0-4 feet bgs) [a]
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Xylene (total)	RS669	-	-	-	2.6E-05	-	-
2-Methylnaphthalene	RS669	-	-	-	2.8E-02	-	-
Acenaphthene	RS669	-	-	-	4.5E-04	8.0E-03	8.0E-03
Acenaphthylene	RS669	-	-	-	9.3E-05	1.7E-03	1.7E-03
Anthracene	RS669	-	-	-	2.4E-04	4.3E-03	4.3E-03
Benzo(a)anthracene	RS669	-	-	-	9.5E-06	1.7E-04	1.7E-04
Benzo(a)pyrene	RS669	-	-	-	1.2E-05	2.1E-04	2.1E-04
Benzo(b)fluoranthene	RS669	-	-	-	5.2E-06	9.3E-05	9.3E-05
Benzo(e)pyrene	RS669	-	-	-	1.5E-05	2.8E-04	2.8E-04
Benzo(g,h,i)perylene	RS669	-	-	-	2.7E-04	4.9E-03	4.9E-03
Benzo(k)fluoranthene	RS669	-	-	-	1.7E-06	3.0E-05	3.0E-05
Chrysene	RS669	-	-	-	1.4E-05	2.5E-04	2.5E-04
Dibenz(a,h)anthracene	RS669	-	-	-	1.4E-05	2.5E-04	2.5E-04
Fluoranthene	RS669	-	-	-	4.8E-05	8.6E-04	8.6E-04
Fluorene	RS669	-	-	-	6.0E-04	1.1E-02	1.1E-02
Indeno(1,2,3-cd)pyrene	RS669	-	-	-	1.8E-05	3.3E-04	3.3E-04
Naphthalene	RS669	-	-	-	6.9E-03	-	-
Perylene	RS669	-	-	-	1.1E-05	1.9E-04	1.9E-04
Phenanthrene	RS669	-	-	-	1.2E-03	2.1E-02	2.1E-02
Pyrene	RS669	-	-	-	2.1E-04	3.7E-03	3.7E-03
C08-C11 (Gasoline Range)	RS670	1.10E+01	5.5E+00	UJ		-	-
C11-C14 (Kerosene Range)	RS670	1.10E+01	5.5E+00	UJ		-	-
C14-C20 (Diesel Range)	RS670	1.10E+01	5.5E+00	UJ		-	-
C20-C30 (Lubricant Oil Range)	RS670	1.10E+01	5.5E+00	UJ		-	-
C11-C30	RS670	-	1.7E+01	-		-	-
Benzene	RS670	-	-	-	1.9E-06	-	-
Ethylbenzene	RS670	-	-	-	1.5E-05	-	-
Toluene	RS670	-	-	-	1.1E-05	-	-
m,p-Xylene	RS670	-	-	-	1.8E-05	-	-
o-Xylene	RS670	-	-	-	6.9E-06	-	-
Xylene (total)	RS670	-	-	-	2.6E-05	-	-
2-Methylnaphthalene	RS670	-	-	-	2.8E-02	-	-
Acenaphthene	RS670	-	-	-	4.5E-04	7.4E-03	7.4E-03
Acenaphthylene	RS670	-	-	-	9.3E-05	1.5E-03	1.5E-03
Anthracene	RS670	-	-	-	2.4E-04	4.0E-03	4.0E-03
Benzo(a)anthracene	RS670	-	-	-	9.5E-06	1.6E-04	1.6E-04
Benzo(a)pyrene	RS670	-	-	-	1.2E-05	1.9E-04	1.9E-04
Benzo(b)fluoranthene	RS670	-	-	-	5.2E-06	8.5E-05	8.5E-05
Benzo(e)pyrene	RS670	-	-	-	1.5E-05	2.5E-04	2.5E-04
Benzo(g,h,i)perylene	RS670	-	-	-	2.7E-04	4.5E-03	4.5E-03
Benzo(k)fluoranthene	RS670	-	-	-	1.7E-06	2.7E-05	2.7E-05
Chrysene	RS670	-	-	-	1.4E-05	2.2E-04	2.2E-04
Dibenz(a,h)anthracene	RS670	-	-	-	1.4E-05	2.3E-04	2.3E-04
Fluoranthene	RS670	-	-	-	4.8E-05	7.9E-04	7.9E-04
Fluorene	RS670	-	-	-	6.0E-04	1.0E-02	1.0E-02
Indeno(1,2,3-cd)pyrene	RS670	-	-	-	1.8E-05	3.0E-04	3.0E-04
Naphthalene	RS670	-	-	-	6.9E-03	-	-
Perylene	RS670	-	-	-	1.1E-05	1.8E-04	1.8E-04
Phenanthrene	RS670	-	-	-	1.2E-03	1.9E-02	1.9E-02
Pyrene	RS670	-	-	-	2.1E-04	3.4E-03	3.4E-03
C08-C11 (Gasoline Range)	RS671DL	1.09E+02	5.5E+01	UJ		-	-
C11-C14 (Kerosene Range)	RS671DL	1.09E+02	5.5E+01	UJ		-	-
C14-C20 (Diesel Range)	RS671DL	1.10E+03	1.1E+03	J		-	-
C20-C30 (Lubricant Oil Range)	RS671DL	8.30E+03	8.3E+03	J		-	-
C11-C30	RS671DL	-	9.5E+03	-		-	-
Benzene	RS671DL	-	-	-	1.9E-06	-	-

TPH to Petroleum Constituent Extrapolation for Soil (0-4 feet bgs) [a]
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Ethylbenzene	RS671DL	-	-	-	1.5E-05	-	-
Toluene	RS671DL	-	-	-	1.1E-05	-	-
m,p-Xylene	RS671DL	-	-	-	1.8E-05	-	-
o-Xylene	RS671DL	-	-	-	6.9E-06	-	-
Xylene (total)	RS671DL	-	-	-	2.6E-05	-	-
2-Methylnaphthalene	RS671DL	-	-	-	2.8E-02	-	-
Acenaphthene	RS671DL	-	-	-	4.5E-04	4.2E+00	4.2E+00
Acenaphthylene	RS671DL	-	-	-	9.3E-05	8.8E-01	8.8E-01
Anthracene	RS671DL	-	-	-	2.4E-04	2.3E+00	2.3E+00
Benzo(a)anthracene	RS671DL	-	-	-	9.5E-06	8.9E-02	8.9E-02
Benzo(a)pyrene	RS671DL	-	-	-	1.2E-05	1.1E-01	1.1E-01
Benzo(b)fluoranthene	RS671DL	-	-	-	5.2E-06	4.9E-02	4.9E-02
Benzo(e)pyrene	RS671DL	-	-	-	1.5E-05	1.5E-01	1.5E-01
Benzo(g,h,i)perylene	RS671DL	-	-	-	2.7E-04	2.6E+00	2.6E+00
Benzo(k)fluoranthene	RS671DL	-	-	-	1.7E-06	1.6E-02	1.6E-02
Chrysene	RS671DL	-	-	-	1.4E-05	1.3E-01	1.3E-01
Dibenz(a,h)anthracene	RS671DL	-	-	-	1.4E-05	1.3E-01	1.3E-01
Fluoranthene	RS671DL	-	-	-	4.8E-05	4.5E-01	4.5E-01
Fluorene	RS671DL	-	-	-	6.0E-04	5.7E+00	5.7E+00
Indeno(1,2,3-cd)pyrene	RS671DL	-	-	-	1.8E-05	1.7E-01	1.7E-01
Naphthalene	RS671DL	-	-	-	6.9E-03	-	-
Perylene	RS671DL	-	-	-	1.1E-05	1.0E-01	1.0E-01
Phenanthrene	RS671DL	-	-	-	1.2E-03	1.1E+01	1.1E+01
Pyrene	RS671DL	-	-	-	2.1E-04	1.9E+00	1.9E+00
C08-C11 (Gasoline Range)	RS878	1.00E+01	5.0E+00	UJ		-	-
C11-C14 (Kerosene Range)	RS878	1.00E+01	5.0E+00	UJ		-	-
C14-C20 (Diesel Range)	RS878	1.00E+01	5.0E+00	UJ		-	-
C20-C30 (Lubricant Oil Range)	RS878	1.00E+01	5.0E+00	UJ		-	-
C11-C30	RS878	-	1.5E+01	-		-	-
Benzene	RS878	-	-	-	1.9E-06	-	-
Ethylbenzene	RS878	-	-	-	1.5E-05	-	-
Toluene	RS878	-	-	-	1.1E-05	-	-
m,p-Xylene	RS878	-	-	-	1.8E-05	-	-
o-Xylene	RS878	-	-	-	6.9E-06	-	-
Xylene (total)	RS878	-	-	-	2.6E-05	-	-
2-Methylnaphthalene	RS878	-	-	-	2.8E-02	-	-
Acenaphthene	RS878	3.10E-02	1.6E-02	U	4.5E-04	6.7E-03	6.7E-03
Acenaphthylene	RS878	3.10E-02	1.6E-02	U	9.3E-05	1.4E-03	1.4E-03
Anthracene	RS878	3.10E-02	1.6E-02	U	2.4E-04	3.6E-03	3.6E-03
Benzo(a)anthracene	RS878	3.10E-02	1.6E-02	U	9.5E-06	1.4E-04	1.4E-04
Benzo(a)pyrene	RS878	3.10E-02	1.6E-02	U	1.2E-05	1.7E-04	1.7E-04
Benzo(b)fluoranthene	RS878	3.10E-02	1.6E-02	U	5.2E-06	7.7E-05	7.7E-05
Benzo(e)pyrene	RS878	-	-	-	1.5E-05	2.3E-04	2.3E-04
Benzo(g,h,i)perylene	RS878	3.10E-02	1.6E-02	U	2.7E-04	4.1E-03	4.1E-03
Benzo(k)fluoranthene	RS878	3.10E-02	1.6E-02	U	1.7E-06	2.5E-05	2.5E-05
Chrysene	RS878	3.10E-02	1.6E-02	U	1.4E-05	2.0E-04	2.0E-04
Dibenz(a,h)anthracene	RS878	3.10E-02	1.6E-02	U	1.4E-05	2.1E-04	2.1E-04
Fluoranthene	RS878	3.10E-02	1.6E-02	U	4.8E-05	7.2E-04	7.2E-04
Fluorene	RS878	3.10E-02	1.6E-02	U	6.0E-04	9.1E-03	9.1E-03
Indeno(1,2,3-cd)pyrene	RS878	3.10E-02	1.6E-02	U	1.8E-05	2.8E-04	2.8E-04
Naphthalene	RS878	3.10E-02	1.6E-02	U	6.9E-03	-	1.6E-02
Perylene	RS878	-	-	-	1.1E-05	1.6E-04	1.6E-04
Phenanthrene	RS878	3.10E-02	1.6E-02	U	1.2E-03	1.8E-02	1.6E-02
Pyrene	RS878	3.10E-02	1.6E-02	U	2.1E-04	3.1E-03	3.1E-03
C08-C11 (Gasoline Range)	RS879	1.00E+01	5.0E+00	UJ		-	-
C11-C14 (Kerosene Range)	RS879	1.00E+01	5.0E+00	UJ		-	-

TPH to Petroleum Constituent Extrapolation for Soil (0-4 feet bgs) [a]
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
C14-C20 (Diesel Range)	RS879	1.00E+01	5.0E+00	UJ		-	-
C20-C30 (Lubricant Oil Range)	RS879	1.00E+01	5.0E+00	UJ		-	-
C11-C30	RS879	-	1.5E+01	-		-	-
Benzene	RS879	1.00E-02	5.0E-03	U	1.9E-06	-	5.0E-03
Ethylbenzene	RS879	1.00E-02	5.0E-03	U	1.5E-05	-	5.0E-03
Toluene	RS879	1.00E-02	5.0E-03	U	1.1E-05	-	5.0E-03
m,p-Xylene	RS879	1.00E-02	5.0E-03	U	1.8E-05	-	5.0E-03
o-Xylene	RS879	1.00E-02	5.0E-03	U	6.9E-06	-	5.0E-03
Xylene (total)	RS879	-	-	-	2.6E-05	-	-
2-Methylnaphthalene	RS879	-	-	-	2.8E-02	-	-
Acenaphthene	RS879	3.10E-02	1.6E-02	U	4.5E-04	6.7E-03	6.7E-03
Acenaphthylene	RS879	3.10E-02	1.6E-02	U	9.3E-05	1.4E-03	1.4E-03
Anthracene	RS879	3.10E-02	1.6E-02	U	2.4E-04	3.6E-03	3.6E-03
Benzo(a)anthracene	RS879	3.10E-02	1.6E-02	U	9.5E-06	1.4E-04	1.4E-04
Benzo(a)pyrene	RS879	3.10E-02	1.6E-02	U	1.2E-05	1.7E-04	1.7E-04
Benzo(b)fluoranthene	RS879	3.10E-02	1.6E-02	U	5.2E-06	7.7E-05	7.7E-05
Benzo(e)pyrene	RS879	-	-	-	1.5E-05	2.3E-04	2.3E-04
Benzo(g,h,i)perylene	RS879	3.10E-02	1.6E-02	U	2.7E-04	4.1E-03	4.1E-03
Benzo(k)fluoranthene	RS879	3.10E-02	1.6E-02	U	1.7E-06	2.5E-05	2.5E-05
Chrysene	RS879	3.10E-02	1.6E-02	U	1.4E-05	2.0E-04	2.0E-04
Dibenz(a,h)anthracene	RS879	3.10E-02	1.6E-02	U	1.4E-05	2.1E-04	2.1E-04
Fluoranthene	RS879	3.10E-02	1.6E-02	U	4.8E-05	7.2E-04	7.2E-04
Fluorene	RS879	3.10E-02	1.6E-02	U	6.0E-04	9.1E-03	9.1E-03
Indeno(1,2,3-cd)pyrene	RS879	3.10E-02	1.6E-02	U	1.8E-05	2.8E-04	2.8E-04
Naphthalene	RS879	3.10E-02	1.6E-02	U	6.9E-03	-	1.6E-02
Perylene	RS879	-	-	-	1.1E-05	1.6E-04	1.6E-04
Phenanthrene	RS879	3.10E-02	1.6E-02	U	1.2E-03	1.8E-02	1.6E-02
Pyrene	RS879	3.10E-02	1.6E-02	U	2.1E-04	3.1E-03	3.1E-03
C08-C11 (Gasoline Range)	RS880	1.10E+01	5.5E+00	UJ		-	-
C11-C14 (Kerosene Range)	RS880	1.10E+01	5.5E+00	UJ		-	-
C14-C20 (Diesel Range)	RS880	1.10E+01	5.5E+00	UJ		-	-
C20-C30 (Lubricant Oil Range)	RS880	1.10E+01	5.5E+00	UJ		-	-
C11-C30	RS880	-	1.7E+01	-		-	-
Benzene	RS880	6.00E-03	3.0E-03	U	1.9E-06	-	3.0E-03
Ethylbenzene	RS880	6.00E-03	3.0E-03	U	1.5E-05	-	3.0E-03
Toluene	RS880	6.00E-03	3.0E-03	U	1.1E-05	-	3.0E-03
m,p-Xylene	RS880	6.00E-03	3.0E-03	U	1.8E-05	-	3.0E-03
o-Xylene	RS880	6.00E-03	3.0E-03	U	6.9E-06	-	3.0E-03
Xylene (total)	RS880	-	-	-	2.6E-05	-	-
2-Methylnaphthalene	RS880	-	-	-	2.8E-02	-	-
Acenaphthene	RS880	3.40E-02	1.7E-02	U	4.5E-04	7.4E-03	7.4E-03
Acenaphthylene	RS880	3.40E-02	1.7E-02	U	9.3E-05	1.5E-03	1.5E-03
Anthracene	RS880	3.40E-02	1.7E-02	U	2.4E-04	4.0E-03	4.0E-03
Benzo(a)anthracene	RS880	3.40E-02	1.7E-02	U	9.5E-06	1.6E-04	1.6E-04
Benzo(a)pyrene	RS880	3.40E-02	1.7E-02	U	1.2E-05	1.9E-04	1.9E-04
Benzo(b)fluoranthene	RS880	3.40E-02	1.7E-02	U	5.2E-06	8.5E-05	8.5E-05
Benzo(e)pyrene	RS880	-	-	-	1.5E-05	2.5E-04	2.5E-04
Benzo(g,h,i)perylene	RS880	3.40E-02	1.7E-02	U	2.7E-04	4.5E-03	4.5E-03
Benzo(k)fluoranthene	RS880	3.40E-02	1.7E-02	U	1.7E-06	2.7E-05	2.7E-05
Chrysene	RS880	3.40E-02	1.7E-02	U	1.4E-05	2.2E-04	2.2E-04
Dibenz(a,h)anthracene	RS880	3.40E-02	1.7E-02	U	1.4E-05	2.3E-04	2.3E-04
Fluoranthene	RS880	3.40E-02	1.7E-02	U	4.8E-05	7.9E-04	7.9E-04
Fluorene	RS880	3.40E-02	1.7E-02	U	6.0E-04	1.0E-02	1.0E-02
Indeno(1,2,3-cd)pyrene	RS880	3.40E-02	1.7E-02	U	1.8E-05	3.0E-04	3.0E-04
Naphthalene	RS880	3.40E-02	1.7E-02	U	6.9E-03	-	1.7E-02
Perylene	RS880	-	-	-	1.1E-05	1.8E-04	1.8E-04

TPH to Petroleum Constituent Extrapolation for Soil (0-4 feet bgs) [a]
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Phenanthrene	RS880	3.40E-02	1.7E-02	U	1.2E-03	1.9E-02	1.7E-02
Pyrene	RS880	3.40E-02	1.7E-02	U	2.1E-04	3.4E-03	3.4E-03
C08-C11 (Gasoline Range)	RS881	5.30E+01	2.7E+01	UJ		-	-
C11-C14 (Kerosene Range)	RS881	5.30E+01	2.7E+01	UJ		-	-
C14-C20 (Diesel Range)	RS881	5.30E+01	2.7E+01	UJ		-	-
C20-C30 (Lubricant Oil Range)	RS881	9.50E+01	9.5E+01			-	-
C11-C30	RS881	-	1.5E+02	-		-	-
Benzene	RS881	-	-	-	1.9E-06	-	-
Ethylbenzene	RS881	-	-	-	1.5E-05	-	-
Toluene	RS881	-	-	-	1.1E-05	-	-
m,p-Xylene	RS881	-	-	-	1.8E-05	-	-
o-Xylene	RS881	-	-	-	6.9E-06	-	-
Xylene (total)	RS881	-	-	-	2.6E-05	-	-
2-Methylnaphthalene	RS881	-	-	-	2.8E-02	-	-
Acenaphthene	RS881	-	-	-	4.5E-04	6.6E-02	6.6E-02
Acenaphthylene	RS881	-	-	-	9.3E-05	1.4E-02	1.4E-02
Anthracene	RS881	-	-	-	2.4E-04	3.6E-02	3.6E-02
Benzo(a)anthracene	RS881	-	-	-	9.5E-06	1.4E-03	1.4E-03
Benzo(a)pyrene	RS881	-	-	-	1.2E-05	1.7E-03	1.7E-03
Benzo(b)fluoranthene	RS881	-	-	-	5.2E-06	7.6E-04	7.6E-04
Benzo(e)pyrene	RS881	-	-	-	1.5E-05	2.3E-03	2.3E-03
Benzo(g,h,i)perylene	RS881	-	-	-	2.7E-04	4.1E-02	4.1E-02
Benzo(k)fluoranthene	RS881	-	-	-	1.7E-06	2.5E-04	2.5E-04
Chrysene	RS881	-	-	-	1.4E-05	2.0E-03	2.0E-03
Dibenz(a,h)anthracene	RS881	-	-	-	1.4E-05	2.0E-03	2.0E-03
Fluoranthene	RS881	-	-	-	4.8E-05	7.1E-03	7.1E-03
Fluorene	RS881	-	-	-	6.0E-04	8.9E-02	8.9E-02
Indeno(1,2,3-cd)pyrene	RS881	-	-	-	1.8E-05	2.7E-03	2.7E-03
Naphthalene	RS881	-	-	-	6.9E-03	-	-
Perylene	RS881	-	-	-	1.1E-05	1.6E-03	1.6E-03
Phenanthrene	RS881	-	-	-	1.2E-03	1.7E-01	1.7E-01
Pyrene	RS881	-	-	-	2.1E-04	3.0E-02	3.0E-02
C08-C11 (Gasoline Range)	MJ683	1.10E+01	5.5E+00	U		-	-
C11-C14 (Kerosene Range)	MJ683	1.10E+01	5.5E+00	U		-	-
C14-C20 (Diesel Range)	MJ683	8.80E+00	8.8E+00	J		-	-
C20-C30 (Lubricant Oil Range)	MJ683	5.20E+01	5.2E+01			-	-
C11-C30	MJ683	-	6.6E+01	-		-	-
Benzene	MJ683	-	-	-	1.9E-06	-	-
Ethylbenzene	MJ683	-	-	-	1.5E-05	-	-
Toluene	MJ683	-	-	-	1.1E-05	-	-
m,p-Xylene	MJ683	-	-	-	1.8E-05	-	-
o-Xylene	MJ683	-	-	-	6.9E-06	-	-
Xylene (total)	MJ683	-	-	-	2.6E-05	-	-
2-Methylnaphthalene	MJ683	4.00E-01	4.0E-01		2.8E-02	-	4.0E-01
Acenaphthene	MJ683	2.40E-02	1.2E-02	U	4.5E-04	3.0E-02	1.2E-02
Acenaphthylene	MJ683	2.40E-02	1.2E-02	U	9.3E-05	6.1E-03	6.1E-03
Anthracene	MJ683	3.80E-02	3.8E-02		2.4E-04	1.6E-02	3.8E-02
Benzo(a)anthracene	MJ683	2.70E-01	2.7E-01		9.5E-06	6.3E-04	2.7E-01
Benzo(a)pyrene	MJ683	2.60E-01	2.6E-01		1.2E-05	7.7E-04	2.6E-01
Benzo(b)fluoranthene	MJ683	4.20E-01	4.2E-01		5.2E-06	3.4E-04	4.2E-01
Benzo(e)pyrene	MJ683	-	-	-	1.5E-05	1.0E-03	1.0E-03
Benzo(g,h,i)perylene	MJ683	7.30E-02	7.3E-02		2.7E-04	1.8E-02	7.3E-02
Benzo(k)fluoranthene	MJ683	3.00E-01	3.0E-01		1.7E-06	1.1E-04	3.0E-01
Chrysene	MJ683	4.40E-01	4.4E-01		1.4E-05	9.0E-04	4.4E-01
Dibenz(a,h)anthracene	MJ683	2.50E-02	2.5E-02		1.4E-05	9.1E-04	2.5E-02
Fluoranthene	MJ683	5.80E-01	5.8E-01		4.8E-05	3.2E-03	5.8E-01

TPH to Petroleum Constituent Extrapolation for Soil (0-4 feet bgs) [a]
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Fluorene	MJ683	2.40E-02	1.2E-02	U	6.0E-04	4.0E-02	1.2E-02
Indeno(1,2,3-cd)pyrene	MJ683	1.00E-01	1.0E-01		1.8E-05	1.2E-03	1.0E-01
Naphthalene	MJ683	3.10E-02	3.1E-02		6.9E-03	-	3.1E-02
Perylene	MJ683	-	-	-	1.1E-05	7.1E-04	7.1E-04
Phenanthrene	MJ683	2.50E-01	2.5E-01		1.2E-03	7.7E-02	2.5E-01
Pyrene	MJ683	6.00E-01	6.0E-01		2.1E-04	1.4E-02	6.0E-01
C08-C11 (Gasoline Range)	MJ704	5.20E+00	2.6E+00	U		-	-
C11-C14 (Kerosene Range)	MJ704	5.20E+00	2.6E+00	U		-	-
C14-C20 (Diesel Range)	MJ704	5.20E+00	2.6E+00	U		-	-
C20-C30 (Lubricant Oil Range)	MJ704	5.20E+00	2.6E+00	U		-	-
C11-C30	MJ704	-	7.8E+00	-		-	-
Benzene	MJ704	-	-	-	1.9E-06	-	-
Ethylbenzene	MJ704	-	-	-	1.5E-05	-	-
Toluene	MJ704	-	-	-	1.1E-05	-	-
m,p-Xylene	MJ704	-	-	-	1.8E-05	-	-
o-Xylene	MJ704	-	-	-	6.9E-06	-	-
Xylene (total)	MJ704	-	-	-	2.6E-05	-	-
2-Methylnaphthalene	MJ704	2.10E-02	1.1E-02	U	2.8E-02	-	1.1E-02
Acenaphthene	MJ704	2.10E-02	1.1E-02	U	4.5E-04	3.5E-03	3.5E-03
Acenaphthylene	MJ704	2.10E-02	1.1E-02	U	9.3E-05	7.2E-04	7.2E-04
Anthracene	MJ704	3.90E-02	3.9E-02		2.4E-04	1.9E-03	3.9E-02
Benzo(a)anthracene	MJ704	3.30E-01	3.3E-01		9.5E-06	7.4E-05	3.3E-01
Benzo(a)pyrene	MJ704	1.90E-01	1.9E-01		1.2E-05	9.1E-05	1.9E-01
Benzo(b)fluoranthene	MJ704	2.50E-01	2.5E-01		5.2E-06	4.0E-05	2.5E-01
Benzo(e)pyrene	MJ704	-	-	-	1.5E-05	1.2E-04	1.2E-04
Benzo(g,h,i)perylene	MJ704	8.70E-02	8.7E-02		2.7E-04	2.1E-03	8.7E-02
Benzo(k)fluoranthene	MJ704	2.10E-01	2.1E-01		1.7E-06	1.3E-05	2.1E-01
Chrysene	MJ704	4.00E-01	4.0E-01		1.4E-05	1.1E-04	4.0E-01
Dibenz(a,h)anthracene	MJ704	3.30E-02	3.3E-02		1.4E-05	1.1E-04	3.3E-02
Fluoranthene	MJ704	5.90E-01	5.9E-01		4.8E-05	3.7E-04	5.9E-01
Fluorene	MJ704	2.10E-02	1.1E-02	U	6.0E-04	4.7E-03	4.7E-03
Indeno(1,2,3-cd)pyrene	MJ704	1.10E-01	1.1E-01		1.8E-05	1.4E-04	1.1E-01
Naphthalene	MJ704	2.10E-02	1.1E-02	U	6.9E-03	-	1.1E-02
Perylene	MJ704	-	-	-	1.1E-05	8.4E-05	8.4E-05
Phenanthrene	MJ704	3.30E-01	3.3E-01		1.2E-03	9.1E-03	3.3E-01
Pyrene	MJ704	4.80E-01	4.8E-01		2.1E-04	1.6E-03	4.8E-01
C08-C11 (Gasoline Range)	MJ705	5.40E+00	2.7E+00	U		-	-
C11-C14 (Kerosene Range)	MJ705	5.40E+00	2.7E+00	U		-	-
C14-C20 (Diesel Range)	MJ705	5.40E+00	2.7E+00	U		-	-
C20-C30 (Lubricant Oil Range)	MJ705	5.40E+00	2.7E+00	U		-	-
C11-C30	MJ705	-	8.1E+00	-		-	-
Benzene	MJ705	-	-	-	1.9E-06	-	-
Ethylbenzene	MJ705	-	-	-	1.5E-05	-	-
Toluene	MJ705	-	-	-	1.1E-05	-	-
m,p-Xylene	MJ705	-	-	-	1.8E-05	-	-
o-Xylene	MJ705	-	-	-	6.9E-06	-	-
Xylene (total)	MJ705	-	-	-	2.6E-05	-	-
2-Methylnaphthalene	MJ705	2.20E-02	1.1E-02	U	2.8E-02	-	1.1E-02
Acenaphthene	MJ705	2.20E-02	1.1E-02	U	4.5E-04	3.6E-03	3.6E-03
Acenaphthylene	MJ705	2.20E-02	1.1E-02	U	9.3E-05	7.5E-04	7.5E-04
Anthracene	MJ705	2.20E-02	1.1E-02	U	2.4E-04	2.0E-03	2.0E-03
Benzo(a)anthracene	MJ705	2.20E-02	1.1E-02	U	9.5E-06	7.7E-05	7.7E-05
Benzo(a)pyrene	MJ705	2.20E-02	1.1E-02	U	1.2E-05	9.4E-05	9.4E-05
Benzo(b)fluoranthene	MJ705	2.20E-02	1.1E-02	U	5.2E-06	4.2E-05	4.2E-05
Benzo(e)pyrene	MJ705	-	-	-	1.5E-05	1.2E-04	1.2E-04
Benzo(g,h,i)perylene	MJ705	2.20E-02	1.1E-02	U	2.7E-04	2.2E-03	2.2E-03

TPH to Petroleum Constituent Extrapolation for Soil (0-4 feet bgs) [a]
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Benzo(k)fluoranthene	MJ705	2.20E-02	1.1E-02	U	1.7E-06	1.3E-05	1.3E-05
Chrysene	MJ705	2.20E-02	1.1E-02	U	1.4E-05	1.1E-04	1.1E-04
Dibenz(a,h)anthracene	MJ705	2.20E-02	1.1E-02	U	1.4E-05	1.1E-04	1.1E-04
Fluoranthene	MJ705	2.20E-02	1.1E-02	U	4.8E-05	3.9E-04	3.9E-04
Fluorene	MJ705	2.20E-02	1.1E-02	U	6.0E-04	4.9E-03	4.9E-03
Indeno(1,2,3-cd)pyrene	MJ705	2.20E-02	1.1E-02	U	1.8E-05	1.5E-04	1.5E-04
Naphthalene	MJ705	2.20E-02	1.1E-02	U	6.9E-03	-	1.1E-02
Perylene	MJ705	-	-	-	1.1E-05	8.7E-05	8.7E-05
Phenanthrene	MJ705	2.20E-02	1.1E-02	U	1.2E-03	9.5E-03	9.5E-03
Pyrene	MJ705	2.20E-02	1.1E-02	U	2.1E-04	1.7E-03	1.7E-03
C08-C11 (Gasoline Range)	MJ707	1.00E+01	5.0E+00	U		-	-
C11-C14 (Kerosene Range)	MJ707	1.00E+01	5.0E+00	U		-	-
C14-C20 (Diesel Range)	MJ707	1.00E+01	5.0E+00	U		-	-
C20-C30 (Lubricant Oil Range)	MJ707	1.00E+01	5.0E+00	U		-	-
C11-C30	MJ707	-	1.5E+01	-		-	-
Benzene	MJ707	-	-	-	1.9E-06	-	-
Ethylbenzene	MJ707	-	-	-	1.5E-05	-	-
Toluene	MJ707	-	-	-	1.1E-05	-	-
m,p-Xylene	MJ707	-	-	-	1.8E-05	-	-
o-Xylene	MJ707	-	-	-	6.9E-06	-	-
Xylene (total)	MJ707	-	-	-	2.6E-05	-	-
2-Methylnaphthalene	MJ707	2.00E-02	1.0E-02	U	2.8E-02	-	1.0E-02
Acenaphthene	MJ707	2.00E-02	1.0E-02	U	4.5E-04	6.7E-03	6.7E-03
Acenaphthylene	MJ707	2.00E-02	1.0E-02	U	9.3E-05	1.4E-03	1.4E-03
Anthracene	MJ707	2.00E-02	1.0E-02	U	2.4E-04	3.6E-03	3.6E-03
Benzo(a)anthracene	MJ707	2.00E-02	1.0E-02	U	9.5E-06	1.4E-04	1.4E-04
Benzo(a)pyrene	MJ707	2.00E-02	1.0E-02	U	1.2E-05	1.7E-04	1.7E-04
Benzo(b)fluoranthene	MJ707	2.00E-02	1.0E-02	U	5.2E-06	7.7E-05	7.7E-05
Benzo(e)pyrene	MJ707	-	-	-	1.5E-05	2.3E-04	2.3E-04
Benzo(g,h,i)perylene	MJ707	2.00E-02	1.0E-02	U	2.7E-04	4.1E-03	4.1E-03
Benzo(k)fluoranthene	MJ707	2.00E-02	1.0E-02	U	1.7E-06	2.5E-05	2.5E-05
Chrysene	MJ707	2.00E-02	1.0E-02	U	1.4E-05	2.0E-04	2.0E-04
Dibenz(a,h)anthracene	MJ707	2.00E-02	1.0E-02	U	1.4E-05	2.1E-04	2.1E-04
Fluoranthene	MJ707	2.00E-02	1.0E-02	U	4.8E-05	7.2E-04	7.2E-04
Fluorene	MJ707	2.00E-02	1.0E-02	U	6.0E-04	9.1E-03	9.1E-03
Indeno(1,2,3-cd)pyrene	MJ707	2.00E-02	1.0E-02	U	1.8E-05	2.8E-04	2.8E-04
Naphthalene	MJ707	2.00E-02	1.0E-02	U	6.9E-03	-	1.0E-02
Perylene	MJ707	-	-	-	1.1E-05	1.6E-04	1.6E-04
Phenanthrene	MJ707	2.00E-02	1.0E-02	U	1.2E-03	1.8E-02	1.0E-02
Pyrene	MJ707	2.00E-02	1.0E-02	U	2.1E-04	3.1E-03	3.1E-03
C08-C11 (Gasoline Range)	MJ708	1.10E+01	5.5E+00	U		-	-
C11-C14 (Kerosene Range)	MJ708	1.10E+01	5.5E+00	U		-	-
C14-C20 (Diesel Range)	MJ708	1.10E+01	5.5E+00	U		-	-
C20-C30 (Lubricant Oil Range)	MJ708	4.50E+00	4.5E+00	J		-	-
C11-C30	MJ708	-	1.6E+01	-		-	-
Benzene	MJ708	-	-	-	1.9E-06	-	-
Ethylbenzene	MJ708	-	-	-	1.5E-05	-	-
Toluene	MJ708	-	-	-	1.1E-05	-	-
m,p-Xylene	MJ708	-	-	-	1.8E-05	-	-
o-Xylene	MJ708	-	-	-	6.9E-06	-	-
Xylene (total)	MJ708	-	-	-	2.6E-05	-	-
2-Methylnaphthalene	MJ708	2.10E-02	1.1E-02	U	2.8E-02	-	1.1E-02
Acenaphthene	MJ708	2.10E-02	1.1E-02	U	4.5E-04	6.9E-03	6.9E-03
Acenaphthylene	MJ708	2.10E-02	1.1E-02	U	9.3E-05	1.4E-03	1.4E-03
Anthracene	MJ708	2.10E-02	1.1E-02	U	2.4E-04	3.7E-03	3.7E-03
Benzo(a)anthracene	MJ708	2.10E-02	1.1E-02	U	9.5E-06	1.5E-04	1.5E-04

TPH to Petroleum Constituent Extrapolation for Soil (0-4 feet bgs) [a]
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Benzo(a)pyrene	MJ708	2.10E-02	1.1E-02	U	1.2E-05	1.8E-04	1.8E-04
Benzo(b)fluoranthene	MJ708	2.10E-02	1.1E-02	U	5.2E-06	8.0E-05	8.0E-05
Benzo(e)pyrene	MJ708	-	-	-	1.5E-05	2.4E-04	2.4E-04
Benzo(g,h,i)perylene	MJ708	2.10E-02	1.1E-02	U	2.7E-04	4.3E-03	4.3E-03
Benzo(k)fluoranthene	MJ708	2.10E-02	1.1E-02	U	1.7E-06	2.6E-05	2.6E-05
Chrysene	MJ708	2.10E-02	1.1E-02	U	1.4E-05	2.1E-04	2.1E-04
Dibenz(a,h)anthracene	MJ708	2.10E-02	1.1E-02	U	1.4E-05	2.1E-04	2.1E-04
Fluoranthene	MJ708	2.10E-02	1.1E-02	U	4.8E-05	7.4E-04	7.4E-04
Fluorene	MJ708	2.10E-02	1.1E-02	U	6.0E-04	9.4E-03	9.4E-03
Indeno(1,2,3-cd)pyrene	MJ708	2.10E-02	1.1E-02	U	1.8E-05	2.8E-04	2.8E-04
Naphthalene	MJ708	2.10E-02	1.1E-02	U	6.9E-03	-	1.1E-02
Perylene	MJ708	-	-	-	1.1E-05	1.7E-04	1.7E-04
Phenanthrene	MJ708	2.10E-02	1.1E-02	U	1.2E-03	1.8E-02	1.1E-02
Pyrene	MJ708	2.10E-02	1.1E-02	U	2.1E-04	3.2E-03	3.2E-03
C08-C11 (Gasoline Range)	MJ710	5.30E+00	2.7E+00	U		-	-
C11-C14 (Kerosene Range)	MJ710	5.30E+00	2.7E+00	U		-	-
C14-C20 (Diesel Range)	MJ710	5.30E+00	2.7E+00	U		-	-
C20-C30 (Lubricant Oil Range)	MJ710	2.20E+00	2.2E+00	J		-	-
C11-C30	MJ710	-	7.5E+00	-		-	-
Benzene	MJ710	-	-	-	1.9E-06	-	-
Ethylbenzene	MJ710	-	-	-	1.5E-05	-	-
Toluene	MJ710	-	-	-	1.1E-05	-	-
m,p-Xylene	MJ710	-	-	-	1.8E-05	-	-
o-Xylene	MJ710	-	-	-	6.9E-06	-	-
Xylene (total)	MJ710	-	-	-	2.6E-05	-	-
2-Methylnaphthalene	MJ710	2.10E-02	1.1E-02	U	2.8E-02	-	1.1E-02
Acenaphthene	MJ710	2.10E-02	1.1E-02	U	4.5E-04	3.4E-03	3.4E-03
Acenaphthylene	MJ710	2.10E-02	1.1E-02	U	9.3E-05	7.0E-04	7.0E-04
Anthracene	MJ710	2.10E-02	1.1E-02	U	2.4E-04	1.8E-03	1.8E-03
Benzo(a)anthracene	MJ710	2.10E-02	1.1E-02	U	9.5E-06	7.1E-05	7.1E-05
Benzo(a)pyrene	MJ710	2.10E-02	1.1E-02	U	1.2E-05	8.7E-05	8.7E-05
Benzo(b)fluoranthene	MJ710	2.10E-02	1.1E-02	U	5.2E-06	3.9E-05	3.9E-05
Benzo(e)pyrene	MJ710	-	-	-	1.5E-05	1.2E-04	1.2E-04
Benzo(g,h,i)perylene	MJ710	2.10E-02	1.1E-02	U	2.7E-04	2.1E-03	2.1E-03
Benzo(k)fluoranthene	MJ710	2.10E-02	1.1E-02	U	1.7E-06	1.2E-05	1.2E-05
Chrysene	MJ710	2.10E-02	1.1E-02	U	1.4E-05	1.0E-04	1.0E-04
Dibenz(a,h)anthracene	MJ710	2.10E-02	1.1E-02	U	1.4E-05	1.0E-04	1.0E-04
Fluoranthene	MJ710	2.10E-02	1.1E-02	U	4.8E-05	3.6E-04	3.6E-04
Fluorene	MJ710	2.10E-02	1.1E-02	U	6.0E-04	4.5E-03	4.5E-03
Indeno(1,2,3-cd)pyrene	MJ710	2.10E-02	1.1E-02	U	1.8E-05	1.4E-04	1.4E-04
Naphthalene	MJ710	2.10E-02	1.1E-02	U	6.9E-03	-	1.1E-02
Perylene	MJ710	-	-	-	1.1E-05	8.1E-05	8.1E-05
Phenanthrene	MJ710	2.10E-02	1.1E-02	U	1.2E-03	8.8E-03	8.8E-03
Pyrene	MJ710	2.10E-02	1.1E-02	U	2.1E-04	1.5E-03	1.5E-03
C08-C11 (Gasoline Range)	MJ720	6.00E+00	3.0E+00	U		-	-
C11-C14 (Kerosene Range)	MJ720	6.00E+00	3.0E+00	U		-	-
C14-C20 (Diesel Range)	MJ720	6.00E+00	3.0E+00	U		-	-
C20-C30 (Lubricant Oil Range)	MJ720	6.00E+00	3.0E+00	U		-	-
C11-C30	MJ720	-	9.0E+00	-		-	-
Benzene	MJ720	-	-	-	1.9E-06	-	-
Ethylbenzene	MJ720	-	-	-	1.5E-05	-	-
Toluene	MJ720	-	-	-	1.1E-05	-	-
m,p-Xylene	MJ720	-	-	-	1.8E-05	-	-
o-Xylene	MJ720	-	-	-	6.9E-06	-	-
Xylene (total)	MJ720	-	-	-	2.6E-05	-	-
2-Methylnaphthalene	MJ720	-	-	-	2.8E-02	-	-

TPH to Petroleum Constituent Extrapolation for Soil (0-4 feet bgs) [a]
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Acenaphthene	MJ720	-	-	-	4.5E-04	4.0E-03	4.0E-03
Acenaphthylene	MJ720	-	-	-	9.3E-05	8.3E-04	8.3E-04
Anthracene	MJ720	-	-	-	2.4E-04	2.2E-03	2.2E-03
Benzo(a)anthracene	MJ720	-	-	-	9.5E-06	8.5E-05	8.5E-05
Benzo(a)pyrene	MJ720	-	-	-	1.2E-05	1.0E-04	1.0E-04
Benzo(b)fluoranthene	MJ720	-	-	-	5.2E-06	4.6E-05	4.6E-05
Benzo(e)pyrene	MJ720	-	-	-	1.5E-05	1.4E-04	1.4E-04
Benzo(g,h,i)perylene	MJ720	-	-	-	2.7E-04	2.5E-03	2.5E-03
Benzo(k)fluoranthene	MJ720	-	-	-	1.7E-06	1.5E-05	1.5E-05
Chrysene	MJ720	-	-	-	1.4E-05	1.2E-04	1.2E-04
Dibenz(a,h)anthracene	MJ720	-	-	-	1.4E-05	1.2E-04	1.2E-04
Fluoranthene	MJ720	-	-	-	4.8E-05	4.3E-04	4.3E-04
Fluorene	MJ720	-	-	-	6.0E-04	5.4E-03	5.4E-03
Indeno(1,2,3-cd)pyrene	MJ720	-	-	-	1.8E-05	1.7E-04	1.7E-04
Naphthalene	MJ720	-	-	-	6.9E-03	-	-
Perylene	MJ720	-	-	-	1.1E-05	9.7E-05	9.7E-05
Phenanthrene	MJ720	-	-	-	1.2E-03	1.1E-02	1.1E-02
Pyrene	MJ720	-	-	-	2.1E-04	1.8E-03	1.8E-03
C08-C11 (Gasoline Range)	MJ739	5.60E+00	2.8E+00	U		-	-
C11-C14 (Kerosene Range)	MJ739	5.60E+00	2.8E+00	U		-	-
C14-C20 (Diesel Range)	MJ739	5.60E+00	2.8E+00	U		-	-
C20-C30 (Lubricant Oil Range)	MJ739	5.60E+00	2.8E+00	U		-	-
C11-C30	MJ739	-	8.4E+00	-		-	-
Benzene	MJ739	-	-	-	1.9E-06	-	-
Ethylbenzene	MJ739	-	-	-	1.5E-05	-	-
Toluene	MJ739	-	-	-	1.1E-05	-	-
m,p-Xylene	MJ739	-	-	-	1.8E-05	-	-
o-Xylene	MJ739	-	-	-	6.9E-06	-	-
Xylene (total)	MJ739	-	-	-	2.6E-05	-	-
2-Methylnaphthalene	MJ739	-	-	-	2.8E-02	-	-
Acenaphthene	MJ739	-	-	-	4.5E-04	3.8E-03	3.8E-03
Acenaphthylene	MJ739	-	-	-	9.3E-05	7.8E-04	7.8E-04
Anthracene	MJ739	-	-	-	2.4E-04	2.0E-03	2.0E-03
Benzo(a)anthracene	MJ739	-	-	-	9.5E-06	7.9E-05	7.9E-05
Benzo(a)pyrene	MJ739	-	-	-	1.2E-05	9.8E-05	9.8E-05
Benzo(b)fluoranthene	MJ739	-	-	-	5.2E-06	4.3E-05	4.3E-05
Benzo(e)pyrene	MJ739	-	-	-	1.5E-05	1.3E-04	1.3E-04
Benzo(g,h,i)perylene	MJ739	-	-	-	2.7E-04	2.3E-03	2.3E-03
Benzo(k)fluoranthene	MJ739	-	-	-	1.7E-06	1.4E-05	1.4E-05
Chrysene	MJ739	-	-	-	1.4E-05	1.1E-04	1.1E-04
Dibenz(a,h)anthracene	MJ739	-	-	-	1.4E-05	1.2E-04	1.2E-04
Fluoranthene	MJ739	-	-	-	4.8E-05	4.0E-04	4.0E-04
Fluorene	MJ739	-	-	-	6.0E-04	5.1E-03	5.1E-03
Indeno(1,2,3-cd)pyrene	MJ739	-	-	-	1.8E-05	1.5E-04	1.5E-04
Naphthalene	MJ739	-	-	-	6.9E-03	-	-
Perylene	MJ739	-	-	-	1.1E-05	9.0E-05	9.0E-05
Phenanthrene	MJ739	-	-	-	1.2E-03	9.8E-03	9.8E-03
Pyrene	MJ739	-	-	-	2.1E-04	1.7E-03	1.7E-03
C08-C11 (Gasoline Range)	MJ787	3.00E+00	3.0E+00	J		-	-
C11-C14 (Kerosene Range)	MJ787	6.40E+00	3.2E+00	U		-	-
C14-C20 (Diesel Range)	MJ787	6.00E+00	6.0E+00	J		-	-
C20-C30 (Lubricant Oil Range)	MJ787	2.20E+01	2.2E+01	J		-	-
C11-C30	MJ787	-	3.1E+01	-		-	-
Benzene	MJ787	-	-	-	1.9E-06	-	-
Ethylbenzene	MJ787	-	-	-	1.5E-05	-	-
Toluene	MJ787	-	-	-	1.1E-05	-	-

TPH to Petroleum Constituent Extrapolation for Soil (0-4 feet bgs) [a]
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
m,p-Xylene	MJ787	-	-	-	1.8E-05	-	-
o-Xylene	MJ787	-	-	-	6.9E-06	-	-
Xylene (total)	MJ787	-	-	-	2.6E-05	-	-
2-Methylnaphthalene	MJ787	5.20E-03	5.2E-03	J	2.8E-02	-	5.2E-03
Acenaphthene	MJ787	2.70E-02	1.4E-02	U	4.5E-04	1.4E-02	1.4E-02
Acenaphthylene	MJ787	2.70E-02	1.4E-02	U	9.3E-05	2.9E-03	2.9E-03
Anthracene	MJ787	2.70E-02	1.4E-02	U	2.4E-04	7.5E-03	7.5E-03
Benzo(a)anthracene	MJ787	9.00E-03	9.0E-03	J	9.5E-06	3.0E-04	9.0E-03
Benzo(a)pyrene	MJ787	3.60E-03	3.6E-03	J	1.2E-05	3.6E-04	3.6E-03
Benzo(b)fluoranthene	MJ787	3.90E-03	3.9E-03	J	5.2E-06	1.6E-04	3.9E-03
Benzo(e)pyrene	MJ787	-	-	-	1.5E-05	4.8E-04	4.8E-04
Benzo(g,h,i)perylene	MJ787	4.80E-03	4.8E-03	J	2.7E-04	8.6E-03	4.8E-03
Benzo(k)fluoranthene	MJ787	2.70E-02	1.4E-02	U	1.7E-06	5.2E-05	5.2E-05
Chrysene	MJ787	2.80E-02	2.8E-02		1.4E-05	4.2E-04	2.8E-02
Dibenz(a,h)anthracene	MJ787	2.70E-02	1.4E-02	U	1.4E-05	4.3E-04	4.3E-04
Fluoranthene	MJ787	1.20E-02	1.2E-02	J	4.8E-05	1.5E-03	1.2E-02
Fluorene	MJ787	2.70E-02	1.4E-02	U	6.0E-04	1.9E-02	1.4E-02
Indeno(1,2,3-cd)pyrene	MJ787	2.70E-02	1.4E-02	U	1.8E-05	5.7E-04	5.7E-04
Naphthalene	MJ787	1.10E-02	1.1E-02	J	6.9E-03	-	1.1E-02
Perylene	MJ787	-	-	-	1.1E-05	3.4E-04	3.4E-04
Phenanthrene	MJ787	1.00E-02	1.0E-02	J	1.2E-03	3.6E-02	1.0E-02
Pyrene	MJ787	1.20E-02	1.2E-02	J	2.1E-04	6.4E-03	1.2E-02
C08-C11 (Gasoline Range)	MJ788	6.10E+00	3.1E+00	U		-	-
C11-C14 (Kerosene Range)	MJ788	6.10E+00	3.1E+00	U		-	-
C14-C20 (Diesel Range)	MJ788	6.10E+00	3.1E+00	U		-	-
C20-C30 (Lubricant Oil Range)	MJ788	2.50E+00	2.5E+00	J		-	-
C11-C30	MJ788	-	8.6E+00	-		-	-
Benzene	MJ788	-	-	-	1.9E-06	-	-
Ethylbenzene	MJ788	-	-	-	1.5E-05	-	-
Toluene	MJ788	-	-	-	1.1E-05	-	-
m,p-Xylene	MJ788	-	-	-	1.8E-05	-	-
o-Xylene	MJ788	-	-	-	6.9E-06	-	-
Xylene (total)	MJ788	-	-	-	2.6E-05	-	-
2-Methylnaphthalene	MJ788	2.40E-02	1.2E-02	U	2.8E-02	-	1.2E-02
Acenaphthene	MJ788	2.40E-02	1.2E-02	U	4.5E-04	3.8E-03	3.8E-03
Acenaphthylene	MJ788	2.40E-02	1.2E-02	U	9.3E-05	8.0E-04	8.0E-04
Anthracene	MJ788	2.40E-02	1.2E-02	U	2.4E-04	2.1E-03	2.1E-03
Benzo(a)anthracene	MJ788	4.10E-03	4.1E-03	J	9.5E-06	8.1E-05	4.1E-03
Benzo(a)pyrene	MJ788	2.40E-02	1.2E-02	U	1.2E-05	1.0E-04	1.0E-04
Benzo(b)fluoranthene	MJ788	2.40E-02	1.2E-02	U	5.2E-06	4.4E-05	4.4E-05
Benzo(e)pyrene	MJ788	-	-	-	1.5E-05	1.3E-04	1.3E-04
Benzo(g,h,i)perylene	MJ788	2.40E-02	1.2E-02	U	2.7E-04	2.4E-03	2.4E-03
Benzo(k)fluoranthene	MJ788	2.40E-02	1.2E-02	U	1.7E-06	1.4E-05	1.4E-05
Chrysene	MJ788	2.40E-02	1.2E-02	U	1.4E-05	1.2E-04	1.2E-04
Dibenz(a,h)anthracene	MJ788	2.40E-02	1.2E-02	U	1.4E-05	1.2E-04	1.2E-04
Fluoranthene	MJ788	2.40E-02	1.2E-02	U	4.8E-05	4.1E-04	4.1E-04
Fluorene	MJ788	2.40E-02	1.2E-02	U	6.0E-04	5.2E-03	5.2E-03
Indeno(1,2,3-cd)pyrene	MJ788	2.40E-02	1.2E-02	U	1.8E-05	1.6E-04	1.6E-04
Naphthalene	MJ788	2.40E-02	1.2E-02	U	6.9E-03	-	1.2E-02
Perylene	MJ788	-	-	-	1.1E-05	9.3E-05	9.3E-05
Phenanthrene	MJ788	2.40E-02	1.2E-02	U	1.2E-03	1.0E-02	1.0E-02
Pyrene	MJ788	2.40E-02	1.2E-02	U	2.1E-04	1.8E-03	1.8E-03
C08-C11 (Gasoline Range)	MJ789	2.30E+00	2.3E+00	J		-	-
C11-C14 (Kerosene Range)	MJ789	5.60E+00	2.8E+00	U		-	-
C14-C20 (Diesel Range)	MJ789	3.30E+00	3.3E+00	J		-	-
C20-C30 (Lubricant Oil Range)	MJ789	1.40E+01	1.4E+01	J		-	-

TPH to Petroleum Constituent Extrapolation for Soil (0-4 feet bgs) [a]
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
C11-C30	MJ789	-	2.0E+01	-		-	-
Benzene	MJ789	-	-	-	1.9E-06	-	-
Ethylbenzene	MJ789	-	-	-	1.5E-05	-	-
Toluene	MJ789	-	-	-	1.1E-05	-	-
m,p-Xylene	MJ789	-	-	-	1.8E-05	-	-
o-Xylene	MJ789	-	-	-	6.9E-06	-	-
Xylene (total)	MJ789	-	-	-	2.6E-05	-	-
2-Methylnaphthalene	MJ789	2.20E-02	1.1E-02	U	2.8E-02	-	1.1E-02
Acenaphthene	MJ789	2.20E-02	1.1E-02	U	4.5E-04	9.0E-03	9.0E-03
Acenaphthylene	MJ789	2.20E-02	1.1E-02	U	9.3E-05	1.9E-03	1.9E-03
Anthracene	MJ789	2.20E-02	1.1E-02	U	2.4E-04	4.8E-03	4.8E-03
Benzo(a)anthracene	MJ789	2.20E-02	1.1E-02	U	9.5E-06	1.9E-04	1.9E-04
Benzo(a)pyrene	MJ789	2.20E-02	1.1E-02	U	1.2E-05	2.3E-04	2.3E-04
Benzo(b)fluoranthene	MJ789	2.20E-02	1.1E-02	U	5.2E-06	1.0E-04	1.0E-04
Benzo(e)pyrene	MJ789	-	-	-	1.5E-05	3.1E-04	3.1E-04
Benzo(g,h,i)perylene	MJ789	2.20E-02	1.1E-02	U	2.7E-04	5.5E-03	5.5E-03
Benzo(k)fluoranthene	MJ789	2.20E-02	1.1E-02	U	1.7E-06	3.3E-05	3.3E-05
Chrysene	MJ789	2.20E-02	1.1E-02	U	1.4E-05	2.7E-04	2.7E-04
Dibenz(a,h)anthracene	MJ789	2.20E-02	1.1E-02	U	1.4E-05	2.8E-04	2.8E-04
Fluoranthene	MJ789	2.20E-02	1.1E-02	U	4.8E-05	9.6E-04	9.6E-04
Fluorene	MJ789	2.20E-02	1.1E-02	U	6.0E-04	1.2E-02	1.1E-02
Indeno(1,2,3-cd)pyrene	MJ789	2.20E-02	1.1E-02	U	1.8E-05	3.7E-04	3.7E-04
Naphthalene	MJ789	2.20E-02	1.1E-02	U	6.9E-03	-	1.1E-02
Perylene	MJ789	2.20E-02	1.1E-02	U	1.1E-05	2.2E-04	2.2E-04
Phenanthrene	MJ789	2.20E-02	1.1E-02	U	1.2E-03	2.3E-02	1.1E-02
Pyrene	MJ789	2.20E-02	1.1E-02	U	2.1E-04	4.1E-03	4.1E-03
C08-C11 (Gasoline Range)	MJ790	2.70E+00	2.7E+00	J		-	-
C11-C14 (Kerosene Range)	MJ790	6.10E+00	3.1E+00	U		-	-
C14-C20 (Diesel Range)	MJ790	3.10E+00	3.1E+00	J		-	-
C20-C30 (Lubricant Oil Range)	MJ790	1.00E+01	1.0E+01	J		-	-
C11-C30	MJ790	-	1.6E+01	-		-	-
Benzene	MJ790	-	-	-	1.9E-06	-	-
Ethylbenzene	MJ790	-	-	-	1.5E-05	-	-
Toluene	MJ790	-	-	-	1.1E-05	-	-
m,p-Xylene	MJ790	-	-	-	1.8E-05	-	-
o-Xylene	MJ790	-	-	-	6.9E-06	-	-
Xylene (total)	MJ790	-	-	-	2.6E-05	-	-
2-Methylnaphthalene	MJ790	2.40E-02	1.2E-02	U	2.8E-02	-	1.2E-02
Acenaphthene	MJ790	2.40E-02	1.2E-02	U	4.5E-04	7.2E-03	7.2E-03
Acenaphthylene	MJ790	2.40E-02	1.2E-02	U	9.3E-05	1.5E-03	1.5E-03
Anthracene	MJ790	2.40E-02	1.2E-02	U	2.4E-04	3.9E-03	3.9E-03
Benzo(a)anthracene	MJ790	2.40E-02	1.2E-02	U	9.5E-06	1.5E-04	1.5E-04
Benzo(a)pyrene	MJ790	2.40E-02	1.2E-02	U	1.2E-05	1.9E-04	1.9E-04
Benzo(b)fluoranthene	MJ790	2.40E-02	1.2E-02	U	5.2E-06	8.3E-05	8.3E-05
Benzo(e)pyrene	MJ790	-	-	-	1.5E-05	2.5E-04	2.5E-04
Benzo(g,h,i)perylene	MJ790	2.40E-02	1.2E-02	U	2.7E-04	4.4E-03	4.4E-03
Benzo(k)fluoranthene	MJ790	2.40E-02	1.2E-02	U	1.7E-06	2.7E-05	2.7E-05
Chrysene	MJ790	2.40E-02	1.2E-02	U	1.4E-05	2.2E-04	2.2E-04
Dibenz(a,h)anthracene	MJ790	2.40E-02	1.2E-02	U	1.4E-05	2.2E-04	2.2E-04
Fluoranthene	MJ790	2.40E-02	1.2E-02	U	4.8E-05	7.7E-04	7.7E-04
Fluorene	MJ790	2.40E-02	1.2E-02	U	6.0E-04	9.7E-03	9.7E-03
Indeno(1,2,3-cd)pyrene	MJ790	2.40E-02	1.2E-02	U	1.8E-05	3.0E-04	3.0E-04
Naphthalene	MJ790	2.40E-02	1.2E-02	U	6.9E-03	-	1.2E-02
Perylene	MJ790	-	-	-	1.1E-05	1.7E-04	1.7E-04
Phenanthrene	MJ790	2.40E-02	1.2E-02	U	1.2E-03	1.9E-02	1.2E-02
Pyrene	MJ790	2.40E-02	1.2E-02	U	2.1E-04	3.3E-03	3.3E-03

TPH to Petroleum Constituent Extrapolation for Soil (0-4 feet bgs) [a]
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
C08-C11 (Gasoline Range)	MJ791	5.80E+00	2.9E+00	U		-	-
C11-C14 (Kerosene Range)	MJ791	5.80E+00	2.9E+00	U		-	-
C14-C20 (Diesel Range)	MJ791	5.80E+00	2.9E+00	U		-	-
C20-C30 (Lubricant Oil Range)	MJ791	5.80E+00	2.9E+00	U		-	-
C11-C30	MJ791	-	8.7E+00	-		-	-
Benzene	MJ791	-	-	-	1.9E-06	-	-
Ethylbenzene	MJ791	-	-	-	1.5E-05	-	-
Toluene	MJ791	-	-	-	1.1E-05	-	-
m,p-Xylene	MJ791	-	-	-	1.8E-05	-	-
o-Xylene	MJ791	-	-	-	6.9E-06	-	-
Xylene (total)	MJ791	-	-	-	2.6E-05	-	-
2-Methylnaphthalene	MJ791	2.30E-02	1.2E-02	U	2.8E-02	-	1.2E-02
Acenaphthene	MJ791	2.30E-02	1.2E-02	U	4.5E-04	3.9E-03	3.9E-03
Acenaphthylene	MJ791	2.30E-02	1.2E-02	U	9.3E-05	8.1E-04	8.1E-04
Anthracene	MJ791	2.30E-02	1.2E-02	U	2.4E-04	2.1E-03	2.1E-03
Benzo(a)anthracene	MJ791	3.30E-03	3.3E-03	J	9.5E-06	8.2E-05	3.3E-03
Benzo(a)pyrene	MJ791	2.30E-02	1.2E-02	U	1.2E-05	1.0E-04	1.0E-04
Benzo(b)fluoranthene	MJ791	2.30E-02	1.2E-02	U	5.2E-06	4.5E-05	4.5E-05
Benzo(e)pyrene	MJ791	-	-	-	1.5E-05	1.3E-04	1.3E-04
Benzo(g,h,i)perylene	MJ791	2.30E-02	1.2E-02	U	2.7E-04	2.4E-03	2.4E-03
Benzo(k)fluoranthene	MJ791	2.30E-02	1.2E-02	U	1.7E-06	1.4E-05	1.4E-05
Chrysene	MJ791	2.30E-02	1.2E-02	U	1.4E-05	1.2E-04	1.2E-04
Dibenz(a,h)anthracene	MJ791	2.30E-02	1.2E-02	U	1.4E-05	1.2E-04	1.2E-04
Fluoranthene	MJ791	2.30E-02	1.2E-02	U	4.8E-05	4.1E-04	4.1E-04
Fluorene	MJ791	2.30E-02	1.2E-02	U	6.0E-04	5.2E-03	5.2E-03
Indeno(1,2,3-cd)pyrene	MJ791	2.30E-02	1.2E-02	U	1.8E-05	1.6E-04	1.6E-04
Naphthalene	MJ791	2.30E-02	1.2E-02	U	6.9E-03	-	1.2E-02
Perylene	MJ791	-	-	-	1.1E-05	9.4E-05	9.4E-05
Phenanthrene	MJ791	2.30E-02	1.2E-02	U	1.2E-03	1.0E-02	1.0E-02
Pyrene	MJ791	2.30E-02	1.2E-02	U	2.1E-04	1.8E-03	1.8E-03
C08-C11 (Gasoline Range)	MJ794	6.00E+00	3.0E+00	U		-	-
C11-C14 (Kerosene Range)	MJ794	6.00E+00	3.0E+00	U		-	-
C14-C20 (Diesel Range)	MJ794	6.00E+00	3.0E+00	U		-	-
C20-C30 (Lubricant Oil Range)	MJ794	7.70E+00	7.7E+00	J		-	-
C11-C30	MJ794	-	1.4E+01	-		-	-
Benzene	MJ794	-	-	-	1.9E-06	-	-
Ethylbenzene	MJ794	-	-	-	1.5E-05	-	-
Toluene	MJ794	-	-	-	1.1E-05	-	-
m,p-Xylene	MJ794	-	-	-	1.8E-05	-	-
o-Xylene	MJ794	-	-	-	6.9E-06	-	-
Xylene (total)	MJ794	-	-	-	2.6E-05	-	-
2-Methylnaphthalene	MJ794	2.40E-02	1.2E-02	U	2.8E-02	-	1.2E-02
Acenaphthene	MJ794	2.40E-02	1.2E-02	U	4.5E-04	6.1E-03	6.1E-03
Acenaphthylene	MJ794	2.40E-02	1.2E-02	U	9.3E-05	1.3E-03	1.3E-03
Anthracene	MJ794	2.40E-02	1.2E-02	U	2.4E-04	3.3E-03	3.3E-03
Benzo(a)anthracene	MJ794	4.40E-03	4.4E-03	J	9.5E-06	1.3E-04	4.4E-03
Benzo(a)pyrene	MJ794	2.40E-02	1.2E-02	U	1.2E-05	1.6E-04	1.6E-04
Benzo(b)fluoranthene	MJ794	2.40E-02	1.2E-02	U	5.2E-06	7.1E-05	7.1E-05
Benzo(e)pyrene	MJ794	-	-	-	1.5E-05	2.1E-04	2.1E-04
Benzo(g,h,i)perylene	MJ794	2.40E-02	1.2E-02	U	2.7E-04	3.8E-03	3.8E-03
Benzo(k)fluoranthene	MJ794	2.40E-02	1.2E-02	U	1.7E-06	2.3E-05	2.3E-05
Chrysene	MJ794	2.40E-02	1.2E-02	U	1.4E-05	1.9E-04	1.9E-04
Dibenz(a,h)anthracene	MJ794	2.40E-02	1.2E-02	U	1.4E-05	1.9E-04	1.9E-04
Fluoranthene	MJ794	2.40E-02	1.2E-02	U	4.8E-05	6.5E-04	6.5E-04
Fluorene	MJ794	2.40E-02	1.2E-02	U	6.0E-04	8.3E-03	8.3E-03
Indeno(1,2,3-cd)pyrene	MJ794	2.40E-02	1.2E-02	U	1.8E-05	2.5E-04	2.5E-04

TPH to Petroleum Constituent Extrapolation for Soil (0-4 feet bgs) [a]
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Naphthalene	MJ794	2.40E-02	1.2E-02	U	6.9E-03	-	1.2E-02
Perylene	MJ794	-	-	-	1.1E-05	1.5E-04	1.5E-04
Phenanthrene	MJ794	2.40E-02	1.2E-02	U	1.2E-03	1.6E-02	1.2E-02
Pyrene	MJ794	2.40E-02	1.2E-02	U	2.1E-04	2.8E-03	2.8E-03
C08-C11 (Gasoline Range)	MJ795	2.10E+01	1.1E+01	U		-	-
C11-C14 (Kerosene Range)	MJ795	2.10E+01	1.1E+01	U		-	-
C14-C20 (Diesel Range)	MJ795	2.10E+01	1.1E+01	U		-	-
C20-C30 (Lubricant Oil Range)	MJ795	2.80E+01	2.8E+01	J		-	-
C11-C30	MJ795	-	4.9E+01	-		-	-
Benzene	MJ795	-	-	-	1.9E-06	-	-
Ethylbenzene	MJ795	-	-	-	1.5E-05	-	-
Toluene	MJ795	-	-	-	1.1E-05	-	-
m,p-Xylene	MJ795	-	-	-	1.8E-05	-	-
o-Xylene	MJ795	-	-	-	6.9E-06	-	-
Xylene (total)	MJ795	-	-	-	2.6E-05	-	-
2-Methylnaphthalene	MJ795	1.10E-02	1.1E-02	J	2.8E-02	-	1.1E-02
Acenaphthene	MJ795	1.50E-02	1.5E-02	J	4.5E-04	2.2E-02	1.5E-02
Acenaphthylene	MJ795	2.80E-02	1.4E-02	U	9.3E-05	4.5E-03	4.5E-03
Anthracene	MJ795	2.80E-02	1.4E-02	U	2.4E-04	1.2E-02	1.2E-02
Benzo(a)anthracene	MJ795	6.30E-03	6.3E-03	J	9.5E-06	4.6E-04	6.3E-03
Benzo(a)pyrene	MJ795	2.80E-02	1.4E-02	U	1.2E-05	5.7E-04	5.7E-04
Benzo(b)fluoranthene	MJ795	2.80E-02	1.4E-02	U	5.2E-06	2.5E-04	2.5E-04
Benzo(e)pyrene	MJ795	-	-	-	1.5E-05	7.5E-04	7.5E-04
Benzo(g,h,i)perylene	MJ795	2.80E-02	1.4E-02	U	2.7E-04	1.3E-02	1.3E-02
Benzo(k)fluoranthene	MJ795	2.80E-02	1.4E-02	U	1.7E-06	8.1E-05	8.1E-05
Chrysene	MJ795	2.80E-02	1.4E-02	U	1.4E-05	6.7E-04	6.7E-04
Dibenz(a,h)anthracene	MJ795	2.80E-02	1.4E-02	U	1.4E-05	6.7E-04	6.7E-04
Fluoranthene	MJ795	5.80E-03	5.8E-03	J	4.8E-05	2.3E-03	5.8E-03
Fluorene	MJ795	2.80E-02	1.4E-02	U	6.0E-04	3.0E-02	1.4E-02
Indeno(1,2,3-cd)pyrene	MJ795	2.80E-02	1.4E-02	U	1.8E-05	9.0E-04	9.0E-04
Naphthalene	MJ795	2.20E-02	2.2E-02	J	6.9E-03	-	2.2E-02
Perylene	MJ795	-	-	-	1.1E-05	5.3E-04	5.3E-04
Phenanthrene	MJ795	9.40E-03	9.4E-03	J	1.2E-03	5.7E-02	9.4E-03
Pyrene	MJ795	1.90E-02	1.9E-02	J	2.1E-04	1.0E-02	1.9E-02
C08-C11 (Gasoline Range)	MJ796	1.30E+01	6.5E+00	U		-	-
C11-C14 (Kerosene Range)	MJ796	1.30E+01	6.5E+00	U		-	-
C14-C20 (Diesel Range)	MJ796	8.50E+00	8.5E+00	J		-	-
C20-C30 (Lubricant Oil Range)	MJ796	2.10E+01	2.1E+01	J		-	-
C11-C30	MJ796	-	3.6E+01	-		-	-
Benzene	MJ796	-	-	-	1.9E-06	-	-
Ethylbenzene	MJ796	-	-	-	1.5E-05	-	-
Toluene	MJ796	-	-	-	1.1E-05	-	-
m,p-Xylene	MJ796	-	-	-	1.8E-05	-	-
o-Xylene	MJ796	-	-	-	6.9E-06	-	-
Xylene (total)	MJ796	-	-	-	2.6E-05	-	-
2-Methylnaphthalene	MJ796	2.60E-02	1.3E-02	U	2.8E-02	-	1.3E-02
Acenaphthene	MJ796	2.60E-02	1.3E-02	U	4.5E-04	1.6E-02	1.3E-02
Acenaphthylene	MJ796	2.60E-02	1.3E-02	U	9.3E-05	3.3E-03	3.3E-03
Anthracene	MJ796	2.60E-02	1.3E-02	U	2.4E-04	8.7E-03	8.7E-03
Benzo(a)anthracene	MJ796	5.70E-03	5.7E-03	J	9.5E-06	3.4E-04	5.7E-03
Benzo(a)pyrene	MJ796	2.60E-02	1.3E-02	U	1.2E-05	4.2E-04	4.2E-04
Benzo(b)fluoranthene	MJ796	2.60E-02	1.3E-02	U	5.2E-06	1.9E-04	1.9E-04
Benzo(e)pyrene	MJ796	-	-	-	1.5E-05	5.5E-04	5.5E-04
Benzo(g,h,i)perylene	MJ796	2.60E-02	1.3E-02	U	2.7E-04	9.9E-03	9.9E-03
Benzo(k)fluoranthene	MJ796	2.60E-02	1.3E-02	U	1.7E-06	6.0E-05	6.0E-05
Chrysene	MJ796	7.20E-03	7.2E-03	J	1.4E-05	4.9E-04	7.2E-03

TPH to Petroleum Constituent Extrapolation for Soil (0-4 feet bgs) [a]
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Dibenz(a,h)anthracene	MJ796	2.60E-02	1.3E-02	U	1.4E-05	4.9E-04	4.9E-04
Fluoranthene	MJ796	5.50E-03	5.5E-03	J	4.8E-05	1.7E-03	5.5E-03
Fluorene	MJ796	2.60E-02	1.3E-02	U	6.0E-04	2.2E-02	1.3E-02
Indeno(1,2,3-cd)pyrene	MJ796	2.60E-02	1.3E-02	U	1.8E-05	6.6E-04	6.6E-04
Naphthalene	MJ796	6.20E-03	6.2E-03	J	6.9E-03	-	6.2E-03
Perylene	MJ796	-	-	-	1.1E-05	3.9E-04	3.9E-04
Phenanthrene	MJ796	2.60E-02	1.3E-02	U	1.2E-03	4.2E-02	1.3E-02
Pyrene	MJ796	5.90E-03	5.9E-03	J	2.1E-04	7.4E-03	5.9E-03
C08-C11 (Gasoline Range)	MJ798	7.30E+00	7.3E+00	J		-	-
C11-C14 (Kerosene Range)	MJ798	3.30E+00	3.3E+00	J		-	-
C14-C20 (Diesel Range)	MJ798	1.10E+01	1.1E+01	J		-	-
C20-C30 (Lubricant Oil Range)	MJ798	6.40E+01	6.4E+01			-	-
C11-C30	MJ798	-	7.8E+01	-		-	-
Benzene	MJ798	-	-	-	1.9E-06	-	-
Ethylbenzene	MJ798	-	-	-	1.5E-05	-	-
Toluene	MJ798	-	-	-	1.1E-05	-	-
m,p-Xylene	MJ798	-	-	-	1.8E-05	-	-
o-Xylene	MJ798	-	-	-	6.9E-06	-	-
Xylene (total)	MJ798	-	-	-	2.6E-05	-	-
2-Methylnaphthalene	MJ798	7.10E-03	7.1E-03	J	2.8E-02	-	7.1E-03
Acenaphthene	MJ798	1.30E-02	1.3E-02	J	4.5E-04	3.5E-02	1.3E-02
Acenaphthylene	MJ798	2.20E-02	1.1E-02	U	9.3E-05	7.3E-03	7.3E-03
Anthracene	MJ798	2.20E-02	1.1E-02	U	2.4E-04	1.9E-02	1.1E-02
Benzo(a)anthracene	MJ798	2.20E-02	1.1E-02	U	9.5E-06	7.4E-04	7.4E-04
Benzo(a)pyrene	MJ798	5.90E-03	5.9E-03	J	1.2E-05	9.1E-04	5.9E-03
Benzo(b)fluoranthene	MJ798	2.20E-02	1.1E-02	U	5.2E-06	4.0E-04	4.0E-04
Benzo(e)pyrene	MJ798	-	-	-	1.5E-05	1.2E-03	1.2E-03
Benzo(g,h,i)perylene	MJ798	4.90E-03	4.9E-03	J	2.7E-04	2.2E-02	4.9E-03
Benzo(k)fluoranthene	MJ798	1.40E-02	1.4E-02	J	1.7E-06	1.3E-04	1.4E-02
Chrysene	MJ798	5.30E-02	5.3E-02		1.4E-05	1.1E-03	5.3E-02
Dibenz(a,h)anthracene	MJ798	2.20E-02	1.1E-02	U	1.4E-05	1.1E-03	1.1E-03
Fluoranthene	MJ798	2.10E-02	2.1E-02	J	4.8E-05	3.7E-03	2.1E-02
Fluorene	MJ798	2.20E-02	1.1E-02	U	6.0E-04	4.7E-02	1.1E-02
Indeno(1,2,3-cd)pyrene	MJ798	2.20E-02	1.1E-02	U	1.8E-05	1.4E-03	1.4E-03
Naphthalene	MJ798	9.10E-03	9.1E-03	J	6.9E-03	-	9.1E-03
Perylene	MJ798	-	-	-	1.1E-05	8.4E-04	8.4E-04
Phenanthrene	MJ798	1.10E-02	1.1E-02	J	1.2E-03	9.1E-02	1.1E-02
Pyrene	MJ798	1.80E-02	1.8E-02	J	2.1E-04	1.6E-02	1.8E-02
C08-C11 (Gasoline Range)	MJ799	5.40E+00	2.7E+00	U		-	-
C11-C14 (Kerosene Range)	MJ799	5.40E+00	2.7E+00	U		-	-
C14-C20 (Diesel Range)	MJ799	2.70E+00	2.7E+00	J		-	-
C20-C30 (Lubricant Oil Range)	MJ799	1.60E+01	1.6E+01	J		-	-
C11-C30	MJ799	-	2.1E+01	-		-	-
Benzene	MJ799	-	-	-	1.9E-06	-	-
Ethylbenzene	MJ799	-	-	-	1.5E-05	-	-
Toluene	MJ799	-	-	-	1.1E-05	-	-
m,p-Xylene	MJ799	-	-	-	1.8E-05	-	-
o-Xylene	MJ799	-	-	-	6.9E-06	-	-
Xylene (total)	MJ799	-	-	-	2.6E-05	-	-
2-Methylnaphthalene	MJ799	2.20E-02	1.1E-02	U	2.8E-02	-	1.1E-02
Acenaphthene	MJ799	2.20E-02	1.1E-02	U	4.5E-04	9.6E-03	9.6E-03
Acenaphthylene	MJ799	2.20E-02	1.1E-02	U	9.3E-05	2.0E-03	2.0E-03
Anthracene	MJ799	2.20E-02	1.1E-02	U	2.4E-04	5.2E-03	5.2E-03
Benzo(a)anthracene	MJ799	3.40E-03	3.4E-03	J	9.5E-06	2.0E-04	3.4E-03
Benzo(a)pyrene	MJ799	2.20E-02	1.1E-02	U	1.2E-05	2.5E-04	2.5E-04
Benzo(b)fluoranthene	MJ799	2.20E-02	1.1E-02	U	5.2E-06	1.1E-04	1.1E-04

TPH to Petroleum Constituent Extrapolation for Soil (0-4 feet bgs) [a]
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Benzo(e)pyrene	MJ799	-	-	-	1.5E-05	3.3E-04	3.3E-04
Benzo(g,h,i)perylene	MJ799	2.20E-02	1.1E-02	U	2.7E-04	5.9E-03	5.9E-03
Benzo(k)fluoranthene	MJ799	2.20E-02	1.1E-02	U	1.7E-06	3.6E-05	3.6E-05
Chrysene	MJ799	2.20E-02	1.1E-02	U	1.4E-05	2.9E-04	2.9E-04
Dibenz(a,h)anthracene	MJ799	2.20E-02	1.1E-02	U	1.4E-05	2.9E-04	2.9E-04
Fluoranthene	MJ799	2.20E-02	1.1E-02	U	4.8E-05	1.0E-03	1.0E-03
Fluorene	MJ799	2.20E-02	1.1E-02	U	6.0E-04	1.3E-02	1.1E-02
Indeno(1,2,3-cd)pyrene	MJ799	2.20E-02	1.1E-02	U	1.8E-05	3.9E-04	3.9E-04
Naphthalene	MJ799	2.20E-02	1.1E-02	U	6.9E-03	-	1.1E-02
Perylene	MJ799	-	-	-	1.1E-05	2.3E-04	2.3E-04
Phenanthrene	MJ799	2.20E-02	1.1E-02	U	1.2E-03	2.5E-02	1.1E-02
Pyrene	MJ799	2.20E-02	1.1E-02	U	2.1E-04	4.4E-03	4.4E-03
C08-C11 (Gasoline Range)	MJ800	1.10E+01	5.5E+00	U		-	-
C11-C14 (Kerosene Range)	MJ800	1.10E+01	5.5E+00	U		-	-
C14-C20 (Diesel Range)	MJ800	1.10E+01	5.5E+00	U		-	-
C20-C30 (Lubricant Oil Range)	MJ800	5.20E+00	5.2E+00	J		-	-
C11-C30	MJ800	-	1.6E+01	-		-	-
Benzene	MJ800	-	-	-	1.9E-06	-	-
Ethylbenzene	MJ800	-	-	-	1.5E-05	-	-
Toluene	MJ800	-	-	-	1.1E-05	-	-
m,p-Xylene	MJ800	-	-	-	1.8E-05	-	-
o-Xylene	MJ800	-	-	-	6.9E-06	-	-
Xylene (total)	MJ800	-	-	-	2.6E-05	-	-
2-Methylnaphthalene	MJ800	2.20E-02	1.1E-02	U	2.8E-02	-	1.1E-02
Acenaphthene	MJ800	2.20E-02	1.1E-02	U	4.5E-04	7.2E-03	7.2E-03
Acenaphthylene	MJ800	2.20E-02	1.1E-02	U	9.3E-05	1.5E-03	1.5E-03
Anthracene	MJ800	2.20E-02	1.1E-02	U	2.4E-04	3.9E-03	3.9E-03
Benzo(a)anthracene	MJ800	2.20E-02	1.1E-02	U	9.5E-06	1.5E-04	1.5E-04
Benzo(a)pyrene	MJ800	2.20E-02	1.1E-02	U	1.2E-05	1.9E-04	1.9E-04
Benzo(b)fluoranthene	MJ800	2.20E-02	1.1E-02	U	5.2E-06	8.3E-05	8.3E-05
Benzo(e)pyrene	MJ800	-	-	-	1.5E-05	2.5E-04	2.5E-04
Benzo(g,h,i)perylene	MJ800	2.20E-02	1.1E-02	U	2.7E-04	4.4E-03	4.4E-03
Benzo(k)fluoranthene	MJ800	2.20E-02	1.1E-02	U	1.7E-06	2.7E-05	2.7E-05
Chrysene	MJ800	2.20E-02	1.1E-02	U	1.4E-05	2.2E-04	2.2E-04
Dibenz(a,h)anthracene	MJ800	2.20E-02	1.1E-02	U	1.4E-05	2.2E-04	2.2E-04
Fluoranthene	MJ800	2.20E-02	1.1E-02	U	4.8E-05	7.7E-04	7.7E-04
Fluorene	MJ800	2.20E-02	1.1E-02	U	6.0E-04	9.8E-03	9.8E-03
Indeno(1,2,3-cd)pyrene	MJ800	2.20E-02	1.1E-02	U	1.8E-05	3.0E-04	3.0E-04
Naphthalene	MJ800	2.20E-02	1.1E-02	U	6.9E-03	-	1.1E-02
Perylene	MJ800	-	-	-	1.1E-05	1.7E-04	1.7E-04
Phenanthrene	MJ800	2.20E-02	1.1E-02	U	1.2E-03	1.9E-02	1.1E-02
Pyrene	MJ800	2.20E-02	1.1E-02	U	2.1E-04	3.3E-03	3.3E-03
C08-C11 (Gasoline Range)	MJ806	5.70E+00	2.9E+00	U		-	-
C11-C14 (Kerosene Range)	MJ806	5.70E+00	2.9E+00	U		-	-
C14-C20 (Diesel Range)	MJ806	5.70E+00	2.9E+00	U		-	-
C20-C30 (Lubricant Oil Range)	MJ806	1.80E+01	1.8E+01	J		-	-
C11-C30	MJ806	-	2.4E+01	-		-	-
Benzene	MJ806	-	-	-	1.9E-06	-	-
Ethylbenzene	MJ806	-	-	-	1.5E-05	-	-
Toluene	MJ806	-	-	-	1.1E-05	-	-
m,p-Xylene	MJ806	-	-	-	1.8E-05	-	-
o-Xylene	MJ806	-	-	-	6.9E-06	-	-
Xylene (total)	MJ806	-	-	-	2.6E-05	-	-
2-Methylnaphthalene	MJ806	7.50E-03	7.5E-03	J	2.8E-02	-	7.5E-03
Acenaphthene	MJ806	2.30E-02	1.2E-02	U	4.5E-04	1.1E-02	1.1E-02
Acenaphthylene	MJ806	2.30E-02	1.2E-02	U	9.3E-05	2.2E-03	2.2E-03

TPH to Petroleum Constituent Extrapolation for Soil (0-4 feet bgs) [a]
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Anthracene	MJ806	2.30E-02	1.2E-02	U	2.4E-04	5.7E-03	5.7E-03
Benzo(a)anthracene	MJ806	2.30E-02	1.2E-02	U	9.5E-06	2.2E-04	2.2E-04
Benzo(a)pyrene	MJ806	2.60E-03	2.6E-03	J	1.2E-05	2.8E-04	2.6E-03
Benzo(b)fluoranthene	MJ806	2.20E-03	2.2E-03	J	5.2E-06	1.2E-04	2.2E-03
Benzo(e)pyrene	MJ806	-	-	-	1.5E-05	3.6E-04	3.6E-04
Benzo(g,h,i)perylene	MJ806	2.30E-02	1.2E-02	U	2.7E-04	6.5E-03	6.5E-03
Benzo(k)fluoranthene	MJ806	2.30E-02	1.2E-02	U	1.7E-06	3.9E-05	3.9E-05
Chrysene	MJ806	1.00E-02	1.0E-02	J	1.4E-05	3.2E-04	1.0E-02
Dibenz(a,h)anthracene	MJ806	2.30E-02	1.2E-02	U	1.4E-05	3.3E-04	3.3E-04
Fluoranthene	MJ806	3.90E-03	3.9E-03	J	4.8E-05	1.1E-03	3.9E-03
Fluorene	MJ806	2.30E-02	1.2E-02	U	6.0E-04	1.4E-02	1.2E-02
Indeno(1,2,3-cd)pyrene	MJ806	2.30E-02	1.2E-02	U	1.8E-05	4.4E-04	4.4E-04
Naphthalene	MJ806	7.90E-03	7.9E-03	J	6.9E-03	-	7.9E-03
Perylene	MJ806	-	-	-	1.1E-05	2.6E-04	2.6E-04
Phenanthrene	MJ806	2.30E-02	1.2E-02	U	1.2E-03	2.8E-02	1.2E-02
Pyrene	MJ806	9.30E-03	9.3E-03	J	2.1E-04	4.9E-03	9.3E-03
C08-C11 (Gasoline Range)	MJ808	5.90E+00	3.0E+00	U		-	-
C11-C14 (Kerosene Range)	MJ808	5.90E+00	3.0E+00	U		-	-
C14-C20 (Diesel Range)	MJ808	7.00E+00	7.0E+00	J		-	-
C20-C30 (Lubricant Oil Range)	MJ808	8.80E+00	8.8E+00	J		-	-
C11-C30	MJ808	-	1.9E+01	-		-	-
Benzene	MJ808	-	-	-	1.9E-06	-	-
Ethylbenzene	MJ808	-	-	-	1.5E-05	-	-
Toluene	MJ808	-	-	-	1.1E-05	-	-
m,p-Xylene	MJ808	-	-	-	1.8E-05	-	-
o-Xylene	MJ808	-	-	-	6.9E-06	-	-
Xylene (total)	MJ808	-	-	-	2.6E-05	-	-
2-Methylnaphthalene	MJ808	2.50E-02	1.3E-02	U	2.8E-02	-	1.3E-02
Acenaphthene	MJ808	2.50E-02	1.3E-02	U	4.5E-04	8.4E-03	8.4E-03
Acenaphthylene	MJ808	2.50E-02	1.3E-02	U	9.3E-05	1.7E-03	1.7E-03
Anthracene	MJ808	2.50E-02	1.3E-02	U	2.4E-04	4.5E-03	4.5E-03
Benzo(a)anthracene	MJ808	5.50E-03	5.5E-03	J	9.5E-06	1.8E-04	5.5E-03
Benzo(a)pyrene	MJ808	2.50E-02	1.3E-02	U	1.2E-05	2.2E-04	2.2E-04
Benzo(b)fluoranthene	MJ808	2.30E-03	2.3E-03	J	5.2E-06	9.7E-05	2.3E-03
Benzo(e)pyrene	MJ808	-	-	-	1.5E-05	2.9E-04	2.9E-04
Benzo(g,h,i)perylene	MJ808	2.50E-02	1.3E-02	U	2.7E-04	5.1E-03	5.1E-03
Benzo(k)fluoranthene	MJ808	2.50E-02	1.3E-02	U	1.7E-06	3.1E-05	3.1E-05
Chrysene	MJ808	7.80E-03	7.8E-03	J	1.4E-05	2.6E-04	7.8E-03
Dibenz(a,h)anthracene	MJ808	2.50E-02	1.3E-02	U	1.4E-05	2.6E-04	2.6E-04
Fluoranthene	MJ808	6.10E-03	6.1E-03	J	4.8E-05	8.9E-04	6.1E-03
Fluorene	MJ808	2.50E-02	1.3E-02	U	6.0E-04	1.1E-02	1.1E-02
Indeno(1,2,3-cd)pyrene	MJ808	2.50E-02	1.3E-02	U	1.8E-05	3.4E-04	3.4E-04
Naphthalene	MJ808	2.50E-02	1.3E-02	U	6.9E-03	-	1.3E-02
Perylene	MJ808	-	-	-	1.1E-05	2.0E-04	2.0E-04
Phenanthrene	MJ808	2.50E-02	1.3E-02	U	1.2E-03	2.2E-02	1.3E-02
Pyrene	MJ808	5.10E-03	5.1E-03	J	2.1E-04	3.8E-03	5.1E-03

Notes:
a. Petroleum constituent concentrations estimated and selected as described in Section 2.8 of the SRAM.
"-" not applicable
EF - extrapolation factor
mg/kg - milligrams per kilogram

Aroclor to PCB Congener Extrapolation (0-4 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentrations (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF_{1254}	EF_{1260}	Estimated Concentrations Aroclor-1254 (mg/kg)	Estimated Concentrations Aroclor-1260 (mg/kg)	Estimated Concentrations PCB_{MAX} (mg/kg)
Aroclor-1254	MJ669	7.5E-02	7.5E-02	J	-	-	-	-	-
Aroclor-1260	MJ669	4.3E-02	4.3E-02	J	-	-	-	-	-
PCB-105	MJ669	-	-	-	1.2E-01	8.2E-02	9.3E-06	3.5E-06	9.3E-06
PCB-114	MJ669	-	-	-	4.5E-03	1.5E-03	3.4E-07	6.3E-08	3.4E-07
PCB-118	MJ669	-	-	-	2.7E-01	1.6E-01	2.0E-05	7.0E-06	2.0E-05
PCB-123	MJ669	-	-	-	3.0E-03	2.3E-03	2.2E-07	1.0E-07	2.2E-07
PCB-126	MJ669	-	-	-	7.5E-03	6.4E-03	5.6E-07	2.7E-07	5.6E-07
PCB-156	MJ669	-	-	-	6.3E-02	5.5E-02	4.7E-06	2.3E-06	4.7E-06
PCB-157	MJ669	-	-	-	1.2E-02	2.5E-02	9.3E-07	1.1E-06	1.1E-06
PCB-167	MJ669	-	-	-	2.1E-02	4.3E-02	1.5E-06	1.8E-06	1.8E-06
PCB-169	MJ669	-	-	-	3.7E-04	6.4E-04	2.7E-08	2.7E-08	2.7E-08
PCB-189	MJ669	-	-	-	3.0E-03	6.4E-03	2.2E-07	2.7E-07	2.7E-07
PCB-77	MJ669	-	-	-	1.5E-02	1.3E-02	1.2E-06	5.5E-07	1.2E-06
PCB-81	MJ669	-	-	-	3.0E-03	2.3E-03	2.2E-07	9.7E-08	2.2E-07
Aroclor-1254	MJ670	3.7E-02	3.7E-02	J	-	-	-	-	-
Aroclor-1260	MJ670	4.6E-02	4.6E-02	J	-	-	-	-	-
PCB-105	MJ670	-	-	-	1.2E-01	8.2E-02	4.6E-06	3.8E-06	4.6E-06
PCB-114	MJ670	-	-	-	4.5E-03	1.5E-03	1.7E-07	6.7E-08	1.7E-07
PCB-118	MJ670	-	-	-	2.7E-01	1.6E-01	9.9E-06	7.5E-06	9.9E-06
PCB-123	MJ670	-	-	-	3.0E-03	2.3E-03	1.1E-07	1.1E-07	1.1E-07
PCB-126	MJ670	-	-	-	7.5E-03	6.4E-03	2.8E-07	2.9E-07	2.9E-07
PCB-156	MJ670	-	-	-	6.3E-02	5.5E-02	2.3E-06	2.5E-06	2.5E-06
PCB-157	MJ670	-	-	-	1.2E-02	2.5E-02	4.6E-07	1.1E-06	1.1E-06
PCB-167	MJ670	-	-	-	2.1E-02	4.3E-02	7.6E-07	2.0E-06	2.0E-06
PCB-169	MJ670	-	-	-	3.7E-04	6.4E-04	1.4E-08	2.9E-08	2.9E-08
PCB-189	MJ670	-	-	-	3.0E-03	6.4E-03	1.1E-07	2.9E-07	2.9E-07
PCB-77	MJ670	-	-	-	1.5E-02	1.3E-02	5.7E-07	5.9E-07	5.9E-07
PCB-81	MJ670	-	-	-	3.0E-03	2.3E-03	1.1E-07	1.0E-07	1.1E-07
Aroclor-1254	MJ671	1.2E-01	1.2E-01	J	-	-	-	-	-
Aroclor-1260	MJ671	8.5E-02	8.5E-02	J	-	-	-	-	-
PCB-105	MJ671	-	-	-	1.2E-01	8.2E-02	1.5E-05	7.0E-06	1.5E-05
PCB-114	MJ671	-	-	-	4.5E-03	1.5E-03	5.4E-07	1.2E-07	5.4E-07
PCB-118	MJ671	-	-	-	2.7E-01	1.6E-01	3.2E-05	1.4E-05	3.2E-05
PCB-123	MJ671	-	-	-	3.0E-03	2.3E-03	3.6E-07	2.0E-07	3.6E-07
PCB-126	MJ671	-	-	-	7.5E-03	6.4E-03	9.0E-07	5.4E-07	9.0E-07
PCB-156	MJ671	-	-	-	6.3E-02	5.5E-02	7.5E-06	4.6E-06	7.5E-06
PCB-157	MJ671	-	-	-	1.2E-02	2.5E-02	1.5E-06	2.1E-06	2.1E-06
PCB-167	MJ671	-	-	-	2.1E-02	4.3E-02	2.5E-06	3.6E-06	3.6E-06
PCB-169	MJ671	-	-	-	3.7E-04	6.4E-04	4.4E-08	5.4E-08	5.4E-08
PCB-189	MJ671	-	-	-	3.0E-03	6.4E-03	3.6E-07	5.4E-07	5.4E-07
PCB-77	MJ671	-	-	-	1.5E-02	1.3E-02	1.9E-06	1.1E-06	1.9E-06
PCB-81	MJ671	-	-	-	3.0E-03	2.3E-03	3.6E-07	1.9E-07	3.6E-07
Aroclor-1254	MJ683	4.0E-01	2.0E-01	U	-	-	-	-	-
Aroclor-1260	MJ683	9.5E-02	9.5E-02		-	-	-	-	-
PCB-105	MJ683	-	-	-	1.2E-01	8.2E-02	2.5E-05	7.8E-06	2.5E-05
PCB-114	MJ683	-	-	-	4.5E-03	1.5E-03	9.1E-07	1.4E-07	9.1E-07
PCB-118	MJ683	-	-	-	2.7E-01	1.6E-01	5.4E-05	1.6E-05	5.4E-05
PCB-123	MJ683	-	-	-	3.0E-03	2.3E-03	6.0E-07	2.2E-07	6.0E-07
PCB-126	MJ683	-	-	-	7.5E-03	6.4E-03	1.5E-06	6.0E-07	1.5E-06
PCB-156	MJ683	-	-	-	6.3E-02	5.5E-02	1.3E-05	5.2E-06	1.3E-05
PCB-157	MJ683	-	-	-	1.2E-02	2.5E-02	2.5E-06	2.3E-06	2.5E-06
PCB-167	MJ683	-	-	-	2.1E-02	4.3E-02	4.1E-06	4.1E-06	4.1E-06
PCB-169	MJ683	-	-	-	3.7E-04	6.4E-04	7.3E-08	6.0E-08	7.3E-08
PCB-189	MJ683	-	-	-	3.0E-03	6.4E-03	6.0E-07	6.0E-07	6.0E-07
PCB-77	MJ683	-	-	-	1.5E-02	1.3E-02	3.1E-06	1.2E-06	3.1E-06
PCB-81	MJ683	-	-	-	3.0E-03	2.3E-03	6.0E-07	2.1E-07	6.0E-07

Aroclor to PCB Congener Extrapolation (0-4 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentrations (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF_{1254}	EF_{1260}	Estimated Concentrations Aroclor-1254 (mg/kg)	Estimated Concentrations Aroclor-1260 (mg/kg)	Estimated Concentrations PCB_{MAX} (mg/kg)
Aroclor-1254	MJ704	5.2E-02	2.6E-02	U	-	-	-	-	-
Aroclor-1260	MJ704	5.2E-02	2.6E-02	U	-	-	-	-	-
PCB-105	MJ704	-	-	-	1.2E-01	8.2E-02	3.2E-06	2.1E-06	3.2E-06
PCB-114	MJ704	-	-	-	4.5E-03	1.5E-03	1.2E-07	3.8E-08	1.2E-07
PCB-118	MJ704	-	-	-	2.7E-01	1.6E-01	7.0E-06	4.3E-06	7.0E-06
PCB-123	MJ704	-	-	-	3.0E-03	2.3E-03	7.8E-08	6.0E-08	7.8E-08
PCB-126	MJ704	-	-	-	7.5E-03	6.4E-03	2.0E-07	1.7E-07	2.0E-07
PCB-156	MJ704	-	-	-	6.3E-02	5.5E-02	1.6E-06	1.4E-06	1.6E-06
PCB-157	MJ704	-	-	-	1.2E-02	2.5E-02	3.2E-07	6.4E-07	6.4E-07
PCB-167	MJ704	-	-	-	2.1E-02	4.3E-02	5.4E-07	1.1E-06	1.1E-06
PCB-169	MJ704	-	-	-	3.7E-04	6.4E-04	9.5E-09	1.7E-08	1.7E-08
PCB-189	MJ704	-	-	-	3.0E-03	6.4E-03	7.8E-08	1.7E-07	1.7E-07
PCB-77	MJ704	-	-	-	1.5E-02	1.3E-02	4.0E-07	3.3E-07	4.0E-07
PCB-81	MJ704	-	-	-	3.0E-03	2.3E-03	7.8E-08	5.9E-08	7.8E-08
Aroclor-1254	MJ705	8.1E-02	4.1E-02	U	-	-	-	-	-
Aroclor-1260	MJ705	8.1E-02	4.1E-02	U	-	-	-	-	-
PCB-105	MJ705	-	-	-	1.2E-01	8.2E-02	5.0E-06	3.3E-06	5.0E-06
PCB-114	MJ705	-	-	-	4.5E-03	1.5E-03	1.8E-07	5.9E-08	1.8E-07
PCB-118	MJ705	-	-	-	2.7E-01	1.6E-01	1.1E-05	6.6E-06	1.1E-05
PCB-123	MJ705	-	-	-	3.0E-03	2.3E-03	1.2E-07	9.4E-08	1.2E-07
PCB-126	MJ705	-	-	-	7.5E-03	6.4E-03	3.0E-07	2.6E-07	3.0E-07
PCB-156	MJ705	-	-	-	6.3E-02	5.5E-02	2.5E-06	2.2E-06	2.5E-06
PCB-157	MJ705	-	-	-	1.2E-02	2.5E-02	5.0E-07	9.9E-07	9.9E-07
PCB-167	MJ705	-	-	-	2.1E-02	4.3E-02	8.4E-07	1.7E-06	1.7E-06
PCB-169	MJ705	-	-	-	3.7E-04	6.4E-04	1.5E-08	2.6E-08	2.6E-08
PCB-189	MJ705	-	-	-	3.0E-03	6.4E-03	1.2E-07	2.6E-07	2.6E-07
PCB-77	MJ705	-	-	-	1.5E-02	1.3E-02	6.3E-07	5.2E-07	6.3E-07
PCB-81	MJ705	-	-	-	3.0E-03	2.3E-03	1.2E-07	9.1E-08	1.2E-07
Aroclor-1254	MJ707	5.1E-02	2.6E-02	U	-	-	-	-	-
Aroclor-1260	MJ707	5.1E-02	2.6E-02	U	-	-	-	-	-
PCB-105	MJ707	-	-	-	1.2E-01	8.2E-02	3.2E-06	2.1E-06	3.2E-06
PCB-114	MJ707	-	-	-	4.5E-03	1.5E-03	1.2E-07	3.7E-08	1.2E-07
PCB-118	MJ707	-	-	-	2.7E-01	1.6E-01	6.8E-06	4.2E-06	6.8E-06
PCB-123	MJ707	-	-	-	3.0E-03	2.3E-03	7.6E-08	5.9E-08	7.6E-08
PCB-126	MJ707	-	-	-	7.5E-03	6.4E-03	1.9E-07	1.6E-07	1.9E-07
PCB-156	MJ707	-	-	-	6.3E-02	5.5E-02	1.6E-06	1.4E-06	1.6E-06
PCB-157	MJ707	-	-	-	1.2E-02	2.5E-02	3.2E-07	6.3E-07	6.3E-07
PCB-167	MJ707	-	-	-	2.1E-02	4.3E-02	5.3E-07	1.1E-06	1.1E-06
PCB-169	MJ707	-	-	-	3.7E-04	6.4E-04	9.3E-09	1.6E-08	1.6E-08
PCB-189	MJ707	-	-	-	3.0E-03	6.4E-03	7.6E-08	1.6E-07	1.6E-07
PCB-77	MJ707	-	-	-	1.5E-02	1.3E-02	3.9E-07	3.2E-07	3.9E-07
PCB-81	MJ707	-	-	-	3.0E-03	2.3E-03	7.6E-08	5.7E-08	7.6E-08
Aroclor-1254	MJ708	7.9E-02	4.0E-02	U	-	-	-	-	-
Aroclor-1260	MJ708	7.9E-02	4.0E-02	U	-	-	-	-	-
PCB-105	MJ708	-	-	-	1.2E-01	8.2E-02	4.9E-06	3.2E-06	4.9E-06
PCB-114	MJ708	-	-	-	4.5E-03	1.5E-03	1.8E-07	5.7E-08	1.8E-07
PCB-118	MJ708	-	-	-	2.7E-01	1.6E-01	1.1E-05	6.5E-06	1.1E-05
PCB-123	MJ708	-	-	-	3.0E-03	2.3E-03	1.2E-07	9.2E-08	1.2E-07
PCB-126	MJ708	-	-	-	7.5E-03	6.4E-03	3.0E-07	2.5E-07	3.0E-07
PCB-156	MJ708	-	-	-	6.3E-02	5.5E-02	2.5E-06	2.2E-06	2.5E-06
PCB-157	MJ708	-	-	-	1.2E-02	2.5E-02	4.9E-07	9.7E-07	9.7E-07
PCB-167	MJ708	-	-	-	2.1E-02	4.3E-02	8.1E-07	1.7E-06	1.7E-06
PCB-169	MJ708	-	-	-	3.7E-04	6.4E-04	1.4E-08	2.5E-08	2.5E-08
PCB-189	MJ708	-	-	-	3.0E-03	6.4E-03	1.2E-07	2.5E-07	2.5E-07
PCB-77	MJ708	-	-	-	1.5E-02	1.3E-02	6.1E-07	5.0E-07	6.1E-07
PCB-81	MJ708	-	-	-	3.0E-03	2.3E-03	1.2E-07	8.9E-08	1.2E-07
Aroclor-1254	MJ709	5.4E-02	2.7E-02	UJ	-	-	-	-	-
Aroclor-1260	MJ709	5.4E-02	2.7E-02	UJ	-	-	-	-	-

Aroclor to PCB Congener Extrapolation (0-4 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentrations (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF_{1254}	EF_{1260}	Estimated Concentrations Aroclor-1254 (mg/kg)	Estimated Concentrations Aroclor-1260 (mg/kg)	Estimated Concentrations PCB_{MAX} (mg/kg)
PCB-105	MJ709	-	-	-	1.2E-01	8.2E-02	3.3E-06	2.2E-06	3.3E-06
PCB-114	MJ709	-	-	-	4.5E-03	1.5E-03	1.2E-07	3.9E-08	1.2E-07
PCB-118	MJ709	-	-	-	2.7E-01	1.6E-01	7.2E-06	4.4E-06	7.2E-06
PCB-123	MJ709	-	-	-	3.0E-03	2.3E-03	8.1E-08	6.3E-08	8.1E-08
PCB-126	MJ709	-	-	-	7.5E-03	6.4E-03	2.0E-07	1.7E-07	2.0E-07
PCB-156	MJ709	-	-	-	6.3E-02	5.5E-02	1.7E-06	1.5E-06	1.7E-06
PCB-157	MJ709	-	-	-	1.2E-02	2.5E-02	3.3E-07	6.6E-07	6.6E-07
PCB-167	MJ709	-	-	-	2.1E-02	4.3E-02	5.6E-07	1.2E-06	1.2E-06
PCB-169	MJ709	-	-	-	3.7E-04	6.4E-04	9.9E-09	1.7E-08	1.7E-08
PCB-189	MJ709	-	-	-	3.0E-03	6.4E-03	8.1E-08	1.7E-07	1.7E-07
PCB-77	MJ709	-	-	-	1.5E-02	1.3E-02	4.2E-07	3.4E-07	4.2E-07
PCB-81	MJ709	-	-	-	3.0E-03	2.3E-03	8.1E-08	6.1E-08	8.1E-08
Aroclor-1254	MJ710	7.9E-02	4.0E-02	U	-	-	-	-	-
Aroclor-1260	MJ710	2.3E-01	2.3E-01		-	-	-	-	-
PCB-105	MJ710	-	-	-	1.2E-01	8.2E-02	4.9E-06	1.9E-05	1.9E-05
PCB-114	MJ710	-	-	-	4.5E-03	1.5E-03	1.8E-07	3.3E-07	3.3E-07
PCB-118	MJ710	-	-	-	2.7E-01	1.6E-01	1.1E-05	3.8E-05	3.8E-05
PCB-123	MJ710	-	-	-	3.0E-03	2.3E-03	1.2E-07	5.3E-07	5.3E-07
PCB-126	MJ710	-	-	-	7.5E-03	6.4E-03	3.0E-07	1.5E-06	1.5E-06
PCB-156	MJ710	-	-	-	6.3E-02	5.5E-02	2.5E-06	1.3E-05	1.3E-05
PCB-157	MJ710	-	-	-	1.2E-02	2.5E-02	4.9E-07	5.6E-06	5.6E-06
PCB-167	MJ710	-	-	-	2.1E-02	4.3E-02	8.1E-07	9.8E-06	9.8E-06
PCB-169	MJ710	-	-	-	3.7E-04	6.4E-04	1.4E-08	1.5E-07	1.5E-07
PCB-189	MJ710	-	-	-	3.0E-03	6.4E-03	1.2E-07	1.5E-06	1.5E-06
PCB-77	MJ710	-	-	-	1.5E-02	1.3E-02	6.1E-07	2.9E-06	2.9E-06
PCB-81	MJ710	-	-	-	3.0E-03	2.3E-03	1.2E-07	5.2E-07	5.2E-07
Aroclor-1254	MJ739	8.4E-02	4.2E-02	U	-	-	-	-	-
Aroclor-1260	MJ739	8.4E-02	4.2E-02	U	-	-	-	-	-
PCB-105	MJ739	-	-	-	1.2E-01	8.2E-02	5.2E-06	3.4E-06	5.2E-06
PCB-114	MJ739	-	-	-	4.5E-03	1.5E-03	1.9E-07	6.1E-08	1.9E-07
PCB-118	MJ739	-	-	-	2.7E-01	1.6E-01	1.1E-05	6.9E-06	1.1E-05
PCB-123	MJ739	-	-	-	3.0E-03	2.3E-03	1.3E-07	9.7E-08	1.3E-07
PCB-126	MJ739	-	-	-	7.5E-03	6.4E-03	3.2E-07	2.7E-07	3.2E-07
PCB-156	MJ739	-	-	-	6.3E-02	5.5E-02	2.6E-06	2.3E-06	2.6E-06
PCB-157	MJ739	-	-	-	1.2E-02	2.5E-02	5.2E-07	1.0E-06	1.0E-06
PCB-167	MJ739	-	-	-	2.1E-02	4.3E-02	8.7E-07	1.8E-06	1.8E-06
PCB-169	MJ739	-	-	-	3.7E-04	6.4E-04	1.5E-08	2.7E-08	2.7E-08
PCB-189	MJ739	-	-	-	3.0E-03	6.4E-03	1.3E-07	2.7E-07	2.7E-07
PCB-77	MJ739	-	-	-	1.5E-02	1.3E-02	6.5E-07	5.3E-07	6.5E-07
PCB-81	MJ739	-	-	-	3.0E-03	2.3E-03	1.3E-07	9.5E-08	1.3E-07
Aroclor-1254	MJ744	2.6E-01	2.6E-01		-	-	-	-	-
Aroclor-1260	MJ744	9.2E-02	4.6E-02	U	-	-	-	-	-
PCB-105	MJ744	-	-	-	1.2E-01	8.2E-02	3.2E-05	3.8E-06	3.2E-05
PCB-114	MJ744	-	-	-	4.5E-03	1.5E-03	1.2E-06	6.7E-08	1.2E-06
PCB-118	MJ744	-	-	-	2.7E-01	1.6E-01	7.0E-05	7.5E-06	7.0E-05
PCB-123	MJ744	-	-	-	3.0E-03	2.3E-03	7.8E-07	1.1E-07	7.8E-07
PCB-126	MJ744	-	-	-	7.5E-03	6.4E-03	2.0E-06	2.9E-07	2.0E-06
PCB-156	MJ744	-	-	-	6.3E-02	5.5E-02	1.6E-05	2.5E-06	1.6E-05
PCB-157	MJ744	-	-	-	1.2E-02	2.5E-02	3.2E-06	1.1E-06	3.2E-06
PCB-167	MJ744	-	-	-	2.1E-02	4.3E-02	5.4E-06	2.0E-06	5.4E-06
PCB-169	MJ744	-	-	-	3.7E-04	6.4E-04	9.5E-08	2.9E-08	9.5E-08
PCB-189	MJ744	-	-	-	3.0E-03	6.4E-03	7.8E-07	2.9E-07	7.8E-07
PCB-77	MJ744	-	-	-	1.5E-02	1.3E-02	4.0E-06	5.9E-07	4.0E-06
PCB-81	MJ744	-	-	-	3.0E-03	2.3E-03	7.8E-07	1.0E-07	7.8E-07
Aroclor-1254	MJ745	3.5E-01	3.5E-01		-	-	-	-	-
Aroclor-1260	MJ745	1.0E-01	5.0E-02	U	-	-	-	-	-
PCB-105	MJ745	-	-	-	1.2E-01	8.2E-02	4.3E-05	4.1E-06	4.3E-05
PCB-114	MJ745	-	-	-	4.5E-03	1.5E-03	1.6E-06	7.3E-08	1.6E-06

Aroclor to PCB Congener Extrapolation (0-4 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentrations (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF_{1254}	EF_{1260}	Estimated Concentrations Aroclor-1254 (mg/kg)	Estimated Concentrations Aroclor-1260 (mg/kg)	Estimated Concentrations PCB_{MAX} (mg/kg)
PCB-118	MJ745	-	-	-	2.7E-01	1.6E-01	9.4E-05	8.2E-06	9.4E-05
PCB-123	MJ745	-	-	-	3.0E-03	2.3E-03	1.0E-06	1.2E-07	1.0E-06
PCB-126	MJ745	-	-	-	7.5E-03	6.4E-03	2.6E-06	3.2E-07	2.6E-06
PCB-156	MJ745	-	-	-	6.3E-02	5.5E-02	2.2E-05	2.7E-06	2.2E-05
PCB-157	MJ745	-	-	-	1.2E-02	2.5E-02	4.3E-06	1.2E-06	4.3E-06
PCB-167	MJ745	-	-	-	2.1E-02	4.3E-02	7.2E-06	2.1E-06	7.2E-06
PCB-169	MJ745	-	-	-	3.7E-04	6.4E-04	1.3E-07	3.2E-08	1.3E-07
PCB-189	MJ745	-	-	-	3.0E-03	6.4E-03	1.0E-06	3.2E-07	1.0E-06
PCB-77	MJ745	-	-	-	1.5E-02	1.3E-02	5.4E-06	6.4E-07	5.4E-06
PCB-81	MJ745	-	-	-	3.0E-03	2.3E-03	1.0E-06	1.1E-07	1.0E-06
Aroclor-1254	MJ746	1.8E-01	9.0E-02	UJ	-	-	-	-	-
Aroclor-1260	MJ746	1.8E-01	9.0E-02	UJ	-	-	-	-	-
PCB-105	MJ746	-	-	-	1.2E-01	8.2E-02	1.1E-05	7.4E-06	1.1E-05
PCB-114	MJ746	-	-	-	4.5E-03	1.5E-03	4.1E-07	1.3E-07	4.1E-07
PCB-118	MJ746	-	-	-	2.7E-01	1.6E-01	2.4E-05	1.5E-05	2.4E-05
PCB-123	MJ746	-	-	-	3.0E-03	2.3E-03	2.7E-07	2.1E-07	2.7E-07
PCB-126	MJ746	-	-	-	7.5E-03	6.4E-03	6.8E-07	5.7E-07	6.8E-07
PCB-156	MJ746	-	-	-	6.3E-02	5.5E-02	5.7E-06	4.9E-06	5.7E-06
PCB-157	MJ746	-	-	-	1.2E-02	2.5E-02	1.1E-06	2.2E-06	2.2E-06
PCB-167	MJ746	-	-	-	2.1E-02	4.3E-02	1.9E-06	3.8E-06	3.8E-06
PCB-169	MJ746	-	-	-	3.7E-04	6.4E-04	3.3E-08	5.7E-08	5.7E-08
PCB-189	MJ746	-	-	-	3.0E-03	6.4E-03	2.7E-07	5.7E-07	5.7E-07
PCB-77	MJ746	-	-	-	1.5E-02	1.3E-02	1.4E-06	1.1E-06	1.4E-06
PCB-81	MJ746	-	-	-	3.0E-03	2.3E-03	2.7E-07	2.0E-07	2.7E-07
Aroclor-1254	MJ747	1.8E-01	9.0E-02	UJ	-	-	-	-	-
Aroclor-1260	MJ747	1.8E-01	9.0E-02	UJ	-	-	-	-	-
PCB-105	MJ747	-	-	-	1.2E-01	8.2E-02	1.1E-05	7.4E-06	1.1E-05
PCB-114	MJ747	-	-	-	4.5E-03	1.5E-03	4.1E-07	1.3E-07	4.1E-07
PCB-118	MJ747	-	-	-	2.7E-01	1.6E-01	2.4E-05	1.5E-05	2.4E-05
PCB-123	MJ747	-	-	-	3.0E-03	2.3E-03	2.7E-07	2.1E-07	2.7E-07
PCB-126	MJ747	-	-	-	7.5E-03	6.4E-03	6.8E-07	5.7E-07	6.8E-07
PCB-156	MJ747	-	-	-	6.3E-02	5.5E-02	5.7E-06	4.9E-06	5.7E-06
PCB-157	MJ747	-	-	-	1.2E-02	2.5E-02	1.1E-06	2.2E-06	2.2E-06
PCB-167	MJ747	-	-	-	2.1E-02	4.3E-02	1.9E-06	3.8E-06	3.8E-06
PCB-169	MJ747	-	-	-	3.7E-04	6.4E-04	3.3E-08	5.7E-08	5.7E-08
PCB-189	MJ747	-	-	-	3.0E-03	6.4E-03	2.7E-07	5.7E-07	5.7E-07
PCB-77	MJ747	-	-	-	1.5E-02	1.3E-02	1.4E-06	1.1E-06	1.4E-06
PCB-81	MJ747	-	-	-	3.0E-03	2.3E-03	2.7E-07	2.0E-07	2.7E-07
Aroclor-1254	MJ748	2.2E-01	2.2E-01	J	-	-	-	-	-
Aroclor-1260	MJ748	2.0E-01	2.0E-01	J	-	-	-	-	-
PCB-105	MJ748	-	-	-	1.2E-01	8.2E-02	2.7E-05	1.6E-05	2.7E-05
PCB-114	MJ748	-	-	-	4.5E-03	1.5E-03	1.0E-06	2.9E-07	1.0E-06
PCB-118	MJ748	-	-	-	2.7E-01	1.6E-01	5.9E-05	3.3E-05	5.9E-05
PCB-123	MJ748	-	-	-	3.0E-03	2.3E-03	6.6E-07	4.6E-07	6.6E-07
PCB-126	MJ748	-	-	-	7.5E-03	6.4E-03	1.7E-06	1.3E-06	1.7E-06
PCB-156	MJ748	-	-	-	6.3E-02	5.5E-02	1.4E-05	1.1E-05	1.4E-05
PCB-157	MJ748	-	-	-	1.2E-02	2.5E-02	2.7E-06	4.9E-06	4.9E-06
PCB-167	MJ748	-	-	-	2.1E-02	4.3E-02	4.5E-06	8.5E-06	8.5E-06
PCB-169	MJ748	-	-	-	3.7E-04	6.4E-04	8.1E-08	1.3E-07	1.3E-07
PCB-189	MJ748	-	-	-	3.0E-03	6.4E-03	6.6E-07	1.3E-06	1.3E-06
PCB-77	MJ748	-	-	-	1.5E-02	1.3E-02	3.4E-06	2.5E-06	3.4E-06
PCB-81	MJ748	-	-	-	3.0E-03	2.3E-03	6.6E-07	4.5E-07	6.6E-07
Aroclor-1254	MJ750	4.6E-01	4.6E-01	J	-	-	-	-	-
Aroclor-1260	MJ750	2.0E-01	1.0E-01	UJ	-	-	-	-	-
PCB-105	MJ750	-	-	-	1.2E-01	8.2E-02	5.7E-05	8.2E-06	5.7E-05
PCB-114	MJ750	-	-	-	4.5E-03	1.5E-03	2.1E-06	1.5E-07	2.1E-06
PCB-118	MJ750	-	-	-	2.7E-01	1.6E-01	1.2E-04	1.6E-05	1.2E-04
PCB-123	MJ750	-	-	-	3.0E-03	2.3E-03	1.4E-06	2.3E-07	1.4E-06

Aroclor to PCB Congener Extrapolation (0-4 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentrations (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF_{1254}	EF_{1260}	Estimated Concentrations Aroclor-1254 (mg/kg)	Estimated Concentrations Aroclor-1260 (mg/kg)	Estimated Concentrations PCB_{MAX} (mg/kg)
PCB-126	MJ750	-	-	-	7.5E-03	6.4E-03	3.5E-06	6.4E-07	3.5E-06
PCB-156	MJ750	-	-	-	6.3E-02	5.5E-02	2.9E-05	5.5E-06	2.9E-05
PCB-157	MJ750	-	-	-	1.2E-02	2.5E-02	5.7E-06	2.5E-06	5.7E-06
PCB-167	MJ750	-	-	-	2.1E-02	4.3E-02	9.5E-06	4.3E-06	9.5E-06
PCB-169	MJ750	-	-	-	3.7E-04	6.4E-04	1.7E-07	6.4E-08	1.7E-07
PCB-189	MJ750	-	-	-	3.0E-03	6.4E-03	1.4E-06	6.4E-07	1.4E-06
PCB-77	MJ750	-	-	-	1.5E-02	1.3E-02	7.1E-06	1.3E-06	7.1E-06
PCB-81	MJ750	-	-	-	3.0E-03	2.3E-03	1.4E-06	2.3E-07	1.4E-06
Aroclor-1254	MJ752	8.9E-02	4.5E-02	UJ	-	-	-	-	-
Aroclor-1260	MJ752	8.9E-02	4.5E-02	UJ	-	-	-	-	-
PCB-105	MJ752	-	-	-	1.2E-01	8.2E-02	5.5E-06	3.6E-06	5.5E-06
PCB-114	MJ752	-	-	-	4.5E-03	1.5E-03	2.0E-07	6.5E-08	2.0E-07
PCB-118	MJ752	-	-	-	2.7E-01	1.6E-01	1.2E-05	7.3E-06	1.2E-05
PCB-123	MJ752	-	-	-	3.0E-03	2.3E-03	1.3E-07	1.0E-07	1.3E-07
PCB-126	MJ752	-	-	-	7.5E-03	6.4E-03	3.3E-07	2.8E-07	3.3E-07
PCB-156	MJ752	-	-	-	6.3E-02	5.5E-02	2.8E-06	2.4E-06	2.8E-06
PCB-157	MJ752	-	-	-	1.2E-02	2.5E-02	5.5E-07	1.1E-06	1.1E-06
PCB-167	MJ752	-	-	-	2.1E-02	4.3E-02	9.2E-07	1.9E-06	1.9E-06
PCB-169	MJ752	-	-	-	3.7E-04	6.4E-04	1.6E-08	2.8E-08	2.8E-08
PCB-189	MJ752	-	-	-	3.0E-03	6.4E-03	1.3E-07	2.8E-07	2.8E-07
PCB-77	MJ752	-	-	-	1.5E-02	1.3E-02	6.9E-07	5.7E-07	6.9E-07
PCB-81	MJ752	-	-	-	3.0E-03	2.3E-03	1.3E-07	1.0E-07	1.3E-07
Aroclor-1254	MJ754	2.4E-01	2.4E-01	J	-	-	-	-	-
Aroclor-1260	MJ754	1.1E-01	1.1E-01	J	-	-	-	-	-
PCB-105	MJ754	-	-	-	1.2E-01	8.2E-02	3.0E-05	9.0E-06	3.0E-05
PCB-114	MJ754	-	-	-	4.5E-03	1.5E-03	1.1E-06	1.6E-07	1.1E-06
PCB-118	MJ754	-	-	-	2.7E-01	1.6E-01	6.4E-05	1.8E-05	6.4E-05
PCB-123	MJ754	-	-	-	3.0E-03	2.3E-03	7.2E-07	2.6E-07	7.2E-07
PCB-126	MJ754	-	-	-	7.5E-03	6.4E-03	1.8E-06	7.0E-07	1.8E-06
PCB-156	MJ754	-	-	-	6.3E-02	5.5E-02	1.5E-05	6.0E-06	1.5E-05
PCB-157	MJ754	-	-	-	1.2E-02	2.5E-02	3.0E-06	2.7E-06	3.0E-06
PCB-167	MJ754	-	-	-	2.1E-02	4.3E-02	4.9E-06	4.7E-06	4.9E-06
PCB-169	MJ754	-	-	-	3.7E-04	6.4E-04	8.8E-08	7.0E-08	8.8E-08
PCB-189	MJ754	-	-	-	3.0E-03	6.4E-03	7.2E-07	7.0E-07	7.2E-07
PCB-77	MJ754	-	-	-	1.5E-02	1.3E-02	3.7E-06	1.4E-06	3.7E-06
PCB-81	MJ754	-	-	-	3.0E-03	2.3E-03	7.2E-07	2.5E-07	7.2E-07
Aroclor-1254	MJ756	6.0E-02	6.0E-02	J	-	-	-	-	-
Aroclor-1260	MJ756	8.4E-02	4.2E-02	UJ	-	-	-	-	-
PCB-105	MJ756	-	-	-	1.2E-01	8.2E-02	7.4E-06	3.4E-06	7.4E-06
PCB-114	MJ756	-	-	-	4.5E-03	1.5E-03	2.7E-07	6.1E-08	2.7E-07
PCB-118	MJ756	-	-	-	2.7E-01	1.6E-01	1.6E-05	6.9E-06	1.6E-05
PCB-123	MJ756	-	-	-	3.0E-03	2.3E-03	1.8E-07	9.7E-08	1.8E-07
PCB-126	MJ756	-	-	-	7.5E-03	6.4E-03	4.5E-07	2.7E-07	4.5E-07
PCB-156	MJ756	-	-	-	6.3E-02	5.5E-02	3.8E-06	2.3E-06	3.8E-06
PCB-157	MJ756	-	-	-	1.2E-02	2.5E-02	7.4E-07	1.0E-06	1.0E-06
PCB-167	MJ756	-	-	-	2.1E-02	4.3E-02	1.2E-06	1.8E-06	1.8E-06
PCB-169	MJ756	-	-	-	3.7E-04	6.4E-04	2.2E-08	2.7E-08	2.7E-08
PCB-189	MJ756	-	-	-	3.0E-03	6.4E-03	1.8E-07	2.7E-07	2.7E-07
PCB-77	MJ756	-	-	-	1.5E-02	1.3E-02	9.3E-07	5.3E-07	9.3E-07
PCB-81	MJ756	-	-	-	3.0E-03	2.3E-03	1.8E-07	9.5E-08	1.8E-07
Aroclor-1254	MJ781	8.9E-02	4.5E-02	U	-	-	-	-	-
Aroclor-1260	MJ781	8.9E-02	4.5E-02	U	-	-	-	-	-
PCB-105	MJ781	-	-	-	1.2E-01	8.2E-02	5.5E-06	3.6E-06	5.5E-06
PCB-114	MJ781	-	-	-	4.5E-03	1.5E-03	2.0E-07	6.5E-08	2.0E-07
PCB-118	MJ781	-	-	-	2.7E-01	1.6E-01	1.2E-05	7.3E-06	1.2E-05
PCB-123	MJ781	-	-	-	3.0E-03	2.3E-03	1.3E-07	1.0E-07	1.3E-07
PCB-126	MJ781	-	-	-	7.5E-03	6.4E-03	3.3E-07	2.8E-07	3.3E-07
PCB-156	MJ781	-	-	-	6.3E-02	5.5E-02	2.8E-06	2.4E-06	2.8E-06

Aroclor to PCB Congener Extrapolation (0-4 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentrations (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF_{1254}	EF_{1260}	Estimated Concentrations Aroclor-1254 (mg/kg)	Estimated Concentrations Aroclor-1260 (mg/kg)	Estimated Concentrations PCB_{MAX} (mg/kg)
PCB-157	MJ781	-	-	-	1.2E-02	2.5E-02	5.5E-07	1.1E-06	1.1E-06
PCB-167	MJ781	-	-	-	2.1E-02	4.3E-02	9.2E-07	1.9E-06	1.9E-06
PCB-169	MJ781	-	-	-	3.7E-04	6.4E-04	1.6E-08	2.8E-08	2.8E-08
PCB-189	MJ781	-	-	-	3.0E-03	6.4E-03	1.3E-07	2.8E-07	2.8E-07
PCB-77	MJ781	-	-	-	1.5E-02	1.3E-02	6.9E-07	5.7E-07	6.9E-07
PCB-81	MJ781	-	-	-	3.0E-03	2.3E-03	1.3E-07	1.0E-07	1.3E-07
Aroclor-1254	MJ782RE	5.4E+00	5.4E+00	J	-	-	-	-	-
Aroclor-1260	MJ782RE	4.3E-01	4.3E-01	J	-	-	-	-	-
PCB-105	MJ782RE	-	-	-	1.2E-01	8.2E-02	6.7E-04	3.5E-05	6.7E-04
PCB-114	MJ782RE	-	-	-	4.5E-03	1.5E-03	2.4E-05	6.3E-07	2.4E-05
PCB-118	MJ782RE	-	-	-	2.7E-01	1.6E-01	1.4E-03	7.0E-05	1.4E-03
PCB-123	MJ782RE	-	-	-	3.0E-03	2.3E-03	1.6E-05	1.0E-06	1.6E-05
PCB-126	MJ782RE	-	-	-	7.5E-03	6.4E-03	4.1E-05	2.7E-06	4.1E-05
PCB-156	MJ782RE	-	-	-	6.3E-02	5.5E-02	3.4E-04	2.3E-05	3.4E-04
PCB-157	MJ782RE	-	-	-	1.2E-02	2.5E-02	6.7E-05	1.1E-05	6.7E-05
PCB-167	MJ782RE	-	-	-	2.1E-02	4.3E-02	1.1E-04	1.8E-05	1.1E-04
PCB-169	MJ782RE	-	-	-	3.7E-04	6.4E-04	2.0E-06	2.7E-07	2.0E-06
PCB-189	MJ782RE	-	-	-	3.0E-03	6.4E-03	1.6E-05	2.7E-06	1.6E-05
PCB-77	MJ782RE	-	-	-	1.5E-02	1.3E-02	8.4E-05	5.5E-06	8.4E-05
PCB-81	MJ782RE	-	-	-	3.0E-03	2.3E-03	1.6E-05	9.7E-07	1.6E-05
Aroclor-1254	MJ783	8.9E-02	4.5E-02	U	-	-	-	-	-
Aroclor-1260	MJ783	8.9E-02	4.5E-02	U	-	-	-	-	-
PCB-105	MJ783	-	-	-	1.2E-01	8.2E-02	5.5E-06	3.6E-06	5.5E-06
PCB-114	MJ783	-	-	-	4.5E-03	1.5E-03	2.0E-07	6.5E-08	2.0E-07
PCB-118	MJ783	-	-	-	2.7E-01	1.6E-01	1.2E-05	7.3E-06	1.2E-05
PCB-123	MJ783	-	-	-	3.0E-03	2.3E-03	1.3E-07	1.0E-07	1.3E-07
PCB-126	MJ783	-	-	-	7.5E-03	6.4E-03	3.3E-07	2.8E-07	3.3E-07
PCB-156	MJ783	-	-	-	6.3E-02	5.5E-02	2.8E-06	2.4E-06	2.8E-06
PCB-157	MJ783	-	-	-	1.2E-02	2.5E-02	5.5E-07	1.1E-06	1.1E-06
PCB-167	MJ783	-	-	-	2.1E-02	4.3E-02	9.2E-07	1.9E-06	1.9E-06
PCB-169	MJ783	-	-	-	3.7E-04	6.4E-04	1.6E-08	2.8E-08	2.8E-08
PCB-189	MJ783	-	-	-	3.0E-03	6.4E-03	1.3E-07	2.8E-07	2.8E-07
PCB-77	MJ783	-	-	-	1.5E-02	1.3E-02	6.9E-07	5.7E-07	6.9E-07
PCB-81	MJ783	-	-	-	3.0E-03	2.3E-03	1.3E-07	1.0E-07	1.3E-07
Aroclor-1254	MJ784	8.6E+01	4.3E+01	U	-	-	-	-	-
Aroclor-1260	MJ784	6.3E+02	6.3E+02	J	-	-	-	-	-
PCB-105	MJ784	-	-	-	1.2E-01	8.2E-02	5.3E-03	5.2E-02	5.2E-02
PCB-114	MJ784	-	-	-	4.5E-03	1.5E-03	2.0E-04	9.2E-04	9.2E-04
PCB-118	MJ784	-	-	-	2.7E-01	1.6E-01	1.2E-02	1.0E-01	1.0E-01
PCB-123	MJ784	-	-	-	3.0E-03	2.3E-03	1.3E-04	1.5E-03	1.5E-03
PCB-126	MJ784	-	-	-	7.5E-03	6.4E-03	3.2E-04	4.0E-03	4.0E-03
PCB-156	MJ784	-	-	-	6.3E-02	5.5E-02	2.7E-03	3.4E-02	3.4E-02
PCB-157	MJ784	-	-	-	1.2E-02	2.5E-02	5.3E-04	1.5E-02	1.5E-02
PCB-167	MJ784	-	-	-	2.1E-02	4.3E-02	8.9E-04	2.7E-02	2.7E-02
PCB-169	MJ784	-	-	-	3.7E-04	6.4E-04	1.6E-05	4.0E-04	4.0E-04
PCB-189	MJ784	-	-	-	3.0E-03	6.4E-03	1.3E-04	4.0E-03	4.0E-03
PCB-77	MJ784	-	-	-	1.5E-02	1.3E-02	6.6E-04	8.0E-03	8.0E-03
PCB-81	MJ784	-	-	-	3.0E-03	2.3E-03	1.3E-04	1.4E-03	1.4E-03
Aroclor-1254	MJ786	9.4E-02	4.7E-02	U	-	-	-	-	-
Aroclor-1260	MJ786	9.4E-02	4.7E-02	U	-	-	-	-	-
PCB-105	MJ786	-	-	-	1.2E-01	8.2E-02	5.8E-06	3.8E-06	5.8E-06
PCB-114	MJ786	-	-	-	4.5E-03	1.5E-03	2.1E-07	6.8E-08	2.1E-07
PCB-118	MJ786	-	-	-	2.7E-01	1.6E-01	1.3E-05	7.7E-06	1.3E-05
PCB-123	MJ786	-	-	-	3.0E-03	2.3E-03	1.4E-07	1.1E-07	1.4E-07
PCB-126	MJ786	-	-	-	7.5E-03	6.4E-03	3.5E-07	3.0E-07	3.5E-07
PCB-156	MJ786	-	-	-	6.3E-02	5.5E-02	3.0E-06	2.6E-06	3.0E-06
PCB-157	MJ786	-	-	-	1.2E-02	2.5E-02	5.8E-07	1.2E-06	1.2E-06
PCB-167	MJ786	-	-	-	2.1E-02	4.3E-02	9.7E-07	2.0E-06	2.0E-06

Aroclor to PCB Congener Extrapolation (0-4 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentrations (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF_{1254}	EF_{1260}	Estimated Concentrations Aroclor-1254 (mg/kg)	Estimated Concentrations Aroclor-1260 (mg/kg)	Estimated Concentrations PCB_{MAX} (mg/kg)
PCB-169	MJ786	-	-	-	3.7E-04	6.4E-04	1.7E-08	3.0E-08	3.0E-08
PCB-189	MJ786	-	-	-	3.0E-03	6.4E-03	1.4E-07	3.0E-07	3.0E-07
PCB-77	MJ786	-	-	-	1.5E-02	1.3E-02	7.3E-07	6.0E-07	7.3E-07
PCB-81	MJ786	-	-	-	3.0E-03	2.3E-03	1.4E-07	1.1E-07	1.4E-07
Aroclor-1254	MJ787	2.5E-01	2.5E-01	J	-	-	-	-	-
Aroclor-1260	MJ787	9.6E-02	4.8E-02	U	-	-	-	-	-
PCB-105	MJ787	-	-	-	1.2E-01	8.2E-02	3.1E-05	3.9E-06	3.1E-05
PCB-114	MJ787	-	-	-	4.5E-03	1.5E-03	1.1E-06	7.0E-08	1.1E-06
PCB-118	MJ787	-	-	-	2.7E-01	1.6E-01	6.7E-05	7.9E-06	6.7E-05
PCB-123	MJ787	-	-	-	3.0E-03	2.3E-03	7.5E-07	1.1E-07	7.5E-07
PCB-126	MJ787	-	-	-	7.5E-03	6.4E-03	1.9E-06	3.1E-07	1.9E-06
PCB-156	MJ787	-	-	-	6.3E-02	5.5E-02	1.6E-05	2.6E-06	1.6E-05
PCB-157	MJ787	-	-	-	1.2E-02	2.5E-02	3.1E-06	1.2E-06	3.1E-06
PCB-167	MJ787	-	-	-	2.1E-02	4.3E-02	5.2E-06	2.1E-06	5.2E-06
PCB-169	MJ787	-	-	-	3.7E-04	6.4E-04	9.1E-08	3.1E-08	9.1E-08
PCB-189	MJ787	-	-	-	3.0E-03	6.4E-03	7.5E-07	3.1E-07	7.5E-07
PCB-77	MJ787	-	-	-	1.5E-02	1.3E-02	3.9E-06	6.1E-07	3.9E-06
PCB-81	MJ787	-	-	-	3.0E-03	2.3E-03	7.5E-07	1.1E-07	7.5E-07
Aroclor-1254	MJ788	9.1E-02	4.6E-02	U	-	-	-	-	-
Aroclor-1260	MJ788	9.1E-02	4.6E-02	U	-	-	-	-	-
PCB-105	MJ788	-	-	-	1.2E-01	8.2E-02	5.6E-06	3.7E-06	5.6E-06
PCB-114	MJ788	-	-	-	4.5E-03	1.5E-03	2.1E-07	6.6E-08	2.1E-07
PCB-118	MJ788	-	-	-	2.7E-01	1.6E-01	1.2E-05	7.4E-06	1.2E-05
PCB-123	MJ788	-	-	-	3.0E-03	2.3E-03	1.4E-07	1.1E-07	1.4E-07
PCB-126	MJ788	-	-	-	7.5E-03	6.4E-03	3.4E-07	2.9E-07	3.4E-07
PCB-156	MJ788	-	-	-	6.3E-02	5.5E-02	2.9E-06	2.5E-06	2.9E-06
PCB-157	MJ788	-	-	-	1.2E-02	2.5E-02	5.6E-07	1.1E-06	1.1E-06
PCB-167	MJ788	-	-	-	2.1E-02	4.3E-02	9.4E-07	1.9E-06	1.9E-06
PCB-169	MJ788	-	-	-	3.7E-04	6.4E-04	1.7E-08	2.9E-08	2.9E-08
PCB-189	MJ788	-	-	-	3.0E-03	6.4E-03	1.4E-07	2.9E-07	2.9E-07
PCB-77	MJ788	-	-	-	1.5E-02	1.3E-02	7.0E-07	5.8E-07	7.0E-07
PCB-81	MJ788	-	-	-	3.0E-03	2.3E-03	1.4E-07	1.0E-07	1.4E-07
Aroclor-1254	MJ789	5.6E-02	2.8E-02	U	-	-	-	-	-
Aroclor-1260	MJ789	5.6E-02	2.8E-02	U	-	-	-	-	-
PCB-105	MJ789	-	-	-	1.2E-01	8.2E-02	3.5E-06	2.3E-06	3.5E-06
PCB-114	MJ789	-	-	-	4.5E-03	1.5E-03	1.3E-07	4.1E-08	1.3E-07
PCB-118	MJ789	-	-	-	2.7E-01	1.6E-01	7.5E-06	4.6E-06	7.5E-06
PCB-123	MJ789	-	-	-	3.0E-03	2.3E-03	8.4E-08	6.5E-08	8.4E-08
PCB-126	MJ789	-	-	-	7.5E-03	6.4E-03	2.1E-07	1.8E-07	2.1E-07
PCB-156	MJ789	-	-	-	6.3E-02	5.5E-02	1.8E-06	1.5E-06	1.8E-06
PCB-157	MJ789	-	-	-	1.2E-02	2.5E-02	3.5E-07	6.9E-07	6.9E-07
PCB-167	MJ789	-	-	-	2.1E-02	4.3E-02	5.8E-07	1.2E-06	1.2E-06
PCB-169	MJ789	-	-	-	3.7E-04	6.4E-04	1.0E-08	1.8E-08	1.8E-08
PCB-189	MJ789	-	-	-	3.0E-03	6.4E-03	8.4E-08	1.8E-07	1.8E-07
PCB-77	MJ789	-	-	-	1.5E-02	1.3E-02	4.3E-07	3.6E-07	4.3E-07
PCB-81	MJ789	-	-	-	3.0E-03	2.3E-03	8.4E-08	6.3E-08	8.4E-08
Aroclor-1254	MJ790	9.1E-02	4.6E-02	U	-	-	-	-	-
Aroclor-1260	MJ790	9.1E-02	4.6E-02	U	-	-	-	-	-
PCB-105	MJ790	-	-	-	1.2E-01	8.2E-02	5.6E-06	3.7E-06	5.6E-06
PCB-114	MJ790	-	-	-	4.5E-03	1.5E-03	2.1E-07	6.6E-08	2.1E-07
PCB-118	MJ790	-	-	-	2.7E-01	1.6E-01	1.2E-05	7.4E-06	1.2E-05
PCB-123	MJ790	-	-	-	3.0E-03	2.3E-03	1.4E-07	1.1E-07	1.4E-07
PCB-126	MJ790	-	-	-	7.5E-03	6.4E-03	3.4E-07	2.9E-07	3.4E-07
PCB-156	MJ790	-	-	-	6.3E-02	5.5E-02	2.9E-06	2.5E-06	2.9E-06
PCB-157	MJ790	-	-	-	1.2E-02	2.5E-02	5.6E-07	1.1E-06	1.1E-06
PCB-167	MJ790	-	-	-	2.1E-02	4.3E-02	9.4E-07	1.9E-06	1.9E-06
PCB-169	MJ790	-	-	-	3.7E-04	6.4E-04	1.7E-08	2.9E-08	2.9E-08
PCB-189	MJ790	-	-	-	3.0E-03	6.4E-03	1.4E-07	2.9E-07	2.9E-07

Aroclor to PCB Congener Extrapolation (0-4 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentrations (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF_{1254}	EF_{1260}	Estimated Concentrations Aroclor-1254 (mg/kg)	Estimated Concentrations Aroclor-1260 (mg/kg)	Estimated Concentrations PCB_{MAX} (mg/kg)
PCB-77	MJ790	-	-	-	1.5E-02	1.3E-02	7.0E-07	5.8E-07	7.0E-07
PCB-81	MJ790	-	-	-	3.0E-03	2.3E-03	1.4E-07	1.0E-07	1.4E-07
Aroclor-1254	MJ791	8.6E-02	4.3E-02	U	-	-	-	-	-
Aroclor-1260	MJ791	8.6E-02	4.3E-02	U	-	-	-	-	-
PCB-105	MJ791	-	-	-	1.2E-01	8.2E-02	5.3E-06	3.5E-06	5.3E-06
PCB-114	MJ791	-	-	-	4.5E-03	1.5E-03	2.0E-07	6.3E-08	2.0E-07
PCB-118	MJ791	-	-	-	2.7E-01	1.6E-01	1.2E-05	7.0E-06	1.2E-05
PCB-123	MJ791	-	-	-	3.0E-03	2.3E-03	1.3E-07	1.0E-07	1.3E-07
PCB-126	MJ791	-	-	-	7.5E-03	6.4E-03	3.2E-07	2.7E-07	3.2E-07
PCB-156	MJ791	-	-	-	6.3E-02	5.5E-02	2.7E-06	2.3E-06	2.7E-06
PCB-157	MJ791	-	-	-	1.2E-02	2.5E-02	5.3E-07	1.1E-06	1.1E-06
PCB-167	MJ791	-	-	-	2.1E-02	4.3E-02	8.9E-07	1.8E-06	1.8E-06
PCB-169	MJ791	-	-	-	3.7E-04	6.4E-04	1.6E-08	2.7E-08	2.7E-08
PCB-189	MJ791	-	-	-	3.0E-03	6.4E-03	1.3E-07	2.7E-07	2.7E-07
PCB-77	MJ791	-	-	-	1.5E-02	1.3E-02	6.6E-07	5.5E-07	6.6E-07
PCB-81	MJ791	-	-	-	3.0E-03	2.3E-03	1.3E-07	9.7E-08	1.3E-07
Aroclor-1254	MJ794	9.0E-02	4.5E-02	U	-	-	-	-	-
Aroclor-1260	MJ794	9.0E-02	4.5E-02	U	-	-	-	-	-
PCB-105	MJ794	-	-	-	1.2E-01	8.2E-02	5.6E-06	3.7E-06	5.6E-06
PCB-114	MJ794	-	-	-	4.5E-03	1.5E-03	2.0E-07	6.5E-08	2.0E-07
PCB-118	MJ794	-	-	-	2.7E-01	1.6E-01	1.2E-05	7.4E-06	1.2E-05
PCB-123	MJ794	-	-	-	3.0E-03	2.3E-03	1.3E-07	1.0E-07	1.3E-07
PCB-126	MJ794	-	-	-	7.5E-03	6.4E-03	3.4E-07	2.9E-07	3.4E-07
PCB-156	MJ794	-	-	-	6.3E-02	5.5E-02	2.8E-06	2.5E-06	2.8E-06
PCB-157	MJ794	-	-	-	1.2E-02	2.5E-02	5.6E-07	1.1E-06	1.1E-06
PCB-167	MJ794	-	-	-	2.1E-02	4.3E-02	9.3E-07	1.9E-06	1.9E-06
PCB-169	MJ794	-	-	-	3.7E-04	6.4E-04	1.6E-08	2.9E-08	2.9E-08
PCB-189	MJ794	-	-	-	3.0E-03	6.4E-03	1.3E-07	2.9E-07	2.9E-07
PCB-77	MJ794	-	-	-	1.5E-02	1.3E-02	7.0E-07	5.7E-07	7.0E-07
PCB-81	MJ794	-	-	-	3.0E-03	2.3E-03	1.3E-07	1.0E-07	1.3E-07
Aroclor-1254	MJ795	1.0E-01	5.0E-02	U	-	-	-	-	-
Aroclor-1260	MJ795	1.0E-01	5.0E-02	U	-	-	-	-	-
PCB-105	MJ795	-	-	-	1.2E-01	8.2E-02	6.2E-06	4.1E-06	6.2E-06
PCB-114	MJ795	-	-	-	4.5E-03	1.5E-03	2.3E-07	7.3E-08	2.3E-07
PCB-118	MJ795	-	-	-	2.7E-01	1.6E-01	1.3E-05	8.2E-06	1.3E-05
PCB-123	MJ795	-	-	-	3.0E-03	2.3E-03	1.5E-07	1.2E-07	1.5E-07
PCB-126	MJ795	-	-	-	7.5E-03	6.4E-03	3.8E-07	3.2E-07	3.8E-07
PCB-156	MJ795	-	-	-	6.3E-02	5.5E-02	3.1E-06	2.7E-06	3.1E-06
PCB-157	MJ795	-	-	-	1.2E-02	2.5E-02	6.2E-07	1.2E-06	1.2E-06
PCB-167	MJ795	-	-	-	2.1E-02	4.3E-02	1.0E-06	2.1E-06	2.1E-06
PCB-169	MJ795	-	-	-	3.7E-04	6.4E-04	1.8E-08	3.2E-08	3.2E-08
PCB-189	MJ795	-	-	-	3.0E-03	6.4E-03	1.5E-07	3.2E-07	3.2E-07
PCB-77	MJ795	-	-	-	1.5E-02	1.3E-02	7.7E-07	6.4E-07	7.7E-07
PCB-81	MJ795	-	-	-	3.0E-03	2.3E-03	1.5E-07	1.1E-07	1.5E-07
Aroclor-1254	MJ796	1.9E-01	9.5E-02	U	-	-	-	-	-
Aroclor-1260	MJ796	1.9E-01	9.5E-02	U	-	-	-	-	-
PCB-105	MJ796	-	-	-	1.2E-01	8.2E-02	1.2E-05	7.8E-06	1.2E-05
PCB-114	MJ796	-	-	-	4.5E-03	1.5E-03	4.3E-07	1.4E-07	4.3E-07
PCB-118	MJ796	-	-	-	2.7E-01	1.6E-01	2.5E-05	1.6E-05	2.5E-05
PCB-123	MJ796	-	-	-	3.0E-03	2.3E-03	2.8E-07	2.2E-07	2.8E-07
PCB-126	MJ796	-	-	-	7.5E-03	6.4E-03	7.1E-07	6.0E-07	7.1E-07
PCB-156	MJ796	-	-	-	6.3E-02	5.5E-02	6.0E-06	5.2E-06	6.0E-06
PCB-157	MJ796	-	-	-	1.2E-02	2.5E-02	1.2E-06	2.3E-06	2.3E-06
PCB-167	MJ796	-	-	-	2.1E-02	4.3E-02	2.0E-06	4.1E-06	4.1E-06
PCB-169	MJ796	-	-	-	3.7E-04	6.4E-04	3.5E-08	6.0E-08	6.0E-08
PCB-189	MJ796	-	-	-	3.0E-03	6.4E-03	2.8E-07	6.0E-07	6.0E-07
PCB-77	MJ796	-	-	-	1.5E-02	1.3E-02	1.5E-06	1.2E-06	1.5E-06
PCB-81	MJ796	-	-	-	3.0E-03	2.3E-03	2.8E-07	2.1E-07	2.8E-07

Aroclor to PCB Congener Extrapolation (0-4 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentrations (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF_{1254}	EF_{1260}	Estimated Concentrations Aroclor-1254 (mg/kg)	Estimated Concentrations Aroclor-1260 (mg/kg)	Estimated Concentrations PCB_{MAX} (mg/kg)
Aroclor-1254	MJ798	8.4E-02	4.2E-02	U	-	-	-	-	-
Aroclor-1260	MJ798	8.4E-02	4.2E-02	U	-	-	-	-	-
PCB-105	MJ798	-	-	-	1.2E-01	8.2E-02	5.2E-06	3.4E-06	5.2E-06
PCB-114	MJ798	-	-	-	4.5E-03	1.5E-03	1.9E-07	6.1E-08	1.9E-07
PCB-118	MJ798	-	-	-	2.7E-01	1.6E-01	1.1E-05	6.9E-06	1.1E-05
PCB-123	MJ798	-	-	-	3.0E-03	2.3E-03	1.3E-07	9.7E-08	1.3E-07
PCB-126	MJ798	-	-	-	7.5E-03	6.4E-03	3.2E-07	2.7E-07	3.2E-07
PCB-156	MJ798	-	-	-	6.3E-02	5.5E-02	2.6E-06	2.3E-06	2.6E-06
PCB-157	MJ798	-	-	-	1.2E-02	2.5E-02	5.2E-07	1.0E-06	1.0E-06
PCB-167	MJ798	-	-	-	2.1E-02	4.3E-02	8.7E-07	1.8E-06	1.8E-06
PCB-169	MJ798	-	-	-	3.7E-04	6.4E-04	1.5E-08	2.7E-08	2.7E-08
PCB-189	MJ798	-	-	-	3.0E-03	6.4E-03	1.3E-07	2.7E-07	2.7E-07
PCB-77	MJ798	-	-	-	1.5E-02	1.3E-02	6.5E-07	5.3E-07	6.5E-07
PCB-81	MJ798	-	-	-	3.0E-03	2.3E-03	1.3E-07	9.5E-08	1.3E-07
Aroclor-1254	MJ799	8.2E-02	4.1E-02	U	-	-	-	-	-
Aroclor-1260	MJ799	8.2E-02	4.1E-02	U	-	-	-	-	-
PCB-105	MJ799	-	-	-	1.2E-01	8.2E-02	5.1E-06	3.4E-06	5.1E-06
PCB-114	MJ799	-	-	-	4.5E-03	1.5E-03	1.9E-07	6.0E-08	1.9E-07
PCB-118	MJ799	-	-	-	2.7E-01	1.6E-01	1.1E-05	6.7E-06	1.1E-05
PCB-123	MJ799	-	-	-	3.0E-03	2.3E-03	1.2E-07	9.5E-08	1.2E-07
PCB-126	MJ799	-	-	-	7.5E-03	6.4E-03	3.1E-07	2.6E-07	3.1E-07
PCB-156	MJ799	-	-	-	6.3E-02	5.5E-02	2.6E-06	2.2E-06	2.6E-06
PCB-157	MJ799	-	-	-	1.2E-02	2.5E-02	5.1E-07	1.0E-06	1.0E-06
PCB-167	MJ799	-	-	-	2.1E-02	4.3E-02	8.5E-07	1.8E-06	1.8E-06
PCB-169	MJ799	-	-	-	3.7E-04	6.4E-04	1.5E-08	2.6E-08	2.6E-08
PCB-189	MJ799	-	-	-	3.0E-03	6.4E-03	1.2E-07	2.6E-07	2.6E-07
PCB-77	MJ799	-	-	-	1.5E-02	1.3E-02	6.3E-07	5.2E-07	6.3E-07
PCB-81	MJ799	-	-	-	3.0E-03	2.3E-03	1.2E-07	9.2E-08	1.2E-07
Aroclor-1254	MJ800	8.1E-02	4.1E-02	U	-	-	-	-	-
Aroclor-1260	MJ800	8.1E-02	4.1E-02	U	-	-	-	-	-
PCB-105	MJ800	-	-	-	1.2E-01	8.2E-02	5.0E-06	3.3E-06	5.0E-06
PCB-114	MJ800	-	-	-	4.5E-03	1.5E-03	1.8E-07	5.9E-08	1.8E-07
PCB-118	MJ800	-	-	-	2.7E-01	1.6E-01	1.1E-05	6.6E-06	1.1E-05
PCB-123	MJ800	-	-	-	3.0E-03	2.3E-03	1.2E-07	9.4E-08	1.2E-07
PCB-126	MJ800	-	-	-	7.5E-03	6.4E-03	3.0E-07	2.6E-07	3.0E-07
PCB-156	MJ800	-	-	-	6.3E-02	5.5E-02	2.5E-06	2.2E-06	2.5E-06
PCB-157	MJ800	-	-	-	1.2E-02	2.5E-02	5.0E-07	9.9E-07	9.9E-07
PCB-167	MJ800	-	-	-	2.1E-02	4.3E-02	8.4E-07	1.7E-06	1.7E-06
PCB-169	MJ800	-	-	-	3.7E-04	6.4E-04	1.5E-08	2.6E-08	2.6E-08
PCB-189	MJ800	-	-	-	3.0E-03	6.4E-03	1.2E-07	2.6E-07	2.6E-07
PCB-77	MJ800	-	-	-	1.5E-02	1.3E-02	6.3E-07	5.2E-07	6.3E-07
PCB-81	MJ800	-	-	-	3.0E-03	2.3E-03	1.2E-07	9.1E-08	1.2E-07
Aroclor-1254	MJ803	9.6E-02	4.8E-02	U	-	-	-	-	-
Aroclor-1260	MJ803	9.6E-02	4.8E-02	U	-	-	-	-	-
PCB-105	MJ803	-	-	-	1.2E-01	8.2E-02	5.9E-06	3.9E-06	5.9E-06
PCB-114	MJ803	-	-	-	4.5E-03	1.5E-03	2.2E-07	7.0E-08	2.2E-07
PCB-118	MJ803	-	-	-	2.7E-01	1.6E-01	1.3E-05	7.9E-06	1.3E-05
PCB-123	MJ803	-	-	-	3.0E-03	2.3E-03	1.4E-07	1.1E-07	1.4E-07
PCB-126	MJ803	-	-	-	7.5E-03	6.4E-03	3.6E-07	3.1E-07	3.6E-07
PCB-156	MJ803	-	-	-	6.3E-02	5.5E-02	3.0E-06	2.6E-06	3.0E-06
PCB-157	MJ803	-	-	-	1.2E-02	2.5E-02	5.9E-07	1.2E-06	1.2E-06
PCB-167	MJ803	-	-	-	2.1E-02	4.3E-02	9.9E-07	2.1E-06	2.1E-06
PCB-169	MJ803	-	-	-	3.7E-04	6.4E-04	1.8E-08	3.1E-08	3.1E-08
PCB-189	MJ803	-	-	-	3.0E-03	6.4E-03	1.4E-07	3.1E-07	3.1E-07
PCB-77	MJ803	-	-	-	1.5E-02	1.3E-02	7.4E-07	6.1E-07	7.4E-07
PCB-81	MJ803	-	-	-	3.0E-03	2.3E-03	1.4E-07	1.1E-07	1.4E-07
Aroclor-1254	MJ805	9.4E-02	4.7E-02	U	-	-	-	-	-
Aroclor-1260	MJ805	9.4E-02	4.7E-02	U	-	-	-	-	-

Aroclor to PCB Congener Extrapolation (0-4 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentrations (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF_{1254}	EF_{1260}	Estimated Concentrations Aroclor-1254 (mg/kg)	Estimated Concentrations Aroclor-1260 (mg/kg)	Estimated Concentrations PCB_{MAX} (mg/kg)
PCB-105	MJ805	-	-	-	1.2E-01	8.2E-02	5.8E-06	3.8E-06	5.8E-06
PCB-114	MJ805	-	-	-	4.5E-03	1.5E-03	2.1E-07	6.8E-08	2.1E-07
PCB-118	MJ805	-	-	-	2.7E-01	1.6E-01	1.3E-05	7.7E-06	1.3E-05
PCB-123	MJ805	-	-	-	3.0E-03	2.3E-03	1.4E-07	1.1E-07	1.4E-07
PCB-126	MJ805	-	-	-	7.5E-03	6.4E-03	3.5E-07	3.0E-07	3.5E-07
PCB-156	MJ805	-	-	-	6.3E-02	5.5E-02	3.0E-06	2.6E-06	3.0E-06
PCB-157	MJ805	-	-	-	1.2E-02	2.5E-02	5.8E-07	1.2E-06	1.2E-06
PCB-167	MJ805	-	-	-	2.1E-02	4.3E-02	9.7E-07	2.0E-06	2.0E-06
PCB-169	MJ805	-	-	-	3.7E-04	6.4E-04	1.7E-08	3.0E-08	3.0E-08
PCB-189	MJ805	-	-	-	3.0E-03	6.4E-03	1.4E-07	3.0E-07	3.0E-07
PCB-77	MJ805	-	-	-	1.5E-02	1.3E-02	7.3E-07	6.0E-07	7.3E-07
PCB-81	MJ805	-	-	-	3.0E-03	2.3E-03	1.4E-07	1.1E-07	1.4E-07
Aroclor-1254	MJ806	8.6E-02	4.3E-02	U	-	-	-	-	-
Aroclor-1260	MJ806	8.6E-02	4.3E-02	U	-	-	-	-	-
PCB-105	MJ806	-	-	-	1.2E-01	8.2E-02	5.3E-06	3.5E-06	5.3E-06
PCB-114	MJ806	-	-	-	4.5E-03	1.5E-03	2.0E-07	6.3E-08	2.0E-07
PCB-118	MJ806	-	-	-	2.7E-01	1.6E-01	1.2E-05	7.0E-06	1.2E-05
PCB-123	MJ806	-	-	-	3.0E-03	2.3E-03	1.3E-07	1.0E-07	1.3E-07
PCB-126	MJ806	-	-	-	7.5E-03	6.4E-03	3.2E-07	2.7E-07	3.2E-07
PCB-156	MJ806	-	-	-	6.3E-02	5.5E-02	2.7E-06	2.3E-06	2.7E-06
PCB-157	MJ806	-	-	-	1.2E-02	2.5E-02	5.3E-07	1.1E-06	1.1E-06
PCB-167	MJ806	-	-	-	2.1E-02	4.3E-02	8.9E-07	1.8E-06	1.8E-06
PCB-169	MJ806	-	-	-	3.7E-04	6.4E-04	1.6E-08	2.7E-08	2.7E-08
PCB-189	MJ806	-	-	-	3.0E-03	6.4E-03	1.3E-07	2.7E-07	2.7E-07
PCB-77	MJ806	-	-	-	1.5E-02	1.3E-02	6.6E-07	5.5E-07	6.6E-07
PCB-81	MJ806	-	-	-	3.0E-03	2.3E-03	1.3E-07	9.7E-08	1.3E-07
Aroclor-1254	MJ808	8.9E+00	4.5E+00	U	-	-	-	-	-
Aroclor-1260	MJ808	8.9E+00	4.5E+00	U	-	-	-	-	-
PCB-105	MJ808	-	-	-	1.2E-01	8.2E-02	5.5E-04	3.6E-04	5.5E-04
PCB-114	MJ808	-	-	-	4.5E-03	1.5E-03	2.0E-05	6.5E-06	2.0E-05
PCB-118	MJ808	-	-	-	2.7E-01	1.6E-01	1.2E-03	7.3E-04	1.2E-03
PCB-123	MJ808	-	-	-	3.0E-03	2.3E-03	1.3E-05	1.0E-05	1.3E-05
PCB-126	MJ808	-	-	-	7.5E-03	6.4E-03	3.3E-05	2.8E-05	3.3E-05
PCB-156	MJ808	-	-	-	6.3E-02	5.5E-02	2.8E-04	2.4E-04	2.8E-04
PCB-157	MJ808	-	-	-	1.2E-02	2.5E-02	5.5E-05	1.1E-04	1.1E-04
PCB-167	MJ808	-	-	-	2.1E-02	4.3E-02	9.2E-05	1.9E-04	1.9E-04
PCB-169	MJ808	-	-	-	3.7E-04	6.4E-04	1.6E-06	2.8E-06	2.8E-06
PCB-189	MJ808	-	-	-	3.0E-03	6.4E-03	1.3E-05	2.8E-05	2.8E-05
PCB-77	MJ808	-	-	-	1.5E-02	1.3E-02	6.9E-05	5.7E-05	6.9E-05
PCB-81	MJ808	-	-	-	3.0E-03	2.3E-03	1.3E-05	1.0E-05	1.3E-05
Aroclor-1254	MJ814	5.6E-02	2.8E-02	U	-	-	-	-	-
Aroclor-1260	MJ814	5.6E-02	2.8E-02	U	-	-	-	-	-
PCB-105	MJ814	-	-	-	1.2E-01	8.2E-02	3.5E-06	2.3E-06	3.5E-06
PCB-114	MJ814	-	-	-	4.5E-03	1.5E-03	1.3E-07	4.1E-08	1.3E-07
PCB-118	MJ814	-	-	-	2.7E-01	1.6E-01	7.5E-06	4.6E-06	7.5E-06
PCB-123	MJ814	-	-	-	3.0E-03	2.3E-03	8.4E-08	6.5E-08	8.4E-08
PCB-126	MJ814	-	-	-	7.5E-03	6.4E-03	2.1E-07	1.8E-07	2.1E-07
PCB-156	MJ814	-	-	-	6.3E-02	5.5E-02	1.8E-06	1.5E-06	1.8E-06
PCB-157	MJ814	-	-	-	1.2E-02	2.5E-02	3.5E-07	6.9E-07	6.9E-07
PCB-167	MJ814	-	-	-	2.1E-02	4.3E-02	5.8E-07	1.2E-06	1.2E-06
PCB-169	MJ814	-	-	-	3.7E-04	6.4E-04	1.0E-08	1.8E-08	1.8E-08
PCB-189	MJ814	-	-	-	3.0E-03	6.4E-03	8.4E-08	1.8E-07	1.8E-07
PCB-77	MJ814	-	-	-	1.5E-02	1.3E-02	4.3E-07	3.6E-07	4.3E-07
PCB-81	MJ814	-	-	-	3.0E-03	2.3E-03	8.4E-08	6.3E-08	8.4E-08
Aroclor-1254	MT801	5.1E-02	2.6E-02	U	-	-	-	-	-
Aroclor-1260	MT801	5.1E-02	2.6E-02	U	-	-	-	-	-
PCB-105	MT801	-	-	-	1.2E-01	8.2E-02	3.2E-06	2.1E-06	3.2E-06
PCB-114	MT801	-	-	-	4.5E-03	1.5E-03	1.2E-07	3.7E-08	1.2E-07

Aroclor to PCB Congener Extrapolation (0-4 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentrations (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF_{1254}	EF_{1260}	Estimated Concentrations Aroclor-1254 (mg/kg)	Estimated Concentrations Aroclor-1260 (mg/kg)	Estimated Concentrations PCB_{MAX} (mg/kg)
PCB-118	MT801	-	-	-	2.7E-01	1.6E-01	6.8E-06	4.2E-06	6.8E-06
PCB-123	MT801	-	-	-	3.0E-03	2.3E-03	7.6E-08	5.9E-08	7.6E-08
PCB-126	MT801	-	-	-	7.5E-03	6.4E-03	1.9E-07	1.6E-07	1.9E-07
PCB-156	MT801	-	-	-	6.3E-02	5.5E-02	1.6E-06	1.4E-06	1.6E-06
PCB-157	MT801	-	-	-	1.2E-02	2.5E-02	3.2E-07	6.3E-07	6.3E-07
PCB-167	MT801	-	-	-	2.1E-02	4.3E-02	5.3E-07	1.1E-06	1.1E-06
PCB-169	MT801	-	-	-	3.7E-04	6.4E-04	9.3E-09	1.6E-08	1.6E-08
PCB-189	MT801	-	-	-	3.0E-03	6.4E-03	7.6E-08	1.6E-07	1.6E-07
PCB-77	MT801	-	-	-	1.5E-02	1.3E-02	3.9E-07	3.2E-07	3.9E-07
PCB-81	MT801	-	-	-	3.0E-03	2.3E-03	7.6E-08	5.7E-08	7.6E-08
Aroclor-1254	MT802	5.1E-02	2.6E-02	U	-	-	-	-	-
Aroclor-1260	MT802	5.1E-02	2.6E-02	U	-	-	-	-	-
PCB-105	MT802	-	-	-	1.2E-01	8.2E-02	3.2E-06	2.1E-06	3.2E-06
PCB-114	MT802	-	-	-	4.5E-03	1.5E-03	1.2E-07	3.7E-08	1.2E-07
PCB-118	MT802	-	-	-	2.7E-01	1.6E-01	6.8E-06	4.2E-06	6.8E-06
PCB-123	MT802	-	-	-	3.0E-03	2.3E-03	7.6E-08	5.9E-08	7.6E-08
PCB-126	MT802	-	-	-	7.5E-03	6.4E-03	1.9E-07	1.6E-07	1.9E-07
PCB-156	MT802	-	-	-	6.3E-02	5.5E-02	1.6E-06	1.4E-06	1.6E-06
PCB-157	MT802	-	-	-	1.2E-02	2.5E-02	3.2E-07	6.3E-07	6.3E-07
PCB-167	MT802	-	-	-	2.1E-02	4.3E-02	5.3E-07	1.1E-06	1.1E-06
PCB-169	MT802	-	-	-	3.7E-04	6.4E-04	9.3E-09	1.6E-08	1.6E-08
PCB-189	MT802	-	-	-	3.0E-03	6.4E-03	7.6E-08	1.6E-07	1.6E-07
PCB-77	MT802	-	-	-	1.5E-02	1.3E-02	3.9E-07	3.2E-07	3.9E-07
PCB-81	MT802	-	-	-	3.0E-03	2.3E-03	7.6E-08	5.7E-08	7.6E-08
Aroclor-1254	RJ777	3.5E-02	1.8E-02	U	-	-	-	-	-
Aroclor-1260	RJ777	3.5E-02	1.8E-02	U	-	-	-	-	-
PCB-105	RJ777	-	-	-	1.2E-01	8.2E-02	2.2E-06	1.4E-06	2.2E-06
PCB-114	RJ777	-	-	-	4.5E-03	1.5E-03	7.9E-08	2.5E-08	7.9E-08
PCB-118	RJ777	-	-	-	2.7E-01	1.6E-01	4.7E-06	2.9E-06	4.7E-06
PCB-123	RJ777	-	-	-	3.0E-03	2.3E-03	5.2E-08	4.1E-08	5.2E-08
PCB-126	RJ777	-	-	-	7.5E-03	6.4E-03	1.3E-07	1.1E-07	1.3E-07
PCB-156	RJ777	-	-	-	6.3E-02	5.5E-02	1.1E-06	9.5E-07	1.1E-06
PCB-157	RJ777	-	-	-	1.2E-02	2.5E-02	2.2E-07	4.3E-07	4.3E-07
PCB-167	RJ777	-	-	-	2.1E-02	4.3E-02	3.6E-07	7.5E-07	7.5E-07
PCB-169	RJ777	-	-	-	3.7E-04	6.4E-04	6.4E-09	1.1E-08	1.1E-08
PCB-189	RJ777	-	-	-	3.0E-03	6.4E-03	5.2E-08	1.1E-07	1.1E-07
PCB-77	RJ777	-	-	-	1.5E-02	1.3E-02	2.7E-07	2.2E-07	2.7E-07
PCB-81	RJ777	-	-	-	3.0E-03	2.3E-03	5.2E-08	3.9E-08	5.2E-08
Aroclor-1254	RJ782	6.7E-02	3.4E-02	U	-	-	-	-	-
Aroclor-1260	RJ782	6.7E-02	3.4E-02	U	-	-	-	-	-
PCB-105	RJ782	-	-	-	1.2E-01	8.2E-02	4.1E-06	2.7E-06	4.1E-06
PCB-114	RJ782	-	-	-	4.5E-03	1.5E-03	1.5E-07	4.9E-08	1.5E-07
PCB-118	RJ782	-	-	-	2.7E-01	1.6E-01	9.0E-06	5.5E-06	9.0E-06
PCB-123	RJ782	-	-	-	3.0E-03	2.3E-03	1.0E-07	7.8E-08	1.0E-07
PCB-126	RJ782	-	-	-	7.5E-03	6.4E-03	2.5E-07	2.1E-07	2.5E-07
PCB-156	RJ782	-	-	-	6.3E-02	5.5E-02	2.1E-06	1.8E-06	2.1E-06
PCB-157	RJ782	-	-	-	1.2E-02	2.5E-02	4.1E-07	8.2E-07	8.2E-07
PCB-167	RJ782	-	-	-	2.1E-02	4.3E-02	6.9E-07	1.4E-06	1.4E-06
PCB-169	RJ782	-	-	-	3.7E-04	6.4E-04	1.2E-08	2.1E-08	2.1E-08
PCB-189	RJ782	-	-	-	3.0E-03	6.4E-03	1.0E-07	2.1E-07	2.1E-07
PCB-77	RJ782	-	-	-	1.5E-02	1.3E-02	5.2E-07	4.3E-07	5.2E-07
PCB-81	RJ782	-	-	-	3.0E-03	2.3E-03	1.0E-07	7.5E-08	1.0E-07
Aroclor-1254	RS288	1.1E-01	5.5E-02	U	-	-	-	-	-
Aroclor-1260	RS288	1.1E-01	5.5E-02	U	-	-	-	-	-
PCB-105	RS288	-	-	-	1.2E-01	8.2E-02	6.8E-06	4.5E-06	6.8E-06
PCB-114	RS288	-	-	-	4.5E-03	1.5E-03	2.5E-07	8.0E-08	2.5E-07
PCB-118	RS288	-	-	-	2.7E-01	1.6E-01	1.5E-05	9.0E-06	1.5E-05
PCB-123	RS288	-	-	-	3.0E-03	2.3E-03	1.6E-07	1.3E-07	1.6E-07

Aroclor to PCB Congener Extrapolation (0-4 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentrations (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF_{1254}	EF_{1260}	Estimated Concentrations Aroclor-1254 (mg/kg)	Estimated Concentrations Aroclor-1260 (mg/kg)	Estimated Concentrations PCB_{MAX} (mg/kg)
PCB-126	RS288	-	-	-	7.5E-03	6.4E-03	4.1E-07	3.5E-07	4.1E-07
PCB-156	RS288	-	-	-	6.3E-02	5.5E-02	3.5E-06	3.0E-06	3.5E-06
PCB-157	RS288	-	-	-	1.2E-02	2.5E-02	6.8E-07	1.4E-06	1.4E-06
PCB-167	RS288	-	-	-	2.1E-02	4.3E-02	1.1E-06	2.4E-06	2.4E-06
PCB-169	RS288	-	-	-	3.7E-04	6.4E-04	2.0E-08	3.5E-08	3.5E-08
PCB-189	RS288	-	-	-	3.0E-03	6.4E-03	1.6E-07	3.5E-07	3.5E-07
PCB-77	RS288	-	-	-	1.5E-02	1.3E-02	8.5E-07	7.0E-07	8.5E-07
PCB-81	RS288	-	-	-	3.0E-03	2.3E-03	1.6E-07	1.2E-07	1.6E-07
Aroclor-1254	RS293	1.1E-01	5.5E-02	U	-	-	-	-	-
Aroclor-1260	RS293	1.1E-01	5.5E-02	U	-	-	-	-	-
PCB-105	RS293	-	-	-	1.2E-01	8.2E-02	6.8E-06	4.5E-06	6.8E-06
PCB-114	RS293	-	-	-	4.5E-03	1.5E-03	2.5E-07	8.0E-08	2.5E-07
PCB-118	RS293	-	-	-	2.7E-01	1.6E-01	1.5E-05	9.0E-06	1.5E-05
PCB-123	RS293	-	-	-	3.0E-03	2.3E-03	1.6E-07	1.3E-07	1.6E-07
PCB-126	RS293	-	-	-	7.5E-03	6.4E-03	4.1E-07	3.5E-07	4.1E-07
PCB-156	RS293	-	-	-	6.3E-02	5.5E-02	3.5E-06	3.0E-06	3.5E-06
PCB-157	RS293	-	-	-	1.2E-02	2.5E-02	6.8E-07	1.4E-06	1.4E-06
PCB-167	RS293	-	-	-	2.1E-02	4.3E-02	1.1E-06	2.4E-06	2.4E-06
PCB-169	RS293	-	-	-	3.7E-04	6.4E-04	2.0E-08	3.5E-08	3.5E-08
PCB-189	RS293	-	-	-	3.0E-03	6.4E-03	1.6E-07	3.5E-07	3.5E-07
PCB-77	RS293	-	-	-	1.5E-02	1.3E-02	8.5E-07	7.0E-07	8.5E-07
PCB-81	RS293	-	-	-	3.0E-03	2.3E-03	1.6E-07	1.2E-07	1.6E-07
Aroclor-1254	RS294	1.1E-01	5.5E-02	U	-	-	-	-	-
Aroclor-1260	RS294	1.1E-01	5.5E-02	U	-	-	-	-	-
PCB-105	RS294	-	-	-	1.2E-01	8.2E-02	6.8E-06	4.5E-06	6.8E-06
PCB-114	RS294	-	-	-	4.5E-03	1.5E-03	2.5E-07	8.0E-08	2.5E-07
PCB-118	RS294	-	-	-	2.7E-01	1.6E-01	1.5E-05	9.0E-06	1.5E-05
PCB-123	RS294	-	-	-	3.0E-03	2.3E-03	1.6E-07	1.3E-07	1.6E-07
PCB-126	RS294	-	-	-	7.5E-03	6.4E-03	4.1E-07	3.5E-07	4.1E-07
PCB-156	RS294	-	-	-	6.3E-02	5.5E-02	3.5E-06	3.0E-06	3.5E-06
PCB-157	RS294	-	-	-	1.2E-02	2.5E-02	6.8E-07	1.4E-06	1.4E-06
PCB-167	RS294	-	-	-	2.1E-02	4.3E-02	1.1E-06	2.4E-06	2.4E-06
PCB-169	RS294	-	-	-	3.7E-04	6.4E-04	2.0E-08	3.5E-08	3.5E-08
PCB-189	RS294	-	-	-	3.0E-03	6.4E-03	1.6E-07	3.5E-07	3.5E-07
PCB-77	RS294	-	-	-	1.5E-02	1.3E-02	8.5E-07	7.0E-07	8.5E-07
PCB-81	RS294	-	-	-	3.0E-03	2.3E-03	1.6E-07	1.2E-07	1.6E-07
Aroclor-1254	RS320	1.1E-01	5.5E-02	U	-	-	-	-	-
Aroclor-1260	RS320	1.1E-01	5.5E-02	U	-	-	-	-	-
PCB-105	RS320	-	-	-	1.2E-01	8.2E-02	6.8E-06	4.5E-06	6.8E-06
PCB-114	RS320	-	-	-	4.5E-03	1.5E-03	2.5E-07	8.0E-08	2.5E-07
PCB-118	RS320	-	-	-	2.7E-01	1.6E-01	1.5E-05	9.0E-06	1.5E-05
PCB-123	RS320	-	-	-	3.0E-03	2.3E-03	1.6E-07	1.3E-07	1.6E-07
PCB-126	RS320	-	-	-	7.5E-03	6.4E-03	4.1E-07	3.5E-07	4.1E-07
PCB-156	RS320	-	-	-	6.3E-02	5.5E-02	3.5E-06	3.0E-06	3.5E-06
PCB-157	RS320	-	-	-	1.2E-02	2.5E-02	6.8E-07	1.4E-06	1.4E-06
PCB-167	RS320	-	-	-	2.1E-02	4.3E-02	1.1E-06	2.4E-06	2.4E-06
PCB-169	RS320	-	-	-	3.7E-04	6.4E-04	2.0E-08	3.5E-08	3.5E-08
PCB-189	RS320	-	-	-	3.0E-03	6.4E-03	1.6E-07	3.5E-07	3.5E-07
PCB-77	RS320	-	-	-	1.5E-02	1.3E-02	8.5E-07	7.0E-07	8.5E-07
PCB-81	RS320	-	-	-	3.0E-03	2.3E-03	1.6E-07	1.2E-07	1.6E-07
Aroclor-1254	RS323	2.2E+00	2.2E+00		-	-	-	-	-
Aroclor-1260	RS323	1.0E+00	5.0E-01	U	-	-	-	-	-
PCB-105	RS323	-	-	-	1.2E-01	8.2E-02	2.7E-04	4.1E-05	2.7E-04
PCB-114	RS323	-	-	-	4.5E-03	1.5E-03	1.0E-05	7.3E-07	1.0E-05
PCB-118	RS323	-	-	-	2.7E-01	1.6E-01	5.9E-04	8.2E-05	5.9E-04
PCB-123	RS323	-	-	-	3.0E-03	2.3E-03	6.6E-06	1.2E-06	6.6E-06
PCB-126	RS323	-	-	-	7.5E-03	6.4E-03	1.7E-05	3.2E-06	1.7E-05
PCB-156	RS323	-	-	-	6.3E-02	5.5E-02	1.4E-04	2.7E-05	1.4E-04

Aroclor to PCB Congener Extrapolation (0-4 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentrations (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF_{1254}	EF_{1260}	Estimated Concentrations Aroclor-1254 (mg/kg)	Estimated Concentrations Aroclor-1260 (mg/kg)	Estimated Concentrations PCB_{MAX} (mg/kg)
PCB-157	RS323	-	-	-	1.2E-02	2.5E-02	2.7E-05	1.2E-05	2.7E-05
PCB-167	RS323	-	-	-	2.1E-02	4.3E-02	4.5E-05	2.1E-05	4.5E-05
PCB-169	RS323	-	-	-	3.7E-04	6.4E-04	8.1E-07	3.2E-07	8.1E-07
PCB-189	RS323	-	-	-	3.0E-03	6.4E-03	6.6E-06	3.2E-06	6.6E-06
PCB-77	RS323	-	-	-	1.5E-02	1.3E-02	3.4E-05	6.4E-06	3.4E-05
PCB-81	RS323	-	-	-	3.0E-03	2.3E-03	6.6E-06	1.1E-06	6.6E-06
Aroclor-1254	RS324	1.1E-01	5.5E-02	U	-	-	-	-	-
Aroclor-1260	RS324	1.1E-01	5.5E-02	U	-	-	-	-	-
PCB-105	RS324	-	-	-	1.2E-01	8.2E-02	6.8E-06	4.5E-06	6.8E-06
PCB-114	RS324	-	-	-	4.5E-03	1.5E-03	2.5E-07	8.0E-08	2.5E-07
PCB-118	RS324	-	-	-	2.7E-01	1.6E-01	1.5E-05	9.0E-06	1.5E-05
PCB-123	RS324	-	-	-	3.0E-03	2.3E-03	1.6E-07	1.3E-07	1.6E-07
PCB-126	RS324	-	-	-	7.5E-03	6.4E-03	4.1E-07	3.5E-07	4.1E-07
PCB-156	RS324	-	-	-	6.3E-02	5.5E-02	3.5E-06	3.0E-06	3.5E-06
PCB-157	RS324	-	-	-	1.2E-02	2.5E-02	6.8E-07	1.4E-06	1.4E-06
PCB-167	RS324	-	-	-	2.1E-02	4.3E-02	1.1E-06	2.4E-06	2.4E-06
PCB-169	RS324	-	-	-	3.7E-04	6.4E-04	2.0E-08	3.5E-08	3.5E-08
PCB-189	RS324	-	-	-	3.0E-03	6.4E-03	1.6E-07	3.5E-07	3.5E-07
PCB-77	RS324	-	-	-	1.5E-02	1.3E-02	8.5E-07	7.0E-07	8.5E-07
PCB-81	RS324	-	-	-	3.0E-03	2.3E-03	1.6E-07	1.2E-07	1.6E-07

Notes:
PCBs - polychlorinated biphenyls
EF- Extrapolation Factor (ng congener/kg soil)/(µg Aroclor/kg soil)
"-" not applicable
mg/kg - milligrams per kilogram
ug/kg - micrograms per kilogram
ng/kg - nanograms per kilogram
bgs- below ground surface
PCB_{MAX} = the maximum of the extrapolated 1254 and 1260 concentrations

TPH to Petroleum Constituent Extrapolation for Soil (0-2 feet bgs) [a]
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration[a] (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
C08-C11 (Gasoline Range)	MJ110	1.40E+02	7.0E+01	U		-	-
C11-C14 (Kerosene Range)	MJ110	1.40E+02	7.0E+01	U		-	-
C14-C20 (Diesel Range)	MJ110	9.20E+01	9.2E+01	J		-	-
C20-C30 (Lubricant Oil Range)	MJ110	6.70E+02	6.7E+02			-	-
C11-C30	MJ110	-	8.3E+02	-		-	-
Benzene	MJ110	-	-	-	1.2E-04	-	-
Ethylbenzene	MJ110	-	-	-	1.2E-04	-	-
Toluene	MJ110	-	-	-	1.2E-04	-	-
m,p-Xylene	MJ110	-	-	-	3.6E-04	-	-
o-Xylene	MJ110	-	-	-	8.0E-05	-	-
Xylene (total)	MJ110	-	-	-	4.4E-04	-	-
2-Methylnaphthalene	MJ110	6.48E-03	3.2E-03	UJ	2.8E-02	-	3.2E-03
Acenaphthene	MJ110	1.96E-03	9.8E-04	U	5.7E-04	4.8E-01	9.8E-04
Acenaphthylene	MJ110	1.96E-03	9.8E-04	U	7.0E-05	5.8E-02	9.8E-04
Anthracene	MJ110	1.96E-03	9.8E-04	UJ	3.7E-04	3.1E-01	9.8E-04
Benzo(a)anthracene	MJ110	1.96E-03	9.8E-04	U	2.7E-05	2.2E-02	9.8E-04
Benzo(a)pyrene	MJ110	1.96E-03	9.8E-04	U	2.7E-05	2.3E-02	9.8E-04
Benzo(b)fluoranthene	MJ110	1.96E-03	9.8E-04	U	4.3E-05	3.6E-02	9.8E-04
Benzo(e)pyrene	MJ110	1.72E-01	1.7E-01		2.1E-04	1.7E-01	1.7E-01
Benzo(g,h,i)perylene	MJ110	1.84E-01	1.8E-01		2.2E-04	1.8E-01	1.8E-01
Benzo(k)fluoranthene	MJ110	4.63E-03	4.6E-03		2.1E-05	1.7E-02	4.6E-03
Chrysene	MJ110	2.01E-02	2.0E-02		5.9E-05	4.9E-02	2.0E-02
Dibenz(a,h)anthracene	MJ110	9.21E-03	9.2E-03		1.1E-05	9.2E-03	9.2E-03
Fluoranthene	MJ110	5.60E-03	5.6E-03		7.5E-05	6.2E-02	5.6E-03
Fluorene	MJ110	4.28E-03	2.1E-03	UJ	5.7E-04	4.7E-01	2.1E-03
Indeno(1,2,3-cd)pyrene	MJ110	1.23E-02	1.2E-02		2.4E-05	2.0E-02	1.2E-02
Naphthalene	MJ110	1.08E-02	5.4E-03	UJ	6.9E-03	-	5.4E-03
Perylene	MJ110	9.81E-02	9.8E-02		1.2E-04	9.8E-02	9.8E-02
Phenanthrene	MJ110	9.11E-03	9.1E-03	J	1.5E-03	1.3E+00	9.1E-03
Pyrene	MJ110	5.87E-03	5.9E-03		1.4E-04	1.1E-01	5.9E-03
C08-C11 (Gasoline Range)	OLDCONS1	1.00E-01	5.0E-02	U		-	-
C11-C14 (Kerosene Range)	OLDCONS1	1.00E-01	5.0E-02	U		-	-
C14-C20 (Diesel Range)	OLDCONS1	6.40E+01	6.4E+01			-	-
C20-C30 (Lubricant Oil Range)	OLDCONS1	1.00E-01	5.0E-02	U		-	-
C11-C30	OLDCONS1	-	6.4E+01	-		-	-
Benzene	OLDCONS1	5.00E-03	2.5E-03	U	1.2E-04	-	2.5E-03
Ethylbenzene	OLDCONS1	5.00E-03	2.5E-03	U	1.2E-04	-	2.5E-03
Toluene	OLDCONS1	3.00E-03	3.0E-03	J	1.2E-04	-	3.0E-03
m,p-Xylene	OLDCONS1	-	-	-	3.6E-04	-	-
o-Xylene	OLDCONS1	-	-	-	8.0E-05	-	-
Xylene (total)	OLDCONS1	5.00E-03	2.5E-03	U	4.4E-04	-	2.5E-03
2-Methylnaphthalene	OLDCONS1	3.00E-01	1.5E-01	U	2.8E-02	-	1.5E-01
Acenaphthene	OLDCONS1	3.00E-01	1.5E-01	U	5.7E-04	3.7E-02	3.7E-02
Acenaphthylene	OLDCONS1	3.00E-01	1.5E-01	U	7.0E-05	4.5E-03	4.5E-03
Anthracene	OLDCONS1	3.00E-01	1.5E-01	U	3.7E-04	2.4E-02	2.4E-02
Benzo(a)anthracene	OLDCONS1	3.00E-01	1.5E-01	U	2.7E-05	1.7E-03	1.7E-03
Benzo(a)pyrene	OLDCONS1	3.00E-01	1.5E-01	U	2.7E-05	1.7E-03	1.7E-03
Benzo(b)fluoranthene	OLDCONS1	3.00E-01	1.5E-01	U	4.3E-05	2.8E-03	2.8E-03
Benzo(e)pyrene	OLDCONS1	-	-	-	2.1E-04	1.3E-02	1.3E-02
Benzo(g,h,i)perylene	OLDCONS1	3.00E-01	1.5E-01	U	2.2E-04	1.4E-02	1.4E-02
Benzo(k)fluoranthene	OLDCONS1	3.00E-01	1.5E-01	U	2.1E-05	1.3E-03	1.3E-03
Chrysene	OLDCONS1	5.00E-01	5.0E-01		5.9E-05	3.8E-03	5.0E-01
Dibenz(a,h)anthracene	OLDCONS1	3.00E-01	1.5E-01	U	1.1E-05	7.1E-04	7.1E-04
Fluoranthene	OLDCONS1	2.10E+00	2.1E+00		7.5E-05	4.8E-03	2.1E+00
Fluorene	OLDCONS1	3.00E-01	1.5E-01	U	5.7E-04	3.6E-02	3.6E-02

TPH to Petroleum Constituent Extrapolation for Soil (0-2 feet bgs) [a]
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration[a] (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Indeno(1,2,3-cd)pyrene	OLDCONS1	3.00E-01	1.5E-01	U	2.4E-05	1.5E-03	1.5E-03
Naphthalene	OLDCONS1	3.00E-01	1.5E-01	U	6.9E-03	-	1.5E-01
Perylene	OLDCONS1	-	-	-	1.2E-04	7.6E-03	7.6E-03
Phenanthrene	OLDCONS1	1.60E+00	1.6E+00		1.5E-03	9.8E-02	1.6E+00
Pyrene	OLDCONS1	1.00E+00	1.0E+00		1.4E-04	8.7E-03	1.0E+00
C08-C11 (Gasoline Range)	OLDCONS2	1.00E-01	5.0E-02	U		-	-
C11-C14 (Kerosene Range)	OLDCONS2	1.00E-01	5.0E-02	U		-	-
C14-C20 (Diesel Range)	OLDCONS2	4.00E+00	4.0E+00			-	-
C20-C30 (Lubricant Oil Range)	OLDCONS2	-	-	-		-	-
C11-C30	OLDCONS2	-	4.1E+00	-		-	-
Benzene	OLDCONS2	5.00E-03	2.5E-03	U	1.2E-04	-	2.5E-03
Ethylbenzene	OLDCONS2	5.00E-03	2.5E-03	U	1.2E-04	-	2.5E-03
Toluene	OLDCONS2	7.00E-03	7.0E-03	J	1.2E-04	-	7.0E-03
m,p-Xylene	OLDCONS2	-	-	-	3.6E-04	-	-
o-Xylene	OLDCONS2	-	-	-	8.0E-05	-	-
Xylene (total)	OLDCONS2	1.30E-02	1.3E-02		4.4E-04	-	1.3E-02
2-Methylnaphthalene	OLDCONS2	3.00E-01	1.5E-01	U	2.8E-02	-	1.5E-01
Acenaphthene	OLDCONS2	3.00E-01	1.5E-01	U	5.7E-04	2.3E-03	2.3E-03
Acenaphthylene	OLDCONS2	3.00E-01	1.5E-01	U	7.0E-05	2.8E-04	2.8E-04
Anthracene	OLDCONS2	3.00E-01	1.5E-01	U	3.7E-04	1.5E-03	1.5E-03
Benzo(a)anthracene	OLDCONS2	3.00E-01	1.5E-01	U	2.7E-05	1.1E-04	1.1E-04
Benzo(a)pyrene	OLDCONS2	3.00E-01	1.5E-01	U	2.7E-05	1.1E-04	1.1E-04
Benzo(b)fluoranthene	OLDCONS2	3.00E-01	1.5E-01	U	4.3E-05	1.8E-04	1.8E-04
Benzo(e)pyrene	OLDCONS2	-	-	-	2.1E-04	8.4E-04	8.4E-04
Benzo(g,h,i)perylene	OLDCONS2	3.00E-01	1.5E-01	U	2.2E-04	9.0E-04	9.0E-04
Benzo(k)fluoranthene	OLDCONS2	3.00E-01	1.5E-01	U	2.1E-05	8.3E-05	8.3E-05
Chrysene	OLDCONS2	3.00E-01	1.5E-01	U	5.9E-05	2.4E-04	2.4E-04
Dibenz(a,h)anthracene	OLDCONS2	3.00E-01	1.5E-01	U	1.1E-05	4.5E-05	4.5E-05
Fluoranthene	OLDCONS2	3.00E-01	1.5E-01	U	7.5E-05	3.0E-04	3.0E-04
Fluorene	OLDCONS2	3.00E-01	1.5E-01	U	5.7E-04	2.3E-03	2.3E-03
Indeno(1,2,3-cd)pyrene	OLDCONS2	3.00E-01	1.5E-01	U	2.4E-05	9.7E-05	9.7E-05
Naphthalene	OLDCONS2	3.00E-01	1.5E-01	U	6.9E-03	-	1.5E-01
Perylene	OLDCONS2	-	-	-	1.2E-04	4.8E-04	4.8E-04
Phenanthrene	OLDCONS2	3.00E-01	1.5E-01	U	1.5E-03	6.2E-03	6.2E-03
Pyrene	OLDCONS2	3.00E-01	1.5E-01	U	1.4E-04	5.5E-04	5.5E-04
C08-C11 (Gasoline Range)	OLDCONS4	1.00E-01	5.0E-02	U		-	-
C11-C14 (Kerosene Range)	OLDCONS4	1.00E-01	5.0E-02	U		-	-
C14-C20 (Diesel Range)	OLDCONS4	2.00E+00	2.0E+00			-	-
C20-C30 (Lubricant Oil Range)	OLDCONS4	-	-			-	-
C11-C30	OLDCONS4	-	2.1E+00	-		-	-
Benzene	OLDCONS4	5.00E-03	2.5E-03	U	1.2E-04	-	2.5E-03
Ethylbenzene	OLDCONS4	5.00E-03	2.5E-03	U	1.2E-04	-	2.5E-03
Toluene	OLDCONS4	5.00E-03	2.5E-03	U	1.2E-04	-	2.5E-03
m,p-Xylene	OLDCONS4	-	-	-	3.6E-04	-	-
o-Xylene	OLDCONS4	-	-	-	8.0E-05	-	-
Xylene (total)	OLDCONS4	5.00E-03	2.5E-03	U	4.4E-04	-	2.5E-03
2-Methylnaphthalene	OLDCONS4	2.00E-02	1.0E-02	U	2.8E-02	-	1.0E-02
Acenaphthene	OLDCONS4	3.00E-02	1.5E-02	U	5.7E-04	1.2E-03	1.2E-03
Acenaphthylene	OLDCONS4	3.00E-02	1.5E-02	U	7.0E-05	1.4E-04	1.4E-04
Anthracene	OLDCONS4	3.00E-02	1.5E-02	U	3.7E-04	7.7E-04	7.7E-04
Benzo(a)anthracene	OLDCONS4	3.00E-02	1.5E-02	U	2.7E-05	5.5E-05	5.5E-05
Benzo(a)pyrene	OLDCONS4	3.00E-02	1.5E-02	U	2.7E-05	5.6E-05	5.6E-05
Benzo(b)fluoranthene	OLDCONS4	3.00E-02	1.5E-02	U	4.3E-05	8.9E-05	8.9E-05
Benzo(e)pyrene	OLDCONS4	-	-	-	2.1E-04	4.2E-04	4.2E-04
Benzo(g,h,i)perylene	OLDCONS4	3.00E-02	1.5E-02	U	2.2E-04	4.5E-04	4.5E-04
Benzo(k)fluoranthene	OLDCONS4	3.00E-02	1.5E-02	U	2.1E-05	4.2E-05	4.2E-05

TPH to Petroleum Constituent Extrapolation for Soil (0-2 feet bgs) [a]
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration[a] (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Chrysene	OLDCONS4	3.00E-02	1.5E-02	U	5.9E-05	1.2E-04	1.2E-04
Dibenz(a,h)anthracene	OLDCONS4	3.00E-02	1.5E-02	U	1.1E-05	2.3E-05	2.3E-05
Fluoranthene	OLDCONS4	3.00E-02	1.5E-02	U	7.5E-05	1.5E-04	1.5E-04
Fluorene	OLDCONS4	3.00E-02	1.5E-02	U	5.7E-04	1.2E-03	1.2E-03
Indeno(1,2,3-cd)pyrene	OLDCONS4	3.00E-02	1.5E-02	U	2.4E-05	4.9E-05	4.9E-05
Naphthalene	OLDCONS4	2.00E-02	1.0E-02	U	6.9E-03	-	1.0E-02
Perylene	OLDCONS4	-	-	-	1.2E-04	2.4E-04	2.4E-04
Phenanthrene	OLDCONS4	3.00E-02	1.5E-02	U	1.5E-03	3.1E-03	3.1E-03
Pyrene	OLDCONS4	3.00E-02	1.5E-02	U	1.4E-04	2.8E-04	2.8E-04
C08-C11 (Gasoline Range)	OLDCONS5	1.00E-01	5.0E-02	U		-	-
C11-C14 (Kerosene Range)	OLDCONS5	1.00E-01	5.0E-02	U		-	-
C14-C20 (Diesel Range)	OLDCONS5	3.00E-01	3.0E-01			-	-
C20-C30 (Lubricant Oil Range)	OLDCONS5	-	-			-	-
C11-C30	OLDCONS5	-	3.5E-01	-		-	-
Benzene	OLDCONS5	5.00E-03	2.5E-03	U	1.2E-04	-	2.5E-03
Ethylbenzene	OLDCONS5	5.00E-03	2.5E-03	U	1.2E-04	-	2.5E-03
Toluene	OLDCONS5	1.40E-02	1.4E-02	J	1.2E-04	-	1.4E-02
m,p-Xylene	OLDCONS5	-	-	-	3.6E-04	-	-
o-Xylene	OLDCONS5	-	-	-	8.0E-05	-	-
Xylene (total)	OLDCONS5	1.00E-02	1.0E-02		4.4E-04	-	1.0E-02
2-Methylnaphthalene	OLDCONS5	3.00E-01	1.5E-01	U	2.8E-02	-	1.5E-01
Acenaphthene	OLDCONS5	3.00E-01	1.5E-01	U	5.7E-04	2.0E-04	2.0E-04
Acenaphthylene	OLDCONS5	3.00E-01	1.5E-01	U	7.0E-05	2.5E-05	2.5E-05
Anthracene	OLDCONS5	3.00E-01	1.5E-01	U	3.7E-04	1.3E-04	1.3E-04
Benzo(a)anthracene	OLDCONS5	3.00E-01	1.5E-01	U	2.7E-05	9.4E-06	9.4E-06
Benzo(a)pyrene	OLDCONS5	3.00E-01	1.5E-01	U	2.7E-05	9.5E-06	9.5E-06
Benzo(b)fluoranthene	OLDCONS5	3.00E-01	1.5E-01	U	4.3E-05	1.5E-05	1.5E-05
Benzo(e)pyrene	OLDCONS5	-	-	-	2.1E-04	7.2E-05	7.2E-05
Benzo(g,h,i)perylene	OLDCONS5	3.00E-01	1.5E-01	U	2.2E-04	7.7E-05	7.7E-05
Benzo(k)fluoranthene	OLDCONS5	3.00E-01	1.5E-01	U	2.1E-05	7.2E-06	7.2E-06
Chrysene	OLDCONS5	3.00E-01	1.5E-01	U	5.9E-05	2.1E-05	2.1E-05
Dibenz(a,h)anthracene	OLDCONS5	3.00E-01	1.5E-01	U	1.1E-05	3.9E-06	3.9E-06
Fluoranthene	OLDCONS5	3.00E-01	1.5E-01	U	7.5E-05	2.6E-05	2.6E-05
Fluorene	OLDCONS5	3.00E-01	1.5E-01	U	5.7E-04	2.0E-04	2.0E-04
Indeno(1,2,3-cd)pyrene	OLDCONS5	3.00E-01	1.5E-01	U	2.4E-05	8.4E-06	8.4E-06
Naphthalene	OLDCONS5	3.00E-01	1.5E-01	U	6.9E-03	-	1.5E-01
Perylene	OLDCONS5	-	-	-	1.2E-04	4.1E-05	4.1E-05
Phenanthrene	OLDCONS5	3.00E-01	1.5E-01	U	1.5E-03	5.4E-04	5.4E-04
Pyrene	OLDCONS5	3.00E-01	1.5E-01	U	1.4E-04	4.8E-05	4.8E-05
C08-C11 (Gasoline Range)	OLDCONS6	1.00E-01	5.0E-02	U		-	-
C11-C14 (Kerosene Range)	OLDCONS6	1.00E-01	5.0E-02	U		-	-
C14-C20 (Diesel Range)	OLDCONS6	1.00E-01	5.0E-02	U		-	-
C20-C30 (Lubricant Oil Range)	OLDCONS6	5.00E+00	5.0E+00			-	-
C11-C30	OLDCONS6	-	5.1E+00	-		-	-
Benzene	OLDCONS6	5.00E-03	2.5E-03	U	1.2E-04	-	2.5E-03
Ethylbenzene	OLDCONS6	5.00E-03	2.5E-03	U	1.2E-04	-	2.5E-03
Toluene	OLDCONS6	5.00E-03	2.5E-03	U	1.2E-04	-	2.5E-03
m,p-Xylene	OLDCONS6	-	-	-	3.6E-04	-	-
o-Xylene	OLDCONS6	-	-	-	8.0E-05	-	-
Xylene (total)	OLDCONS6	5.00E-03	2.5E-03	U	4.4E-04	-	2.5E-03
2-Methylnaphthalene	OLDCONS6	3.00E-02	1.5E-02	U	2.8E-02	-	1.5E-02
Acenaphthene	OLDCONS6	3.00E-02	1.5E-02	U	5.7E-04	2.9E-03	2.9E-03
Acenaphthylene	OLDCONS6	3.00E-02	1.5E-02	U	7.0E-05	3.6E-04	3.6E-04
Anthracene	OLDCONS6	3.00E-02	1.5E-02	U	3.7E-04	1.9E-03	1.9E-03
Benzo(a)anthracene	OLDCONS6	3.00E-02	1.5E-02	U	2.7E-05	1.4E-04	1.4E-04
Benzo(a)pyrene	OLDCONS6	3.00E-02	1.5E-02	U	2.7E-05	1.4E-04	1.4E-04

TPH to Petroleum Constituent Extrapolation for Soil (0-2 feet bgs) [a]
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration[a] (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Benzo(b)fluoranthene	OLDCONS6	3.00E-02	1.5E-02	U	4.3E-05	2.2E-04	2.2E-04
Benzo(e)pyrene	OLDCONS6	-	-	-	2.1E-04	1.1E-03	1.1E-03
Benzo(g,h,i)perylene	OLDCONS6	3.00E-02	1.5E-02	U	2.2E-04	1.1E-03	1.1E-03
Benzo(k)fluoranthene	OLDCONS6	3.00E-02	1.5E-02	U	2.1E-05	1.0E-04	1.0E-04
Chrysene	OLDCONS6	3.00E-02	1.5E-02	U	5.9E-05	3.0E-04	3.0E-04
Dibenz(a,h)anthracene	OLDCONS6	3.00E-02	1.5E-02	U	1.1E-05	5.6E-05	5.6E-05
Fluoranthene	OLDCONS6	3.00E-02	1.5E-02	U	7.5E-05	3.8E-04	3.8E-04
Fluorene	OLDCONS6	3.00E-02	1.5E-02	U	5.7E-04	2.9E-03	2.9E-03
Indeno(1,2,3-cd)pyrene	OLDCONS6	3.00E-02	1.5E-02	U	2.4E-05	1.2E-04	1.2E-04
Naphthalene	OLDCONS6	3.00E-02	1.5E-02	U	6.9E-03	-	1.5E-02
Perylene	OLDCONS6	-	-	-	1.2E-04	6.0E-04	6.0E-04
Phenanthrene	OLDCONS6	3.00E-02	1.5E-02	U	1.5E-03	7.8E-03	7.8E-03
Pyrene	OLDCONS6	3.00E-02	1.5E-02	U	1.4E-04	7.0E-04	7.0E-04
C08-C11 (Gasoline Range)	RD033	1.10E+01	5.5E+00	UJ		-	-
C11-C14 (Kerosene Range)	RD033	1.10E+01	5.5E+00	UJ		-	-
C14-C20 (Diesel Range)	RD033	1.10E+01	5.5E+00	UJ		-	-
C20-C30 (Lubricant Oil Range)	RD033	1.10E+01	5.5E+00	UJ		-	-
C11-C30	RD033	-	1.7E+01	-		-	-
Benzene	RD033	1.10E-02	5.5E-03	U	1.2E-04	-	5.5E-03
Ethylbenzene	RD033	1.10E-02	5.5E-03	U	1.2E-04	-	5.5E-03
Toluene	RD033	1.10E-02	5.5E-03	U	1.2E-04	-	5.5E-03
m,p-Xylene	RD033	1.10E-02	5.5E-03	U	3.6E-04	-	5.5E-03
o-Xylene	RD033	1.10E-02	5.5E-03	U	8.0E-05	-	5.5E-03
Xylene (total)	RD033	-	-	-	4.4E-04	-	-
2-Methylnaphthalene	RD033	-	-	-	2.8E-02	-	-
Acenaphthene	RD033	-	-	-	5.7E-04	9.5E-03	9.5E-03
Acenaphthylene	RD033	-	-	-	7.0E-05	1.2E-03	1.2E-03
Anthracene	RD033	-	-	-	3.7E-04	6.2E-03	6.2E-03
Benzo(a)anthracene	RD033	-	-	-	2.7E-05	4.4E-04	4.4E-04
Benzo(a)pyrene	RD033	-	-	-	2.7E-05	4.5E-04	4.5E-04
Benzo(b)fluoranthene	RD033	-	-	-	4.3E-05	7.1E-04	7.1E-04
Benzo(e)pyrene	RD033	-	-	-	2.1E-04	3.4E-03	3.4E-03
Benzo(g,h,i)perylene	RD033	-	-	-	2.2E-04	3.6E-03	3.6E-03
Benzo(k)fluoranthene	RD033	-	-	-	2.1E-05	3.4E-04	3.4E-04
Chrysene	RD033	-	-	-	5.9E-05	9.7E-04	9.7E-04
Dibenz(a,h)anthracene	RD033	-	-	-	1.1E-05	1.8E-04	1.8E-04
Fluoranthene	RD033	-	-	-	7.5E-05	1.2E-03	1.2E-03
Fluorene	RD033	-	-	-	5.7E-04	9.4E-03	9.4E-03
Indeno(1,2,3-cd)pyrene	RD033	-	-	-	2.4E-05	4.0E-04	4.0E-04
Naphthalene	RD033	-	-	-	6.9E-03	-	-
Perylene	RD033	-	-	-	1.2E-04	1.9E-03	1.9E-03
Phenanthrene	RD033	-	-	-	1.5E-03	2.5E-02	2.5E-02
Pyrene	RD033	-	-	-	1.4E-04	2.2E-03	2.2E-03
C08-C11 (Gasoline Range)	RD037	1.10E+01	5.5E+00	UJ		-	-
C11-C14 (Kerosene Range)	RD037	1.10E+01	5.5E+00	UJ		-	-
C14-C20 (Diesel Range)	RD037	1.10E+01	5.5E+00	UJ		-	-
C20-C30 (Lubricant Oil Range)	RD037	1.10E+01	5.5E+00	UJ		-	-
C11-C30	RD037	-	1.7E+01	-		-	-
Benzene	RD037	6.00E-03	3.0E-03	U	1.2E-04	-	3.0E-03
Ethylbenzene	RD037	6.00E-03	3.0E-03	U	1.2E-04	-	3.0E-03
Toluene	RD037	6.00E-03	3.0E-03	U	1.2E-04	-	3.0E-03
m,p-Xylene	RD037	6.00E-03	3.0E-03	U	3.6E-04	-	3.0E-03
o-Xylene	RD037	6.00E-03	3.0E-03	U	8.0E-05	-	3.0E-03
Xylene (total)	RD037	-	-	-	4.4E-04	-	-
2-Methylnaphthalene	RD037	-	-	-	2.8E-02	-	-
Acenaphthene	RD037	-	-	-	5.7E-04	9.5E-03	9.5E-03

TPH to Petroleum Constituent Extrapolation for Soil (0-2 feet bgs) [a]
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration[a] (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Acenaphthylene	RD037	-	-	-	7.0E-05	1.2E-03	1.2E-03
Anthracene	RD037	-	-	-	3.7E-04	6.2E-03	6.2E-03
Benzo(a)anthracene	RD037	-	-	-	2.7E-05	4.4E-04	4.4E-04
Benzo(a)pyrene	RD037	-	-	-	2.7E-05	4.5E-04	4.5E-04
Benzo(b)fluoranthene	RD037	-	-	-	4.3E-05	7.1E-04	7.1E-04
Benzo(e)pyrene	RD037	-	-	-	2.1E-04	3.4E-03	3.4E-03
Benzo(g,h,i)perylene	RD037	-	-	-	2.2E-04	3.6E-03	3.6E-03
Benzo(k)fluoranthene	RD037	-	-	-	2.1E-05	3.4E-04	3.4E-04
Chrysene	RD037	-	-	-	5.9E-05	9.7E-04	9.7E-04
Dibenz(a,h)anthracene	RD037	-	-	-	1.1E-05	1.8E-04	1.8E-04
Fluoranthene	RD037	-	-	-	7.5E-05	1.2E-03	1.2E-03
Fluorene	RD037	-	-	-	5.7E-04	9.4E-03	9.4E-03
Indeno(1,2,3-cd)pyrene	RD037	-	-	-	2.4E-05	4.0E-04	4.0E-04
Naphthalene	RD037	-	-	-	6.9E-03	-	-
Perylene	RD037	-	-	-	1.2E-04	1.9E-03	1.9E-03
Phenanthrene	RD037	-	-	-	1.5E-03	2.5E-02	2.5E-02
Pyrene	RD037	-	-	-	1.4E-04	2.2E-03	2.2E-03
C08-C11 (Gasoline Range)	RD063	4.20E+01	4.2E+01	J		-	-
C11-C14 (Kerosene Range)	RD063	1.10E+01	5.5E+00	UJ		-	-
C14-C20 (Diesel Range)	RD063	1.10E+01	5.5E+00	UJ		-	-
C20-C30 (Lubricant Oil Range)	RD063	1.10E+01	5.5E+00	UJ		-	-
C11-C30	RD063	-	1.7E+01	-		-	-
Benzene	RD063	6.00E-03	3.0E-03	U	1.2E-04	-	3.0E-03
Ethylbenzene	RD063	6.00E-03	3.0E-03	U	1.2E-04	-	3.0E-03
Toluene	RD063	6.00E-03	3.0E-03	U	1.2E-04	-	3.0E-03
m,p-Xylene	RD063	6.00E-03	3.0E-03	U	3.6E-04	-	3.0E-03
o-Xylene	RD063	6.00E-03	3.0E-03	U	8.0E-05	-	3.0E-03
Xylene (total)	RD063	-	-	-	4.4E-04	-	-
2-Methylnaphthalene	RD063	-	-	-	2.8E-02	-	-
Acenaphthene	RD063	-	-	-	5.7E-04	9.5E-03	9.5E-03
Acenaphthylene	RD063	-	-	-	7.0E-05	1.2E-03	1.2E-03
Anthracene	RD063	-	-	-	3.7E-04	6.2E-03	6.2E-03
Benzo(a)anthracene	RD063	-	-	-	2.7E-05	4.4E-04	4.4E-04
Benzo(a)pyrene	RD063	-	-	-	2.7E-05	4.5E-04	4.5E-04
Benzo(b)fluoranthene	RD063	-	-	-	4.3E-05	7.1E-04	7.1E-04
Benzo(e)pyrene	RD063	-	-	-	2.1E-04	3.4E-03	3.4E-03
Benzo(g,h,i)perylene	RD063	-	-	-	2.2E-04	3.6E-03	3.6E-03
Benzo(k)fluoranthene	RD063	-	-	-	2.1E-05	3.4E-04	3.4E-04
Chrysene	RD063	-	-	-	5.9E-05	9.7E-04	9.7E-04
Dibenz(a,h)anthracene	RD063	-	-	-	1.1E-05	1.8E-04	1.8E-04
Fluoranthene	RD063	-	-	-	7.5E-05	1.2E-03	1.2E-03
Fluorene	RD063	-	-	-	5.7E-04	9.4E-03	9.4E-03
Indeno(1,2,3-cd)pyrene	RD063	-	-	-	2.4E-05	4.0E-04	4.0E-04
Naphthalene	RD063	-	-	-	6.9E-03	-	-
Perylene	RD063	-	-	-	1.2E-04	1.9E-03	1.9E-03
Phenanthrene	RD063	-	-	-	1.5E-03	2.5E-02	2.5E-02
Pyrene	RD063	-	-	-	1.4E-04	2.2E-03	2.2E-03
C08-C11 (Gasoline Range)	RD065	1.10E+01	5.5E+00	UJ		-	-
C11-C14 (Kerosene Range)	RD065	1.10E+01	5.5E+00	UJ		-	-
C14-C20 (Diesel Range)	RD065	1.10E+01	5.5E+00	UJ		-	-
C20-C30 (Lubricant Oil Range)	RD065	8.50E+01	8.5E+01	J		-	-
C11-C30	RD065	-	9.6E+01	-		-	-
Benzene	RD065	-	-	-	1.2E-04	-	-
Ethylbenzene	RD065	-	-	-	1.2E-04	-	-
Toluene	RD065	-	-	-	1.2E-04	-	-
m,p-Xylene	RD065	-	-	-	3.6E-04	-	-

TPH to Petroleum Constituent Extrapolation for Soil (0-2 feet bgs) [a]
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration[a] (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
o-Xylene	RD065	-	-	-	8.0E-05	-	-
Xylene (total)	RD065	-	-	-	4.4E-04	-	-
2-Methylnaphthalene	RD065	-	-	-	2.8E-02	-	-
Acenaphthene	RD065	-	-	-	5.7E-04	5.5E-02	5.5E-02
Acenaphthylene	RD065	-	-	-	7.0E-05	6.7E-03	6.7E-03
Anthracene	RD065	-	-	-	3.7E-04	3.6E-02	3.6E-02
Benzo(a)anthracene	RD065	-	-	-	2.7E-05	2.6E-03	2.6E-03
Benzo(a)pyrene	RD065	-	-	-	2.7E-05	2.6E-03	2.6E-03
Benzo(b)fluoranthene	RD065	-	-	-	4.3E-05	4.2E-03	4.2E-03
Benzo(e)pyrene	RD065	-	-	-	2.1E-04	2.0E-02	2.0E-02
Benzo(g,h,i)perylene	RD065	-	-	-	2.2E-04	2.1E-02	2.1E-02
Benzo(k)fluoranthene	RD065	-	-	-	2.1E-05	2.0E-03	2.0E-03
Chrysene	RD065	-	-	-	5.9E-05	5.6E-03	5.6E-03
Dibenz(a,h)anthracene	RD065	-	-	-	1.1E-05	1.1E-03	1.1E-03
Fluoranthene	RD065	-	-	-	7.5E-05	7.2E-03	7.2E-03
Fluorene	RD065	-	-	-	5.7E-04	5.5E-02	5.5E-02
Indeno(1,2,3-cd)pyrene	RD065	-	-	-	2.4E-05	2.3E-03	2.3E-03
Naphthalene	RD065	-	-	-	6.9E-03	-	-
Perylene	RD065	-	-	-	1.2E-04	1.1E-02	1.1E-02
Phenanthrene	RD065	-	-	-	1.5E-03	1.5E-01	1.5E-01
Pyrene	RD065	-	-	-	1.4E-04	1.3E-02	1.3E-02
C08-C11 (Gasoline Range)	RD067	1.20E+01	6.0E+00	UJ		-	-
C11-C14 (Kerosene Range)	RD067	1.20E+01	6.0E+00	UJ		-	-
C14-C20 (Diesel Range)	RD067	1.20E+01	6.0E+00	UJ		-	-
C20-C30 (Lubricant Oil Range)	RD067	1.10E+02	1.1E+02	J		-	-
C11-C30	RD067	-	1.2E+02	-		-	-
Benzene	RD067	-	-	-	1.2E-04	-	-
Ethylbenzene	RD067	-	-	-	1.2E-04	-	-
Toluene	RD067	-	-	-	1.2E-04	-	-
m,p-Xylene	RD067	-	-	-	3.6E-04	-	-
o-Xylene	RD067	-	-	-	8.0E-05	-	-
Xylene (total)	RD067	-	-	-	4.4E-04	-	-
2-Methylnaphthalene	RD067	-	-	-	2.8E-02	-	-
Acenaphthene	RD067	-	-	-	5.7E-04	7.0E-02	7.0E-02
Acenaphthylene	RD067	-	-	-	7.0E-05	8.5E-03	8.5E-03
Anthracene	RD067	-	-	-	3.7E-04	4.6E-02	4.6E-02
Benzo(a)anthracene	RD067	-	-	-	2.7E-05	3.3E-03	3.3E-03
Benzo(a)pyrene	RD067	-	-	-	2.7E-05	3.3E-03	3.3E-03
Benzo(b)fluoranthene	RD067	-	-	-	4.3E-05	5.3E-03	5.3E-03
Benzo(e)pyrene	RD067	-	-	-	2.1E-04	2.5E-02	2.5E-02
Benzo(g,h,i)perylene	RD067	-	-	-	2.2E-04	2.7E-02	2.7E-02
Benzo(k)fluoranthene	RD067	-	-	-	2.1E-05	2.5E-03	2.5E-03
Chrysene	RD067	-	-	-	5.9E-05	7.2E-03	7.2E-03
Dibenz(a,h)anthracene	RD067	-	-	-	1.1E-05	1.4E-03	1.4E-03
Fluoranthene	RD067	-	-	-	7.5E-05	9.1E-03	9.1E-03
Fluorene	RD067	-	-	-	5.7E-04	6.9E-02	6.9E-02
Indeno(1,2,3-cd)pyrene	RD067	-	-	-	2.4E-05	2.9E-03	2.9E-03
Naphthalene	RD067	-	-	-	6.9E-03	-	-
Perylene	RD067	-	-	-	1.2E-04	1.4E-02	1.4E-02
Phenanthrene	RD067	-	-	-	1.5E-03	1.9E-01	1.9E-01
Pyrene	RD067	-	-	-	1.4E-04	1.7E-02	1.7E-02
C08-C11 (Gasoline Range)	RD068	1.09E+02	5.5E+01	UJ		-	-
C11-C14 (Kerosene Range)	RD068	1.09E+02	5.5E+01	UJ		-	-
C14-C20 (Diesel Range)	RD068	1.20E+03	1.2E+03	J		-	-
C20-C30 (Lubricant Oil Range)	RD068	3.50E+03	3.5E+03	J		-	-
C11-C30	RD068	-	4.8E+03	-		-	-

TPH to Petroleum Constituent Extrapolation for Soil (0-2 feet bgs) [a]
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration[a] (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Benzene	RD068	-	-	-	1.2E-04	-	-
Ethylbenzene	RD068	-	-	-	1.2E-04	-	-
Toluene	RD068	-	-	-	1.2E-04	-	-
m,p-Xylene	RD068	-	-	-	3.6E-04	-	-
o-Xylene	RD068	-	-	-	8.0E-05	-	-
Xylene (total)	RD068	-	-	-	4.4E-04	-	-
2-Methylnaphthalene	RD068	-	-	-	2.8E-02	-	-
Acenaphthene	RD068	-	-	-	5.7E-04	2.7E+00	2.7E+00
Acenaphthylene	RD068	-	-	-	7.0E-05	3.3E-01	3.3E-01
Anthracene	RD068	-	-	-	3.7E-04	1.8E+00	1.8E+00
Benzo(a)anthracene	RD068	-	-	-	2.7E-05	1.3E-01	1.3E-01
Benzo(a)pyrene	RD068	-	-	-	2.7E-05	1.3E-01	1.3E-01
Benzo(b)fluoranthene	RD068	-	-	-	4.3E-05	2.1E-01	2.1E-01
Benzo(e)pyrene	RD068	-	-	-	2.1E-04	9.8E-01	9.8E-01
Benzo(g,h,i)perylene	RD068	-	-	-	2.2E-04	1.1E+00	1.1E+00
Benzo(k)fluoranthene	RD068	-	-	-	2.1E-05	9.8E-02	9.8E-02
Chrysene	RD068	-	-	-	5.9E-05	2.8E-01	2.8E-01
Dibenz(a,h)anthracene	RD068	-	-	-	1.1E-05	5.3E-02	5.3E-02
Fluoranthene	RD068	-	-	-	7.5E-05	3.6E-01	3.6E-01
Fluorene	RD068	-	-	-	5.7E-04	2.7E+00	2.7E+00
Indeno(1,2,3-cd)pyrene	RD068	-	-	-	2.4E-05	1.1E-01	1.1E-01
Naphthalene	RD068	-	-	-	6.9E-03	-	-
Perylene	RD068	-	-	-	1.2E-04	5.6E-01	5.6E-01
Phenanthrene	RD068	-	-	-	1.5E-03	7.3E+00	7.3E+00
Pyrene	RD068	-	-	-	1.4E-04	6.5E-01	6.5E-01
C08-C11 (Gasoline Range)	RD069	1.10E+01	5.5E+00	UJ		-	-
C11-C14 (Kerosene Range)	RD069	1.10E+01	5.5E+00	UJ		-	-
C14-C20 (Diesel Range)	RD069	1.10E+01	5.5E+00	UJ		-	-
C20-C30 (Lubricant Oil Range)	RD069	1.10E+01	5.5E+00	UJ		-	-
C11-C30	RD069	-	1.7E+01	-		-	-
Benzene	RD069	-	-	-	1.2E-04	-	-
Ethylbenzene	RD069	-	-	-	1.2E-04	-	-
Toluene	RD069	-	-	-	1.2E-04	-	-
m,p-Xylene	RD069	-	-	-	3.6E-04	-	-
o-Xylene	RD069	-	-	-	8.0E-05	-	-
Xylene (total)	RD069	-	-	-	4.4E-04	-	-
2-Methylnaphthalene	RD069	-	-	-	2.8E-02	-	-
Acenaphthene	RD069	-	-	-	5.7E-04	9.5E-03	9.5E-03
Acenaphthylene	RD069	-	-	-	7.0E-05	1.2E-03	1.2E-03
Anthracene	RD069	-	-	-	3.7E-04	6.2E-03	6.2E-03
Benzo(a)anthracene	RD069	-	-	-	2.7E-05	4.4E-04	4.4E-04
Benzo(a)pyrene	RD069	-	-	-	2.7E-05	4.5E-04	4.5E-04
Benzo(b)fluoranthene	RD069	-	-	-	4.3E-05	7.1E-04	7.1E-04
Benzo(e)pyrene	RD069	-	-	-	2.1E-04	3.4E-03	3.4E-03
Benzo(g,h,i)perylene	RD069	-	-	-	2.2E-04	3.6E-03	3.6E-03
Benzo(k)fluoranthene	RD069	-	-	-	2.1E-05	3.4E-04	3.4E-04
Chrysene	RD069	-	-	-	5.9E-05	9.7E-04	9.7E-04
Dibenz(a,h)anthracene	RD069	-	-	-	1.1E-05	1.8E-04	1.8E-04
Fluoranthene	RD069	-	-	-	7.5E-05	1.2E-03	1.2E-03
Fluorene	RD069	-	-	-	5.7E-04	9.4E-03	9.4E-03
Indeno(1,2,3-cd)pyrene	RD069	-	-	-	2.4E-05	4.0E-04	4.0E-04
Naphthalene	RD069	-	-	-	6.9E-03	-	-
Perylene	RD069	-	-	-	1.2E-04	1.9E-03	1.9E-03
Phenanthrene	RD069	-	-	-	1.5E-03	2.5E-02	2.5E-02
Pyrene	RD069	-	-	-	1.4E-04	2.2E-03	2.2E-03
C08-C11 (Gasoline Range)	RD071	1.10E+01	5.5E+00	UJ		-	-

TPH to Petroleum Constituent Extrapolation for Soil (0-2 feet bgs) [a]
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration[a] (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
C11-C14 (Kerosene Range)	RD071	1.10E+01	5.5E+00	UJ		-	-
C14-C20 (Diesel Range)	RD071	1.10E+01	5.5E+00	UJ		-	-
C20-C30 (Lubricant Oil Range)	RD071	1.10E+01	5.5E+00	UJ		-	-
C11-C30	RD071	-	1.7E+01	-		-	-
Benzene	RD071	-	-	-	1.2E-04	-	-
Ethylbenzene	RD071	-	-	-	1.2E-04	-	-
Toluene	RD071	-	-	-	1.2E-04	-	-
m,p-Xylene	RD071	-	-	-	3.6E-04	-	-
o-Xylene	RD071	-	-	-	8.0E-05	-	-
Xylene (total)	RD071	-	-	-	4.4E-04	-	-
2-Methylnaphthalene	RD071	-	-	-	2.8E-02	-	-
Acenaphthene	RD071	-	-	-	5.7E-04	9.5E-03	9.5E-03
Acenaphthylene	RD071	-	-	-	7.0E-05	1.2E-03	1.2E-03
Anthracene	RD071	-	-	-	3.7E-04	6.2E-03	6.2E-03
Benzo(a)anthracene	RD071	-	-	-	2.7E-05	4.4E-04	4.4E-04
Benzo(a)pyrene	RD071	-	-	-	2.7E-05	4.5E-04	4.5E-04
Benzo(b)fluoranthene	RD071	-	-	-	4.3E-05	7.1E-04	7.1E-04
Benzo(e)pyrene	RD071	-	-	-	2.1E-04	3.4E-03	3.4E-03
Benzo(g,h,i)perylene	RD071	-	-	-	2.2E-04	3.6E-03	3.6E-03
Benzo(k)fluoranthene	RD071	-	-	-	2.1E-05	3.4E-04	3.4E-04
Chrysene	RD071	-	-	-	5.9E-05	9.7E-04	9.7E-04
Dibenz(a,h)anthracene	RD071	-	-	-	1.1E-05	1.8E-04	1.8E-04
Fluoranthene	RD071	-	-	-	7.5E-05	1.2E-03	1.2E-03
Fluorene	RD071	-	-	-	5.7E-04	9.4E-03	9.4E-03
Indeno(1,2,3-cd)pyrene	RD071	-	-	-	2.4E-05	4.0E-04	4.0E-04
Naphthalene	RD071	-	-	-	6.9E-03	-	-
Perylene	RD071	-	-	-	1.2E-04	1.9E-03	1.9E-03
Phenanthrene	RD071	-	-	-	1.5E-03	2.5E-02	2.5E-02
Pyrene	RD071	-	-	-	1.4E-04	2.2E-03	2.2E-03
C08-C11 (Gasoline Range)	RD176	1.20E+01	6.0E+00	UJ		-	-
C11-C14 (Kerosene Range)	RD176	1.20E+01	6.0E+00	UJ		-	-
C14-C20 (Diesel Range)	RD176	1.20E+01	6.0E+00	UJ		-	-
C20-C30 (Lubricant Oil Range)	RD176	1.20E+01	6.0E+00	UJ		-	-
C11-C30	RD176	-	1.8E+01	-		-	-
Benzene	RD176	-	-	-	1.2E-04	-	-
Ethylbenzene	RD176	-	-	-	1.2E-04	-	-
Toluene	RD176	-	-	-	1.2E-04	-	-
m,p-Xylene	RD176	-	-	-	3.6E-04	-	-
o-Xylene	RD176	-	-	-	8.0E-05	-	-
Xylene (total)	RD176	-	-	-	4.4E-04	-	-
2-Methylnaphthalene	RD176	-	-	-	2.8E-02	-	-
Acenaphthene	RD176	-	-	-	5.7E-04	1.0E-02	1.0E-02
Acenaphthylene	RD176	-	-	-	7.0E-05	1.3E-03	1.3E-03
Anthracene	RD176	-	-	-	3.7E-04	6.7E-03	6.7E-03
Benzo(a)anthracene	RD176	-	-	-	2.7E-05	4.9E-04	4.9E-04
Benzo(a)pyrene	RD176	-	-	-	2.7E-05	4.9E-04	4.9E-04
Benzo(b)fluoranthene	RD176	-	-	-	4.3E-05	7.8E-04	7.8E-04
Benzo(e)pyrene	RD176	-	-	-	2.1E-04	3.7E-03	3.7E-03
Benzo(g,h,i)perylene	RD176	-	-	-	2.2E-04	4.0E-03	4.0E-03
Benzo(k)fluoranthene	RD176	-	-	-	2.1E-05	3.7E-04	3.7E-04
Chrysene	RD176	-	-	-	5.9E-05	1.1E-03	1.1E-03
Dibenz(a,h)anthracene	RD176	-	-	-	1.1E-05	2.0E-04	2.0E-04
Fluoranthene	RD176	-	-	-	7.5E-05	1.3E-03	1.3E-03
Fluorene	RD176	-	-	-	5.7E-04	1.0E-02	1.0E-02
Indeno(1,2,3-cd)pyrene	RD176	-	-	-	2.4E-05	4.3E-04	4.3E-04
Naphthalene	RD176	-	-	-	6.9E-03	-	-

TPH to Petroleum Constituent Extrapolation for Soil (0-2 feet bgs) [a]
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration[a] (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Perylene	RD176	-	-	-	1.2E-04	2.1E-03	2.1E-03
Phenanthrene	RD176	-	-	-	1.5E-03	2.8E-02	2.8E-02
Pyrene	RD176	-	-	-	1.4E-04	2.5E-03	2.5E-03
C08-C11 (Gasoline Range)	RD727	1.10E+01	5.5E+00	UJ		-	-
C11-C14 (Kerosene Range)	RD727	1.10E+01	5.5E+00	UJ		-	-
C14-C20 (Diesel Range)	RD727	1.10E+01	5.5E+00	UJ		-	-
C20-C30 (Lubricant Oil Range)	RD727	1.10E+01	5.5E+00	UJ		-	-
C11-C30	RD727	-	1.7E+01	-		-	-
Benzene	RD727	6.00E-03	3.0E-03	U	1.2E-04	-	3.0E-03
Ethylbenzene	RD727	6.00E-03	3.0E-03	U	1.2E-04	-	3.0E-03
Toluene	RD727	6.00E-03	3.0E-03	U	1.2E-04	-	3.0E-03
m,p-Xylene	RD727	6.00E-03	3.0E-03	U	3.6E-04	-	3.0E-03
o-Xylene	RD727	6.00E-03	3.0E-03	U	8.0E-05	-	3.0E-03
Xylene (total)	RD727	-	-	-	4.4E-04	-	-
2-Methylnaphthalene	RD727	-	-	-	2.8E-02	-	-
Acenaphthene	RD727	-	-	-	5.7E-04	9.5E-03	9.5E-03
Acenaphthylene	RD727	-	-	-	7.0E-05	1.2E-03	1.2E-03
Anthracene	RD727	-	-	-	3.7E-04	6.2E-03	6.2E-03
Benzo(a)anthracene	RD727	-	-	-	2.7E-05	4.4E-04	4.4E-04
Benzo(a)pyrene	RD727	-	-	-	2.7E-05	4.5E-04	4.5E-04
Benzo(b)fluoranthene	RD727	-	-	-	4.3E-05	7.1E-04	7.1E-04
Benzo(e)pyrene	RD727	-	-	-	2.1E-04	3.4E-03	3.4E-03
Benzo(g,h,i)perylene	RD727	-	-	-	2.2E-04	3.6E-03	3.6E-03
Benzo(k)fluoranthene	RD727	-	-	-	2.1E-05	3.4E-04	3.4E-04
Chrysene	RD727	-	-	-	5.9E-05	9.7E-04	9.7E-04
Dibenz(a,h)anthracene	RD727	-	-	-	1.1E-05	1.8E-04	1.8E-04
Fluoranthene	RD727	-	-	-	7.5E-05	1.2E-03	1.2E-03
Fluorene	RD727	-	-	-	5.7E-04	9.4E-03	9.4E-03
Indeno(1,2,3-cd)pyrene	RD727	-	-	-	2.4E-05	4.0E-04	4.0E-04
Naphthalene	RD727	-	-	-	6.9E-03	-	-
Perylene	RD727	-	-	-	1.2E-04	1.9E-03	1.9E-03
Phenanthrene	RD727	-	-	-	1.5E-03	2.5E-02	2.5E-02
Pyrene	RD727	-	-	-	1.4E-04	2.2E-03	2.2E-03
C08-C11 (Gasoline Range)	RD728	5.80E+01	2.9E+01	UJ		-	-
C11-C14 (Kerosene Range)	RD728	5.80E+01	2.9E+01	UJ		-	-
C14-C20 (Diesel Range)	RD728	2.10E+02	2.1E+02	J		-	-
C20-C30 (Lubricant Oil Range)	RD728	9.20E+02	9.2E+02	J		-	-
C11-C30	RD728	-	1.2E+03	-		-	-
Benzene	RD728	-	-	-	1.2E-04	-	-
Ethylbenzene	RD728	-	-	-	1.2E-04	-	-
Toluene	RD728	-	-	-	1.2E-04	-	-
m,p-Xylene	RD728	-	-	-	3.6E-04	-	-
o-Xylene	RD728	-	-	-	8.0E-05	-	-
Xylene (total)	RD728	-	-	-	4.4E-04	-	-
2-Methylnaphthalene	RD728	-	-	-	2.8E-02	-	-
Acenaphthene	RD728	-	-	-	5.7E-04	6.6E-01	6.6E-01
Acenaphthylene	RD728	-	-	-	7.0E-05	8.1E-02	8.1E-02
Anthracene	RD728	-	-	-	3.7E-04	4.3E-01	4.3E-01
Benzo(a)anthracene	RD728	-	-	-	2.7E-05	3.1E-02	3.1E-02
Benzo(a)pyrene	RD728	-	-	-	2.7E-05	3.2E-02	3.2E-02
Benzo(b)fluoranthene	RD728	-	-	-	4.3E-05	5.0E-02	5.0E-02
Benzo(e)pyrene	RD728	-	-	-	2.1E-04	2.4E-01	2.4E-01
Benzo(g,h,i)perylene	RD728	-	-	-	2.2E-04	2.6E-01	2.6E-01
Benzo(k)fluoranthene	RD728	-	-	-	2.1E-05	2.4E-02	2.4E-02
Chrysene	RD728	-	-	-	5.9E-05	6.8E-02	6.8E-02
Dibenz(a,h)anthracene	RD728	-	-	-	1.1E-05	1.3E-02	1.3E-02

TPH to Petroleum Constituent Extrapolation for Soil (0-2 feet bgs) [a]
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration[a] (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Fluoranthene	RD728	-	-	-	7.5E-05	8.7E-02	8.7E-02
Fluorene	RD728	-	-	-	5.7E-04	6.6E-01	6.6E-01
Indeno(1,2,3-cd)pyrene	RD728	-	-	-	2.4E-05	2.8E-02	2.8E-02
Naphthalene	RD728	-	-	-	6.9E-03	-	-
Perylene	RD728	-	-	-	1.2E-04	1.4E-01	1.4E-01
Phenanthrene	RD728	-	-	-	1.5E-03	1.8E+00	1.8E+00
Pyrene	RD728	-	-	-	1.4E-04	1.6E-01	1.6E-01
C08-C11 (Gasoline Range)	RD737	1.50E+01	7.5E+00	UJ		-	-
C11-C14 (Kerosene Range)	RD737	1.50E+01	7.5E+00	UJ		-	-
C14-C20 (Diesel Range)	RD737	1.50E+01	7.5E+00	UJ		-	-
C20-C30 (Lubricant Oil Range)	RD737	1.50E+01	7.5E+00	UJ		-	-
C11-C30	RD737	-	2.3E+01	-		-	-
Benzene	RD737	-	-	-	1.2E-04	-	-
Ethylbenzene	RD737	-	-	-	1.2E-04	-	-
Toluene	RD737	-	-	-	1.2E-04	-	-
m,p-Xylene	RD737	-	-	-	3.6E-04	-	-
o-Xylene	RD737	-	-	-	8.0E-05	-	-
Xylene (total)	RD737	-	-	-	4.4E-04	-	-
2-Methylnaphthalene	RD737	-	-	-	2.8E-02	-	-
Acenaphthene	RD737	-	-	-	5.7E-04	1.3E-02	1.3E-02
Acenaphthylene	RD737	-	-	-	7.0E-05	1.6E-03	1.6E-03
Anthracene	RD737	-	-	-	3.7E-04	8.4E-03	8.4E-03
Benzo(a)anthracene	RD737	-	-	-	2.7E-05	6.1E-04	6.1E-04
Benzo(a)pyrene	RD737	-	-	-	2.7E-05	6.1E-04	6.1E-04
Benzo(b)fluoranthene	RD737	-	-	-	4.3E-05	9.7E-04	9.7E-04
Benzo(e)pyrene	RD737	-	-	-	2.1E-04	4.7E-03	4.7E-03
Benzo(g,h,i)perylene	RD737	-	-	-	2.2E-04	5.0E-03	5.0E-03
Benzo(k)fluoranthene	RD737	-	-	-	2.1E-05	4.6E-04	4.6E-04
Chrysene	RD737	-	-	-	5.9E-05	1.3E-03	1.3E-03
Dibenz(a,h)anthracene	RD737	-	-	-	1.1E-05	2.5E-04	2.5E-04
Fluoranthene	RD737	-	-	-	7.5E-05	1.7E-03	1.7E-03
Fluorene	RD737	-	-	-	5.7E-04	1.3E-02	1.3E-02
Indeno(1,2,3-cd)pyrene	RD737	-	-	-	2.4E-05	5.4E-04	5.4E-04
Naphthalene	RD737	-	-	-	6.9E-03	-	-
Perylene	RD737	-	-	-	1.2E-04	2.7E-03	2.7E-03
Phenanthrene	RD737	-	-	-	1.5E-03	3.4E-02	3.4E-02
Pyrene	RD737	-	-	-	1.4E-04	3.1E-03	3.1E-03
C08-C11 (Gasoline Range)	RD738	1.10E+01	5.5E+00	UJ		-	-
C11-C14 (Kerosene Range)	RD738	1.10E+01	5.5E+00	UJ		-	-
C14-C20 (Diesel Range)	RD738	1.10E+01	5.5E+00	UJ		-	-
C20-C30 (Lubricant Oil Range)	RD738	1.10E+01	5.5E+00	UJ		-	-
C11-C30	RD738	-	1.7E+01	-		-	-
Benzene	RD738	6.00E-03	3.0E-03	U	1.2E-04	-	3.0E-03
Ethylbenzene	RD738	6.00E-03	3.0E-03	U	1.2E-04	-	3.0E-03
Toluene	RD738	6.00E-03	3.0E-03	U	1.2E-04	-	3.0E-03
m,p-Xylene	RD738	6.00E-03	3.0E-03	U	3.6E-04	-	3.0E-03
o-Xylene	RD738	6.00E-03	3.0E-03	U	8.0E-05	-	3.0E-03
Xylene (total)	RD738	-	-	-	4.4E-04	-	-
2-Methylnaphthalene	RD738	-	-	-	2.8E-02	-	-
Acenaphthene	RD738	-	-	-	5.7E-04	9.5E-03	9.5E-03
Acenaphthylene	RD738	-	-	-	7.0E-05	1.2E-03	1.2E-03
Anthracene	RD738	-	-	-	3.7E-04	6.2E-03	6.2E-03
Benzo(a)anthracene	RD738	-	-	-	2.7E-05	4.4E-04	4.4E-04
Benzo(a)pyrene	RD738	-	-	-	2.7E-05	4.5E-04	4.5E-04
Benzo(b)fluoranthene	RD738	-	-	-	4.3E-05	7.1E-04	7.1E-04
Benzo(e)pyrene	RD738	-	-	-	2.1E-04	3.4E-03	3.4E-03

TPH to Petroleum Constituent Extrapolation for Soil (0-2 feet bgs) [a]
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration[a] (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Benzo(g,h,i)perylene	RD738	-	-	-	2.2E-04	3.6E-03	3.6E-03
Benzo(k)fluoranthene	RD738	-	-	-	2.1E-05	3.4E-04	3.4E-04
Chrysene	RD738	-	-	-	5.9E-05	9.7E-04	9.7E-04
Dibenz(a,h)anthracene	RD738	-	-	-	1.1E-05	1.8E-04	1.8E-04
Fluoranthene	RD738	-	-	-	7.5E-05	1.2E-03	1.2E-03
Fluorene	RD738	-	-	-	5.7E-04	9.4E-03	9.4E-03
Indeno(1,2,3-cd)pyrene	RD738	-	-	-	2.4E-05	4.0E-04	4.0E-04
Naphthalene	RD738	-	-	-	6.9E-03	-	-
Perylene	RD738	-	-	-	1.2E-04	1.9E-03	1.9E-03
Phenanthrene	RD738	-	-	-	1.5E-03	2.5E-02	2.5E-02
Pyrene	RD738	-	-	-	1.4E-04	2.2E-03	2.2E-03
C08-C11 (Gasoline Range)	RJ782	1.70E+01	8.5E+00	U		-	-
C11-C14 (Kerosene Range)	RJ782	1.70E+01	8.5E+00	U		-	-
C14-C20 (Diesel Range)	RJ782	1.70E+00	1.7E+00	J		-	-
C20-C30 (Lubricant Oil Range)	RJ782	1.20E+02	1.2E+02			-	-
C11-C30	RJ782	-	1.3E+02	-		-	-
Benzene	RJ782	-	-	-	1.2E-04	-	-
Ethylbenzene	RJ782	-	-	-	1.2E-04	-	-
Toluene	RJ782	-	-	-	1.2E-04	-	-
m,p-Xylene	RJ782	-	-	-	3.6E-04	-	-
o-Xylene	RJ782	-	-	-	8.0E-05	-	-
Xylene (total)	RJ782	-	-	-	4.4E-04	-	-
2-Methylnaphthalene	RJ782	3.00E-03	1.5E-03	U	2.8E-02	-	1.5E-03
Acenaphthene	RJ782	3.00E-03	1.5E-03	U	5.7E-04	7.5E-02	1.5E-03
Acenaphthylene	RJ782	3.00E-03	1.5E-03	U	7.0E-05	9.1E-03	1.5E-03
Anthracene	RJ782	3.00E-03	1.5E-03	U	3.7E-04	4.9E-02	1.5E-03
Benzo(a)anthracene	RJ782	4.00E-03	4.0E-03		2.7E-05	3.5E-03	4.0E-03
Benzo(a)pyrene	RJ782	6.00E-03	6.0E-03		2.7E-05	3.5E-03	6.0E-03
Benzo(b)fluoranthene	RJ782	8.00E-03	8.0E-03		4.3E-05	5.6E-03	8.0E-03
Benzo(e)pyrene	RJ782	-	-	-	2.1E-04	2.7E-02	2.7E-02
Benzo(g,h,i)perylene	RJ782	3.00E-03	1.5E-03	U	2.2E-04	2.9E-02	1.5E-03
Benzo(k)fluoranthene	RJ782	7.00E-03	7.0E-03		2.1E-05	2.7E-03	7.0E-03
Chrysene	RJ782	8.00E-03	8.0E-03		5.9E-05	7.6E-03	8.0E-03
Dibenz(a,h)anthracene	RJ782	3.00E-03	1.5E-03	U	1.1E-05	1.4E-03	1.4E-03
Fluoranthene	RJ782	9.00E-03	9.0E-03		7.5E-05	9.7E-03	9.0E-03
Fluorene	RJ782	3.00E-03	1.5E-03	U	5.7E-04	7.4E-02	1.5E-03
Indeno(1,2,3-cd)pyrene	RJ782	3.00E-03	1.5E-03	U	2.4E-05	3.1E-03	1.5E-03
Naphthalene	RJ782	3.00E-03	1.5E-03	U	6.9E-03	-	1.5E-03
Perylene	RJ782	-	-	-	1.2E-04	1.5E-02	1.5E-02
Phenanthrene	RJ782	4.00E-03	4.0E-03		1.5E-03	2.0E-01	4.0E-03
Pyrene	RJ782	9.00E-03	9.0E-03		1.4E-04	1.8E-02	9.0E-03
C08-C11 (Gasoline Range)	RS288	5.40E+01	2.7E+01	U		-	-
C11-C14 (Kerosene Range)	RS288	5.40E+01	2.7E+01	U		-	-
C14-C20 (Diesel Range)	RS288	7.60E+01	7.6E+01			-	-
C20-C30 (Lubricant Oil Range)	RS288	2.50E+02	2.5E+02			-	-
C11-C30	RS288	-	3.5E+02	-		-	-
Benzene	RS288	-	-	-	1.2E-04	-	-
Ethylbenzene	RS288	-	-	-	1.2E-04	-	-
Toluene	RS288	-	-	-	1.2E-04	-	-
m,p-Xylene	RS288	-	-	-	3.6E-04	-	-
o-Xylene	RS288	-	-	-	8.0E-05	-	-
Xylene (total)	RS288	-	-	-	4.4E-04	-	-
2-Methylnaphthalene	RS288DL	-	-	-	2.8E-02	-	-
Acenaphthene	RS288DL	3.20E+00	1.6E+00	U	5.7E-04	2.0E-01	2.0E-01
Acenaphthylene	RS288DL	3.20E+00	1.6E+00	U	7.0E-05	2.5E-02	2.5E-02
Anthracene	RS288DL	3.20E+00	1.6E+00	U	3.7E-04	1.3E-01	1.3E-01

TPH to Petroleum Constituent Extrapolation for Soil (0-2 feet bgs) [a]
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration[a] (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Benzo(a)anthracene	RS288DL	3.20E+00	1.6E+00	U	2.7E-05	9.5E-03	9.5E-03
Benzo(a)pyrene	RS288DL	3.20E+00	1.6E+00	U	2.7E-05	9.6E-03	9.6E-03
Benzo(b)fluoranthene	RS288DL	3.20E+00	1.6E+00	U	4.3E-05	1.5E-02	1.5E-02
Benzo(e)pyrene	RS288DL	-	-	-	2.1E-04	7.3E-02	7.3E-02
Benzo(g,h,i)perylene	RS288DL	3.20E+00	1.6E+00	U	2.2E-04	7.8E-02	7.8E-02
Benzo(k)fluoranthene	RS288DL	3.20E+00	1.6E+00	U	2.1E-05	7.2E-03	7.2E-03
Chrysene	RS288DL	3.20E+00	1.6E+00	U	5.9E-05	2.1E-02	2.1E-02
Dibenz(a,h)anthracene	RS288DL	3.20E+00	1.6E+00	U	1.1E-05	3.9E-03	3.9E-03
Fluoranthene	RS288DL	3.20E+00	1.6E+00	U	7.5E-05	2.6E-02	2.6E-02
Fluorene	RS288DL	3.20E+00	1.6E+00	U	5.7E-04	2.0E-01	2.0E-01
Indeno(1,2,3-cd)pyrene	RS288DL	3.20E+00	1.6E+00	U	2.4E-05	8.5E-03	8.5E-03
Naphthalene	RS288DL	3.20E+00	1.6E+00	U	6.9E-03	-	1.6E+00
Perylene	RS288DL	-	-	-	1.2E-04	4.2E-02	4.2E-02
Phenanthrene	RS288DL	3.20E+00	1.6E+00	U	1.5E-03	5.4E-01	5.4E-01
Pyrene	RS288DL	3.20E+00	1.6E+00	U	1.4E-04	4.8E-02	4.8E-02
C08-C11 (Gasoline Range)	RS290	1.10E+01	5.5E+00	U		-	-
C11-C14 (Kerosene Range)	RS290	1.10E+01	5.5E+00	U		-	-
C14-C20 (Diesel Range)	RS290	1.10E+01	5.5E+00	U		-	-
C20-C30 (Lubricant Oil Range)	RS290	4.20E+01	4.2E+01			-	-
C11-C30	RS290	-	5.3E+01	-		-	-
Benzene	RS290	-	-	-	1.2E-04	-	-
Ethylbenzene	RS290	-	-	-	1.2E-04	-	-
Toluene	RS290	-	-	-	1.2E-04	-	-
m,p-Xylene	RS290	-	-	-	3.6E-04	-	-
o-Xylene	RS290	-	-	-	8.0E-05	-	-
Xylene (total)	RS290	-	-	-	4.4E-04	-	-
2-Methylnaphthalene	RS290	-	-	-	2.8E-02	-	-
Acenaphthene	RS290	3.30E-02	1.7E-02	U	5.7E-04	3.0E-02	1.7E-02
Acenaphthylene	RS290	3.30E-02	1.7E-02	U	7.0E-05	3.7E-03	3.7E-03
Anthracene	RS290	3.30E-02	1.7E-02	U	3.7E-04	2.0E-02	1.7E-02
Benzo(a)anthracene	RS290	3.30E-02	1.7E-02	U	2.7E-05	1.4E-03	1.4E-03
Benzo(a)pyrene	RS290	3.30E-02	1.7E-02	U	2.7E-05	1.4E-03	1.4E-03
Benzo(b)fluoranthene	RS290	3.30E-02	1.7E-02	U	4.3E-05	2.3E-03	2.3E-03
Benzo(e)pyrene	RS290	-	-	-	2.1E-04	1.1E-02	1.1E-02
Benzo(g,h,i)perylene	RS290	3.30E-02	1.7E-02	U	2.2E-04	1.2E-02	1.2E-02
Benzo(k)fluoranthene	RS290	3.30E-02	1.7E-02	U	2.1E-05	1.1E-03	1.1E-03
Chrysene	RS290	3.30E-02	1.7E-02	U	5.9E-05	3.1E-03	3.1E-03
Dibenz(a,h)anthracene	RS290	3.30E-02	1.7E-02	U	1.1E-05	5.9E-04	5.9E-04
Fluoranthene	RS290	3.30E-02	1.7E-02	U	7.5E-05	4.0E-03	4.0E-03
Fluorene	RS290	3.30E-02	1.7E-02	U	5.7E-04	3.0E-02	1.7E-02
Indeno(1,2,3-cd)pyrene	RS290	3.30E-02	1.7E-02	U	2.4E-05	1.3E-03	1.3E-03
Naphthalene	RS290	3.30E-02	1.7E-02	U	6.9E-03	-	1.7E-02
Perylene	RS290	-	-	-	1.2E-04	6.2E-03	6.2E-03
Phenanthrene	RS290	3.30E-02	1.7E-02	U	1.5E-03	8.1E-02	1.7E-02
Pyrene	RS290	3.30E-02	1.7E-02	U	1.4E-04	7.2E-03	7.2E-03
C08-C11 (Gasoline Range)	RS291	1.10E+01	5.5E+00	U		-	-
C11-C14 (Kerosene Range)	RS291	1.10E+01	5.5E+00	U		-	-
C14-C20 (Diesel Range)	RS291	1.10E+01	5.5E+00	U		-	-
C20-C30 (Lubricant Oil Range)	RS291	1.10E+01	5.5E+00	U		-	-
C11-C30	RS291	-	1.7E+01	-		-	-
Benzene	RS291	5.00E-03	2.5E-03	U	1.2E-04	-	2.5E-03
Ethylbenzene	RS291	5.00E-03	2.5E-03	U	1.2E-04	-	2.5E-03
Toluene	RS291	5.00E-03	2.5E-03	U	1.2E-04	-	2.5E-03
m,p-Xylene	RS291	5.00E-03	2.5E-03	U	3.6E-04	-	2.5E-03
o-Xylene	RS291	5.00E-03	2.5E-03	U	8.0E-05	-	2.5E-03
Xylene (total)	RS291	-	-	-	4.4E-04	-	-

TPH to Petroleum Constituent Extrapolation for Soil (0-2 feet bgs) [a]
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration[a] (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
2-Methylnaphthalene	RS291	-	-	-	2.8E-02	-	-
Acenaphthene	RS291	3.20E-02	1.6E-02	U	5.7E-04	9.5E-03	9.5E-03
Acenaphthylene	RS291	3.20E-02	1.6E-02	U	7.0E-05	1.2E-03	1.2E-03
Anthracene	RS291	3.20E-02	1.6E-02	U	3.7E-04	6.2E-03	6.2E-03
Benzo(a)anthracene	RS291	3.20E-02	1.6E-02	U	2.7E-05	4.4E-04	4.4E-04
Benzo(a)pyrene	RS291	3.20E-02	1.6E-02	U	2.7E-05	4.5E-04	4.5E-04
Benzo(b)fluoranthene	RS291	3.20E-02	1.6E-02	U	4.3E-05	7.1E-04	7.1E-04
Benzo(e)pyrene	RS291	-	-	-	2.1E-04	3.4E-03	3.4E-03
Benzo(g,h,i)perylene	RS291	3.20E-02	1.6E-02	U	2.2E-04	3.6E-03	3.6E-03
Benzo(k)fluoranthene	RS291	3.20E-02	1.6E-02	U	2.1E-05	3.4E-04	3.4E-04
Chrysene	RS291	3.20E-02	1.6E-02	U	5.9E-05	9.7E-04	9.7E-04
Dibenz(a,h)anthracene	RS291	3.20E-02	1.6E-02	U	1.1E-05	1.8E-04	1.8E-04
Fluoranthene	RS291	3.20E-02	1.6E-02	U	7.5E-05	1.2E-03	1.2E-03
Fluorene	RS291	3.20E-02	1.6E-02	U	5.7E-04	9.4E-03	9.4E-03
Indeno(1,2,3-cd)pyrene	RS291	3.20E-02	1.6E-02	U	2.4E-05	4.0E-04	4.0E-04
Naphthalene	RS291	3.20E-02	1.6E-02	U	6.9E-03	-	1.6E-02
Perylene	RS291	-	-	-	1.2E-04	1.9E-03	1.9E-03
Phenanthrene	RS291	3.20E-02	1.6E-02	U	1.5E-03	2.5E-02	1.6E-02
Pyrene	RS291	3.20E-02	1.6E-02	U	1.4E-04	2.2E-03	2.2E-03
C08-C11 (Gasoline Range)	RS292	1.10E+01	5.5E+00	U		-	-
C11-C14 (Kerosene Range)	RS292	1.10E+01	5.5E+00	U		-	-
C14-C20 (Diesel Range)	RS292	1.10E+01	5.5E+00	U		-	-
C20-C30 (Lubricant Oil Range)	RS292	1.10E+01	5.5E+00	U		-	-
C11-C30	RS292	-	1.7E+01	-		-	-
Benzene	RS292	-	-	-	1.2E-04	-	-
Ethylbenzene	RS292	-	-	-	1.2E-04	-	-
Toluene	RS292	-	-	-	1.2E-04	-	-
m,p-Xylene	RS292	-	-	-	3.6E-04	-	-
o-Xylene	RS292	-	-	-	8.0E-05	-	-
Xylene (total)	RS292	-	-	-	4.4E-04	-	-
2-Methylnaphthalene	RS292	-	-	-	2.8E-02	-	-
Acenaphthene	RS292	3.40E-02	1.7E-02	U	5.7E-04	9.5E-03	9.5E-03
Acenaphthylene	RS292	3.40E-02	1.7E-02	U	7.0E-05	1.2E-03	1.2E-03
Anthracene	RS292	3.40E-02	1.7E-02	U	3.7E-04	6.2E-03	6.2E-03
Benzo(a)anthracene	RS292	3.40E-02	1.7E-02	U	2.7E-05	4.4E-04	4.4E-04
Benzo(a)pyrene	RS292	3.40E-02	1.7E-02	U	2.7E-05	4.5E-04	4.5E-04
Benzo(b)fluoranthene	RS292	3.40E-02	1.7E-02	U	4.3E-05	7.1E-04	7.1E-04
Benzo(e)pyrene	RS292	-	-	-	2.1E-04	3.4E-03	3.4E-03
Benzo(g,h,i)perylene	RS292	3.40E-02	1.7E-02	U	2.2E-04	3.6E-03	3.6E-03
Benzo(k)fluoranthene	RS292	3.40E-02	1.7E-02	U	2.1E-05	3.4E-04	3.4E-04
Chrysene	RS292	3.40E-02	1.7E-02	U	5.9E-05	9.7E-04	9.7E-04
Dibenz(a,h)anthracene	RS292	3.40E-02	1.7E-02	U	1.1E-05	1.8E-04	1.8E-04
Fluoranthene	RS292	3.40E-02	1.7E-02	U	7.5E-05	1.2E-03	1.2E-03
Fluorene	RS292	3.40E-02	1.7E-02	U	5.7E-04	9.4E-03	9.4E-03
Indeno(1,2,3-cd)pyrene	RS292	3.40E-02	1.7E-02	U	2.4E-05	4.0E-04	4.0E-04
Naphthalene	RS292	3.40E-02	1.7E-02	U	6.9E-03	-	1.7E-02
Perylene	RS292	-	-	-	1.2E-04	1.9E-03	1.9E-03
Phenanthrene	RS292	3.40E-02	1.7E-02	U	1.5E-03	2.5E-02	1.7E-02
Pyrene	RS292	3.40E-02	1.7E-02	U	1.4E-04	2.2E-03	2.2E-03
C08-C11 (Gasoline Range)	RS293	5.20E+01	2.6E+01	U		-	-
C11-C14 (Kerosene Range)	RS293	8.90E+01	8.9E+01			-	-
C14-C20 (Diesel Range)	RS293	7.00E+02	7.0E+02			-	-
C20-C30 (Lubricant Oil Range)	RS293	7.20E+02	7.2E+02			-	-
C11-C30	RS293	-	1.5E+03	-		-	-
Benzene	RS293	-	-	-	1.2E-04	-	-
Ethylbenzene	RS293	-	-	-	1.2E-04	-	-

TPH to Petroleum Constituent Extrapolation for Soil (0-2 feet bgs) [a]
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration[a] (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Toluene	RS293	-	-	-	1.2E-04	-	-
m,p-Xylene	RS293	-	-	-	3.6E-04	-	-
o-Xylene	RS293	-	-	-	8.0E-05	-	-
Xylene (total)	RS293	-	-	-	4.4E-04	-	-
2-Methylnaphthalene	RS293	-	-	-	2.8E-02	-	-
Acenaphthene	RS293	-	-	-	5.7E-04	8.6E-01	8.6E-01
Acenaphthylene	RS293	-	-	-	7.0E-05	1.1E-01	1.1E-01
Anthracene	RS293	-	-	-	3.7E-04	5.6E-01	5.6E-01
Benzo(a)anthracene	RS293	-	-	-	2.7E-05	4.1E-02	4.1E-02
Benzo(a)pyrene	RS293	-	-	-	2.7E-05	4.1E-02	4.1E-02
Benzo(b)fluoranthene	RS293	-	-	-	4.3E-05	6.5E-02	6.5E-02
Benzo(e)pyrene	RS293	-	-	-	2.1E-04	3.1E-01	3.1E-01
Benzo(g,h,i)perylene	RS293	-	-	-	2.2E-04	3.3E-01	3.3E-01
Benzo(k)fluoranthene	RS293	-	-	-	2.1E-05	3.1E-02	3.1E-02
Chrysene	RS293	-	-	-	5.9E-05	8.9E-02	8.9E-02
Dibenz(a,h)anthracene	RS293	-	-	-	1.1E-05	1.7E-02	1.7E-02
Fluoranthene	RS293	-	-	-	7.5E-05	1.1E-01	1.1E-01
Fluorene	RS293	-	-	-	5.7E-04	8.6E-01	8.6E-01
Indeno(1,2,3-cd)pyrene	RS293	-	-	-	2.4E-05	3.6E-02	3.6E-02
Naphthalene	RS293	-	-	-	6.9E-03	-	-
Perylene	RS293	-	-	-	1.2E-04	1.8E-01	1.8E-01
Phenanthrene	RS293	-	-	-	1.5E-03	2.3E+00	2.3E+00
Pyrene	RS293	-	-	-	1.4E-04	2.1E-01	2.1E-01
C08-C11 (Gasoline Range)	RS294	1.10E+01	5.5E+00	U		-	-
C11-C14 (Kerosene Range)	RS294	1.10E+01	5.5E+00	U		-	-
C14-C20 (Diesel Range)	RS294	1.10E+01	5.5E+00	U		-	-
C20-C30 (Lubricant Oil Range)	RS294	1.10E+01	5.5E+00	U		-	-
C11-C30	RS294	-	1.7E+01	-		-	-
Benzene	RS294	-	-	-	1.2E-04	-	-
Ethylbenzene	RS294	-	-	-	1.2E-04	-	-
Toluene	RS294	-	-	-	1.2E-04	-	-
m,p-Xylene	RS294	-	-	-	3.6E-04	-	-
o-Xylene	RS294	-	-	-	8.0E-05	-	-
Xylene (total)	RS294	-	-	-	4.4E-04	-	-
2-Methylnaphthalene	RS294	-	-	-	2.8E-02	-	-
Acenaphthene	RS294	-	-	-	5.7E-04	9.5E-03	9.5E-03
Acenaphthylene	RS294	-	-	-	7.0E-05	1.2E-03	1.2E-03
Anthracene	RS294	-	-	-	3.7E-04	6.2E-03	6.2E-03
Benzo(a)anthracene	RS294	-	-	-	2.7E-05	4.4E-04	4.4E-04
Benzo(a)pyrene	RS294	-	-	-	2.7E-05	4.5E-04	4.5E-04
Benzo(b)fluoranthene	RS294	-	-	-	4.3E-05	7.1E-04	7.1E-04
Benzo(e)pyrene	RS294	-	-	-	2.1E-04	3.4E-03	3.4E-03
Benzo(g,h,i)perylene	RS294	-	-	-	2.2E-04	3.6E-03	3.6E-03
Benzo(k)fluoranthene	RS294	-	-	-	2.1E-05	3.4E-04	3.4E-04
Chrysene	RS294	-	-	-	5.9E-05	9.7E-04	9.7E-04
Dibenz(a,h)anthracene	RS294	-	-	-	1.1E-05	1.8E-04	1.8E-04
Fluoranthene	RS294	-	-	-	7.5E-05	1.2E-03	1.2E-03
Fluorene	RS294	-	-	-	5.7E-04	9.4E-03	9.4E-03
Indeno(1,2,3-cd)pyrene	RS294	-	-	-	2.4E-05	4.0E-04	4.0E-04
Naphthalene	RS294	-	-	-	6.9E-03	-	-
Perylene	RS294	-	-	-	1.2E-04	1.9E-03	1.9E-03
Phenanthrene	RS294	-	-	-	1.5E-03	2.5E-02	2.5E-02
Pyrene	RS294	-	-	-	1.4E-04	2.2E-03	2.2E-03
C08-C11 (Gasoline Range)	RS295	1.10E+01	5.5E+00	U		-	-
C11-C14 (Kerosene Range)	RS295	1.10E+01	5.5E+00	U		-	-
C14-C20 (Diesel Range)	RS295	1.10E+01	5.5E+00	U		-	-

TPH to Petroleum Constituent Extrapolation for Soil (0-2 feet bgs) [a]
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration[a] (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
C20-C30 (Lubricant Oil Range)	RS295	1.10E+01	5.5E+00	U		-	-
C11-C30	RS295	-	1.7E+01	-		-	-
Benzene	RS295	-	-	-	1.2E-04	-	-
Ethylbenzene	RS295	-	-	-	1.2E-04	-	-
Toluene	RS295	-	-	-	1.2E-04	-	-
m,p-Xylene	RS295	-	-	-	3.6E-04	-	-
o-Xylene	RS295	-	-	-	8.0E-05	-	-
Xylene (total)	RS295	-	-	-	4.4E-04	-	-
2-Methylnaphthalene	RS295	-	-	-	2.8E-02	-	-
Acenaphthene	RS295	-	-	-	5.7E-04	9.5E-03	9.5E-03
Acenaphthylene	RS295	-	-	-	7.0E-05	1.2E-03	1.2E-03
Anthracene	RS295	-	-	-	3.7E-04	6.2E-03	6.2E-03
Benzo(a)anthracene	RS295	-	-	-	2.7E-05	4.4E-04	4.4E-04
Benzo(a)pyrene	RS295	-	-	-	2.7E-05	4.5E-04	4.5E-04
Benzo(b)fluoranthene	RS295	-	-	-	4.3E-05	7.1E-04	7.1E-04
Benzo(e)pyrene	RS295	-	-	-	2.1E-04	3.4E-03	3.4E-03
Benzo(g,h,i)perylene	RS295	-	-	-	2.2E-04	3.6E-03	3.6E-03
Benzo(k)fluoranthene	RS295	-	-	-	2.1E-05	3.4E-04	3.4E-04
Chrysene	RS295	-	-	-	5.9E-05	9.7E-04	9.7E-04
Dibenz(a,h)anthracene	RS295	-	-	-	1.1E-05	1.8E-04	1.8E-04
Fluoranthene	RS295	-	-	-	7.5E-05	1.2E-03	1.2E-03
Fluorene	RS295	-	-	-	5.7E-04	9.4E-03	9.4E-03
Indeno(1,2,3-cd)pyrene	RS295	-	-	-	2.4E-05	4.0E-04	4.0E-04
Naphthalene	RS295	-	-	-	6.9E-03	-	-
Perylene	RS295	-	-	-	1.2E-04	1.9E-03	1.9E-03
Phenanthrene	RS295	-	-	-	1.5E-03	2.5E-02	2.5E-02
Pyrene	RS295	-	-	-	1.4E-04	2.2E-03	2.2E-03
C08-C11 (Gasoline Range)	RS296	1.10E+01	5.5E+00	U		-	-
C11-C14 (Kerosene Range)	RS296	1.10E+01	5.5E+00	U		-	-
C14-C20 (Diesel Range)	RS296	1.10E+01	5.5E+00	U		-	-
C20-C30 (Lubricant Oil Range)	RS296	1.10E+01	5.5E+00	U		-	-
C11-C30	RS296	-	1.7E+01	-		-	-
Benzene	RS296	-	-	-	1.2E-04	-	-
Ethylbenzene	RS296	-	-	-	1.2E-04	-	-
Toluene	RS296	-	-	-	1.2E-04	-	-
m,p-Xylene	RS296	-	-	-	3.6E-04	-	-
o-Xylene	RS296	-	-	-	8.0E-05	-	-
Xylene (total)	RS296	-	-	-	4.4E-04	-	-
2-Methylnaphthalene	RS296	-	-	-	2.8E-02	-	-
Acenaphthene	RS296	-	-	-	5.7E-04	9.5E-03	9.5E-03
Acenaphthylene	RS296	-	-	-	7.0E-05	1.2E-03	1.2E-03
Anthracene	RS296	-	-	-	3.7E-04	6.2E-03	6.2E-03
Benzo(a)anthracene	RS296	-	-	-	2.7E-05	4.4E-04	4.4E-04
Benzo(a)pyrene	RS296	-	-	-	2.7E-05	4.5E-04	4.5E-04
Benzo(b)fluoranthene	RS296	-	-	-	4.3E-05	7.1E-04	7.1E-04
Benzo(e)pyrene	RS296	-	-	-	2.1E-04	3.4E-03	3.4E-03
Benzo(g,h,i)perylene	RS296	-	-	-	2.2E-04	3.6E-03	3.6E-03
Benzo(k)fluoranthene	RS296	-	-	-	2.1E-05	3.4E-04	3.4E-04
Chrysene	RS296	-	-	-	5.9E-05	9.7E-04	9.7E-04
Dibenz(a,h)anthracene	RS296	-	-	-	1.1E-05	1.8E-04	1.8E-04
Fluoranthene	RS296	-	-	-	7.5E-05	1.2E-03	1.2E-03
Fluorene	RS296	-	-	-	5.7E-04	9.4E-03	9.4E-03
Indeno(1,2,3-cd)pyrene	RS296	-	-	-	2.4E-05	4.0E-04	4.0E-04
Naphthalene	RS296	-	-	-	6.9E-03	-	-
Perylene	RS296	-	-	-	1.2E-04	1.9E-03	1.9E-03
Phenanthrene	RS296	-	-	-	1.5E-03	2.5E-02	2.5E-02

TPH to Petroleum Constituent Extrapolation for Soil (0-2 feet bgs) [a]
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration[a] (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Pyrene	RS296	-	-	-	1.4E-04	2.2E-03	2.2E-03
C08-C11 (Gasoline Range)	RS302	1.20E+01	6.0E+00	U		-	-
C11-C14 (Kerosene Range)	RS302	1.20E+01	6.0E+00	U		-	-
C14-C20 (Diesel Range)	RS302	1.20E+01	6.0E+00	U		-	-
C20-C30 (Lubricant Oil Range)	RS302	1.20E+01	6.0E+00	U		-	-
C11-C30	RS302	-	1.8E+01	-		-	-
Benzene	RS302	6.00E-03	3.0E-03	U	1.2E-04	-	3.0E-03
Ethylbenzene	RS302	6.00E-03	3.0E-03	U	1.2E-04	-	3.0E-03
Toluene	RS302	6.00E-03	3.0E-03	U	1.2E-04	-	3.0E-03
m,p-Xylene	RS302	6.00E-03	3.0E-03	U	3.6E-04	-	3.0E-03
o-Xylene	RS302	6.00E-03	3.0E-03	U	8.0E-05	-	3.0E-03
Xylene (total)	RS302	-	-	-	4.4E-04	-	-
2-Methylnaphthalene	RS302	-	-	-	2.8E-02	-	-
Acenaphthene	RS302	3.60E-02	1.8E-02	U	5.7E-04	1.0E-02	1.0E-02
Acenaphthylene	RS302	3.60E-02	1.8E-02	U	7.0E-05	1.3E-03	1.3E-03
Anthracene	RS302	3.60E-02	1.8E-02	U	3.7E-04	6.7E-03	6.7E-03
Benzo(a)anthracene	RS302	3.60E-02	1.8E-02	U	2.7E-05	4.9E-04	4.9E-04
Benzo(a)pyrene	RS302	3.60E-02	1.8E-02	U	2.7E-05	4.9E-04	4.9E-04
Benzo(b)fluoranthene	RS302	3.60E-02	1.8E-02	U	4.3E-05	7.8E-04	7.8E-04
Benzo(e)pyrene	RS302	-	-	-	2.1E-04	3.7E-03	3.7E-03
Benzo(g,h,i)perylene	RS302	3.60E-02	1.8E-02	U	2.2E-04	4.0E-03	4.0E-03
Benzo(k)fluoranthene	RS302	3.60E-02	1.8E-02	U	2.1E-05	3.7E-04	3.7E-04
Chrysene	RS302	3.60E-02	1.8E-02	U	5.9E-05	1.1E-03	1.1E-03
Dibenz(a,h)anthracene	RS302	3.60E-02	1.8E-02	U	1.1E-05	2.0E-04	2.0E-04
Fluoranthene	RS302	3.60E-02	1.8E-02	U	7.5E-05	1.3E-03	1.3E-03
Fluorene	RS302	3.60E-02	1.8E-02	U	5.7E-04	1.0E-02	1.0E-02
Indeno(1,2,3-cd)pyrene	RS302	3.60E-02	1.8E-02	U	2.4E-05	4.3E-04	4.3E-04
Naphthalene	RS302	3.60E-02	1.8E-02	U	6.9E-03	-	1.8E-02
Perylene	RS302	-	-	-	1.2E-04	2.1E-03	2.1E-03
Phenanthrene	RS302	3.60E-02	1.8E-02	U	1.5E-03	2.8E-02	1.8E-02
Pyrene	RS302	3.60E-02	1.8E-02	U	1.4E-04	2.5E-03	2.5E-03
C08-C11 (Gasoline Range)	RS581	1.40E+01	7.0E+00	UJ		-	-
C11-C14 (Kerosene Range)	RS581	1.40E+01	7.0E+00	UJ		-	-
C14-C20 (Diesel Range)	RS581	1.40E+01	7.0E+00	UJ		-	-
C20-C30 (Lubricant Oil Range)	RS581	1.40E+01	7.0E+00	UJ		-	-
C11-C30	RS581	-	2.1E+01	-		-	-
Benzene	RS581	-	-	-	1.2E-04	-	-
Ethylbenzene	RS581	-	-	-	1.2E-04	-	-
Toluene	RS581	-	-	-	1.2E-04	-	-
m,p-Xylene	RS581	-	-	-	3.6E-04	-	-
o-Xylene	RS581	-	-	-	8.0E-05	-	-
Xylene (total)	RS581	-	-	-	4.4E-04	-	-
2-Methylnaphthalene	RS581	-	-	-	2.8E-02	-	-
Acenaphthene	RS581	-	-	-	5.7E-04	1.2E-02	1.2E-02
Acenaphthylene	RS581	-	-	-	7.0E-05	1.5E-03	1.5E-03
Anthracene	RS581	-	-	-	3.7E-04	7.8E-03	7.8E-03
Benzo(a)anthracene	RS581	-	-	-	2.7E-05	5.7E-04	5.7E-04
Benzo(a)pyrene	RS581	-	-	-	2.7E-05	5.7E-04	5.7E-04
Benzo(b)fluoranthene	RS581	-	-	-	4.3E-05	9.1E-04	9.1E-04
Benzo(e)pyrene	RS581	-	-	-	2.1E-04	4.3E-03	4.3E-03
Benzo(g,h,i)perylene	RS581	-	-	-	2.2E-04	4.6E-03	4.6E-03
Benzo(k)fluoranthene	RS581	-	-	-	2.1E-05	4.3E-04	4.3E-04
Chrysene	RS581	-	-	-	5.9E-05	1.2E-03	1.2E-03
Dibenz(a,h)anthracene	RS581	-	-	-	1.1E-05	2.3E-04	2.3E-04
Fluoranthene	RS581	-	-	-	7.5E-05	1.6E-03	1.6E-03
Fluorene	RS581	-	-	-	5.7E-04	1.2E-02	1.2E-02

TPH to Petroleum Constituent Extrapolation for Soil (0-2 feet bgs) [a]
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration[a] (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Indeno(1,2,3-cd)pyrene	RS581	-	-	-	2.4E-05	5.1E-04	5.1E-04
Naphthalene	RS581	-	-	-	6.9E-03	-	-
Perylene	RS581	-	-	-	1.2E-04	2.5E-03	2.5E-03
Phenanthrene	RS581	-	-	-	1.5E-03	3.2E-02	3.2E-02
Pyrene	RS581	-	-	-	1.4E-04	2.9E-03	2.9E-03
C08-C11 (Gasoline Range)	RS668	1.30E+01	6.5E+00	UJ		-	-
C11-C14 (Kerosene Range)	RS668	1.30E+01	6.5E+00	UJ		-	-
C14-C20 (Diesel Range)	RS668	1.30E+01	6.5E+00	UJ		-	-
C20-C30 (Lubricant Oil Range)	RS668	1.30E+01	6.5E+00	UJ		-	-
C11-C30	RS668	-	2.0E+01	-		-	-
Benzene	RS668	-	-	-	1.2E-04	-	-
Ethylbenzene	RS668	-	-	-	1.2E-04	-	-
Toluene	RS668	-	-	-	1.2E-04	-	-
m,p-Xylene	RS668	-	-	-	3.6E-04	-	-
o-Xylene	RS668	-	-	-	8.0E-05	-	-
Xylene (total)	RS668	-	-	-	4.4E-04	-	-
2-Methylnaphthalene	RS668	-	-	-	2.8E-02	-	-
Acenaphthene	RS668	-	-	-	5.7E-04	1.1E-02	1.1E-02
Acenaphthylene	RS668	-	-	-	7.0E-05	1.4E-03	1.4E-03
Anthracene	RS668	-	-	-	3.7E-04	7.3E-03	7.3E-03
Benzo(a)anthracene	RS668	-	-	-	2.7E-05	5.3E-04	5.3E-04
Benzo(a)pyrene	RS668	-	-	-	2.7E-05	5.3E-04	5.3E-04
Benzo(b)fluoranthene	RS668	-	-	-	4.3E-05	8.4E-04	8.4E-04
Benzo(e)pyrene	RS668	-	-	-	2.1E-04	4.0E-03	4.0E-03
Benzo(g,h,i)perylene	RS668	-	-	-	2.2E-04	4.3E-03	4.3E-03
Benzo(k)fluoranthene	RS668	-	-	-	2.1E-05	4.0E-04	4.0E-04
Chrysene	RS668	-	-	-	5.9E-05	1.1E-03	1.1E-03
Dibenz(a,h)anthracene	RS668	-	-	-	1.1E-05	2.2E-04	2.2E-04
Fluoranthene	RS668	-	-	-	7.5E-05	1.5E-03	1.5E-03
Fluorene	RS668	-	-	-	5.7E-04	1.1E-02	1.1E-02
Indeno(1,2,3-cd)pyrene	RS668	-	-	-	2.4E-05	4.7E-04	4.7E-04
Naphthalene	RS668	-	-	-	6.9E-03	-	-
Perylene	RS668	-	-	-	1.2E-04	2.3E-03	2.3E-03
Phenanthrene	RS668	-	-	-	1.5E-03	3.0E-02	3.0E-02
Pyrene	RS668	-	-	-	1.4E-04	2.7E-03	2.7E-03
C08-C11 (Gasoline Range)	RS670	1.10E+01	5.5E+00	UJ		-	-
C11-C14 (Kerosene Range)	RS670	1.10E+01	5.5E+00	UJ		-	-
C14-C20 (Diesel Range)	RS670	1.10E+01	5.5E+00	UJ		-	-
C20-C30 (Lubricant Oil Range)	RS670	1.10E+01	5.5E+00	UJ		-	-
C11-C30	RS670	-	1.7E+01	-		-	-
Benzene	RS670	-	-	-	1.2E-04	-	-
Ethylbenzene	RS670	-	-	-	1.2E-04	-	-
Toluene	RS670	-	-	-	1.2E-04	-	-
m,p-Xylene	RS670	-	-	-	3.6E-04	-	-
o-Xylene	RS670	-	-	-	8.0E-05	-	-
Xylene (total)	RS670	-	-	-	4.4E-04	-	-
2-Methylnaphthalene	RS670	-	-	-	2.8E-02	-	-
Acenaphthene	RS670	-	-	-	5.7E-04	9.5E-03	9.5E-03
Acenaphthylene	RS670	-	-	-	7.0E-05	1.2E-03	1.2E-03
Anthracene	RS670	-	-	-	3.7E-04	6.2E-03	6.2E-03
Benzo(a)anthracene	RS670	-	-	-	2.7E-05	4.4E-04	4.4E-04
Benzo(a)pyrene	RS670	-	-	-	2.7E-05	4.5E-04	4.5E-04
Benzo(b)fluoranthene	RS670	-	-	-	4.3E-05	7.1E-04	7.1E-04
Benzo(e)pyrene	RS670	-	-	-	2.1E-04	3.4E-03	3.4E-03
Benzo(g,h,i)perylene	RS670	-	-	-	2.2E-04	3.6E-03	3.6E-03
Benzo(k)fluoranthene	RS670	-	-	-	2.1E-05	3.4E-04	3.4E-04

TPH to Petroleum Constituent Extrapolation for Soil (0-2 feet bgs) [a]
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration[a] (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Chrysene	RS670	-	-	-	5.9E-05	9.7E-04	9.7E-04
Dibenz(a,h)anthracene	RS670	-	-	-	1.1E-05	1.8E-04	1.8E-04
Fluoranthene	RS670	-	-	-	7.5E-05	1.2E-03	1.2E-03
Fluorene	RS670	-	-	-	5.7E-04	9.4E-03	9.4E-03
Indeno(1,2,3-cd)pyrene	RS670	-	-	-	2.4E-05	4.0E-04	4.0E-04
Naphthalene	RS670	-	-	-	6.9E-03	-	-
Perylene	RS670	-	-	-	1.2E-04	1.9E-03	1.9E-03
Phenanthrene	RS670	-	-	-	1.5E-03	2.5E-02	2.5E-02
Pyrene	RS670	-	-	-	1.4E-04	2.2E-03	2.2E-03
C08-C11 (Gasoline Range)	RS671DL	1.09E+02	5.5E+01	UJ		-	-
C11-C14 (Kerosene Range)	RS671DL	1.09E+02	5.5E+01	UJ		-	-
C14-C20 (Diesel Range)	RS671DL	1.10E+03	1.1E+03	J		-	-
C20-C30 (Lubricant Oil Range)	RS671DL	8.30E+03	8.3E+03	J		-	-
C11-C30	RS671DL	-	9.5E+03	-		-	-
Benzene	RS671DL	-	-	-	1.2E-04	-	-
Ethylbenzene	RS671DL	-	-	-	1.2E-04	-	-
Toluene	RS671DL	-	-	-	1.2E-04	-	-
m,p-Xylene	RS671DL	-	-	-	3.6E-04	-	-
o-Xylene	RS671DL	-	-	-	8.0E-05	-	-
Xylene (total)	RS671DL	-	-	-	4.4E-04	-	-
2-Methylnaphthalene	RS671DL	-	-	-	2.8E-02	-	-
Acenaphthene	RS671DL	-	-	-	5.7E-04	5.4E+00	5.4E+00
Acenaphthylene	RS671DL	-	-	-	7.0E-05	6.6E-01	6.6E-01
Anthracene	RS671DL	-	-	-	3.7E-04	3.5E+00	3.5E+00
Benzo(a)anthracene	RS671DL	-	-	-	2.7E-05	2.5E-01	2.5E-01
Benzo(a)pyrene	RS671DL	-	-	-	2.7E-05	2.6E-01	2.6E-01
Benzo(b)fluoranthene	RS671DL	-	-	-	4.3E-05	4.1E-01	4.1E-01
Benzo(e)pyrene	RS671DL	-	-	-	2.1E-04	2.0E+00	2.0E+00
Benzo(g,h,i)perylene	RS671DL	-	-	-	2.2E-04	2.1E+00	2.1E+00
Benzo(k)fluoranthene	RS671DL	-	-	-	2.1E-05	1.9E-01	1.9E-01
Chrysene	RS671DL	-	-	-	5.9E-05	5.5E-01	5.5E-01
Dibenz(a,h)anthracene	RS671DL	-	-	-	1.1E-05	1.0E-01	1.0E-01
Fluoranthene	RS671DL	-	-	-	7.5E-05	7.1E-01	7.1E-01
Fluorene	RS671DL	-	-	-	5.7E-04	5.4E+00	5.4E+00
Indeno(1,2,3-cd)pyrene	RS671DL	-	-	-	2.4E-05	2.3E-01	2.3E-01
Naphthalene	RS671DL	-	-	-	6.9E-03	-	-
Perylene	RS671DL	-	-	-	1.2E-04	1.1E+00	1.1E+00
Phenanthrene	RS671DL	-	-	-	1.5E-03	1.4E+01	1.4E+01
Pyrene	RS671DL	-	-	-	1.4E-04	1.3E+00	1.3E+00
C08-C11 (Gasoline Range)	RS878	1.00E+01	5.0E+00	UJ		-	-
C11-C14 (Kerosene Range)	RS878	1.00E+01	5.0E+00	UJ		-	-
C14-C20 (Diesel Range)	RS878	1.00E+01	5.0E+00	UJ		-	-
C20-C30 (Lubricant Oil Range)	RS878	1.00E+01	5.0E+00	UJ		-	-
C11-C30	RS878	-	1.5E+01	-		-	-
Benzene	RS878	-	-	-	1.2E-04	-	-
Ethylbenzene	RS878	-	-	-	1.2E-04	-	-
Toluene	RS878	-	-	-	1.2E-04	-	-
m,p-Xylene	RS878	-	-	-	3.6E-04	-	-
o-Xylene	RS878	-	-	-	8.0E-05	-	-
Xylene (total)	RS878	-	-	-	4.4E-04	-	-
2-Methylnaphthalene	RS878	-	-	-	2.8E-02	-	-
Acenaphthene	RS878	3.10E-02	1.6E-02	U	5.7E-04	8.6E-03	8.6E-03
Acenaphthylene	RS878	3.10E-02	1.6E-02	U	7.0E-05	1.1E-03	1.1E-03
Anthracene	RS878	3.10E-02	1.6E-02	U	3.7E-04	5.6E-03	5.6E-03
Benzo(a)anthracene	RS878	3.10E-02	1.6E-02	U	2.7E-05	4.0E-04	4.0E-04
Benzo(a)pyrene	RS878	3.10E-02	1.6E-02	U	2.7E-05	4.1E-04	4.1E-04

TPH to Petroleum Constituent Extrapolation for Soil (0-2 feet bgs) [a]
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration[a] (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Benzo(b)fluoranthene	RS878	3.10E-02	1.6E-02	U	4.3E-05	6.5E-04	6.5E-04
Benzo(e)pyrene	RS878	-	-	-	2.1E-04	3.1E-03	3.1E-03
Benzo(g,h,i)perylene	RS878	3.10E-02	1.6E-02	U	2.2E-04	3.3E-03	3.3E-03
Benzo(k)fluoranthene	RS878	3.10E-02	1.6E-02	U	2.1E-05	3.1E-04	3.1E-04
Chrysene	RS878	3.10E-02	1.6E-02	U	5.9E-05	8.8E-04	8.8E-04
Dibenz(a,h)anthracene	RS878	3.10E-02	1.6E-02	U	1.1E-05	1.7E-04	1.7E-04
Fluoranthene	RS878	3.10E-02	1.6E-02	U	7.5E-05	1.1E-03	1.1E-03
Fluorene	RS878	3.10E-02	1.6E-02	U	5.7E-04	8.5E-03	8.5E-03
Indeno(1,2,3-cd)pyrene	RS878	3.10E-02	1.6E-02	U	2.4E-05	3.6E-04	3.6E-04
Naphthalene	RS878	3.10E-02	1.6E-02	U	6.9E-03	-	1.6E-02
Perylene	RS878	-	-	-	1.2E-04	1.8E-03	1.8E-03
Phenanthrene	RS878	3.10E-02	1.6E-02	U	1.5E-03	2.3E-02	1.6E-02
Pyrene	RS878	3.10E-02	1.6E-02	U	1.4E-04	2.0E-03	2.0E-03
C08-C11 (Gasoline Range)	RS879	1.00E+01	5.0E+00	UJ		-	-
C11-C14 (Kerosene Range)	RS879	1.00E+01	5.0E+00	UJ		-	-
C14-C20 (Diesel Range)	RS879	1.00E+01	5.0E+00	UJ		-	-
C20-C30 (Lubricant Oil Range)	RS879	1.00E+01	5.0E+00	UJ		-	-
C11-C30	RS879	-	1.5E+01	-		-	-
Benzene	RS879	1.00E-02	5.0E-03	U	1.2E-04	-	5.0E-03
Ethylbenzene	RS879	1.00E-02	5.0E-03	U	1.2E-04	-	5.0E-03
Toluene	RS879	1.00E-02	5.0E-03	U	1.2E-04	-	5.0E-03
m,p-Xylene	RS879	1.00E-02	5.0E-03	U	3.6E-04	-	5.0E-03
o-Xylene	RS879	1.00E-02	5.0E-03	U	8.0E-05	-	5.0E-03
Xylene (total)	RS879	-	-	-	4.4E-04	-	-
2-Methylnaphthalene	RS879	-	-	-	2.8E-02	-	-
Acenaphthene	RS879	3.10E-02	1.6E-02	U	5.7E-04	8.6E-03	8.6E-03
Acenaphthylene	RS879	3.10E-02	1.6E-02	U	7.0E-05	1.1E-03	1.1E-03
Anthracene	RS879	3.10E-02	1.6E-02	U	3.7E-04	5.6E-03	5.6E-03
Benzo(a)anthracene	RS879	3.10E-02	1.6E-02	U	2.7E-05	4.0E-04	4.0E-04
Benzo(a)pyrene	RS879	3.10E-02	1.6E-02	U	2.7E-05	4.1E-04	4.1E-04
Benzo(b)fluoranthene	RS879	3.10E-02	1.6E-02	U	4.3E-05	6.5E-04	6.5E-04
Benzo(e)pyrene	RS879	-	-	-	2.1E-04	3.1E-03	3.1E-03
Benzo(g,h,i)perylene	RS879	3.10E-02	1.6E-02	U	2.2E-04	3.3E-03	3.3E-03
Benzo(k)fluoranthene	RS879	3.10E-02	1.6E-02	U	2.1E-05	3.1E-04	3.1E-04
Chrysene	RS879	3.10E-02	1.6E-02	U	5.9E-05	8.8E-04	8.8E-04
Dibenz(a,h)anthracene	RS879	3.10E-02	1.6E-02	U	1.1E-05	1.7E-04	1.7E-04
Fluoranthene	RS879	3.10E-02	1.6E-02	U	7.5E-05	1.1E-03	1.1E-03
Fluorene	RS879	3.10E-02	1.6E-02	U	5.7E-04	8.5E-03	8.5E-03
Indeno(1,2,3-cd)pyrene	RS879	3.10E-02	1.6E-02	U	2.4E-05	3.6E-04	3.6E-04
Naphthalene	RS879	3.10E-02	1.6E-02	U	6.9E-03	-	1.6E-02
Perylene	RS879	-	-	-	1.2E-04	1.8E-03	1.8E-03
Phenanthrene	RS879	3.10E-02	1.6E-02	U	1.5E-03	2.3E-02	1.6E-02
Pyrene	RS879	3.10E-02	1.6E-02	U	1.4E-04	2.0E-03	2.0E-03
C08-C11 (Gasoline Range)	RS880	1.10E+01	5.5E+00	UJ		-	-
C11-C14 (Kerosene Range)	RS880	1.10E+01	5.5E+00	UJ		-	-
C14-C20 (Diesel Range)	RS880	1.10E+01	5.5E+00	UJ		-	-
C20-C30 (Lubricant Oil Range)	RS880	1.10E+01	5.5E+00	UJ		-	-
C11-C30	RS880	-	1.7E+01	-		-	-
Benzene	RS880	6.00E-03	3.0E-03	U	1.2E-04	-	3.0E-03
Ethylbenzene	RS880	6.00E-03	3.0E-03	U	1.2E-04	-	3.0E-03
Toluene	RS880	6.00E-03	3.0E-03	U	1.2E-04	-	3.0E-03
m,p-Xylene	RS880	6.00E-03	3.0E-03	U	3.6E-04	-	3.0E-03
o-Xylene	RS880	6.00E-03	3.0E-03	U	8.0E-05	-	3.0E-03
Xylene (total)	RS880	-	-	-	4.4E-04	-	-
2-Methylnaphthalene	RS880	-	-	-	2.8E-02	-	-
Acenaphthene	RS880	3.40E-02	1.7E-02	U	5.7E-04	9.5E-03	9.5E-03

TPH to Petroleum Constituent Extrapolation for Soil (0-2 feet bgs) [a]
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration[a] (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Acenaphthylene	RS880	3.40E-02	1.7E-02	U	7.0E-05	1.2E-03	1.2E-03
Anthracene	RS880	3.40E-02	1.7E-02	U	3.7E-04	6.2E-03	6.2E-03
Benzo(a)anthracene	RS880	3.40E-02	1.7E-02	U	2.7E-05	4.4E-04	4.4E-04
Benzo(a)pyrene	RS880	3.40E-02	1.7E-02	U	2.7E-05	4.5E-04	4.5E-04
Benzo(b)fluoranthene	RS880	3.40E-02	1.7E-02	U	4.3E-05	7.1E-04	7.1E-04
Benzo(e)pyrene	RS880	-	-	-	2.1E-04	3.4E-03	3.4E-03
Benzo(g,h,i)perylene	RS880	3.40E-02	1.7E-02	U	2.2E-04	3.6E-03	3.6E-03
Benzo(k)fluoranthene	RS880	3.40E-02	1.7E-02	U	2.1E-05	3.4E-04	3.4E-04
Chrysene	RS880	3.40E-02	1.7E-02	U	5.9E-05	9.7E-04	9.7E-04
Dibenz(a,h)anthracene	RS880	3.40E-02	1.7E-02	U	1.1E-05	1.8E-04	1.8E-04
Fluoranthene	RS880	3.40E-02	1.7E-02	U	7.5E-05	1.2E-03	1.2E-03
Fluorene	RS880	3.40E-02	1.7E-02	U	5.7E-04	9.4E-03	9.4E-03
Indeno(1,2,3-cd)pyrene	RS880	3.40E-02	1.7E-02	U	2.4E-05	4.0E-04	4.0E-04
Naphthalene	RS880	3.40E-02	1.7E-02	U	6.9E-03	-	1.7E-02
Perylene	RS880	-	-	-	1.2E-04	1.9E-03	1.9E-03
Phenanthrene	RS880	3.40E-02	1.7E-02	U	1.5E-03	2.5E-02	1.7E-02
Pyrene	RS880	3.40E-02	1.7E-02	U	1.4E-04	2.2E-03	2.2E-03
C08-C11 (Gasoline Range)	RS881	5.30E+01	2.7E+01	UJ		-	-
C11-C14 (Kerosene Range)	RS881	5.30E+01	2.7E+01	UJ		-	-
C14-C20 (Diesel Range)	RS881	5.30E+01	2.7E+01	UJ		-	-
C20-C30 (Lubricant Oil Range)	RS881	9.50E+01	9.5E+01			-	-
C11-C30	RS881	-	1.5E+02	-		-	-
Benzene	RS881	-	-	-	1.2E-04	-	-
Ethylbenzene	RS881	-	-	-	1.2E-04	-	-
Toluene	RS881	-	-	-	1.2E-04	-	-
m,p-Xylene	RS881	-	-	-	3.6E-04	-	-
o-Xylene	RS881	-	-	-	8.0E-05	-	-
Xylene (total)	RS881	-	-	-	4.4E-04	-	-
2-Methylnaphthalene	RS881	-	-	-	2.8E-02	-	-
Acenaphthene	RS881	-	-	-	5.7E-04	8.5E-02	8.5E-02
Acenaphthylene	RS881	-	-	-	7.0E-05	1.0E-02	1.0E-02
Anthracene	RS881	-	-	-	3.7E-04	5.5E-02	5.5E-02
Benzo(a)anthracene	RS881	-	-	-	2.7E-05	4.0E-03	4.0E-03
Benzo(a)pyrene	RS881	-	-	-	2.7E-05	4.0E-03	4.0E-03
Benzo(b)fluoranthene	RS881	-	-	-	4.3E-05	6.4E-03	6.4E-03
Benzo(e)pyrene	RS881	-	-	-	2.1E-04	3.1E-02	3.1E-02
Benzo(g,h,i)perylene	RS881	-	-	-	2.2E-04	3.3E-02	3.3E-02
Benzo(k)fluoranthene	RS881	-	-	-	2.1E-05	3.0E-03	3.0E-03
Chrysene	RS881	-	-	-	5.9E-05	8.7E-03	8.7E-03
Dibenz(a,h)anthracene	RS881	-	-	-	1.1E-05	1.6E-03	1.6E-03
Fluoranthene	RS881	-	-	-	7.5E-05	1.1E-02	1.1E-02
Fluorene	RS881	-	-	-	5.7E-04	8.4E-02	8.4E-02
Indeno(1,2,3-cd)pyrene	RS881	-	-	-	2.4E-05	3.6E-03	3.6E-03
Naphthalene	RS881	-	-	-	6.9E-03	-	-
Perylene	RS881	-	-	-	1.2E-04	1.7E-02	1.7E-02
Phenanthrene	RS881	-	-	-	1.5E-03	2.3E-01	2.3E-01
Pyrene	RS881	-	-	-	1.4E-04	2.0E-02	2.0E-02
C08-C11 (Gasoline Range)	MJ683	1.10E+01	5.5E+00	U		-	-
C11-C14 (Kerosene Range)	MJ683	1.10E+01	5.5E+00	U		-	-
C14-C20 (Diesel Range)	MJ683	8.80E+00	8.8E+00	J		-	-
C20-C30 (Lubricant Oil Range)	MJ683	5.20E+01	5.2E+01			-	-
C11-C30	MJ683	-	6.6E+01	-		-	-
Benzene	MJ683	-	-	-	1.2E-04	-	-
Ethylbenzene	MJ683	-	-	-	1.2E-04	-	-
Toluene	MJ683	-	-	-	1.2E-04	-	-
m,p-Xylene	MJ683	-	-	-	3.6E-04	-	-

TPH to Petroleum Constituent Extrapolation for Soil (0-2 feet bgs) [a]
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration[a] (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
o-Xylene	MJ683	-	-	-	8.0E-05	-	-
Xylene (total)	MJ683	-	-	-	4.4E-04	-	-
2-Methylnaphthalene	MJ683	4.00E-02	4.0E-02		2.8E-02	-	4.0E-02
Acenaphthene	MJ683	2.40E-02	1.2E-02	U	5.7E-04	3.8E-02	1.2E-02
Acenaphthylene	MJ683	2.40E-02	1.2E-02	U	7.0E-05	4.6E-03	4.6E-03
Anthracene	MJ683	3.80E-02	3.8E-02		3.7E-04	2.5E-02	3.8E-02
Benzo(a)anthracene	MJ683	2.70E-01	2.7E-01		2.7E-05	1.8E-03	2.7E-01
Benzo(a)pyrene	MJ683	2.60E-01	2.6E-01		2.7E-05	1.8E-03	2.6E-01
Benzo(b)fluoranthene	MJ683	4.20E-01	4.2E-01		4.3E-05	2.9E-03	4.2E-01
Benzo(e)pyrene	MJ683	-	-	-	2.1E-04	1.4E-02	1.4E-02
Benzo(g,h,i)perylene	MJ683	7.30E-02	7.3E-02		2.2E-04	1.5E-02	7.3E-02
Benzo(k)fluoranthene	MJ683	3.00E-01	3.0E-01		2.1E-05	1.4E-03	3.0E-01
Chrysene	MJ683	4.40E-01	4.4E-01		5.9E-05	3.9E-03	4.4E-01
Dibenz(a,h)anthracene	MJ683	2.50E-02	2.5E-02		1.1E-05	7.3E-04	2.5E-02
Fluoranthene	MJ683	5.80E-01	5.8E-01		7.5E-05	5.0E-03	5.8E-01
Fluorene	MJ683	2.40E-02	1.2E-02	U	5.7E-04	3.8E-02	1.2E-02
Indeno(1,2,3-cd)pyrene	MJ683	1.00E-01	1.0E-01		2.4E-05	1.6E-03	1.0E-01
Naphthalene	MJ683	3.10E-02	3.1E-02		6.9E-03	-	3.1E-02
Perylene	MJ683	-	-	-	1.2E-04	7.8E-03	7.8E-03
Phenanthrene	MJ683	2.50E-01	2.5E-01		1.5E-03	1.0E-01	2.5E-01
Pyrene	MJ683	6.00E-01	6.0E-01		1.4E-04	9.0E-03	6.0E-01
C08-C11 (Gasoline Range)	MJ704	5.20E+00	2.6E+00	U		-	-
C11-C14 (Kerosene Range)	MJ704	5.20E+00	2.6E+00	U		-	-
C14-C20 (Diesel Range)	MJ704	5.20E+00	2.6E+00	U		-	-
C20-C30 (Lubricant Oil Range)	MJ704	5.20E+00	2.6E+00	U		-	-
C11-C30	MJ704	-	7.8E+00	-		-	-
Benzene	MJ704	-	-	-	1.2E-04	-	-
Ethylbenzene	MJ704	-	-	-	1.2E-04	-	-
Toluene	MJ704	-	-	-	1.2E-04	-	-
m,p-Xylene	MJ704	-	-	-	3.6E-04	-	-
o-Xylene	MJ704	-	-	-	8.0E-05	-	-
Xylene (total)	MJ704	-	-	-	4.4E-04	-	-
2-Methylnaphthalene	MJ704	2.10E-02	1.1E-02	U	2.8E-02	-	1.1E-02
Acenaphthene	MJ704	2.10E-02	1.1E-02	U	5.7E-04	4.5E-03	4.5E-03
Acenaphthylene	MJ704	2.10E-02	1.1E-02	U	7.0E-05	5.5E-04	5.5E-04
Anthracene	MJ704	3.90E-02	3.9E-02		3.7E-04	2.9E-03	3.9E-02
Benzo(a)anthracene	MJ704	3.30E-01	3.3E-01		2.7E-05	2.1E-04	3.3E-01
Benzo(a)pyrene	MJ704	1.90E-01	1.9E-01		2.7E-05	2.1E-04	1.9E-01
Benzo(b)fluoranthene	MJ704	2.50E-01	2.5E-01		4.3E-05	3.4E-04	2.5E-01
Benzo(e)pyrene	MJ704	-	-	-	2.1E-04	1.6E-03	1.6E-03
Benzo(g,h,i)perylene	MJ704	8.70E-02	8.7E-02		2.2E-04	1.7E-03	8.7E-02
Benzo(k)fluoranthene	MJ704	2.10E-01	2.1E-01		2.1E-05	1.6E-04	2.1E-01
Chrysene	MJ704	4.00E-01	4.0E-01		5.9E-05	4.6E-04	4.0E-01
Dibenz(a,h)anthracene	MJ704	3.30E-02	3.3E-02		1.1E-05	8.6E-05	3.3E-02
Fluoranthene	MJ704	5.90E-01	5.9E-01		7.5E-05	5.8E-04	5.9E-01
Fluorene	MJ704	2.10E-02	1.1E-02	U	5.7E-04	4.4E-03	4.4E-03
Indeno(1,2,3-cd)pyrene	MJ704	1.10E-01	1.1E-01		2.4E-05	1.9E-04	1.1E-01
Naphthalene	MJ704	2.10E-02	1.1E-02	U	6.9E-03	-	1.1E-02
Perylene	MJ704	-	-	-	1.2E-04	9.2E-04	9.2E-04
Phenanthrene	MJ704	3.30E-01	3.3E-01		1.5E-03	1.2E-02	3.3E-01
Pyrene	MJ704	4.80E-01	4.8E-01		1.4E-04	1.1E-03	4.8E-01
C08-C11 (Gasoline Range)	MJ705	5.40E+00	2.7E+00	U		-	-
C11-C14 (Kerosene Range)	MJ705	5.40E+00	2.7E+00	U		-	-
C14-C20 (Diesel Range)	MJ705	5.40E+00	2.7E+00	U		-	-
C20-C30 (Lubricant Oil Range)	MJ705	5.40E+00	2.7E+00	U		-	-
C11-C30	MJ705	-	8.1E+00	-		-	-

TPH to Petroleum Constituent Extrapolation for Soil (0-2 feet bgs) [a]
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration[a] (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Benzene	MJ705	-	-	-	1.2E-04	-	-
Ethylbenzene	MJ705	-	-	-	1.2E-04	-	-
Toluene	MJ705	-	-	-	1.2E-04	-	-
m,p-Xylene	MJ705	-	-	-	3.6E-04	-	-
o-Xylene	MJ705	-	-	-	8.0E-05	-	-
Xylene (total)	MJ705	-	-	-	4.4E-04	-	-
2-Methylnaphthalene	MJ705	2.20E-02	1.1E-02	U	2.8E-02	-	1.1E-02
Acenaphthene	MJ705	2.20E-02	1.1E-02	U	5.7E-04	4.6E-03	4.6E-03
Acenaphthylene	MJ705	2.20E-02	1.1E-02	U	7.0E-05	5.7E-04	5.7E-04
Anthracene	MJ705	2.20E-02	1.1E-02	U	3.7E-04	3.0E-03	3.0E-03
Benzo(a)anthracene	MJ705	2.20E-02	1.1E-02	U	2.7E-05	2.2E-04	2.2E-04
Benzo(a)pyrene	MJ705	2.20E-02	1.1E-02	U	2.7E-05	2.2E-04	2.2E-04
Benzo(b)fluoranthene	MJ705	2.20E-02	1.1E-02	U	4.3E-05	3.5E-04	3.5E-04
Benzo(e)pyrene	MJ705	-	-	-	2.1E-04	1.7E-03	1.7E-03
Benzo(g,h,i)perylene	MJ705	2.20E-02	1.1E-02	U	2.2E-04	1.8E-03	1.8E-03
Benzo(k)fluoranthene	MJ705	2.20E-02	1.1E-02	U	2.1E-05	1.7E-04	1.7E-04
Chrysene	MJ705	2.20E-02	1.1E-02	U	5.9E-05	4.8E-04	4.8E-04
Dibenz(a,h)anthracene	MJ705	2.20E-02	1.1E-02	U	1.1E-05	9.0E-05	9.0E-05
Fluoranthene	MJ705	2.20E-02	1.1E-02	U	7.5E-05	6.1E-04	6.1E-04
Fluorene	MJ705	2.20E-02	1.1E-02	U	5.7E-04	4.6E-03	4.6E-03
Indeno(1,2,3-cd)pyrene	MJ705	2.20E-02	1.1E-02	U	2.4E-05	1.9E-04	1.9E-04
Naphthalene	MJ705	2.20E-02	1.1E-02	U	6.9E-03	-	1.1E-02
Perylene	MJ705	-	-	-	1.2E-04	9.6E-04	9.6E-04
Phenanthrene	MJ705	2.20E-02	1.1E-02	U	1.5E-03	1.2E-02	1.1E-02
Pyrene	MJ705	2.20E-02	1.1E-02	U	1.4E-04	1.1E-03	1.1E-03
C08-C11 (Gasoline Range)	MJ707	1.00E+01	5.0E+00	U		-	-
C11-C14 (Kerosene Range)	MJ707	1.00E+01	5.0E+00	U		-	-
C14-C20 (Diesel Range)	MJ707	1.00E+01	5.0E+00	U		-	-
C20-C30 (Lubricant Oil Range)	MJ707	1.00E+01	5.0E+00	U		-	-
C11-C30	MJ707	-	1.5E+01	-		-	-
Benzene	MJ707	-	-	-	1.2E-04	-	-
Ethylbenzene	MJ707	-	-	-	1.2E-04	-	-
Toluene	MJ707	-	-	-	1.2E-04	-	-
m,p-Xylene	MJ707	-	-	-	3.6E-04	-	-
o-Xylene	MJ707	-	-	-	8.0E-05	-	-
Xylene (total)	MJ707	-	-	-	4.4E-04	-	-
2-Methylnaphthalene	MJ707	2.00E-02	1.0E-02	U	2.8E-02	-	1.0E-02
Acenaphthene	MJ707	2.00E-02	1.0E-02	U	5.7E-04	8.6E-03	8.6E-03
Acenaphthylene	MJ707	2.00E-02	1.0E-02	U	7.0E-05	1.1E-03	1.1E-03
Anthracene	MJ707	2.00E-02	1.0E-02	U	3.7E-04	5.6E-03	5.6E-03
Benzo(a)anthracene	MJ707	2.00E-02	1.0E-02	U	2.7E-05	4.0E-04	4.0E-04
Benzo(a)pyrene	MJ707	2.00E-02	1.0E-02	U	2.7E-05	4.1E-04	4.1E-04
Benzo(b)fluoranthene	MJ707	2.00E-02	1.0E-02	U	4.3E-05	6.5E-04	6.5E-04
Benzo(e)pyrene	MJ707	-	-	-	2.1E-04	3.1E-03	3.1E-03
Benzo(g,h,i)perylene	MJ707	2.00E-02	1.0E-02	U	2.2E-04	3.3E-03	3.3E-03
Benzo(k)fluoranthene	MJ707	2.00E-02	1.0E-02	U	2.1E-05	3.1E-04	3.1E-04
Chrysene	MJ707	2.00E-02	1.0E-02	U	5.9E-05	8.8E-04	8.8E-04
Dibenz(a,h)anthracene	MJ707	2.00E-02	1.0E-02	U	1.1E-05	1.7E-04	1.7E-04
Fluoranthene	MJ707	2.00E-02	1.0E-02	U	7.5E-05	1.1E-03	1.1E-03
Fluorene	MJ707	2.00E-02	1.0E-02	U	5.7E-04	8.5E-03	8.5E-03
Indeno(1,2,3-cd)pyrene	MJ707	2.00E-02	1.0E-02	U	2.4E-05	3.6E-04	3.6E-04
Naphthalene	MJ707	2.00E-02	1.0E-02	U	6.9E-03	-	1.0E-02
Perylene	MJ707	-	-	-	1.2E-04	1.8E-03	1.8E-03
Phenanthrene	MJ707	2.00E-02	1.0E-02	U	1.5E-03	2.3E-02	1.0E-02
Pyrene	MJ707	2.00E-02	1.0E-02	U	1.4E-04	2.0E-03	2.0E-03
C08-C11 (Gasoline Range)	MJ708	1.10E+01	5.5E+00	U		-	-

TPH to Petroleum Constituent Extrapolation for Soil (0-2 feet bgs) [a]
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration[a] (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
C11-C14 (Kerosene Range)	MJ708	1.10E+01	5.5E+00	U		-	-
C14-C20 (Diesel Range)	MJ708	1.10E+01	5.5E+00	U		-	-
C20-C30 (Lubricant Oil Range)	MJ708	4.50E+00	4.5E+00	J		-	-
C11-C30	MJ708	-	1.6E+01	-		-	-
Benzene	MJ708	-	-	-	1.2E-04	-	-
Ethylbenzene	MJ708	-	-	-	1.2E-04	-	-
Toluene	MJ708	-	-	-	1.2E-04	-	-
m,p-Xylene	MJ708	-	-	-	3.6E-04	-	-
o-Xylene	MJ708	-	-	-	8.0E-05	-	-
Xylene (total)	MJ708	-	-	-	4.4E-04	-	-
2-Methylnaphthalene	MJ708	2.10E-02	1.1E-02	U	2.8E-02	-	1.1E-02
Acenaphthene	MJ708	2.10E-02	1.1E-02	U	5.7E-04	8.9E-03	8.9E-03
Acenaphthylene	MJ708	2.10E-02	1.1E-02	U	7.0E-05	1.1E-03	1.1E-03
Anthracene	MJ708	2.10E-02	1.1E-02	U	3.7E-04	5.8E-03	5.8E-03
Benzo(a)anthracene	MJ708	2.10E-02	1.1E-02	U	2.7E-05	4.2E-04	4.2E-04
Benzo(a)pyrene	MJ708	2.10E-02	1.1E-02	U	2.7E-05	4.2E-04	4.2E-04
Benzo(b)fluoranthene	MJ708	2.10E-02	1.1E-02	U	4.3E-05	6.7E-04	6.7E-04
Benzo(e)pyrene	MJ708	-	-	-	2.1E-04	3.2E-03	3.2E-03
Benzo(g,h,i)perylene	MJ708	2.10E-02	1.1E-02	U	2.2E-04	3.4E-03	3.4E-03
Benzo(k)fluoranthene	MJ708	2.10E-02	1.1E-02	U	2.1E-05	3.2E-04	3.2E-04
Chrysene	MJ708	2.10E-02	1.1E-02	U	5.9E-05	9.1E-04	9.1E-04
Dibenz(a,h)anthracene	MJ708	2.10E-02	1.1E-02	U	1.1E-05	1.7E-04	1.7E-04
Fluoranthene	MJ708	2.10E-02	1.1E-02	U	7.5E-05	1.2E-03	1.2E-03
Fluorene	MJ708	2.10E-02	1.1E-02	U	5.7E-04	8.8E-03	8.8E-03
Indeno(1,2,3-cd)pyrene	MJ708	2.10E-02	1.1E-02	U	2.4E-05	3.7E-04	3.7E-04
Naphthalene	MJ708	2.10E-02	1.1E-02	U	6.9E-03	-	1.1E-02
Perylene	MJ708	-	-	-	1.2E-04	1.8E-03	1.8E-03
Phenanthrene	MJ708	2.10E-02	1.1E-02	U	1.5E-03	2.4E-02	1.1E-02
Pyrene	MJ708	2.10E-02	1.1E-02	U	1.4E-04	2.1E-03	2.1E-03
C08-C11 (Gasoline Range)	MJ710	5.30E+00	2.7E+00	U		-	-
C11-C14 (Kerosene Range)	MJ710	5.30E+00	2.7E+00	U		-	-
C14-C20 (Diesel Range)	MJ710	5.30E+00	2.7E+00	U		-	-
C20-C30 (Lubricant Oil Range)	MJ710	2.20E+00	2.2E+00	J		-	-
C11-C30	MJ710	-	7.5E+00	-		-	-
Benzene	MJ710	-	-	-	1.2E-04	-	-
Ethylbenzene	MJ710	-	-	-	1.2E-04	-	-
Toluene	MJ710	-	-	-	1.2E-04	-	-
m,p-Xylene	MJ710	-	-	-	3.6E-04	-	-
o-Xylene	MJ710	-	-	-	8.0E-05	-	-
Xylene (total)	MJ710	-	-	-	4.4E-04	-	-
2-Methylnaphthalene	MJ710	2.10E-02	1.1E-02	U	2.8E-02	-	1.1E-02
Acenaphthene	MJ710	2.10E-02	1.1E-02	U	5.7E-04	4.3E-03	4.3E-03
Acenaphthylene	MJ710	2.10E-02	1.1E-02	U	7.0E-05	5.3E-04	5.3E-04
Anthracene	MJ710	2.10E-02	1.1E-02	U	3.7E-04	2.8E-03	2.8E-03
Benzo(a)anthracene	MJ710	2.10E-02	1.1E-02	U	2.7E-05	2.0E-04	2.0E-04
Benzo(a)pyrene	MJ710	2.10E-02	1.1E-02	U	2.7E-05	2.0E-04	2.0E-04
Benzo(b)fluoranthene	MJ710	2.10E-02	1.1E-02	U	4.3E-05	3.2E-04	3.2E-04
Benzo(e)pyrene	MJ710	-	-	-	2.1E-04	1.6E-03	1.6E-03
Benzo(g,h,i)perylene	MJ710	2.10E-02	1.1E-02	U	2.2E-04	1.7E-03	1.7E-03
Benzo(k)fluoranthene	MJ710	2.10E-02	1.1E-02	U	2.1E-05	1.5E-04	1.5E-04
Chrysene	MJ710	2.10E-02	1.1E-02	U	5.9E-05	4.4E-04	4.4E-04
Dibenz(a,h)anthracene	MJ710	2.10E-02	1.1E-02	U	1.1E-05	8.3E-05	8.3E-05
Fluoranthene	MJ710	2.10E-02	1.1E-02	U	7.5E-05	5.6E-04	5.6E-04
Fluorene	MJ710	2.10E-02	1.1E-02	U	5.7E-04	4.3E-03	4.3E-03
Indeno(1,2,3-cd)pyrene	MJ710	2.10E-02	1.1E-02	U	2.4E-05	1.8E-04	1.8E-04
Naphthalene	MJ710	2.10E-02	1.1E-02	U	6.9E-03	-	1.1E-02

TPH to Petroleum Constituent Extrapolation for Soil (0-2 feet bgs) [a]
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration[a] (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Perylene	MJ710	-	-	-	1.2E-04	8.8E-04	8.8E-04
Phenanthrene	MJ710	2.10E-02	1.1E-02	U	1.5E-03	1.1E-02	1.1E-02
Pyrene	MJ710	2.10E-02	1.1E-02	U	1.4E-04	1.0E-03	1.0E-03
C08-C11 (Gasoline Range)	MJ739	5.60E+00	2.8E+00	U		-	-
C11-C14 (Kerosene Range)	MJ739	5.60E+00	2.8E+00	U		-	-
C14-C20 (Diesel Range)	MJ739	5.60E+00	2.8E+00	U		-	-
C20-C30 (Lubricant Oil Range)	MJ739	5.60E+00	2.8E+00	U		-	-
C11-C30	MJ739	-	8.4E+00	-		-	-
Benzene	MJ739	-	-	-	1.2E-04	-	-
Ethylbenzene	MJ739	-	-	-	1.2E-04	-	-
Toluene	MJ739	-	-	-	1.2E-04	-	-
m,p-Xylene	MJ739	-	-	-	3.6E-04	-	-
o-Xylene	MJ739	-	-	-	8.0E-05	-	-
Xylene (total)	MJ739	-	-	-	4.4E-04	-	-
2-Methylnaphthalene	MJ739	-	-	-	2.8E-02	-	-
Acenaphthene	MJ739	-	-	-	5.7E-04	4.8E-03	4.8E-03
Acenaphthylene	MJ739	-	-	-	7.0E-05	5.9E-04	5.9E-04
Anthracene	MJ739	-	-	-	3.7E-04	3.1E-03	3.1E-03
Benzo(a)anthracene	MJ739	-	-	-	2.7E-05	2.3E-04	2.3E-04
Benzo(a)pyrene	MJ739	-	-	-	2.7E-05	2.3E-04	2.3E-04
Benzo(b)fluoranthene	MJ739	-	-	-	4.3E-05	3.6E-04	3.6E-04
Benzo(e)pyrene	MJ739	-	-	-	2.1E-04	1.7E-03	1.7E-03
Benzo(g,h,i)perylene	MJ739	-	-	-	2.2E-04	1.9E-03	1.9E-03
Benzo(k)fluoranthene	MJ739	-	-	-	2.1E-05	1.7E-04	1.7E-04
Chrysene	MJ739	-	-	-	5.9E-05	4.9E-04	4.9E-04
Dibenz(a,h)anthracene	MJ739	-	-	-	1.1E-05	9.3E-05	9.3E-05
Fluoranthene	MJ739	-	-	-	7.5E-05	6.3E-04	6.3E-04
Fluorene	MJ739	-	-	-	5.7E-04	4.8E-03	4.8E-03
Indeno(1,2,3-cd)pyrene	MJ739	-	-	-	2.4E-05	2.0E-04	2.0E-04
Naphthalene	MJ739	-	-	-	6.9E-03	-	-
Perylene	MJ739	-	-	-	1.2E-04	9.9E-04	9.9E-04
Phenanthrene	MJ739	-	-	-	1.5E-03	1.3E-02	1.3E-02
Pyrene	MJ739	-	-	-	1.4E-04	1.1E-03	1.1E-03
C08-C11 (Gasoline Range)	MJ787	3.00E+00	3.0E+00	J		-	-
C11-C14 (Kerosene Range)	MJ787	6.40E+00	3.2E+00	U		-	-
C14-C20 (Diesel Range)	MJ787	6.00E+00	6.0E+00	J		-	-
C20-C30 (Lubricant Oil Range)	MJ787	2.20E+01	2.2E+01	J		-	-
C11-C30	MJ787	-	3.1E+01	-		-	-
Benzene	MJ787	-	-	-	1.2E-04	-	-
Ethylbenzene	MJ787	-	-	-	1.2E-04	-	-
Toluene	MJ787	-	-	-	1.2E-04	-	-
m,p-Xylene	MJ787	-	-	-	3.6E-04	-	-
o-Xylene	MJ787	-	-	-	8.0E-05	-	-
Xylene (total)	MJ787	-	-	-	4.4E-04	-	-
2-Methylnaphthalene	MJ787	5.20E-03	5.2E-03	J	2.8E-02	-	5.2E-03
Acenaphthene	MJ787	2.70E-02	1.4E-02	U	5.7E-04	1.8E-02	1.4E-02
Acenaphthylene	MJ787	2.70E-02	1.4E-02	U	7.0E-05	2.2E-03	2.2E-03
Anthracene	MJ787	2.70E-02	1.4E-02	U	3.7E-04	1.2E-02	1.2E-02
Benzo(a)anthracene	MJ787	9.00E-03	9.0E-03	J	2.7E-05	8.4E-04	9.0E-03
Benzo(a)pyrene	MJ787	3.60E-03	3.6E-03	J	2.7E-05	8.5E-04	3.6E-03
Benzo(b)fluoranthene	MJ787	3.90E-03	3.9E-03	J	4.3E-05	1.4E-03	3.9E-03
Benzo(e)pyrene	MJ787	-	-	-	2.1E-04	6.5E-03	6.5E-03
Benzo(g,h,i)perylene	MJ787	4.80E-03	4.8E-03	J	2.2E-04	6.9E-03	4.8E-03
Benzo(k)fluoranthene	MJ787	2.70E-02	1.4E-02	U	2.1E-05	6.4E-04	6.4E-04
Chrysene	MJ787	2.80E-02	2.8E-02		5.9E-05	1.8E-03	2.8E-02
Dibenz(a,h)anthracene	MJ787	2.70E-02	1.4E-02	U	1.1E-05	3.5E-04	3.5E-04

TPH to Petroleum Constituent Extrapolation for Soil (0-2 feet bgs) [a]
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration[a] (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Fluoranthene	MJ787	1.20E-02	1.2E-02	J	7.5E-05	2.3E-03	1.2E-02
Fluorene	MJ787	2.70E-02	1.4E-02	U	5.7E-04	1.8E-02	1.4E-02
Indeno(1,2,3-cd)pyrene	MJ787	2.70E-02	1.4E-02	U	2.4E-05	7.5E-04	7.5E-04
Naphthalene	MJ787	1.10E-02	1.1E-02	J	6.9E-03	-	1.1E-02
Perylene	MJ787	-	-	-	1.2E-04	3.7E-03	3.7E-03
Phenanthrene	MJ787	1.00E-02	1.0E-02	J	1.5E-03	4.8E-02	1.0E-02
Pyrene	MJ787	1.20E-02	1.2E-02	J	1.4E-04	4.3E-03	1.2E-02
C08-C11 (Gasoline Range)	MJ788	6.10E+00	3.1E+00	U		-	-
C11-C14 (Kerosene Range)	MJ788	6.10E+00	3.1E+00	U		-	-
C14-C20 (Diesel Range)	MJ788	6.10E+00	3.1E+00	U		-	-
C20-C30 (Lubricant Oil Range)	MJ788	2.50E+00	2.5E+00	J		-	-
C11-C30	MJ788	-	8.6E+00	-		-	-
Benzene	MJ788	-	-	-	1.2E-04	-	-
Ethylbenzene	MJ788	-	-	-	1.2E-04	-	-
Toluene	MJ788	-	-	-	1.2E-04	-	-
m,p-Xylene	MJ788	-	-	-	3.6E-04	-	-
o-Xylene	MJ788	-	-	-	8.0E-05	-	-
Xylene (total)	MJ788	-	-	-	4.4E-04	-	-
2-Methylnaphthalene	MJ788	2.40E-02	1.2E-02	U	2.8E-02	-	1.2E-02
Acenaphthene	MJ788	2.40E-02	1.2E-02	U	5.7E-04	4.9E-03	4.9E-03
Acenaphthylene	MJ788	2.40E-02	1.2E-02	U	7.0E-05	6.0E-04	6.0E-04
Anthracene	MJ788	2.40E-02	1.2E-02	U	3.7E-04	3.2E-03	3.2E-03
Benzo(a)anthracene	MJ788	4.10E-03	4.1E-03	J	2.7E-05	2.3E-04	4.1E-03
Benzo(a)pyrene	MJ788	2.40E-02	1.2E-02	U	2.7E-05	2.3E-04	2.3E-04
Benzo(b)fluoranthene	MJ788	2.40E-02	1.2E-02	U	4.3E-05	3.7E-04	3.7E-04
Benzo(e)pyrene	MJ788	-	-	-	2.1E-04	1.8E-03	1.8E-03
Benzo(g,h,i)perylene	MJ788	2.40E-02	1.2E-02	U	2.2E-04	1.9E-03	1.9E-03
Benzo(k)fluoranthene	MJ788	2.40E-02	1.2E-02	U	2.1E-05	1.8E-04	1.8E-04
Chrysene	MJ788	2.40E-02	1.2E-02	U	5.9E-05	5.0E-04	5.0E-04
Dibenz(a,h)anthracene	MJ788	2.40E-02	1.2E-02	U	1.1E-05	9.5E-05	9.5E-05
Fluoranthene	MJ788	2.40E-02	1.2E-02	U	7.5E-05	6.4E-04	6.4E-04
Fluorene	MJ788	2.40E-02	1.2E-02	U	5.7E-04	4.9E-03	4.9E-03
Indeno(1,2,3-cd)pyrene	MJ788	2.40E-02	1.2E-02	U	2.4E-05	2.1E-04	2.1E-04
Naphthalene	MJ788	2.40E-02	1.2E-02	U	6.9E-03	-	1.2E-02
Perylene	MJ788	-	-	-	1.2E-04	1.0E-03	1.0E-03
Phenanthrene	MJ788	2.40E-02	1.2E-02	U	1.5E-03	1.3E-02	1.2E-02
Pyrene	MJ788	2.40E-02	1.2E-02	U	1.4E-04	1.2E-03	1.2E-03
C08-C11 (Gasoline Range)	MJ789	2.30E+00	2.3E+00	J		-	-
C11-C14 (Kerosene Range)	MJ789	5.60E+00	2.8E+00	U		-	-
C14-C20 (Diesel Range)	MJ789	3.30E+00	3.3E+00	J		-	-
C20-C30 (Lubricant Oil Range)	MJ789	1.40E+01	1.4E+01	J		-	-
C11-C30	MJ789	-	2.0E+01	-		-	-
Benzene	MJ789	-	-	-	1.2E-04	-	-
Ethylbenzene	MJ789	-	-	-	1.2E-04	-	-
Toluene	MJ789	-	-	-	1.2E-04	-	-
m,p-Xylene	MJ789	-	-	-	3.6E-04	-	-
o-Xylene	MJ789	-	-	-	8.0E-05	-	-
Xylene (total)	MJ789	-	-	-	4.4E-04	-	-
2-Methylnaphthalene	MJ789	2.20E-02	1.1E-02	U	2.8E-02	-	1.1E-02
Acenaphthene	MJ789	2.20E-02	1.1E-02	U	5.7E-04	1.2E-02	1.1E-02
Acenaphthylene	MJ789	2.20E-02	1.1E-02	U	7.0E-05	1.4E-03	1.4E-03
Anthracene	MJ789	2.20E-02	1.1E-02	U	3.7E-04	7.5E-03	7.5E-03
Benzo(a)anthracene	MJ789	2.20E-02	1.1E-02	U	2.7E-05	5.4E-04	5.4E-04
Benzo(a)pyrene	MJ789	2.20E-02	1.1E-02	U	2.7E-05	5.5E-04	5.5E-04
Benzo(b)fluoranthene	MJ789	2.20E-02	1.1E-02	U	4.3E-05	8.7E-04	8.7E-04
Benzo(e)pyrene	MJ789	-	-	-	2.1E-04	4.2E-03	4.2E-03

TPH to Petroleum Constituent Extrapolation for Soil (0-2 feet bgs) [a]
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration[a] (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Benzo(g,h,i)perylene	MJ789	2.20E-02	1.1E-02	U	2.2E-04	4.4E-03	4.4E-03
Benzo(k)fluoranthene	MJ789	2.20E-02	1.1E-02	U	2.1E-05	4.1E-04	4.1E-04
Chrysene	MJ789	2.20E-02	1.1E-02	U	5.9E-05	1.2E-03	1.2E-03
Dibenz(a,h)anthracene	MJ789	2.20E-02	1.1E-02	U	1.1E-05	2.2E-04	2.2E-04
Fluoranthene	MJ789	2.20E-02	1.1E-02	U	7.5E-05	1.5E-03	1.5E-03
Fluorene	MJ789	2.20E-02	1.1E-02	U	5.7E-04	1.1E-02	1.1E-02
Indeno(1,2,3-cd)pyrene	MJ789	2.20E-02	1.1E-02	U	2.4E-05	4.8E-04	4.8E-04
Naphthalene	MJ789	2.20E-02	1.1E-02	U	6.9E-03	-	1.1E-02
Perylene	MJ789	2.20E-02	1.1E-02	U	1.2E-04	2.4E-03	2.4E-03
Phenanthrene	MJ789	2.20E-02	1.1E-02	U	1.5E-03	3.1E-02	1.1E-02
Pyrene	MJ789	2.20E-02	1.1E-02	U	1.4E-04	2.7E-03	2.7E-03
C08-C11 (Gasoline Range)	MJ790	2.70E+00	2.7E+00	J		-	-
C11-C14 (Kerosene Range)	MJ790	6.10E+00	3.1E+00	U		-	-
C14-C20 (Diesel Range)	MJ790	3.10E+00	3.1E+00	J		-	-
C20-C30 (Lubricant Oil Range)	MJ790	1.00E+01	1.0E+01	J		-	-
C11-C30	MJ790	-	1.6E+01	-		-	-
Benzene	MJ790	-	-	-	1.2E-04	-	-
Ethylbenzene	MJ790	-	-	-	1.2E-04	-	-
Toluene	MJ790	-	-	-	1.2E-04	-	-
m,p-Xylene	MJ790	-	-	-	3.6E-04	-	-
o-Xylene	MJ790	-	-	-	8.0E-05	-	-
Xylene (total)	MJ790	-	-	-	4.4E-04	-	-
2-Methylnaphthalene	MJ790	2.40E-02	1.2E-02	U	2.8E-02	-	1.2E-02
Acenaphthene	MJ790	2.40E-02	1.2E-02	U	5.7E-04	9.3E-03	9.3E-03
Acenaphthylene	MJ790	2.40E-02	1.2E-02	U	7.0E-05	1.1E-03	1.1E-03
Anthracene	MJ790	2.40E-02	1.2E-02	U	3.7E-04	6.0E-03	6.0E-03
Benzo(a)anthracene	MJ790	2.40E-02	1.2E-02	U	2.7E-05	4.4E-04	4.4E-04
Benzo(a)pyrene	MJ790	2.40E-02	1.2E-02	U	2.7E-05	4.4E-04	4.4E-04
Benzo(b)fluoranthene	MJ790	2.40E-02	1.2E-02	U	4.3E-05	7.0E-04	7.0E-04
Benzo(e)pyrene	MJ790	-	-	-	2.1E-04	3.3E-03	3.3E-03
Benzo(g,h,i)perylene	MJ790	2.40E-02	1.2E-02	U	2.2E-04	3.6E-03	3.6E-03
Benzo(k)fluoranthene	MJ790	2.40E-02	1.2E-02	U	2.1E-05	3.3E-04	3.3E-04
Chrysene	MJ790	2.40E-02	1.2E-02	U	5.9E-05	9.5E-04	9.5E-04
Dibenz(a,h)anthracene	MJ790	2.40E-02	1.2E-02	U	1.1E-05	1.8E-04	1.8E-04
Fluoranthene	MJ790	2.40E-02	1.2E-02	U	7.5E-05	1.2E-03	1.2E-03
Fluorene	MJ790	2.40E-02	1.2E-02	U	5.7E-04	9.2E-03	9.2E-03
Indeno(1,2,3-cd)pyrene	MJ790	2.40E-02	1.2E-02	U	2.4E-05	3.9E-04	3.9E-04
Naphthalene	MJ790	2.40E-02	1.2E-02	U	6.9E-03	-	1.2E-02
Perylene	MJ790	-	-	-	1.2E-04	1.9E-03	1.9E-03
Phenanthrene	MJ790	2.40E-02	1.2E-02	U	1.5E-03	2.5E-02	1.2E-02
Pyrene	MJ790	2.40E-02	1.2E-02	U	1.4E-04	2.2E-03	2.2E-03
C08-C11 (Gasoline Range)	MJ791	5.80E+00	2.9E+00	U		-	-
C11-C14 (Kerosene Range)	MJ791	5.80E+00	2.9E+00	U		-	-
C14-C20 (Diesel Range)	MJ791	5.80E+00	2.9E+00	U		-	-
C20-C30 (Lubricant Oil Range)	MJ791	5.80E+00	2.9E+00	U		-	-
C11-C30	MJ791	-	8.7E+00	-		-	-
Benzene	MJ791	-	-	-	1.2E-04	-	-
Ethylbenzene	MJ791	-	-	-	1.2E-04	-	-
Toluene	MJ791	-	-	-	1.2E-04	-	-
m,p-Xylene	MJ791	-	-	-	3.6E-04	-	-
o-Xylene	MJ791	-	-	-	8.0E-05	-	-
Xylene (total)	MJ791	-	-	-	4.4E-04	-	-
2-Methylnaphthalene	MJ791	2.30E-02	1.2E-02	U	2.8E-02	-	1.2E-02
Acenaphthene	MJ791	2.30E-02	1.2E-02	U	5.7E-04	5.0E-03	5.0E-03
Acenaphthylene	MJ791	2.30E-02	1.2E-02	U	7.0E-05	6.1E-04	6.1E-04
Anthracene	MJ791	2.30E-02	1.2E-02	U	3.7E-04	3.2E-03	3.2E-03

TPH to Petroleum Constituent Extrapolation for Soil (0-2 feet bgs) [a]
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration[a] (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Benzo(a)anthracene	MJ791	3.30E-03	3.3E-03	J	2.7E-05	2.3E-04	3.3E-03
Benzo(a)pyrene	MJ791	2.30E-02	1.2E-02	U	2.7E-05	2.4E-04	2.4E-04
Benzo(b)fluoranthene	MJ791	2.30E-02	1.2E-02	U	4.3E-05	3.8E-04	3.8E-04
Benzo(e)pyrene	MJ791	-	-	-	2.1E-04	1.8E-03	1.8E-03
Benzo(g,h,i)perylene	MJ791	2.30E-02	1.2E-02	U	2.2E-04	1.9E-03	1.9E-03
Benzo(k)fluoranthene	MJ791	2.30E-02	1.2E-02	U	2.1E-05	1.8E-04	1.8E-04
Chrysene	MJ791	2.30E-02	1.2E-02	U	5.9E-05	5.1E-04	5.1E-04
Dibenz(a,h)anthracene	MJ791	2.30E-02	1.2E-02	U	1.1E-05	9.6E-05	9.6E-05
Fluoranthene	MJ791	2.30E-02	1.2E-02	U	7.5E-05	6.5E-04	6.5E-04
Fluorene	MJ791	2.30E-02	1.2E-02	U	5.7E-04	4.9E-03	4.9E-03
Indeno(1,2,3-cd)pyrene	MJ791	2.30E-02	1.2E-02	U	2.4E-05	2.1E-04	2.1E-04
Naphthalene	MJ791	2.30E-02	1.2E-02	U	6.9E-03	-	1.2E-02
Perylene	MJ791	-	-	-	1.2E-04	1.0E-03	1.0E-03
Phenanthrene	MJ791	2.30E-02	1.2E-02	U	1.5E-03	1.3E-02	1.2E-02
Pyrene	MJ791	2.30E-02	1.2E-02	U	1.4E-04	1.2E-03	1.2E-03
C08-C11 (Gasoline Range)	MJ794	6.00E+00	3.0E+00	U		-	-
C11-C14 (Kerosene Range)	MJ794	6.00E+00	3.0E+00	U		-	-
C14-C20 (Diesel Range)	MJ794	6.00E+00	3.0E+00	U		-	-
C20-C30 (Lubricant Oil Range)	MJ794	7.70E+00	7.7E+00	J		-	-
C11-C30	MJ794	-	1.4E+01	-		-	-
Benzene	MJ794	-	-	-	1.2E-04	-	-
Ethylbenzene	MJ794	-	-	-	1.2E-04	-	-
Toluene	MJ794	-	-	-	1.2E-04	-	-
m,p-Xylene	MJ794	-	-	-	3.6E-04	-	-
o-Xylene	MJ794	-	-	-	8.0E-05	-	-
Xylene (total)	MJ794	-	-	-	4.4E-04	-	-
2-Methylnaphthalene	MJ794	2.40E-02	1.2E-02	U	2.8E-02	-	1.2E-02
Acenaphthene	MJ794	2.40E-02	1.2E-02	U	5.7E-04	7.8E-03	7.8E-03
Acenaphthylene	MJ794	2.40E-02	1.2E-02	U	7.0E-05	9.6E-04	9.6E-04
Anthracene	MJ794	2.40E-02	1.2E-02	U	3.7E-04	5.1E-03	5.1E-03
Benzo(a)anthracene	MJ794	4.40E-03	4.4E-03	J	2.7E-05	3.7E-04	4.4E-03
Benzo(a)pyrene	MJ794	2.40E-02	1.2E-02	U	2.7E-05	3.7E-04	3.7E-04
Benzo(b)fluoranthene	MJ794	2.40E-02	1.2E-02	U	4.3E-05	5.9E-04	5.9E-04
Benzo(e)pyrene	MJ794	-	-	-	2.1E-04	2.8E-03	2.8E-03
Benzo(g,h,i)perylene	MJ794	2.40E-02	1.2E-02	U	2.2E-04	3.0E-03	3.0E-03
Benzo(k)fluoranthene	MJ794	2.40E-02	1.2E-02	U	2.1E-05	2.8E-04	2.8E-04
Chrysene	MJ794	2.40E-02	1.2E-02	U	5.9E-05	8.0E-04	8.0E-04
Dibenz(a,h)anthracene	MJ794	2.40E-02	1.2E-02	U	1.1E-05	1.5E-04	1.5E-04
Fluoranthene	MJ794	2.40E-02	1.2E-02	U	7.5E-05	1.0E-03	1.0E-03
Fluorene	MJ794	2.40E-02	1.2E-02	U	5.7E-04	7.8E-03	7.8E-03
Indeno(1,2,3-cd)pyrene	MJ794	2.40E-02	1.2E-02	U	2.4E-05	3.3E-04	3.3E-04
Naphthalene	MJ794	2.40E-02	1.2E-02	U	6.9E-03	-	1.2E-02
Perylene	MJ794	-	-	-	1.2E-04	1.6E-03	1.6E-03
Phenanthrene	MJ794	2.40E-02	1.2E-02	U	1.5E-03	2.1E-02	1.2E-02
Pyrene	MJ794	2.40E-02	1.2E-02	U	1.4E-04	1.9E-03	1.9E-03
C08-C11 (Gasoline Range)	MJ795	2.10E+01	1.1E+01	U		-	-
C11-C14 (Kerosene Range)	MJ795	2.10E+01	1.1E+01	U		-	-
C14-C20 (Diesel Range)	MJ795	2.10E+01	1.1E+01	U		-	-
C20-C30 (Lubricant Oil Range)	MJ795	2.80E+01	2.8E+01	J		-	-
C11-C30	MJ795	-	4.9E+01	-		-	-
Benzene	MJ795	-	-	-	1.2E-04	-	-
Ethylbenzene	MJ795	-	-	-	1.2E-04	-	-
Toluene	MJ795	-	-	-	1.2E-04	-	-
m,p-Xylene	MJ795	-	-	-	3.6E-04	-	-
o-Xylene	MJ795	-	-	-	8.0E-05	-	-
Xylene (total)	MJ795	-	-	-	4.4E-04	-	-

TPH to Petroleum Constituent Extrapolation for Soil (0-2 feet bgs) [a]
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration[a] (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
2-Methylnaphthalene	MJ795	1.10E-02	1.1E-02	J	2.8E-02	-	1.1E-02
Acenaphthene	MJ795	1.50E-02	1.5E-02	J	5.7E-04	2.8E-02	1.5E-02
Acenaphthylene	MJ795	2.80E-02	1.4E-02	U	7.0E-05	3.4E-03	3.4E-03
Anthracene	MJ795	2.80E-02	1.4E-02	U	3.7E-04	1.8E-02	1.4E-02
Benzo(a)anthracene	MJ795	6.30E-03	6.3E-03	J	2.7E-05	1.3E-03	6.3E-03
Benzo(a)pyrene	MJ795	2.80E-02	1.4E-02	U	2.7E-05	1.3E-03	1.3E-03
Benzo(b)fluoranthene	MJ795	2.80E-02	1.4E-02	U	4.3E-05	2.1E-03	2.1E-03
Benzo(e)pyrene	MJ795	-	-	-	2.1E-04	1.0E-02	1.0E-02
Benzo(g,h,i)perylene	MJ795	2.80E-02	1.4E-02	U	2.2E-04	1.1E-02	1.1E-02
Benzo(k)fluoranthene	MJ795	2.80E-02	1.4E-02	U	2.1E-05	1.0E-03	1.0E-03
Chrysene	MJ795	2.80E-02	1.4E-02	U	5.9E-05	2.9E-03	2.9E-03
Dibenz(a,h)anthracene	MJ795	2.80E-02	1.4E-02	U	1.1E-05	5.4E-04	5.4E-04
Fluoranthene	MJ795	5.80E-03	5.8E-03	J	7.5E-05	3.7E-03	5.8E-03
Fluorene	MJ795	2.80E-02	1.4E-02	U	5.7E-04	2.8E-02	1.4E-02
Indeno(1,2,3-cd)pyrene	MJ795	2.80E-02	1.4E-02	U	2.4E-05	1.2E-03	1.2E-03
Naphthalene	MJ795	2.20E-02	2.2E-02	J	6.9E-03	-	2.2E-02
Perylene	MJ795	-	-	-	1.2E-04	5.8E-03	5.8E-03
Phenanthrene	MJ795	9.40E-03	9.4E-03	J	1.5E-03	7.5E-02	9.4E-03
Pyrene	MJ795	1.90E-02	1.9E-02	J	1.4E-04	6.7E-03	1.9E-02
C08-C11 (Gasoline Range)	MJ796	1.30E+01	6.5E+00	U		-	-
C11-C14 (Kerosene Range)	MJ796	1.30E+01	6.5E+00	U		-	-
C14-C20 (Diesel Range)	MJ796	8.50E+00	8.5E+00	J		-	-
C20-C30 (Lubricant Oil Range)	MJ796	2.10E+01	2.1E+01	J		-	-
C11-C30	MJ796	-	3.6E+01	-		-	-
Benzene	MJ796	-	-	-	1.2E-04	-	-
Ethylbenzene	MJ796	-	-	-	1.2E-04	-	-
Toluene	MJ796	-	-	-	1.2E-04	-	-
m,p-Xylene	MJ796	-	-	-	3.6E-04	-	-
o-Xylene	MJ796	-	-	-	8.0E-05	-	-
Xylene (total)	MJ796	-	-	-	4.4E-04	-	-
2-Methylnaphthalene	MJ796	2.60E-02	1.3E-02	U	2.8E-02	-	1.3E-02
Acenaphthene	MJ796	2.60E-02	1.3E-02	U	5.7E-04	2.1E-02	1.3E-02
Acenaphthylene	MJ796	2.60E-02	1.3E-02	U	7.0E-05	2.5E-03	2.5E-03
Anthracene	MJ796	2.60E-02	1.3E-02	U	3.7E-04	1.3E-02	1.3E-02
Benzo(a)anthracene	MJ796	5.70E-03	5.7E-03	J	2.7E-05	9.7E-04	5.7E-03
Benzo(a)pyrene	MJ796	2.60E-02	1.3E-02	U	2.7E-05	9.8E-04	9.8E-04
Benzo(b)fluoranthene	MJ796	2.60E-02	1.3E-02	U	4.3E-05	1.6E-03	1.6E-03
Benzo(e)pyrene	MJ796	-	-	-	2.1E-04	7.4E-03	7.4E-03
Benzo(g,h,i)perylene	MJ796	2.60E-02	1.3E-02	U	2.2E-04	8.0E-03	8.0E-03
Benzo(k)fluoranthene	MJ796	2.60E-02	1.3E-02	U	2.1E-05	7.4E-04	7.4E-04
Chrysene	MJ796	7.20E-03	7.2E-03	J	5.9E-05	2.1E-03	7.2E-03
Dibenz(a,h)anthracene	MJ796	2.60E-02	1.3E-02	U	1.1E-05	4.0E-04	4.0E-04
Fluoranthene	MJ796	5.50E-03	5.5E-03	J	7.5E-05	2.7E-03	5.5E-03
Fluorene	MJ796	2.60E-02	1.3E-02	U	5.7E-04	2.0E-02	1.3E-02
Indeno(1,2,3-cd)pyrene	MJ796	2.60E-02	1.3E-02	U	2.4E-05	8.7E-04	8.7E-04
Naphthalene	MJ796	6.20E-03	6.2E-03	J	6.9E-03	-	6.2E-03
Perylene	MJ796	-	-	-	1.2E-04	4.2E-03	4.2E-03
Phenanthrene	MJ796	2.60E-02	1.3E-02	U	1.5E-03	5.5E-02	1.3E-02
Pyrene	MJ796	5.90E-03	5.9E-03	J	1.4E-04	4.9E-03	5.9E-03
C08-C11 (Gasoline Range)	MJ798	7.30E+00	7.3E+00	J		-	-
C11-C14 (Kerosene Range)	MJ798	3.30E+00	3.3E+00	J		-	-
C14-C20 (Diesel Range)	MJ798	1.10E+01	1.1E+01	J		-	-
C20-C30 (Lubricant Oil Range)	MJ798	6.40E+01	6.4E+01			-	-
C11-C30	MJ798	-	7.8E+01	-		-	-
Benzene	MJ798	-	-	-	1.2E-04	-	-
Ethylbenzene	MJ798	-	-	-	1.2E-04	-	-

TPH to Petroleum Constituent Extrapolation for Soil (0-2 feet bgs) [a]
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration[a] (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Toluene	MJ798	-	-	-	1.2E-04	-	-
m,p-Xylene	MJ798	-	-	-	3.6E-04	-	-
o-Xylene	MJ798	-	-	-	8.0E-05	-	-
Xylene (total)	MJ798	-	-	-	4.4E-04	-	-
2-Methylnaphthalene	MJ798	7.10E-03	7.1E-03	J	2.8E-02	-	7.1E-03
Acenaphthene	MJ798	1.30E-02	1.3E-02	J	5.7E-04	4.5E-02	1.3E-02
Acenaphthylene	MJ798	2.20E-02	1.1E-02	U	7.0E-05	5.5E-03	5.5E-03
Anthracene	MJ798	2.20E-02	1.1E-02	U	3.7E-04	2.9E-02	1.1E-02
Benzo(a)anthracene	MJ798	2.20E-02	1.1E-02	U	2.7E-05	2.1E-03	2.1E-03
Benzo(a)pyrene	MJ798	5.90E-03	5.9E-03	J	2.7E-05	2.1E-03	5.9E-03
Benzo(b)fluoranthene	MJ798	2.20E-02	1.1E-02	U	4.3E-05	3.4E-03	3.4E-03
Benzo(e)pyrene	MJ798	-	-	-	2.1E-04	1.6E-02	1.6E-02
Benzo(g,h,i)perylene	MJ798	4.90E-03	4.9E-03	J	2.2E-04	1.7E-02	4.9E-03
Benzo(k)fluoranthene	MJ798	1.40E-02	1.4E-02	J	2.1E-05	1.6E-03	1.4E-02
Chrysene	MJ798	5.30E-02	5.3E-02		5.9E-05	4.6E-03	5.3E-02
Dibenz(a,h)anthracene	MJ798	2.20E-02	1.1E-02	U	1.1E-05	8.7E-04	8.7E-04
Fluoranthene	MJ798	2.10E-02	2.1E-02	J	7.5E-05	5.9E-03	2.1E-02
Fluorene	MJ798	2.20E-02	1.1E-02	U	5.7E-04	4.4E-02	1.1E-02
Indeno(1,2,3-cd)pyrene	MJ798	2.20E-02	1.1E-02	U	2.4E-05	1.9E-03	1.9E-03
Naphthalene	MJ798	9.10E-03	9.1E-03	J	6.9E-03	-	9.1E-03
Perylene	MJ798	-	-	-	1.2E-04	9.2E-03	9.2E-03
Phenanthrene	MJ798	1.10E-02	1.1E-02	J	1.5E-03	1.2E-01	1.1E-02
Pyrene	MJ798	1.80E-02	1.8E-02	J	1.4E-04	1.1E-02	1.8E-02
C08-C11 (Gasoline Range)	MJ799	5.40E+00	2.7E+00	U		-	-
C11-C14 (Kerosene Range)	MJ799	5.40E+00	2.7E+00	U		-	-
C14-C20 (Diesel Range)	MJ799	2.70E+00	2.7E+00	J		-	-
C20-C30 (Lubricant Oil Range)	MJ799	1.60E+01	1.6E+01	J		-	-
C11-C30	MJ799	-	2.1E+01	-		-	-
Benzene	MJ799	-	-	-	1.2E-04	-	-
Ethylbenzene	MJ799	-	-	-	1.2E-04	-	-
Toluene	MJ799	-	-	-	1.2E-04	-	-
m,p-Xylene	MJ799	-	-	-	3.6E-04	-	-
o-Xylene	MJ799	-	-	-	8.0E-05	-	-
Xylene (total)	MJ799	-	-	-	4.4E-04	-	-
2-Methylnaphthalene	MJ799	2.20E-02	1.1E-02	U	2.8E-02	-	1.1E-02
Acenaphthene	MJ799	2.20E-02	1.1E-02	U	5.7E-04	1.2E-02	1.1E-02
Acenaphthylene	MJ799	2.20E-02	1.1E-02	U	7.0E-05	1.5E-03	1.5E-03
Anthracene	MJ799	2.20E-02	1.1E-02	U	3.7E-04	8.0E-03	8.0E-03
Benzo(a)anthracene	MJ799	3.40E-03	3.4E-03	J	2.7E-05	5.8E-04	3.4E-03
Benzo(a)pyrene	MJ799	2.20E-02	1.1E-02	U	2.7E-05	5.8E-04	5.8E-04
Benzo(b)fluoranthene	MJ799	2.20E-02	1.1E-02	U	4.3E-05	9.3E-04	9.3E-04
Benzo(e)pyrene	MJ799	-	-	-	2.1E-04	4.4E-03	4.4E-03
Benzo(g,h,i)perylene	MJ799	2.20E-02	1.1E-02	U	2.2E-04	4.7E-03	4.7E-03
Benzo(k)fluoranthene	MJ799	2.20E-02	1.1E-02	U	2.1E-05	4.4E-04	4.4E-04
Chrysene	MJ799	2.20E-02	1.1E-02	U	5.9E-05	1.3E-03	1.3E-03
Dibenz(a,h)anthracene	MJ799	2.20E-02	1.1E-02	U	1.1E-05	2.4E-04	2.4E-04
Fluoranthene	MJ799	2.20E-02	1.1E-02	U	7.5E-05	1.6E-03	1.6E-03
Fluorene	MJ799	2.20E-02	1.1E-02	U	5.7E-04	1.2E-02	1.1E-02
Indeno(1,2,3-cd)pyrene	MJ799	2.20E-02	1.1E-02	U	2.4E-05	5.1E-04	5.1E-04
Naphthalene	MJ799	2.20E-02	1.1E-02	U	6.9E-03	-	1.1E-02
Perylene	MJ799	-	-	-	1.2E-04	2.5E-03	2.5E-03
Phenanthrene	MJ799	2.20E-02	1.1E-02	U	1.5E-03	3.3E-02	1.1E-02
Pyrene	MJ799	2.20E-02	1.1E-02	U	1.4E-04	2.9E-03	2.9E-03
C08-C11 (Gasoline Range)	MJ800	1.10E+01	5.5E+00	U		-	-
C11-C14 (Kerosene Range)	MJ800	1.10E+01	5.5E+00	U		-	-
C14-C20 (Diesel Range)	MJ800	1.10E+01	5.5E+00	U		-	-

TPH to Petroleum Constituent Extrapolation for Soil (0-2 feet bgs) [a]
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration[a] (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
C20-C30 (Lubricant Oil Range)	MJ800	5.20E+00	5.2E+00	J		-	-
C11-C30	MJ800	-	1.6E+01	-		-	-
Benzene	MJ800	-	-	-	1.2E-04	-	-
Ethylbenzene	MJ800	-	-	-	1.2E-04	-	-
Toluene	MJ800	-	-	-	1.2E-04	-	-
m,p-Xylene	MJ800	-	-	-	3.6E-04	-	-
o-Xylene	MJ800	-	-	-	8.0E-05	-	-
Xylene (total)	MJ800	-	-	-	4.4E-04	-	-
2-Methylnaphthalene	MJ800	2.20E-02	1.1E-02	U	2.8E-02	-	1.1E-02
Acenaphthene	MJ800	2.20E-02	1.1E-02	U	5.7E-04	9.3E-03	9.3E-03
Acenaphthylene	MJ800	2.20E-02	1.1E-02	U	7.0E-05	1.1E-03	1.1E-03
Anthracene	MJ800	2.20E-02	1.1E-02	U	3.7E-04	6.0E-03	6.0E-03
Benzo(a)anthracene	MJ800	2.20E-02	1.1E-02	U	2.7E-05	4.4E-04	4.4E-04
Benzo(a)pyrene	MJ800	2.20E-02	1.1E-02	U	2.7E-05	4.4E-04	4.4E-04
Benzo(b)fluoranthene	MJ800	2.20E-02	1.1E-02	U	4.3E-05	7.0E-04	7.0E-04
Benzo(e)pyrene	MJ800	-	-	-	2.1E-04	3.3E-03	3.3E-03
Benzo(g,h,i)perylene	MJ800	2.20E-02	1.1E-02	U	2.2E-04	3.6E-03	3.6E-03
Benzo(k)fluoranthene	MJ800	2.20E-02	1.1E-02	U	2.1E-05	3.3E-04	3.3E-04
Chrysene	MJ800	2.20E-02	1.1E-02	U	5.9E-05	9.5E-04	9.5E-04
Dibenz(a,h)anthracene	MJ800	2.20E-02	1.1E-02	U	1.1E-05	1.8E-04	1.8E-04
Fluoranthene	MJ800	2.20E-02	1.1E-02	U	7.5E-05	1.2E-03	1.2E-03
Fluorene	MJ800	2.20E-02	1.1E-02	U	5.7E-04	9.2E-03	9.2E-03
Indeno(1,2,3-cd)pyrene	MJ800	2.20E-02	1.1E-02	U	2.4E-05	3.9E-04	3.9E-04
Naphthalene	MJ800	2.20E-02	1.1E-02	U	6.9E-03	-	1.1E-02
Perylene	MJ800	-	-	-	1.2E-04	1.9E-03	1.9E-03
Phenanthrene	MJ800	2.20E-02	1.1E-02	U	1.5E-03	2.5E-02	1.1E-02
Pyrene	MJ800	2.20E-02	1.1E-02	U	1.4E-04	2.2E-03	2.2E-03
C08-C11 (Gasoline Range)	MJ806	5.70E+00	2.9E+00	U		-	-
C11-C14 (Kerosene Range)	MJ806	5.70E+00	2.9E+00	U		-	-
C14-C20 (Diesel Range)	MJ806	5.70E+00	2.9E+00	U		-	-
C20-C30 (Lubricant Oil Range)	MJ806	1.80E+01	1.8E+01	J		-	-
C11-C30	MJ806	-	2.4E+01	-		-	-
Benzene	MJ806	-	-	-	1.2E-04	-	-
Ethylbenzene	MJ806	-	-	-	1.2E-04	-	-
Toluene	MJ806	-	-	-	1.2E-04	-	-
m,p-Xylene	MJ806	-	-	-	3.6E-04	-	-
o-Xylene	MJ806	-	-	-	8.0E-05	-	-
Xylene (total)	MJ806	-	-	-	4.4E-04	-	-
2-Methylnaphthalene	MJ806	7.50E-03	7.5E-03	J	2.8E-02	-	7.5E-03
Acenaphthene	MJ806	2.30E-02	1.2E-02	U	5.7E-04	1.4E-02	1.2E-02
Acenaphthylene	MJ806	2.30E-02	1.2E-02	U	7.0E-05	1.7E-03	1.7E-03
Anthracene	MJ806	2.30E-02	1.2E-02	U	3.7E-04	8.8E-03	8.8E-03
Benzo(a)anthracene	MJ806	2.30E-02	1.2E-02	U	2.7E-05	6.4E-04	6.4E-04
Benzo(a)pyrene	MJ806	2.60E-03	2.6E-03	J	2.7E-05	6.4E-04	2.6E-03
Benzo(b)fluoranthene	MJ806	2.20E-03	2.2E-03	J	4.3E-05	1.0E-03	2.2E-03
Benzo(e)pyrene	MJ806	-	-	-	2.1E-04	4.9E-03	4.9E-03
Benzo(g,h,i)perylene	MJ806	2.30E-02	1.2E-02	U	2.2E-04	5.2E-03	5.2E-03
Benzo(k)fluoranthene	MJ806	2.30E-02	1.2E-02	U	2.1E-05	4.9E-04	4.9E-04
Chrysene	MJ806	1.00E-02	1.0E-02	J	5.9E-05	1.4E-03	1.0E-02
Dibenz(a,h)anthracene	MJ806	2.30E-02	1.2E-02	U	1.1E-05	2.6E-04	2.6E-04
Fluoranthene	MJ806	3.90E-03	3.9E-03	J	7.5E-05	1.8E-03	3.9E-03
Fluorene	MJ806	2.30E-02	1.2E-02	U	5.7E-04	1.3E-02	1.2E-02
Indeno(1,2,3-cd)pyrene	MJ806	2.30E-02	1.2E-02	U	2.4E-05	5.7E-04	5.7E-04
Naphthalene	MJ806	7.90E-03	7.9E-03	J	6.9E-03	-	7.9E-03
Perylene	MJ806	-	-	-	1.2E-04	2.8E-03	2.8E-03
Phenanthrene	MJ806	2.30E-02	1.2E-02	U	1.5E-03	3.6E-02	1.2E-02

TPH to Petroleum Constituent Extrapolation for Soil (0-2 feet bgs) [a]
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration[a] (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Pyrene	MJ806	9.30E-03	9.3E-03	J	1.4E-04	3.2E-03	9.3E-03
C08-C11 (Gasoline Range)	MJ808	5.90E+00	3.0E+00	U		-	-
C11-C14 (Kerosene Range)	MJ808	5.90E+00	3.0E+00	U		-	-
C14-C20 (Diesel Range)	MJ808	7.00E+00	7.0E+00	J		-	-
C20-C30 (Lubricant Oil Range)	MJ808	8.80E+00	8.8E+00	J		-	-
C11-C30	MJ808	-	1.9E+01	-		-	-
Benzene	MJ808	-	-	-	1.2E-04	-	-
Ethylbenzene	MJ808	-	-	-	1.2E-04	-	-
Toluene	MJ808	-	-	-	1.2E-04	-	-
m,p-Xylene	MJ808	-	-	-	3.6E-04	-	-
o-Xylene	MJ808	-	-	-	8.0E-05	-	-
Xylene (total)	MJ808	-	-	-	4.4E-04	-	-
2-Methylnaphthalene	MJ808	2.50E-02	1.3E-02	U	2.8E-02	-	1.3E-02
Acenaphthene	MJ808	2.50E-02	1.3E-02	U	5.7E-04	1.1E-02	1.1E-02
Acenaphthylene	MJ808	2.50E-02	1.3E-02	U	7.0E-05	1.3E-03	1.3E-03
Anthracene	MJ808	2.50E-02	1.3E-02	U	3.7E-04	7.0E-03	7.0E-03
Benzo(a)anthracene	MJ808	5.50E-03	5.5E-03	J	2.7E-05	5.1E-04	5.5E-03
Benzo(a)pyrene	MJ808	2.50E-02	1.3E-02	U	2.7E-05	5.1E-04	5.1E-04
Benzo(b)fluoranthene	MJ808	2.30E-03	2.3E-03	J	4.3E-05	8.1E-04	2.3E-03
Benzo(e)pyrene	MJ808	-	-	-	2.1E-04	3.9E-03	3.9E-03
Benzo(g,h,i)perylene	MJ808	2.50E-02	1.3E-02	U	2.2E-04	4.1E-03	4.1E-03
Benzo(k)fluoranthene	MJ808	2.50E-02	1.3E-02	U	2.1E-05	3.8E-04	3.8E-04
Chrysene	MJ808	7.80E-03	7.8E-03	J	5.9E-05	1.1E-03	7.8E-03
Dibenz(a,h)anthracene	MJ808	2.50E-02	1.3E-02	U	1.1E-05	2.1E-04	2.1E-04
Fluoranthene	MJ808	6.10E-03	6.1E-03	J	7.5E-05	1.4E-03	6.1E-03
Fluorene	MJ808	2.50E-02	1.3E-02	U	5.7E-04	1.1E-02	1.1E-02
Indeno(1,2,3-cd)pyrene	MJ808	2.50E-02	1.3E-02	U	2.4E-05	4.5E-04	4.5E-04
Naphthalene	MJ808	2.50E-02	1.3E-02	U	6.9E-03	-	1.3E-02
Perylene	MJ808	-	-	-	1.2E-04	2.2E-03	2.2E-03
Phenanthrene	MJ808	2.50E-02	1.3E-02	U	1.5E-03	2.9E-02	1.3E-02
Pyrene	MJ808	5.10E-03	5.1E-03	J	1.4E-04	2.6E-03	5.1E-03

Notes:
a. Petroleum constituent concentrations estimated and selected as described in Section 2.8 of the SRAM.
"-" not applicable
EF - extrapolation factor
mg/kg - milligrams per kilogram

Aroclor to PCB Congener Extrapolation (0-2 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentrations (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF_{1254}	EF_{1260}	Estimated Concentrations Aroclor-1254 (mg/kg)	Estimated Concentrations Aroclor-1260 (mg/kg)	Estimated Concentrations PCB_{MAX} (mg/kg)
Aroclor-1254	MJ669	7.5E-02	7.5E-02	J	-	-	-	-	-
Aroclor-1260	MJ669	4.3E-02	4.3E-02	J	-	-	-	-	-
PCB-105	MJ669	-	-	-	1.2E-01	8.2E-02	9.3E-06	3.5E-06	9.3E-06
PCB-114	MJ669	-	-	-	4.5E-03	1.5E-03	3.4E-07	6.3E-08	3.4E-07
PCB-118	MJ669	-	-	-	2.7E-01	1.6E-01	2.0E-05	7.0E-06	2.0E-05
PCB-123	MJ669	-	-	-	3.0E-03	2.3E-03	2.2E-07	1.0E-07	2.2E-07
PCB-126	MJ669	-	-	-	7.5E-03	6.4E-03	5.6E-07	2.7E-07	5.6E-07
PCB-156	MJ669	-	-	-	6.3E-02	5.5E-02	4.7E-06	2.3E-06	4.7E-06
PCB-157	MJ669	-	-	-	1.2E-02	2.5E-02	9.3E-07	1.1E-06	1.1E-06
PCB-167	MJ669	-	-	-	2.1E-02	4.3E-02	1.5E-06	1.8E-06	1.8E-06
PCB-169	MJ669	-	-	-	3.7E-04	6.4E-04	2.7E-08	2.7E-08	2.7E-08
PCB-189	MJ669	-	-	-	3.0E-03	6.4E-03	2.2E-07	2.7E-07	2.7E-07
PCB-77	MJ669	-	-	-	1.5E-02	1.3E-02	1.2E-06	5.5E-07	1.2E-06
PCB-81	MJ669	-	-	-	3.0E-03	2.3E-03	2.2E-07	9.7E-08	2.2E-07
Aroclor-1254	MJ670	3.7E-02	3.7E-02	J	-	-	-	-	-
Aroclor-1260	MJ670	4.6E-02	4.6E-02	J	-	-	-	-	-
PCB-105	MJ670	-	-	-	1.2E-01	8.2E-02	4.6E-06	3.8E-06	4.6E-06
PCB-114	MJ670	-	-	-	4.5E-03	1.5E-03	1.7E-07	6.7E-08	1.7E-07
PCB-118	MJ670	-	-	-	2.7E-01	1.6E-01	9.9E-06	7.5E-06	9.9E-06
PCB-123	MJ670	-	-	-	3.0E-03	2.3E-03	1.1E-07	1.1E-07	1.1E-07
PCB-126	MJ670	-	-	-	7.5E-03	6.4E-03	2.8E-07	2.9E-07	2.9E-07
PCB-156	MJ670	-	-	-	6.3E-02	5.5E-02	2.3E-06	2.5E-06	2.5E-06
PCB-157	MJ670	-	-	-	1.2E-02	2.5E-02	4.6E-07	1.1E-06	1.1E-06
PCB-167	MJ670	-	-	-	2.1E-02	4.3E-02	7.6E-07	2.0E-06	2.0E-06
PCB-169	MJ670	-	-	-	3.7E-04	6.4E-04	1.4E-08	2.9E-08	2.9E-08
PCB-189	MJ670	-	-	-	3.0E-03	6.4E-03	1.1E-07	2.9E-07	2.9E-07
PCB-77	MJ670	-	-	-	1.5E-02	1.3E-02	5.7E-07	5.9E-07	5.9E-07
PCB-81	MJ670	-	-	-	3.0E-03	2.3E-03	1.1E-07	1.0E-07	1.1E-07
Aroclor-1254	MJ671	1.2E-01	1.2E-01	J	-	-	-	-	-
Aroclor-1260	MJ671	8.5E-02	8.5E-02	J	-	-	-	-	-
PCB-105	MJ671	-	-	-	1.2E-01	8.2E-02	1.5E-05	7.0E-06	1.5E-05
PCB-114	MJ671	-	-	-	4.5E-03	1.5E-03	5.4E-07	1.2E-07	5.4E-07
PCB-118	MJ671	-	-	-	2.7E-01	1.6E-01	3.2E-05	1.4E-05	3.2E-05
PCB-123	MJ671	-	-	-	3.0E-03	2.3E-03	3.6E-07	2.0E-07	3.6E-07
PCB-126	MJ671	-	-	-	7.5E-03	6.4E-03	9.0E-07	5.4E-07	9.0E-07
PCB-156	MJ671	-	-	-	6.3E-02	5.5E-02	7.5E-06	4.6E-06	7.5E-06
PCB-157	MJ671	-	-	-	1.2E-02	2.5E-02	1.5E-06	2.1E-06	2.1E-06
PCB-167	MJ671	-	-	-	2.1E-02	4.3E-02	2.5E-06	3.6E-06	3.6E-06
PCB-169	MJ671	-	-	-	3.7E-04	6.4E-04	4.4E-08	5.4E-08	5.4E-08
PCB-189	MJ671	-	-	-	3.0E-03	6.4E-03	3.6E-07	5.4E-07	5.4E-07
PCB-77	MJ671	-	-	-	1.5E-02	1.3E-02	1.9E-06	1.1E-06	1.9E-06
PCB-81	MJ671	-	-	-	3.0E-03	2.3E-03	3.6E-07	1.9E-07	3.6E-07
Aroclor-1254	MJ683	4.0E-01	2.0E-01	U	-	-	-	-	-
Aroclor-1260	MJ683	9.5E-02	9.5E-02		-	-	-	-	-
PCB-105	MJ683	-	-	-	1.2E-01	8.2E-02	2.5E-05	7.8E-06	2.5E-05
PCB-114	MJ683	-	-	-	4.5E-03	1.5E-03	9.1E-07	1.4E-07	9.1E-07
PCB-118	MJ683	-	-	-	2.7E-01	1.6E-01	5.4E-05	1.6E-05	5.4E-05
PCB-123	MJ683	-	-	-	3.0E-03	2.3E-03	6.0E-07	2.2E-07	6.0E-07
PCB-126	MJ683	-	-	-	7.5E-03	6.4E-03	1.5E-06	6.0E-07	1.5E-06
PCB-156	MJ683	-	-	-	6.3E-02	5.5E-02	1.3E-05	5.2E-06	1.3E-05
PCB-157	MJ683	-	-	-	1.2E-02	2.5E-02	2.5E-06	2.3E-06	2.5E-06
PCB-167	MJ683	-	-	-	2.1E-02	4.3E-02	4.1E-06	4.1E-06	4.1E-06
PCB-169	MJ683	-	-	-	3.7E-04	6.4E-04	7.3E-08	6.0E-08	7.3E-08
PCB-189	MJ683	-	-	-	3.0E-03	6.4E-03	6.0E-07	6.0E-07	6.0E-07
PCB-77	MJ683	-	-	-	1.5E-02	1.3E-02	3.1E-06	1.2E-06	3.1E-06
PCB-81	MJ683	-	-	-	3.0E-03	2.3E-03	6.0E-07	2.1E-07	6.0E-07

Aroclor to PCB Congener Extrapolation (0-2 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentrations (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF_{1254}	EF_{1260}	Estimated Concentrations Aroclor-1254 (mg/kg)	Estimated Concentrations Aroclor-1260 (mg/kg)	Estimated Concentrations PCB_{MAX} (mg/kg)
Aroclor-1254	MJ704	5.2E-02	2.6E-02	U	-	-	-	-	-
Aroclor-1260	MJ704	5.2E-02	2.6E-02	U	-	-	-	-	-
PCB-105	MJ704	-	-	-	1.2E-01	8.2E-02	3.2E-06	2.1E-06	3.2E-06
PCB-114	MJ704	-	-	-	4.5E-03	1.5E-03	1.2E-07	3.8E-08	1.2E-07
PCB-118	MJ704	-	-	-	2.7E-01	1.6E-01	7.0E-06	4.3E-06	7.0E-06
PCB-123	MJ704	-	-	-	3.0E-03	2.3E-03	7.8E-08	6.0E-08	7.8E-08
PCB-126	MJ704	-	-	-	7.5E-03	6.4E-03	2.0E-07	1.7E-07	2.0E-07
PCB-156	MJ704	-	-	-	6.3E-02	5.5E-02	1.6E-06	1.4E-06	1.6E-06
PCB-157	MJ704	-	-	-	1.2E-02	2.5E-02	3.2E-07	6.4E-07	6.4E-07
PCB-167	MJ704	-	-	-	2.1E-02	4.3E-02	5.4E-07	1.1E-06	1.1E-06
PCB-169	MJ704	-	-	-	3.7E-04	6.4E-04	9.5E-09	1.7E-08	1.7E-08
PCB-189	MJ704	-	-	-	3.0E-03	6.4E-03	7.8E-08	1.7E-07	1.7E-07
PCB-77	MJ704	-	-	-	1.5E-02	1.3E-02	4.0E-07	3.3E-07	4.0E-07
PCB-81	MJ704	-	-	-	3.0E-03	2.3E-03	7.8E-08	5.9E-08	7.8E-08
Aroclor-1254	MJ705	8.1E-02	4.1E-02	U	-	-	-	-	-
Aroclor-1260	MJ705	8.1E-02	4.1E-02	U	-	-	-	-	-
PCB-105	MJ705	-	-	-	1.2E-01	8.2E-02	5.0E-06	3.3E-06	5.0E-06
PCB-114	MJ705	-	-	-	4.5E-03	1.5E-03	1.8E-07	5.9E-08	1.8E-07
PCB-118	MJ705	-	-	-	2.7E-01	1.6E-01	1.1E-05	6.6E-06	1.1E-05
PCB-123	MJ705	-	-	-	3.0E-03	2.3E-03	1.2E-07	9.4E-08	1.2E-07
PCB-126	MJ705	-	-	-	7.5E-03	6.4E-03	3.0E-07	2.6E-07	3.0E-07
PCB-156	MJ705	-	-	-	6.3E-02	5.5E-02	2.5E-06	2.2E-06	2.5E-06
PCB-157	MJ705	-	-	-	1.2E-02	2.5E-02	5.0E-07	9.9E-07	9.9E-07
PCB-167	MJ705	-	-	-	2.1E-02	4.3E-02	8.4E-07	1.7E-06	1.7E-06
PCB-169	MJ705	-	-	-	3.7E-04	6.4E-04	1.5E-08	2.6E-08	2.6E-08
PCB-189	MJ705	-	-	-	3.0E-03	6.4E-03	1.2E-07	2.6E-07	2.6E-07
PCB-77	MJ705	-	-	-	1.5E-02	1.3E-02	6.3E-07	5.2E-07	6.3E-07
PCB-81	MJ705	-	-	-	3.0E-03	2.3E-03	1.2E-07	9.1E-08	1.2E-07
Aroclor-1254	MJ707	5.1E-02	2.6E-02	U	-	-	-	-	-
Aroclor-1260	MJ707	5.1E-02	2.6E-02	U	-	-	-	-	-
PCB-105	MJ707	-	-	-	1.2E-01	8.2E-02	3.2E-06	2.1E-06	3.2E-06
PCB-114	MJ707	-	-	-	4.5E-03	1.5E-03	1.2E-07	3.7E-08	1.2E-07
PCB-118	MJ707	-	-	-	2.7E-01	1.6E-01	6.8E-06	4.2E-06	6.8E-06
PCB-123	MJ707	-	-	-	3.0E-03	2.3E-03	7.6E-08	5.9E-08	7.6E-08
PCB-126	MJ707	-	-	-	7.5E-03	6.4E-03	1.9E-07	1.6E-07	1.9E-07
PCB-156	MJ707	-	-	-	6.3E-02	5.5E-02	1.6E-06	1.4E-06	1.6E-06
PCB-157	MJ707	-	-	-	1.2E-02	2.5E-02	3.2E-07	6.3E-07	6.3E-07
PCB-167	MJ707	-	-	-	2.1E-02	4.3E-02	5.3E-07	1.1E-06	1.1E-06
PCB-169	MJ707	-	-	-	3.7E-04	6.4E-04	9.3E-09	1.6E-08	1.6E-08
PCB-189	MJ707	-	-	-	3.0E-03	6.4E-03	7.6E-08	1.6E-07	1.6E-07
PCB-77	MJ707	-	-	-	1.5E-02	1.3E-02	3.9E-07	3.2E-07	3.9E-07
PCB-81	MJ707	-	-	-	3.0E-03	2.3E-03	7.6E-08	5.7E-08	7.6E-08
Aroclor-1254	MJ708	7.9E-02	4.0E-02	U	-	-	-	-	-
Aroclor-1260	MJ708	7.9E-02	4.0E-02	U	-	-	-	-	-
PCB-105	MJ708	-	-	-	1.2E-01	8.2E-02	4.9E-06	3.2E-06	4.9E-06
PCB-114	MJ708	-	-	-	4.5E-03	1.5E-03	1.8E-07	5.7E-08	1.8E-07
PCB-118	MJ708	-	-	-	2.7E-01	1.6E-01	1.1E-05	6.5E-06	1.1E-05
PCB-123	MJ708	-	-	-	3.0E-03	2.3E-03	1.2E-07	9.2E-08	1.2E-07
PCB-126	MJ708	-	-	-	7.5E-03	6.4E-03	3.0E-07	2.5E-07	3.0E-07
PCB-156	MJ708	-	-	-	6.3E-02	5.5E-02	2.5E-06	2.2E-06	2.5E-06
PCB-157	MJ708	-	-	-	1.2E-02	2.5E-02	4.9E-07	9.7E-07	9.7E-07
PCB-167	MJ708	-	-	-	2.1E-02	4.3E-02	8.1E-07	1.7E-06	1.7E-06
PCB-169	MJ708	-	-	-	3.7E-04	6.4E-04	1.4E-08	2.5E-08	2.5E-08
PCB-189	MJ708	-	-	-	3.0E-03	6.4E-03	1.2E-07	2.5E-07	2.5E-07
PCB-77	MJ708	-	-	-	1.5E-02	1.3E-02	6.1E-07	5.0E-07	6.1E-07
PCB-81	MJ708	-	-	-	3.0E-03	2.3E-03	1.2E-07	8.9E-08	1.2E-07
Aroclor-1254	MJ709	5.4E-02	2.7E-02	UJ	-	-	-	-	-
Aroclor-1260	MJ709	5.4E-02	2.7E-02	UJ	-	-	-	-	-

Aroclor to PCB Congener Extrapolation (0-2 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentrations (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF_{1254}	EF_{1260}	Estimated Concentrations Aroclor-1254 (mg/kg)	Estimated Concentrations Aroclor-1260 (mg/kg)	Estimated Concentrations PCB_{MAX} (mg/kg)
PCB-105	MJ709	-	-	-	1.2E-01	8.2E-02	3.3E-06	2.2E-06	3.3E-06
PCB-114	MJ709	-	-	-	4.5E-03	1.5E-03	1.2E-07	3.9E-08	1.2E-07
PCB-118	MJ709	-	-	-	2.7E-01	1.6E-01	7.2E-06	4.4E-06	7.2E-06
PCB-123	MJ709	-	-	-	3.0E-03	2.3E-03	8.1E-08	6.3E-08	8.1E-08
PCB-126	MJ709	-	-	-	7.5E-03	6.4E-03	2.0E-07	1.7E-07	2.0E-07
PCB-156	MJ709	-	-	-	6.3E-02	5.5E-02	1.7E-06	1.5E-06	1.7E-06
PCB-157	MJ709	-	-	-	1.2E-02	2.5E-02	3.3E-07	6.6E-07	6.6E-07
PCB-167	MJ709	-	-	-	2.1E-02	4.3E-02	5.6E-07	1.2E-06	1.2E-06
PCB-169	MJ709	-	-	-	3.7E-04	6.4E-04	9.9E-09	1.7E-08	1.7E-08
PCB-189	MJ709	-	-	-	3.0E-03	6.4E-03	8.1E-08	1.7E-07	1.7E-07
PCB-77	MJ709	-	-	-	1.5E-02	1.3E-02	4.2E-07	3.4E-07	4.2E-07
PCB-81	MJ709	-	-	-	3.0E-03	2.3E-03	8.1E-08	6.1E-08	8.1E-08
Aroclor-1254	MJ710	7.9E-02	4.0E-02	U	-	-	-	-	-
Aroclor-1260	MJ710	2.3E-01	2.3E-01		-	-	-	-	-
PCB-105	MJ710	-	-	-	1.2E-01	8.2E-02	4.9E-06	1.9E-05	1.9E-05
PCB-114	MJ710	-	-	-	4.5E-03	1.5E-03	1.8E-07	3.3E-07	3.3E-07
PCB-118	MJ710	-	-	-	2.7E-01	1.6E-01	1.1E-05	3.8E-05	3.8E-05
PCB-123	MJ710	-	-	-	3.0E-03	2.3E-03	1.2E-07	5.3E-07	5.3E-07
PCB-126	MJ710	-	-	-	7.5E-03	6.4E-03	3.0E-07	1.5E-06	1.5E-06
PCB-156	MJ710	-	-	-	6.3E-02	5.5E-02	2.5E-06	1.3E-05	1.3E-05
PCB-157	MJ710	-	-	-	1.2E-02	2.5E-02	4.9E-07	5.6E-06	5.6E-06
PCB-167	MJ710	-	-	-	2.1E-02	4.3E-02	8.1E-07	9.8E-06	9.8E-06
PCB-169	MJ710	-	-	-	3.7E-04	6.4E-04	1.4E-08	1.5E-07	1.5E-07
PCB-189	MJ710	-	-	-	3.0E-03	6.4E-03	1.2E-07	1.5E-06	1.5E-06
PCB-77	MJ710	-	-	-	1.5E-02	1.3E-02	6.1E-07	2.9E-06	2.9E-06
PCB-81	MJ710	-	-	-	3.0E-03	2.3E-03	1.2E-07	5.2E-07	5.2E-07
Aroclor-1254	MJ739	8.4E-02	4.2E-02	U	-	-	-	-	-
Aroclor-1260	MJ739	8.4E-02	4.2E-02	U	-	-	-	-	-
PCB-105	MJ739	-	-	-	1.2E-01	8.2E-02	5.2E-06	3.4E-06	5.2E-06
PCB-114	MJ739	-	-	-	4.5E-03	1.5E-03	1.9E-07	6.1E-08	1.9E-07
PCB-118	MJ739	-	-	-	2.7E-01	1.6E-01	1.1E-05	6.9E-06	1.1E-05
PCB-123	MJ739	-	-	-	3.0E-03	2.3E-03	1.3E-07	9.7E-08	1.3E-07
PCB-126	MJ739	-	-	-	7.5E-03	6.4E-03	3.2E-07	2.7E-07	3.2E-07
PCB-156	MJ739	-	-	-	6.3E-02	5.5E-02	2.6E-06	2.3E-06	2.6E-06
PCB-157	MJ739	-	-	-	1.2E-02	2.5E-02	5.2E-07	1.0E-06	1.0E-06
PCB-167	MJ739	-	-	-	2.1E-02	4.3E-02	8.7E-07	1.8E-06	1.8E-06
PCB-169	MJ739	-	-	-	3.7E-04	6.4E-04	1.5E-08	2.7E-08	2.7E-08
PCB-189	MJ739	-	-	-	3.0E-03	6.4E-03	1.3E-07	2.7E-07	2.7E-07
PCB-77	MJ739	-	-	-	1.5E-02	1.3E-02	6.5E-07	5.3E-07	6.5E-07
PCB-81	MJ739	-	-	-	3.0E-03	2.3E-03	1.3E-07	9.5E-08	1.3E-07
Aroclor-1254	MJ744	2.6E-01	2.6E-01		-	-	-	-	-
Aroclor-1260	MJ744	9.2E-02	4.6E-02	U	-	-	-	-	-
PCB-105	MJ744	-	-	-	1.2E-01	8.2E-02	3.2E-05	3.8E-06	3.2E-05
PCB-114	MJ744	-	-	-	4.5E-03	1.5E-03	1.2E-06	6.7E-08	1.2E-06
PCB-118	MJ744	-	-	-	2.7E-01	1.6E-01	7.0E-05	7.5E-06	7.0E-05
PCB-123	MJ744	-	-	-	3.0E-03	2.3E-03	7.8E-07	1.1E-07	7.8E-07
PCB-126	MJ744	-	-	-	7.5E-03	6.4E-03	2.0E-06	2.9E-07	2.0E-06
PCB-156	MJ744	-	-	-	6.3E-02	5.5E-02	1.6E-05	2.5E-06	1.6E-05
PCB-157	MJ744	-	-	-	1.2E-02	2.5E-02	3.2E-06	1.1E-06	3.2E-06
PCB-167	MJ744	-	-	-	2.1E-02	4.3E-02	5.4E-06	2.0E-06	5.4E-06
PCB-169	MJ744	-	-	-	3.7E-04	6.4E-04	9.5E-08	2.9E-08	9.5E-08
PCB-189	MJ744	-	-	-	3.0E-03	6.4E-03	7.8E-07	2.9E-07	7.8E-07
PCB-77	MJ744	-	-	-	1.5E-02	1.3E-02	4.0E-06	5.9E-07	4.0E-06
PCB-81	MJ744	-	-	-	3.0E-03	2.3E-03	7.8E-07	1.0E-07	7.8E-07
Aroclor-1254	MJ745	3.5E-01	3.5E-01		-	-	-	-	-
Aroclor-1260	MJ745	1.0E-01	5.0E-02	U	-	-	-	-	-
PCB-105	MJ745	-	-	-	1.2E-01	8.2E-02	4.3E-05	4.1E-06	4.3E-05
PCB-114	MJ745	-	-	-	4.5E-03	1.5E-03	1.6E-06	7.3E-08	1.6E-06

Aroclor to PCB Congener Extrapolation (0-2 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentrations (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF_{1254}	EF_{1260}	Estimated Concentrations Aroclor-1254 (mg/kg)	Estimated Concentrations Aroclor-1260 (mg/kg)	Estimated Concentrations PCB_{MAX} (mg/kg)
PCB-118	MJ745	-	-	-	2.7E-01	1.6E-01	9.4E-05	8.2E-06	9.4E-05
PCB-123	MJ745	-	-	-	3.0E-03	2.3E-03	1.0E-06	1.2E-07	1.0E-06
PCB-126	MJ745	-	-	-	7.5E-03	6.4E-03	2.6E-06	3.2E-07	2.6E-06
PCB-156	MJ745	-	-	-	6.3E-02	5.5E-02	2.2E-05	2.7E-06	2.2E-05
PCB-157	MJ745	-	-	-	1.2E-02	2.5E-02	4.3E-06	1.2E-06	4.3E-06
PCB-167	MJ745	-	-	-	2.1E-02	4.3E-02	7.2E-06	2.1E-06	7.2E-06
PCB-169	MJ745	-	-	-	3.7E-04	6.4E-04	1.3E-07	3.2E-08	1.3E-07
PCB-189	MJ745	-	-	-	3.0E-03	6.4E-03	1.0E-06	3.2E-07	1.0E-06
PCB-77	MJ745	-	-	-	1.5E-02	1.3E-02	5.4E-06	6.4E-07	5.4E-06
PCB-81	MJ745	-	-	-	3.0E-03	2.3E-03	1.0E-06	1.1E-07	1.0E-06
Aroclor-1254	MJ748	2.2E-01	2.2E-01	J	-	-	-	-	-
Aroclor-1260	MJ748	2.0E-01	2.0E-01	J	-	-	-	-	-
PCB-105	MJ748	-	-	-	1.2E-01	8.2E-02	2.7E-05	1.6E-05	2.7E-05
PCB-114	MJ748	-	-	-	4.5E-03	1.5E-03	1.0E-06	2.9E-07	1.0E-06
PCB-118	MJ748	-	-	-	2.7E-01	1.6E-01	5.9E-05	3.3E-05	5.9E-05
PCB-123	MJ748	-	-	-	3.0E-03	2.3E-03	6.6E-07	4.6E-07	6.6E-07
PCB-126	MJ748	-	-	-	7.5E-03	6.4E-03	1.7E-06	1.3E-06	1.7E-06
PCB-156	MJ748	-	-	-	6.3E-02	5.5E-02	1.4E-05	1.1E-05	1.4E-05
PCB-157	MJ748	-	-	-	1.2E-02	2.5E-02	2.7E-06	4.9E-06	4.9E-06
PCB-167	MJ748	-	-	-	2.1E-02	4.3E-02	4.5E-06	8.5E-06	8.5E-06
PCB-169	MJ748	-	-	-	3.7E-04	6.4E-04	8.1E-08	1.3E-07	1.3E-07
PCB-189	MJ748	-	-	-	3.0E-03	6.4E-03	6.6E-07	1.3E-06	1.3E-06
PCB-77	MJ748	-	-	-	1.5E-02	1.3E-02	3.4E-06	2.5E-06	3.4E-06
PCB-81	MJ748	-	-	-	3.0E-03	2.3E-03	6.6E-07	4.5E-07	6.6E-07
Aroclor-1254	MJ750	4.6E-01	4.6E-01	J	-	-	-	-	-
Aroclor-1260	MJ750	2.0E-01	1.0E-01	UJ	-	-	-	-	-
PCB-105	MJ750	-	-	-	1.2E-01	8.2E-02	5.7E-05	8.2E-06	5.7E-05
PCB-114	MJ750	-	-	-	4.5E-03	1.5E-03	2.1E-06	1.5E-07	2.1E-06
PCB-118	MJ750	-	-	-	2.7E-01	1.6E-01	1.2E-04	1.6E-05	1.2E-04
PCB-123	MJ750	-	-	-	3.0E-03	2.3E-03	1.4E-06	2.3E-07	1.4E-06
PCB-126	MJ750	-	-	-	7.5E-03	6.4E-03	3.5E-06	6.4E-07	3.5E-06
PCB-156	MJ750	-	-	-	6.3E-02	5.5E-02	2.9E-05	5.5E-06	2.9E-05
PCB-157	MJ750	-	-	-	1.2E-02	2.5E-02	5.7E-06	2.5E-06	5.7E-06
PCB-167	MJ750	-	-	-	2.1E-02	4.3E-02	9.5E-06	4.3E-06	9.5E-06
PCB-169	MJ750	-	-	-	3.7E-04	6.4E-04	1.7E-07	6.4E-08	1.7E-07
PCB-189	MJ750	-	-	-	3.0E-03	6.4E-03	1.4E-06	6.4E-07	1.4E-06
PCB-77	MJ750	-	-	-	1.5E-02	1.3E-02	7.1E-06	1.3E-06	7.1E-06
PCB-81	MJ750	-	-	-	3.0E-03	2.3E-03	1.4E-06	2.3E-07	1.4E-06
Aroclor-1254	MJ752	8.9E-02	4.5E-02	UJ	-	-	-	-	-
Aroclor-1260	MJ752	8.9E-02	4.5E-02	UJ	-	-	-	-	-
PCB-105	MJ752	-	-	-	1.2E-01	8.2E-02	5.5E-06	3.6E-06	5.5E-06
PCB-114	MJ752	-	-	-	4.5E-03	1.5E-03	2.0E-07	6.5E-08	2.0E-07
PCB-118	MJ752	-	-	-	2.7E-01	1.6E-01	1.2E-05	7.3E-06	1.2E-05
PCB-123	MJ752	-	-	-	3.0E-03	2.3E-03	1.3E-07	1.0E-07	1.3E-07
PCB-126	MJ752	-	-	-	7.5E-03	6.4E-03	3.3E-07	2.8E-07	3.3E-07
PCB-156	MJ752	-	-	-	6.3E-02	5.5E-02	2.8E-06	2.4E-06	2.8E-06
PCB-157	MJ752	-	-	-	1.2E-02	2.5E-02	5.5E-07	1.1E-06	1.1E-06
PCB-167	MJ752	-	-	-	2.1E-02	4.3E-02	9.2E-07	1.9E-06	1.9E-06
PCB-169	MJ752	-	-	-	3.7E-04	6.4E-04	1.6E-08	2.8E-08	2.8E-08
PCB-189	MJ752	-	-	-	3.0E-03	6.4E-03	1.3E-07	2.8E-07	2.8E-07
PCB-77	MJ752	-	-	-	1.5E-02	1.3E-02	6.9E-07	5.7E-07	6.9E-07
PCB-81	MJ752	-	-	-	3.0E-03	2.3E-03	1.3E-07	1.0E-07	1.3E-07
Aroclor-1254	MJ754	2.4E-01	2.4E-01	J	-	-	-	-	-
Aroclor-1260	MJ754	1.1E-01	1.1E-01	J	-	-	-	-	-
PCB-105	MJ754	-	-	-	1.2E-01	8.2E-02	3.0E-05	9.0E-06	3.0E-05
PCB-114	MJ754	-	-	-	4.5E-03	1.5E-03	1.1E-06	1.6E-07	1.1E-06
PCB-118	MJ754	-	-	-	2.7E-01	1.6E-01	6.4E-05	1.8E-05	6.4E-05
PCB-123	MJ754	-	-	-	3.0E-03	2.3E-03	7.2E-07	2.6E-07	7.2E-07

Aroclor to PCB Congener Extrapolation (0-2 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentrations (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF_{1254}	EF_{1260}	Estimated Concentrations Aroclor-1254 (mg/kg)	Estimated Concentrations Aroclor-1260 (mg/kg)	Estimated Concentrations PCB_{MAX} (mg/kg)
PCB-126	MJ754	-	-	-	7.5E-03	6.4E-03	1.8E-06	7.0E-07	1.8E-06
PCB-156	MJ754	-	-	-	6.3E-02	5.5E-02	1.5E-05	6.0E-06	1.5E-05
PCB-157	MJ754	-	-	-	1.2E-02	2.5E-02	3.0E-06	2.7E-06	3.0E-06
PCB-167	MJ754	-	-	-	2.1E-02	4.3E-02	4.9E-06	4.7E-06	4.9E-06
PCB-169	MJ754	-	-	-	3.7E-04	6.4E-04	8.8E-08	7.0E-08	8.8E-08
PCB-189	MJ754	-	-	-	3.0E-03	6.4E-03	7.2E-07	7.0E-07	7.2E-07
PCB-77	MJ754	-	-	-	1.5E-02	1.3E-02	3.7E-06	1.4E-06	3.7E-06
PCB-81	MJ754	-	-	-	3.0E-03	2.3E-03	7.2E-07	2.5E-07	7.2E-07
Aroclor-1254	MJ756	6.0E-02	6.0E-02	J	-	-	-	-	-
Aroclor-1260	MJ756	8.4E-02	4.2E-02	UJ	-	-	-	-	-
PCB-105	MJ756	-	-	-	1.2E-01	8.2E-02	7.4E-06	3.4E-06	7.4E-06
PCB-114	MJ756	-	-	-	4.5E-03	1.5E-03	2.7E-07	6.1E-08	2.7E-07
PCB-118	MJ756	-	-	-	2.7E-01	1.6E-01	1.6E-05	6.9E-06	1.6E-05
PCB-123	MJ756	-	-	-	3.0E-03	2.3E-03	1.8E-07	9.7E-08	1.8E-07
PCB-126	MJ756	-	-	-	7.5E-03	6.4E-03	4.5E-07	2.7E-07	4.5E-07
PCB-156	MJ756	-	-	-	6.3E-02	5.5E-02	3.8E-06	2.3E-06	3.8E-06
PCB-157	MJ756	-	-	-	1.2E-02	2.5E-02	7.4E-07	1.0E-06	1.0E-06
PCB-167	MJ756	-	-	-	2.1E-02	4.3E-02	1.2E-06	1.8E-06	1.8E-06
PCB-169	MJ756	-	-	-	3.7E-04	6.4E-04	2.2E-08	2.7E-08	2.7E-08
PCB-189	MJ756	-	-	-	3.0E-03	6.4E-03	1.8E-07	2.7E-07	2.7E-07
PCB-77	MJ756	-	-	-	1.5E-02	1.3E-02	9.3E-07	5.3E-07	9.3E-07
PCB-81	MJ756	-	-	-	3.0E-03	2.3E-03	1.8E-07	9.5E-08	1.8E-07
Aroclor-1254	MJ781	8.9E-02	4.5E-02	U	-	-	-	-	-
Aroclor-1260	MJ781	8.9E-02	4.5E-02	U	-	-	-	-	-
PCB-105	MJ781	-	-	-	1.2E-01	8.2E-02	5.5E-06	3.6E-06	5.5E-06
PCB-114	MJ781	-	-	-	4.5E-03	1.5E-03	2.0E-07	6.5E-08	2.0E-07
PCB-118	MJ781	-	-	-	2.7E-01	1.6E-01	1.2E-05	7.3E-06	1.2E-05
PCB-123	MJ781	-	-	-	3.0E-03	2.3E-03	1.3E-07	1.0E-07	1.3E-07
PCB-126	MJ781	-	-	-	7.5E-03	6.4E-03	3.3E-07	2.8E-07	3.3E-07
PCB-156	MJ781	-	-	-	6.3E-02	5.5E-02	2.8E-06	2.4E-06	2.8E-06
PCB-157	MJ781	-	-	-	1.2E-02	2.5E-02	5.5E-07	1.1E-06	1.1E-06
PCB-167	MJ781	-	-	-	2.1E-02	4.3E-02	9.2E-07	1.9E-06	1.9E-06
PCB-169	MJ781	-	-	-	3.7E-04	6.4E-04	1.6E-08	2.8E-08	2.8E-08
PCB-189	MJ781	-	-	-	3.0E-03	6.4E-03	1.3E-07	2.8E-07	2.8E-07
PCB-77	MJ781	-	-	-	1.5E-02	1.3E-02	6.9E-07	5.7E-07	6.9E-07
PCB-81	MJ781	-	-	-	3.0E-03	2.3E-03	1.3E-07	1.0E-07	1.3E-07
Aroclor-1254	MJ782RE	5.4E+00	5.4E+00	J	-	-	-	-	-
Aroclor-1260	MJ782RE	4.3E-01	4.3E-01	J	-	-	-	-	-
PCB-105	MJ782RE	-	-	-	1.2E-01	8.2E-02	6.7E-04	3.5E-05	6.7E-04
PCB-114	MJ782RE	-	-	-	4.5E-03	1.5E-03	2.4E-05	6.3E-07	2.4E-05
PCB-118	MJ782RE	-	-	-	2.7E-01	1.6E-01	1.4E-03	7.0E-05	1.4E-03
PCB-123	MJ782RE	-	-	-	3.0E-03	2.3E-03	1.6E-05	1.0E-06	1.6E-05
PCB-126	MJ782RE	-	-	-	7.5E-03	6.4E-03	4.1E-05	2.7E-06	4.1E-05
PCB-156	MJ782RE	-	-	-	6.3E-02	5.5E-02	3.4E-04	2.3E-05	3.4E-04
PCB-157	MJ782RE	-	-	-	1.2E-02	2.5E-02	6.7E-05	1.1E-05	6.7E-05
PCB-167	MJ782RE	-	-	-	2.1E-02	4.3E-02	1.1E-04	1.8E-05	1.1E-04
PCB-169	MJ782RE	-	-	-	3.7E-04	6.4E-04	2.0E-06	2.7E-07	2.0E-06
PCB-189	MJ782RE	-	-	-	3.0E-03	6.4E-03	1.6E-05	2.7E-06	1.6E-05
PCB-77	MJ782RE	-	-	-	1.5E-02	1.3E-02	8.4E-05	5.5E-06	8.4E-05
PCB-81	MJ782RE	-	-	-	3.0E-03	2.3E-03	1.6E-05	9.7E-07	1.6E-05
Aroclor-1254	MJ783	8.9E-02	4.5E-02	U	-	-	-	-	-
Aroclor-1260	MJ783	8.9E-02	4.5E-02	U	-	-	-	-	-
PCB-105	MJ783	-	-	-	1.2E-01	8.2E-02	5.5E-06	3.6E-06	5.5E-06
PCB-114	MJ783	-	-	-	4.5E-03	1.5E-03	2.0E-07	6.5E-08	2.0E-07
PCB-118	MJ783	-	-	-	2.7E-01	1.6E-01	1.2E-05	7.3E-06	1.2E-05
PCB-123	MJ783	-	-	-	3.0E-03	2.3E-03	1.3E-07	1.0E-07	1.3E-07
PCB-126	MJ783	-	-	-	7.5E-03	6.4E-03	3.3E-07	2.8E-07	3.3E-07
PCB-156	MJ783	-	-	-	6.3E-02	5.5E-02	2.8E-06	2.4E-06	2.8E-06

Aroclor to PCB Congener Extrapolation (0-2 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentrations (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF_{1254}	EF_{1260}	Estimated Concentrations Aroclor-1254 (mg/kg)	Estimated Concentrations Aroclor-1260 (mg/kg)	Estimated Concentrations PCB_{MAX} (mg/kg)
PCB-157	MJ783	-	-	-	1.2E-02	2.5E-02	5.5E-07	1.1E-06	1.1E-06
PCB-167	MJ783	-	-	-	2.1E-02	4.3E-02	9.2E-07	1.9E-06	1.9E-06
PCB-169	MJ783	-	-	-	3.7E-04	6.4E-04	1.6E-08	2.8E-08	2.8E-08
PCB-189	MJ783	-	-	-	3.0E-03	6.4E-03	1.3E-07	2.8E-07	2.8E-07
PCB-77	MJ783	-	-	-	1.5E-02	1.3E-02	6.9E-07	5.7E-07	6.9E-07
PCB-81	MJ783	-	-	-	3.0E-03	2.3E-03	1.3E-07	1.0E-07	1.3E-07
Aroclor-1254	MJ784	8.6E+01	4.3E+01	U	-	-	-	-	-
Aroclor-1260	MJ784	6.3E+02	6.3E+02	J	-	-	-	-	-
PCB-105	MJ784	-	-	-	1.2E-01	8.2E-02	5.3E-03	5.2E-02	5.2E-02
PCB-114	MJ784	-	-	-	4.5E-03	1.5E-03	2.0E-04	9.2E-04	9.2E-04
PCB-118	MJ784	-	-	-	2.7E-01	1.6E-01	1.2E-02	1.0E-01	1.0E-01
PCB-123	MJ784	-	-	-	3.0E-03	2.3E-03	1.3E-04	1.5E-03	1.5E-03
PCB-126	MJ784	-	-	-	7.5E-03	6.4E-03	3.2E-04	4.0E-03	4.0E-03
PCB-156	MJ784	-	-	-	6.3E-02	5.5E-02	2.7E-03	3.4E-02	3.4E-02
PCB-157	MJ784	-	-	-	1.2E-02	2.5E-02	5.3E-04	1.5E-02	1.5E-02
PCB-167	MJ784	-	-	-	2.1E-02	4.3E-02	8.9E-04	2.7E-02	2.7E-02
PCB-169	MJ784	-	-	-	3.7E-04	6.4E-04	1.6E-05	4.0E-04	4.0E-04
PCB-189	MJ784	-	-	-	3.0E-03	6.4E-03	1.3E-04	4.0E-03	4.0E-03
PCB-77	MJ784	-	-	-	1.5E-02	1.3E-02	6.6E-04	8.0E-03	8.0E-03
PCB-81	MJ784	-	-	-	3.0E-03	2.3E-03	1.3E-04	1.4E-03	1.4E-03
Aroclor-1254	MJ786	9.4E-02	4.7E-02	U	-	-	-	-	-
Aroclor-1260	MJ786	9.4E-02	4.7E-02	U	-	-	-	-	-
PCB-105	MJ786	-	-	-	1.2E-01	8.2E-02	5.8E-06	3.8E-06	5.8E-06
PCB-114	MJ786	-	-	-	4.5E-03	1.5E-03	2.1E-07	6.8E-08	2.1E-07
PCB-118	MJ786	-	-	-	2.7E-01	1.6E-01	1.3E-05	7.7E-06	1.3E-05
PCB-123	MJ786	-	-	-	3.0E-03	2.3E-03	1.4E-07	1.1E-07	1.4E-07
PCB-126	MJ786	-	-	-	7.5E-03	6.4E-03	3.5E-07	3.0E-07	3.5E-07
PCB-156	MJ786	-	-	-	6.3E-02	5.5E-02	3.0E-06	2.6E-06	3.0E-06
PCB-157	MJ786	-	-	-	1.2E-02	2.5E-02	5.8E-07	1.2E-06	1.2E-06
PCB-167	MJ786	-	-	-	2.1E-02	4.3E-02	9.7E-07	2.0E-06	2.0E-06
PCB-169	MJ786	-	-	-	3.7E-04	6.4E-04	1.7E-08	3.0E-08	3.0E-08
PCB-189	MJ786	-	-	-	3.0E-03	6.4E-03	1.4E-07	3.0E-07	3.0E-07
PCB-77	MJ786	-	-	-	1.5E-02	1.3E-02	7.3E-07	6.0E-07	7.3E-07
PCB-81	MJ786	-	-	-	3.0E-03	2.3E-03	1.4E-07	1.1E-07	1.4E-07
Aroclor-1254	MJ787	2.5E-01	2.5E-01	J	-	-	-	-	-
Aroclor-1260	MJ787	9.6E-02	4.8E-02	U	-	-	-	-	-
PCB-105	MJ787	-	-	-	1.2E-01	8.2E-02	3.1E-05	3.9E-06	3.1E-05
PCB-114	MJ787	-	-	-	4.5E-03	1.5E-03	1.1E-06	7.0E-08	1.1E-06
PCB-118	MJ787	-	-	-	2.7E-01	1.6E-01	6.7E-05	7.9E-06	6.7E-05
PCB-123	MJ787	-	-	-	3.0E-03	2.3E-03	7.5E-07	1.1E-07	7.5E-07
PCB-126	MJ787	-	-	-	7.5E-03	6.4E-03	1.9E-06	3.1E-07	1.9E-06
PCB-156	MJ787	-	-	-	6.3E-02	5.5E-02	1.6E-05	2.6E-06	1.6E-05
PCB-157	MJ787	-	-	-	1.2E-02	2.5E-02	3.1E-06	1.2E-06	3.1E-06
PCB-167	MJ787	-	-	-	2.1E-02	4.3E-02	5.2E-06	2.1E-06	5.2E-06
PCB-169	MJ787	-	-	-	3.7E-04	6.4E-04	9.1E-08	3.1E-08	9.1E-08
PCB-189	MJ787	-	-	-	3.0E-03	6.4E-03	7.5E-07	3.1E-07	7.5E-07
PCB-77	MJ787	-	-	-	1.5E-02	1.3E-02	3.9E-06	6.1E-07	3.9E-06
PCB-81	MJ787	-	-	-	3.0E-03	2.3E-03	7.5E-07	1.1E-07	7.5E-07
Aroclor-1254	MJ788	9.1E-02	4.6E-02	U	-	-	-	-	-
Aroclor-1260	MJ788	9.1E-02	4.6E-02	U	-	-	-	-	-
PCB-105	MJ788	-	-	-	1.2E-01	8.2E-02	5.6E-06	3.7E-06	5.6E-06
PCB-114	MJ788	-	-	-	4.5E-03	1.5E-03	2.1E-07	6.6E-08	2.1E-07
PCB-118	MJ788	-	-	-	2.7E-01	1.6E-01	1.2E-05	7.4E-06	1.2E-05
PCB-123	MJ788	-	-	-	3.0E-03	2.3E-03	1.4E-07	1.1E-07	1.4E-07
PCB-126	MJ788	-	-	-	7.5E-03	6.4E-03	3.4E-07	2.9E-07	3.4E-07
PCB-156	MJ788	-	-	-	6.3E-02	5.5E-02	2.9E-06	2.5E-06	2.9E-06
PCB-157	MJ788	-	-	-	1.2E-02	2.5E-02	5.6E-07	1.1E-06	1.1E-06
PCB-167	MJ788	-	-	-	2.1E-02	4.3E-02	9.4E-07	1.9E-06	1.9E-06

Aroclor to PCB Congener Extrapolation (0-2 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentrations (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF_{1254}	EF_{1260}	Estimated Concentrations Aroclor-1254 (mg/kg)	Estimated Concentrations Aroclor-1260 (mg/kg)	Estimated Concentrations PCB_{MAX} (mg/kg)
PCB-169	MJ788	-	-	-	3.7E-04	6.4E-04	1.7E-08	2.9E-08	2.9E-08
PCB-189	MJ788	-	-	-	3.0E-03	6.4E-03	1.4E-07	2.9E-07	2.9E-07
PCB-77	MJ788	-	-	-	1.5E-02	1.3E-02	7.0E-07	5.8E-07	7.0E-07
PCB-81	MJ788	-	-	-	3.0E-03	2.3E-03	1.4E-07	1.0E-07	1.4E-07
Aroclor-1254	MJ789	5.6E-02	2.8E-02	U	-	-	-	-	-
Aroclor-1260	MJ789	5.6E-02	2.8E-02	U	-	-	-	-	-
PCB-105	MJ789	-	-	-	1.2E-01	8.2E-02	3.5E-06	2.3E-06	3.5E-06
PCB-114	MJ789	-	-	-	4.5E-03	1.5E-03	1.3E-07	4.1E-08	1.3E-07
PCB-118	MJ789	-	-	-	2.7E-01	1.6E-01	7.5E-06	4.6E-06	7.5E-06
PCB-123	MJ789	-	-	-	3.0E-03	2.3E-03	8.4E-08	6.5E-08	8.4E-08
PCB-126	MJ789	-	-	-	7.5E-03	6.4E-03	2.1E-07	1.8E-07	2.1E-07
PCB-156	MJ789	-	-	-	6.3E-02	5.5E-02	1.8E-06	1.5E-06	1.8E-06
PCB-157	MJ789	-	-	-	1.2E-02	2.5E-02	3.5E-07	6.9E-07	6.9E-07
PCB-167	MJ789	-	-	-	2.1E-02	4.3E-02	5.8E-07	1.2E-06	1.2E-06
PCB-169	MJ789	-	-	-	3.7E-04	6.4E-04	1.0E-08	1.8E-08	1.8E-08
PCB-189	MJ789	-	-	-	3.0E-03	6.4E-03	8.4E-08	1.8E-07	1.8E-07
PCB-77	MJ789	-	-	-	1.5E-02	1.3E-02	4.3E-07	3.6E-07	4.3E-07
PCB-81	MJ789	-	-	-	3.0E-03	2.3E-03	8.4E-08	6.3E-08	8.4E-08
Aroclor-1254	MJ790	9.1E-02	4.6E-02	U	-	-	-	-	-
Aroclor-1260	MJ790	9.1E-02	4.6E-02	U	-	-	-	-	-
PCB-105	MJ790	-	-	-	1.2E-01	8.2E-02	5.6E-06	3.7E-06	5.6E-06
PCB-114	MJ790	-	-	-	4.5E-03	1.5E-03	2.1E-07	6.6E-08	2.1E-07
PCB-118	MJ790	-	-	-	2.7E-01	1.6E-01	1.2E-05	7.4E-06	1.2E-05
PCB-123	MJ790	-	-	-	3.0E-03	2.3E-03	1.4E-07	1.1E-07	1.4E-07
PCB-126	MJ790	-	-	-	7.5E-03	6.4E-03	3.4E-07	2.9E-07	3.4E-07
PCB-156	MJ790	-	-	-	6.3E-02	5.5E-02	2.9E-06	2.5E-06	2.9E-06
PCB-157	MJ790	-	-	-	1.2E-02	2.5E-02	5.6E-07	1.1E-06	1.1E-06
PCB-167	MJ790	-	-	-	2.1E-02	4.3E-02	9.4E-07	1.9E-06	1.9E-06
PCB-169	MJ790	-	-	-	3.7E-04	6.4E-04	1.7E-08	2.9E-08	2.9E-08
PCB-189	MJ790	-	-	-	3.0E-03	6.4E-03	1.4E-07	2.9E-07	2.9E-07
PCB-77	MJ790	-	-	-	1.5E-02	1.3E-02	7.0E-07	5.8E-07	7.0E-07
PCB-81	MJ790	-	-	-	3.0E-03	2.3E-03	1.4E-07	1.0E-07	1.4E-07
Aroclor-1254	MJ791	8.6E-02	4.3E-02	U	-	-	-	-	-
Aroclor-1260	MJ791	8.6E-02	4.3E-02	U	-	-	-	-	-
PCB-105	MJ791	-	-	-	1.2E-01	8.2E-02	5.3E-06	3.5E-06	5.3E-06
PCB-114	MJ791	-	-	-	4.5E-03	1.5E-03	2.0E-07	6.3E-08	2.0E-07
PCB-118	MJ791	-	-	-	2.7E-01	1.6E-01	1.2E-05	7.0E-06	1.2E-05
PCB-123	MJ791	-	-	-	3.0E-03	2.3E-03	1.3E-07	1.0E-07	1.3E-07
PCB-126	MJ791	-	-	-	7.5E-03	6.4E-03	3.2E-07	2.7E-07	3.2E-07
PCB-156	MJ791	-	-	-	6.3E-02	5.5E-02	2.7E-06	2.3E-06	2.7E-06
PCB-157	MJ791	-	-	-	1.2E-02	2.5E-02	5.3E-07	1.1E-06	1.1E-06
PCB-167	MJ791	-	-	-	2.1E-02	4.3E-02	8.9E-07	1.8E-06	1.8E-06
PCB-169	MJ791	-	-	-	3.7E-04	6.4E-04	1.6E-08	2.7E-08	2.7E-08
PCB-189	MJ791	-	-	-	3.0E-03	6.4E-03	1.3E-07	2.7E-07	2.7E-07
PCB-77	MJ791	-	-	-	1.5E-02	1.3E-02	6.6E-07	5.5E-07	6.6E-07
PCB-81	MJ791	-	-	-	3.0E-03	2.3E-03	1.3E-07	9.7E-08	1.3E-07
Aroclor-1254	MJ794	9.0E-02	4.5E-02	U	-	-	-	-	-
Aroclor-1260	MJ794	9.0E-02	4.5E-02	U	-	-	-	-	-
PCB-105	MJ794	-	-	-	1.2E-01	8.2E-02	5.6E-06	3.7E-06	5.6E-06
PCB-114	MJ794	-	-	-	4.5E-03	1.5E-03	2.0E-07	6.5E-08	2.0E-07
PCB-118	MJ794	-	-	-	2.7E-01	1.6E-01	1.2E-05	7.4E-06	1.2E-05
PCB-123	MJ794	-	-	-	3.0E-03	2.3E-03	1.3E-07	1.0E-07	1.3E-07
PCB-126	MJ794	-	-	-	7.5E-03	6.4E-03	3.4E-07	2.9E-07	3.4E-07
PCB-156	MJ794	-	-	-	6.3E-02	5.5E-02	2.8E-06	2.5E-06	2.8E-06
PCB-157	MJ794	-	-	-	1.2E-02	2.5E-02	5.6E-07	1.1E-06	1.1E-06
PCB-167	MJ794	-	-	-	2.1E-02	4.3E-02	9.3E-07	1.9E-06	1.9E-06
PCB-169	MJ794	-	-	-	3.7E-04	6.4E-04	1.6E-08	2.9E-08	2.9E-08
PCB-189	MJ794	-	-	-	3.0E-03	6.4E-03	1.3E-07	2.9E-07	2.9E-07

Aroclor to PCB Congener Extrapolation (0-2 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentrations (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF_{1254}	EF_{1260}	Estimated Concentrations Aroclor-1254 (mg/kg)	Estimated Concentrations Aroclor-1260 (mg/kg)	Estimated Concentrations PCB_{MAX} (mg/kg)
PCB-77	MJ794	-	-	-	1.5E-02	1.3E-02	7.0E-07	5.7E-07	7.0E-07
PCB-81	MJ794	-	-	-	3.0E-03	2.3E-03	1.3E-07	1.0E-07	1.3E-07
Aroclor-1254	MJ795	1.0E-01	5.0E-02	U	-	-	-	-	-
Aroclor-1260	MJ795	1.0E-01	5.0E-02	U	-	-	-	-	-
PCB-105	MJ795	-	-	-	1.2E-01	8.2E-02	6.2E-06	4.1E-06	6.2E-06
PCB-114	MJ795	-	-	-	4.5E-03	1.5E-03	2.3E-07	7.3E-08	2.3E-07
PCB-118	MJ795	-	-	-	2.7E-01	1.6E-01	1.3E-05	8.2E-06	1.3E-05
PCB-123	MJ795	-	-	-	3.0E-03	2.3E-03	1.5E-07	1.2E-07	1.5E-07
PCB-126	MJ795	-	-	-	7.5E-03	6.4E-03	3.8E-07	3.2E-07	3.8E-07
PCB-156	MJ795	-	-	-	6.3E-02	5.5E-02	3.1E-06	2.7E-06	3.1E-06
PCB-157	MJ795	-	-	-	1.2E-02	2.5E-02	6.2E-07	1.2E-06	1.2E-06
PCB-167	MJ795	-	-	-	2.1E-02	4.3E-02	1.0E-06	2.1E-06	2.1E-06
PCB-169	MJ795	-	-	-	3.7E-04	6.4E-04	1.8E-08	3.2E-08	3.2E-08
PCB-189	MJ795	-	-	-	3.0E-03	6.4E-03	1.5E-07	3.2E-07	3.2E-07
PCB-77	MJ795	-	-	-	1.5E-02	1.3E-02	7.7E-07	6.4E-07	7.7E-07
PCB-81	MJ795	-	-	-	3.0E-03	2.3E-03	1.5E-07	1.1E-07	1.5E-07
Aroclor-1254	MJ796	1.9E-01	9.5E-02	U	-	-	-	-	-
Aroclor-1260	MJ796	1.9E-01	9.5E-02	U	-	-	-	-	-
PCB-105	MJ796	-	-	-	1.2E-01	8.2E-02	1.2E-05	7.8E-06	1.2E-05
PCB-114	MJ796	-	-	-	4.5E-03	1.5E-03	4.3E-07	1.4E-07	4.3E-07
PCB-118	MJ796	-	-	-	2.7E-01	1.6E-01	2.5E-05	1.6E-05	2.5E-05
PCB-123	MJ796	-	-	-	3.0E-03	2.3E-03	2.8E-07	2.2E-07	2.8E-07
PCB-126	MJ796	-	-	-	7.5E-03	6.4E-03	7.1E-07	6.0E-07	7.1E-07
PCB-156	MJ796	-	-	-	6.3E-02	5.5E-02	6.0E-06	5.2E-06	6.0E-06
PCB-157	MJ796	-	-	-	1.2E-02	2.5E-02	1.2E-06	2.3E-06	2.3E-06
PCB-167	MJ796	-	-	-	2.1E-02	4.3E-02	2.0E-06	4.1E-06	4.1E-06
PCB-169	MJ796	-	-	-	3.7E-04	6.4E-04	3.5E-08	6.0E-08	6.0E-08
PCB-189	MJ796	-	-	-	3.0E-03	6.4E-03	2.8E-07	6.0E-07	6.0E-07
PCB-77	MJ796	-	-	-	1.5E-02	1.3E-02	1.5E-06	1.2E-06	1.5E-06
PCB-81	MJ796	-	-	-	3.0E-03	2.3E-03	2.8E-07	2.1E-07	2.8E-07
Aroclor-1254	MJ798	8.4E-02	4.2E-02	U	-	-	-	-	-
Aroclor-1260	MJ798	8.4E-02	4.2E-02	U	-	-	-	-	-
PCB-105	MJ798	-	-	-	1.2E-01	8.2E-02	5.2E-06	3.4E-06	5.2E-06
PCB-114	MJ798	-	-	-	4.5E-03	1.5E-03	1.9E-07	6.1E-08	1.9E-07
PCB-118	MJ798	-	-	-	2.7E-01	1.6E-01	1.1E-05	6.9E-06	1.1E-05
PCB-123	MJ798	-	-	-	3.0E-03	2.3E-03	1.3E-07	9.7E-08	1.3E-07
PCB-126	MJ798	-	-	-	7.5E-03	6.4E-03	3.2E-07	2.7E-07	3.2E-07
PCB-156	MJ798	-	-	-	6.3E-02	5.5E-02	2.6E-06	2.3E-06	2.6E-06
PCB-157	MJ798	-	-	-	1.2E-02	2.5E-02	5.2E-07	1.0E-06	1.0E-06
PCB-167	MJ798	-	-	-	2.1E-02	4.3E-02	8.7E-07	1.8E-06	1.8E-06
PCB-169	MJ798	-	-	-	3.7E-04	6.4E-04	1.5E-08	2.7E-08	2.7E-08
PCB-189	MJ798	-	-	-	3.0E-03	6.4E-03	1.3E-07	2.7E-07	2.7E-07
PCB-77	MJ798	-	-	-	1.5E-02	1.3E-02	6.5E-07	5.3E-07	6.5E-07
PCB-81	MJ798	-	-	-	3.0E-03	2.3E-03	1.3E-07	9.5E-08	1.3E-07
Aroclor-1254	MJ799	8.2E-02	4.1E-02	U	-	-	-	-	-
Aroclor-1260	MJ799	8.2E-02	4.1E-02	U	-	-	-	-	-
PCB-105	MJ799	-	-	-	1.2E-01	8.2E-02	5.1E-06	3.4E-06	5.1E-06
PCB-114	MJ799	-	-	-	4.5E-03	1.5E-03	1.9E-07	6.0E-08	1.9E-07
PCB-118	MJ799	-	-	-	2.7E-01	1.6E-01	1.1E-05	6.7E-06	1.1E-05
PCB-123	MJ799	-	-	-	3.0E-03	2.3E-03	1.2E-07	9.5E-08	1.2E-07
PCB-126	MJ799	-	-	-	7.5E-03	6.4E-03	3.1E-07	2.6E-07	3.1E-07
PCB-156	MJ799	-	-	-	6.3E-02	5.5E-02	2.6E-06	2.2E-06	2.6E-06
PCB-157	MJ799	-	-	-	1.2E-02	2.5E-02	5.1E-07	1.0E-06	1.0E-06
PCB-167	MJ799	-	-	-	2.1E-02	4.3E-02	8.5E-07	1.8E-06	1.8E-06
PCB-169	MJ799	-	-	-	3.7E-04	6.4E-04	1.5E-08	2.6E-08	2.6E-08
PCB-189	MJ799	-	-	-	3.0E-03	6.4E-03	1.2E-07	2.6E-07	2.6E-07
PCB-77	MJ799	-	-	-	1.5E-02	1.3E-02	6.3E-07	5.2E-07	6.3E-07
PCB-81	MJ799	-	-	-	3.0E-03	2.3E-03	1.2E-07	9.2E-08	1.2E-07

Aroclor to PCB Congener Extrapolation (0-2 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentrations (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF_{1254}	EF_{1260}	Estimated Concentrations Aroclor-1254 (mg/kg)	Estimated Concentrations Aroclor-1260 (mg/kg)	Estimated Concentrations PCB_{MAX} (mg/kg)
Aroclor-1254	MJ800	8.1E-02	4.1E-02	U	-	-	-	-	-
Aroclor-1260	MJ800	8.1E-02	4.1E-02	U	-	-	-	-	-
PCB-105	MJ800	-	-	-	1.2E-01	8.2E-02	5.0E-06	3.3E-06	5.0E-06
PCB-114	MJ800	-	-	-	4.5E-03	1.5E-03	1.8E-07	5.9E-08	1.8E-07
PCB-118	MJ800	-	-	-	2.7E-01	1.6E-01	1.1E-05	6.6E-06	1.1E-05
PCB-123	MJ800	-	-	-	3.0E-03	2.3E-03	1.2E-07	9.4E-08	1.2E-07
PCB-126	MJ800	-	-	-	7.5E-03	6.4E-03	3.0E-07	2.6E-07	3.0E-07
PCB-156	MJ800	-	-	-	6.3E-02	5.5E-02	2.5E-06	2.2E-06	2.5E-06
PCB-157	MJ800	-	-	-	1.2E-02	2.5E-02	5.0E-07	9.9E-07	9.9E-07
PCB-167	MJ800	-	-	-	2.1E-02	4.3E-02	8.4E-07	1.7E-06	1.7E-06
PCB-169	MJ800	-	-	-	3.7E-04	6.4E-04	1.5E-08	2.6E-08	2.6E-08
PCB-189	MJ800	-	-	-	3.0E-03	6.4E-03	1.2E-07	2.6E-07	2.6E-07
PCB-77	MJ800	-	-	-	1.5E-02	1.3E-02	6.3E-07	5.2E-07	6.3E-07
PCB-81	MJ800	-	-	-	3.0E-03	2.3E-03	1.2E-07	9.1E-08	1.2E-07
Aroclor-1254	MJ803	9.6E-02	4.8E-02	U	-	-	-	-	-
Aroclor-1260	MJ803	9.6E-02	4.8E-02	U	-	-	-	-	-
PCB-105	MJ803	-	-	-	1.2E-01	8.2E-02	5.9E-06	3.9E-06	5.9E-06
PCB-114	MJ803	-	-	-	4.5E-03	1.5E-03	2.2E-07	7.0E-08	2.2E-07
PCB-118	MJ803	-	-	-	2.7E-01	1.6E-01	1.3E-05	7.9E-06	1.3E-05
PCB-123	MJ803	-	-	-	3.0E-03	2.3E-03	1.4E-07	1.1E-07	1.4E-07
PCB-126	MJ803	-	-	-	7.5E-03	6.4E-03	3.6E-07	3.1E-07	3.6E-07
PCB-156	MJ803	-	-	-	6.3E-02	5.5E-02	3.0E-06	2.6E-06	3.0E-06
PCB-157	MJ803	-	-	-	1.2E-02	2.5E-02	5.9E-07	1.2E-06	1.2E-06
PCB-167	MJ803	-	-	-	2.1E-02	4.3E-02	9.9E-07	2.1E-06	2.1E-06
PCB-169	MJ803	-	-	-	3.7E-04	6.4E-04	1.8E-08	3.1E-08	3.1E-08
PCB-189	MJ803	-	-	-	3.0E-03	6.4E-03	1.4E-07	3.1E-07	3.1E-07
PCB-77	MJ803	-	-	-	1.5E-02	1.3E-02	7.4E-07	6.1E-07	7.4E-07
PCB-81	MJ803	-	-	-	3.0E-03	2.3E-03	1.4E-07	1.1E-07	1.4E-07
Aroclor-1254	MJ805	9.4E-02	4.7E-02	U	-	-	-	-	-
Aroclor-1260	MJ805	9.4E-02	4.7E-02	U	-	-	-	-	-
PCB-105	MJ805	-	-	-	1.2E-01	8.2E-02	5.8E-06	3.8E-06	5.8E-06
PCB-114	MJ805	-	-	-	4.5E-03	1.5E-03	2.1E-07	6.8E-08	2.1E-07
PCB-118	MJ805	-	-	-	2.7E-01	1.6E-01	1.3E-05	7.7E-06	1.3E-05
PCB-123	MJ805	-	-	-	3.0E-03	2.3E-03	1.4E-07	1.1E-07	1.4E-07
PCB-126	MJ805	-	-	-	7.5E-03	6.4E-03	3.5E-07	3.0E-07	3.5E-07
PCB-156	MJ805	-	-	-	6.3E-02	5.5E-02	3.0E-06	2.6E-06	3.0E-06
PCB-157	MJ805	-	-	-	1.2E-02	2.5E-02	5.8E-07	1.2E-06	1.2E-06
PCB-167	MJ805	-	-	-	2.1E-02	4.3E-02	9.7E-07	2.0E-06	2.0E-06
PCB-169	MJ805	-	-	-	3.7E-04	6.4E-04	1.7E-08	3.0E-08	3.0E-08
PCB-189	MJ805	-	-	-	3.0E-03	6.4E-03	1.4E-07	3.0E-07	3.0E-07
PCB-77	MJ805	-	-	-	1.5E-02	1.3E-02	7.3E-07	6.0E-07	7.3E-07
PCB-81	MJ805	-	-	-	3.0E-03	2.3E-03	1.4E-07	1.1E-07	1.4E-07
Aroclor-1254	MJ806	8.6E-02	4.3E-02	U	-	-	-	-	-
Aroclor-1260	MJ806	8.6E-02	4.3E-02	U	-	-	-	-	-
PCB-105	MJ806	-	-	-	1.2E-01	8.2E-02	5.3E-06	3.5E-06	5.3E-06
PCB-114	MJ806	-	-	-	4.5E-03	1.5E-03	2.0E-07	6.3E-08	2.0E-07
PCB-118	MJ806	-	-	-	2.7E-01	1.6E-01	1.2E-05	7.0E-06	1.2E-05
PCB-123	MJ806	-	-	-	3.0E-03	2.3E-03	1.3E-07	1.0E-07	1.3E-07
PCB-126	MJ806	-	-	-	7.5E-03	6.4E-03	3.2E-07	2.7E-07	3.2E-07
PCB-156	MJ806	-	-	-	6.3E-02	5.5E-02	2.7E-06	2.3E-06	2.7E-06
PCB-157	MJ806	-	-	-	1.2E-02	2.5E-02	5.3E-07	1.1E-06	1.1E-06
PCB-167	MJ806	-	-	-	2.1E-02	4.3E-02	8.9E-07	1.8E-06	1.8E-06
PCB-169	MJ806	-	-	-	3.7E-04	6.4E-04	1.6E-08	2.7E-08	2.7E-08
PCB-189	MJ806	-	-	-	3.0E-03	6.4E-03	1.3E-07	2.7E-07	2.7E-07
PCB-77	MJ806	-	-	-	1.5E-02	1.3E-02	6.6E-07	5.5E-07	6.6E-07
PCB-81	MJ806	-	-	-	3.0E-03	2.3E-03	1.3E-07	9.7E-08	1.3E-07
Aroclor-1254	MJ808	8.9E+00	4.5E+00	U	-	-	-	-	-
Aroclor-1260	MJ808	8.9E+00	4.5E+00	U	-	-	-	-	-

Aroclor to PCB Congener Extrapolation (0-2 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentrations (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF_{1254}	EF_{1260}	Estimated Concentrations Aroclor-1254 (mg/kg)	Estimated Concentrations Aroclor-1260 (mg/kg)	Estimated Concentrations PCB_{MAX} (mg/kg)
PCB-105	MJ808	-	-	-	1.2E-01	8.2E-02	5.5E-04	3.6E-04	5.5E-04
PCB-114	MJ808	-	-	-	4.5E-03	1.5E-03	2.0E-05	6.5E-06	2.0E-05
PCB-118	MJ808	-	-	-	2.7E-01	1.6E-01	1.2E-03	7.3E-04	1.2E-03
PCB-123	MJ808	-	-	-	3.0E-03	2.3E-03	1.3E-05	1.0E-05	1.3E-05
PCB-126	MJ808	-	-	-	7.5E-03	6.4E-03	3.3E-05	2.8E-05	3.3E-05
PCB-156	MJ808	-	-	-	6.3E-02	5.5E-02	2.8E-04	2.4E-04	2.8E-04
PCB-157	MJ808	-	-	-	1.2E-02	2.5E-02	5.5E-05	1.1E-04	1.1E-04
PCB-167	MJ808	-	-	-	2.1E-02	4.3E-02	9.2E-05	1.9E-04	1.9E-04
PCB-169	MJ808	-	-	-	3.7E-04	6.4E-04	1.6E-06	2.8E-06	2.8E-06
PCB-189	MJ808	-	-	-	3.0E-03	6.4E-03	1.3E-05	2.8E-05	2.8E-05
PCB-77	MJ808	-	-	-	1.5E-02	1.3E-02	6.9E-05	5.7E-05	6.9E-05
PCB-81	MJ808	-	-	-	3.0E-03	2.3E-03	1.3E-05	1.0E-05	1.3E-05
Aroclor-1254	MJ814	5.6E-02	2.8E-02	U	-	-	-	-	-
Aroclor-1260	MJ814	5.6E-02	2.8E-02	U	-	-	-	-	-
PCB-105	MJ814	-	-	-	1.2E-01	8.2E-02	3.5E-06	2.3E-06	3.5E-06
PCB-114	MJ814	-	-	-	4.5E-03	1.5E-03	1.3E-07	4.1E-08	1.3E-07
PCB-118	MJ814	-	-	-	2.7E-01	1.6E-01	7.5E-06	4.6E-06	7.5E-06
PCB-123	MJ814	-	-	-	3.0E-03	2.3E-03	8.4E-08	6.5E-08	8.4E-08
PCB-126	MJ814	-	-	-	7.5E-03	6.4E-03	2.1E-07	1.8E-07	2.1E-07
PCB-156	MJ814	-	-	-	6.3E-02	5.5E-02	1.8E-06	1.5E-06	1.8E-06
PCB-157	MJ814	-	-	-	1.2E-02	2.5E-02	3.5E-07	6.9E-07	6.9E-07
PCB-167	MJ814	-	-	-	2.1E-02	4.3E-02	5.8E-07	1.2E-06	1.2E-06
PCB-169	MJ814	-	-	-	3.7E-04	6.4E-04	1.0E-08	1.8E-08	1.8E-08
PCB-189	MJ814	-	-	-	3.0E-03	6.4E-03	8.4E-08	1.8E-07	1.8E-07
PCB-77	MJ814	-	-	-	1.5E-02	1.3E-02	4.3E-07	3.6E-07	4.3E-07
PCB-81	MJ814	-	-	-	3.0E-03	2.3E-03	8.4E-08	6.3E-08	8.4E-08
Aroclor-1254	MT801	5.1E-02	2.6E-02	U	-	-	-	-	-
Aroclor-1260	MT801	5.1E-02	2.6E-02	U	-	-	-	-	-
PCB-105	MT801	-	-	-	1.2E-01	8.2E-02	3.2E-06	2.1E-06	3.2E-06
PCB-114	MT801	-	-	-	4.5E-03	1.5E-03	1.2E-07	3.7E-08	1.2E-07
PCB-118	MT801	-	-	-	2.7E-01	1.6E-01	6.8E-06	4.2E-06	6.8E-06
PCB-123	MT801	-	-	-	3.0E-03	2.3E-03	7.6E-08	5.9E-08	7.6E-08
PCB-126	MT801	-	-	-	7.5E-03	6.4E-03	1.9E-07	1.6E-07	1.9E-07
PCB-156	MT801	-	-	-	6.3E-02	5.5E-02	1.6E-06	1.4E-06	1.6E-06
PCB-157	MT801	-	-	-	1.2E-02	2.5E-02	3.2E-07	6.3E-07	6.3E-07
PCB-167	MT801	-	-	-	2.1E-02	4.3E-02	5.3E-07	1.1E-06	1.1E-06
PCB-169	MT801	-	-	-	3.7E-04	6.4E-04	9.3E-09	1.6E-08	1.6E-08
PCB-189	MT801	-	-	-	3.0E-03	6.4E-03	7.6E-08	1.6E-07	1.6E-07
PCB-77	MT801	-	-	-	1.5E-02	1.3E-02	3.9E-07	3.2E-07	3.9E-07
PCB-81	MT801	-	-	-	3.0E-03	2.3E-03	7.6E-08	5.7E-08	7.6E-08
Aroclor-1254	MT802	5.1E-02	2.6E-02	U	-	-	-	-	-
Aroclor-1260	MT802	5.1E-02	2.6E-02	U	-	-	-	-	-
PCB-105	MT802	-	-	-	1.2E-01	8.2E-02	3.2E-06	2.1E-06	3.2E-06
PCB-114	MT802	-	-	-	4.5E-03	1.5E-03	1.2E-07	3.7E-08	1.2E-07
PCB-118	MT802	-	-	-	2.7E-01	1.6E-01	6.8E-06	4.2E-06	6.8E-06
PCB-123	MT802	-	-	-	3.0E-03	2.3E-03	7.6E-08	5.9E-08	7.6E-08
PCB-126	MT802	-	-	-	7.5E-03	6.4E-03	1.9E-07	1.6E-07	1.9E-07
PCB-156	MT802	-	-	-	6.3E-02	5.5E-02	1.6E-06	1.4E-06	1.6E-06
PCB-157	MT802	-	-	-	1.2E-02	2.5E-02	3.2E-07	6.3E-07	6.3E-07
PCB-167	MT802	-	-	-	2.1E-02	4.3E-02	5.3E-07	1.1E-06	1.1E-06
PCB-169	MT802	-	-	-	3.7E-04	6.4E-04	9.3E-09	1.6E-08	1.6E-08
PCB-189	MT802	-	-	-	3.0E-03	6.4E-03	7.6E-08	1.6E-07	1.6E-07
PCB-77	MT802	-	-	-	1.5E-02	1.3E-02	3.9E-07	3.2E-07	3.9E-07
PCB-81	MT802	-	-	-	3.0E-03	2.3E-03	7.6E-08	5.7E-08	7.6E-08
Aroclor-1254	RJ777	3.5E-02	1.8E-02	U	-	-	-	-	-
Aroclor-1260	RJ777	3.5E-02	1.8E-02	U	-	-	-	-	-
PCB-105	RJ777	-	-	-	1.2E-01	8.2E-02	2.2E-06	1.4E-06	2.2E-06
PCB-114	RJ777	-	-	-	4.5E-03	1.5E-03	7.9E-08	2.5E-08	7.9E-08

Aroclor to PCB Congener Extrapolation (0-2 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentrations (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF_{1254}	EF_{1260}	Estimated Concentrations Aroclor-1254 (mg/kg)	Estimated Concentrations Aroclor-1260 (mg/kg)	Estimated Concentrations PCB_{MAX} (mg/kg)
PCB-118	RJ777	-	-	-	2.7E-01	1.6E-01	4.7E-06	2.9E-06	4.7E-06
PCB-123	RJ777	-	-	-	3.0E-03	2.3E-03	5.2E-08	4.1E-08	5.2E-08
PCB-126	RJ777	-	-	-	7.5E-03	6.4E-03	1.3E-07	1.1E-07	1.3E-07
PCB-156	RJ777	-	-	-	6.3E-02	5.5E-02	1.1E-06	9.5E-07	1.1E-06
PCB-157	RJ777	-	-	-	1.2E-02	2.5E-02	2.2E-07	4.3E-07	4.3E-07
PCB-167	RJ777	-	-	-	2.1E-02	4.3E-02	3.6E-07	7.5E-07	7.5E-07
PCB-169	RJ777	-	-	-	3.7E-04	6.4E-04	6.4E-09	1.1E-08	1.1E-08
PCB-189	RJ777	-	-	-	3.0E-03	6.4E-03	5.2E-08	1.1E-07	1.1E-07
PCB-77	RJ777	-	-	-	1.5E-02	1.3E-02	2.7E-07	2.2E-07	2.7E-07
PCB-81	RJ777	-	-	-	3.0E-03	2.3E-03	5.2E-08	3.9E-08	5.2E-08
Aroclor-1254	RJ782	6.7E-02	3.4E-02	U	-	-	-	-	-
Aroclor-1260	RJ782	6.7E-02	3.4E-02	U	-	-	-	-	-
PCB-105	RJ782	-	-	-	1.2E-01	8.2E-02	4.1E-06	2.7E-06	4.1E-06
PCB-114	RJ782	-	-	-	4.5E-03	1.5E-03	1.5E-07	4.9E-08	1.5E-07
PCB-118	RJ782	-	-	-	2.7E-01	1.6E-01	9.0E-06	5.5E-06	9.0E-06
PCB-123	RJ782	-	-	-	3.0E-03	2.3E-03	1.0E-07	7.8E-08	1.0E-07
PCB-126	RJ782	-	-	-	7.5E-03	6.4E-03	2.5E-07	2.1E-07	2.5E-07
PCB-156	RJ782	-	-	-	6.3E-02	5.5E-02	2.1E-06	1.8E-06	2.1E-06
PCB-157	RJ782	-	-	-	1.2E-02	2.5E-02	4.1E-07	8.2E-07	8.2E-07
PCB-167	RJ782	-	-	-	2.1E-02	4.3E-02	6.9E-07	1.4E-06	1.4E-06
PCB-169	RJ782	-	-	-	3.7E-04	6.4E-04	1.2E-08	2.1E-08	2.1E-08
PCB-189	RJ782	-	-	-	3.0E-03	6.4E-03	1.0E-07	2.1E-07	2.1E-07
PCB-77	RJ782	-	-	-	1.5E-02	1.3E-02	5.2E-07	4.3E-07	5.2E-07
PCB-81	RJ782	-	-	-	3.0E-03	2.3E-03	1.0E-07	7.5E-08	1.0E-07
Aroclor-1254	RS288	1.1E-01	5.5E-02	U	-	-	-	-	-
Aroclor-1260	RS288	1.1E-01	5.5E-02	U	-	-	-	-	-
PCB-105	RS288	-	-	-	1.2E-01	8.2E-02	6.8E-06	4.5E-06	6.8E-06
PCB-114	RS288	-	-	-	4.5E-03	1.5E-03	2.5E-07	8.0E-08	2.5E-07
PCB-118	RS288	-	-	-	2.7E-01	1.6E-01	1.5E-05	9.0E-06	1.5E-05
PCB-123	RS288	-	-	-	3.0E-03	2.3E-03	1.6E-07	1.3E-07	1.6E-07
PCB-126	RS288	-	-	-	7.5E-03	6.4E-03	4.1E-07	3.5E-07	4.1E-07
PCB-156	RS288	-	-	-	6.3E-02	5.5E-02	3.5E-06	3.0E-06	3.5E-06
PCB-157	RS288	-	-	-	1.2E-02	2.5E-02	6.8E-07	1.4E-06	1.4E-06
PCB-167	RS288	-	-	-	2.1E-02	4.3E-02	1.1E-06	2.4E-06	2.4E-06
PCB-169	RS288	-	-	-	3.7E-04	6.4E-04	2.0E-08	3.5E-08	3.5E-08
PCB-189	RS288	-	-	-	3.0E-03	6.4E-03	1.6E-07	3.5E-07	3.5E-07
PCB-77	RS288	-	-	-	1.5E-02	1.3E-02	8.5E-07	7.0E-07	8.5E-07
PCB-81	RS288	-	-	-	3.0E-03	2.3E-03	1.6E-07	1.2E-07	1.6E-07
Aroclor-1254	RS293	1.1E-01	5.5E-02	U	-	-	-	-	-
Aroclor-1260	RS293	1.1E-01	5.5E-02	U	-	-	-	-	-
PCB-105	RS293	-	-	-	1.2E-01	8.2E-02	6.8E-06	4.5E-06	6.8E-06
PCB-114	RS293	-	-	-	4.5E-03	1.5E-03	2.5E-07	8.0E-08	2.5E-07
PCB-118	RS293	-	-	-	2.7E-01	1.6E-01	1.5E-05	9.0E-06	1.5E-05
PCB-123	RS293	-	-	-	3.0E-03	2.3E-03	1.6E-07	1.3E-07	1.6E-07
PCB-126	RS293	-	-	-	7.5E-03	6.4E-03	4.1E-07	3.5E-07	4.1E-07
PCB-156	RS293	-	-	-	6.3E-02	5.5E-02	3.5E-06	3.0E-06	3.5E-06
PCB-157	RS293	-	-	-	1.2E-02	2.5E-02	6.8E-07	1.4E-06	1.4E-06
PCB-167	RS293	-	-	-	2.1E-02	4.3E-02	1.1E-06	2.4E-06	2.4E-06
PCB-169	RS293	-	-	-	3.7E-04	6.4E-04	2.0E-08	3.5E-08	3.5E-08
PCB-189	RS293	-	-	-	3.0E-03	6.4E-03	1.6E-07	3.5E-07	3.5E-07
PCB-77	RS293	-	-	-	1.5E-02	1.3E-02	8.5E-07	7.0E-07	8.5E-07
PCB-81	RS293	-	-	-	3.0E-03	2.3E-03	1.6E-07	1.2E-07	1.6E-07
Aroclor-1254	RS294	1.1E-01	5.5E-02	U	-	-	-	-	-
Aroclor-1260	RS294	1.1E-01	5.5E-02	U	-	-	-	-	-
PCB-105	RS294	-	-	-	1.2E-01	8.2E-02	6.8E-06	4.5E-06	6.8E-06
PCB-114	RS294	-	-	-	4.5E-03	1.5E-03	2.5E-07	8.0E-08	2.5E-07
PCB-118	RS294	-	-	-	2.7E-01	1.6E-01	1.5E-05	9.0E-06	1.5E-05
PCB-123	RS294	-	-	-	3.0E-03	2.3E-03	1.6E-07	1.3E-07	1.6E-07

Aroclor to PCB Congener Extrapolation (0-2 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentrations (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF_{1254}	EF_{1260}	Estimated Concentrations Aroclor-1254 (mg/kg)	Estimated Concentrations Aroclor-1260 (mg/kg)	Estimated Concentrations PCB_{MAX} (mg/kg)
PCB-126	RS294	-	-	-	7.5E-03	6.4E-03	4.1E-07	3.5E-07	4.1E-07
PCB-156	RS294	-	-	-	6.3E-02	5.5E-02	3.5E-06	3.0E-06	3.5E-06
PCB-157	RS294	-	-	-	1.2E-02	2.5E-02	6.8E-07	1.4E-06	1.4E-06
PCB-167	RS294	-	-	-	2.1E-02	4.3E-02	1.1E-06	2.4E-06	2.4E-06
PCB-169	RS294	-	-	-	3.7E-04	6.4E-04	2.0E-08	3.5E-08	3.5E-08
PCB-189	RS294	-	-	-	3.0E-03	6.4E-03	1.6E-07	3.5E-07	3.5E-07
PCB-77	RS294	-	-	-	1.5E-02	1.3E-02	8.5E-07	7.0E-07	8.5E-07
PCB-81	RS294	-	-	-	3.0E-03	2.3E-03	1.6E-07	1.2E-07	1.6E-07
Aroclor-1254	RS320	1.1E-01	5.5E-02	U	-	-	-	-	-
Aroclor-1260	RS320	1.1E-01	5.5E-02	U	-	-	-	-	-
PCB-105	RS320	-	-	-	1.2E-01	8.2E-02	6.8E-06	4.5E-06	6.8E-06
PCB-114	RS320	-	-	-	4.5E-03	1.5E-03	2.5E-07	8.0E-08	2.5E-07
PCB-118	RS320	-	-	-	2.7E-01	1.6E-01	1.5E-05	9.0E-06	1.5E-05
PCB-123	RS320	-	-	-	3.0E-03	2.3E-03	1.6E-07	1.3E-07	1.6E-07
PCB-126	RS320	-	-	-	7.5E-03	6.4E-03	4.1E-07	3.5E-07	4.1E-07
PCB-156	RS320	-	-	-	6.3E-02	5.5E-02	3.5E-06	3.0E-06	3.5E-06
PCB-157	RS320	-	-	-	1.2E-02	2.5E-02	6.8E-07	1.4E-06	1.4E-06
PCB-167	RS320	-	-	-	2.1E-02	4.3E-02	1.1E-06	2.4E-06	2.4E-06
PCB-169	RS320	-	-	-	3.7E-04	6.4E-04	2.0E-08	3.5E-08	3.5E-08
PCB-189	RS320	-	-	-	3.0E-03	6.4E-03	1.6E-07	3.5E-07	3.5E-07
PCB-77	RS320	-	-	-	1.5E-02	1.3E-02	8.5E-07	7.0E-07	8.5E-07
PCB-81	RS320	-	-	-	3.0E-03	2.3E-03	1.6E-07	1.2E-07	1.6E-07
Aroclor-1254	RS323	2.2E+00	2.2E+00		-	-	-	-	-
Aroclor-1260	RS323	1.0E+00	5.0E-01	U	-	-	-	-	-
PCB-105	RS323	-	-	-	1.2E-01	8.2E-02	2.7E-04	4.1E-05	2.7E-04
PCB-114	RS323	-	-	-	4.5E-03	1.5E-03	1.0E-05	7.3E-07	1.0E-05
PCB-118	RS323	-	-	-	2.7E-01	1.6E-01	5.9E-04	8.2E-05	5.9E-04
PCB-123	RS323	-	-	-	3.0E-03	2.3E-03	6.6E-06	1.2E-06	6.6E-06
PCB-126	RS323	-	-	-	7.5E-03	6.4E-03	1.7E-05	3.2E-06	1.7E-05
PCB-156	RS323	-	-	-	6.3E-02	5.5E-02	1.4E-04	2.7E-05	1.4E-04
PCB-157	RS323	-	-	-	1.2E-02	2.5E-02	2.7E-05	1.2E-05	2.7E-05
PCB-167	RS323	-	-	-	2.1E-02	4.3E-02	4.5E-05	2.1E-05	4.5E-05
PCB-169	RS323	-	-	-	3.7E-04	6.4E-04	8.1E-07	3.2E-07	8.1E-07
PCB-189	RS323	-	-	-	3.0E-03	6.4E-03	6.6E-06	3.2E-06	6.6E-06
PCB-77	RS323	-	-	-	1.5E-02	1.3E-02	3.4E-05	6.4E-06	3.4E-05
PCB-81	RS323	-	-	-	3.0E-03	2.3E-03	6.6E-06	1.1E-06	6.6E-06

Notes:
PCBs - polychlorinated biphenyls
EF- Extrapolation Factor (ng congener/kg soil)/(µg Aroclor/kg soil)
"-" not applicable
mg/kg - milligrams per kilogram
ug/kg - micrograms per kilogram
ng/kg - nanograms per kilogram
bgs- below ground surface
PCB_{MAX} = the maximum of the extrapolated 1254 and 1260 concentrations

Exposure Point Concentrations for CPECs in Soil Vapor (0-6 feet bgs)
Old Conservation Yard RFI Site

Chemical	Distribution Type	CTE [a] (µg/L)	RME [b] (µg/L)	
1,1,1-Trichloroethane	NP	6.1E-01	8.0E-01	
1,1,2-Trichloro-1,2,2-trifluoroethane	NP	8.9E-01	1.8E+00	
1,1-Dichloroethene	NP	5.9E-01	7.6E-01	
Benzene	NT	5.0E-01	5.0E-01	d
Ethylbenzene	NT	2.4E-01	4.8E-01	c
p-Isopropyltoluene	NT	3.8E-01	3.8E-01	c
Methylene chloride	NT	5.0E-01	1.0E+01	d
Toluene	NT	4.9E-01	5.0E-01	d
Trichloroethene	NP	1.3E+00	4.5E+00	
m,p-Xylene	NT	5.0E-01	1.0E+00	d
o-Xylene	NT	1.1E-01	2.2E-01	c
Xylenes (total)	NT	5.0E-01	1.0E+00	d

Notes:

a. Either the arithmetic mean concentration for two or more samples or the reported concentration for a single sample.

b. Either the 95% upper confidence limit (95% UCL) on the arithmetic mean for three or more samples, or the maximum concentration for less than three samples, or the maximum concentration in cases where the 95% UCL exceeds the maximum

c. Exposure point concentrations estimated using the soil to soil vapor partitioning component of the Johnson & Ettinger model

d. Exposure point concentrations estimated at one-half the soil vapor sample quantitation limit

CTE- Central Tendency Exposure

RME- Reasonable Maximum Exposure

µg/L - micrograms per liter volume

bgs- below ground surface

Exposure Point Concentrations for CPECs in Soil (0-6 feet bgs)
Old Conservation Yard RFI Site

Chemical	Distribution Type	EPCs		
		CTE[a] (mg/kg)	RME[b] (mg/kg)	
Inorganic Compounds				
Antimony	NP	2.4E+00	7.6E+00	
Barium	G	8.3E+01	9.0E+01	
Boron	N	4.5E+00	5.1E+00	
Cadmium	NP	5.5E-01	8.9E-01	
Copper	NP	1.3E+01	1.8E+01	
Lead	NP	1.8E+01	3.1E+01	
Mercury	NP	4.5E-01	2.8E+00	
Silver	NP	9.8E-01	2.1E+00	
Thallium	NP	9.3E-01	1.7E+00	
Zinc	NP	7.8E+01	1.3E+02	
VOCs				
1,1,1-Trichloroethane	NT	3.5E-03	1.4E-02	c
1,1,2-Trichloro-1,2,2-trifluoroethane	NT	1.5E-02	5.4E-02	c
1,1-Dichloroethene	NT	3.6E-03	1.4E-02	c
2-Butanone	NP	2.8E-02	1.1E-02	
Acetone	NP	3.0E-01	2.7E+00	
Benzene	NP	1.0E-03	2.0E-03	d
Ethylbenzene	NP	1.0E-03	2.0E-03	d
m,p-Xylene	NP	2.9E-03	6.0E-03	d
Methylene chloride	NP	3.8E-02	1.9E-01	
o-Xylene	NP	6.9E-04	1.4E-03	d
p-Isopropyltoluene	NT	1.9E-03	1.9E-03	
Toluene	NP	1.3E-03	2.9E-03	d
Trichloroethene	NT	3.5E-03	1.4E-02	c
Xylenes (total)	NP	4.2E-03	8.2E-03	d
SVOCs				
1-Methylnaphthalene	NP	1.2E-02	1.3E-02	
2,4-Dinitrophenol	NT	2.0E+00	1.0E+01	c
2-Methylnaphthalene	NP	1.6E-01	3.5E-01	d
Acenaphthene	NP	1.5E-01	5.8E-01	d
Acenaphthylene	NP	3.8E-02	1.2E-01	d
Anthracene	NP	1.1E-01	4.0E-01	d
Benzo(a)anthracene	NP	3.1E-02	1.5E-01	d
Benzo(a)pyrene	NP	3.1E-02	1.4E-01	d
Benzo(b)fluoranthene	NP	3.7E-02	1.6E-01	d
Benzo(e)pyrene	NP	6.8E-02	2.6E-01	d
Benzo(g,h,i)perylene	NP	7.8E-02	2.6E-01	d
Benzo(k)fluoranthene	NP	3.1E-02	1.4E-01	d

Exposure Point Concentrations for CPECs in Soil (0-6 feet bgs)
Old Conservation Yard RFI Site

Chemical	Distribution Type	EPCs		
		CTE[a] (mg/kg)	RME[b] (mg/kg)	
Chrysene	NP	4.8E-02	2.0E-01	d
Dibenz(a,h)anthracene	NP	2.4E-02	1.0E-01	d
Fluoranthene	NP	7.1E-02	3.5E-01	d
Fluorene	NP	1.5E-01	5.7E-01	d
Indeno(1,2,3-cd)pyrene	NP	2.8E-02	1.4E-01	d
Naphthalene	NP	5.8E-02	1.3E-01	d
Perylene	NP	3.9E-02	1.5E-01	d
Phenanthrene	NP	3.7E-01	1.5E+00	d
Pyrene	NP	7.4E-02	3.1E-01	d
Total Petroleum Hydrocarbons				
C08-C11(Gasoline Range)	NP	8.6E+00	1.8E+01	
C11-C14(Kerosene Range)	NP	9.7E+00	1.8E+01	
C14-C20(Diesel Range)	NP	5.3E+01	2.0E+02	
C20-C30(Lubricant Oil Range)	NP	2.3E+02	1.0E+03	
PCDD/PCDFs				
2,3,7,8-TCDD	G	1.1E-06	2.3E-06	
1,2,3,7,8-PeCDD	G	6.7E-06	1.7E-05	
1,2,3,4,7,8-HxCDD	LN	1.5E-05	7.4E-05	
1,2,3,6,7,8-HxCDD	G	2.2E-05	4.6E-05	
1,2,3,7,8,9-HxCDD	G	1.9E-05	4.7E-05	
1,2,3,4,6,7,8-HpCDD	LN	4.9E-04	3.1E-03	
OCDD	G	3.8E-03	7.4E-03	
2,3,7,8-TCDF	NP	2.6E-06	1.0E-05	
1,2,3,7,8-PeCDF	G	2.3E-06	4.5E-06	
2,3,4,7,8-PeCDF	G	5.8E-06	1.2E-05	
1,2,3,4,7,8-HxCDF	NT	1.3E-05	1.2E-04	
1,2,3,6,7,8-HxCDF	G	5.6E-06	1.1E-05	
2,3,4,6,7,8-HxCDF	LN	6.2E-06	3.0E-05	
1,2,3,7,8,9-HxCDF	LN	2.7E-06	1.5E-05	
1,2,3,4,6,7,8-HpCDF	G	5.7E-05	1.1E-04	
1,2,3,4,7,8,9-HpCDF	LN	6.8E-06	3.0E-05	
OCDF	G	1.7E-04	3.4E-04	
PCBs				
Aroclor-1248	NP	4.1E+02	4.5E+03	
Aroclor-1254	NP	1.0E+00	5.4E+00	
Aroclor-1260	NP	1.1E+01	7.7E+01	
PCB-105	NP	9.1E-04	6.4E-03	
PCB-114	NP	1.7E-05	1.1E-04	
PCB-118	NP	1.8E-03	1.3E-02	
PCB-123	NP	2.6E-05	1.8E-04	

Exposure Point Concentrations for CPECs in Soil (0-6 feet bgs)
Old Conservation Yard RFI Site

Chemical	Distribution Type	EPCs	
		CTE[a] (mg/kg)	RME[b] (mg/kg)
PCB-126	NP	7.0E-05	4.9E-04
PCB-156	NP	6.0E-04	4.2E-03
PCB-157	NP	2.7E-04	1.9E-03
PCB-167	NP	4.6E-04	3.3E-03
PCB-169	NP	6.9E-06	4.9E-05
PCB-189	NP	6.9E-05	4.9E-04
PCB-77	NP	1.4E-04	9.9E-04
PCB-81	NP	2.5E-05	1.7E-04

Notes:

a. Either the arithmetic mean concentration for two or more samples or the reported concentration for a single sample.

b. Either the 95% upper confidence limit (95% UCL) on the arithmetic mean for three or more samples, or the maximum concentration for less than three samples, or the maximum concentration in cases where the 95% UCL exceeds the maximum concentration.

c. Exposure point concentrations estimated at one-half the sample quantitation limit for soil at 0 to 6 feet bgs.

d. Exposure point concentrations estimated in part following the methods for extrapolation of total petroleum hydrocarbons to petroleum constituents as described in Section 2.8 of the SRAM and as presented in Spreadsheet C2-99.

CPEC - chemical of potential ecological concern
EPC - exposure point concentration
CTE - central tendency exposure
RME - reasonable maximum exposure
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCDD/PCDF - Polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.
N - normal distribution
LN - lognormal distribution
I - indeterminate
NT - data not tested for distribution due to sample size
"-" not applicable
mg/kg - milligrams per kilogram
bgs- below ground surface

Exposure Point Concentrations for CPECs in Soil (0-4 feet bgs)
Old Conservation Yard RFI Site

Chemical	Distribution Type	EPCs CTE[a] (mg/kg)	EPCs RME[b] (mg/kg)	
Inorganic Compounds				
Antimony	NP	1.7E+00	5.3E+00	
Barium	G	8.2E+01	8.8E+01	
Boron	N	4.5E+00	5.2E+00	
Cadmium	NP	5.1E-01	8.1E-01	
Lead	LN	1.6E+01	1.9E+01	
Mercury	NP	4.7E-01	3.0E+00	
Silver	NP	8.6E-01	1.7E+00	
Thallium	NP	8.8E-01	1.7E+00	
Zinc	G	6.6E+01	7.3E+01	
VOCs				
1,1,1-Trichloroethane	NT	2.9E-03	5.5E-03	c
1,1,2-Trichloro-1,2,2-trifluoroethane	NT	1.2E-02	2.1E-02	c
1,1-Dichloroethene	NT	3.1E-03	5.5E-03	c
2-Butanone	NP	2.2E-02	3.8E-02	
Acetone	NP	3.1E-01	3.1E+00	
Benzene	NP	1.1E-03	2.3E-03	d
Ethylbenzene	NP	1.1E-03	2.3E-03	d
m,p-Xylene	NP	3.1E-03	6.6E-03	d
Methylene chloride	NP	3.7E-02	2.2E-01	
o-Xylene	NP	7.3E-04	1.5E-03	d
p-Isopropyltoluene	NT	NC	NC	
Toluene	NP	1.4E-03	3.2E-03	d
Trichloroethene	NT	2.9E-03	5.5E-03	c
Xylenes (total)	NP	4.4E-03	9.1E-03	d
SVOCs				
1-Methylnaphthalene	NP	1.2E-02	1.3E-02	
2,4-Dinitrophenol	NT	2.0E+00	1.0E+01	c
2-Methylnaphthalene	NP	1.6E-01	3.8E-01	d
Acenaphthene	NP	1.7E-01	6.5E-01	d
Acenaphthylene	NP	3.9E-02	1.3E-01	d
Anthracene	NP	1.2E-01	4.5E-01	d
Benzo(a)anthracene	NP	3.2E-02	1.6E-01	d
Benzo(a)pyrene	NP	3.1E-02	1.6E-01	d
Benzo(b)fluoranthene	NP	3.8E-02	1.8E-01	d
Benzo(e)pyrene	NP	7.5E-02	3.0E-01	d
Benzo(g,h,i)perylene	NP	8.5E-02	2.9E-01	d
Benzo(k)fluoranthene	NP	3.1E-02	1.6E-01	d
Chrysene	NP	5.1E-02	2.2E-01	d
Dibenz(a,h)anthracene	NP	2.3E-02	1.0E-01	d

Exposure Point Concentrations for CPECs in Soil (0-4 feet bgs)
Old Conservation Yard RFI Site

Chemical	Distribution Type	EPCs		
		CTE[a] (mg/kg)	RME[b] (mg/kg)	
Fluoranthene	NP	7.7E-02	3.9E-01	[d]
Fluorene	NP	1.7E-01	6.5E-01	[d]
Indeno(1,2,3-cd)pyrene	NP	2.8E-02	1.5E-01	[d]
Naphthalene	NP	5.9E-02	1.4E-01	[d]
Perylene	NP	4.3E-02	1.7E-01	[d]
Phenanthrene	NP	4.1E-01	1.7E+00	[d]
Pyrene	NP	8.0E-02	3.4E-01	[d]
Total Petroleum Hydrocarbons				
C08-C11(Gasoline Range)	NP	9.1E+00	2.0E+01	
C11-C14(Kerosene Range)	NP	1.0E+01	2.0E+01	
C14-C20(Diesel Range)	NP	5.8E+01	2.3E+02	
C20-C30(Lubricant Oil Range)	NP	2.6E+02	1.2E+03	
PCDD/PCDFs				
2,3,7,8-TCDD	LN	1.0E-06	2.1E-06	
1,2,3,7,8-PeCDD	LN	6.8E-06	3.4E-05	
1,2,3,4,7,8-HxCDD	LN	1.6E-05	7.3E-05	
1,2,3,6,7,8-HxCDD	LN	2.1E-05	1.2E-04	
1,2,3,7,8,9-HxCDD	LN	1.9E-05	1.1E-04	
1,2,3,4,6,7,8-HpCDD	G	4.9E-04	1.3E-03	
OCDD	G	3.6E-03	7.5E-03	
2,3,7,8-TCDF	NP	2.1E-06	1.0E-05	
1,2,3,7,8-PeCDF	G	1.8E-06	3.7E-06	
2,3,4,7,8-PeCDF	G	5.1E-06	1.1E-05	
1,2,3,4,7,8-HxCDF	G	1.3E-05	3.7E-05	
1,2,3,6,7,8-HxCDF	G	4.9E-06	1.0E-05	
2,3,4,6,7,8-HxCDF	LN	5.6E-06	3.0E-05	
1,2,3,7,8,9-HxCDF	G	2.4E-06	6.2E-06	
1,2,3,4,6,7,8-HpCDF	G	5.5E-05	1.1E-04	
1,2,3,4,7,8,9-HpCDF	LN	7.4E-06	3.4E-05	
OCDF	G	1.8E-04	3.8E-04	
PCBs				
Aroclor-1248	NP	4.7E+02	5.2E+03	
Aroclor-1254	NP	1.2E+00	5.4E+00	
Aroclor-1260	NP	1.3E+01	9.0E+01	
PCB-105	NP	1.0E-03	7.4E-03	
PCB-114	NP	1.9E-05	1.3E-04	
PCB-118	NP	2.1E-03	1.5E-02	
PCB-123	NP	3.0E-05	2.1E-04	
PCB-126	NP	8.1E-05	5.7E-04	
PCB-156	NP	6.9E-04	4.9E-03	
PCB-157	NP	3.1E-04	2.2E-03	

Exposure Point Concentrations for CPECs in Soil (0-4 feet bgs)
Old Conservation Yard RFI Site

Chemical	Distribution Type	EPCs	
		CTE[a] (mg/kg)	RME[b] (mg/kg)
PCB-167	NP	5.4E-04	3.8E-03
PCB-169	NP	8.0E-06	5.7E-05
PCB-189	NP	8.0E-05	5.7E-04
PCB-77	NP	1.6E-04	1.1E-03
PCB-81	NP	2.9E-05	2.0E-04

Notes:

a. Either the arithmetic mean concentration for two or more samples or the reported concentration for a single sample.

b. Either the 95% upper confidence limit (95% UCL) on the arithmetic mean for three or more samples, or the maximum concentration for less than three samples, or the maximum concentration in cases where the 95% UCL exceeds the maximum concentration.

c. Exposure point concentrations estimated at one-half the sample quantitation limit for soil at 0 to 4 feet bgs.

d. Exposure point concentrations estimated in part following the methods for extrapolation of total petroleum hydrocarbons to petroleum constituents as described in Section 2.8 of the SRAM and as presented in Spreadsheet C2-97.

CPEC - chemical of potential ecological concern
EPC - exposure point concentration
CTE - central tendency exposure
RME - reasonable maximum exposure
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCDD/PCDF - polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.
N - normal distribution
LN - lognormal distribution
I - inderterminate
NT - data not tested for distribution due to sample size
"-" not applicable
mg/kg - milligrams per kilogram
bgs- below ground surface

Exposure Point Concentrations for CPECs in Soil (0-2 feet bgs)
Old Conservation Yard RFI Site

Chemical	Distribution Type	EPCs		
		CTE[a] (mg/kg)	RME[b] (mg/kg)	
Inorganic Compounds				
Antimony	NP	1.7E+00	5.4E+00	
Barium	G	7.8E+01	8.3E+01	
Boron	G	4.3E+00	5.2E+00	
Cadmium	NP	5.2E-01	9.9E-01	
Lead	LN	1.7E+01	2.1E+01	
Mercury	LN	5.0E-01	3.3E+00	
Silver	NP	8.6E-01	1.8E+00	
Thallium	NP	8.6E-01	1.7E+00	
Zinc	LN	6.6E+01	7.4E+01	
VOCs				
1,1,1-Trichloroethane	NT	3.0E-03	5.5E-03	c
1,1,2-Trichloro-1,2,2-trifluoroethane	NT	1.2E-02	2.1E-02	c
1,1-Dichloroethene	NT	3.2E-03	5.5E-03	c
2-Butanone	NP	2.2E-02	1.1E-02	
Acetone	NP	3.5E-01	3.5E+00	
Benzene	NP	1.1E-03	2.5E-03	d
Ethylbenzene	NP	1.1E-03	2.5E-03	d
m,p-Xylene	NP	3.2E-03	7.2E-03	d
Methylene chloride	NP	4.1E-02	2.4E-01	
o-Xylene	NP	7.8E-04	1.7E-03	d
p-Isopropyltoluene	NT	NC	NC	
Toluene	NP	1.5E-03	3.6E-03	d
Trichloroethene	NP	3.0E-03	5.5E-03	c
Xylenes (total)	NP	4.7E-03	9.9E-03	d
SVOCs				
1-Methylnaphthalene	NP	1.2E-02	1.3E-02	d
2,4-Dinitrophenol	NT	6.7E-01	1.0E+00	c
2-Methylnaphthalene	NP	1.7E-01	5.6E-01	d
Acenaphthene	NP	1.7E-01	7.0E-01	d
Acenaphthylene	NP	4.0E-02	1.4E-01	d
Anthracene	NP	1.2E-01	4.7E-01	d
Benzo(a)anthracene	NP	3.4E-02	1.8E-01	d
Benzo(a)pyrene	NP	3.4E-02	1.8E-01	d
Benzo(b)fluoranthene	NP	4.0E-02	2.0E-01	d
Benzo(e)pyrene	NP	7.1E-02	3.1E-01	d
Benzo(g,h,i)perylene	NP	8.3E-02	3.0E-01	d
Benzo(k)fluoranthene	NP	3.3E-02	1.8E-01	d
Chrysene	NP	5.4E-02	2.4E-01	d
Dibenz(a,h)anthracene	NP	2.5E-02	1.0E-01	d

Exposure Point Concentrations for CPECs in Soil (0-2 feet bgs)
Old Conservation Yard RFI Site

Chemical	Distribution Type	EPCs		
		CTE[a] (mg/kg)	RME[b] (mg/kg)	
Fluoranthene	NP	8.2E-02	4.3E-01	d
Fluorene	NP	1.7E-01	6.9E-01	d
Indeno(1,2,3-cd)pyrene	NP	3.0E-02	1.7E-01	d
Naphthalene	NP	6.3E-02	1.6E-01	d
Perylene	NP	4.0E-02	1.8E-01	d
Phenanthrene	NP	4.3E-01	1.9E+00	d
Pyrene	NP	8.2E-02	3.7E-01	d
Total Petroleum Hydrocarbons				
C08-C11(Gasoline Range)	NP	9.7E+00	2.2E+01	
C11-C14(Kerosene Range)	NP	1.1E+01	2.2E+01	
C14-C20(Diesel Range)	NP	6.5E+01	2.6E+02	
C20-C30(Lubricant Oil Range)	NP	2.9E+02	1.4E+03	
PCDD/PCDFs				
2,3,7,8-TCDD	LN	1.0E-06	1.8E-06	
1,2,3,7,8-PeCDD	NP	6.6E-06	5.2E-05	
1,2,3,4,7,8-HxCDD	LN	1.4E-05	5.3E-05	
1,2,3,6,7,8-HxCDD	LN	2.0E-05	1.0E-04	
1,2,3,7,8,9-HxCDD	LN	1.8E-05	8.6E-05	
1,2,3,4,6,7,8-HpCDD	LN	4.9E-04	2.9E-03	
OCDD	G	3.7E-03	8.2E-03	
2,3,7,8-TCDF	NP	2.2E-06	1.0E-05	
1,2,3,7,8-PeCDF	LN	1.8E-06	9.5E-06	
2,3,4,7,8-PeCDF	LN	5.1E-06	3.0E-05	
1,2,3,4,7,8-HxCDF	LN	1.3E-05	6.2E-05	
1,2,3,6,7,8-HxCDF	G	4.9E-06	1.0E-05	
2,3,4,6,7,8-HxCDF	LN	5.2E-06	2.9E-05	
1,2,3,7,8,9-HxCDF	LN	2.3E-06	1.0E-05	
1,2,3,4,6,7,8-HpCDF	G	5.5E-05	1.2E-04	
1,2,3,4,7,8,9-HpCDF	LN	7.2E-06	3.0E-05	
OCDF	G	1.8E-04	4.1E-04	
Total Hepta	LN	5.5E-04	3.2E-03	
Total Octa	G	3.9E-03	8.6E-03	
Aroclor-1248	NP	5.0E+02	5.5E+03	
Aroclor-1254	NP	1.2E+00	5.4E+00	
Aroclor-1260	NP	1.3E+01	1.4E+02	
PCB-105	NP	1.1E-03	1.2E-02	
PCB-114	NP	2.1E-05	2.1E-04	
PCB-118	NP	2.2E-03	2.4E-02	
PCB-123	NP	3.1E-05	3.3E-04	
PCB-126	NP	8.6E-05	9.2E-04	
PCB-156	NP	7.4E-04	7.9E-03	

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Exposure Point Concentrations for CPECs in Soil (0-2 feet bgs)
Old Conservation Yard RFI Site

Chemical	Distribution Type	EPCs	
		CTE[a] (mg/kg)	RME[b] (mg/kg)
PCB-157	NP	3.3E-04	3.5E-03
PCB-167	NP	5.7E-04	6.1E-03
PCB-169	NP	8.5E-06	9.2E-05
PCB-189	NP	8.5E-05	9.2E-04
PCB-77	NP	1.7E-04	1.8E-03
PCB-81	NP	3.1E-05	3.2E-04

Notes:

a. Either the arithmetic mean concentration for two or more samples or the reported concentration for a single sample.

b. Either the 95% upper confidence limit (95% UCL) on the arithmetic mean for three or more samples, or the maximum concentration for less than three samples, or the maximum concentration in cases where the 95% UCL exceeds the maximum concentration.

c. Exposure point concentrations estimated at one-half the sample quantitation limit for soil at 0 to 2 feet bgs.

d. Exposure point concentrations estimated following the methods for extrapolation of total petroleum hydrocarbons to petroleum constituents as described in Section 2.8 of the SRAM and as presented in Spreadsheet D-95.

CPEC - chemical of potential ecological concern
EPC - exposure point concentration
CTE - Central Tendency Exposure
RME - Reasonable Maximum Exposure
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCDD/PCDF - polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.
N - normal distribution
LN - lognormal distribution
I - inderterminate
NT - data not tested for distribution due to sample size
"-" not applicable
mg/kg - milligrams per kilogram
bgs- below ground surface

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Assessment and Measurement Endpoints
Old Conservation Yard RFI Site

Assessment Goal	Assessment Endpoint	Measurement Endpoint	Measure of Effect
Protect wildlife populations and plant communities from acute or chronic health effects resulting from exposure to site contaminants	Protect the abundance of native terrestrial vegetation by limiting acute and chronic adverse effects from exposure to site-related CPECs.		Characterize native plant abundance through site-specific observational surveys of plant communities
	Protect the abundance of terrestrial invertebrate community by limiting acute and chronic adverse effects from exposure to site-related CPECs.	CPEC concentrations in soil	Compare CPEC concentrations to TRVs for soil invertebrates
	Protect avian species from acute or chronic health effects (direct and/or secondary effects) related to CPEC exposure	Calculate daily CPEC dosage to red-tailed hawk and thrush using exposure model	Compare CPEC doses to TRVs for the red-tailed hawk or similar raptor species
	Protect bobcat from acute or chronic health effects related to CPEC exposure	Calculate daily CPEC dosage to bobcat using exposure model	Compare CPEC doses to TRVs for bobcat or similar species
	Protect deer from acute or chronic health effects related to secondary exposures to CPEC	Calculate daily CPEC dosage to mule deer using exposure model	Compare CPEC doses to TRVs for mule deer or similar species
	Protect prey abundance of raptor and bobcat prey items (rodents) from direct exposure to CPEC	Calculate daily CPEC dosage to the deer mouse using exposure model	Compare CPEC doses to TRVs for the deer mouse or similar species

Notes:
BAF = Bioaccumulation factor
CPEC = chemicals of potential ecological concern
NOAEL = no observable adverse effect level

Summary of Habitats
Old Conservation Yard RFI Site

Habitat	Species Potentially Present	Observed Species[a]	Relative Occurrrence	Status[b]	Representative Ecological Receptor
Nonnative grassland	invertebrates	invertebrates	common	none	earthworm
	rodents	rodents	common	none	deer mouse
	small birds		common	none	thrush
	raptors	raptors	uncommon	none	red-tailed hawk
	deer	mule deer	common	none	mule deer bobcat
			uncommon	none	
Scrub	invertebrates	invertebrates	common	none	earthworm
	rodents		common	none	deer mouse
	small birds		common	none	thrush
	raptors		uncommon	none	red-tailed hawk
	deer		common	none	mule deer bobcat
			uncommon	none	
Ruderal habitat	invertebrates	invertebrates	common	none	earth worm
	rodents	rodents	common	none	deer mouse

Notes:
a. Relative to other habitat types within the RFI site.
b. Listed state or federal threatened or endangered species, or proposed for listing.

PCDD/PCDF Congener Group Summation for Soil (0-4 feet bgs)
Old Conservation Yard RFI Site

EPA ID	PCDD/PCDF Congener	Measured Concentration [a] (mg/kg)	Data Qualifier	Adjusted Concentration [b] (mg/kg)	Sum of PCDD/PCDF Congener Concentrations				
					Total Tetra (mg/kg)	Total Penta (mg/kg)	Total Hexa (mg/kg)	Total Hepta (mg/kg)	Total Octa (mg/kg)
MJ031	1,2,3,4,6,7,8-HpCDD	5.6E-04		5.6E-04	2.2E-06	1.6E-05	1.3E-04	6.2E-04	2.7E-03
MJ031	1,2,3,4,6,7,8-HpCDF	5.0E-05		5.0E-05					
MJ031	1,2,3,4,7,8,9-HpCDF	1.0E-05		1.0E-05					
MJ031	1,2,3,4,7,8-HxCDD	3.0E-05		3.0E-05					
MJ031	1,2,3,4,7,8-HxCDF	2.0E-05		2.0E-05					
MJ031	1,2,3,6,7,8-HxCDD	3.0E-05		3.0E-05					
MJ031	1,2,3,6,7,8-HxCDF	1.0E-05	UJ	5.0E-06					
MJ031	1,2,3,7,8,9-HxCDD	3.0E-05		3.0E-05					
MJ031	1,2,3,7,8,9-HxCDF	3.4E-06	J	3.4E-06					
MJ031	1,2,3,7,8-PeCDD	1.0E-05		1.0E-05					
MJ031	1,2,3,7,8-PeCDF	1.4E-06	J	1.4E-06					
MJ031	2,3,4,6,7,8-HxCDF	1.0E-05		1.0E-05					
MJ031	2,3,4,7,8-PeCDF	4.9E-06		4.9E-06					
MJ031	2,3,7,8-TCDD	1.4E-06		1.4E-06					
MJ031	2,3,7,8-TCDF	7.6E-07	J	7.6E-07					
MJ031	OCDD	2.5E-03		2.5E-03					
MJ031	OCDF	1.6E-04		1.6E-04					
MJ031	Total HpCDD	1.4E-03		1.4E-03					
MJ031	Total HpCDF	1.7E-04		1.7E-04					
MJ031	Total HxCDD	5.6E-04		5.6E-04					
MJ031	Total HxCDF	1.1E-04		1.1E-04					
MJ031	Total PeCDD	1.1E-04		1.1E-04					
MJ031	Total PeCDF	3.0E-05		3.0E-05					
MJ031	Total TCDD	2.0E-05		2.0E-05					
MJ031	Total TCDF	1.0E-05		1.0E-05					
MJ032	1,2,3,4,6,7,8-HpCDD	4.1E-04		4.1E-04	5.4E-07	3.6E-06	4.7E-05	4.5E-04	2.9E-03
MJ032	1,2,3,4,6,7,8-HpCDF	4.0E-05		4.0E-05					
MJ032	1,2,3,4,7,8,9-HpCDF	4.9E-06		4.9E-06					
MJ032	1,2,3,4,7,8-HxCDD	1.0E-05		1.0E-05					
MJ032	1,2,3,4,7,8-HxCDF	1.0E-05		1.0E-05					
MJ032	1,2,3,6,7,8-HxCDD	1.0E-05		1.0E-05					
MJ032	1,2,3,6,7,8-HxCDF	3.0E-06	J	3.0E-06					
MJ032	1,2,3,7,8,9-HxCDD	1.0E-05		1.0E-05					
MJ032	1,2,3,7,8,9-HxCDF	1.3E-06	J	1.3E-06					
MJ032	1,2,3,7,8-PeCDD	1.7E-06	J	1.7E-06					
MJ032	1,2,3,7,8-PeCDF	9.7E-07	U	4.9E-07					
MJ032	2,3,4,6,7,8-HxCDF	2.3E-06	J	2.3E-06					
MJ032	2,3,4,7,8-PeCDF	1.4E-06	J	1.4E-06					
MJ032	2,3,7,8-TCDD	2.6E-07	J	2.6E-07					
MJ032	2,3,7,8-TCDF	2.8E-07	J	2.8E-07					
MJ032	OCDD	2.7E-03	J	2.7E-03					
MJ032	OCDF	1.9E-04		1.9E-04					
MJ032	Total HpCDD	9.5E-04		9.5E-04					
MJ032	Total HpCDF	1.4E-04		1.4E-04					
MJ032	Total HxCDD	2.1E-04		2.1E-04					
MJ032	Total HxCDF	6.0E-05		6.0E-05					
MJ032	Total PeCDD	2.0E-05		2.0E-05					
MJ032	Total PeCDF	1.0E-05		1.0E-05					
MJ032	Total TCDD	3.6E-06		3.6E-06					
MJ032	Total TCDF	1.9E-06		1.9E-06					
RJ777	1,2,3,4,6,7,8-HpCDD	9.0E-05		9.0E-05	7.9E-07	1.3E-06	1.2E-05	1.1E-04	1.2E-03
RJ777	1,2,3,4,6,7,8-HpCDF	2.0E-05		2.0E-05					
RJ777	1,2,3,4,7,8,9-HpCDF	1.1E-06	J	1.1E-06					
RJ777	1,2,3,4,7,8-HxCDD	1.6E-06	J	1.6E-06					
RJ777	1,2,3,4,7,8-HxCDF	1.3E-06	J	1.3E-06					
RJ777	1,2,3,6,7,8-HxCDD	4.0E-06	J	4.0E-06					
RJ777	1,2,3,6,7,8-HxCDF	2.3E-06	UJ	1.2E-06					
RJ777	1,2,3,7,8,9-HxCDD	2.0E-06	J	2.0E-06					
RJ777	1,2,3,7,8,9-HxCDF	4.5E-07	U	2.3E-07					
RJ777	1,2,3,7,8-PeCDD	8.1E-07	UJ	4.1E-07					
RJ777	1,2,3,7,8-PeCDF	3.2E-07	U	1.6E-07					

PCDD/PCDF Congener Group Summation for Soil (0-4 feet bgs)
Old Conservation Yard RFI Site

EPA ID	PCDD/PCDF Congener	Measured Concentration [a] (mg/kg)	Data Qualifier	Adjusted Concentration [b] (mg/kg)	Sum of PCDD/PCDF Congener Concentrations				
					Total Tetra (mg/kg)	Total Penta (mg/kg)	Total Hexa (mg/kg)	Total Hepta (mg/kg)	Total Octa (mg/kg)
RJ777	2,3,4,6,7,8-HxCDF	1.3E-06	J	1.3E-06					
RJ777	2,3,4,7,8-PeCDF	7.5E-07	J	7.5E-07					
RJ777	2,3,7,8-TCDD	4.7E-07	U	2.4E-07					
RJ777	2,3,7,8-TCDF	5.5E-07	J	5.5E-07					
RJ777	OCDD	1.2E-03		1.2E-03					
RJ777	OCDF	3.0E-05		3.0E-05					
RJ777	Total HpCDD	2.1E-04		2.1E-04					
RJ777	Total HpCDF	4.0E-05		4.0E-05					
RJ777	Total HxCDD	3.0E-05		3.0E-05					
RJ777	Total HxCDF	2.0E-05		2.0E-05					
RJ777	Total PeCDD	4.0E-07	U	2.0E-07					
RJ777	Total PeCDF	1.0E-05		1.0E-05					
RJ777	Total TCDD	4.7E-07	U	2.4E-07					
RJ777	Total TCDF	2.5E-06	J	2.5E-06					
RJ778	1,2,3,4,6,7,8-HpCDD	1.0E-05		1.0E-05	7.4E-07	6.5E-07	2.1E-06	1.3E-05	1.0E-04
RJ778	1,2,3,4,6,7,8-HpCDF	2.5E-06	J	2.5E-06					
RJ778	1,2,3,4,7,8,9-HpCDF	8.3E-07	U	4.2E-07					
RJ778	1,2,3,4,7,8-HxCDD	8.3E-07	U	4.2E-07					
RJ778	1,2,3,4,7,8-HxCDF	4.5E-07	U	2.3E-07					
RJ778	1,2,3,6,7,8-HxCDD	6.1E-07	U	3.1E-07					
RJ778	1,2,3,6,7,8-HxCDF	5.2E-07	UJ	2.6E-07					
RJ778	1,2,3,7,8,9-HxCDD	6.0E-07	U	3.0E-07					
RJ778	1,2,3,7,8,9-HxCDF	5.6E-07	U	2.8E-07					
RJ778	1,2,3,7,8-PeCDD	4.6E-07	U	2.3E-07					
RJ778	1,2,3,7,8-PeCDF	4.0E-07	U	2.0E-07					
RJ778	2,3,4,6,7,8-HxCDF	5.3E-07	U	2.7E-07					
RJ778	2,3,4,7,8-PeCDF	4.3E-07	U	2.2E-07					
RJ778	2,3,7,8-TCDD	6.7E-07	U	3.4E-07					
RJ778	2,3,7,8-TCDF	8.0E-07	U	4.0E-07					
RJ778	OCDD	1.0E-04		1.0E-04					
RJ778	OCDF	3.2E-06	J	3.2E-06					
RJ778	Total HpCDD	3.0E-05		3.0E-05					
RJ778	Total HpCDF	2.5E-06	J	2.5E-06					
RJ778	Total HxCDD	3.2E-06	J	3.2E-06					
RJ778	Total HxCDF	1.8E-06	J	1.8E-06					
RJ778	Total PeCDD	4.6E-07	U	2.3E-07					
RJ778	Total PeCDF	4.2E-07	U	2.1E-07					
RJ778	Total TCDD	6.7E-07	U	3.4E-07					
RJ778	Total TCDF	8.0E-07	U	4.0E-07					
RJ779	1,2,3,4,6,7,8-HpCDD	1.0E-05		1.0E-05	4.3E-07	4.5E-07	2.3E-06	1.3E-05	1.5E-04
RJ779	1,2,3,4,6,7,8-HpCDF	2.7E-06	J	2.7E-06					
RJ779	1,2,3,4,7,8,9-HpCDF	8.7E-07	U	4.4E-07					
RJ779	1,2,3,4,7,8-HxCDD	5.0E-07	U	2.5E-07					
RJ779	1,2,3,4,7,8-HxCDF	4.5E-07	J	4.5E-07					
RJ779	1,2,3,6,7,8-HxCDD	7.1E-07	J	7.1E-07					
RJ779	1,2,3,6,7,8-HxCDF	7.0E-07	UJ	3.5E-07					
RJ779	1,2,3,7,8,9-HxCDD	4.0E-07	UJ	2.0E-07					
RJ779	1,2,3,7,8,9-HxCDF	2.5E-07	U	1.3E-07					
RJ779	1,2,3,7,8-PeCDD	3.5E-07	U	1.8E-07					
RJ779	1,2,3,7,8-PeCDF	2.6E-07	UJ	1.3E-07					
RJ779	2,3,4,6,7,8-HxCDF	2.6E-07	J	2.6E-07					
RJ779	2,3,4,7,8-PeCDF	2.9E-07	UJ	1.5E-07					
RJ779	2,3,7,8-TCDD	3.6E-07	U	1.8E-07					
RJ779	2,3,7,8-TCDF	4.9E-07	U	2.5E-07					
RJ779	OCDD	1.4E-04		1.4E-04					
RJ779	OCDF	1.0E-05	UJ	5.0E-06					
RJ779	Total HpCDD	3.0E-05		3.0E-05					
RJ779	Total HpCDF	1.0E-05		1.0E-05					
RJ779	Total HxCDD	4.5E-06	J	4.5E-06					
RJ779	Total HxCDF	3.0E-06	J	3.0E-06					
RJ779	Total PeCDD	3.5E-07	U	1.8E-07					

PCDD/PCDF Congener Group Summation for Soil (0-4 feet bgs)
Old Conservation Yard RFI Site

EPA ID	PCDD/PCDF Congener	Measured Concentration [a] (mg/kg)	Data Qualifier	Adjusted Concentration [b] (mg/kg)	Sum of PCDD/PCDF Congener Concentrations				
					Total Tetra (mg/kg)	Total Penta (mg/kg)	Total Hexa (mg/kg)	Total Hepta (mg/kg)	Total Octa (mg/kg)
RJ779	Total PeCDF	8.0E-07	J	8.0E-07					
RJ779	Total TCDD	3.6E-07	U	1.8E-07					
RJ779	Total TCDF	4.9E-07	U	2.5E-07					
RJ782	1,2,3,4,6,7,8-HpCDD	7.0E-05		7.0E-05	7.1E-07	9.8E-07	8.7E-06	9.1E-05	6.7E-04
RJ782	1,2,3,4,6,7,8-HpCDF	2.0E-05		2.0E-05					
RJ782	1,2,3,4,7,8,9-HpCDF	1.4E-06	U	7.0E-07					
RJ782	1,2,3,4,7,8-HxCDD	1.2E-06	J	1.2E-06					
RJ782	1,2,3,4,7,8-HxCDF	9.3E-07	J	9.3E-07					
RJ782	1,2,3,6,7,8-HxCDD	2.6E-06	J	2.6E-06					
RJ782	1,2,3,6,7,8-HxCDF	2.8E-06	UJ	1.4E-06					
RJ782	1,2,3,7,8,9-HxCDD	1.7E-06	J	1.7E-06					
RJ782	1,2,3,7,8,9-HxCDF	3.4E-07	U	1.7E-07					
RJ782	1,2,3,7,8-PeCDD	4.9E-07	U	2.5E-07					
RJ782	1,2,3,7,8-PeCDF	2.8E-07	U	1.4E-07					
RJ782	2,3,4,6,7,8-HxCDF	7.1E-07	J	7.1E-07					
RJ782	2,3,4,7,8-PeCDF	5.9E-07	J	5.9E-07					
RJ782	2,3,7,8-TCDD	5.6E-07	U	2.8E-07					
RJ782	2,3,7,8-TCDF	4.3E-07	J	4.3E-07					
RJ782	OCDD	6.3E-04	J	6.3E-04					
RJ782	OCDF	4.0E-05	J	4.0E-05					
RJ782	Total HpCDD	1.3E-04		1.3E-04					
RJ782	Total HpCDF	2.0E-05		2.0E-05					
RJ782	Total HxCDD	2.0E-05		2.0E-05					
RJ782	Total HxCDF	1.0E-05		1.0E-05					
RJ782	Total PeCDD	4.9E-07	U	2.5E-07					
RJ782	Total PeCDF	3.6E-06	J	3.6E-06					
RJ782	Total TCDD	5.6E-07	U	2.8E-07					
RJ782	Total TCDF	2.0E-06	J	2.0E-06					
RJ783	1,2,3,4,6,7,8-HpCDD	3.3E-03		3.3E-03	1.3E-05	1.0E-04	6.8E-04	3.6E-03	1.6E-02
RJ783	1,2,3,4,6,7,8-HpCDF	2.3E-04		2.3E-04					
RJ783	1,2,3,4,7,8,9-HpCDF	6.0E-05		6.0E-05					
RJ783	1,2,3,4,7,8-HxCDD	1.5E-04		1.5E-04					
RJ783	1,2,3,4,7,8-HxCDF	1.2E-04		1.2E-04					
RJ783	1,2,3,6,7,8-HxCDD	1.6E-04		1.6E-04					
RJ783	1,2,3,6,7,8-HxCDF	5.0E-05	UJ	2.5E-05					
RJ783	1,2,3,7,8,9-HxCDD	1.7E-04		1.7E-04					
RJ783	1,2,3,7,8,9-HxCDF	2.0E-05		2.0E-05					
RJ783	1,2,3,7,8-PeCDD	6.0E-05		6.0E-05					
RJ783	1,2,3,7,8-PeCDF	1.0E-05		1.0E-05					
RJ783	2,3,4,6,7,8-HxCDF	3.0E-05		3.0E-05					
RJ783	2,3,4,7,8-PeCDF	3.0E-05		3.0E-05					
RJ783	2,3,7,8-TCDD	1.0E-05		1.0E-05					
RJ783	2,3,7,8-TCDF	2.9E-06	J	2.9E-06					
RJ783	OCDD	1.5E-02	J	1.5E-02					
RJ783	OCDF	7.0E-04		7.0E-04					
RJ783	Total HpCDD	9.3E-03		9.3E-03					
RJ783	Total HpCDF	8.8E-04		8.8E-04					
RJ783	Total HxCDD	2.9E-03		2.9E-03					
RJ783	Total HxCDF	5.4E-04		5.4E-04					
RJ783	Total PeCDD	5.5E-04		5.5E-04					
RJ783	Total PeCDF	1.8E-04		1.8E-04					
RJ783	Total TCDD	1.4E-04		1.4E-04					
RJ783	Total TCDF	9.0E-05	J	9.0E-05					
MJ665	1,2,3,4,6,7,8-HpCDD	9.0E-05		9.0E-05	9.9E-07	2.5E-06	1.1E-05	1.0E-04	1.7E-03
MJ665	1,2,3,4,6,7,8-HpCDF	1.0E-05		1.0E-05					
MJ665	1,2,3,4,7,8,9-HpCDF	1.3E-06	J	1.3E-06					
MJ665	1,2,3,4,7,8-HxCDD	1.1E-06	J	1.1E-06					
MJ665	1,2,3,4,7,8-HxCDF	1.9E-06	J	1.9E-06					
MJ665	1,2,3,6,7,8-HxCDD	3.5E-06		3.5E-06					
MJ665	1,2,3,6,7,8-HxCDF	9.9E-07	J	9.9E-07					
MJ665	1,2,3,7,8,9-HxCDD	2.3E-06	J	2.3E-06					

PCDD/PCDF Congener Group Summation for Soil (0-4 feet bgs)
Old Conservation Yard RFI Site

EPA ID	PCDD/PCDF Congener	Measured Concentration [a] (mg/kg)	Data Qualifier	Adjusted Concentration [b] (mg/kg)	Sum of PCDD/PCDF Congener Concentrations				
					Total Tetra (mg/kg)	Total Penta (mg/kg)	Total Hexa (mg/kg)	Total Hepta (mg/kg)	Total Octa (mg/kg)
MJ665	1,2,3,7,8,9-HxCDF	4.2E-07	J	4.2E-07					
MJ665	1,2,3,7,8-PeCDD	6.6E-07	J	6.6E-07					
MJ665	1,2,3,7,8-PeCDF	6.9E-07	J	6.9E-07					
MJ665	2,3,4,6,7,8-HxCDF	1.1E-06	J	1.1E-06					
MJ665	2,3,4,7,8-PeCDF	1.2E-06	J	1.2E-06					
MJ665	2,3,7,8-TCDD	1.2E-07	U	6.0E-08					
MJ665	2,3,7,8-TCDF	9.3E-07		9.3E-07					
MJ665	OCDD	1.7E-03		1.7E-03					
MJ665	OCDF	5.0E-05		5.0E-05					
MJ665	Total HpCDD	3.1E-04		3.1E-04					
MJ665	Total HpCDF	4.0E-05		4.0E-05					
MJ665	Total HxCDD	3.0E-05		3.0E-05					
MJ665	Total HxCDF	2.0E-05		2.0E-05					
MJ665	Total PeCDD	1.0E-05		1.0E-05					
MJ665	Total PeCDF	1.0E-05		1.0E-05					
MJ665	Total TCDD	1.5E-06		1.5E-06					
MJ665	Total TCDF	1.0E-05		1.0E-05					
MJ677	1,2,3,4,6,7,8-HpCDD	9.0E-05		9.0E-05	5.3E-07	1.3E-06	7.8E-06	1.1E-04	1.0E-03
MJ677	1,2,3,4,6,7,8-HpCDF	2.0E-05		2.0E-05					
MJ677	1,2,3,4,7,8,9-HpCDF	1.3E-06	J	1.3E-06					
MJ677	1,2,3,4,7,8-HxCDD	1.1E-06	J	1.1E-06					
MJ677	1,2,3,4,7,8-HxCDF	9.7E-07	J	9.7E-07					
MJ677	1,2,3,6,7,8-HxCDD	2.5E-06	J	2.5E-06					
MJ677	1,2,3,6,7,8-HxCDF	6.5E-07	J	6.5E-07					
MJ677	1,2,3,7,8,9-HxCDD	1.7E-06	J	1.7E-06					
MJ677	1,2,3,7,8,9-HxCDF	2.9E-07	U	1.4E-07					
MJ677	1,2,3,7,8-PeCDD	4.3E-07	J	4.3E-07					
MJ677	1,2,3,7,8-PeCDF	2.6E-07	J	2.6E-07					
MJ677	2,3,4,6,7,8-HxCDF	8.2E-07	J	8.2E-07					
MJ677	2,3,4,7,8-PeCDF	5.8E-07	J	5.8E-07					
MJ677	2,3,7,8-TCDD	9.1E-08	U	4.5E-08					
MJ677	2,3,7,8-TCDF	4.8E-07	J	4.8E-07					
MJ677	OCDD	9.3E-04		9.3E-04					
MJ677	OCDF	7.0E-05		7.0E-05					
MJ677	Total HpCDD	3.2E-04		3.2E-04					
MJ677	Total HpCDF	6.0E-05		6.0E-05					
MJ677	Total HxCDD	3.0E-05		3.0E-05					
MJ677	Total HxCDF	2.0E-05		2.0E-05					
MJ677	Total PeCDD	2.7E-06		2.7E-06					
MJ677	Total PeCDF	1.0E-05		1.0E-05					
MJ677	Total TCDD	1.9E-07		1.9E-07					
MJ677	Total TCDF	4.0E-06		4.0E-06					
MJ678	1,2,3,4,6,7,8-HpCDD	6.0E-05		6.0E-05	9.4E-07	2.4E-06	8.7E-06	7.1E-05	6.4E-04
MJ678	1,2,3,4,6,7,8-HpCDF	1.0E-05		1.0E-05					
MJ678	1,2,3,4,7,8,9-HpCDF	8.4E-07	J	8.4E-07					
MJ678	1,2,3,4,7,8-HxCDD	8.5E-07	J	8.5E-07					
MJ678	1,2,3,4,7,8-HxCDF	1.5E-06	J	1.5E-06					
MJ678	1,2,3,6,7,8-HxCDD	2.3E-06	J	2.3E-06					
MJ678	1,2,3,6,7,8-HxCDF	9.6E-07	J	9.6E-07					
MJ678	1,2,3,7,8,9-HxCDD	1.8E-06	J	1.8E-06					
MJ678	1,2,3,7,8,9-HxCDF	2.7E-07	J	2.7E-07					
MJ678	1,2,3,7,8-PeCDD	5.2E-07	J	5.2E-07					
MJ678	1,2,3,7,8-PeCDF	6.6E-07	J	6.6E-07					
MJ678	2,3,4,6,7,8-HxCDF	1.0E-06	J	1.0E-06					
MJ678	2,3,4,7,8-PeCDF	1.2E-06	J	1.2E-06					
MJ678	2,3,7,8-TCDD	1.5E-07	U	7.5E-08					
MJ678	2,3,7,8-TCDF	8.6E-07	J	8.6E-07					
MJ678	OCDD	6.1E-04		6.1E-04					
MJ678	OCDF	3.0E-05		3.0E-05					
MJ678	Total HpCDD	1.4E-04		1.4E-04					
MJ678	Total HpCDF	3.0E-05		3.0E-05					

PCDD/PCDF Congener Group Summation for Soil (0-4 feet bgs)
Old Conservation Yard RFI Site

EPA ID	PCDD/PCDF Congener	Measured Concentration [a] (mg/kg)	Data Qualifier	Adjusted Concentration [b] (mg/kg)	Sum of PCDD/PCDF Congener Concentrations				
					Total Tetra (mg/kg)	Total Penta (mg/kg)	Total Hexa (mg/kg)	Total Hepta (mg/kg)	Total Octa (mg/kg)
MJ678	Total HxCDD	2.0E-05		2.0E-05					
MJ678	Total HxCDF	2.0E-05		2.0E-05					
MJ678	Total PeCDD	1.0E-05		1.0E-05					
MJ678	Total PeCDF	1.0E-05		1.0E-05					
MJ678	Total TCDD	1.3E-06		1.3E-06					
MJ678	Total TCDF	1.0E-05		1.0E-05					
MJ679	1,2,3,4,6,7,8-HpCDD	9.0E-05		9.0E-05	1.3E-06	1.3E-05	4.0E-05	1.2E-04	8.3E-04
MJ679	1,2,3,4,6,7,8-HpCDF	3.0E-05		3.0E-05					
MJ679	1,2,3,4,7,8,9-HpCDF	2.4E-06	J	2.4E-06					
MJ679	1,2,3,4,7,8-HxCDD	1.6E-06	J	1.6E-06					
MJ679	1,2,3,4,7,8-HxCDF	1.0E-05		1.0E-05					
MJ679	1,2,3,6,7,8-HxCDD	4.0E-06		4.0E-06					
MJ679	1,2,3,6,7,8-HxCDF	1.0E-05		1.0E-05					
MJ679	1,2,3,7,8,9-HxCDD	2.8E-06		2.8E-06					
MJ679	1,2,3,7,8,9-HxCDF	1.6E-06	J	1.6E-06					
MJ679	1,2,3,7,8-PeCDD	9.5E-07	J	9.5E-07					
MJ679	1,2,3,7,8-PeCDF	2.1E-06	J	2.1E-06					
MJ679	2,3,4,6,7,8-HxCDF	1.0E-05		1.0E-05					
MJ679	2,3,4,7,8-PeCDF	1.0E-05		1.0E-05					
MJ679	2,3,7,8-TCDD	1.6E-07	UJ	7.9E-08					
MJ679	2,3,7,8-TCDF	1.3E-06		1.3E-06					
MJ679	OCDD	7.7E-04		7.7E-04					
MJ679	OCDF	6.0E-05		6.0E-05					
MJ679	Total HpCDD	2.3E-04		2.3E-04					
MJ679	Total HpCDF	8.0E-05		8.0E-05					
MJ679	Total HxCDD	4.0E-05		4.0E-05					
MJ679	Total HxCDF	7.0E-05		7.0E-05					
MJ679	Total PeCDD	2.0E-05		2.0E-05					
MJ679	Total PeCDF	6.0E-05		6.0E-05					
MJ679	Total TCDD	1.0E-05		1.0E-05					
MJ679	Total TCDF	4.0E-05		4.0E-05					
MJ680	1,2,3,4,6,7,8-HpCDD	3.0E-05		3.0E-05	3.1E-07	6.4E-07	2.7E-06	3.5E-05	3.7E-04
MJ680	1,2,3,4,6,7,8-HpCDF	4.7E-06		4.7E-06					
MJ680	1,2,3,4,7,8,9-HpCDF	3.1E-07	J	3.1E-07					
MJ680	1,2,3,4,7,8-HxCDD	3.1E-07	J	3.1E-07					
MJ680	1,2,3,4,7,8-HxCDF	3.1E-07	J	3.1E-07					
MJ680	1,2,3,6,7,8-HxCDD	9.4E-07	J	9.4E-07					
MJ680	1,2,3,6,7,8-HxCDF	2.2E-07	J	2.2E-07					
MJ680	1,2,3,7,8,9-HxCDD	5.2E-07	J	5.2E-07					
MJ680	1,2,3,7,8,9-HxCDF	1.2E-07	U	6.0E-08					
MJ680	1,2,3,7,8-PeCDD	1.5E-07	J	1.5E-07					
MJ680	1,2,3,7,8-PeCDF	1.2E-07	J	1.2E-07					
MJ680	2,3,4,6,7,8-HxCDF	3.1E-07	J	3.1E-07					
MJ680	2,3,4,7,8-PeCDF	3.7E-07	J	3.7E-07					
MJ680	2,3,7,8-TCDD	1.2E-07	U	6.0E-08					
MJ680	2,3,7,8-TCDF	2.5E-07	J	2.5E-07					
MJ680	OCDD	3.5E-04		3.5E-04					
MJ680	OCDF	2.0E-05		2.0E-05					
MJ680	Total HpCDD	8.0E-05		8.0E-05					
MJ680	Total HpCDF	2.0E-05		2.0E-05					
MJ680	Total HxCDD	1.0E-05		1.0E-05					
MJ680	Total HxCDF	1.0E-05		1.0E-05					
MJ680	Total PeCDD	1.4E-06		1.4E-06					
MJ680	Total PeCDF	3.2E-06		3.2E-06					
MJ680	Total TCDD	2.1E-07		2.1E-07					
MJ680	Total TCDF	9.2E-07		9.2E-07					
MJ735	1,2,3,4,6,7,8-HpCDD	1.1E-03		1.1E-03	1.1E-05	2.4E-05	9.2E-05	1.3E-03	1.4E-02
MJ735	1,2,3,4,6,7,8-HpCDF	1.8E-04		1.8E-04					
MJ735	1,2,3,4,7,8,9-HpCDF	1.0E-05		1.0E-05					
MJ735	1,2,3,4,7,8-HxCDD	1.0E-05		1.0E-05					
MJ735	1,2,3,4,7,8-HxCDF	1.0E-05		1.0E-05					

PCDD/PCDF Congener Group Summation for Soil (0-4 feet bgs)
Old Conservation Yard RFI Site

EPA ID	PCDD/PCDF Congener	Measured Concentration [a] (mg/kg)	Data Qualifier	Adjusted Concentration [b] (mg/kg)	Sum of PCDD/PCDF Congener Concentrations				
					Total Tetra (mg/kg)	Total Penta (mg/kg)	Total Hexa (mg/kg)	Total Hepta (mg/kg)	Total Octa (mg/kg)
MJ735	1,2,3,6,7,8-HxCDD	3.0E-05		3.0E-05					
MJ735	1,2,3,6,7,8-HxCDF	1.0E-05	J	1.0E-05					
MJ735	1,2,3,7,8,9-HxCDD	2.0E-05		2.0E-05					
MJ735	1,2,3,7,8,9-HxCDF	2.3E-06	J	2.3E-06					
MJ735	1,2,3,7,8-PeCDD	1.0E-05		1.0E-05					
MJ735	1,2,3,7,8-PeCDF	3.7E-06		3.7E-06					
MJ735	2,3,4,6,7,8-HxCDF	1.0E-05		1.0E-05					
MJ735	2,3,4,7,8-PeCDF	1.0E-05		1.0E-05					
MJ735	2,3,7,8-TCDD	5.5E-07		5.5E-07					
MJ735	2,3,7,8-TCDF	1.0E-05		1.0E-05					
MJ735	OCDD	1.3E-02		1.3E-02					
MJ735	OCDF	8.0E-04		8.0E-04					
MJ735	Total HpCDD	2.4E-03		2.4E-03					
MJ735	Total HpCDF	6.4E-04		6.4E-04					
MJ735	Total HxCDD	2.7E-04		2.7E-04					
MJ735	Total HxCDF	2.1E-04		2.1E-04					
MJ735	Total PeCDD	3.0E-05		3.0E-05					
MJ735	Total PeCDF	1.0E-04		1.0E-04					
MJ735	Total TCDD	1.0E-05		1.0E-05					
MJ735	Total TCDF	1.2E-04		1.2E-04					
MJ736	1,2,3,4,6,7,8-HpCDD	1.0E-03		1.0E-03	1.1E-05	2.5E-05	1.0E-04	1.2E-03	1.1E-02
MJ736	1,2,3,4,6,7,8-HpCDF	1.5E-04		1.5E-04					
MJ736	1,2,3,4,7,8,9-HpCDF	1.0E-05		1.0E-05					
MJ736	1,2,3,4,7,8-HxCDD	1.0E-05		1.0E-05					
MJ736	1,2,3,4,7,8-HxCDF	1.0E-05		1.0E-05					
MJ736	1,2,3,6,7,8-HxCDD	4.0E-05		4.0E-05					
MJ736	1,2,3,6,7,8-HxCDF	1.0E-05		1.0E-05					
MJ736	1,2,3,7,8,9-HxCDD	2.0E-05		2.0E-05					
MJ736	1,2,3,7,8,9-HxCDF	3.0E-06		3.0E-06					
MJ736	1,2,3,7,8-PeCDD	1.0E-05		1.0E-05					
MJ736	1,2,3,7,8-PeCDF	5.0E-06		5.0E-06					
MJ736	2,3,4,6,7,8-HxCDF	1.0E-05		1.0E-05					
MJ736	2,3,4,7,8-PeCDF	1.0E-05		1.0E-05					
MJ736	2,3,7,8-TCDD	1.0E-06		1.0E-06					
MJ736	2,3,7,8-TCDF	1.0E-05		1.0E-05					
MJ736	OCDD	1.1E-02		1.1E-02					
MJ736	OCDF	3.6E-04		3.6E-04					
MJ736	Total HpCDD	2.2E-03		2.2E-03					
MJ736	Total HpCDF	6.1E-04		6.1E-04					
MJ736	Total HxCDD	3.1E-04		3.1E-04					
MJ736	Total HxCDF	2.8E-04		2.8E-04					
MJ736	Total PeCDD	6.0E-05		6.0E-05					
MJ736	Total PeCDF	1.0E-04		1.0E-04					
MJ736	Total TCDD	2.0E-05		2.0E-05					
MJ736	Total TCDF	1.0E-04		1.0E-04					
				MAX	1.3E-05	1.0E-04	6.8E-04	3.6E-03	1.6E-02

Maximum of Total Summed Congener Concentrations

Total Tetra	1.3E-05
Total Penta	1.0E-04
Total Hexa	6.8E-04
Total Hepta	3.6E-03
Total Octa	1.6E-02

Notes:

a. Measured concentration - concentration reported by the analytial laboratory

b. Adjusted concentration - concentration reported by the analytical laboratory if the chemical was detected, or estimated at one-half the sample quantitation limit (SQL) if not detected.

PCDD/PCDF - polychlorinated dibenzo-p-dioxins and dibenzofurans

Total Tetra - sum of the 2,3,7,8-substituted tetraclorinated dibenzo-p-dioxin and dibenzofuran congeners.

Total Penta - sum of the 2,3,7,8-substituted pentaclorinated dibenzo-p-dioxin and dibenzofuran congeners.

Total Hexa - sum of the 2,3,7,8-substituted hexaclorinated dibenzo-p-dioxin and dibenzofuran congeners.

Total Hepta - sum of the 2,3,7,8-substituted heptaclorinated dibenzo-p-dioxin and dibenzofuran congeners.

PCDD/PCDF Congener Group Summation for Soil (0-4 feet bgs)
Old Conservation Yard RFI Site

EPA ID	PCDD/PCDF Congener	Measured Concentration [a] (mg/kg)	Data Qualifier	Adjusted Concentration [b] (mg/kg)	Sum of PCDD/PCDF Congener Concentrations				
					Total Tetra (mg/kg)	Total Penta (mg/kg)	Total Hexa (mg/kg)	Total Hepta (mg/kg)	Total Octa (mg/kg)

Total Octa - sum of the 2,3,7,8-substituted Octaclorinated dibenzo-p-dioxin and dibenzofuran congeners.
J - concentration estimated
U - not detected. Concentration shown is the SQL.
UJ - not detected. Concentration shown is the estimated SQL.
mg/kg - milligrams per kilogram
bgs- below ground surface

PCDD/PCDF Congener Group Summation for Soil (0-2 feet bgs)
Old Conservation Yard RFI Site

EPA ID	PCDD/PCDF Congener	Measured Concentration [a] (mg/kg)	Data Qualifier	Adjusted Concentration [b] (mg/kg)	Sum of PCDD/PCDF Congener Concentrations				
					Total Tetra (mg/kg)	Total Penta (mg/kg)	Total Hexa (mg/kg)	Total Hepta (mg/kg)	Total Octa (mg/kg)
MJ032	1,2,3,4,6,7,8-HpCDD	4.1E-04		4.1E-04	5.4E-07	3.6E-06	4.7E-05	4.5E-04	2.9E-03
MJ032	1,2,3,4,6,7,8-HpCDF	4.0E-05		4.0E-05					
MJ032	1,2,3,4,7,8,9-HpCDF	4.9E-06		4.9E-06					
MJ032	1,2,3,4,7,8-HxCDD	1.0E-05		1.0E-05					
MJ032	1,2,3,4,7,8-HxCDF	1.0E-05		1.0E-05					
MJ032	1,2,3,6,7,8-HxCDD	1.0E-05		1.0E-05					
MJ032	1,2,3,6,7,8-HxCDF	3.0E-06	J	3.0E-06					
MJ032	1,2,3,7,8,9-HxCDD	1.0E-05		1.0E-05					
MJ032	1,2,3,7,8,9-HxCDF	1.3E-06	J	1.3E-06					
MJ032	1,2,3,7,8-PeCDD	1.7E-06	J	1.7E-06					
MJ032	1,2,3,7,8-PeCDF	9.7E-07	U	4.9E-07					
MJ032	2,3,4,6,7,8-HxCDF	2.3E-06	J	2.3E-06					
MJ032	2,3,4,7,8-PeCDF	1.4E-06	J	1.4E-06					
MJ032	2,3,7,8-TCDD	2.6E-07	J	2.6E-07					
MJ032	2,3,7,8-TCDF	2.8E-07	J	2.8E-07					
MJ032	OCDD	2.7E-03	J	2.7E-03					
MJ032	OCDF	1.9E-04		1.9E-04					
MJ032	Total HpCDD	9.5E-04		9.5E-04					
MJ032	Total HpCDF	1.4E-04		1.4E-04					
MJ032	Total HxCDD	2.1E-04		2.1E-04					
MJ032	Total HxCDF	6.0E-05		6.0E-05					
MJ032	Total PeCDD	2.0E-05		2.0E-05					
MJ032	Total PeCDF	1.0E-05		1.0E-05					
MJ032	Total TCDD	3.6E-06		3.6E-06					
MJ032	Total TCDF	1.9E-06		1.9E-06					
RJ777	1,2,3,4,6,7,8-HpCDD	9.0E-05		9.0E-05	7.9E-07	1.3E-06	1.2E-05	1.1E-04	1.2E-03
RJ777	1,2,3,4,6,7,8-HpCDF	2.0E-05		2.0E-05					
RJ777	1,2,3,4,7,8,9-HpCDF	1.1E-06	J	1.1E-06					
RJ777	1,2,3,4,7,8-HxCDD	1.6E-06	J	1.6E-06					
RJ777	1,2,3,4,7,8-HxCDF	1.3E-06	J	1.3E-06					
RJ777	1,2,3,6,7,8-HxCDD	4.0E-06	J	4.0E-06					
RJ777	1,2,3,6,7,8-HxCDF	2.3E-06	UJ	1.2E-06					
RJ777	1,2,3,7,8,9-HxCDD	2.0E-06	J	2.0E-06					
RJ777	1,2,3,7,8,9-HxCDF	4.5E-07	U	2.3E-07					
RJ777	1,2,3,7,8-PeCDD	8.1E-07	UJ	4.1E-07					
RJ777	1,2,3,7,8-PeCDF	3.2E-07	U	1.6E-07					
RJ777	2,3,4,6,7,8-HxCDF	1.3E-06	J	1.3E-06					
RJ777	2,3,4,7,8-PeCDF	7.5E-07	J	7.5E-07					
RJ777	2,3,7,8-TCDD	4.7E-07	U	2.4E-07					
RJ777	2,3,7,8-TCDF	5.5E-07	J	5.5E-07					
RJ777	OCDD	1.2E-03		1.2E-03					
RJ777	OCDF	3.0E-05		3.0E-05					
RJ777	Total HpCDD	2.1E-04		2.1E-04					
RJ777	Total HpCDF	4.0E-05		4.0E-05					
RJ777	Total HxCDD	3.0E-05		3.0E-05					
RJ777	Total HxCDF	2.0E-05		2.0E-05					
RJ777	Total PeCDD	4.0E-07	U	2.0E-07					
RJ777	Total PeCDF	1.0E-05		1.0E-05					
RJ777	Total TCDD	4.7E-07	U	2.4E-07					
RJ777	Total TCDF	2.5E-06	J	2.5E-06					
RJ778	1,2,3,4,6,7,8-HpCDD	1.0E-05		1.0E-05	7.4E-07	6.5E-07	2.1E-06	1.3E-05	1.0E-04
RJ778	1,2,3,4,6,7,8-HpCDF	2.5E-06	J	2.5E-06					
RJ778	1,2,3,4,7,8,9-HpCDF	8.3E-07	U	4.2E-07					
RJ778	1,2,3,4,7,8-HxCDD	8.3E-07	U	4.2E-07					
RJ778	1,2,3,4,7,8-HxCDF	4.5E-07	U	2.3E-07					
RJ778	1,2,3,6,7,8-HxCDD	6.1E-07	U	3.1E-07					
RJ778	1,2,3,6,7,8-HxCDF	5.2E-07	UJ	2.6E-07					
RJ778	1,2,3,7,8,9-HxCDD	6.0E-07	U	3.0E-07					
RJ778	1,2,3,7,8,9-HxCDF	5.6E-07	U	2.8E-07					
RJ778	1,2,3,7,8-PeCDD	4.6E-07	U	2.3E-07					
RJ778	1,2,3,7,8-PeCDF	4.0E-07	U	2.0E-07					

PCDD/PCDF Congener Group Summation for Soil (0-2 feet bgs)
Old Conservation Yard RFI Site

EPA ID	PCDD/PCDF Congener	Measured Concentration [a] (mg/kg)	Data Qualifier	Adjusted Concentration [b] (mg/kg)	Sum of PCDD/PCDF Congener Concentrations				
					Total Tetra (mg/kg)	Total Penta (mg/kg)	Total Hexa (mg/kg)	Total Hepta (mg/kg)	Total Octa (mg/kg)
RJ778	2,3,4,6,7,8-HxCDF	5.3E-07	U	2.7E-07					
RJ778	2,3,4,7,8-PeCDF	4.3E-07	U	2.2E-07					
RJ778	2,3,7,8-TCDD	6.7E-07	U	3.4E-07					
RJ778	2,3,7,8-TCDF	8.0E-07	U	4.0E-07					
RJ778	OCDD	1.0E-04		1.0E-04					
RJ778	OCDF	3.2E-06	J	3.2E-06					
RJ778	Total HpCDD	3.0E-05		3.0E-05					
RJ778	Total HpCDF	2.5E-06	J	2.5E-06					
RJ778	Total HxCDD	3.2E-06	J	3.2E-06					
RJ778	Total HxCDF	1.8E-06	J	1.8E-06					
RJ778	Total PeCDD	4.6E-07	U	2.3E-07					
RJ778	Total PeCDF	4.2E-07	U	2.1E-07					
RJ778	Total TCDD	6.7E-07	U	3.4E-07					
RJ778	Total TCDF	8.0E-07	U	4.0E-07					
RJ779	1,2,3,4,6,7,8-HpCDD	1.0E-05		1.0E-05	4.3E-07	4.5E-07	2.3E-06	1.3E-05	1.5E-04
RJ779	1,2,3,4,6,7,8-HpCDF	2.7E-06	J	2.7E-06					
RJ779	1,2,3,4,7,8,9-HpCDF	8.7E-07	U	4.4E-07					
RJ779	1,2,3,4,7,8-HxCDD	5.0E-07	U	2.5E-07					
RJ779	1,2,3,4,7,8-HxCDF	4.5E-07	J	4.5E-07					
RJ779	1,2,3,6,7,8-HxCDD	7.1E-07	J	7.1E-07					
RJ779	1,2,3,6,7,8-HxCDF	7.0E-07	UJ	3.5E-07					
RJ779	1,2,3,7,8,9-HxCDD	4.0E-07	UJ	2.0E-07					
RJ779	1,2,3,7,8,9-HxCDF	2.5E-07	U	1.3E-07					
RJ779	1,2,3,7,8-PeCDD	3.5E-07	U	1.8E-07					
RJ779	1,2,3,7,8-PeCDF	2.6E-07	UJ	1.3E-07					
RJ779	2,3,4,6,7,8-HxCDF	2.6E-07	J	2.6E-07					
RJ779	2,3,4,7,8-PeCDF	2.9E-07	UJ	1.5E-07					
RJ779	2,3,7,8-TCDD	3.6E-07	U	1.8E-07					
RJ779	2,3,7,8-TCDF	4.9E-07	U	2.5E-07					
RJ779	OCDD	1.4E-04		1.4E-04					
RJ779	OCDF	1.0E-05	UJ	5.0E-06					
RJ779	Total HpCDD	3.0E-05		3.0E-05					
RJ779	Total HpCDF	1.0E-05		1.0E-05					
RJ779	Total HxCDD	4.5E-06	J	4.5E-06					
RJ779	Total HxCDF	3.0E-06	J	3.0E-06					
RJ779	Total PeCDD	3.5E-07	U	1.8E-07					
RJ779	Total PeCDF	8.0E-07	J	8.0E-07					
RJ779	Total TCDD	3.6E-07	U	1.8E-07					
RJ779	Total TCDF	4.9E-07	U	2.5E-07					
RJ782	1,2,3,4,6,7,8-HpCDD	7.0E-05		7.0E-05	7.1E-07	9.8E-07	8.7E-06	9.1E-05	6.7E-04
RJ782	1,2,3,4,6,7,8-HpCDF	2.0E-05		2.0E-05					
RJ782	1,2,3,4,7,8,9-HpCDF	1.4E-06	U	7.0E-07					
RJ782	1,2,3,4,7,8-HxCDD	1.2E-06	J	1.2E-06					
RJ782	1,2,3,4,7,8-HxCDF	9.3E-07	J	9.3E-07					
RJ782	1,2,3,6,7,8-HxCDD	2.6E-06	J	2.6E-06					
RJ782	1,2,3,6,7,8-HxCDF	2.8E-06	UJ	1.4E-06					
RJ782	1,2,3,7,8,9-HxCDD	1.7E-06	J	1.7E-06					
RJ782	1,2,3,7,8,9-HxCDF	3.4E-07	U	1.7E-07					
RJ782	1,2,3,7,8-PeCDD	4.9E-07	U	2.5E-07					
RJ782	1,2,3,7,8-PeCDF	2.8E-07	U	1.4E-07					
RJ782	2,3,4,6,7,8-HxCDF	7.1E-07	J	7.1E-07					
RJ782	2,3,4,7,8-PeCDF	5.9E-07	J	5.9E-07					
RJ782	2,3,7,8-TCDD	5.6E-07	U	2.8E-07					
RJ782	2,3,7,8-TCDF	4.3E-07	J	4.3E-07					
RJ782	OCDD	6.3E-04	J	6.3E-04					
RJ782	OCDF	4.0E-05	J	4.0E-05					
RJ782	Total HpCDD	1.3E-04		1.3E-04					
RJ782	Total HpCDF	2.0E-05		2.0E-05					
RJ782	Total HxCDD	2.0E-05		2.0E-05					
RJ782	Total HxCDF	1.0E-05		1.0E-05					
RJ782	Total PeCDD	4.9E-07	U	2.5E-07					

PCDD/PCDF Congener Group Summation for Soil (0-2 feet bgs)
Old Conservation Yard RFI Site

EPA ID	PCDD/PCDF Congener	Measured Concentration [a] (mg/kg)	Data Qualifier	Adjusted Concentration [b] (mg/kg)	Sum of PCDD/PCDF Congener Concentrations				
					Total Tetra (mg/kg)	Total Penta (mg/kg)	Total Hexa (mg/kg)	Total Hepta (mg/kg)	Total Octa (mg/kg)
RJ782	Total PeCDF	3.6E-06	J	3.6E-06					
RJ782	Total TCDD	5.6E-07	U	2.8E-07					
RJ782	Total TCDF	2.0E-06	J	2.0E-06					
RJ783	1,2,3,4,6,7,8-HpCDD	3.3E-03		3.3E-03	1.3E-05	1.0E-04	6.8E-04	3.6E-03	1.6E-02
RJ783	1,2,3,4,6,7,8-HpCDF	2.3E-04		2.3E-04					
RJ783	1,2,3,4,7,8,9-HpCDF	6.0E-05		6.0E-05					
RJ783	1,2,3,4,7,8-HxCDD	1.5E-04		1.5E-04					
RJ783	1,2,3,4,7,8-HxCDF	1.2E-04		1.2E-04					
RJ783	1,2,3,6,7,8-HxCDD	1.6E-04		1.6E-04					
RJ783	1,2,3,6,7,8-HxCDF	5.0E-05	UJ	2.5E-05					
RJ783	1,2,3,7,8,9-HxCDD	1.7E-04		1.7E-04					
RJ783	1,2,3,7,8,9-HxCDF	2.0E-05		2.0E-05					
RJ783	1,2,3,7,8-PeCDD	6.0E-05		6.0E-05					
RJ783	1,2,3,7,8-PeCDF	1.0E-05		1.0E-05					
RJ783	2,3,4,6,7,8-HxCDF	3.0E-05		3.0E-05					
RJ783	2,3,4,7,8-PeCDF	3.0E-05		3.0E-05					
RJ783	2,3,7,8-TCDD	1.0E-05		1.0E-05					
RJ783	2,3,7,8-TCDF	2.9E-06	J	2.9E-06					
RJ783	OCDD	1.5E-02	J	1.5E-02					
RJ783	OCDF	7.0E-04		7.0E-04					
RJ783	Total HpCDD	9.3E-03		9.3E-03					
RJ783	Total HpCDF	8.8E-04		8.8E-04					
RJ783	Total HxCDD	2.9E-03		2.9E-03					
RJ783	Total HxCDF	5.4E-04		5.4E-04					
RJ783	Total PeCDD	5.5E-04		5.5E-04					
RJ783	Total PeCDF	1.8E-04		1.8E-04					
RJ783	Total TCDD	1.4E-04		1.4E-04					
RJ783	Total TCDF	9.0E-05	J	9.0E-05					
MJ665	1,2,3,4,6,7,8-HpCDD	9.0E-05		9.0E-05	9.9E-07	2.5E-06	1.1E-05	1.0E-04	1.7E-03
MJ665	1,2,3,4,6,7,8-HpCDF	1.0E-05		1.0E-05					
MJ665	1,2,3,4,7,8,9-HpCDF	1.3E-06	J	1.3E-06					
MJ665	1,2,3,4,7,8-HxCDD	1.1E-06	J	1.1E-06					
MJ665	1,2,3,4,7,8-HxCDF	1.9E-06	J	1.9E-06					
MJ665	1,2,3,6,7,8-HxCDD	3.5E-06		3.5E-06					
MJ665	1,2,3,6,7,8-HxCDF	9.9E-07	J	9.9E-07					
MJ665	1,2,3,7,8,9-HxCDD	2.3E-06	J	2.3E-06					
MJ665	1,2,3,7,8,9-HxCDF	4.2E-07	J	4.2E-07					
MJ665	1,2,3,7,8-PeCDD	6.6E-07	J	6.6E-07					
MJ665	1,2,3,7,8-PeCDF	6.9E-07	J	6.9E-07					
MJ665	2,3,4,6,7,8-HxCDF	1.1E-06	J	1.1E-06					
MJ665	2,3,4,7,8-PeCDF	1.2E-06	J	1.2E-06					
MJ665	2,3,7,8-TCDD	1.2E-07	U	6.0E-08					
MJ665	2,3,7,8-TCDF	9.3E-07		9.3E-07					
MJ665	OCDD	1.7E-03		1.7E-03					
MJ665	OCDF	5.0E-05		5.0E-05					
MJ665	Total HpCDD	3.1E-04		3.1E-04					
MJ665	Total HpCDF	4.0E-05		4.0E-05					
MJ665	Total HxCDD	3.0E-05		3.0E-05					
MJ665	Total HxCDF	2.0E-05		2.0E-05					
MJ665	Total PeCDD	1.0E-05		1.0E-05					
MJ665	Total PeCDF	1.0E-05		1.0E-05					
MJ665	Total TCDD	1.5E-06		1.5E-06					
MJ665	Total TCDF	1.0E-05		1.0E-05					
MJ677	1,2,3,4,6,7,8-HpCDD	9.0E-05		9.0E-05	5.3E-07	1.3E-06	7.8E-06	1.1E-04	1.0E-03
MJ677	1,2,3,4,6,7,8-HpCDF	2.0E-05		2.0E-05					
MJ677	1,2,3,4,7,8,9-HpCDF	1.3E-06	J	1.3E-06					
MJ677	1,2,3,4,7,8-HxCDD	1.1E-06	J	1.1E-06					
MJ677	1,2,3,4,7,8-HxCDF	9.7E-07	J	9.7E-07					
MJ677	1,2,3,6,7,8-HxCDD	2.5E-06	J	2.5E-06					
MJ677	1,2,3,6,7,8-HxCDF	6.5E-07	J	6.5E-07					
MJ677	1,2,3,7,8,9-HxCDD	1.7E-06	J	1.7E-06					

PCDD/PCDF Congener Group Summation for Soil (0-2 feet bgs)
Old Conservation Yard RFI Site

EPA ID	PCDD/PCDF Congener	Measured Concentration [a] (mg/kg)	Data Qualifier	Adjusted Concentration [b] (mg/kg)	Sum of PCDD/PCDF Congener Concentrations				
					Total Tetra (mg/kg)	Total Penta (mg/kg)	Total Hexa (mg/kg)	Total Hepta (mg/kg)	Total Octa (mg/kg)
MJ677	1,2,3,7,8,9-HxCDF	2.9E-07	U	1.4E-07					
MJ677	1,2,3,7,8-PeCDD	4.3E-07	J	4.3E-07					
MJ677	1,2,3,7,8-PeCDF	2.6E-07	J	2.6E-07					
MJ677	2,3,4,6,7,8-HxCDF	8.2E-07	J	8.2E-07					
MJ677	2,3,4,7,8-PeCDF	5.8E-07	J	5.8E-07					
MJ677	2,3,7,8-TCDD	9.1E-08	U	4.5E-08					
MJ677	2,3,7,8-TCDF	4.8E-07	J	4.8E-07					
MJ677	OCDD	9.3E-04		9.3E-04					
MJ677	OCDF	7.0E-05		7.0E-05					
MJ677	Total HpCDD	3.2E-04		3.2E-04					
MJ677	Total HpCDF	6.0E-05		6.0E-05					
MJ677	Total HxCDD	3.0E-05		3.0E-05					
MJ677	Total HxCDF	2.0E-05		2.0E-05					
MJ677	Total PeCDD	2.7E-06		2.7E-06					
MJ677	Total PeCDF	1.0E-05		1.0E-05					
MJ677	Total TCDD	1.9E-07		1.9E-07					
MJ677	Total TCDF	4.0E-06		4.0E-06					
MJ678	1,2,3,4,6,7,8-HpCDD	6.0E-05		6.0E-05	9.4E-07	2.4E-06	8.7E-06	7.1E-05	6.4E-04
MJ678	1,2,3,4,6,7,8-HpCDF	1.0E-05		1.0E-05					
MJ678	1,2,3,4,7,8,9-HpCDF	8.4E-07	J	8.4E-07					
MJ678	1,2,3,4,7,8-HxCDD	8.5E-07	J	8.5E-07					
MJ678	1,2,3,4,7,8-HxCDF	1.5E-06	J	1.5E-06					
MJ678	1,2,3,6,7,8-HxCDD	2.3E-06	J	2.3E-06					
MJ678	1,2,3,6,7,8-HxCDF	9.6E-07	J	9.6E-07					
MJ678	1,2,3,7,8,9-HxCDD	1.8E-06	J	1.8E-06					
MJ678	1,2,3,7,8,9-HxCDF	2.7E-07	J	2.7E-07					
MJ678	1,2,3,7,8-PeCDD	5.2E-07	J	5.2E-07					
MJ678	1,2,3,7,8-PeCDF	6.6E-07	J	6.6E-07					
MJ678	2,3,4,6,7,8-HxCDF	1.0E-06	J	1.0E-06					
MJ678	2,3,4,7,8-PeCDF	1.2E-06	J	1.2E-06					
MJ678	2,3,7,8-TCDD	1.5E-07	U	7.5E-08					
MJ678	2,3,7,8-TCDF	8.6E-07	J	8.6E-07					
MJ678	OCDD	6.1E-04		6.1E-04					
MJ678	OCDF	3.0E-05		3.0E-05					
MJ678	Total HpCDD	1.4E-04		1.4E-04					
MJ678	Total HpCDF	3.0E-05		3.0E-05					
MJ678	Total HxCDD	2.0E-05		2.0E-05					
MJ678	Total HxCDF	2.0E-05		2.0E-05					
MJ678	Total PeCDD	1.0E-05		1.0E-05					
MJ678	Total PeCDF	1.0E-05		1.0E-05					
MJ678	Total TCDD	1.3E-06		1.3E-06					
MJ678	Total TCDF	1.0E-05		1.0E-05					
MJ679	1,2,3,4,6,7,8-HpCDD	9.0E-05		9.0E-05	1.3E-06	1.3E-05	4.0E-05	1.2E-04	8.3E-04
MJ679	1,2,3,4,6,7,8-HpCDF	3.0E-05		3.0E-05					
MJ679	1,2,3,4,7,8,9-HpCDF	2.4E-06	J	2.4E-06					
MJ679	1,2,3,4,7,8-HxCDD	1.6E-06	J	1.6E-06					
MJ679	1,2,3,4,7,8-HxCDF	1.0E-05		1.0E-05					
MJ679	1,2,3,6,7,8-HxCDD	4.0E-06		4.0E-06					
MJ679	1,2,3,6,7,8-HxCDF	1.0E-05		1.0E-05					
MJ679	1,2,3,7,8,9-HxCDD	2.8E-06		2.8E-06					
MJ679	1,2,3,7,8,9-HxCDF	1.6E-06	J	1.6E-06					
MJ679	1,2,3,7,8-PeCDD	9.5E-07	J	9.5E-07					
MJ679	1,2,3,7,8-PeCDF	2.1E-06	J	2.1E-06					
MJ679	2,3,4,6,7,8-HxCDF	1.0E-05		1.0E-05					
MJ679	2,3,4,7,8-PeCDF	1.0E-05		1.0E-05					
MJ679	2,3,7,8-TCDD	1.6E-07	UJ	7.9E-08					
MJ679	2,3,7,8-TCDF	1.3E-06		1.3E-06					
MJ679	OCDD	7.7E-04		7.7E-04					
MJ679	OCDF	6.0E-05		6.0E-05					
MJ679	Total HpCDD	2.3E-04		2.3E-04					
MJ679	Total HpCDF	8.0E-05		8.0E-05					

PCDD/PCDF Congener Group Summation for Soil (0-2 feet bgs)
Old Conservation Yard RFI Site

EPA ID	PCDD/PCDF Congener	Measured Concentration [a] (mg/kg)	Data Qualifier	Adjusted Concentration [b] (mg/kg)	Sum of PCDD/PCDF Congener Concentrations				
					Total Tetra (mg/kg)	Total Penta (mg/kg)	Total Hexa (mg/kg)	Total Hepta (mg/kg)	Total Octa (mg/kg)
MJ679	Total HxCDD	4.0E-05		4.0E-05					
MJ679	Total HxCDF	7.0E-05		7.0E-05					
MJ679	Total PeCDD	2.0E-05		2.0E-05					
MJ679	Total PeCDF	6.0E-05		6.0E-05					
MJ679	Total TCDD	1.0E-05		1.0E-05					
MJ679	Total TCDF	4.0E-05		4.0E-05					
MJ680	1,2,3,4,6,7,8-HpCDD	3.0E-05		3.0E-05	3.1E-07	6.4E-07	2.7E-06	3.5E-05	3.7E-04
MJ680	1,2,3,4,6,7,8-HpCDF	4.7E-06		4.7E-06					
MJ680	1,2,3,4,7,8,9-HpCDF	3.1E-07	J	3.1E-07					
MJ680	1,2,3,4,7,8-HxCDD	3.1E-07	J	3.1E-07					
MJ680	1,2,3,4,7,8-HxCDF	3.1E-07	J	3.1E-07					
MJ680	1,2,3,6,7,8-HxCDD	9.4E-07	J	9.4E-07					
MJ680	1,2,3,6,7,8-HxCDF	2.2E-07	J	2.2E-07					
MJ680	1,2,3,7,8,9-HxCDD	5.2E-07	J	5.2E-07					
MJ680	1,2,3,7,8,9-HxCDF	1.2E-07	U	6.0E-08					
MJ680	1,2,3,7,8-PeCDD	1.5E-07	J	1.5E-07					
MJ680	1,2,3,7,8-PeCDF	1.2E-07	J	1.2E-07					
MJ680	2,3,4,6,7,8-HxCDF	3.1E-07	J	3.1E-07					
MJ680	2,3,4,7,8-PeCDF	3.7E-07	J	3.7E-07					
MJ680	2,3,7,8-TCDD	1.2E-07	U	6.0E-08					
MJ680	2,3,7,8-TCDF	2.5E-07	J	2.5E-07					
MJ680	OCDD	3.5E-04		3.5E-04					
MJ680	OCDF	2.0E-05		2.0E-05					
MJ680	Total HpCDD	8.0E-05		8.0E-05					
MJ680	Total HpCDF	2.0E-05		2.0E-05					
MJ680	Total HxCDD	1.0E-05		1.0E-05					
MJ680	Total HxCDF	1.0E-05		1.0E-05					
MJ680	Total PeCDD	1.4E-06		1.4E-06					
MJ680	Total PeCDF	3.2E-06		3.2E-06					
MJ680	Total TCDD	2.1E-07		2.1E-07					
MJ680	Total TCDF	9.2E-07		9.2E-07					
MJ735	1,2,3,4,6,7,8-HpCDD	1.1E-03		1.1E-03	1.1E-05	2.4E-05	9.2E-05	1.3E-03	1.4E-02
MJ735	1,2,3,4,6,7,8-HpCDF	1.8E-04		1.8E-04					
MJ735	1,2,3,4,7,8,9-HpCDF	1.0E-05		1.0E-05					
MJ735	1,2,3,4,7,8-HxCDD	1.0E-05		1.0E-05					
MJ735	1,2,3,4,7,8-HxCDF	1.0E-05		1.0E-05					
MJ735	1,2,3,6,7,8-HxCDD	3.0E-05		3.0E-05					
MJ735	1,2,3,6,7,8-HxCDF	1.0E-05	J	1.0E-05					
MJ735	1,2,3,7,8,9-HxCDD	2.0E-05		2.0E-05					
MJ735	1,2,3,7,8,9-HxCDF	2.3E-06	J	2.3E-06					
MJ735	1,2,3,7,8-PeCDD	1.0E-05		1.0E-05					
MJ735	1,2,3,7,8-PeCDF	3.7E-06		3.7E-06					
MJ735	2,3,4,6,7,8-HxCDF	1.0E-05		1.0E-05					
MJ735	2,3,4,7,8-PeCDF	1.0E-05		1.0E-05					
MJ735	2,3,7,8-TCDD	5.5E-07		5.5E-07					
MJ735	2,3,7,8-TCDF	1.0E-05		1.0E-05					
MJ735	OCDD	1.3E-02		1.3E-02					
MJ735	OCDF	8.0E-04		8.0E-04					
MJ735	Total HpCDD	2.4E-03		2.4E-03					
MJ735	Total HpCDF	6.4E-04		6.4E-04					
MJ735	Total HxCDD	2.7E-04		2.7E-04					
MJ735	Total HxCDF	2.1E-04		2.1E-04					
MJ735	Total PeCDD	3.0E-05		3.0E-05					
MJ735	Total PeCDF	1.0E-04		1.0E-04					
MJ735	Total TCDD	1.0E-05		1.0E-05					
MJ735	Total TCDF	1.2E-04		1.2E-04					
MJ736	1,2,3,4,6,7,8-HpCDD	1.0E-03		1.0E-03	1.1E-05	2.5E-05	1.0E-04	1.2E-03	1.1E-02
MJ736	1,2,3,4,6,7,8-HpCDF	1.5E-04		1.5E-04					
MJ736	1,2,3,4,7,8,9-HpCDF	1.0E-05		1.0E-05					
MJ736	1,2,3,4,7,8-HxCDD	1.0E-05		1.0E-05					
MJ736	1,2,3,4,7,8-HxCDF	1.0E-05		1.0E-05					

PCDD/PCDF Congener Group Summation for Soil (0-2 feet bgs)
Old Conservation Yard RFI Site

EPA ID	PCDD/PCDF Congener	Measured Concentration [a] (mg/kg)	Data Qualifier	Adjusted Concentration [b] (mg/kg)	Sum of PCDD/PCDF Congener Concentrations				
					Total Tetra (mg/kg)	Total Penta (mg/kg)	Total Hexa (mg/kg)	Total Hepta (mg/kg)	Total Octa (mg/kg)
MJ736	1,2,3,6,7,8-HxCDD	4.0E-05		4.0E-05					
MJ736	1,2,3,6,7,8-HxCDF	1.0E-05		1.0E-05					
MJ736	1,2,3,7,8,9-HxCDD	2.0E-05		2.0E-05					
MJ736	1,2,3,7,8,9-HxCDF	3.0E-06		3.0E-06					
MJ736	1,2,3,7,8-PeCDD	1.0E-05		1.0E-05					
MJ736	1,2,3,7,8-PeCDF	5.0E-06		5.0E-06					
MJ736	2,3,4,6,7,8-HxCDF	1.0E-05		1.0E-05					
MJ736	2,3,4,7,8-PeCDF	1.0E-05		1.0E-05					
MJ736	2,3,7,8-TCDD	1.0E-06		1.0E-06					
MJ736	2,3,7,8-TCDF	1.0E-05		1.0E-05					
MJ736	OCDD	1.1E-02		1.1E-02					
MJ736	OCDF	3.6E-04		3.6E-04					
MJ736	Total HpCDD	2.2E-03		2.2E-03					
MJ736	Total HpCDF	6.1E-04		6.1E-04					
MJ736	Total HxCDD	3.1E-04		3.1E-04					
MJ736	Total HxCDF	2.8E-04		2.8E-04					
MJ736	Total PeCDD	6.0E-05		6.0E-05					
MJ736	Total PeCDF	1.0E-04		1.0E-04					
MJ736	Total TCDD	2.0E-05		2.0E-05					
MJ736	Total TCDF	1.0E-04		1.0E-04					
				MAX	1.3E-05	1.0E-04	6.8E-04	3.6E-03	1.6E-02

Maximum of Total Summed Congener Concentrations

Total Tetra	1.3E-05
Total Penta	1.0E-04
Total Hexa	6.8E-04
Total Hepta	3.6E-03
Total Octa	1.6E-02

Notes:

a. Measured concentration - concentration reported by the analytial laboratory

b. Adjusted concentration - concentration reported by the analytical laboratory if the chemical was detected, or estimated at one-half the sample quantitation limit (SQL) if not detected.

PCDD/PCDF - polychlorinated dibenzo-p-dioxins and dibenzofurans

Total Tetra - sum of the 2,3,7,8-substituted tetraclorinated dibenzo-p-dioxin and dibenzofuran congeners.

Total Penta - sum of the 2,3,7,8-substituted pentaclorinated dibenzo-p-dioxin and dibenzofuran congeners.

Total Hexa - sum of the 2,3,7,8-substituted hexaclorinated dibenzo-p-dioxin and dibenzofuran congeners.

Total Hepta - sum of the 2,3,7,8-substituted heptaclorinated dibenzo-p-dioxin and dibenzofuran congeners.

Total Octa - sum of the 2,3,7,8-substituted Octaclorinated dibenzo-p-dioxin and dibenzofuran congeners.

J - concentration estimated

U - not detected. Concentration shown is the SQL.

UJ - not detected. Concentration shown is the estimated SQL.

mg/kg - milligrams per kilogram

bgs- below ground surface

Spreadsheet C2-84 (1 of 1)

Comparison of Inorganic Compound Concentrations in Soil (0-6 feet bgs) Against Background
Old Conservation Yard RFI Site

PCDD/PCDF Congener Groups	Maximum Background (mg/kg)	Maximum RFI Site (mg/kg)	Results of Wilcoxon-Rank Sum Test	RFI Site Ever Detected?	RFI Site Exceeds Background?
Total Tetra	9.5E-07	1.3E-05	Yes	Yes	Yes
Total Penta	8.7E-07	1.0E-04	Yes	Yes	Yes
Total Hexa	5.1E-06	6.8E-04	Yes	Yes	Yes
Total Hepta	1.6E-05	3.6E-03	Yes	Yes	Yes
Total Octa	1.5E-04	1.6E-02	Yes	Yes	Yes

Inorganic Compounds	Maximum Background [a] (mg/kg)	Maximum RFI Site (mg/kg)	Results of Wilcoxon-Rank Sum Test	RFI Site Ever Detected?	RFI Site Exceeds Background?
Aluminum	2.0E+04	2.7E+04	No	Yes	No [b]
Antimony	8.7E+00	1.8E+01	No	Yes	No [b]
Arsenic	1.5E+01	6.5E+00	No	Yes	No [b]
Barium	1.4E+02	1.9E+02	No	Yes	No [b]
Beryllium	1.1E+00	1.0E+00	No	Yes	No [b]
Boron	9.7E+00	1.2E+01	Yes	Yes	Yes
Cadmium	1.0E+00	3.0E+00	Yes	Yes	Yes
Chromium	3.7E+01	4.5E+01	No	Yes	No [b]
Hexavalent chromium		0.0E+00	-	No	No
Cobalt	2.1E+01	1.0E+01	No	Yes	No [b]
Copper	2.9E+01	6.0E+01	No	Yes	No [b]
Lead	3.4E+01	1.4E+02	No	Yes	No [b]
Manganese	5.0E+02	3.1E+02	No	Yes	No [b]
Mercury	9.0E-02	2.3E+01	No	Yes	No [b]
Molybdenum	5.3E+00	1.6E+00	No	Yes	No [b]
Nickel	2.9E+01	2.8E+01	No	Yes	No [b]
Selenium	6.6E-01	4.7E-01	No	Yes	No [b]
Silver	7.9E-01	7.9E+00	Yes	Yes	Yes
Thallium	4.6E-01	1.7E+00	No	Yes	No [b]
Vanadium	6.2E+01	5.7E+01	No	Yes	No [b]
Zinc	1.1E+02	7.3E+02	No	Yes	No [b]

Notes:

a. The concentrations of inorganic compounds for which soil background data are not available are considered to be above background concentrations if they are detected and are potentially site-related.

b. Determined be within the range of background since the RFI site sample population for soils at 0 to 6 feet bgs was found to be no different than the background sample population at p=0.05 based on the Wilcoxon Rank Sum Test.

b. Determined be within the range of background since the RFI site sample population for soils at 0 to 6 feet bgs was found to be no different than the background sample population at p=0.05 based on the Wilcoxon Rank Sum Test.

mg/kg - milligrams per kilogram

bgs- below ground surface

Spreadsheet C2-83 (1 of 1)

Comparison of Inorganic Compound Concentrations in Soil (0-4 feet bgs) Against Background
Old Conservation Yard RFI Site

PCDD/PCDF Congener Groups	Maximum Background (mg/kg)	Maximum RFI Site (mg/kg)	Results of Wilcoxon-Rank Sum Test	RFI Site Ever Detected?	RFI Site Exceeds Background?
Total Tetra	9.5E-07	1.3E-05	Yes	Yes	Yes
Total Penta	8.7E-07	1.0E-04	Yes	Yes	Yes
Total Hexa	5.1E-06	6.8E-04	Yes	Yes	Yes
Total Hepta	1.6E-05	3.6E-03	Yes	Yes	Yes
Total Octa	1.5E-04	1.6E-02	Yes	Yes	Yes

Inorganic Compounds	Maximum Background [a] (mg/kg)	Maximum RFI Site (mg/kg)	Results of Wilcoxon-Rank Sum Test	RFI Site Ever Detected?	RFI Site Exceeds Background?
Aluminum	2.0E+04	2.7E+04	No	Yes	No [b]
Antimony	8.7E+00	9.7E-01	No	Yes	No [b]
Arsenic	1.5E+01	4.7E+00	No	Yes	No [b]
Barium	1.4E+02	1.9E+02	No	Yes	No [b]
Beryllium	1.1E+00	1.0E+00	No	Yes	No [b]
Boron	9.7E+00	1.2E+01	Yes	Yes	Yes
Cadmium	1.0E+00	2.2E+00	Yes	Yes	Yes
Chromium	3.7E+01	4.5E+01	No	Yes	No [b]
Hexavalent chromium		0.0E+00	-	No	No
Cobalt	2.1E+01	1.0E+01	No	Yes	No [b]
Copper	2.9E+01	2.9E+01	No	Yes	No [b]
Lead	3.4E+01	9.4E+01	No	Yes	No [b]
Manganese	5.0E+02	2.6E+02	No	Yes	No [b]
Mercury	9.0E-02	2.3E+01	No	Yes	No [b]
Molybdenum	5.3E+00	1.6E+00	No	Yes	No [b]
Nickel	2.9E+01	2.6E+01	No	Yes	No [b]
Selenium	6.6E-01	4.7E-01	No	Yes	No [b]
Silver	7.9E-01	4.0E+00	Yes	Yes	Yes
Thallium	4.6E-01	1.7E+00	No	Yes	No [b]
Vanadium	6.2E+01	5.7E+01	No	Yes	No [b]
Zinc	1.1E+02	1.6E+02	No	Yes	No [b]

Notes:

a. The concentrations of inorganic compounds for which soil background data are not available are considered to be above background concentrations if they are detected and are potentially site-related.

b. Determined be within the range of background since the RFI site sample population for soils at 0 to 4 feet bgs was found to be no different than the background sample population at p=0.05 based on the Wilcoxon Rank Sum Test.

PCDD/PCDF - polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.

Total Tetra - sum of the 2,3,7,8-substituted tetrachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations.

Total Penta - sum of the 2,3,7,8-substituted pentachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations.

Total Hexa - sum of the 2,3,7,8-substituted hexachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations.

Total Hepta - sum of the 2,3,7,8-substituted heptachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations.

Total Octa - sum of the octachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations.

mg/kg - milligrams per kilogram

bgs- below ground surface

Spreadsheet C2-82 (1 of 1)

Comparison of Inorganic Compound and PCDD/PCDF Concentrations in Soil (0-2 feet bgs) Against Background
Old Conservation Yard RFI Site

PCDD/PCDF Congener Groups	Maximum Background (mg/kg)	Maximum RFI Site (mg/kg)	Results of Wilcoxon-Rank Sum Test	RFI Site Ever Detected?	RFI Site Exceeds Background?	
Total Tetra	9.5E-07	1.3E-05	Yes	Yes	Yes	b
Total Penta	8.7E-07	1.0E-04	Yes	Yes	Yes	b
Total Hexa	5.1E-06	6.8E-04	Yes	Yes	Yes	b
Total Hepta	1.6E-05	3.6E-03	Yes	Yes	Yes	
Total Octa	1.5E-04	1.6E-02	Yes	Yes	Yes	

Inorganic Compounds	Maximum Background [a] (mg/kg)	Maximum RFI Site (mg/kg)	Results of Wilcoxon-Rank Sum Test	RFI Site Ever Detected?	RFI Site Exceeds Background?	
Aluminum	2.0E+04	2.4E+04	No	Yes	No	b
Antimony	8.7E+00	9.7E-01	No	Yes	No	b
Arsenic	1.5E+01	4.7E+00	No	Yes	No	b
Barium	1.4E+02	1.4E+02	No	Yes	No	b
Beryllium	1.1E+00	1.0E+00	No	Yes	No	b
Boron	9.7E+00	1.2E+01	No	Yes	No	b
Cadmium	1.0E+00	2.2E+00	Yes	Yes	Yes	
Chromium	3.7E+01	4.5E+01	No	Yes	No	b
Hexavalent chromium		0.0E+00	--	No	No	
Cobalt	2.1E+01	1.0E+01	No	Yes	No	b
Copper	2.9E+01	2.9E+01	No	Yes	No	b
Lead	3.4E+01	9.4E+01	No	Yes	No	b
Manganese	5.0E+02	2.6E+02	No	Yes	No	b
Mercury	9.0E-02	2.3E+01	No	Yes	No	b
Molybdenum	5.3E+00	1.6E+00	No	Yes	No	b
Nickel	2.9E+01	2.6E+01	No	Yes	No	b
Selenium	6.6E-01	3.7E-01	No	Yes	No	b
Silver	7.9E-01	4.0E+00	Yes	Yes	Yes	
Thallium	4.6E-01	1.7E+00	No	Yes	No	b
Vanadium	6.2E+01	5.7E+01	No	Yes	No	b
Zinc	1.1E+02	1.6E+02	No	Yes	No	b

Notes:

a. The concentrations of inorganic compounds for which soil background data are not available are considered to be above background concentrations if they are detected and are potentially site-related.

b. Determined be within the range of background since the RFI site sample population for soils at 0 to 10 feet bgs was found to be no different than the background sample population at p=0.01 based on the Wilcoxon Rank Sum Test.

PCDD/PCDF - polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.

Total Tetra - sum of the 2,3,7,8-substituted tetrachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations.

Total Penta - sum of the 2,3,7,8-substituted pentachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations.

Total Hexa - sum of the 2,3,7,8-substituted hexachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations.

Total Hepta - sum of the 2,3,7,8-substituted heptachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations.

Total Octa - sum of the octachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations.

mg/kg - milligrams per kilogram

bgs- below ground surface

Comparison of Sample Quantitation Limits in Soil (0-6 feet bgs) Against Ecological Screening Levels
Old Conservation Yard RFI Site

Chemical	Number of Samples	Percent Frequency of Detection	Frequency of Detection Between 0% and 5% ?	Minimum SQL for Chemicals Never Detected or Detected at Frequency of < 5% (mg/kg)	Maximum SQL for Chemicals Never Detected or Detected at Frequency of < 5% (mg/kg)	Lowest ESL (mg/kg)	Percentage of SQLs Exceeding ESL	Greater than 50% of SQLs Exceeds ESL ?
Inorganic Compounds								
Aluminum	54	100	No			1.2E+01	0	No
Antimony	47	19	No			9.5E-02	77	Yes
Arsenic	60	72	No			1.9E+00	100	Yes
Barium	60	100	No			1.5E+01	0	No
Beryllium	60	85	No			5.1E+00	0	No
Boron	53	36	No			9.2E+00	31	No
Cadmium	60	67	No			2.1E-02	100	Yes
Chromium	60	100	No			9.3E+02	0	No
Hexavalent chromium	1	0	Yes	2.0E-01	2.0E-01	2.0E-01	0	No
Cobalt	60	98	No			9.0E+00	0	No
Copper	60	100	No			1.1E+00	0	No
Lead	61	95	No			6.3E-02	100	Yes
Manganese	7	100	No			7.2E+01	0	No
Mercury	60	63	No			1.0E-01	26	No
Molybdenum	60	38	No			1.1E-01	100	Yes
Nickel	60	95	No			1.0E-01	100	Yes
Selenium	54	9	No			1.7E-01	89	Yes
Silver	63	68	No			5.4E-01	100	Yes
Thallium	65	66	No			2.9E+00	27	No
Vanadium	60	100	No			1.5E+00	0	No
Zinc	60	100	No			2.1E+01	0	No
VOCs								
1,1,1,2-Tetrachloroethane	14	0	Yes	7.6E-03	1.1E-01	7.6E+01	0	No
1,1,1-Trichloroethane	20	0	Yes	3.0E-03	2.7E-02	4.3E+03	0	No
1,1,2,2-Tetrachloroethane	20	0	Yes	3.0E-03	2.7E-02	6.0E+00	0	No
1,1,2-Trichloro-1,2,2-trifluoroethane	14	0	Yes	7.6E-03	1.1E-01	2.1E+02	0	No
1,1,2-Trichloroethane	20	0	Yes	3.0E-03	2.7E-02	8.3E+00	0	No
1,1-Dichloroethane	20	0	Yes	3.0E-03	2.7E-02	2.1E+02	0	No
1,1-Dichloroethene	20	0	Yes	5.0E-03	2.7E-02	2.9E-01	0	No
1,1-Dichloropropene	1	0	Yes	3.0E-03	3.0E-03	2.2E+01	0	No
1,2,3-Trichlorobenzene	1	0	Yes	7.6E-03	7.6E-03	2.0E+01	0	No
1,2,3-Trichloropropane	1	0	Yes	1.5E-02	1.5E-02	1.2E+01	0	No
1,2,4-Trichlorobenzene	8	0	Yes	7.6E-03	3.0E+00	2.0E+01	0	No
1,2,4-Trimethylbenzene	14	0	Yes	3.0E-03	1.1E-01	1.3E+02	0	No
1,2-Dibromo-3-chloropropane	14	0	Yes	7.6E-03	1.1E-01	2.2E+01	0	No
1,2-Dibromoethane	1	0	Yes	3.0E-03	3.0E-03	2.5E+01	0	No
1,2-Dichlorobenzene	21	0	Yes	3.0E-03	3.0E+00	3.7E+02	0	No
1,2-Dichloroethane	20	0	Yes	3.0E-03	2.7E-02	7.6E+01	0	No
1,2-Dichloroethene (total)	6	0	Yes	5.0E-03	5.0E-03	6.8E+01	0	No
1,2-Dichloropropane	20	0	Yes	3.0E-03	2.7E-02	2.5E+01	0	No
1,3,5-Trimethylbenzene	14	0	Yes	3.0E-03	1.1E-01	1.3E+02	0	No
1,3-Dichlorobenzene	21	0	Yes	3.0E-03	3.0E+00	3.2E+02	0	No
1,4-Dichlorobenzene	21	0	Yes	3.0E-03	3.0E+00	2.0E+01	0	No
2-Butanone	20	5	No			7.6E+03	0	No
2-Chloroethylvinylether	14	0	Yes	7.6E-03	2.7E-01	7.3E-01	0	No
2-Chlorotoluene	1	0	Yes	7.6E-03	7.6E-03	3.2E+02	0	No
2-Hexanone	7	0	Yes	1.0E-02	1.5E-02	2.4E+03	0	No
4-Chlorotoluene	1	0	Yes	7.6E-03	7.6E-03	3.2E+02	0	No

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Comparison of Sample Quantitation Limits in Soil (0-6 feet bgs) Against Ecological Screening Levels
Old Conservation Yard RFI Site

Chemical	Number of Samples	Percent Frequency of Detection	Frequency of Detection Between 0% and 5% ?	Minimum SQL for Chemicals Never Detected or Detected at Frequency of < 5% (mg/kg)	Maximum SQL for Chemicals Never Detected or Detected at Frequency of < 5% (mg/kg)	Lowest ESL (mg/kg)	Percentage of SQLs Exceeding ESL	Greater than 50% of SQLs Exceeds ESL ?
4-Methyl-2-pentanone	7	0	Yes	7.6E-03	1.0E-02	2.4E+03	0	No
Acetone	20	20	No			4.3E+01	0	No
Benzene	20	0	Yes	3.0E-03	2.7E-02	4.3E+00	0	No
Bromobenzene	1	0	Yes	7.6E-03	7.6E-03	4.3E+00	0	No
Bromodichloromethane	20	0	Yes	3.0E-03	2.7E-02	1.5E+01	0	No
Bromoform	20	0	Yes	5.0E-03	5.4E-02	3.8E+01	0	No
Bromomethane	20	0	Yes	7.6E-03	1.0E-01	2.5E+01	0	No
Carbon disulfide	6	0	Yes	5.0E-03	5.0E-03	4.7E+01	0	No
Carbon tetrachloride	20	0	Yes	5.0E-03	2.7E-02	1.5E+00	0	No
Chlorobenzene	20	0	Yes	3.0E-03	2.7E-02	4.0E+01	0	No
Chloroethane	20	0	Yes	7.6E-03	5.4E-02	7.3E+01	0	No
Chloroform	20	0	Yes	3.0E-03	5.4E-02	2.4E-01	0	No
Chloromethane	20	0	Yes	7.6E-03	5.4E-02	2.5E+01	0	No
Chlorotrifluoroethene	13	0	Yes	2.1E-02	1.1E-01	1.6E+01	0	No
cis-1,2-Dichloroethene	14	0	Yes	3.0E-03	2.7E-02	6.8E+01	0	No
cis-1,3-Dichloropropene	20	0	Yes	3.0E-03	2.7E-02	2.2E+01	0	No
Dibromochloromethane	7	0	Yes	3.0E-03	5.0E-03	4.6E+01	0	No
Dibromomethane	1	0	Yes	3.0E-03	3.0E-03	2.5E+01	0	No
Dichlorodifluoromethane	14	0	Yes	7.6E-03	5.4E-02	6.4E+01	0	No
Ethylbenzene	20	0	Yes	3.0E-03	2.7E-02	2.1E+02	0	No
Isopropylbenzene	1	0	Yes	3.0E-03	3.0E-03	4.1E+02	0	No
m,p-Xylene	14	0	Yes	3.0E-03	2.7E-02	1.3E+02	0	No
Methyl tert-butyl ether	1	0	Yes	7.6E-03	7.6E-03	6.1E+01	0	No
Methylene chloride	20	25	No			2.5E+01	0	No
n-Butylbenzene	1	0	Yes	7.6E-03	7.6E-03	4.1E+02	0	No
n-Propylbenzene	1	0	Yes	3.0E-03	3.0E-03	4.1E+02	0	No
o-Xylene	14	0	Yes	3.0E-03	2.7E-02	1.3E+02	0	No
sec-Butylbenzene	1	0	Yes	7.6E-03	7.6E-03	4.1E+02	0	No
Styrene	7	0	Yes	3.0E-03	5.0E-03	6.4E+02	0	No
tert-Butylbenzene	1	0	Yes	7.6E-03	7.6E-03	4.1E+02	0	No
Tetrachloroethene	20	0	Yes	3.0E-03	2.7E-02	2.1E+00	0	No
Toluene	20	15	No			2.5E+00	0	No
trans-1,2-Dichloroethene	14	0	Yes	3.0E-03	2.7E-02	9.7E+02	0	No
trans-1,3-Dichloropropene	20	0	Yes	3.0E-03	2.7E-02	4.4E+00	0	No
Trichloroethene	20	0	Yes	3.0E-03	2.7E-02	3.0E+00	0	No
Trichlorofluoromethane	14	0	Yes	5.0E-03	2.7E-02	3.0E+02	0	No
Vinyl acetate	6	0	Yes	1.0E-02	1.0E-02	5.0E+02	0	No
Vinyl chloride	20	0	Yes	3.0E-03	5.4E-02	7.3E-01	0	No
Xylenes (total)	6	50	No			1.3E+02	0	No
SVOCs								
1-Methylnaphthalene	24	8	No			2.1E+02	0	No
2,4,5-Trichlorophenol	7	0	Yes	2.0E-01	2.0E+01	9.0E+00	14	No
2,4,6-Trichlorophenol	7	0	Yes	2.0E-02	3.0E+00	1.0E+01	0	No
2,4-Dichlorophenol	7	0	Yes	2.0E-02	3.0E+00	1.3E+00	14	No
2,4-Dimethylphenol	7	0	Yes	3.0E-02	3.0E+00	1.1E+02	0	No
2,4-Dinitrophenol	7	0	Yes	2.0E-01	2.0E+01	5.9E-01	71	Yes
2,4-Dinitrotoluene	7	0	Yes	3.0E-02	3.0E+00	1.3E+00	14	No
2,6-Dinitrotoluene	7	0	Yes	3.0E-02	3.0E+00	2.5E+00	14	No
2-Chloronaphthalene	7	0	Yes	3.0E-02	3.0E+00	5.3E+02	0	No

Spreadsheet C2-81 (3 of 4)

Comparison of Sample Quantitation Limits in Soil (0-6 feet bgs) Against Ecological Screening Levels
Old Conservation Yard RFI Site

Chemical	Number of Samples	Percent Frequency of Detection	Frequency of Detection Between 0% and 5% ?	Minimum SQL for Chemicals Never Detected or Detected at Frequency of < 5% (mg/kg)	Maximum SQL for Chemicals Never Detected or Detected at Frequency of < 5% (mg/kg)	Lowest ESL (mg/kg)	Percentage of SQLs Exceeding ESL	Greater than 50% of SQLs Exceeds ESL ?
2-Chlorophenol	7	0	Yes	3.0E-02	3.0E+00	2.1E+01	0	No
2-Methylnaphthalene	40	20	No			2.1E+02	0	No
2-Methylphenol	7	0	Yes	3.0E-02	3.0E+00	1.1E+02	0	No
2-Nitroaniline	7	0	Yes	9.9E-02	2.0E+01	2.3E+01	0	No
2-Nitrophenol	7	0	Yes	3.0E-02	3.0E+00	2.3E+01	0	No
4-Methylphenol	7	0	Yes	3.0E-02	3.0E+00	4.3E+00	0	No
3,3'-Dichlorobenzidine	7	0	Yes	6.0E-02	6.0E+00	1.3E+00	14	No
3-Nitroaniline	7	0	Yes	9.9E-02	2.0E+01	5.9E+00	14	No
4,6-Dinitro-2-methylphenol	7	0	Yes	2.0E-01	2.0E+01	2.3E+01	0	No
4-Bromophenyl phenyl ether	7	0	Yes	3.0E-02	3.0E+00	4.3E+00	0	No
4-Chloro-3-methylphenol	7	0	Yes	2.0E-02	3.0E+00	2.1E+01	0	No
4-Chloroaniline	7	0	Yes	2.0E-02	3.0E+00	4.4E+00	0	No
4-Chlorophenyl phenyl ether	7	0	Yes	3.0E-02	3.0E+00	1.3E+00	14	No
4-Nitroaniline	7	0	Yes	2.0E-01	2.0E+01	3.3E+00	14	No
4-Nitrophenol	7	0	Yes	2.0E-01	2.0E+01	7.0E+00	14	No
Acenaphthene	57	5	No			2.5E+00	4	No
Acenaphthylene	57	2	Yes	2.0E-03	3.2E+00	7.5E+02	0	No
Aniline	6	0	Yes	3.0E-02	3.0E+00	5.3E+01	0	No
Anthracene	57	9	No			2.4E+00	4	No
Benzidine	6	0	Yes	2.0E-01	2.0E+01	2.3E+00	17	No
Benzo(a)anthracene	57	28	No			1.4E+00	9	No
Benzo(a)pyrene	57	16	No			5.6E+00	0	No
Benzo(b)fluoranthene	57	19	No			4.4E+00	0	No
Benzo(e)pyrene	1	100	No			NA	-	No
Benzo(g,h,i)perylene	57	14	No			6.4E+00	0	No
Benzo(k)fluoranthene	57	18	No			5.8E+00	0	No
Benzoic acid	6	0	Yes	2.0E-01	2.0E+01	4.4E+00	17	No
Benzyl alcohol	7	0	Yes	3.0E-02	3.0E+00	4.4E+00	0	No
bis(2-Chloroethoxy)methane	7	0	Yes	3.0E-02	3.0E+00	1.5E+02	0	No
bis(2-Chloroethyl)ether	7	0	Yes	3.0E-02	3.0E+00	1.5E+02	0	No
bis(2-Chloroisopropyl) ether	7	0	Yes	3.0E-02	3.0E+00	1.5E+02	0	No
bis(2-Ethylhexyl)phthalate	25	0	Yes	3.0E-02	1.1E+01	4.9E+00	8	No
Butyl benzyl phthalate	7	0	Yes	3.0E-02	3.0E+00	3.4E+02	0	No
Chrysene	57	28	No			2.4E+00	4	No
Dibenz(a,h)anthracene	57	9	No			5.6E+00	0	No
Dibenzofuran	7	0	Yes	3.0E-02	3.0E+00	6.2E+01	0	No
Diethylphthalate	25	0	Yes	4.0E-03	1.1E+01	6.9E+03	0	No
Dimethyl phthalate	7	0	Yes	3.0E-02	3.0E+00	2.0E+02	0	No
Di-n-butylphthalate	25	0	Yes	3.0E-02	1.1E+01	4.9E-01	40	No
Di-n-octyl phthalate	7	0	Yes	3.0E-02	3.0E+00	1.5E+03	0	No
Fluoranthene	57	30	No			3.8E+01	0	No
Fluorene	57	2	Yes	3.0E-03	3.2E+00	1.6E+00	5	No
Hexachlorobenzene	7	0	Yes	3.0E-02	3.0E+00	3.4E-01	14	No
Hexachlorobutadiene	8	0	Yes	7.6E-03	3.0E+00	8.5E-01	13	No
Hexachlorocyclopentadiene	7	0	Yes	2.0E-02	3.0E+00	1.3E+01	0	No
Hexachloroethane	7	0	Yes	3.0E-02	3.0E+00	2.1E+00	14	No
Indeno(1,2,3-cd)pyrene	57	11	No			5.8E+00	0	No
Isophorone	7	0	Yes	3.0E-02	3.0E+00	4.8E+02	0	No
Naphthalene	58	16	No			2.1E+02	0	No

Comparison of Sample Quantitation Limits in Soil (0-6 feet bgs) Against Ecological Screening Levels
Old Conservation Yard RFI Site

Chemical	Number of Samples	Percent Frequency of Detection	Frequency of Detection Between 0% and 5% ?	Minimum SQL for Chemicals Never Detected or Detected at Frequency of < 5% (mg/kg)	Maximum SQL for Chemicals Never Detected or Detected at Frequency of < 5% (mg/kg)	Lowest ESL (mg/kg)	Percentage of SQLs Exceeding ESL	Greater than 50% of SQLs Exceeds ESL ?
Nitrobenzene	7	0	Yes	3.0E-02	3.0E+00	2.0E+00	14	No
N-Nitrosodimethylamine	27	0	Yes	2.0E-03	3.0E+00	5.6E+01	0	No
N-Nitrosodi-n-propylamine	7	0	Yes	3.0E-02	3.0E+00	5.6E+01	0	No
N-Nitrosodiphenylamine	24	0	Yes	3.0E-02	3.2E+00	2.0E+01	0	No
Pentachlorophenol	7	0	Yes	2.0E-01	2.0E+01	6.0E+00	14	No
Perylene	1	100	No			NA	-	No
Phenanthrene	57	25	No			1.3E+00	5	No
Phenol	7	0	Yes	3.0E-02	3.0E+00	5.0E+00	0	No
Pyrene	57	30	No			1.8E+01	0	No
Total Petroleum Hydrocarbons								
C08-C11(Gasoline Range)	75	7	No			NA	-	No
C11-C14(Kerosene Range)	69	3	Yes	3.4E+00	1.4E+02	NA	-	No
C14-C20(Diesel Range)	75	28	No			NA	-	No
C20-C30(Lubricant Oil Range)	69	43	No			NA	-	No
PCDD/PCDFs								
2,3,7,8-TCDD	16	44	No			4.3E-06	0	No
1,2,3,7,8-PeCDD	16	75	No			4.4E-06	0	No
1,2,3,4,7,8-HxCDD	16	88	No			4.5E-05	0	No
1,2,3,6,7,8-HxCDD	16	94	No			1.1E-04	0	No
1,2,3,7,8,9-HxCDD	16	88	No			4.3E-05	0	No
1,2,3,4,6,7,8-HpCDD	16	100	No			9.6E-04	0	No
OCDD	16	100	No			1.2E-01	0	No
2,3,7,8-TCDF	16	88	No			4.4E-06	0	No
1,2,3,7,8-PeCDF	16	69	No			1.0E-04	0	No
2,3,4,7,8-PeCDF	16	88	No			9.8E-06	0	No
1,2,3,4,7,8-HxCDF	16	94	No			4.7E-05	0	No
1,2,3,6,7,8-HxCDF	16	56	No			5.4E-05	6	No
2,3,4,6,7,8-HxCDF	16	94	No			4.9E-05	0	No
1,2,3,7,8,9-HxCDF	16	63	No			4.3E-05	0	No
1,2,3,4,6,7,8-HpCDF	16	100	No			1.1E-03	0	No
1,2,3,4,7,8,9-HpCDF	16	75	No			4.3E-04	0	No
OCDF	16	94	No			9.7E-02	0	No
PCBs								
Aroclor-1016	59	0	Yes	3.4E-02	8.6E+01	5.9E+00	3	No
Aroclor-1221	59	0	Yes	5.1E-02	8.6E+01	5.9E+00	3	No
Aroclor-1232	59	0	Yes	3.4E-02	8.6E+01	2.9E-01	36	No
Aroclor-1242	59	0	Yes	3.4E-02	8.6E+01	2.9E-01	32	No
Aroclor-1248	59	25	No			6.0E-02	71	Yes
Aroclor-1254	59	27	No			2.9E-01	22	No
Aroclor-1260	59	19	No			2.9E-01	56	Yes

Notes:
VOC - volatile organic chemicals
SVOC - semivolatile organic chemicals
PCBs - polychlorinated biphenyls
SQL - sample quantitation limit
ESL - ecological screening level
mg/kg - milligrams per kilogram
bgs- below ground surface

Comparison of Sample Quantitation Limits in Soil (0-4 feet bgs) Against Ecological Screening Levels
Old Conservation Yard RFI Site

Chemical	Number of Samples	Percent Frequency of Detection	Frequency of Detection Between 0% and 5% ?	Minimum SQL for Chemicals Never Detected or Detected at Frequency of < 5% (mg/kg)	Maximum SQL for Chemicals Never Detected or Detected at Frequency of < 5% (mg/kg)	Lowest ESL (mg/kg)	Percentage of SQLs Exceeding ESL	Greater than 50% of SQLs Exceeds ESL ?
Inorganic Compounds								
Aluminum	52	100	No			1.2E+01	0	No
Antimony	44	16	No			9.5E-02	80	Yes
Arsenic	56	73	No			1.9E+00	100	Yes
Barium	56	100	No			1.5E+01	0	No
Beryllium	56	88	No			5.1E+00	0	No
Boron	51	35	No			9.2E+00	33	No
Cadmium	56	68	No			2.1E-02	100	Yes
Chromium	56	100	No			9.3E+02	0	No
Hexavalent chromium	1	0	Yes	2.0E-01	2.0E-01	2.0E-01	0	No
Cobalt	56	98	No			9.0E+00	0	No
Copper	56	100	No			1.1E+00	0	No
Lead	57	96	No			6.3E-02	100	Yes
Manganese	5	100	No			7.2E+01	0	No
Mercury	56	68	No			1.0E-01	62	Yes
Molybdenum	56	41	No			1.1E-01	100	Yes
Nickel	56	95	No			1.0E-01	100	Yes
Selenium	52	10	No			1.7E-01	90	Yes
Silver	59	71	No			5.4E-01	100	Yes
Thallium	61	69	No			2.9E+00	26	No
Vanadium	56	100	No			1.5E+00	0	No
Zinc	56	100	No			2.1E+01	0	No
VOCs								
1,1,1,2-Tetrachloroethane	11	0	Yes	7.6E-03	4.1E-02	7.6E+01	0	No
1,1,1-Trichloroethane	17	0	Yes	3.0E-03	1.1E-02	4.3E+03	0	No
1,1,2,2-Tetrachloroethane	17	0	Yes	3.0E-03	1.1E-02	6.0E+00	0	No
1,1,2-Trichloro-1,2,2-trifluoroethane	11	0	Yes	7.6E-03	4.1E-02	2.1E+02	0	No
1,1,2-Trichloroethane	17	0	Yes	3.0E-03	1.1E-02	8.3E+00	0	No
1,1-Dichloroethane	17	0	Yes	3.0E-03	1.1E-02	2.1E+02	0	No
1,1-Dichloroethene	17	0	Yes	5.0E-03	1.1E-02	2.9E-01	0	No
1,1-Dichloropropene	1	0	Yes	3.0E-03	3.0E-03	2.2E+01	0	No
1,2,3-Trichlorobenzene	1	0	Yes	7.6E-03	7.6E-03	2.0E+01	0	No
1,2,3-Trichloropropane	1	0	Yes	1.5E-02	1.5E-02	1.2E+01	0	No
1,2,4-Trichlorobenzene	8	0	Yes	7.6E-03	3.0E+00	2.0E+01	0	No
1,2,4-Trimethylbenzene	11	0	Yes	3.0E-03	4.1E-02	1.3E+02	0	No
1,2-Dibromo-3-chloropropane	11	0	Yes	7.6E-03	4.1E-02	2.2E+01	0	No
1,2-Dibromoethane	1	0	Yes	3.0E-03	3.0E-03	2.5E+01	0	No
1,2-Dichlorobenzene	18	0	Yes	3.0E-03	3.0E+00	3.7E+02	0	No
1,2-Dichloroethane	17	0	Yes	3.0E-03	1.1E-02	7.6E+01	0	No
1,2-Dichloropropane	17	0	Yes	3.0E-03	1.1E-02	2.5E+01	0	No
1,3,5-Trimethylbenzene	11	0	Yes	3.0E-03	4.1E-02	1.3E+02	0	No
1,3-Dichlorobenzene	18	0	Yes	3.0E-03	3.0E+00	3.2E+02	0	No
1,4-Dichlorobenzene	18	0	Yes	3.0E-03	3.0E+00	2.0E+01	0	No
2-Butanone	17	6	No			7.6E+03	0	No
2-Chloroethylvinylether	11	0	Yes	7.6E-03	1.0E-01	7.3E-01	0	No
2-Chlorotoluene	1	0	Yes	7.6E-03	7.6E-03	3.2E+02	0	No
2-Hexanone	7	0	Yes	1.0E-02	1.5E-02	2.4E+03	0	No
4-Chlorotoluene	1	0	Yes	7.6E-03	7.6E-03	3.2E+02	0	No
4-Methyl-2-pentanone	7	0	Yes	7.6E-03	1.0E-02	2.4E+03	0	No

Comparison of Sample Quantitation Limits in Soil (0-4 feet bgs) Against Ecological Screening Levels
Old Conservation Yard RFI Site

Chemical	Number of Samples	Percent Frequency of Detection	Frequency of Detection Between 0% and 5% ?	Minimum SQL for Chemicals Never Detected or Detected at Frequency of < 5% (mg/kg)	Maximum SQL for Chemicals Never Detected or Detected at Frequency of < 5% (mg/kg)	Lowest ESL (mg/kg)	Percentage of SQLs Exceeding ESL	Greater than 50% of SQLs Exceeds ESL ?
Acetone	17	18	No			4.3E+01	0	No
Benzene	17	0	Yes	3.0E-03	1.1E-02	4.3E+00	0	No
Bromobenzene	1	0	Yes	7.6E-03	7.6E-03	4.3E+00	0	No
Bromodichloromethane	17	0	Yes	3.0E-03	1.1E-02	1.5E+01	0	No
Bromoform	17	0	Yes	5.0E-03	2.2E-02	3.8E+01	0	No
Bromomethane	17	0	Yes	7.6E-03	1.0E-01	2.5E+01	0	No
Carbon disulfide	6	0	Yes	5.0E-03	5.0E-03	4.7E+01	0	No
Carbon tetrachloride	17	0	Yes	5.0E-03	1.1E-02	1.5E+00	0	No
Chlorobenzene	17	0	Yes	3.0E-03	1.1E-02	4.0E+01	0	No
Chloroethane	17	0	Yes	7.6E-03	2.1E-02	7.3E+01	0	No
Chloroform	17	0	Yes	3.0E-03	2.2E-02	2.4E-01	0	No
Chloromethane	17	0	Yes	7.6E-03	2.1E-02	2.5E+01	0	No
Chlorotrifluoroethene	10	0	Yes	2.1E-02	4.1E-02	1.6E+01	0	No
cis-1,2-Dichloroethene	11	0	Yes	3.0E-03	1.1E-02	6.8E+01	0	No
cis-1,3-Dichloropropene	17	0	Yes	3.0E-03	1.1E-02	2.2E+01	0	No
Dibromochloromethane	7	0	Yes	3.0E-03	5.0E-03	4.6E+01	0	No
Dibromomethane	1	0	Yes	3.0E-03	3.0E-03	2.5E+01	0	No
Dichlorodifluoromethane	11	0	Yes	7.6E-03	2.1E-02	6.4E+01	0	No
Ethylbenzene	17	0	Yes	3.0E-03	1.1E-02	2.1E+02	0	No
Isopropylbenzene	1	0	Yes	3.0E-03	3.0E-03	4.1E+02	0	No
m,p-Xylene	11	0	Yes	3.0E-03	1.1E-02	1.3E+02	0	No
Methyl tert-butyl ether	1	0	Yes	7.6E-03	7.6E-03	6.1E+01	0	No
Methylene chloride	17	24	No			2.5E+01	0	No
n-Butylbenzene	1	0	Yes	7.6E-03	7.6E-03	4.1E+02	0	No
n-Propylbenzene	1	0	Yes	3.0E-03	3.0E-03	4.1E+02	0	No
o-Xylene	11	0	Yes	3.0E-03	1.1E-02	1.3E+02	0	No
sec-Butylbenzene	1	0	Yes	7.6E-03	7.6E-03	4.1E+02	0	No
Styrene	7	0	Yes	3.0E-03	5.0E-03	6.4E+02	0	No
tert-Butylbenzene	1	0	Yes	7.6E-03	7.6E-03	4.1E+02	0	No
Tetrachloroethene	17	0	Yes	3.0E-03	1.1E-02	2.1E+00	0	No
Toluene	17	18	No			2.5E+00	0	No
trans-1,2-Dichloroethene	11	0	Yes	3.0E-03	1.1E-02	9.7E+02	0	No
trans-1,3-Dichloropropene	17	0	Yes	3.0E-03	1.1E-02	4.4E+00	0	No
Trichloroethene	17	0	Yes	3.0E-03	1.1E-02	3.0E+00	0	No
Trichlorofluoromethane	11	0	Yes	5.0E-03	1.1E-02	3.0E+02	0	No
Vinyl acetate	6	0	Yes	1.0E-02	1.0E-02	5.0E+02	0	No
Vinyl chloride	17	0	Yes	3.0E-03	2.1E-02	7.3E-01	0	No
SVOCs								
2,4,5-Trichlorophenol	7	0	Yes	2.0E-01	2.0E+01	9.0E+00	14	No
2,4,6-Trichlorophenol	7	0	Yes	2.0E-02	3.0E+00	1.0E+01	0	No
2,4-Dichlorophenol	7	0	Yes	2.0E-02	3.0E+00	1.3E+00	14	No
2,4-Dimethylphenol	7	0	Yes	3.0E-02	3.0E+00	1.1E+02	0	No
2,4-Dinitrophenol	7	0	Yes	2.0E-01	2.0E+01	5.9E-01	71	Yes
2,4-Dinitrotoluene	7	0	Yes	3.0E-02	3.0E+00	1.3E+00	14	No
2,6-Dinitrotoluene	7	0	Yes	3.0E-02	3.0E+00	2.5E+00	14	No
2-Chloronaphthalene	7	0	Yes	3.0E-02	3.0E+00	5.3E+02	0	No
2-Chlorophenol	7	0	Yes	3.0E-02	3.0E+00	2.1E+01	0	No
2-Methylnaphthalene	38	21	No			2.1E+02	0	No
2-Methylphenol	7	0	Yes	3.0E-02	3.0E+00	1.1E+02	0	No

Comparison of Sample Quantitation Limits in Soil (0-4 feet bgs) Against Ecological Screening Levels
Old Conservation Yard RFI Site

Chemical	Number of Samples	Percent Frequency of Detection	Frequency of Detection Between 0% and 5% ?	Minimum SQL for Chemicals Never Detected or Detected at Frequency of < 5% (mg/kg)	Maximum SQL for Chemicals Never Detected or Detected at Frequency of < 5% (mg/kg)	Lowest ESL (mg/kg)	Percentage of SQLs Exceeding ESL	Greater than 50% of SQLs Exceeds ESL ?
2-Nitroaniline	7	0	Yes	9.9E-02	2.0E+01	2.3E+01	0	No
2-Nitrophenol	7	0	Yes	3.0E-02	3.0E+00	2.3E+01	0	No
4-Methylphenol	7	0	Yes	3.0E-02	3.0E+00	4.3E+00	0	No
3,3'-Dichlorobenzidine	7	0	Yes	6.0E-02	6.0E+00	1.3E+00	14	No
3-Nitroaniline	7	0	Yes	9.9E-02	2.0E+01	5.9E+00	14	No
4,6-Dinitro-2-methylphenol	7	0	Yes	2.0E-01	2.0E+01	2.3E+01	0	No
4-Bromophenyl phenyl ether	7	0	Yes	3.0E-02	3.0E+00	4.3E+00	0	No
4-Chloro-3-methylphenol	7	0	Yes	2.0E-02	3.0E+00	2.1E+01	0	No
4-Chloroaniline	7	0	Yes	2.0E-02	3.0E+00	4.4E+00	0	No
4-Chlorophenyl phenyl ether	7	0	Yes	3.0E-02	3.0E+00	1.3E+00	14	No
4-Nitroaniline	7	0	Yes	2.0E-01	2.0E+01	3.3E+00	14	No
4-Nitrophenol	7	0	Yes	2.0E-01	2.0E+01	7.0E+00	14	No
Acenaphthene	53	6	No			2.5E+00	2	No
Acenaphthylene	53	2	Yes	2.0E-03	3.2E+00	7.5E+02	0	No
Aniline	6	0	Yes	3.0E-02	3.0E+00	5.3E+01	0	No
Anthracene	53	9	No			2.4E+00	0	No
Benzo(a)anthracene	53	28	No			1.4E+00	3	No
Benzo(a)pyrene	53	15	No			5.6E+00	0	No
Benzo(b)fluoranthene	53	19	No			4.4E+00	0	No
Benzo(g,h,i)perylene	53	13	No			6.4E+00	0	No
Benzo(k)fluoranthene	53	17	No			5.8E+00	0	No
Benzoic acid	6	0	Yes	2.0E-01	2.0E+01	4.4E+00	17	No
Benzyl alcohol	7	0	Yes	3.0E-02	3.0E+00	4.4E+00	0	No
bis(2-Chloroethoxy)methane	7	0	Yes	3.0E-02	3.0E+00	1.5E+02	0	No
bis(2-Chloroethyl)ether	7	0	Yes	3.0E-02	3.0E+00	1.5E+02	0	No
bis(2-Chloroisopropyl) ether	7	0	Yes	3.0E-02	3.0E+00	1.5E+02	0	No
bis(2-Ethylhexyl)phthalate	23	0	Yes	3.0E-02	1.1E+01	4.9E+00	9	No
Butyl benzyl phthalate	7	0	Yes	3.0E-02	3.0E+00	3.4E+02	0	No
Chrysene	53	26	No			2.4E+00	0	No
Dibenz(a,h)anthracene	53	9	No			5.6E+00	0	No
Dibenzofuran	7	0	Yes	3.0E-02	3.0E+00	6.2E+01	0	No
Diethylphthalate	23	0	Yes	4.0E-03	1.1E+01	6.9E+03	0	No
Dimethyl phthalate	7	0	Yes	3.0E-02	3.0E+00	2.0E+02	0	No
Di-n-butylphthalate	23	0	Yes	3.0E-02	1.1E+01	4.9E-01	35	No
Di-n-octyl phthalate	7	0	Yes	3.0E-02	3.0E+00	1.5E+03	0	No
Fluoranthene	53	28	No			3.8E+01	0	No
Fluorene	53	2	Yes	3.0E-03	3.2E+00	1.6E+00	4	No
Hexachlorobenzene	7	0	Yes	3.0E-02	3.0E+00	3.4E-01	14	No
Hexachlorobutadiene	8	0	Yes	7.6E-03	3.0E+00	8.5E-01	13	No
Hexachlorocyclopentadiene	7	0	Yes	2.0E-02	3.0E+00	1.3E+01	0	No
Hexachloroethane	7	0	Yes	3.0E-02	3.0E+00	2.1E+00	14	No
Indeno(1,2,3-cd)pyrene	53	9	No			5.8E+00	0	No
Isophorone	7	0	Yes	3.0E-02	3.0E+00	4.8E+02	0	No
Naphthalene	54	17	No			2.1E+02	0	No
Nitrobenzene	7	0	Yes	3.0E-02	3.0E+00	2.0E+00	14	No
N-Nitrosodimethylamine	25	0	Yes	2.0E-03	3.0E+00	5.6E+01	0	No
N-Nitrosodi-n-propylamine	7	0	Yes	3.0E-02	3.0E+00	5.6E+01	0	No
N-Nitrosodiphenylamine	22	0	Yes	3.0E-02	3.2E+00	2.0E+01	0	No
Pentachlorophenol	7	0	Yes	2.0E-01	2.0E+01	6.0E+00	14	No

Comparison of Sample Quantitation Limits in Soil (0-4 feet bgs) Against Ecological Screening Levels
Old Conservation Yard RFI Site

Chemical	Number of Samples	Percent Frequency of Detection	Frequency of Detection Between 0% and 5% ?	Minimum SQL for Chemicals Never Detected or Detected at Frequency of < 5% (mg/kg)	Maximum SQL for Chemicals Never Detected or Detected at Frequency of < 5% (mg/kg)	Lowest ESL (mg/kg)	Percentage of SQLs Exceeding ESL	Greater than 50% of SQLs Exceeds ESL ?
Phenanthrene	53	23	No			1.3E+00	4	No
Phenol	7	0	Yes	3.0E-02	3.0E+00	5.0E+00	0	No
Pyrene	53	28	No			1.8E+01	0	No
Total Petroleum Hydrocarbons								
C08-C11(Gasoline Range)	65	8	No			NA	-	No
C11-C14(Kerosene Range)	59	3	Yes	5.2E+00	1.4E+02	NA	-	No
C14-C20(Diesel Range)	65	29	No			NA	-	No
C20-C30(Lubricant Oil Range)	59	46	No			NA	-	No
PCDD/PCDFs								
2,3,7,8-TCDD	14	36	No			4.3E-06	0	No
1,2,3,7,8-PeCDD	14	71	No			4.4E-06	0	No
1,2,3,4,7,8-HxCDD	14	86	No			4.5E-05	0	No
1,2,3,6,7,8-HxCDD	14	93	No			1.1E-04	0	No
1,2,3,7,8,9-HxCDD	14	86	No			4.3E-05	0	No
1,2,3,4,6,7,8-HpCDD	14	100	No			9.6E-04	0	No
OCDD	14	100	No			1.2E-01	0	No
2,3,7,8-TCDF	14	86	No			4.4E-06	0	No
1,2,3,7,8-PeCDF	14	64	No			1.0E-04	0	No
2,3,4,7,8-PeCDF	14	86	No			9.8E-06	0	No
1,2,3,4,7,8-HxCDF	14	93	No			4.7E-05	0	No
1,2,3,6,7,8-HxCDF	14	57	No			5.4E-05	43	No
2,3,4,6,7,8-HxCDF	14	93	No			4.9E-05	0	No
1,2,3,7,8,9-HxCDF	14	57	No			4.3E-05	0	No
1,2,3,4,6,7,8-HpCDF	14	100	No			1.1E-03	0	No
1,2,3,4,7,8,9-HpCDF	14	79	No			4.3E-04	0	No
OCDF	14	93	No			9.7E-02	0	No
PCBs								
Aroclor-1016	51	0	Yes	3.5E-02	8.6E+01	5.9E+00	4	No
Aroclor-1221	51	0	Yes	5.1E-02	8.6E+01	5.9E+00	4	No
Aroclor-1232	51	0	Yes	3.5E-02	8.6E+01	2.9E-01	35	No
Aroclor-1242	51	0	Yes	3.5E-02	8.6E+01	2.9E-01	35	No
Aroclor-1248	51	20	No			6.0E-02	71	Yes
Aroclor-1254	51	25	No			2.9E-01	24	No
Aroclor-1260	51	18	No			2.9E-01	59	Yes

Notes:
VOC - volatile organic chemicals
SVOC - semivolatile organic chemicals
PCDD/PDDFs - polychlorinated dibenzo-p-dioxins and dibenzofurans
PCBs - polychlorinated biphenyls
SQL - sample quantitation limit
ESL - ecological screening level
mg/kg - milligrams per kilogram
bgs- below ground surface

Comparison of Sample Quantitation Limits in Soil (0-2 feet bgs) Against Ecological Screening Levels
Old Conservation Yard RFI Site

Chemical	Number of Samples	Percent Frequency of Detection	Frequency of Detection Between 0% and 5% ?	Minimum SQL for Chemicals Never Detected or Detected at Frequency of < 5% (mg/kg)	Maximum SQL for Chemicals Never Detected or Detected at Frequency of < 5% (mg/kg)	Lowest ESL (mg/kg)	Percentage of SQLs Exceeding ESL	Greater than 50% of SQLs Exceeds ESL ?
Inorganic Compounds								
Aluminum	47	100	No			1.2E+01	0	No
Antimony	40	13	No			9.5E-02	83	Yes
Arsenic	52	77	No			1.9E+00	48	No
Barium	52	100	No			1.5E+01	0	No
Beryllium	52	87	No			5.1E+00	0	No
Boron	47	34	No			9.2E+00	100	Yes
Cadmium	52	69	No			2.1E-02	100	Yes
Chromium	52	100	No			9.3E+02	0	No
Hexavalent chromium	1	0	Yes	2.0E-01	2.0E-01	2.0E-01	0	No
Cobalt	52	98	No			9.0E+00	0	No
Copper	52	100	No			1.1E+00	0	No
Lead	52	96	No			6.3E-02	100	Yes
Manganese	5	100	No			7.2E+01	0	No
Mercury	52	67	No			1.0E-01	25	No
Molybdenum	52	44	No			1.1E-01	100	Yes
Nickel	52	94	No			1.0E-01	100	Yes
Selenium	48	6	No			1.7E-01	94	Yes
Silver	54	72	No			5.4E-01	100	Yes
Thallium	55	69	No			2.9E+00	25	No
Vanadium	52	100	No			1.5E+00	0	No
Zinc	52	100	No			2.1E+01	0	No
VOCs								
1,1,1,2-Tetrachloroethane	10	0	Yes	7.6E-03	4.1E-02	7.6E+01	0	No
1,1,1-Trichloroethane	15	0	Yes	3.0E-03	1.1E-02	4.3E+03	0	No
1,1,2,2-Tetrachloroethane	15	0	Yes	3.0E-03	1.1E-02	6.0E+00	0	No
1,1,2-Trichloro-1,2,2-trifluoroetha	10	0	Yes	7.6E-03	4.1E-02	2.1E+02	0	No
1,1,2-Trichloroethane	15	0	Yes	3.0E-03	1.1E-02	8.3E+00	0	No
1,1-Dichloroethane	15	0	Yes	3.0E-03	1.1E-02	2.1E+02	0	No
1,1-Dichloroethene	15	0	Yes	5.0E-03	1.1E-02	2.9E-01	0	No
1,1-Dichloropropene	1	0	Yes	3.0E-03	3.0E-03	2.2E+01	0	No
1,2,3-Trichlorobenzene	1	0	Yes	7.6E-03	7.6E-03	2.0E+01	0	No
1,2,3-Trichloropropane	1	0	Yes	1.5E-02	1.5E-02	1.2E+01	0	No
1,2,4-Trichlorobenzene	7	0	Yes	7.6E-03	3.0E-01	2.0E+01	0	No
1,2,4-Trimethylbenzene	10	0	Yes	3.0E-03	4.1E-02	1.3E+02	0	No
1,2-Dibromo-3-chloropropane	10	0	Yes	7.6E-03	4.1E-02	2.2E+01	0	No
1,2-Dibromoethane	1	0	Yes	3.0E-03	3.0E-03	2.5E+01	0	No
1,2-Dichlorobenzene	16	0	Yes	3.0E-03	3.0E-01	3.7E+02	0	No
1,2-Dichloroethane	15	0	Yes	3.0E-03	1.1E-02	7.6E+01	0	No
1,2-Dichloroethene (total)	5	0	Yes	5.0E-03	5.0E-03	6.8E+01	0	No
1,2-Dichloropropane	15	0	Yes	3.0E-03	1.1E-02	2.5E+01	0	No
1,3,5-Trimethylbenzene	10	0	Yes	3.0E-03	4.1E-02	1.3E+02	0	No
1,3-Dichlorobenzene	16	0	Yes	3.0E-03	3.0E-01	3.2E+02	0	No
1,4-Dichlorobenzene	16	0	Yes	3.0E-03	3.0E-01	2.0E+01	0	No
2-Butanone	15	7	No			7.6E+03	0	No
2-Chloroethylvinylether	10	0	Yes	7.6E-03	1.0E-01	7.3E-01	0	No
2-Chlorotoluene	1	0	Yes	7.6E-03	7.6E-03	3.2E+02	0	No
2-Chloro-1,1,1-trifluoroethane	9	0	Yes	2.1E-02	4.1E-02	NA	-	No
2-Hexanone	6	0	Yes	1.0E-02	1.5E-02	2.4E+03	0	No

Comparison of Sample Quantitation Limits in Soil (0-2 feet bgs) Against Ecological Screening Levels
Old Conservation Yard RFI Site

Chemical	Number of Samples	Percent Frequency of Detection	Frequency of Detection Between 0% and 5% ?	Minimum SQL for Chemicals Never Detected or Detected at Frequency of < 5% (mg/kg)	Maximum SQL for Chemicals Never Detected or Detected at Frequency of < 5% (mg/kg)	Lowest ESL (mg/kg)	Percentage of SQLs Exceeding ESL	Greater than 50% of SQLs Exceeds ESL ?
4-Chlorotoluene	1	0	Yes	7.6E-03	7.6E-03	3.2E+02	0	No
4-Methyl-2-pentanone	6	0	Yes	7.6E-03	1.0E-02	2.4E+03	0	No
Acetone	15	13	No			4.3E+01	0	No
Benzene	15	0	Yes	3.0E-03	1.1E-02	4.3E+00	0	No
Bromobenzene	1	0	Yes	7.6E-03	7.6E-03	4.3E+00	0	No
Bromodichloromethane	15	0	Yes	3.0E-03	1.1E-02	1.5E+01	0	No
Bromoform	15	0	Yes	5.0E-03	2.2E-02	3.8E+01	0	No
Bromomethane	15	0	Yes	7.6E-03	1.0E-01	2.5E+01	0	No
Carbon disulfide	5	0	Yes	5.0E-03	5.0E-03	4.7E+01	0	No
Carbon tetrachloride	15	0	Yes	5.0E-03	1.1E-02	1.5E+00	0	No
Chlorobenzene	15	0	Yes	3.0E-03	1.1E-02	4.0E+01	0	No
Chloroethane	15	0	Yes	7.6E-03	2.1E-02	7.3E+01	0	No
Chloroform	15	0	Yes	3.0E-03	2.2E-02	2.4E-01	0	No
Chloromethane	15	0	Yes	7.6E-03	2.1E-02	2.5E+01	0	No
Chlorotrifluoroethene	9	0	Yes	2.1E-02	4.1E-02	1.6E+01	0	No
cis-1,2-Dichloroethene	10	0	Yes	3.0E-03	1.1E-02	6.8E+01	0	No
cis-1,3-Dichloropropene	15	0	Yes	3.0E-03	1.1E-02	2.2E+01	0	No
Dibromochloromethane	6	0	Yes	3.0E-03	5.0E-03	4.6E+01	0	No
Dibromomethane	1	0	Yes	3.0E-03	3.0E-03	2.5E+01	0	No
Dichlorodifluoromethane	10	0	Yes	7.6E-03	2.1E-02	6.4E+01	0	No
Ethylbenzene	15	0	Yes	3.0E-03	1.1E-02	2.1E+02	0	No
Isopropylbenzene	1	0	Yes	3.0E-03	3.0E-03	4.1E+02	0	No
m,p-Xylene	10	0	Yes	3.0E-03	1.1E-02	1.3E+02	0	No
Methyl tert-butyl ether	1	0	Yes	7.6E-03	7.6E-03	6.1E+01	0	No
Methylene chloride	15	20	No			2.5E+01	0	No
n-Butylbenzene	1	0	Yes	7.6E-03	7.6E-03	4.1E+02	0	No
n-Propylbenzene	1	0	Yes	3.0E-03	3.0E-03	4.1E+02	0	No
o-Xylene	10	0	Yes	3.0E-03	1.1E-02	1.3E+02	0	No
p-Isopropyltoluene	-	-	No			1.3E+02	-	No
sec-Butylbenzene	1	0	Yes	7.6E-03	7.6E-03	4.1E+02	0	No
Styrene	6	0	Yes	3.0E-03	5.0E-03	6.4E+02	0	No
tert-Butylbenzene	1	0	Yes	7.6E-03	7.6E-03	4.1E+02	0	No
Tetrachloroethene	15	0	Yes	3.0E-03	1.1E-02	2.1E+00	0	No
Toluene	15	20	No			2.5E+00	0	No
trans-1,2-Dichloroethene	10	0	Yes	3.0E-03	1.1E-02	9.7E+02	0	No
trans-1,3-Dichloropropene	15	0	Yes	3.0E-03	1.1E-02	4.4E+00	0	No
Trichloroethene	15	0	Yes	3.0E-03	1.1E-02	3.0E+00	0	No
Trichlorofluoromethane	10	0	Yes	5.0E-03	1.1E-02	3.0E+02	0	No
Vinyl acetate	5	0	Yes	1.0E-02	1.0E-02	5.0E+02	0	No
Vinyl chloride	15	0	Yes	3.0E-03	2.1E-02	7.3E-01	0	No
Xylenes (total)	5	40	No			1.3E+02	0	No
SVOCs								
1-Methylnaphthalene	24	8	No			2.1E+02	0	No
2,4,5-Trichlorophenol	6	0	Yes	2.0E-01	2.0E+00	9.0E+00	0	No
2,4,6-Trichlorophenol	6	0	Yes	2.0E-02	3.3E-01	1.0E+01	0	No
2,4-Dichlorophenol	6	0	Yes	2.0E-02	3.0E-01	1.3E+00	0	No
2,4-Dimethylphenol	6	0	Yes	3.0E-02	3.0E-01	1.1E+02	0	No
2,4-Dinitrophenol	6	0	Yes	2.0E-01	2.0E+00	5.9E-01	50	No
2,4-Dinitrotoluene	6	0	Yes	3.0E-02	3.0E-01	1.3E+00	0	No

Comparison of Sample Quantitation Limits in Soil (0-2 feet bgs) Against Ecological Screening Levels
Old Conservation Yard RFI Site

Chemical	Number of Samples	Percent Frequency of Detection	Frequency of Detection Between 0% and 5% ?	Minimum SQL for Chemicals Never Detected or Detected at Frequency of < 5% (mg/kg)	Maximum SQL for Chemicals Never Detected or Detected at Frequency of < 5% (mg/kg)	Lowest ESL (mg/kg)	Percentage of SQLs Exceeding ESL	Greater than 50% of SQLs Exceeds ESL ?
2,6-Dinitrotoluene	6	0	Yes	3.0E-02	3.0E-01	2.5E+00	0	No
2-Chloronaphthalene	6	0	Yes	3.0E-02	3.0E-01	5.3E+02	0	No
2-Chlorophenol	6	0	Yes	3.0E-02	3.0E-01	2.1E+01	0	No
2-Methylnaphthalene	36	19	No			2.1E+02	0	No
2-Methylphenol	6	0	Yes	3.0E-02	3.0E-01	1.1E+02	0	No
2-Nitroaniline	6	0	Yes	9.9E-02	2.0E+00	2.3E+01	0	No
2-Nitrophenol	6	0	Yes	3.0E-02	3.0E-01	2.3E+01	0	No
4-Methylphenol	6	0	Yes	3.0E-02	3.0E-01	4.3E+00	0	No
3,3'-Dichlorobenzidine	6	0	Yes	6.0E-02	6.0E-01	1.3E+00	0	No
3-Nitroaniline	6	0	Yes	9.9E-02	2.0E+00	5.9E+00	0	No
4,6-Dinitro-2-methylphenol	6	0	Yes	2.0E-01	2.0E+00	2.3E+01	0	No
4-Bromophenyl phenyl ether	6	0	Yes	3.0E-02	3.0E-01	4.3E+00	0	No
4-Chloro-3-methylphenol	6	0	Yes	2.0E-02	3.0E-01	2.1E+01	0	No
4-Chloroaniline	6	0	Yes	2.0E-02	3.0E-01	4.4E+00	0	No
4-Chlorophenyl phenyl ether	6	0	Yes	3.0E-02	3.0E-01	1.3E+00	0	No
4-Nitroaniline	6	0	Yes	2.0E-01	2.0E+00	3.3E+00	0	No
4-Nitrophenol	6	0	Yes	2.0E-01	2.0E+00	7.0E+00	0	No
Acenaphthene	49	6	No			2.5E+00	0	No
Acenaphthylene	49	2	Yes	2.0E-03	3.2E+00	7.5E+02	0	No
Aniline	5	0	Yes	3.0E-02	3.0E-01	5.3E+01	0	No
Anthracene	49	8	No			2.4E+00	0	No
Benzidine	5	0	Yes	2.0E-01	2.0E+00	2.3E+00	0	No
Benzo(a)anthracene	49	29	No			1.4E+00	100	Yes
Benzo(a)pyrene	49	16	No			5.6E+00	0	No
Benzo(b)fluoranthene	49	18	No			4.4E+00	0	No
Benzo(g,h,i)perylene	49	14	No			6.4E+00	0	No
Benzo(k)fluoranthene	49	16	No			5.8E+00	0	No
Benzoic acid	5	0	Yes	2.0E-01	2.0E+00	4.4E+00	0	No
Benzyl alcohol	6	0	Yes	3.0E-02	3.0E-01	4.4E+00	0	No
bis(2-Chloroethoxy)methane	6	0	Yes	3.0E-02	3.0E-01	1.5E+02	0	No
bis(2-Chloroethyl)ether	6	0	Yes	3.0E-02	3.0E-01	1.5E+02	0	No
bis(2-Chloroisopropyl) ether	6	0	Yes	3.0E-02	3.0E-01	1.5E+02	0	No
bis(2-Ethylhexyl)phthalate	19	0	Yes	3.0E-02	1.1E+01	4.9E+00	11	No
Butyl benzyl phthalate	6	0	Yes	3.0E-02	3.0E-01	3.4E+02	0	No
Chrysene	49	27	No			2.4E+00	0	No
Dibenz(a,h)anthracene	49	10	No			5.6E+00	0	No
Dibenzofuran	6	0	Yes	3.0E-02	3.0E-01	6.2E+01	0	No
Diethylphthalate	19	0	Yes	4.0E-03	1.1E+01	6.9E+03	0	No
Dimethyl phthalate	6	0	Yes	3.0E-02	3.0E-01	2.0E+02	0	No
Di-n-butylphthalate	19	0	Yes	3.0E-02	1.1E+01	4.9E-01	32	No
Di-n-octyl phthalate	6	0	Yes	3.0E-02	3.0E-01	1.5E+03	0	No
Fluoranthene	49	29	No			3.8E+01	0	No
Fluorene	49	2	Yes	3.0E-03	3.2E+00	1.6E+00	2	No
Hexachlorobenzene	6	0	Yes	3.0E-02	3.0E-01	3.4E-01	0	No
Hexachlorobutadiene	7	0	Yes	7.6E-03	3.0E-01	8.5E-01	0	No
Hexachlorocyclopentadiene	6	0	Yes	2.0E-02	1.6E+00	1.3E+01	0	No
Hexachloroethane	6	0	Yes	3.0E-02	3.0E-01	2.1E+00	0	No
Indeno(1,2,3-cd)pyrene	49	10	No			5.8E+00	0	No
Isophorone	6	0	Yes	3.0E-02	3.0E-01	4.8E+02	0	No

Comparison of Sample Quantitation Limits in Soil (0-2 feet bgs) Against Ecological Screening Levels
Old Conservation Yard RFI Site

Chemical	Number of Samples	Percent Frequency of Detection	Frequency of Detection Between 0% and 5% ?	Minimum SQL for Chemicals Never Detected or Detected at Frequency of < 5% (mg/kg)	Maximum SQL for Chemicals Never Detected or Detected at Frequency of < 5% (mg/kg)	Lowest ESL (mg/kg)	Percentage of SQLs Exceeding ESL	Greater than 50% of SQLs Exceeds ESL ?
Naphthalene	50	16	No			2.1E+02	0	No
Nitrobenzene	6	0	Yes	3.0E-02	3.0E-01	2.0E+00	0	No
N-Nitrosodimethylamine	21	0	Yes	2.0E-03	3.0E-01	5.6E+01	0	No
N-Nitrosodi-n-propylamine	6	0	Yes	3.0E-02	3.0E-01	5.6E+01	0	No
N-Nitrosodiphenylamine	19	0	Yes	3.0E-02	3.2E+00	2.0E+01	0	No
Pentachlorophenol	6	0	Yes	2.0E-01	2.0E+00	6.0E+00	0	No
Phenanthrene	49	22	No			1.3E+00	2	No
Phenol	6	0	Yes	3.0E-02	3.0E-01	5.0E+00	0	No
Pyrene	49	29	No			1.8E+01	0	No
Total Petroleum Hydrocarbons								
C08-C11(Gasoline Range)	57	9	No			NA	-	No
C11-C14(Kerosene Range)	52	4	Yes	5.2E+00	1.4E+02	NA	-	No
C14-C20(Diesel Range)	57	33	No			NA	-	No
C20-C30(Lubricant Oil Range)	52	50	No			NA	-	No
PCDD/PCDFs								
2,3,7,8-TCDD	13	31	No			4.3E-06	0	No
1,2,3,7,8-PeCDD	13	69	No			4.4E-06	0	No
1,2,3,4,7,8-HxCDD	13	85	No			4.5E-05	0	No
1,2,3,6,7,8-HxCDD	13	92	No			1.1E-04	0	No
1,2,3,7,8,9-HxCDD	13	85	No			4.3E-05	0	No
1,2,3,4,6,7,8-HpCDD	13	100	No			9.6E-04	0	No
OCDD	13	100	No			1.2E-01	0	No
2,3,7,8-TCDF	13	85	No			4.4E-06	0	No
1,2,3,7,8-PeCDF	13	62	No			1.0E-04	0	No
2,3,4,7,8-PeCDF	13	85	No			9.8E-06	0	No
1,2,3,4,7,8-HxCDF	13	92	No			4.7E-05	0	No
1,2,3,6,7,8-HxCDF	13	62	No			5.4E-05	0	No
2,3,4,6,7,8-HxCDF	13	92	No			4.9E-05	0	No
1,2,3,7,8,9-HxCDF	13	54	No			4.3E-05	0	No
1,2,3,4,6,7,8-HpCDF	13	100	No			1.1E-03	0	No
1,2,3,4,7,8,9-HpCDF	13	77	No			4.3E-04	0	No
OCDF	13	92	No			9.7E-02	0	No
PCBs								
Aroclor-1016	48	0	Yes	3.5E-02	8.6E+01	5.9E+00	100	Yes
Aroclor-1221	48	0	Yes	5.1E-02	8.6E+01	5.9E+00	100	Yes
Aroclor-1232	48	0	Yes	3.5E-02	8.6E+01	2.9E-01	100	Yes
Aroclor-1242	48	0	Yes	3.5E-02	8.6E+01	2.9E-01	100	Yes
Aroclor-1248	48	21	No			6.0E-02	100	Yes
Aroclor-1254	48	27	No			2.9E-01	100	Yes
Aroclor-1260	48	19	No			2.9E-01	100	Yes

Notes:
VOC - volatile organic chemicals
SVOC - semivolatile organic chemicals
PCDD/PDDFs - polychlorinated dibenzo-p-dioxins and dibenzofurans
PCBs - polychlorinated biphenyls
SQL - sample quantitation limit
ESL - ecological screening level
mg/kg - milligrams per kilogram
bgs- below ground surface

Selection of Chemicals of Potential Ecological Concern in Soil Vapor (0-6 feet bgs)
Old Conservation Yard RFI Site

Chemical	Number of Samples	Number of Detects	Precent Frequency of Detection	Maximum Detected Concentration (ug/L)	Chemical Detected in Laboratory Blanks[a]	CPEC
1,1,1-Trichloroethane	14	1	7	2	No	Yes
1,1,2-Trichloro-1,2,2-trifluoroethane	14	1	7	1.9	No	Yes
1,1-Dichloroethene	14	1	7	1.8	No	Yes
Benzene	14	0	0	0	No	Yes [c]
Ethylbenzene	14	0	0	0	No	Yes [c]
p-Isopropyltoluene	0	0	0	0	No	Yes [b]
Methylene chloride	14	0	0	0	No	Yes [b]
Toluene	14	0	0	0	No	Yes [c]
Trichloroethene	14	1	7	11	No	Yes
m,p-Xylene	14	0	0	0	No	Yes [c]
o-Xylene	14	0	0	0	No	Yes [c]
Xylenes (total)	0	0	0	0	No	Yes [c]

Notes:

a. Any chemical eliminated as COPC due to laboratory blank contamination is discussed in Section 3.0.

b. Selected as a soil vapor COPC since it was detected in soil.

c. Selected as a soil vapor COPC since total petrolum hydrocarbon fraction C08-C11 was detected in soil.

COPC - chemical of potential concern

VOC - volatile organic chemicals

"-" not applicable

ug/L - micrograms per liter vapor by volume.

bgs- below ground surface

Selection of Chemicals of Potential Ecological Concern in Soil (0-6 feet bgs)
Old Conservation Yard RFI Site

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (mg/kg)	Chemical Detected in Laboratory Blanks [a]	WRS Indicates Exceeds Background[b]	Maximum SQL (mg/kg)	SQLs Exceed Background	SQLs Exceed ESLs	Potentially Site Related	CPEC	
Inorganic Compounds												
Aluminum	54	54	100	2.7E+04	No	No		-	No	Yes	No	c
Antimony	47	9	19	1.8E+01	No	No	3.4E-02	-	Yes	Yes	Yes	f,g
Arsenic	60	43	72	6.5E+00	No	No	4.4E+00	-	Yes	Yes	No	c
Barium	60	60	100	1.9E+02	No	No		-	No	Yes	Yes	f,g
Beryllium	60	51	85	1.0E+00	No	No	5.0E-01	-	No	Yes	No	c
Boron	53	19	36	1.2E+01	No	Yes	1.1E+00	-	Yes	Yes	Yes	
Cadmium	60	40	67	3.0E+00	No	Yes	3.0E-02	-	Yes	Yes	Yes	
Chromium	60	60	100	4.5E+01	No	No		-	No	Yes	No	c
Hexavalent chromium	1	0	0	0.0E+00	No	No	2.0E-01	Yes	No	Yes	No	h
Cobalt	60	59	98	1.0E+01	No	No	2.2E+00	-	No	Yes	No	c
Copper	60	60	100	6.0E+01	No	No		-	No	Yes	Yes	f
Lead	61	58	95	1.4E+02	No	No	5.0E+00	-	Yes	Yes	Yes	f,g
Manganese	7	7	100	3.1E+02	No	No		-	No	Yes	No	c
Mercury	60	38	63	2.3E+01	No	No	2.0E-02	-	Yes	Yes	Yes	f,g
Molybdenum	60	23	38	1.6E+00	No	No	2.6E-01	-	Yes	Yes	No	c
Nickel	60	57	95	2.8E+01	No	No	2.5E+00	-	Yes	Yes	No	c
Selenium	54	5	9	4.7E-01	No	No	2.1E-01	-	Yes	Yes	No	c
Silver	63	43	68	7.9E+00	No	Yes	1.0E+00	-	Yes	Yes	Yes	
Thallium	65	43	66	1.7E+00	No	No	1.0E-01	-	Yes	Yes	Yes	f
Vanadium	60	60	100	5.7E+01	No	No		-	No	Yes	No	c
Zinc	60	60	100	7.3E+02	No	No		-	No	Yes	Yes	f
VOCs												
1,1,1,2-Tetrachloroethane	14	0	0	-	No	-	7.6E-03	-	No	Yes	No	
1,1,1-Trichloroethane	20	0	0	-	No	-	3.0E-03	-	No	Yes	Yes	d
1,1,2,2-Tetrachloroethane	20	0	0	-	No	-	3.0E-03	-	No	Yes	No	
1,1,2-Trichloro-1,2,2-trifluoroethane	14	0	0	-	No	-	7.6E-03	-	No	Yes	Yes	d
1,1,2-Trichloroethane	20	0	0	-	No	-	3.0E-03	-	No	Yes	No	
1,1-Dichloroethane	20	0	0	-	No	-	3.0E-03	-	No	Yes	No	
1,1-Dichloroethene	20	0	0	-	No	-	5.0E-03	-	No	Yes	Yes	d
1,1-Dichloropropene	1	0	0	-	No	-	3.0E-03	-	No	Yes	No	
1,2,3-Trichlorobenzene	1	0	0	-	No	-	7.6E-03	-	No	Yes	No	
1,2,3-Trichloropropane	1	0	0	-	No	-	1.5E-02	-	No	Yes	No	
1,2,4-Trichlorobenzene	8	0	0	-	No	-	7.6E-03	-	No	Yes	No	

Selection of Chemicals of Potential Ecological Concern in Soil (0-6 feet bgs)
Old Conservation Yard RFI Site

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (mg/kg)	Chemical Detected in Laboratory Blanks [a]	WRS Indicates Exceeds Background[b]	Maximum SQL (mg/kg)	SQLs Exceed Background	SQLs Exceed ESLs	Potentially Site Related	CPEC
1,2,4-Trimethylbenzene	14	0	0	-	No	-	3.0E-03	-	No	Yes	No
1,2-Dibromo-3-chloropropane	14	0	0	-	No	-	7.6E-03	-	No	Yes	No
1,2-Dibromoethane	1	0	0	-	No	-	3.0E-03	-	No	Yes	No
1,2-Dichlorobenzene	21	0	0	-	No	-	3.0E-03	-	No	Yes	No
1,2-Dichloroethane	20	0	0	-	No	-	3.0E-03	-	No	Yes	No
1,2-Dichloroethene (total)	6	0	0	-	No	-	5.0E-03	-	No	Yes	No
1,2-Dichloropropane	20	0	0	-	No	-	3.0E-03	-	No	Yes	No
1,3,5-Trimethylbenzene	14	0	0	-	No	-	3.0E-03	-	No	Yes	No
1,3-Dichlorobenzene	21	0	0	-	No	-	3.0E-03	-	No	Yes	No
1,3-Dichloropropane	1	0	0	-	No	-	3.0E-03	-	No	Yes	No
1,4-Dichlorobenzene	21	0	0	-	No	-	3.0E-03	-	No	Yes	No
2,2-Dichloropropane	1	0	0	-	No	-	3.0E-03	-	No	Yes	No
2-Butanone	20	1	5	1.1E-02	No	-	1.0E-02	-	No	Yes	Yes
2-Chloroethylvinylether	14	0	0	-	No	-	7.6E-03	-	No	Yes	No
2-Chlorotoluene	1	0	0	-	No	-	7.6E-03	-	No	Yes	No
2-Hexanone	7	0	0	-	No	-	1.0E-02	-	No	Yes	No
4-Chlorotoluene	1	0	0	-	No	-	7.6E-03	-	No	Yes	No
4-Methyl-2-pentanone	7	0	0	-	No	-	7.6E-03	-	No	Yes	No
Acetone	20	4	20	4.8E+00	No	-	1.0E-02		No	Yes	Yes
Benzene	20	0	0	-	No	-	3.0E-03	-	No	Yes	Yes [e]
Bromobenzene	1	0	0	-	No	-	7.6E-03	-	No	Yes	No
Bromochloromethane	1	0	0	-	No	-	7.6E-03	-	No	Yes	No
Bromodichloromethane	20	0	0	-	No	-	3.0E-03	-	No	Yes	No
Bromoform	20	0	0	-	No	-	5.0E-03	-	No	Yes	No
Bromomethane	20	0	0	-	No	-	7.6E-03	-	No	Yes	No
Carbon disulfide	6	0	0	-	No	-	5.0E-03	-	No	Yes	No
Carbon tetrachloride	20	0	0	-	No	-	5.0E-03	-	No	Yes	No
Chlorobenzene	20	0	0	-	No	-	3.0E-03	-	No	Yes	No
Chloroethane	20	0	0	-	No	-	7.6E-03	-	No	Yes	No
Chloroform	20	0	0	-	No	-	3.0E-03	-	No	Yes	No
Chloromethane	20	0	0	-	No	-	7.6E-03	-	No	Yes	No
Chlorotrifluoroethene	13	0	0	-	No	-	2.1E-02	-	No	Yes	No
cis-1,2-Dichloroethene	14	0	0	-	No	-	3.0E-03	-	No	Yes	No
cis-1,3-Dichloropropene	20	0	0	-	No	-	3.0E-03	-	No	Yes	No

Selection of Chemicals of Potential Ecological Concern in Soil (0-6 feet bgs)
Old Conservation Yard RFI Site

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (mg/kg)	Chemical Detected in Laboratory Blanks [a]	WRS Indicates Exceeds Background[b]	Maximum SQL (mg/kg)	SQLs Exceed Background	SQLs Exceed ESLs	Potentially Site Related	CPEC	
Dibromochloromethane	7	0	0	-	No	-	3.0E-03	-	No	Yes	No	
Dibromomethane	1	0	0	-	No	-	3.0E-03	-	No	Yes	No	
Dichlorodifluoromethane	14	0	0	-	No	-	7.6E-03	-	No	Yes	No	
Ethylbenzene	20	0	0	-	No	-	3.0E-03	-	No	Yes	Yes	e
Isopropylbenzene	1	0	0	-	No	-	3.0E-03	-	No	Yes	No	
m,p-Xylene	14	0	0	-	No	-	3.0E-03	-	No	Yes	Yes	e
Methyl tert-butyl ether	1	0	0	-	No	-	7.6E-03	-	No	Yes	No	
Methylene chloride	20	5	25	2.8E-01	No	-	5.0E-03	-	No	Yes	Yes	
n-Butylbenzene	1	0	0	-	No	-	7.6E-03	-	No	Yes	No	
n-Propylbenzene	1	0	0	-	No	-	3.0E-03	-	No	Yes	No	
o-Xylene	14	0	0	-	No	-	3.0E-03	-	No	Yes	Yes	e
p-Isopropyltoluene	1	1	100	1.9E-03	No	-		-	No	Yes	Yes	
sec-Butylbenzene	1	0	0	-	No	-	7.6E-03	-	No	Yes	No	
Styrene	7	0	0	-	No	-	3.0E-03	-	No	Yes	No	
tert-Butylbenzene	1	0	0	-	No	-	7.6E-03	-	No	Yes	No	
Tetrachloroethene	20	0	0	-	No	-	3.0E-03	-	No	Yes	No	
Toluene	20	3	15	1.4E-02	No	-	3.0E-03	-	No	Yes	Yes	
trans-1,2-Dichloroethene	14	0	0	-	No	-	3.0E-03	-	No	Yes	No	
trans-1,3-Dichloropropene	20	0	0	-	No	-	3.0E-03	-	No	Yes	No	
Trichloroethene	20	0	0	-	No	-	3.0E-03	-	No	Yes	Yes	d
Trichlorofluoromethane	14	0	0	-	No	-	5.0E-03	-	No	Yes	No	
Vinyl acetate	6	0	0	-	No	-	1.0E-02	-	No	Yes	No	
Vinyl chloride	20	0	0	-	No	-	3.0E-03	-	No	Yes	No	
Xylenes (total)	6	3	50	1.3E-02	No	-	5.0E-03	-	No	Yes	Yes	
SVOCs												
1-Methylnaphthalene	24	2	8	3.0E-02	No	-	2.0E-02	-	No	Yes	Yes	
2,4,5-Trichlorophenol	7	0	0	-	No	-	2.0E-01	-	Yes	Yes	No	
2,4,6-Trichlorophenol	7	0	0	-	No	-	2.0E-02	-	No	Yes	No	
2,4-Dichlorophenol	7	0	0	-	No	-	2.0E-02	-	Yes	Yes	No	
2,4-Dimethylphenol	7	0	0	-	No	-	3.0E-02	-	No	Yes	No	
2,4-Dinitrophenol	7	0	0	-	No	-	2.0E-01	-	Yes	Yes	Yes	
2,4-Dinitrotoluene	7	0	0	-	No	-	3.0E-02	-	Yes	Yes	No	
2,6-Dinitrotoluene	7	0	0	-	No	-	3.0E-02	-	Yes	Yes	No	
2-Chloronaphthalene	7	0	0	-	No	-	3.0E-02	-	No	Yes	No	

Selection of Chemicals of Potential Ecological Concern in Soil (0-6 feet bgs)
Old Conservation Yard RFI Site

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (mg/kg)	Chemical Detected in Laboratory Blanks [a]	WRS Indicates Exceeds Background[b]	Maximum SQL (mg/kg)	SQLs Exceed Background	SQLs Exceed ESLs	Potentially Site Related	CPEC
2-Chlorophenol	7	0	0	-	No	-	3.0E-02	-	No	Yes	No
2-Methylnaphthalene	40	8	20	2.1E-01	No	-	3.0E-03	-	No	Yes	Yes
2-Methylphenol	7	0	0	-	No	-	3.0E-02	-	No	Yes	No
2-Nitroaniline	7	0	0	-	No	-	9.9E-02	-	No	Yes	No
2-Nitrophenol	7	0	0	-	No	-	3.0E-02	-	No	Yes	No
4-Methylphenol	7	0	0	-	No	-	3.0E-02	-	No	Yes	No
3,3'-Dichlorobenzidine	7	0	0	-	No	-	6.0E-02	-	Yes	Yes	No
3-Nitroaniline	7	0	0	-	No	-	9.9E-02	-	Yes	Yes	No
4,6-Dinitro-2-methylphenol	7	0	0	-	No	-	2.0E-01	-	No	Yes	No
4-Bromophenyl phenyl ether	7	0	0	-	No	-	3.0E-02	-	No	Yes	No
4-Chloro-3-methylphenol	7	0	0	-	No	-	2.0E-02	-	No	Yes	No
4-Chloroaniline	7	0	0	-	No	-	2.0E-02	-	No	Yes	No
4-Chlorophenyl phenyl ether	7	0	0	-	No	-	3.0E-02	-	Yes	Yes	No
4-Nitroaniline	7	0	0	-	No	-	2.0E-01	-	Yes	Yes	No
4-Nitrophenol	7	0	0	-	No	-	2.0E-01	-	Yes	Yes	No
Acenaphthene	57	3	5	1.5E-02	No	-	2.0E-03	-	Yes	Yes	Yes
Acenaphthylene	57	1	2	7.0E-03	No	-	2.0E-03	-	No	Yes	Yes [d]
Aniline	6	0	0	-	No	-	3.0E-02	-	No	Yes	No
Anthracene	57	5	9	3.9E-02	No	-	2.0E-03	-	Yes	Yes	Yes
Benzidine	6	0	0	-	No	-	2.0E-01	-	Yes	Yes	No
Benzo(a)anthracene	57	16	28	3.3E-01	No	-	2.0E-03	-	Yes	Yes	Yes
Benzo(a)pyrene	57	9	16	2.6E-01	No	-	2.0E-03	-	No	Yes	Yes
Benzo(b)fluoranthene	57	11	19	4.2E-01	No	-	2.0E-03	-	No	Yes	Yes
Benzo(e)pyrene	1	1	100	1.7E-01	No	-		-	-	Yes	Yes
Benzo(g,h,i)perylene	57	8	14	1.8E-01	No	-	3.0E-03	-	No	Yes	Yes
Benzo(k)fluoranthene	57	10	18	3.0E-01	No	-	3.0E-03	-	No	Yes	Yes
Benzoic acid	6	0	0	-	No	-	2.0E-01	-	Yes	Yes	No
Benzyl alcohol	7	0	0	-	No	-	3.0E-02	-	No	Yes	No
bis(2-Chloroethoxy)methane	7	0	0	-	No	-	3.0E-02	-	No	Yes	No
bis(2-Chloroethyl)ether	7	0	0	-	No	-	3.0E-02	-	No	Yes	No
bis(2-Chloroisopropyl) ether	7	0	0	-	No	-	3.0E-02	-	No	Yes	No
bis(2-Ethylhexyl)phthalate	25	0	0	-	No	-	3.0E-02	-	Yes	Yes	No
Butyl benzyl phthalate	7	0	0	-	No	-	3.0E-02	-	No	Yes	No
Chrysene	57	16	28	5.0E-01	No	-	3.0E-03	-	Yes	Yes	Yes

Selection of Chemicals of Potential Ecological Concern in Soil (0-6 feet bgs)
Old Conservation Yard RFI Site

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (mg/kg)	Chemical Detected in Laboratory Blanks [a]	WRS Indicates Exceeds Background[b]	Maximum SQL (mg/kg)	SQLs Exceed Background	SQLs Exceed ESLs	Potentially Site Related	CPEC
Dibenz(a,h)anthracene	57	5	9	3.3E-02	No	-	3.0E-03	-	No	Yes	Yes
Dibenzofuran	7	0	0	-	No	-	3.0E-02	-	No	Yes	No
Diethylphthalate	25	0	0	-	No	-	4.0E-03	-	No	Yes	No
Dimethyl phthalate	7	0	0	-	No	-	3.0E-02	-	No	Yes	No
Di-n-butylphthalate	25	0	0	-	No	-	3.0E-02	-	Yes	Yes	No
Di-n-octyl phthalate	7	0	0	-	No	-	3.0E-02	-	No	Yes	No
Fluoranthene	57	17	30	2.1E+00	No	-	3.0E-03	-	No	Yes	Yes
Fluorene	57	1	2	6.0E-03	No	-	3.0E-03	-	Yes	Yes	Yes
Hexachlorobenzene	7	0	0	-	No	-	3.0E-02	-	Yes	Yes	No
Hexachlorobutadiene	8	0	0	-	No	-	7.6E-03	-	Yes	Yes	No
Hexachlorocyclopentadiene	7	0	0	-	No	-	2.0E-02	-	No	Yes	No
Hexachloroethane	7	0	0	-	No	-	3.0E-02	-	Yes	Yes	No
Indeno(1,2,3-cd)pyrene	57	6	11	1.1E-01	No	-	3.0E-03	-	No	Yes	Yes
Isophorone	7	0	0	-	No	-	3.0E-02	-	No	Yes	No
Naphthalene	58	9	16	1.5E-01	No	-	3.0E-03	-	No	Yes	Yes
Nitrobenzene	7	0	0	-	No	-	3.0E-02	-	Yes	Yes	No
N-Nitrosodimethylamine	27	0	0	-	No	-	2.0E-03	-	No	Yes	No
N-Nitrosodi-n-propylamine	7	0	0	-	No	-	3.0E-02	-	No	Yes	No
N-Nitrosodiphenylamine	24	0	0	-	No	-	3.0E-02	-	No	Yes	No
Pentachlorophenol	7	0	0	-	No	-	2.0E-01	-	Yes	Yes	No
Perylene	1	1	100	9.8E-02	No	-		-	-	Yes	Yes [d]
Phenanthrene	57	14	25	1.6E+00	No	-	3.0E-03	-	Yes	Yes	Yes
Phenol	7	0	0	-	No	-	3.0E-02	-	No	Yes	No
Pyrene	57	17	30	1.0E+00	No	-	3.0E-03	-	No	Yes	Yes
Total Petroleum Hydrocarbons											
C08-C11(Gasoline Range)	75	5	7	4.2E+01	No	-	1.0E-01	-	-	Yes	Yes
C11-C14(Kerosene Range)	69	2	3	8.9E+01	No	-	3.4E+00	-	-	Yes	Yes
C14-C20(Diesel Range)	75	21	28	1.2E+03	No	-	1.0E-01	-	-	Yes	Yes
C20-C30(Lubricant Oil Range)	69	30	43	8.3E+03	No	-	5.2E+00	-	-	Yes	Yes
C22-C40 (Heavy Oil)	3	2	67	4.0E+03	No	-	1.0E-01	-	-	Yes	Yes
PCDD/PCDFs											
2,3,7,8-TCDD	16	7	44	1.0E-05	No	-	9.1E-08	-	No	Yes	Yes
1,2,3,7,8-PeCDD	16	12	75	6.0E-05	No	-	3.5E-07	-	No	Yes	Yes
1,2,3,4,7,8-HxCDD	16	14	88	1.5E-04	No	-	5.0E-07	-	No	Yes	Yes

Selection of Chemicals of Potential Ecological Concern in Soil (0-6 feet bgs)
Old Conservation Yard RFI Site

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (mg/kg)	Chemical Detected in Laboratory Blanks [a]	WRS Indicates Exceeds Background[b]	Maximum SQL (mg/kg)	SQLs Exceed Background	SQLs Exceed ESLs	Potentially Site Related	CPEC
1,2,3,6,7,8-HxCDD	16	15	94	1.6E-04	No	-	6.1E-07	-	No	Yes	Yes
1,2,3,7,8,9-HxCDD	16	14	88	1.7E-04	No	-	4.0E-07	-	No	Yes	Yes
1,2,3,4,6,7,8-HpCDD	16	16	100	3.3E-03	No	-		-	No	Yes	Yes
OCDD	16	16	100	1.5E-02	No	-		-	No	Yes	Yes
2,3,7,8-TCDF	16	14	88	1.0E-05	No	-	4.9E-07	-	No	Yes	Yes
1,2,3,7,8-PeCDF	16	11	69	1.0E-05	No	-	2.6E-07	-	No	Yes	Yes
2,3,4,7,8-PeCDF	16	14	88	3.0E-05	No	-	2.9E-07	-	No	Yes	Yes
1,2,3,4,7,8-HxCDF	16	15	94	1.2E-04	No	-	4.5E-07	-	No	Yes	Yes
1,2,3,6,7,8-HxCDF	16	9	56	2.0E-05	No	-	5.2E-07	-	No	Yes	Yes
2,3,4,6,7,8-HxCDF	16	15	94	3.0E-05	No	-	5.3E-07	-	No	Yes	Yes
1,2,3,7,8,9-HxCDF	16	10	63	2.0E-05	No	-	1.2E-07	-	No	Yes	Yes
1,2,3,4,6,7,8-HpCDF	16	16	100	2.3E-04	No	-		-	No	Yes	Yes
1,2,3,4,7,8,9-HpCDF	16	12	75	6.0E-05	No	-	8.3E-07	-	No	Yes	Yes
OCDF	16	15	94	8.0E-04	No	-	1.0E-05	-	No	Yes	Yes
PCBs											
Aroclor-1016	59	0	0	-	No	-	3.4E-02	-	Yes	No	No
Aroclor-1221	59	0	0	-	No	-	5.1E-02	-	Yes	No	No
Aroclor-1232	59	0	0	-	No	-	3.4E-02	-	Yes	No	No
Aroclor-1242	59	0	0	-	No	-	3.4E-02	-	Yes	No	No
Aroclor-1248	59	15	25	2.4E+04	No	-	3.4E-02	-	Yes	No	Yes
Aroclor-1254	59	16	27	5.4E+00	No	-	3.4E-02	-	Yes	Yes	Yes
Aroclor-1260	59	11	19	6.3E+02	No	-	3.4E-02	-	Yes	Yes	Yes
PCB-105	1	1	100	-	No	-	-	-	-	Yes	Yes
PCB-114	1	1	100	-	No	-	-	-	-	Yes	Yes
PCB-118	1	1	100	-	No	-	-	-	-	Yes	Yes
PCB-123	1	1	100	-	No	-	-	-	-	Yes	Yes
PCB-126	1	1	100	-	No	-	-	-	-	Yes	Yes
PCB-156	1	1	100	-	No	-	-	-	-	Yes	Yes
PCB-157	1	1	100	-	No	-	-	-	-	Yes	Yes
PCB-167	1	1	100	-	No	-	-	-	-	Yes	Yes
PCB-169	1	1	100	-	No	-	-	-	-	Yes	Yes
PCB-189	1	1	100	-	No	-	-	-	-	Yes	Yes
PCB-77	1	1	100	-	No	-	-	-	-	Yes	Yes
PCB-81	1	1	100	-	No	-	-	-	-	Yes	Yes

Selection of Chemicals of Potential Ecological Concern in Soil (0-6 feet bgs)
Old Conservation Yard RFI Site

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (mg/kg)	Chemical Detected in Laboratory Blanks [a]	WRS Indicates Exceeds Background[b]	Maximum SQL (mg/kg)	SQLs Exceed Background	SQLs Exceed ESLs	Potentially Site Related	CPEC

Notes:
a. Any chemical eliminated as CPEC due to laboratory blank contamination is discussed in Section 3.0.
b. Background comparision for inorganic compounds presented in Attachment 1 Spreadsheet C2-82.
c. Not selected as CPEC since the RFI site sample population for soils at 0 to 6 feet bgs was found to be no different than the background sample population at p=0.05 based on the Wilcoxon Rank Sum Test.
d. Selected as CPEC in soil at 0 to 6 feet bgs since it was selected as a soil vapor COPC.
e. Selected as a CPEC since either petroleum hydrocarbon fraction C11-C14, C14-C20, or C20-C30 was selected as a CPEC.
f. Although Wilcoxon Rank Sum Test indicates comparable to background, metal is present at maximum concentrations significantly larger than maximum background concentrations, in areas of suspected metals debris impacts. It is subsequently selected as a CPEC.
g. Although Wilcoxon Rank Sum Test indicates comparable to background, metal is present at maximum concentrations and significant number of SQLs significantly larger than ESLs, and in areas of known metals debris contamination. It is subsequently selected as a CPEC.
h. Hexavalent chromium was not detected, and the sample was colocated with the highest detected total chromium concentration. Total chromium is well below background and ESLs, and there are no known processes at the site that would be a source of hexavalent chromium. Therefore, not selected as a CPEC.
CPEC - chemical of potential ecological concern
ESL - ecological screening level
SQL - sample quantitation limit
VOC - volatile organic chemicals
SVOC - semivolatile organic chemicals
PCBs - polychlorinated biphenyls
Total Tetra - sum of the 2,3,7,8-substituted tetrachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations
Total Penta - sum of the 2,3,7,8-substituted pentachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations
Total Hexa - sum of the 2,3,7,8-substituted hexachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations
Total Hepta - sum of the 2,3,7,8-substituted heptachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations
Total Octa - sum of the octachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations concentrations
PCDD/PDDFs - polychlorinated dibenzo-p-dioxins and dibenzofurans
"-" not applicable
mg/kg - milligrams per kilogram
bgs- below ground surface

Selection of Chemicals of Potential Ecological Concern in Soil (0-4 feet bgs)
Old Conservation Yard RFI Site

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (mg/kg)	Chemical Detected in Laboratory Blanks [a]	WRS Indicates Exceeds Background[b]	Maximum SQL (mg/kg)	SQLs Exceed Background	SQLs Exceed ESLs	Potentially Site Related	CPEC	
Inorganic Compounds												
Aluminum	52	52	100	2.7E+04	No	No		-	No	Yes	No	c
Antimony	44	7	16	9.7E-01	No	No	1.2E+01	-	Yes	Yes	Yes	f,g
Arsenic	56	41	73	4.7E+00	No	No	6.0E+00	-	Yes	Yes	No	c
Barium	56	56	100	1.9E+02	No	No		-	No	Yes	Yes	f,g
Beryllium	56	49	88	1.0E+00	No	No	6.0E-01	-	No	Yes	No	c
Boron	51	18	35	1.2E+01	No	Yes	1.2E+01	-	Yes	Yes	Yes	
Cadmium	56	38	68	2.2E+00	No	Yes	1.0E+00	-	Yes	Yes	Yes	
Chromium	56	56	100	4.5E+01	No	No		-	No	Yes	No	c
Hexavalent chromium	1	0	0	0.0E+00	No	No	2.0E-01	Yes	No	Yes	No	h
Cobalt	56	55	98	1.0E+01	No	No	2.2E+00	-	No	Yes	No	c
Copper	56	56	100	2.9E+01	No	No		-	No	Yes	No	c
Lead	57	55	96	9.4E+01	No	No	6.0E+00	-	Yes	Yes	Yes	f,g
Manganese	5	5	100	2.6E+02	No	No		-	No	Yes	No	c
Mercury	56	38	68	2.3E+01	No	No	3.0E-01	-	Yes	Yes	Yes	f,g
Molybdenum	56	23	41	1.6E+00	No	No	1.2E+01	-	Yes	Yes	No	c
Nickel	56	53	95	2.6E+01	No	No	6.0E+00	-	Yes	Yes	No	c
Selenium	52	5	10	4.7E-01	No	No	6.0E+00	-	Yes	Yes	No	c
Silver	59	42	71	4.0E+00	No	Yes	4.5E+00	-	Yes	Yes	Yes	
Thallium	61	42	69	1.7E+00	No	No	6.0E+00	-	Yes	Yes	Yes	f
Vanadium	56	56	100	5.7E+01	No	No		-	No	Yes	No	c
Zinc	56	56	100	1.6E+02	No	No		-	No	Yes	Yes	f
VOCs												
1,1,1,2-Tetrachloroethane	11	0	0	0.0E+00	No	-	4.1E-02	-	No	Yes	No	
1,1,1-Trichloroethane	17	0	0	-	No	-	1.1E-02	-	No	Yes	Yes	d
1,1,2,2-Tetrachloroethane	17	0	0	0.0E+00	No	-	1.1E-02	-	No	Yes	No	
1,1,2-Trichloro-1,2,2-trifluoroethane	11	0	0	-	No	-	4.1E-02	-	No	Yes	Yes	d
1,1,2-Trichloroethane	17	0	0	0.0E+00	No	-	1.1E-02	-	No	Yes	No	
1,1-Dichloroethane	17	0	0	-	No	-	1.1E-02	-	No	Yes	No	
1,1-Dichloroethene	17	0	0	-	No	-	1.1E-02	-	No	Yes	Yes	d
1,1-Dichloropropene	1	0	0	0.0E+00	No	-	3.0E-03	-	No	Yes	No	
1,2,3-Trichlorobenzene	1	0	0	0.0E+00	No	-	7.6E-03	-	No	Yes	No	
1,2,3-Trichloropropane	1	0	0	0.0E+00	No	-	1.5E-02	-	No	Yes	No	

Selection of Chemicals of Potential Ecological Concern in Soil (0-4 feet bgs)
Old Conservation Yard RFI Site

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (mg/kg)	Chemical Detected in Laboratory Blanks [a]	WRS Indicates Exceeds Background[b]	Maximum SQL (mg/kg)	SQLs Exceed Background	SQLs Exceed ESLs	Potentially Site Related	CPEC
1,2,4-Trichlorobenzene	8	0	0	0.0E+00	No	-	3.0E+00	-	No	Yes	No
1,2,4-Trimethylbenzene	11	0	0	0.0E+00	No	-	4.1E-02	-	No	Yes	No
1,2-Dibromo-3-chloropropane	11	0	0	0.0E+00	No	-	4.1E-02	-	No	Yes	No
1,2-Dibromoethane	1	0	0	0.0E+00	No	-	3.0E-03	-	No	Yes	No
1,2-Dichlorobenzene	18	0	0	0.0E+00	No	-	3.0E+00	-	No	Yes	No
1,2-Dichloroethane	17	0	0	0.0E+00	No	-	1.1E-02	-	No	Yes	No
1,2-Dichloroethene (total)	6	0	0	0.0E+00	No	-	5.0E-03	-	No	Yes	No
1,2-Dichloropropane	17	0	0	0.0E+00	No	-	1.1E-02	-	No	Yes	No
1,3,5-Trimethylbenzene	11	0	0	0.0E+00	No	-	4.1E-02	-	No	Yes	No
1,3-Dichlorobenzene	18	0	0	0.0E+00	No	-	3.0E+00	-	No	Yes	No
1,3-Dichloropropane	1	0	0	0.0E+00	No	-	3.0E-03	-	No	Yes	No
1,4-Dichlorobenzene	18	0	0	0.0E+00	No	-	3.0E+00	-	No	Yes	No
2,2-Dichloropropane	1	0	0	0.0E+00	No	-	3.0E-03	-	No	Yes	No
2-Butanone	17	1	6	1.1E-02	No	-	1.0E-01	-	No	Yes	Yes
2-Chloroethylvinylether	11	0	0	0.0E+00	No	-	1.0E-01	-	No	Yes	No
2-Chlorotoluene	1	0	0	0.0E+00	No	-	7.6E-03	-	No	Yes	No
2-Hexanone	7	0	0	0.0E+00	No	-	1.5E-02	-	No	Yes	No
4-Chlorotoluene	1	0	0	0.0E+00	No	-	7.6E-03	-	No	Yes	No
4-Methyl-2-pentanone	7	0	0	0.0E+00	No	-	1.0E-02	-	No	Yes	No
Acetone	17	3	18	4.8E+00	No	-	1.0E-01		No	Yes	Yes
Benzene	17	0	0	0.0E+00	No	-	1.1E-02	-	No	Yes	Yes [e]
Bromobenzene	1	0	0	0.0E+00	No	-	7.6E-03	-	No	Yes	No
Bromochloromethane	1	0	0	0.0E+00	No	-	7.6E-03	-	No	Yes	No
Bromodichloromethane	17	0	0	0.0E+00	No	-	1.1E-02	-	No	Yes	No
Bromoform	17	0	0	0.0E+00	No	-	2.2E-02	-	No	Yes	No
Bromomethane	17	0	0	0.0E+00	No	-	1.0E-01	-	No	Yes	No
Carbon disulfide	6	0	0	0.0E+00	No	-	5.0E-03	-	No	Yes	No
Carbon tetrachloride	17	0	0	0.0E+00	No	-	1.1E-02	-	No	Yes	No
Chlorobenzene	17	0	0	0.0E+00	No	-	1.1E-02	-	No	Yes	No
Chloroethane	17	0	0	0.0E+00	No	-	2.1E-02	-	No	Yes	No
Chloroform	17	0	0	0.0E+00	No	-	2.2E-02	-	No	Yes	No
Chloromethane	17	0	0	0.0E+00	No	-	2.1E-02	-	No	Yes	No
Chlorotrifluoroethene	10	0	0	0.0E+00	No	-	4.1E-02	-	No	Yes	No

Selection of Chemicals of Potential Ecological Concern in Soil (0-4 feet bgs)
Old Conservation Yard RFI Site

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (mg/kg)	Chemical Detected in Laboratory Blanks [a]	WRS Indicates Exceeds Background[b]	Maximum SQL (mg/kg)	SQLs Exceed Background	SQLs Exceed ESLs	Potentially Site Related	CPEC	
cis-1,2-Dichloroethene	11	0	0	-	No	-	1.1E-02	-	No	Yes	No	
cis-1,3-Dichloropropene	17	0	0	0.0E+00	No	-	1.1E-02	-	No	Yes	No	
Dibromochloromethane	7	0	0	0.0E+00	No	-	5.0E-03	-	No	Yes	No	
Dibromomethane	1	0	0	0.0E+00	No	-	3.0E-03	-	No	Yes	No	
Dichlorodifluoromethane	11	0	0	0.0E+00	No	-	2.1E-02	-	No	Yes	No	
Ethylbenzene	17	0	0	0.0E+00	No	-	1.1E-02	-	No	Yes	Yes	e
Isopropylbenzene	1	0	0	0.0E+00	No	-	3.0E-03	-	No	Yes	No	
m,p-Xylene	11	0	0	0.0E+00	No	-	1.1E-02	-	No	Yes	Yes	e
Methyl tert-butyl ether	1	0	0	0.0E+00	No	-	7.6E-03	-	No	Yes	No	
Methylene chloride	17	4	24	2.8E-01	No	-	4.1E-02	-	No	Yes	Yes	
n-Butylbenzene	1	0	0	0.0E+00	No	-	7.6E-03	-	No	Yes	No	
n-Propylbenzene	1	0	0	0.0E+00	No	-	3.0E-03	-	No	Yes	No	
o-Xylene	11	0	0	0.0E+00	No	-	1.1E-02	-	No	Yes	Yes	e
sec-Butylbenzene	1	0	0	0.0E+00	No	-	7.6E-03	-	No	Yes	No	
Styrene	7	0	0	0.0E+00	No	-	5.0E-03	-	No	Yes	No	
tert-Butylbenzene	1	0	0	0.0E+00	No	-	7.6E-03	-	No	Yes	No	
Tetrachloroethene	17	0	0	-	No	-	1.1E-02	-	No	Yes	No	
Toluene	17	3	18	1.4E-02	No	-	1.1E-02	-	No	Yes	Yes	
trans-1,2-Dichloroethene	11	0	0	0.0E+00	No	-	1.1E-02	-	No	Yes	No	
trans-1,3-Dichloropropene	17	0	0	0.0E+00	No	-	1.1E-02	-	No	Yes	No	
Trichloroethene	17	0	0	-	No	-	1.1E-02	-	No	Yes	Yes	d
Trichlorofluoromethane	11	0	0	0.0E+00	No	-	1.1E-02	-	No	Yes	No	
Vinyl acetate	6	0	0	0.0E+00	No	-	1.0E-02	-	No	Yes	No	
Vinyl chloride	17	0	0	0.0E+00	No	-	2.1E-02	-	No	Yes	No	
Xylenes (total)	6	3	50	1.3E-02	No	-	5.0E-03	-	No	Yes	Yes	
SVOCs												
1-Methylnaphthalene	24	2	8	3.0E-02	No	-	2.7E-02	-	No	Yes	Yes	
2,4,5-Trichlorophenol	7	0	0	0.0E+00	No	-	2.0E+01	-	Yes	Yes	No	
2,4,6-Trichlorophenol	7	0	0	0.0E+00	No	-	3.0E+00	-	No	Yes	No	
2,4-Dichlorophenol	7	0	0	0.0E+00	No	-	3.0E+00	-	Yes	Yes	No	
2,4-Dimethylphenol	7	0	0	0.0E+00	No	-	3.0E+00	-	No	Yes	No	
2,4-Dinitrophenol	7	0	0	0.0E+00	No	-	2.0E+01	-	Yes	Yes	Yes	
2,4-Dinitrotoluene	7	0	0	0.0E+00	No	-	3.0E+00	-	Yes	Yes	No	
2,6-Dinitrotoluene	7	0	0	0.0E+00	No	-	3.0E+00	-	Yes	Yes	No	

Selection of Chemicals of Potential Ecological Concern in Soil (0-4 feet bgs)
Old Conservation Yard RFI Site

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (mg/kg)	Chemical Detected in Laboratory Blanks [a]	WRS Indicates Exceeds Background[b]	Maximum SQL (mg/kg)	SQLs Exceed Background	SQLs Exceed ESLs	Potentially Site Related	CPEC
2-Chloronaphthalene	7	0	0	0.0E+00	No	-	3.0E+00	-	No	Yes	No
2-Chlorophenol	7	0	0	0.0E+00	No	-	3.0E+00	-	No	Yes	No
2-Methylnaphthalene	38	8	21	2.1E-01	No	-	3.0E+00	-	No	Yes	Yes
2-Methylphenol	7	0	0	0.0E+00	No	-	3.0E+00	-	No	Yes	No
2-Nitroaniline	7	0	0	0.0E+00	No	-	2.0E+01	-	No	Yes	No
2-Nitrophenol	7	0	0	0.0E+00	No	-	3.0E+00	-	No	Yes	No
4-Methylphenol	7	0	0	0.0E+00	No	-	3.0E+00	-	No	Yes	No
3,3'-Dichlorobenzidine	7	0	0	0.0E+00	No	-	6.0E+00	-	Yes	Yes	No
3-Nitroaniline	7	0	0	0.0E+00	No	-	2.0E+01	-	Yes	Yes	No
4,6-Dinitro-2-methylphenol	7	0	0	0.0E+00	No	-	2.0E+01	-	No	Yes	No
4-Bromophenyl phenyl ether	7	0	0	0.0E+00	No	-	3.0E+00	-	No	Yes	No
4-Chloro-3-methylphenol	7	0	0	0.0E+00	No	-	3.0E+00	-	No	Yes	No
4-Chloroaniline	7	0	0	0.0E+00	No	-	3.0E+00	-	No	Yes	No
4-Chlorophenyl phenyl ether	7	0	0	0.0E+00	No	-	3.0E+00	-	Yes	Yes	No
4-Nitroaniline	7	0	0	0.0E+00	No	-	2.0E+01	-	Yes	Yes	No
4-Nitrophenol	7	0	0	0.0E+00	No	-	2.0E+01	-	Yes	Yes	No
Acenaphthene	53	3	6	1.5E-02	No	-	3.2E+00	-	Yes	Yes	Yes
Acenaphthylene	53	1	2	7.0E-03	No	-	3.2E+00	-	No	Yes	Yes
Aniline	6	0	0	0.0E+00	No	-	3.0E+00	-	No	Yes	No
Anthracene	53	5	9	3.9E-02	No	-	3.2E+00	-	No	Yes	Yes
Benzidine	6	0	0	0.0E+00	No	-	2.0E+01	-	Yes	Yes	No
Benzo(a)anthracene	53	15	28	3.3E-01	No	-	3.2E+00	-	Yes	Yes	Yes
Benzo(a)pyrene	53	8	15	2.6E-01	No	-	3.2E+00	-	No	Yes	Yes
Benzo(b)fluoranthene	53	10	19	4.2E-01	No	-	3.2E+00	-	No	Yes	Yes
Benzo(e)pyrene	1	1	100	1.7E-01	No	-		-	-	Yes	Yes
Benzo(g,h,i)perylene	53	7	13	1.8E-01	No	-	3.2E+00	-	No	Yes	Yes
Benzo(k)fluoranthene	53	9	17	3.0E-01	No	-	3.2E+00	-	No	Yes	Yes
Benzoic acid	6	0	0	0.0E+00	No	-	2.0E+01	-	Yes	Yes	No
Benzyl alcohol	7	0	0	0.0E+00	No	-	3.0E+00	-	No	Yes	No
bis(2-Chloroethoxy)methane	7	0	0	0.0E+00	No	-	3.0E+00	-	No	Yes	No
bis(2-Chloroethyl)ether	7	0	0	0.0E+00	No	-	3.0E+00	-	No	Yes	No
bis(2-Chloroisopropyl) ether	7	0	0	0.0E+00	No	-	3.0E+00	-	No	Yes	No
bis(2-Ethylhexyl)phthalate	23	0	0	-	No	-	1.1E+01	-	Yes	Yes	No

Selection of Chemicals of Potential Ecological Concern in Soil (0-4 feet bgs)
Old Conservation Yard RFI Site

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (mg/kg)	Chemical Detected in Laboratory Blanks [a]	WRS Indicates Exceeds Background[b]	Maximum SQL (mg/kg)	SQLs Exceed Background	SQLs Exceed ESLs	Potentially Site Related	CPEC
Butyl benzyl phthalate	7	0	0	0.0E+00	No	-	3.0E+00	-	No	Yes	No
Chrysene	53	14	26	5.0E-01	No	-	3.2E+00	-	Yes	Yes	Yes
Dibenz(a,h)anthracene	53	5	9	3.3E-02	No	-	3.2E+00	-	No	Yes	Yes
Dibenzofuran	7	0	0	0.0E+00	No	-	3.0E+00	-	No	Yes	No
Diethylphthalate	23	0	0	-	No	-	1.1E+01	-	No	Yes	No
Dimethyl phthalate	7	0	0	0.0E+00	No	-	3.0E+00	-	No	Yes	No
Di-n-butylphthalate	23	0	0	-	No	-	1.1E+01	-	Yes	Yes	No
Di-n-octyl phthalate	7	0	0	0.0E+00	No	-	3.0E+00	-	No	Yes	No
Fluoranthene	53	15	28	2.1E+00	No	-	3.2E+00	-	No	Yes	Yes
Fluorene	53	1	2	6.0E-03	No	-	3.2E+00	-	Yes	Yes	Yes
Hexachlorobenzene	7	0	0	0.0E+00	No	-	3.0E+00	-	Yes	Yes	No
Hexachlorobutadiene	8	0	0	0.0E+00	No	-	3.0E+00	-	Yes	Yes	No
Hexachlorocyclopentadiene	7	0	0	0.0E+00	No	-	3.0E+00	-	No	Yes	No
Hexachloroethane	7	0	0	0.0E+00	No	-	3.0E+00	-	Yes	Yes	No
Indeno(1,2,3-cd)pyrene	53	5	9	1.1E-01	No	-	3.2E+00	-	No	Yes	Yes
Isophorone	7	0	0	0.0E+00	No	-	3.0E+00	-	No	Yes	No
Naphthalene	54	9	17	1.5E-01	No	-	3.2E+00	-	No	Yes	Yes
Nitrobenzene	7	0	0	0.0E+00	No	-	3.0E+00	-	Yes	Yes	No
N-Nitrosodimethylamine	25	0	0	-	No	-	3.0E+00	-	No	Yes	No
N-Nitrosodi-n-propylamine	7	0	0	0.0E+00	No	-	3.0E+00	-	No	Yes	No
N-Nitrosodiphenylamine	22	0	0	-	No	-	3.2E+00	-	No	Yes	No
Pentachlorophenol	7	0	0	0.0E+00	No	-	2.0E+01	-	Yes	Yes	No
Perylene	1	1	100	9.8E-02	No	-		-	-	Yes	Yes
Phenanthrene	53	12	23	1.6E+00	No	-	3.2E+00	-	Yes	Yes	Yes
Phenol	7	0	0	0.0E+00	No	-	3.0E+00	-	No	Yes	No
Pyrene	53	15	28	1.0E+00	No	-	3.2E+00	-	No	Yes	Yes
Total Petroleum Hydrocarbons											
C08-C11(Gasoline Range)	65	5	8	4.2E+01	No	-	1.4E+02	-	-	No	Yes
C11-C14(Kerosene Range)	59	2	3	8.9E+01	No	-	1.4E+02	-	-	Yes	Yes
C14-C20(Diesel Range)	65	19	29	1.2E+03	No	-	5.3E+01	-	-	Yes	Yes
C20-C30(Lubricant Oil Range)	59	27	46	8.3E+03	No	-	1.5E+01	-	-	Yes	Yes

Selection of Chemicals of Potential Ecological Concern in Soil (0-4 feet bgs)
Old Conservation Yard RFI Site

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (mg/kg)	Chemical Detected in Laboratory Blanks [a]	WRS Indicates Exceeds Background[b]	Maximum SQL (mg/kg)	SQLs Exceed Background	SQLs Exceed ESLs	Potentially Site Related	CPEC
PCDD/PCDFs											
2,3,7,8-TCDD	14	5	36	1.0E-05	No	-	6.7E-07	-	No	Yes	Yes
1,2,3,7,8-PeCDD	14	10	71	6.0E-05	No	-	8.1E-07	-	No	Yes	Yes
1,2,3,4,7,8-HxCDD	14	12	86	1.5E-04	No	-	8.3E-07	-	No	Yes	Yes
1,2,3,6,7,8-HxCDD	14	13	93	1.6E-04	No	-	6.1E-07	-	No	Yes	Yes
1,2,3,7,8,9-HxCDD	14	12	86	1.7E-04	No	-	6.0E-07	-	No	Yes	Yes
1,2,3,4,6,7,8-HpCDD	14	14	100	3.3E-03	No	-		-	No	Yes	Yes
OCDD	14	14	100	1.5E-02	No	-		-	No	Yes	Yes
2,3,7,8-TCDF	14	12	86	1.0E-05	No	-	8.0E-07	-	No	Yes	Yes
1,2,3,7,8-PeCDF	14	9	64	1.0E-05	No	-	9.7E-07	-	No	Yes	Yes
2,3,4,7,8-PeCDF	14	12	86	3.0E-05	No	-	4.3E-07	-	No	Yes	Yes
1,2,3,4,7,8-HxCDF	14	13	93	1.2E-04	No	-	4.5E-07	-	No	Yes	Yes
1,2,3,6,7,8-HxCDF	14	8	57	1.0E-05	No	-	5.0E-05	-	No	Yes	Yes
2,3,4,6,7,8-HxCDF	14	13	93	3.0E-05	No	-	5.3E-07	-	No	Yes	Yes
1,2,3,7,8,9-HxCDF	14	8	57	2.0E-05	No	-	5.6E-07	-	No	Yes	Yes
1,2,3,4,6,7,8-HpCDF	14	14	100	2.3E-04	No	-		-	No	Yes	Yes
1,2,3,4,7,8,9-HpCDF	14	11	79	6.0E-05	No	-	1.4E-06	-	No	Yes	Yes
OCDF	14	13	93	8.0E-04	No	-	1.0E-05	-	No	Yes	Yes
PCBs											
Aroclor-1016	51	0	0	-	No	-	8.6E+01	-	Yes	No	No
Aroclor-1221	51	0	0	-	No	-	8.6E+01	-	Yes	No	No
Aroclor-1232	51	0	0	-	No	-	8.6E+01	-	Yes	No	No
Aroclor-1242	51	0	0	-	No	-	8.6E+01	-	Yes	No	No
Aroclor-1248	51	10	20	2.4E+04	No	-	8.9E+00	-	Yes	No	Yes
Aroclor-1254	51	13	25	5.4E+00	No	-	8.6E+01	-	Yes	Yes	Yes
Aroclor-1260	51	9	18	6.3E+02	No	-	8.9E+00	-	Yes	Yes	Yes
PCB-105	1	1	100	-	No	-	-	-	-	Yes	Yes
PCB-114	1	1	100	-	No	-	-	-	-	Yes	Yes
PCB-118	1	1	100	-	No	-	-	-	-	Yes	Yes
PCB-123	1	1	100	-	No	-	-	-	-	Yes	Yes
PCB-126	1	1	100	-	No	-	-	-	-	Yes	Yes
PCB-156	1	1	100	-	No	-	-	-	-	Yes	Yes
PCB-157	1	1	100	-	No	-	-	-	-	Yes	Yes

Selection of Chemicals of Potential Ecological Concern in Soil (0-4 feet bgs)
Old Conservation Yard RFI Site

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (mg/kg)	Chemical Detected in Laboratory Blanks [a]	WRS Indicates Exceeds Background[b]	Maximum SQL (mg/kg)	SQLs Exceed Background	SQLs Exceed ESLs	Potentially Site Related	CPEC
PCB-167	1	1	100	-	No	-	-	-	-	Yes	Yes
PCB-169	1	1	100	-	No	-	-	-	-	Yes	Yes
PCB-189	1	1	100	-	No	-	-	-	-	Yes	Yes
PCB-77	1	1	100	-	No	-	-	-	-	Yes	Yes
PCB-81	1	1	100	-	No	-	-	-	-	Yes	Yes

Notes:

a. Any chemical eliminated as CPEC due to laboratory blank contamination is discussed in Section 3.0.

b. Background comparision for inorganic compounds presented in Attachment 1 Spreadsheet C2-83.

c. Not selected as CPEC since the RFI site sample population for soils at 0 to 4 feet bgs was found to be no different than the background sample population at p=0.05 based on the Wilcoxon Rank Sum Test.

d. Selected as CPEC in soil at 0 to 4 feet bgs since it was selected as a soil vapor CPEC.

e. Selected as a CPEC since either petroleum hydrocarbon fraction C11-C14, C14-C20, or C20-C30 was selected as a CPEC.

f. Although Wilcoxon Rank Sum Test indicates comparable to background, metal is present at maximum concentrations significantly larger than maximum background concentrations, and in areas of know metals debris contamination. It is subsequently selected as a COPC.

g. Although Wilcoxon Rank Sum Test indicates comparable to background, metal is present at maximum concentrations or significant number of SQLs significantly larger than ESLs, and in areas of known metals debris contamination. It is subsequently selected as a COPC.

h. Hexavalent chromium was not detected, and the sample was colocated with the highest detected total chromium concentration. Total chromium is well below background and ESLs, and there are no known processes at the site that would be a source of hexavalent chromium. Therefore, not selected as a CPEC.

CPEC - chemical of potential ecological concern
ESL - ecological screening level
SQL - sample quantitation limit
VOC - volatile organic chemicals
SVOC - semivolatile organic chemicals
PCBs - polychlorinated biphenyls
Total Tetra - sum of the 2,3,7,8-substituted tetrachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations
Total Penta - sum of the 2,3,7,8-substituted pentachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations
Total Hexa - sum of the 2,3,7,8-substituted hexachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations
Total Hepta - sum of the 2,3,7,8-substituted heptachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations
Total Octa - sum of the octachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations concentrations
PCDD/PDDFs - polychlorinated dibenzo-p-dioxins and dibenzofurans
"-" not applicable
mg/kg - milligrams per kilogram

Selection of Chemicals of Potential Ecological Concern in Soil (0-4 feet bgs)
Old Conservation Yard RFI Site

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (mg/kg)	Chemical Detected in Laboratory Blanks [a]	WRS Indicates Exceeds Background[b]	Maximum SQL (mg/kg)	SQLs Exceed Background	SQLs Exceed ESLs	Potentially Site Related	CPEC

bgs- below ground surface

Selection of Chemicals of Potential Ecological Concern in Soil (0-2 feet bgs)
Old Conservation Yard RFI Site

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (mg/kg)	Chemical Detected in Laboratory Blanks [a]	WRS Indicates Exceeds Background[b]	Maximum SQL (mg/kg)	SQLs Exceed Background	SQLs Exceed ESLs	Potentially Site Related	CPEC
Inorganic Compounds											
Aluminum	47	47	100	2.4E+04	No	No		-	No	Yes	No [c]
Antimony	40	5	13	9.7E-01	No	No	1.2E+01	-	Yes	Yes	Yes [f,g]
Arsenic	52	40	77	4.7E+00	No	No	6.0E+00	-	Yes	Yes	No [c]
Barium	52	52	100	1.4E+02	No	No		-	No	Yes	Yes [f,g]
Beryllium	52	45	87	1.0E+00	No	No	6.0E-01	-	No	Yes	No [c]
Boron	47	16	34	1.2E+01	No	No	1.2E+01	-	Yes	Yes	Yes [f,g]
Cadmium	52	36	69	2.2E+00	No	Yes	1.0E+00	-	Yes	Yes	Yes
Chromium	52	52	100	4.5E+01	No	No		-	No	Yes	No [c]
Hexavalent chromium	1	0	0	0.0E+00	No	No	2.0E-01	Yes	No	Yes	No [h]
Cobalt	52	51	98	1.0E+01	No	No	2.2E+00	-	No	Yes	No [c]
Copper	52	52	100	2.9E+01	No	No		-	No	Yes	No [c]
Lead	52	50	96	9.4E+01	No	No	6.0E+00	-	Yes	Yes	Yes [f,g]
Manganese	5	5	100	2.6E+02	No	No		-	No	Yes	No [c]
Mercury	52	35	67	2.3E+01	No	No	3.0E-01	-	Yes	Yes	Yes [f]
Molybdenum	52	23	44	1.6E+00	No	No	1.2E+01	-	Yes	Yes	No [c]
Nickel	52	49	94	2.6E+01	No	No	6.0E+00	-	Yes	Yes	No [c]
Selenium	48	3	6	3.7E-01	No	No	6.0E+00	-	Yes	Yes	No [c]
Silver	54	39	72	4.0E+00	No	Yes	4.5E+00	-	Yes	Yes	Yes
Thallium	55	38	69	1.7E+00	No	No	6.0E+00	-	Yes	Yes	Yes [f]
Vanadium	52	52	100	5.7E+01	No	No		-	No	Yes	No [c]
Zinc	52	52	100	1.6E+02	No	No		-	No	Yes	Yes [f]
VOCs											
1,1,1,2-Tetrachloroethane	10	0	0	0.0E+00	No	-	4.1E-02	-	No	Yes	No
1,1,1-Trichloroethane	15	0	0	0.0E+00	No	-	1.1E-02	-	No	Yes	Yes [d]
1,1,2,2-Tetrachloroethane	15	0	0	0.0E+00	No	-	1.1E-02	-	No	Yes	No
1,1,2-Trichloro-1,2,2-trifluoroethane	10	0	0	0.0E+00	No	-	4.1E-02	-	No	Yes	Yes [d]
1,1,2-Trichloroethane	15	0	0	0.0E+00	No	-	1.1E-02	-	No	Yes	No
1,1-Dichloroethane	15	0	0	0.0E+00	No	-	1.1E-02	-	No	Yes	No
1,1-Dichloroethene	15	0	0	0.0E+00	No	-	1.1E-02	-	No	Yes	Yes [d]
1,1-Dichloropropene	1	0	0	0.0E+00	No	-	3.0E-03	-	No	Yes	No
1,2,3-Trichlorobenzene	1	0	0	0.0E+00	No	-	7.6E-03	-	No	Yes	No
1,2,3-Trichloropropane	1	0	0	0.0E+00	No	-	1.5E-02	-	No	Yes	No
1,2,4-Trichlorobenzene	7	0	0	0.0E+00	No	-	3.0E-01	-	No	Yes	No

Selection of Chemicals of Potential Ecological Concern in Soil (0-2 feet bgs)
Old Conservation Yard RFI Site

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (mg/kg)	Chemical Detected in Laboratory Blanks [a]	WRS Indicates Exceeds Background[b]	Maximum SQL (mg/kg)	SQLs Exceed Background	SQLs Exceed ESLs	Potentially Site Related	CPEC
1,2,4-Trimethylbenzene	10	0	0	0.0E+00	No	-	4.1E-02	-	No	Yes	No
1,2-Dibromo-3-chloropropane	10	0	0	0.0E+00	No	-	4.1E-02	-	No	Yes	No
1,2-Dibromoethane	1	0	0	0.0E+00	No	-	3.0E-03	-	No	Yes	No
1,2-Dichlorobenzene	16	0	0	0.0E+00	No	-	3.0E-01	-	No	Yes	No
1,2-Dichloroethane	15	0	0	0.0E+00	No	-	1.1E-02	-	No	Yes	No
1,2-Dichloroethene (total)	5	0	0	0.0E+00	No	-	5.0E-03	-	No	Yes	No
1,2-Dichloropropane	15	0	0	0.0E+00	No	-	1.1E-02	-	No	Yes	No
1,3,5-Trimethylbenzene	10	0	0	0.0E+00	No	-	4.1E-02	-	No	Yes	No
1,3-Dichlorobenzene	16	0	0	0.0E+00	No	-	3.0E-01	-	No	Yes	No
1,4-Dichlorobenzene	16	0	0	0.0E+00	No	-	3.0E-01	-	No	Yes	No
2-Butanone	15	1	7	1.1E-02	No	-	1.0E-01	-	No	Yes	Yes
2-Chloroethylvinylether	10	0	0	0.0E+00	No	-	1.0E-01	-	No	Yes	No
2-Chlorotoluene	1	0	0	0.0E+00	No	-	7.6E-03	-	No	Yes	No
2-Chloro-1,1,1-trifluoroethane	9	0	0	0.0E+00	No	-	4.1E-02	-	-	Yes	No
2-Hexanone	6	0	0	0.0E+00	No	-	1.5E-02	-	No	Yes	No
4-Chlorotoluene	1	0	0	0.0E+00	No	-	7.6E-03	-	No	Yes	No
4-Methyl-2-pentanone	6	0	0	0.0E+00	No	-	1.0E-02	-	No	Yes	No
Acetone	15	2	13	4.8E+00	No	-	1.0E-01	-	No	Yes	Yes
Benzene	15	0	0	0.0E+00	No	-	1.1E-02	-	No	Yes	Yes [e]
Bromobenzene	1	0	0	0.0E+00	No	-	7.6E-03	-	No	Yes	No
Bromodichloromethane	15	0	0	0.0E+00	No	-	1.1E-02	-	No	Yes	No
Bromoform	15	0	0	0.0E+00	No	-	2.2E-02	-	No	Yes	No
Bromomethane	15	0	0	0.0E+00	No	-	1.0E-01	-	No	Yes	No
Carbon disulfide	5	0	0	0.0E+00	No	-	5.0E-03	-	No	Yes	No
Carbon tetrachloride	15	0	0	0.0E+00	No	-	1.1E-02	-	No	Yes	No
Chlorobenzene	15	0	0	0.0E+00	No	-	1.1E-02	-	No	Yes	No
Chloroethane	15	0	0	0.0E+00	No	-	2.1E-02	-	No	Yes	No
Chloroform	15	0	0	0.0E+00	No	-	2.2E-02	-	No	Yes	No
Chloromethane	15	0	0	0.0E+00	No	-	2.1E-02	-	No	Yes	No
Chlorotrifluoroethene	9	0	0	0.0E+00	No	-	4.1E-02	-	No	Yes	No
cis-1,2-Dichloroethene	10	0	0	0.0E+00	No	-	1.1E-02	-	No	Yes	No
cis-1,3-Dichloropropene	15	0	0	0.0E+00	No	-	1.1E-02	-	No	Yes	No
Dibromochloromethane	6	0	0	0.0E+00	No	-	5.0E-03	-	No	Yes	No
Dibromomethane	1	0	0	0.0E+00	No	-	3.0E-03	-	No	Yes	No

Selection of Chemicals of Potential Ecological Concern in Soil (0-2 feet bgs)
Old Conservation Yard RFI Site

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (mg/kg)	Chemical Detected in Laboratory Blanks [a]	WRS Indicates Exceeds Background[b]	Maximum SQL (mg/kg)	SQLs Exceed Background	SQLs Exceed ESLs	Potentially Site Related	CPEC
Dichlorodifluoromethane	10	0	0	0.0E+00	No	-	2.1E-02	-	No	Yes	No
Ethylbenzene	15	0	0	0.0E+00	No	-	1.1E-02	-	No	Yes	Yes [e]
Isopropylbenzene	1	0	0	0.0E+00	No	-	3.0E-03	-	No	Yes	No
m,p-Xylene	10	0	0	0.0E+00	No	-	1.1E-02	-	No	Yes	Yes [e]
Methyl tert-butyl ether	1	0	0	0.0E+00	No	-	7.6E-03	-	No	Yes	No
Methylene chloride	15	3	20	2.8E-01	No	-	4.1E-02	-	No	Yes	Yes
n-Butylbenzene	1	0	0	0.0E+00	No	-	7.6E-03	-	No	Yes	No
n-Propylbenzene	1	0	0	0.0E+00	No	-	3.0E-03	-	No	Yes	No
o-Xylene	10	0	0	0.0E+00	No	-	1.1E-02	-	No	Yes	Yes [e]
p-Isopropyltoluene	-	-	-	-	No	-	-	-	-	Yes	No
sec-Butylbenzene	1	0	0	0.0E+00	No	-	7.6E-03	-	No	Yes	No
Styrene	6	0	0	0.0E+00	No	-	5.0E-03	-	No	Yes	No
tert-Butylbenzene	1	0	0	0.0E+00	No	-	7.6E-03	-	No	Yes	No
Tetrachloroethene	15	0	0	0.0E+00	No	-	1.1E-02	-	No	Yes	No
Toluene	15	3	20	1.4E-02	No	-	1.1E-02	-	No	Yes	Yes
trans-1,2-Dichloroethene	10	0	0	0.0E+00	No	-	1.1E-02	-	No	Yes	No
trans-1,3-Dichloropropene	15	0	0	0.0E+00	No	-	1.1E-02	-	No	Yes	No
Trichloroethene	15	0	0	0.0E+00	No	-	1.1E-02	-	No	Yes	Yes [d]
Trichlorofluoromethane	10	0	0	0.0E+00	No	-	1.1E-02	-	No	Yes	No
Vinyl acetate	5	0	0	0.0E+00	No	-	1.0E-02	-	No	Yes	No
Vinyl chloride	15	0	0	0.0E+00	No	-	2.1E-02	-	No	Yes	No
Xylenes (total)	5	2	40	1.3E-02	No	-	5.0E-03	-	No	Yes	Yes
SVOCs											
1-Methylnaphthalene	24	2	8	3.0E-02	No	-	2.7E-02	-	No	Yes	Yes
2,4,5-Trichlorophenol	6	0	0	0.0E+00	No	-	2.0E+00	-	No	No	No
2,4,6-Trichlorophenol	6	0	0	0.0E+00	No	-	3.3E-01	-	No	No	No
2,4-Dichlorophenol	6	0	0	0.0E+00	No	-	3.0E-01	-	No	No	No
2,4-Dimethylphenol	6	0	0	0.0E+00	No	-	3.0E-01	-	No	No	No
2,4-Dinitrophenol	6	0	0	0.0E+00	No	-	2.0E+00	-	Yes	No	Yes
2,4-Dinitrotoluene	6	0	0	0.0E+00	No	-	3.0E-01	-	No	No	No
2,6-Dinitrotoluene	6	0	0	0.0E+00	No	-	3.0E-01	-	No	No	No
2-Chloronaphthalene	6	0	0	0.0E+00	No	-	3.0E-01	-	No	No	No
2-Chlorophenol	6	0	0	0.0E+00	No	-	3.0E-01	-	No	No	No
2-Methylnaphthalene	36	7	19	2.1E-01	No	-	3.0E-01	-	No	Yes	Yes

Selection of Chemicals of Potential Ecological Concern in Soil (0-2 feet bgs)
Old Conservation Yard RFI Site

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (mg/kg)	Chemical Detected in Laboratory Blanks [a]	WRS Indicates Exceeds Background[b]	Maximum SQL (mg/kg)	SQLs Exceed Background	SQLs Exceed ESLs	Potentially Site Related	CPEC
2-Methylphenol	6	0	0	0.0E+00	No	-	3.0E-01	-	No	No	No
2-Nitroaniline	6	0	0	0.0E+00	No	-	2.0E+00	-	No	No	No
2-Nitrophenol	6	0	0	0.0E+00	No	-	3.0E-01	-	No	No	No
4-Methylphenol	6	0	0	0.0E+00	No	-	3.0E-01	-	No	No	No
3,3'-Dichlorobenzidine	6	0	0	0.0E+00	No	-	6.0E-01	-	No	No	No
3-Nitroaniline	6	0	0	0.0E+00	No	-	2.0E+00	-	No	No	No
4,6-Dinitro-2-methylphenol	6	0	0	0.0E+00	No	-	2.0E+00	-	No	No	No
4-Bromophenyl phenyl ether	6	0	0	0.0E+00	No	-	3.0E-01	-	No	No	No
4-Chloro-3-methylphenol	6	0	0	0.0E+00	No	-	3.0E-01	-	No	No	No
4-Chloroaniline	6	0	0	0.0E+00	No	-	3.0E-01	-	No	No	No
4-Chlorophenyl phenyl ether	6	0	0	0.0E+00	No	-	3.0E-01	-	No	No	No
4-Nitroaniline	6	0	0	0.0E+00	No	-	2.0E+00	-	No	No	No
4-Nitrophenol	6	0	0	0.0E+00	No	-	2.0E+00	-	No	No	No
Acenaphthene	49	3	6	1.5E-02	No	-	3.2E+00	-	Yes	Yes	Yes
Acenaphthylene	49	1	2	7.0E-03	No	-	3.2E+00	-	No	Yes	Yes
Aniline	5	0	0	0.0E+00	No	-	3.0E-01	-	No	No	No
Anthracene	49	4	8	3.9E-02	No	-	3.2E+00	-	Yes	Yes	Yes
Benzidine	5	0	0	0.0E+00	No	-	2.0E+00	-	No	No	No
Benzo(a)anthracene	49	14	29	3.3E-01	No	-	3.2E+00	-	Yes	Yes	Yes
Benzo(a)pyrene	49	8	16	2.6E-01	No	-	3.2E+00	-	No	Yes	Yes
Benzo(b)fluoranthene	49	9	18	4.2E-01	No	-	3.2E+00	-	No	Yes	Yes
Benzo(e)pyrene	1	1	100	1.7E-01	No	-		-	-	Yes	Yes
Benzo(g,h,i)perylene	49	7	14	1.8E-01	No	-	3.2E+00	-	No	Yes	Yes
Benzo(k)fluoranthene	49	8	16	3.0E-01	No	-	3.2E+00	-	No	Yes	Yes
Benzoic acid	5	0	0	0.0E+00	No	-	2.0E+00	-	No	No	No
Benzyl alcohol	6	0	0	0.0E+00	No	-	3.0E-01	-	No	No	No
bis(2-Chloroethoxy)methane	6	0	0	0.0E+00	No	-	3.0E-01	-	No	No	No
bis(2-Chloroethyl)ether	6	0	0	0.0E+00	No	-	3.0E-01	-	No	No	No
bis(2-Chloroisopropyl) ether	6	0	0	0.0E+00	No	-	3.0E-01	-	No	No	No
bis(2-Ethylhexyl)phthalate	19	0	0	-	No	-	1.1E+01	-	Yes	No	No
Butyl benzyl phthalate	6	0	0	0.0E+00	No	-	3.0E-01	-	No	No	No
Chrysene	49	13	27	5.0E-01	No	-	3.2E+00	-	Yes	Yes	Yes
Dibenz(a,h)anthracene	49	5	10	3.3E-02	No	-	3.2E+00	-	No	Yes	Yes
Dibenzofuran	6	0	0	0.0E+00	No	-	3.0E-01	-	No	No	No

Selection of Chemicals of Potential Ecological Concern in Soil (0-2 feet bgs)
Old Conservation Yard RFI Site

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (mg/kg)	Chemical Detected in Laboratory Blanks [a]	WRS Indicates Exceeds Background[b]	Maximum SQL (mg/kg)	SQLs Exceed Background	SQLs Exceed ESLs	Potentially Site Related	CPEC
Diethylphthalate	19	0	0	-	No	-	1.1E+01	-	No	No	No
Dimethyl phthalate	6	0	0	0.0E+00	No	-	3.0E-01	-	No	No	No
Di-n-butylphthalate	19	0	0	-	No	-	1.1E+01	-	Yes	No	No
Di-n-octyl phthalate	6	0	0	0.0E+00	No	-	3.0E-01	-	No	No	No
Fluoranthene	49	14	29	2.1E+00	No	-	3.2E+00	-	No	Yes	Yes
Fluorene	49	1	2	6.0E-03	No	-	3.2E+00	-	Yes	Yes	Yes
Hexachlorobenzene	6	0	0	0.0E+00	No	-	3.0E-01	-	No	No	No
Hexachlorobutadiene	7	0	0	0.0E+00	No	-	3.0E-01	-	No	No	No
Hexachlorocyclopentadiene	6	0	0	0.0E+00	No	-	1.6E+00	-	No	No	No
Hexachloroethane	6	0	0	0.0E+00	No	-	3.0E-01	-	No	No	No
Indeno(1,2,3-cd)pyrene	49	5	10	1.1E-01	No	-	3.2E+00	-	No	Yes	Yes
Isophorone	6	0	0	0.0E+00	No	-	3.0E-01	-	No	No	No
Naphthalene	50	8	16	1.5E-01	No	-	3.2E+00	-	No	No	Yes
Nitrobenzene	6	0	0	0.0E+00	No	-	3.0E-01	-	No	No	No
N-Nitrosodimethylamine	21	0	0	-	No	-	3.0E-01	-	No	No	No
N-Nitrosodi-n-propylamine	6	0	0	0.0E+00	No	-	3.0E-01	-	No	No	No
N-Nitrosodiphenylamine	19	0	0	-	No	-	3.2E+00	-	No	No	No
Pentachlorophenol	6	0	0	0.0E+00	No	-	2.0E+00	-	No	No	No
Perylene	1	1	100	9.8E-02	No	-		-	-	Yes	Yes
Phenanthrene	49	11	22	1.6E+00	No	-	3.2E+00	-	Yes	Yes	Yes
Phenol	6	0	0	0.0E+00	No	-	3.0E-01	-	No	No	No
Pyrene	49	14	29	1.0E+00	No	-	3.2E+00	-	No	Yes	Yes
Total Petroleum Hydrocarbons											
C08-C11(Gasoline Range)	57	5	9	4.2E+01	No	-	1.4E+02	-	-	Yes	Yes
C11-C14(Kerosene Range)	52	2	4	8.9E+01	No	-	1.4E+02	-	-	Yes	Yes
C14-C20(Diesel Range)	57	19	33	1.2E+03	No	-	5.3E+01	-	-	Yes	Yes
C20-C30(Lubricant Oil Range)	52	26	50	8.3E+03	No	-	1.5E+01	-	-	Yes	Yes
PCDD/PCDFs											
2,3,7,8-TCDD	13	4	31	1.0E-05	No	-	6.7E-07	-	No	No	Yes
1,2,3,7,8-PeCDD	13	9	69	6.0E-05	No	-	8.1E-07	-	No	No	Yes
1,2,3,4,7,8-HxCDD	13	11	85	1.5E-04	No	-	8.3E-07	-	No	No	Yes
1,2,3,6,7,8-HxCDD	13	12	92	1.6E-04	No	-	6.1E-07	-	No	No	Yes
1,2,3,7,8,9-HxCDD	13	11	85	1.7E-04	No	-	6.0E-07	-	No	No	Yes
1,2,3,4,6,7,8-HpCDD	13	13	100	3.3E-03	No	-		-	No	No	Yes

Selection of Chemicals of Potential Ecological Concern in Soil (0-2 feet bgs)
Old Conservation Yard RFI Site

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (mg/kg)	Chemical Detected in Laboratory Blanks [a]	WRS Indicates Exceeds Background[b]	Maximum SQL (mg/kg)	SQLs Exceed Background	SQLs Exceed ESLs	Potentially Site Related	CPEC
OCDD	13	13	100	1.5E-02	No	-		-	No	No	Yes
2,3,7,8-TCDF	13	11	85	1.0E-05	No	-	8.0E-07	-	No	No	Yes
1,2,3,7,8-PeCDF	13	8	62	1.0E-05	No	-	9.7E-07	-	No	No	Yes
2,3,4,7,8-PeCDF	13	11	85	3.0E-05	No	-	4.3E-07	-	No	No	Yes
1,2,3,4,7,8-HxCDF	13	12	92	1.2E-04	No	-	4.5E-07	-	No	No	Yes
1,2,3,6,7,8-HxCDF	13	8	62	1.0E-05	No	-	5.0E-05	-	No	No	Yes
2,3,4,6,7,8-HxCDF	13	12	92	3.0E-05	No	-	5.3E-07	-	No	No	Yes
1,2,3,7,8,9-HxCDF	13	7	54	2.0E-05	No	-	5.6E-07	-	No	No	Yes
1,2,3,4,6,7,8-HpCDF	13	13	100	2.3E-04	No	-		-	No	No	Yes
1,2,3,4,7,8,9-HpCDF	13	10	77	6.0E-05	No	-	1.4E-06	-	No	No	Yes
OCDF	13	12	92	8.0E-04	No	-	1.0E-05	-	No	No	Yes
Total Tetra	-	-	-	-	-	Yes	-	-	-	-	No
Total Penta	-	-	-	-	-	Yes	-	-	-	-	No
Total Hexa	-	-	-	-	-	Yes	-	-	-	-	No
Total Hepta	-	-	-	-	-	Yes	-	-	-	-	Yes
Total Octa	-	-	-	-	-	Yes	-	-	-	-	Yes
PCDD/PCDF	-	-	-	-	-	-	-	-	-	-	Yes
PCBs											
Aroclor-1016	48	0	0	-	No	-	8.6E+01	-	Yes	No	No
Aroclor-1221	48	0	0	-	No	-	8.6E+01	-	Yes	No	No
Aroclor-1232	48	0	0	-	No	-	8.6E+01	-	Yes	No	No
Aroclor-1242	48	0	0	-	No	-	8.6E+01	-	Yes	Yes	No
Aroclor-1248	48	10	21	2.4E+04	No	-	8.9E+00	-	Yes	Yes	Yes
Aroclor-1254	48	13	27	5.4E+00	No	-	8.6E+01	-	Yes	Yes	Yes
Aroclor-1260	48	9	19	6.3E+02	No	-	8.9E+00	-	Yes	Yes	Yes
PCB-105	1	1	100	-	No	-	-	-	-	Yes	Yes
PCB-114	1	1	100	-	No	-	-	-	-	Yes	Yes
PCB-118	1	1	100	-	No	-	-	-	-	Yes	Yes
PCB-123	1	1	100	-	No	-	-	-	-	Yes	Yes
PCB-126	1	1	100	-	No	-	-	-	-	Yes	Yes
PCB-156	1	1	100	-	No	-	-	-	-	Yes	Yes
PCB-157	1	1	100	-	No	-	-	-	-	Yes	Yes
PCB-167	1	1	100	-	No	-	-	-	-	Yes	Yes
PCB-169	1	1	100	-	No	-	-	-	-	Yes	Yes

Selection of Chemicals of Potential Ecological Concern in Soil (0-2 feet bgs)
Old Conservation Yard RFI Site

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (mg/kg)	Chemical Detected in Laboratory Blanks [a]	WRS Indicates Exceeds Background[b]	Maximum SQL (mg/kg)	SQLs Exceed Background	SQLs Exceed ESLs	Potentially Site Related	CPEC
PCB-189	1	1	100	-	No	-	-	-	-	Yes	Yes
PCB-77	1	1	100	-	No	-	-	-	-	Yes	Yes
PCB-81	1	1	100	-	No	-	-	-	-	Yes	Yes

Notes:
a. Any chemical eliminated as CPEC due to laboratory blank contamination is discussed in Section 3.0.
b. Background comparision for inorganic compounds presented in Attachment 1 Spreadsheet C2-82.
c. Not selected as CPEC since the RFI site sample population for soils at 0 to 2 feet bgs was found to be no different than the background sample population at p=0.05 based on the Wilcoxon Rank Sum Test.
d. Selected as a soil CPEC because the chemical was selected as a CPEC in soil vapor.
e. Selected as a CPEC since either petroleum hydrocarbon fraction C11-C14, C14-C20, or C20-C30 was selected as a CPEC.
f. Although Wilcoxon Rank Sum Test indicates comparable to background, metal is present at maximum concentrations significantly larger than maximum background concentrations, and in areas of suspected metals debris impacts. It is subsequently selected as a COPC.
g. Although Wilcoxon Rank Sum Test indicates comparable to background, metal is present at maximum concentrations and significant number of SQLs significantly larger than ESLs, and in areas of suspected metals debris impacts. It is subsequently selected as a COPC.
h. Hexavalent chromium not detected, and the sample was colocated with the highest detected total chromium concentration. Total chromium is well below background and ESLs, and there are no known processes at the site that would be a source of hexavalent chromium. Therefore, not selected as a CPEC.
CPEC - chemical of potential ecological concern
ESL - ecological screening level
SQL - sample quantitation limit
SVOC - semivolatile organic chemicals
PCBs - polychlorinated biphenyls
Total Tetra - sum of the 2,3,7,8-substituted tetrachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations
Total Penta - sum of the 2,3,7,8-substituted pentachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations
Total Hexa - sum of the 2,3,7,8-substituted hexachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations
Total Hepta - sum of the 2,3,7,8-substituted heptachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations
Total Octa - sum of the octachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations concentrations
PCDD/PDDFs - polychlorinated dibenzo-p-dioxins and dibenzofurans
"-" not applicable
mg/kg - milligrams per kilogram
bgs- below ground surface

Estimates of Human Intake
Edible Plant Ingestion Pathway for Child Resident
Old Conservation Yard RFI Site

Intake Equation: Dosage = $\frac{C \times IR \times CF \times F \times EF \times ED \times B}{BW \times AT}$

Exposure Parameters		Units	Typical	RME
Plant concentration	C	mg/kg	CS	CS
Plant ingestion rate	IR	g/day	47	166
Conversion factor	CF	kg/g	1.E-03	1.E-03
Fraction locally grown	F	unitless	0.24	1.0
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	6	6
Bioavailability	B	fraction	CS	CS
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
Inorganic Compounds							
Antimony	NC	NC	NA	NA	NA	NA	1
Barium	NC	NC	NA	NA	NA	NA	1
Boron	2.0E+00	2.5E+00	1.5E-03	1.8E-03	1.2E-04	2.1E-03	1
Cadmium	2.7E-02	5.1E-02	1.9E-05	3.7E-05	1.5E-06	4.3E-05	1
Copper	NC	NC	NA	NA	NA	NA	1
Fluoride	NC	NC	NA	NA	NA	NA	1
Lead	6.5E-02	7.9E-02	4.7E-05	5.8E-05	3.8E-06	6.8E-05	1
Mercury	4.0E-02	2.6E-01	2.9E-05	1.9E-04	2.3E-06	2.2E-04	1
Nitrate	NC	NC	NA	NA	NA	NA	1
Silver	2.4E-04	4.9E-04	1.7E-07	3.6E-07	1.4E-08	4.2E-07	1
Thallium	1.7E-01	3.3E-01	1.2E-04	2.4E-04	9.8E-06	2.8E-04	1
Zinc	1.3E+01	1.4E+01	9.4E-03	1.0E-02	7.5E-04	1.2E-02	1
VOCs							
1,1,1-Trichloroethane	1.5E-02	2.7E-02	1.1E-05	2.0E-05	8.7E-07	2.3E-05	1
1,1,2-Trichloro-1,2,2-trifluoroethane	2.5E-02	4.2E-02	1.8E-05	3.0E-05	1.5E-06	3.6E-05	1
1,1-Dichloroethane	NC	NC	NA	NA	NA	NA	1
1,1-Dichloroethene	2.5E-02	4.4E-02	1.8E-05	3.2E-05	1.5E-06	3.8E-05	1
2-Butanone	2.1E+00	1.0E+00	1.5E-03	7.5E-04	1.2E-04	8.8E-04	1
Acetone	6.6E+01	6.6E+02	4.8E-02	4.8E-01	3.8E-03	5.6E-01	1
Benzene	9.1E-03	2.0E-02	6.6E-06	1.5E-05	5.3E-07	1.7E-05	1
Carbon disulfide	NC	NC	NA	NA	NA	NA	1
Chloromethane	NC	NC	NA	NA	NA	NA	1
cis-1,2-Dichloroethene	NC	NC	NA	NA	NA	NA	1
Ethylbenzene	2.4E-03	5.3E-03	1.8E-06	3.9E-06	1.4E-07	4.5E-06	1
m,p-Xylene	7.0E-03	1.6E-02	5.1E-06	1.1E-05	4.1E-07	1.3E-05	1
Methylene chloride	1.7E+00	1.0E+01	1.2E-03	7.4E-03	9.9E-05	8.6E-03	1
o-Xylene	1.7E-03	3.7E-03	1.2E-06	2.7E-06	9.8E-08	3.1E-06	1
p-Isopropyltoluene	0.0E+00	0.0E+00	0.0E+00	0.0E+00	0.0E+00	0.0E+00	1
Toluene	5.6E-03	1.3E-02	4.1E-06	9.4E-06	3.3E-07	1.1E-05	1
Trichloroethene	1.5E-02	2.7E-02	1.1E-05	1.9E-05	8.5E-07	2.3E-05	1
SVOCs							
1-Methylnaphthalene	9.5E-03	1.1E-02	6.9E-06	7.7E-06	5.5E-07	9.1E-06	1
2-Methylnaphthalene	1.4E-01	4.5E-01	9.9E-05	3.3E-04	7.9E-06	3.8E-04	1
Acenaphthene	1.1E-01	4.8E-01	8.3E-05	3.5E-04	6.7E-06	4.1E-04	1
Acenaphthylene	2.4E-02	8.6E-02	1.8E-05	6.2E-05	1.4E-06	7.3E-05	1

Spreadsheet C2-74 (2 of 3)

Estimates of Human Intake
Edible Plant Ingestion Pathway for Child Resident
Old Conservation Yard RFI Site

Intake Equation: Dosage = $\frac{C \times IR \times CF \times F \times EF \times ED \times B}{BW \times AT}$

Exposure Parameters		Units	Typical	RME
Plant concentration	C	mg/kg	CS	CS
Plant ingestion rate	IR	g/day	47	166
Conversion factor	CF	kg/g	1.E-03	1.E-03
Fraction locally grown	F	unitless	0.24	1.0
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	6	6
Bioavailability	B	fraction	CS	CS
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
Anthracene	4.3E-02	1.7E-01	3.1E-05	1.2E-04	2.5E-06	1.4E-04	1
Benzo(a)anthracene	2.7E-03	1.3E-02	1.9E-06	9.1E-06	1.5E-07	1.1E-05	1
Benzo(a)pyrene	1.1E-03	5.1E-03	7.7E-07	3.7E-06	6.1E-08	4.3E-06	1
Benzo(e)pyrene	1.8E-03	7.9E-03	1.3E-06	5.8E-06	1.1E-07	6.7E-06	1
Benzo(b)fluoranthene	1.4E-03	6.2E-03	1.0E-06	4.5E-06	8.0E-08	5.3E-06	1
Benzo(g,h,i)perylene	2.0E-03	7.1E-03	1.4E-06	5.1E-06	1.1E-07	6.0E-06	1
Benzo(k)fluoranthene	1.5E-03	7.4E-03	1.1E-06	5.4E-06	8.9E-08	6.3E-06	1
Chrysene	3.8E-03	1.5E-02	2.8E-06	1.1E-05	2.2E-07	1.3E-05	1
Dibenz(a,h)anthracene	3.9E-04	1.6E-03	2.8E-07	1.1E-06	2.3E-08	1.3E-06	1
Fluoranthene	1.4E-02	6.6E-02	1.0E-05	4.8E-05	8.0E-07	5.6E-05	1
Fluorene	2.5E-02	1.1E-01	1.8E-05	7.6E-05	1.5E-06	8.9E-05	1
Indeno(1,2,3-cd)pyrene	2.8E-04	1.4E-03	2.0E-07	1.0E-06	1.6E-08	1.2E-06	1
Naphthalene	1.1E-01	2.6E-01	7.7E-05	1.9E-04	6.2E-06	2.3E-04	1
Perylene	2.4E-03	1.0E-02	1.7E-06	7.5E-06	1.4E-07	8.8E-06	1
Phenanthrene	1.4E-01	5.7E-01	9.9E-05	4.2E-04	7.9E-06	4.9E-04	1
Pyrene	1.5E-02	6.3E-02	1.1E-05	4.6E-05	8.8E-07	5.4E-05	1
Total Petroleum Hydrocarbons							
C08-C11(Gasoline Range)	1.7E+00	3.8E+00	1.2E-03	2.7E-03	9.8E-05	3.2E-03	1
C11-C14(Kerosene Range)	3.7E+00	7.3E+00	2.7E-03	5.3E-03	2.2E-04	6.2E-03	1
C14-C20(Diesel Range)	1.1E+01	4.5E+01	8.3E-03	3.2E-02	6.6E-04	3.8E-02	1
C20-C30(Lubricant Oil Range)	1.3E+01	6.3E+01	9.8E-03	4.6E-02	7.8E-04	5.3E-02	1
PCDD/PCDFs							
2,3,7,8-TCDD	NC	NC	NA	NA	NA	NA	1
1,2,3,7,8-PeCDD	NC	NC	NA	NA	NA	NA	1
1,2,3,4,7,8-HxCDD	NC	NC	NA	NA	NA	NA	1
1,2,3,6,7,8-HxCDD	NC	NC	NA	NA	NA	NA	1
1,2,3,7,8,9-HxCDD	NC	NC	NA	NA	NA	NA	1
1,2,3,4,6,7,8-HpCDD	NC	NC	NA	NA	NA	NA	1
OCDD	NC	NC	NA	NA	NA	NA	1
2,3,7,8-TCDF	NC	NC	NA	NA	NA	NA	1
1,2,3,7,8-PeCDF	NC	NC	NA	NA	NA	NA	1
2,3,4,7,8-PeCDF	NC	NC	NA	NA	NA	NA	1
1,2,3,4,7,8-HxCDF	NC	NC	NA	NA	NA	NA	1
1,2,3,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA	1
2,3,4,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA	1
1,2,3,7,8,9-HxCDF	NC	NC	NA	NA	NA	NA	1
1,2,3,4,6,7,8-HpCDF	NC	NC	NA	NA	NA	NA	1
1,2,3,4,7,8,9-HpCDF	NC	NC	NA	NA	NA	NA	1
OCDF	NC	NC	NA	NA	NA	NA	1

Spreadsheet C2-74 (3 of 3)

Estimates of Human Intake
Edible Plant Ingestion Pathway for Child Resident
Old Conservation Yard RFI Site

Intake Equation: Dosage = $\frac{C \times IR \times CF \times F \times EF \times ED \times B}{BW \times AT}$

Exposure Parameters		Units	Typical	RME
Plant concentration	C	mg/kg	CS	CS
Plant ingestion rate	IR	g/day	47	166
Conversion factor	CF	kg/g	1.E-03	1.E-03
Fraction locally grown	F	unitless	0.24	1.0
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	6	6
Bioavailability	B	fraction	CS	CS
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
PCBs							
Aroclor-1248	NC	NC	NA	NA	NA	NA	1
Aroclor-1254	3.8E-02	1.7E-01	2.7E-05	1.2E-04	2.2E-06	1.4E-04	1
Aroclor-1260	2.1E-01	2.3E+00	1.5E-04	1.6E-03	1.2E-05	1.9E-03	1
PCB-105	3.4E-05	3.6E-04	2.5E-08	2.6E-07	2.0E-09	3.1E-07	1
PCB-114	6.3E-07	6.5E-06	4.6E-10	4.7E-09	3.7E-11	5.5E-09	1
PCB-118	6.9E-05	7.3E-04	5.0E-08	5.3E-07	4.0E-09	6.2E-07	1
PCB-123	9.7E-07	1.0E-05	7.0E-10	7.5E-09	5.6E-11	8.7E-09	1
PCB-126	2.6E-06	2.8E-05	1.9E-09	2.0E-08	1.5E-10	2.4E-08	1
PCB-156	2.3E-05	2.4E-04	1.6E-08	1.8E-07	1.3E-09	2.1E-07	1
PCB-157	1.0E-05	1.1E-04	7.3E-09	7.9E-08	5.9E-10	9.2E-08	1
PCB-167	1.8E-05	1.9E-04	1.3E-08	1.4E-07	1.0E-09	1.6E-07	1
PCB-169	2.6E-07	2.8E-06	1.9E-10	2.0E-09	1.5E-11	2.4E-09	1
PCB-189	2.6E-06	2.8E-05	1.9E-09	2.0E-08	1.5E-10	2.4E-08	1
PCB-77	3.0E-06	3.2E-05	2.2E-09	2.3E-08	1.8E-10	2.7E-08	1
PCB-81	5.4E-07	5.7E-06	3.9E-10	4.1E-09	3.1E-11	4.8E-09	1

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyls
mg/kg-day - milligrams per kilogram per day
mg/kg - milligrams per kilogram

Estimates of Human Intake
Domestic Groundwater Use for Child Resident
Old Conservation Yard RFI Site

Intake Equation: Dosage = $\frac{C \times IR \times FT \times EF \times ED \times B}{BW \times AT}$

Exposure Parameters		Units	Typical	RME
Groundwater concentration	C	mg/L	CS	CS
Groundwater ingestion rate$_{voc}$	IR	L/day	1.5	2.5
Groundwater ingestion rate$_{non\text{-}vocs}$	IR	L/day	0.75	1.25
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	6	6
Bioavailability	B	fraction	CS	CS
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/L)	RME EPC (mg/L)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
Inorganic Compounds							
Antimony	NC	NC	NA	NA	NA	NA	1
Barium	NC	NC	NA	NA	NA	NA	1
Boron	NC	NC	NA	NA	NA	NA	1
Cadmium	NC	NC	NA	NA	NA	NA	1
Copper	1.8E-02	1.8E-02	8.6E-04	1.4E-03	6.9E-05	1.2E-04	1
Fluoride	5.6E-01	5.6E-01	2.7E-02	4.5E-02	2.1E-03	3.6E-03	1
Lead	NC	NC	NA	NA	NA	NA	1
Mercury	NC	NC	NA	NA	NA	NA	1
Nitrate	1.4E+01	1.4E+01	6.8E-01	1.1E+00	5.4E-02	9.1E-02	1
Silver	NC	NC	NA	NA	NA	NA	1
Thallium	5.4E-04	5.4E-04	2.6E-05	4.3E-05	2.1E-06	3.5E-06	1
Zinc	NC	NC	NA	NA	NA	NA	1
VOCs							
1,1,1-Trichloroethane	NC	NC	NA	NA	NA	NA	1
1,1,2-Trichloro-1,2,2-trifluoroethane	NC	NC	NA	NA	NA	NA	1
1,1-Dichloroethane	2.6E-03	2.6E-03	2.5E-04	4.2E-04	2.0E-05	3.3E-05	1
1,1-Dichloroethene	NC	NC	NA	NA	NA	NA	1
2-Butanone	NC	NC	NA	NA	NA	NA	1
Acetone	1.6E-02	1.6E-02	1.5E-03	2.6E-03	1.2E-04	2.0E-04	1
Benzene	5.8E-04	5.8E-04	5.6E-05	9.3E-05	4.4E-06	7.4E-06	1
Carbon disulfide	2.6E-03	2.6E-03	2.5E-04	4.2E-04	2.0E-05	3.3E-05	1
Chloromethane	3.2E-04	3.2E-04	3.1E-05	5.1E-05	2.5E-06	4.1E-06	1
cis-1,2-Dichloroethene	5.1E-02	5.1E-02	4.9E-03	8.2E-03	3.9E-04	6.5E-04	1
Ethylbenzene	NC	NC	NA	NA	NA	NA	1
m,p-Xylene	NC	NC	NA	NA	NA	NA	1
Methylene chloride	6.4E-04	6.4E-04	6.1E-05	1.0E-04	4.9E-06	8.2E-06	1
o-Xylene	NC	NC	NA	NA	NA	NA	1
p-Isopropyltoluene	NC	NC	NA	NA	NA	NA	1
Toluene	1.8E-03	1.8E-03	1.7E-04	2.9E-04	1.4E-05	2.3E-05	1
Trichloroethene	1.0E-02	1.0E-02	9.6E-04	1.6E-03	7.7E-05	1.3E-04	1
SVOCs							
1-Methylnaphthalene	NC	NC	NA	NA	NA	NA	1
2-Methylnaphthalene	NC	NC	NA	NA	NA	NA	1
Acenaphthene	NC	NC	NA	NA	NA	NA	1
Acenaphthylene	NC	NC	NA	NA	NA	NA	1
Anthracene	NC	NC	NA	NA	NA	NA	1

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Estimates of Human Intake
Domestic Groundwater Use for Child Resident
Old Conservation Yard RFI Site

Intake Equation: Dosage = $\frac{C \times IR \times FT \times EF \times ED \times B}{BW \times AT}$

Exposure Parameters		Units	Typical	RME
Groundwater concentration	C	mg/L	CS	CS
Groundwater ingestion rate$_{voc}$	IR	L/day	1.5	2.5
Groundwater ingestion rate$_{non\text{-}vocs}$	IR	L/day	0.75	1.25
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	6	6
Bioavailability	B	fraction	CS	CS
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/L)	RME EPC (mg/L)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
Benzo(a)anthracene	NC	NC	NA	NA	NA	NA	1
Benzo(a)pyrene	NC	NC	NA	NA	NA	NA	1
Benzo(b)fluoranthene	NC	NC	NA	NA	NA	NA	1
Benzo(g,h,i)perylene	NC	NC	NA	NA	NA	NA	1
Benzo(k)fluoranthene	NC	NC	NA	NA	NA	NA	1
Chrysene	NC	NC	NA	NA	NA	NA	1
Dibenz(a,h)anthracene	NC	NC	NA	NA	NA	NA	1
Benzo(e)pyrene	NC	NC	NA	NA	NA	NA	1
Fluoranthene	NC	NC	NA	NA	NA	NA	1
Fluorene	NC	NC	NA	NA	NA	NA	1
Indeno(1,2,3-cd)pyrene	NC	NC	NA	NA	NA	NA	1
Naphthalene	NC	NC	NA	NA	NA	NA	1
Perylene	NC	NC	NA	NA	NA	NA	1
Phenanthrene	NC	NC	NA	NA	NA	NA	1
Pyrene	NC	NC	NA	NA	NA	NA	1
Total Petroleum Hydrocarbons							
C08-C11(Gasoline Range)	NC	NC	NA	NA	NA	NA	1
C11-C14(Kerosene Range)	NC	NC	NA	NA	NA	NA	1
C14-C20(Diesel Range)	5.0E-02	5.0E-02	2.4E-03	4.0E-03	1.9E-04	3.2E-04	1
C20-C30(Lubricant Oil Range)	NC	NC	NA	NA	NA	NA	1
PCDD/PCDFs							
2,3,7,8-TCDD	NC	NC	NA	NA	NA	NA	1
1,2,3,7,8-PeCDD	NC	NC	NA	NA	NA	NA	1
1,2,3,4,7,8-HxCDD	NC	NC	NA	NA	NA	NA	1
1,2,3,6,7,8-HxCDD	NC	NC	NA	NA	NA	NA	1
1,2,3,7,8,9-HxCDD	NC	NC	NA	NA	NA	NA	1
1,2,3,4,6,7,8-HpCDD	NC	NC	NA	NA	NA	NA	1
OCDD	NC	NC	NA	NA	NA	NA	1
2,3,7,8-TCDF	NC	NC	NA	NA	NA	NA	1
1,2,3,7,8-PeCDF	NC	NC	NA	NA	NA	NA	1
2,3,4,7,8-PeCDF	NC	NC	NA	NA	NA	NA	1
1,2,3,4,7,8-HxCDF	NC	NC	NA	NA	NA	NA	1
1,2,3,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA	1
2,3,4,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA	1
1,2,3,7,8,9-HxCDF	NC	NC	NA	NA	NA	NA	1
1,2,3,4,6,7,8-HpCDF	NC	NC	NA	NA	NA	NA	1
1,2,3,4,7,8,9-HpCDF	NC	NC	NA	NA	NA	NA	1
OCDF	NC	NC	NA	NA	NA	NA	1
PCBs							
Aroclor-1248	NC	NC	NA	NA	NA	NA	1

Spreadsheet C2-73 (3 of 3)

Estimates of Human Intake
Domestic Groundwater Use for Child Resident
Old Conservation Yard RFI Site

Intake Equation: Dosage = $\frac{C \times IR \times FT \times EF \times ED \times B}{BW \times AT}$

Exposure Parameters		Units	Typical	RME
Groundwater concentration	C	mg/L	CS	CS
Groundwater ingestion rate$_{voc}$	IR	L/day	1.5	2.5
Groundwater ingestion rate$_{non\text{-}vocs}$	IR	L/day	0.75	1.25
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	6	6
Bioavailability	B	fraction	CS	CS
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/L)	RME EPC (mg/L)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
Aroclor-1254	NC	NC	NA	NA	NA	NA	1
Aroclor-1260	NC	NC	NA	NA	NA	NA	1
PCB-105	NC	NC	NA	NA	NA	NA	1
PCB-114	NC	NC	NA	NA	NA	NA	1
PCB-118	NC	NC	NA	NA	NA	NA	1
PCB-123	NC	NC	NA	NA	NA	NA	1
PCB-126	NC	NC	NA	NA	NA	NA	1
PCB-156	NC	NC	NA	NA	NA	NA	1
PCB-157	NC	NC	NA	NA	NA	NA	1
PCB-167	NC	NC	NA	NA	NA	NA	1
PCB-169	NC	NC	NA	NA	NA	NA	1
PCB-189	NC	NC	NA	NA	NA	NA	1
PCB-77	NC	NC	NA	NA	NA	NA	1
PCB-81	NC	NC	NA	NA	NA	NA	1

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
mg/kg-day - milligrams per kilogram per day
mg/L - milligrams per liter

Estimates of Human Intake
Groundwater to Indoor Air Pathway for Child Resident
Old Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	8.4	8.4
Fraction of time indoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	6	6
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Inorganic Compounds						
Antimony	NC	NC	NA	NA	NA	NA
Barium	NC	NC	NA	NA	NA	NA
Boron	NC	NC	NA	NA	NA	NA
Cadmium	NC	NC	NA	NA	NA	NA
Copper	NC	NC	NA	NA	NA	NA
Fluoride	NC	NC	NA	NA	NA	NA
Lead	NC	NC	NA	NA	NA	NA
Mercury	NC	NC	NA	NA	NA	NA
Nitrate	NC	NC	NA	NA	NA	NA
Silver	NC	NC	NA	NA	NA	NA
Thallium	NC	NC	NA	NA	NA	NA
Zinc	NC	NC	NA	NA	NA	NA
VOCs						
1,1,1-Trichloroethane	NC	NC	NA	NA	NA	NA
1,1,2-Trichloro-1,2,2-trifluoroethane	NC	NC	NA	NA	NA	NA
1,1-Dichloroethane	NC	NC	NA	NA	NA	NA
1,1-Dichloroethene	NC	NC	NA	NA	NA	NA
2-Butanone	NC	NC	NA	NA	NA	NA
Acetone	NC	NC	NA	NA	NA	NA
Benzene	NC	NC	NA	NA	NA	NA
Carbon disulfide	NC	NC	NA	NA	NA	NA
Chloromethane	2.1E-06	2.1E-06	5.5E-07	8.3E-07	4.4E-08	6.6E-08
cis-1,2-Dichloroethene	9.1E-07	9.1E-07	2.4E-07	3.7E-07	2.0E-08	2.9E-08
Ethylbenzene	NC	NC	NA	NA	NA	NA
m,p-Xylene	NC	NC	NA	NA	NA	NA
Methylene chloride	NC	NC	NA	NA	NA	NA
o-Xylene	NC	NC	NA	NA	NA	NA
p-Isopropyltoluene	NC	NC	NA	NA	NA	NA
Toluene	NC	NC	NA	NA	NA	NA
Trichloroethene	2.7E-05	2.7E-05	7.4E-06	1.1E-05	5.9E-07	8.8E-07
SVOCs						
1-Methylnaphthalene	NC	NC	NA	NA	NA	NA
2-Methylnaphthalene	NC	NC	NA	NA	NA	NA
Acenaphthene	NC	NC	NA	NA	NA	NA
Acenaphthylene	NC	NC	NA	NA	NA	NA
Anthracene	NC	NC	NA	NA	NA	NA
Benzo(a)anthracene	NC	NC	NA	NA	NA	NA

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Estimates of Human Intake
Groundwater to Indoor Air Pathway for Child Resident
Old Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	8.4	8.4
Fraction of time indoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	6	6
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Benzo(a)pyrene	NC	NC	NA	NA	NA	NA
Benzo(b)fluoranthene	NC	NC	NA	NA	NA	NA
Benzo(g,h,i)perylene	NC	NC	NA	NA	NA	NA
Benzo(k)fluoranthene	NC	NC	NA	NA	NA	NA
Chrysene	NC	NC	NA	NA	NA	NA
Dibenz(a,h)anthracene	NC	NC	NA	NA	NA	NA
Benzo(e)pyrene	NC	NC	NA	NA	NA	NA
Fluoranthene	NC	NC	NA	NA	NA	NA
Fluorene	NC	NC	NA	NA	NA	NA
Indeno(1,2,3-cd)pyrene	NC	NC	NA	NA	NA	NA
Naphthalene	NC	NC	NA	NA	NA	NA
Perylene	NC	NC	NA	NA	NA	NA
Phenanthrene	NC	NC	NA	NA	NA	NA
Pyrene	NC	NC	NA	NA	NA	NA
Total Petroleum Hydrocarbons						
C08-C11(Gasoline Range)	NC	NC	NA	NA	NA	NA
C11-C14(Kerosene Range)	NC	NC	NA	NA	NA	NA
C14-C20(Diesel Range)	NC	NC	NA	NA	NA	NA
C20-C30(Lubricant Oil Range)	NC	NC	NA	NA	NA	NA
PCDD/PCDFs						
2,3,7,8-TCDD	NC	NC	NA	NA	NA	NA
1,2,3,7,8-PeCDD	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,6,7,8-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,7,8,9-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,4,6,7,8-HpCDD	NC	NC	NA	NA	NA	NA
OCDD	NC	NC	NA	NA	NA	NA
2,3,7,8-TCDF	NC	NC	NA	NA	NA	NA
1,2,3,7,8-PeCDF	NC	NC	NA	NA	NA	NA
2,3,4,7,8-PeCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA
2,3,4,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,7,8,9-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,6,7,8-HpCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8,9-HpCDF	NC	NC	NA	NA	NA	NA
OCDF	NC	NC	NA	NA	NA	NA

Spreadsheet C2-72 (3 of 3)

Estimates of Human Intake
Groundwater to Indoor Air Pathway for Child Resident
Old Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	8.4	8.4
Fraction of time indoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	6	6
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
PCBs						
Aroclor-1248	NC	NC	NA	NA	NA	NA
Aroclor-1254	NC	NC	NA	NA	NA	NA
Aroclor-1260	NC	NC	NA	NA	NA	NA
PCB-105	NC	NC	NA	NA	NA	NA
PCB-114	NC	NC	NA	NA	NA	NA
PCB-118	NC	NC	NA	NA	NA	NA
PCB-123	NC	NC	NA	NA	NA	NA
PCB-126	NC	NC	NA	NA	NA	NA
PCB-156	NC	NC	NA	NA	NA	NA
PCB-157	NC	NC	NA	NA	NA	NA
PCB-167	NC	NC	NA	NA	NA	NA
PCB-169	NC	NC	NA	NA	NA	NA
PCB-189	NC	NC	NA	NA	NA	NA
PCB-77	NC	NC	NA	NA	NA	NA
PCB-81	NC	NC	NA	NA	NA	NA

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
mg/kg-day - milligrams per kilogram per day
mg/m^3 - milligrams per cubic meter

Estimates of Human Intake
Soil Vapor to Indoor Air Pathway for Child Resident
Old Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	8.4	8.4
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	6	6
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Inorganic Compounds						
Antimony	NC	NC	NA	NA	NA	NA
Barium	NC	NC	NA	NA	NA	NA
Boron	NC	NC	NA	NA	NA	NA
Cadmium	NC	NC	NA	NA	NA	NA
Copper	NC	NC	NA	NA	NA	NA
Fluoride	NC	NC	NA	NA	NA	NA
Lead	NC	NC	NA	NA	NA	NA
Mercury	NC	NC	NA	NA	NA	NA
Nitrate	NC	NC	NA	NA	NA	NA
Silver	NC	NC	NA	NA	NA	NA
Thallium	NC	NC	NA	NA	NA	NA
Zinc	NC	NC	NA	NA	NA	NA
VOCs						
1,1,1-Trichloroethane	7.3E-04	9.1E-04	2.0E-04	3.7E-04	1.6E-05	2.9E-05
1,1,2-Trichloro-1,2,2-trifluoroethane	1.3E-03	2.4E-03	3.4E-04	9.7E-04	2.7E-05	7.8E-05
1,1-Dichloroethane	NC	NC	NA	NA	NA	NA
1,1-Dichloroethene	7.7E-04	9.4E-04	2.1E-04	3.8E-04	1.6E-05	3.0E-05
2-Butanone	NC	NC	NA	NA	NA	NA
Acetone	NC	NC	NA	NA	NA	NA
Benzene	6.6E-04	6.6E-04	1.8E-04	2.7E-04	1.4E-05	2.1E-05
Carbon disulfide	NC	NC	NA	NA	NA	NA
Chloromethane	NC	NC	NA	NA	NA	NA
cis-1,2-Dichloroethene	NC	NC	NA	NA	NA	NA
Ethylbenzene	2.7E-04	5.5E-04	7.3E-05	2.2E-04	5.9E-06	1.8E-05
m,p-Xylene	5.9E-04	1.2E-03	1.6E-04	4.8E-04	1.3E-05	3.8E-05
Methylene chloride	7.0E-04	3.5E-02	1.9E-04	1.4E-02	1.5E-05	1.1E-03
o-Xylene	1.3E-04	2.7E-04	3.6E-05	1.1E-04	2.9E-06	8.6E-06
p-Isopropyltoluene	4.2E-04	4.2E-04	1.1E-04	1.7E-04	9.0E-06	1.3E-05
Toluene	6.1E-04	6.6E-04	1.6E-04	2.7E-04	1.3E-05	2.1E-05
Trichloroethene	1.4E-03	4.6E-03	3.7E-04	1.8E-03	2.9E-05	1.5E-04
SVOCs						
1-Methylnaphthalene	NC	NC	NA	NA	NA	NA
2-Methylnaphthalene	NC	NC	NA	NA	NA	NA
Acenaphthene	NC	NC	NA	NA	NA	NA
Acenaphthylene	NC	NC	NA	NA	NA	NA
Anthracene	NC	NC	NA	NA	NA	NA
Benzo(a)anthracene	NC	NC	NA	NA	NA	NA

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Estimates of Human Intake
Soil Vapor to Indoor Air Pathway for Child Resident
Old Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	8.4	8.4
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	6	6
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Benzo(a)pyrene	NC	NC	NA	NA	NA	NA
Benzo(e)pyrene	NC	NC	NA	NA	NA	NA
Benzo(b)fluoranthene	NC	NC	NA	NA	NA	NA
Benzo(g,h,i)perylene	NC	NC	NA	NA	NA	NA
Benzo(k)fluoranthene	NC	NC	NA	NA	NA	NA
Chrysene	NC	NC	NA	NA	NA	NA
Dibenz(a,h)anthracene	NC	NC	NA	NA	NA	NA
Fluoranthene	NC	NC	NA	NA	NA	NA
Fluorene	NC	NC	NA	NA	NA	NA
Indeno(1,2,3-cd)pyrene	NC	NC	NA	NA	NA	NA
Naphthalene	NC	NC	NA	NA	NA	NA
Perylene	NC	NC	NA	NA	NA	NA
Phenanthrene	NC	NC	NA	NA	NA	NA
Pyrene	NC	NC	NA	NA	NA	NA
Total Petroleum Hydrocarbons						
C08-C11(Gasoline Range)	NC	NC	NA	NA	NA	NA
C11-C14(Kerosene Range)	NC	NC	NA	NA	NA	NA
C14-C20(Diesel Range)	NC	NC	NA	NA	NA	NA
C20-C30(Lubricant Oil Range)	NC	NC	NA	NA	NA	NA
PCDD/PCDFs						
2,3,7,8-TCDD	NC	NC	NA	NA	NA	NA
1,2,3,7,8-PeCDD	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,6,7,8-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,7,8,9-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,4,6,7,8-HpCDD	NC	NC	NA	NA	NA	NA
OCDD	NC	NC	NA	NA	NA	NA
2,3,7,8-TCDF	NC	NC	NA	NA	NA	NA
1,2,3,7,8-PeCDF	NC	NC	NA	NA	NA	NA
2,3,4,7,8-PeCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA
2,3,4,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,7,8,9-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,6,7,8-HpCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8,9-HpCDF	NC	NC	NA	NA	NA	NA
OCDF	NC	NC	NA	NA	NA	NA

Spreadsheet C2-70 (3 of 3)

Estimates of Human Intake
Soil Vapor to Indoor Air Pathway for Child Resident
Old Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	8.4	8.4
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	6	6
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
PCBs						
Aroclor-1248	NC	NC	NA	NA	NA	NA
Aroclor-1254	NC	NC	NA	NA	NA	NA
Aroclor-1260	NC	NC	NA	NA	NA	NA
PCB-105	NC	NC	NA	NA	NA	NA
PCB-114	NC	NC	NA	NA	NA	NA
PCB-118	NC	NC	NA	NA	NA	NA
PCB-123	NC	NC	NA	NA	NA	NA
PCB-126	NC	NC	NA	NA	NA	NA
PCB-156	NC	NC	NA	NA	NA	NA
PCB-157	NC	NC	NA	NA	NA	NA
PCB-167	NC	NC	NA	NA	NA	NA
PCB-169	NC	NC	NA	NA	NA	NA
PCB-189	NC	NC	NA	NA	NA	NA
PCB-77	NC	NC	NA	NA	NA	NA
PCB-81	NC	NC	NA	NA	NA	NA

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyls
mg/kg-day - milligrams per kilogram per day
mg/m^3 - milligrams per cubic meter

Estimates of Human Intake
Groundwater to Ambient Air Pathway for Child Resident
Old Conservation Yard RFI Site

Intake Equation: Dosage = $\frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	8.4	8.4
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	6	6
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Inorganic Compounds						
Antimony	NC	NC	NA	NA	NA	NA
Barium	NC	NC	NA	NA	NA	NA
Boron	NC	NC	NA	NA	NA	NA
Cadmium	NC	NC	NA	NA	NA	NA
Copper	NC	NC	NA	NA	NA	NA
Fluoride	NC	NC	NA	NA	NA	NA
Lead	NC	NC	NA	NA	NA	NA
Mercury	NC	NC	NA	NA	NA	NA
Nitrate	NC	NC	NA	NA	NA	NA
Silver	NC	NC	NA	NA	NA	NA
Thallium	NC	NC	NA	NA	NA	NA
Zinc	NC	NC	NA	NA	NA	NA
VOCs						
1,1,1-Trichloroethane	NC	NC	NA	NA	NA	NA
1,1,2-Trichloro-1,2,2-trifluoroethane	NC	NC	NA	NA	NA	NA
1,1-Dichloroethane	NC	NC	NA	NA	NA	NA
1,1-Dichloroethene	NC	NC	NA	NA	NA	NA
2-Butanone	NC	NC	NA	NA	NA	NA
Acetone	NC	NC	NA	NA	NA	NA
Benzene	NC	NC	NA	NA	NA	NA
Carbon disulfide	NC	NC	NA	NA	NA	NA
Chloromethane	1.3E-07	1.3E-07	3.5E-08	5.3E-08	2.8E-09	4.2E-09
cis-1,2-Dichloroethene	3.2E-08	3.2E-08	8.6E-09	1.3E-08	6.9E-10	1.0E-09
Ethylbenzene	NC	NC	NA	NA	NA	NA
m,p-Xylene	NC	NC	NA	NA	NA	NA
Methylene chloride	NC	NC	NA	NA	NA	NA
o-Xylene	NC	NC	NA	NA	NA	NA
p-Isopropyltoluene	NC	NC	NA	NA	NA	NA
Toluene	NC	NC	NA	NA	NA	NA
Trichloroethene	1.1E-06	1.1E-06	2.9E-07	4.4E-07	2.3E-08	3.5E-08
SVOCs						
1-Methylnaphthalene	NC	NC	NA	NA	NA	NA
2-Methylnaphthalene	NC	NC	NA	NA	NA	NA
Acenaphthene	NC	NC	NA	NA	NA	NA
Acenaphthylene	NC	NC	NA	NA	NA	NA
Anthracene	NC	NC	NA	NA	NA	NA
Benzo(a)anthracene	NC	NC	NA	NA	NA	NA

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Estimates of Human Intake
Groundwater to Ambient Air Pathway for Child Resident
Old Conservation Yard RFI Site

Intake Equation: Dosage = $\frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	8.4	8.4
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	6	6
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Benzo(a)pyrene	NC	NC	NA	NA	NA	NA
Benzo(b)fluoranthene	NC	NC	NA	NA	NA	NA
Benzo(g,h,i)perylene	NC	NC	NA	NA	NA	NA
Benzo(k)fluoranthene	NC	NC	NA	NA	NA	NA
Chrysene	NC	NC	NA	NA	NA	NA
Dibenz(a,h)anthracene	NC	NC	NA	NA	NA	NA
Benzo(e)pyrene	NC	NC	NA	NA	NA	NA
Fluoranthene	NC	NC	NA	NA	NA	NA
Fluorene	NC	NC	NA	NA	NA	NA
Indeno(1,2,3-cd)pyrene	NC	NC	NA	NA	NA	NA
Naphthalene	NC	NC	NA	NA	NA	NA
Perylene	NC	NC	NA	NA	NA	NA
Phenanthrene	NC	NC	NA	NA	NA	NA
Pyrene	NC	NC	NA	NA	NA	NA
Total Petroleum Hydrocarbons						
C08-C11(Gasoline Range)	NC	NC	NA	NA	NA	NA
C11-C14(Kerosene Range)	NC	NC	NA	NA	NA	NA
C14-C20(Diesel Range)	NC	NC	NA	NA	NA	NA
C20-C30(Lubricant Oil Range)	NC	NC	NA	NA	NA	NA
PCDD/PCDFs						
2,3,7,8-TCDD	NC	NC	NA	NA	NA	NA
1,2,3,7,8-PeCDD	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,6,7,8-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,7,8,9-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,4,6,7,8-HpCDD	NC	NC	NA	NA	NA	NA
OCDD	NC	NC	NA	NA	NA	NA
2,3,7,8-TCDF	NC	NC	NA	NA	NA	NA
1,2,3,7,8-PeCDF	NC	NC	NA	NA	NA	NA
2,3,4,7,8-PeCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA
2,3,4,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,7,8,9-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,6,7,8-HpCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8,9-HpCDF	NC	NC	NA	NA	NA	NA
OCDF	NC	NC	NA	NA	NA	NA

Spreadsheet C2-69 (3 of 3)

Estimates of Human Intake
Groundwater to Ambient Air Pathway for Child Resident
Old Conservation Yard RFI Site

Intake Equation: Dosage = $\frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	8.4	8.4
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	6	6
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
PCBs						
Aroclor-1248	NC	NC	NA	NA	NA	NA
Aroclor-1254	NC	NC	NA	NA	NA	NA
Aroclor-1260	NC	NC	NA	NA	NA	NA
PCB-105	NC	NC	NA	NA	NA	NA
PCB-114	NC	NC	NA	NA	NA	NA
PCB-118	NC	NC	NA	NA	NA	NA
PCB-123	NC	NC	NA	NA	NA	NA
PCB-126	NC	NC	NA	NA	NA	NA
PCB-156	NC	NC	NA	NA	NA	NA
PCB-157	NC	NC	NA	NA	NA	NA
PCB-167	NC	NC	NA	NA	NA	NA
PCB-169	NC	NC	NA	NA	NA	NA
PCB-189	NC	NC	NA	NA	NA	NA
PCB-77	NC	NC	NA	NA	NA	NA
PCB-81	NC	NC	NA	NA	NA	NA

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
mg/kg-day - milligrams per kilogram per day
mg/m^3 - milligrams per cubic meter

Estimates of Human Intake
Soil to Ambient Air Pathway for Child Resident
Old Conservation Yard RFI Site

Intake Equation: Dosage = $\frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	8.4	8.4
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	6	6
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Inorganic Compounds						
Antimony	NC	NC	NA	NA	NA	NA
Barium	NC	NC	NA	NA	NA	NA
Boron	NC	NC	NA	NA	NA	NA
Cadmium	NC	NC	NA	NA	NA	NA
Copper	NC	NC	NA	NA	NA	NA
Fluoride	NC	NC	NA	NA	NA	NA
Lead	NC	NC	NA	NA	NA	NA
Mercury	NC	NC	NA	NA	NA	NA
Nitrate	NC	NC	NA	NA	NA	NA
Silver	NC	NC	NA	NA	NA	NA
Thallium	NC	NC	NA	NA	NA	NA
Zinc	NC	NC	NA	NA	NA	NA
VOCs						
1,1,1-Trichloroethane	1.3E-05	1.3E-05	3.4E-06	5.1E-06	2.7E-07	4.1E-07
1,1,2-Trichloro-1,2,2-trifluoroethane	3.3E-05	3.3E-05	9.0E-06	1.3E-05	7.2E-07	1.1E-06
1,1-Dichloroethane	NC	NC	NA	NA	NA	NA
1,1-Dichloroethene	1.4E-05	1.4E-05	3.8E-06	5.6E-06	3.0E-07	4.5E-07
2-Butanone	NC	NC	NA	NA	NA	NA
Acetone	NC	NC	NA	NA	NA	NA
Benzene	9.8E-06	9.8E-06	2.6E-06	3.9E-06	2.1E-07	3.1E-07
Carbon disulfide	NC	NC	NA	NA	NA	NA
Chloromethane	NC	NC	NA	NA	NA	NA
cis-1,2-Dichloroethene	NC	NC	NA	NA	NA	NA
Ethylbenzene	7.4E-06	7.4E-06	2.0E-06	3.0E-06	1.6E-07	2.4E-07
m,p-Xylene	1.7E-05	1.7E-05	4.6E-06	6.9E-06	3.7E-07	5.5E-07
Methylene chloride	5.6E-04	5.6E-04	1.5E-04	2.3E-04	1.2E-05	1.8E-05
o-Xylene	3.9E-06	3.9E-06	1.0E-06	1.6E-06	8.4E-08	1.3E-07
p-Isopropyltoluene	NC	NC	NA	NA	NA	NA
Toluene	9.7E-06	9.7E-06	2.6E-06	3.9E-06	2.1E-07	3.1E-07
Trichloroethene	6.4E-05	6.4E-05	1.7E-05	2.6E-05	1.4E-06	2.1E-06
SVOCs						
1-Methylnaphthalene	NC	NC	NA	NA	NA	NA
2-Methylnaphthalene	NC	NC	NA	NA	NA	NA
Acenaphthene	NC	NC	NA	NA	NA	NA
Acenaphthylene	NC	NC	NA	NA	NA	NA
Anthracene	NC	NC	NA	NA	NA	NA
Benzo(a)anthracene	NC	NC	NA	NA	NA	NA

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Estimates of Human Intake
Soil to Ambient Air Pathway for Child Resident
Old Conservation Yard RFI Site

Intake Equation: Dosage = $\frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	8.4	8.4
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	6	6
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Benzo(a)pyrene	NC	NC	NA	NA	NA	NA
Benzo(e)pyrene	NC	NC	NA	NA	NA	NA
Benzo(b)fluoranthene	NC	NC	NA	NA	NA	NA
Benzo(g,h,i)perylene	NC	NC	NA	NA	NA	NA
Benzo(k)fluoranthene	NC	NC	NA	NA	NA	NA
Chrysene	NC	NC	NA	NA	NA	NA
Dibenz(a,h)anthracene	NC	NC	NA	NA	NA	NA
Fluoranthene	NC	NC	NA	NA	NA	NA
Fluorene	NC	NC	NA	NA	NA	NA
Indeno(1,2,3-cd)pyrene	NC	NC	NA	NA	NA	NA
Naphthalene	NC	NC	NA	NA	NA	NA
Perylene	NC	NC	NA	NA	NA	NA
Phenanthrene	NC	NC	NA	NA	NA	NA
Pyrene	NC	NC	NA	NA	NA	NA
Total Petroleum Hydrocarbons						
C08-C11(Gasoline Range)	NC	NC	NA	NA	NA	NA
C11-C14(Kerosene Range)	NC	NC	NA	NA	NA	NA
C14-C20(Diesel Range)	NC	NC	NA	NA	NA	NA
C20-C30(Lubricant Oil Range)	NC	NC	NA	NA	NA	NA
PCDD/PCDFs						
2,3,7,8-TCDD	NC	NC	NA	NA	NA	NA
1,2,3,7,8-PeCDD	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,6,7,8-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,7,8,9-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,4,6,7,8-HpCDD	NC	NC	NA	NA	NA	NA
OCDD	NC	NC	NA	NA	NA	NA
2,3,7,8-TCDF	NC	NC	NA	NA	NA	NA
1,2,3,7,8-PeCDF	NC	NC	NA	NA	NA	NA
2,3,4,7,8-PeCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA
2,3,4,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,7,8,9-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,6,7,8-HpCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8,9-HpCDF	NC	NC	NA	NA	NA	NA
OCDF	NC	NC	NA	NA	NA	NA

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Estimates of Human Intake
Soil to Ambient Air Pathway for Child Resident
Old Conservation Yard RFI Site

Intake Equation: Dosage = $\frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	8.4	8.4
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	6	6
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
PCBs						
Aroclor-1248	NC	NC	NA	NA	NA	NA
Aroclor-1254	NC	NC	NA	NA	NA	NA
Aroclor-1260	NC	NC	NA	NA	NA	NA
PCB-105	NC	NC	NA	NA	NA	NA
PCB-114	NC	NC	NA	NA	NA	NA
PCB-118	NC	NC	NA	NA	NA	NA
PCB-123	NC	NC	NA	NA	NA	NA
PCB-126	NC	NC	NA	NA	NA	NA
PCB-156	NC	NC	NA	NA	NA	NA
PCB-157	NC	NC	NA	NA	NA	NA
PCB-167	NC	NC	NA	NA	NA	NA
PCB-169	NC	NC	NA	NA	NA	NA
PCB-189	NC	NC	NA	NA	NA	NA
PCB-77	NC	NC	NA	NA	NA	NA
PCB-81	NC	NC	NA	NA	NA	NA

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyls
mg/kg-day - milligrams per kilogram per day
mg/m^3 - milligrams per cubic meter

Estimates of Human Intake
Soil Particulate Inhalation Pathway for Child Resident
Old Conservation Yard RFI Site

Intake Equation:

$$\text{Dosage} = \frac{C \times CF \times IR \times FT \times EF \times ED}{PEF \times BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Inhalation rate	IR	m^3/day	8.4	8.4
Conversion factor	CF	kg/ug	1.E-09	1.E-09
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	6	6
Particulate emission factor	PEF	m^3/ug	2.4	2.4
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Inorganic Compounds						
Antimony	NC	NC	NA	NA	NA	NA
Barium	NC	NC	NA	NA	NA	NA
Boron	4.3	5.2	4.8E-10	8.8E-10	3.8E-11	7.0E-11
Cadmium	0.5	1.0	5.8E-11	1.7E-10	4.6E-12	1.3E-11
Copper	NC	NC	NA	NA	NA	NA
Fluoride	NC	NC	NA	NA	NA	NA
Lead	17.0	20.7	1.9E-09	3.5E-09	1.5E-10	2.8E-10
Mercury	0.5	3.3	5.6E-11	5.5E-10	4.5E-12	4.4E-11
Nitrate	NC	NC	NA	NA	NA	NA
Silver	0.9	1.8	9.6E-11	3.0E-10	7.7E-12	2.4E-11
Thallium	0.9	1.7	9.7E-11	2.9E-10	7.7E-12	2.3E-11
Zinc	66.5	73.7	7.4E-09	1.2E-08	5.9E-10	9.9E-10
VOCs						
1,1,1-Trichloroethane	NC	NC	NA	NA	NA	NA
1,1,2-Trichloro-1,2,2-trifluoroethane	NC	NC	NA	NA	NA	NA
1,1-Dichloroethane	NC	NC	NA	NA	NA	NA
1,1-Dichloroethene	NC	NC	NA	NA	NA	NA
2-Butanone	NC	NC	NA	NA	NA	NA
Acetone	NC	NC	NA	NA	NA	NA
Benzene	NC	NC	NA	NA	NA	NA
Carbon disulfide	NC	NC	NA	NA	NA	NA
Chloromethane	NC	NC	NA	NA	NA	NA
cis-1,2-Dichloroethene	NC	NC	NA	NA	NA	NA
Ethylbenzene	NC	NC	NA	NA	NA	NA
m,p-Xylene	NC	NC	NA	NA	NA	NA
Methylene chloride	NC	NC	NA	NA	NA	NA
o-Xylene	NC	NC	NA	NA	NA	NA
p-Isopropyltoluene	NC	NC	NA	NA	NA	NA
Toluene	NC	NC	NA	NA	NA	NA
Trichloroethene	NC	NC	NA	NA	NA	NA
SVOCs						
1-Methylnaphthalene	1.2E-02	1.3E-02	1.3E-12	2.2E-12	1.1E-13	1.8E-13
2-Methylnaphthalene	1.7E-01	5.6E-01	1.9E-11	9.4E-11	1.5E-12	7.5E-12
Acenaphthene	1.7E-01	7.0E-01	1.9E-11	1.2E-10	1.5E-12	9.4E-12
Acenaphthylene	4.0E-02	1.4E-01	4.5E-12	2.4E-11	3.6E-13	1.9E-12

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Estimates of Human Intake
Soil Particulate Inhalation Pathway for Child Resident
Old Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times CF \times IR \times FT \times EF \times ED}{PEF \times BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Inhalation rate	IR	m^3/day	8.4	8.4
Conversion factor	CF	kg/ug	1.E-09	1.E-09
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	6	6
Particulate emission factor	PEF	m^3/ug	2.4	2.4
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Anthracene	1.2E-01	4.7E-01	1.3E-11	7.9E-11	1.1E-12	6.3E-12
Benzo(a)anthracene	3.9E-02	1.8E-01	4.3E-12	3.1E-11	3.4E-13	2.4E-12
Benzo(a)pyrene	3.6E-02	1.8E-01	4.1E-12	2.9E-11	3.2E-13	2.4E-12
Benzo(e)pyrene	7.1E-02	3.1E-01	7.9E-12	5.2E-11	6.3E-13	4.2E-12
Benzo(b)fluoranthene	4.4E-02	2.0E-01	4.9E-12	3.3E-11	3.9E-13	2.7E-12
Benzo(g,h,i)perylene	8.4E-02	3.0E-01	9.4E-12	5.0E-11	7.5E-13	4.0E-12
Benzo(k)fluoranthene	3.6E-02	1.8E-01	4.0E-12	2.9E-11	3.2E-13	2.4E-12
Chrysene	5.9E-02	2.4E-01	6.6E-12	4.0E-11	5.3E-13	3.2E-12
Dibenz(a,h)anthracene	2.6E-02	1.0E-01	2.9E-12	1.8E-11	2.3E-13	1.4E-12
Fluoranthene	9.0E-02	4.3E-01	1.0E-11	7.3E-11	8.1E-13	5.8E-12
Fluorene	1.7E-01	6.9E-01	1.9E-11	1.2E-10	1.5E-12	9.3E-12
Indeno(1,2,3-cd)pyrene	3.2E-02	1.7E-01	3.6E-12	2.8E-11	2.8E-13	2.2E-12
Naphthalene	6.3E-02	1.6E-01	7.0E-12	2.6E-11	5.6E-13	2.1E-12
Perylene	4.0E-02	1.8E-01	4.5E-12	3.0E-11	3.6E-13	2.4E-12
Phenanthrene	4.4E-01	1.9E+00	4.9E-11	3.1E-10	3.9E-12	2.5E-11
Pyrene	0.1	0.4	1.0E-11	6.2E-11	8.0E-13	5.0E-12
Total Petroleum Hydrocarbons						
C08-C11(Gasoline Range)	NC	NC	NA	NA	NA	NA
C11-C14(Kerosene Range)	11.1	21.7	0.0	0.0	0.0	0.0
C14-C20(Diesel Range)	65.1	255.4	7.3E-09	4.3E-08	5.8E-10	3.4E-09
C20-C30(Lubricant Oil Range)	292.8	1368.0	3.3E-08	2.3E-07	2.6E-09	1.8E-08
PCDD/PCDFs						
2,3,7,8-TCDD	1.0E-06	1.8E-06	1.1E-16	3.0E-16	9.1E-18	2.4E-17
1,2,3,7,8-PeCDD	6.6E-06	5.2E-05	7.4E-16	8.7E-15	5.9E-17	7.0E-16
1,2,3,4,7,8-HxCDD	1.4E-05	5.3E-05	1.6E-15	8.9E-15	1.3E-16	7.1E-16
1,2,3,6,7,8-HxCDD	2.0E-05	1.0E-04	2.2E-15	1.7E-14	1.8E-16	1.4E-15
1,2,3,7,8,9-HxCDD	1.8E-05	8.6E-05	2.0E-15	1.4E-14	1.6E-16	1.2E-15
1,2,3,4,6,7,8-HpCDD	4.9E-04	2.9E-03	5.5E-14	4.9E-13	4.4E-15	3.9E-14
OCDD	3.7E-03	8.2E-03	4.1E-13	1.4E-12	3.3E-14	1.1E-13
2,3,7,8-TCDF	2.2E-06	1.0E-05	2.5E-16	1.7E-15	2.0E-17	1.3E-16
1,2,3,7,8-PeCDF	1.8E-06	9.5E-06	2.0E-16	1.6E-15	1.6E-17	1.3E-16
2,3,4,7,8-PeCDF	5.1E-06	3.0E-05	5.7E-16	5.0E-15	4.6E-17	4.0E-16
1,2,3,4,7,8-HxCDF	1.3E-05	6.2E-05	1.4E-15	1.0E-14	1.2E-16	8.3E-16
1,2,3,6,7,8-HxCDF	4.9E-06	1.0E-05	5.5E-16	1.7E-15	4.4E-17	1.3E-16
2,3,4,6,7,8-HxCDF	5.2E-06	2.9E-05	5.9E-16	4.8E-15	4.7E-17	3.9E-16
1,2,3,7,8,9-HxCDF	2.3E-06	1.0E-05	2.6E-16	1.7E-15	2.1E-17	1.4E-16
1,2,3,4,6,7,8-HpCDF	5.5E-05	1.2E-04	6.2E-15	2.0E-14	5.0E-16	1.6E-15
1,2,3,4,7,8,9-HpCDF	7.2E-06	3.0E-05	8.1E-16	5.1E-15	6.4E-17	4.1E-16
OCDF	1.8E-04	4.1E-04	2.0E-14	6.9E-14	1.6E-15	5.5E-15

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Estimates of Human Intake
Soil Particulate Inhalation Pathway for Child Resident
Old Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times CF \times IR \times FT \times EF \times ED}{PEF \times BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Inhalation rate	IR	m^3/day	8.4	8.4
Conversion factor	CF	kg/ug	1.E-09	1.E-09
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	6	6
Particulate emission factor	PEF	m^3/ug	2.4	2.4
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
PCBs						
Aroclor-1248	5.0E+02	5.5E+03	5.6E-08	9.2E-07	4.5E-09	7.4E-08
Aroclor-1254	1.2E+00	5.4E+00	1.4E-10	9.1E-10	1.1E-11	7.2E-11
Aroclor-1260	1.3E+01	1.4E+02	1.5E-09	2.4E-08	1.2E-10	1.9E-09
PCB-105	1.1E-03	1.2E-02	1.2E-13	2.0E-12	1.0E-14	1.6E-13
PCB-114	2.1E-05	2.1E-04	2.3E-15	3.5E-14	1.8E-16	2.8E-15
PCB-118	2.2E-03	2.4E-02	2.5E-13	4.0E-12	2.0E-14	3.2E-13
PCB-123	3.1E-05	3.3E-04	3.5E-15	5.6E-14	2.8E-16	4.5E-15
PCB-126	8.6E-05	9.2E-04	9.6E-15	1.5E-13	7.7E-16	1.2E-14
PCB-156	7.4E-04	7.9E-03	8.2E-14	1.3E-12	6.6E-15	1.1E-13
PCB-157	3.3E-04	3.5E-03	3.7E-14	5.9E-13	2.9E-15	4.7E-14
PCB-167	5.7E-04	6.1E-03	6.4E-14	1.0E-12	5.1E-15	8.3E-14
PCB-169	8.5E-06	9.2E-05	9.5E-16	1.5E-14	7.6E-17	1.2E-15
PCB-189	8.5E-05	9.2E-04	9.5E-15	1.5E-13	7.6E-16	1.2E-14
PCB-77	1.7E-04	1.8E-03	1.9E-14	3.1E-13	1.5E-15	2.5E-14
PCB-81	3.1E-05	3.2E-04	3.4E-15	5.4E-14	2.7E-16	4.4E-15

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyls
mg/kg-day - milligrams per kilogram per day
mg/kg - milligrams per kilogram

Estimates of Human Intake
Soil Dermal Contact Pathway for Child Resident
Old Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times SA \times AF \times B \times CF \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Skin surface area per event	SA	cm^2/day	2800	2800
Soil loading to skin	AF	mg/cm^2	0.06	0.20
Bioavailability	B	fraction	CS	CS
Conversion factor	CF	kg/mg	1.E-06	1.E-06
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	6	6
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
Inorganic Compounds							
Antimony	NC	NC	NA	NA	NA	NA	0.01
Barium	NC	NC	NA	NA	NA	NA	0.01
Boron	4.3E+00	5.2E+00	4.6E-07	1.9E-06	3.7E-08	1.5E-07	0.01
Cadmium	5.2E-01	9.9E-01	5.6E-09	3.6E-08	4.5E-10	2.8E-09	0.00
Copper	NC	NC	NA	NA	NA	NA	0.01
Fluoride	NC	NC	NA	NA	NA	NA	0.01
Lead	1.7E+01	2.1E+01	1.8E-06	7.4E-06	1.5E-07	5.9E-07	0.01
Mercury	5.0E-01	3.3E+00	5.4E-08	1.2E-06	4.3E-09	9.3E-08	0.01
Nitrate	NC	NC	NA	NA	NA	NA	0.01
Silver	8.6E-01	1.8E+00	9.2E-08	6.4E-07	7.4E-09	5.1E-08	0.01
Thallium	8.6E-01	1.7E+00	9.3E-08	6.1E-07	7.4E-09	4.9E-08	0.01
Zinc	6.6E+01	7.4E+01	7.1E-06	2.6E-05	5.7E-07	2.1E-06	0.01
VOCs							
1,1,1-Trichloroethane	3.0E-03	5.5E-03	3.2E-09	2.0E-08	2.6E-10	1.6E-09	0.10
1,1,2-Trichloro-1,2,2-trifluoroethane	1.2E-02	2.1E-02	1.3E-08	7.3E-08	1.1E-09	5.9E-09	0.10
1,1-Dichloroethane	NC	NC	NA	NA	NA	NA	0.10
1,1-Dichloroethene	3.2E-03	5.5E-03	3.4E-09	2.0E-08	2.7E-10	1.6E-09	0.10
2-Butanone	2.2E-02	1.1E-02	2.4E-08	3.9E-08	1.9E-09	3.2E-09	0.10
Acetone	3.5E-01	3.5E+00	3.8E-07	1.3E-05	3.0E-08	1.0E-06	0.10
Benzene	1.1E-03	2.5E-03	1.2E-09	8.9E-09	9.7E-11	7.1E-10	0.10
Carbon disulfide	NC	NC	NA	NA	NA	NA	0.01
Chloromethane	NC	NC	NA	NA	NA	NA	0.10
cis-1,2-Dichloroethene	NC	NC	NA	NA	NA	NA	0.10
Ethylbenzene	1.1E-03	2.5E-03	1.2E-09	8.9E-09	9.7E-11	7.1E-10	0.10
m,p-Xylene	3.2E-03	7.2E-03	3.5E-09	2.6E-08	2.8E-10	2.1E-09	0.10
Methylene chloride	4.1E-02	2.4E-01	4.4E-08	8.8E-07	3.5E-09	7.0E-08	0.10
o-Xylene	7.8E-04	1.7E-03	8.4E-10	6.1E-09	6.7E-11	4.9E-10	0.10
p-Isopropyltoluene	1.9E-03	1.9E-03	2.0E-09	6.8E-09	1.6E-10	5.4E-10	0.10
Toluene	1.5E-03	3.6E-03	1.7E-09	1.3E-08	1.3E-10	1.0E-09	0.10
Trichloroethene	3.0E-03	5.5E-03	3.2E-09	2.0E-08	2.6E-10	1.6E-09	0.10
SVOCs							
1-Methylnaphthalene	1.2E-02	1.3E-02	1.7E-08	6.2E-08	1.3E-09	5.0E-09	0.13
2-Methylnaphthalene	1.7E-01	5.6E-01	2.4E-07	2.6E-06	1.9E-08	2.1E-07	0.13
Acenaphthene	1.7E-01	7.0E-01	2.4E-07	3.3E-06	1.9E-08	2.6E-07	0.13
Acenaphthylene	4.0E-02	1.4E-01	5.6E-08	6.6E-07	4.5E-09	5.3E-08	0.13

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Estimates of Human Intake
Soil Dermal Contact Pathway for Child Resident
Old Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times SA \times AF \times B \times CF \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Skin surface area per event	SA	cm^2/day	2800	2800
Soil loading to skin	AF	mg/cm^2	0.06	0.20
Bioavailability	B	fraction	CS	CS
Conversion factor	CF	kg/mg	1.E-06	1.E-06
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	6	6
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
Anthracene	1.2E-01	4.7E-01	1.7E-07	2.2E-06	1.3E-08	1.7E-07	0.13
Benzo(a)anthracene	3.9E-02	1.8E-01	5.4E-08	8.5E-07	4.3E-09	6.8E-08	0.13
Benzo(a)pyrene	3.6E-02	1.8E-01	5.1E-08	8.2E-07	4.0E-09	6.5E-08	0.13
Benzo(e)pyrene	7.1E-02	3.1E-01	9.9E-08	1.4E-06	7.9E-09	1.2E-07	0.13
Benzo(b)fluoranthene	4.4E-02	2.0E-01	6.1E-08	9.2E-07	4.9E-09	7.4E-08	0.13
Benzo(g,h,i)perylene	8.4E-02	3.0E-01	1.2E-07	1.4E-06	9.4E-09	1.1E-07	0.13
Benzo(k)fluoranthene	3.6E-02	1.8E-01	5.0E-08	8.2E-07	4.0E-09	6.5E-08	0.13
Chrysene	5.9E-02	2.4E-01	8.3E-08	1.1E-06	6.6E-09	8.9E-08	0.13
Dibenz(a,h)anthracene	2.6E-02	1.0E-01	3.6E-08	4.9E-07	2.9E-09	3.9E-08	0.13
Fluoranthene	9.0E-02	4.3E-01	1.3E-07	2.0E-06	1.0E-08	1.6E-07	0.13
Fluorene	1.7E-01	6.9E-01	2.3E-07	3.2E-06	1.9E-08	2.6E-07	0.13
Indeno(1,2,3-cd)pyrene	3.2E-02	1.7E-01	4.4E-08	7.7E-07	3.6E-09	6.2E-08	0.13
Naphthalene	6.3E-02	1.6E-01	8.7E-08	7.3E-07	7.0E-09	5.8E-08	0.13
Perylene	4.0E-02	1.8E-01	5.6E-08	8.2E-07	4.5E-09	6.6E-08	0.13
Phenanthrene	4.4E-01	1.9E+00	6.1E-07	8.6E-06	4.9E-08	6.9E-07	0.13
Pyrene	8.9E-02	3.7E-01	1.2E-07	1.7E-06	9.9E-09	1.4E-07	0.13
Total Petroleum Hydrocarbons							
C08-C11(Gasoline Range)	9.7E+00	2.2E+01	1.0E-05	7.7E-05	8.3E-07	6.2E-06	0.10
C11-C14(Kerosene Range)	1.1E+01	2.2E+01	1.5E-05	1.0E-04	1.2E-06	8.1E-06	0.13
C14-C20(Diesel Range)	6.5E+01	2.6E+02	9.1E-05	1.2E-03	7.3E-06	9.5E-05	0.13
C20-C30(Lubricant Oil Range)	2.9E+02	1.4E+03	4.1E-04	6.4E-03	3.3E-05	5.1E-04	0.13
PCDD/PCDFs							
2,3,7,8-TCDD	1.0E-06	1.8E-06	3.3E-13	1.9E-12	2.6E-14	1.5E-13	0.03
1,2,3,7,8-PeCDD	6.6E-06	5.2E-05	2.1E-12	5.6E-11	1.7E-13	4.5E-12	0.03
1,2,3,4,7,8-HxCDD	1.4E-05	5.3E-05	4.7E-12	5.7E-11	3.7E-13	4.5E-12	0.03
1,2,3,6,7,8-HxCDD	2.0E-05	1.0E-04	6.5E-12	1.1E-10	5.2E-13	8.8E-12	0.03
1,2,3,7,8,9-HxCDD	1.8E-05	8.6E-05	5.8E-12	9.3E-11	4.6E-13	7.4E-12	0.03
1,2,3,4,6,7,8-HpCDD	4.9E-04	2.9E-03	1.6E-10	3.1E-09	1.3E-11	2.5E-10	0.03
OCDD	3.7E-03	8.2E-03	1.2E-09	8.9E-09	9.5E-11	7.1E-10	0.03
2,3,7,8-TCDF	2.2E-06	1.0E-05	7.1E-13	1.1E-11	5.7E-14	8.6E-13	0.03
1,2,3,7,8-PeCDF	1.8E-06	9.5E-06	5.9E-13	1.0E-11	4.7E-14	8.2E-13	0.03
2,3,4,7,8-PeCDF	5.1E-06	3.0E-05	1.6E-12	3.2E-11	1.3E-13	2.6E-12	0.03
1,2,3,4,7,8-HxCDF	1.3E-05	6.2E-05	4.2E-12	6.7E-11	3.3E-13	5.3E-12	0.03
1,2,3,6,7,8-HxCDF	4.9E-06	1.0E-05	1.6E-12	1.1E-11	1.3E-13	8.6E-13	0.03
2,3,4,6,7,8-HxCDF	5.2E-06	2.9E-05	1.7E-12	3.1E-11	1.3E-13	2.5E-12	0.03
1,2,3,7,8,9-HxCDF	2.3E-06	1.0E-05	7.4E-13	1.1E-11	5.9E-14	8.7E-13	0.03
1,2,3,4,6,7,8-HpCDF	5.5E-05	1.2E-04	1.8E-11	1.3E-10	1.4E-12	1.0E-11	0.03
1,2,3,4,7,8,9-HpCDF	7.2E-06	3.0E-05	2.3E-12	3.3E-11	1.9E-13	2.6E-12	0.03
OCDF	1.8E-04	4.1E-04	5.8E-11	4.4E-10	4.7E-12	3.5E-11	0.03

Spreadsheet C2-66 (3 of 3)

Estimates of Human Intake
Soil Dermal Contact Pathway for Child Resident
Old Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times SA \times AF \times B \times CF \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Skin surface area per event	SA	cm^2/day	2800	2800
Soil loading to skin	AF	mg/cm^2	0.06	0.20
Bioavailability	B	fraction	CS	CS
Conversion factor	CF	kg/mg	1.E-06	1.E-06
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	6	6
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
PCBs							
Aroclor-1248	5.0E+02	5.5E+03	7.5E-04	2.7E-02	6.0E-05	2.2E-03	0.14
Aroclor-1254	1.2E+00	5.4E+00	1.8E-06	2.7E-05	1.5E-07	2.2E-06	0.14
Aroclor-1260	1.3E+01	1.4E+02	2.0E-05	7.2E-04	1.6E-06	5.8E-05	0.14
PCB-105	1.1E-03	1.2E-02	1.7E-09	5.9E-08	1.3E-10	4.7E-09	0.14
PCB-114	2.1E-05	2.1E-04	3.1E-11	1.1E-09	2.5E-12	8.4E-11	0.14
PCB-118	2.2E-03	2.4E-02	3.4E-09	1.2E-07	2.7E-10	9.5E-09	0.14
PCB-123	3.1E-05	3.3E-04	4.7E-11	1.7E-09	3.8E-12	1.3E-10	0.14
PCB-126	8.6E-05	9.2E-04	1.3E-10	4.6E-09	1.0E-11	3.7E-10	0.14
PCB-156	7.4E-04	7.9E-03	1.1E-09	3.9E-08	8.9E-11	3.1E-09	0.14
PCB-157	3.3E-04	3.5E-03	4.9E-10	1.8E-08	3.9E-11	1.4E-09	0.14
PCB-167	5.7E-04	6.1E-03	8.6E-10	3.1E-08	6.9E-11	2.5E-09	0.14
PCB-169	8.5E-06	9.2E-05	1.3E-11	4.6E-10	1.0E-12	3.7E-11	0.14
PCB-189	8.5E-05	9.2E-04	1.3E-10	4.6E-09	1.0E-11	3.7E-10	0.14
PCB-77	1.7E-04	1.8E-03	2.6E-10	9.2E-09	2.1E-11	7.4E-10	0.14
PCB-81	3.1E-05	3.2E-04	4.6E-11	1.6E-09	3.7E-12	1.3E-10	0.14

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005),
except dermal absorption factors which were taken from USEPA (2001).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyls
mg/kg-day - milligrams per kilogram per day
mg/kg - milligrams per kilogram

Estimates of Human Intake
Soil Ingestion Pathway for Child Resident
Old Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times CF \times FT \times EF \times ED \times B}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Soil ingestion rate	IR	mg/day	100	200
Conversion factor	CF	kg/mg	1.E-06	1.E-06
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	6	6
Bioavailability	B	fraction	CS	CS
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
Inorganic Compounds							
Antimony	NC	NC	NA	NA	NA	NA	1
Barium	NC	NC	NA	NA	NA	NA	1
Boron	4.3E+00	5.2E+00	2.7E-05	6.7E-05	2.2E-06	5.4E-06	1
Cadmium	5.2E-01	9.9E-01	3.3E-06	1.3E-05	2.7E-07	1.0E-06	1
Copper	NC	NC	NA	NA	NA	NA	1
Fluoride	NC	NC	NA	NA	NA	NA	1
Lead	1.7E+01	2.1E+01	1.1E-04	2.6E-04	8.7E-06	2.1E-05	1
Mercury	5.0E-01	3.3E+00	3.2E-06	4.2E-05	2.6E-07	3.3E-06	1
Nitrate	NC	NC	NA	NA	NA	NA	1
Silver	8.6E-01	1.8E+00	5.5E-06	2.3E-05	4.4E-07	1.8E-06	1
Thallium	8.6E-01	1.7E+00	5.5E-06	2.2E-05	4.4E-07	1.7E-06	1
Zinc	6.6E+01	7.4E+01	4.2E-04	9.4E-04	3.4E-05	7.5E-05	1
VOCs							
1,1,1-Trichloroethane	3.0E-03	5.5E-03	1.9E-08	7.0E-08	1.5E-09	5.6E-09	1
1,1,2-Trichloro-1,2,2-trifluoroethane	1.2E-02	2.1E-02	7.9E-08	2.6E-07	6.3E-09	2.1E-08	1
1,1-Dichloroethane	NC	NC	NA	NA	NA	NA	1
1,1-Dichloroethene	3.2E-03	5.5E-03	2.0E-08	7.0E-08	1.6E-09	5.6E-09	1
2-Butanone	2.2E-02	1.1E-02	1.4E-07	1.4E-07	1.1E-08	1.1E-08	1
Acetone	3.5E-01	3.5E+00	2.3E-06	4.5E-05	1.8E-07	3.6E-06	1
Benzene	1.1E-03	2.5E-03	7.2E-09	3.2E-08	5.8E-10	2.5E-09	1
Carbon disulfide	NC	NC	NA	NA	NA	NA	1
Chloromethane	NC	NC	NA	NA	NA	NA	1
cis-1,2-Dichloroethene	NC	NC	NA	NA	NA	NA	1
Ethylbenzene	1.1E-03	2.5E-03	7.2E-09	3.2E-08	5.8E-10	2.5E-09	1
m,p-Xylene	3.2E-03	7.2E-03	2.1E-08	9.2E-08	1.7E-09	7.4E-09	1
Methylene chloride	4.1E-02	2.4E-01	2.6E-07	3.1E-06	2.1E-08	2.5E-07	1
o-Xylene	7.8E-04	1.7E-03	5.0E-09	2.2E-08	4.0E-10	1.7E-09	1
p-Isopropyltoluene	1.9E-03	1.9E-03	1.2E-08	2.4E-08	9.7E-10	1.9E-09	1
Toluene	1.5E-03	3.6E-03	9.9E-09	4.5E-08	7.9E-10	3.6E-09	1
Trichloroethene	3.0E-03	5.5E-03	1.9E-08	7.0E-08	1.5E-09	5.6E-09	1
SVOCs							
1-Methylnaphthalene	1.2E-02	1.3E-02	7.6E-08	1.7E-07	6.1E-09	1.4E-08	1
2-Methylnaphthalene	1.7E-01	5.6E-01	1.1E-06	7.2E-06	8.7E-08	5.7E-07	1
Acenaphthene	1.7E-01	7.0E-01	1.1E-06	8.9E-06	8.6E-08	7.1E-07	1
Acenaphthylene	4.0E-02	1.4E-01	2.6E-07	1.8E-06	2.1E-08	1.5E-07	1
Anthracene	1.2E-01	4.7E-01	7.6E-07	6.0E-06	6.1E-08	4.8E-07	1

Spreadsheet C2-65 (2 of 3)

Estimates of Human Intake
Soil Ingestion Pathway for Child Resident
Old Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times CF \times FT \times EF \times ED \times B}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Soil ingestion rate	IR	mg/day	100	200
Conversion factor	CF	kg/mg	1.E-06	1.E-06
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	6	6
Bioavailability	B	fraction	CS	CS
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
Benzo(a)anthracene	3.9E-02	1.8E-01	2.5E-07	2.3E-06	2.0E-08	1.9E-07	1
Benzo(a)pyrene	3.6E-02	1.8E-01	2.3E-07	2.2E-06	1.9E-08	1.8E-07	1
Benzo(e)pyrene	7.1E-02	3.1E-01	4.5E-07	4.0E-06	3.6E-08	3.2E-07	1
Benzo(b)fluoranthene	4.4E-02	2.0E-01	2.8E-07	2.5E-06	2.2E-08	2.0E-07	1
Benzo(g,h,i)perylene	8.4E-02	3.0E-01	5.4E-07	3.8E-06	4.3E-08	3.1E-07	1
Benzo(k)fluoranthene	3.6E-02	1.8E-01	2.3E-07	2.2E-06	1.8E-08	1.8E-07	1
Chrysene	5.9E-02	2.4E-01	3.8E-07	3.1E-06	3.0E-08	2.4E-07	1
Dibenz(a,h)anthracene	2.6E-02	1.0E-01	1.7E-07	1.3E-06	1.3E-08	1.1E-07	1
Fluoranthene	9.0E-02	4.3E-01	5.8E-07	5.5E-06	4.6E-08	4.4E-07	1
Fluorene	1.7E-01	6.9E-01	1.1E-06	8.9E-06	8.5E-08	7.1E-07	1
Indeno(1,2,3-cd)pyrene	3.2E-02	1.7E-01	2.0E-07	2.1E-06	1.6E-08	1.7E-07	1
Naphthalene	6.3E-02	1.6E-01	4.0E-07	2.0E-06	3.2E-08	1.6E-07	1
Perylene	4.0E-02	1.8E-01	2.6E-07	2.3E-06	2.1E-08	1.8E-07	1
Phenanthrene	4.4E-01	1.9E+00	2.8E-06	2.4E-05	2.2E-07	1.9E-06	1
Pyrene	8.9E-02	3.7E-01	5.7E-07	4.7E-06	4.6E-08	3.8E-07	1
Total Petroleum Hydrocarbons							
C08-C11(Gasoline Range)	9.7E+00	2.2E+01	6.2E-05	2.8E-04	5.0E-06	2.2E-05	1
C11-C14(Kerosene Range)	1.1E+01	2.2E+01	7.1E-05	2.8E-04	5.7E-06	2.2E-05	1
C14-C20(Diesel Range)	6.5E+01	2.6E+02	4.2E-04	3.3E-03	3.3E-05	2.6E-04	1
C20-C30(Lubricant Oil Range)	2.9E+02	1.4E+03	1.9E-03	1.7E-02	1.5E-04	1.4E-03	1
PCDD/PCDFs							
2,3,7,8-TCDD	1.0E-06	1.8E-06	6.5E-12	2.3E-11	5.2E-13	1.8E-12	1
1,2,3,7,8-PeCDD	6.6E-06	5.2E-05	4.2E-11	6.6E-10	3.4E-12	5.3E-11	1
1,2,3,4,7,8-HxCDD	1.4E-05	5.3E-05	9.3E-11	6.7E-10	7.4E-12	5.4E-11	1
1,2,3,6,7,8-HxCDD	2.0E-05	1.0E-04	1.3E-10	1.3E-09	1.0E-11	1.0E-10	1
1,2,3,7,8,9-HxCDD	1.8E-05	8.6E-05	1.1E-10	1.1E-09	9.2E-12	8.8E-11	1
1,2,3,4,6,7,8-HpCDD	4.9E-04	2.9E-03	3.1E-09	3.7E-08	2.5E-10	3.0E-09	1
OCDD	3.7E-03	8.2E-03	2.4E-08	1.1E-07	1.9E-09	8.4E-09	1
2,3,7,8-TCDF	2.2E-06	1.0E-05	1.4E-11	1.3E-10	1.1E-12	1.0E-11	1
1,2,3,7,8-PeCDF	1.8E-06	9.5E-06	1.2E-11	1.2E-10	9.3E-13	9.7E-12	1
2,3,4,7,8-PeCDF	5.1E-06	3.0E-05	3.3E-11	3.8E-10	2.6E-12	3.1E-11	1
1,2,3,4,7,8-HxCDF	1.3E-05	6.2E-05	8.2E-11	7.9E-10	6.6E-12	6.4E-11	1
1,2,3,6,7,8-HxCDF	4.9E-06	1.0E-05	3.1E-11	1.3E-10	2.5E-12	1.0E-11	1
2,3,4,6,7,8-HxCDF	5.2E-06	2.9E-05	3.3E-11	3.7E-10	2.7E-12	3.0E-11	1
1,2,3,7,8,9-HxCDF	2.3E-06	1.0E-05	1.5E-11	1.3E-10	1.2E-12	1.0E-11	1
1,2,3,4,6,7,8-HpCDF	5.5E-05	1.2E-04	3.5E-10	1.5E-09	2.8E-11	1.2E-10	1
1,2,3,4,7,8,9-HpCDF	7.2E-06	3.0E-05	4.6E-11	3.9E-10	3.7E-12	3.1E-11	1
OCDF	1.8E-04	4.1E-04	1.2E-09	5.2E-09	9.3E-11	4.2E-10	1

Spreadsheet C2-65 (3 of 3)

Estimates of Human Intake
Soil Ingestion Pathway for Child Resident
Old Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times CF \times FT \times EF \times ED \times B}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Soil ingestion rate	IR	mg/day	100	200
Conversion factor	CF	kg/mg	1.E-06	1.E-06
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	6	6
Bioavailability	B	fraction	CS	CS
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
PCBs							
Aroclor-1248	5.0E+02	5.5E+03	3.2E-03	7.0E-02	2.6E-04	5.6E-03	1
Aroclor-1254	1.2E+00	5.4E+00	7.8E-06	6.9E-05	6.3E-07	5.5E-06	1
Aroclor-1260	1.3E+01	1.4E+02	8.5E-05	1.8E-03	6.8E-06	1.5E-04	1
PCB-105	1.1E-03	1.2E-02	7.1E-09	1.5E-07	5.7E-10	1.2E-08	1
PCB-114	2.1E-05	2.1E-04	1.3E-10	2.7E-09	1.1E-11	2.2E-10	1
PCB-118	2.2E-03	2.4E-02	1.4E-08	3.0E-07	1.1E-09	2.4E-08	1
PCB-123	3.1E-05	3.3E-04	2.0E-10	4.3E-09	1.6E-11	3.4E-10	1
PCB-126	8.6E-05	9.2E-04	5.5E-10	1.2E-08	4.4E-11	9.4E-10	1
PCB-156	7.4E-04	7.9E-03	4.7E-09	1.0E-07	3.8E-10	8.0E-09	1
PCB-157	3.3E-04	3.5E-03	2.1E-09	4.5E-08	1.7E-10	3.6E-09	1
PCB-167	5.7E-04	6.1E-03	3.6E-09	7.9E-08	2.9E-10	6.3E-09	1
PCB-169	8.5E-06	9.2E-05	5.4E-11	1.2E-09	4.4E-12	9.4E-11	1
PCB-189	8.5E-05	9.2E-04	5.4E-10	1.2E-08	4.3E-11	9.4E-10	1
PCB-77	1.7E-04	1.8E-03	1.1E-09	2.3E-08	8.8E-11	1.9E-09	1
PCB-81	3.1E-05	3.2E-04	2.0E-10	4.1E-09	1.6E-11	3.3E-10	1

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyls
mg/kg-day - milligrams per kilogram perday
mg/kg - milligrams per kilogram

Estimates of Human Intake
Edible Plant Ingestion Pathway for Adult Resident
Old Conservation Yard RFI Site

Intake Equation: Dosage = $\frac{C \times IR \times CF \times F \times EF \times ED \times B}{BW \times AT}$

Exposure Parameters		Units	Typical	RME
Plant concentration	C	mg/kg	CS	CS
Plant ingestion rate	IR	g/day	147	702
Conversion factor	CF	kg/g	1.E-03	1.E-03
Fraction locally grown	F	unitless	0.24	1.0
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	9	24
Bioavailability	B	fraction	CS	CS
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
Inorganic Compounds							
Antimony	NC	NC	NA	NA	NA	NA	1
Barium	NC	NC	NA	NA	NA	NA	1
Boron	2.0E+00	2.5E+00	9.8E-04	1.2E-03	1.2E-04	7.7E-03	1
Cadmium	2.7E-02	5.1E-02	1.3E-05	2.5E-05	1.5E-06	1.6E-04	1
Copper	NC	NC	NA	NA	NA	NA	1
Fluoride	NC	NC	NA	NA	NA	NA	1
Lead	6.5E-02	7.9E-02	3.1E-05	3.8E-05	3.8E-06	2.4E-04	1
Mercury	4.0E-02	2.6E-01	1.9E-05	1.2E-04	2.3E-06	7.9E-04	1
Nitrate	NC	NC	NA	NA	NA	NA	1
Silver	2.4E-04	4.9E-04	1.1E-07	2.4E-07	1.4E-08	1.5E-06	1
Thallium	1.7E-01	3.3E-01	8.1E-05	1.6E-04	9.7E-06	1.0E-03	1
Zinc	1.3E+01	1.4E+01	6.2E-03	6.9E-03	7.5E-04	4.4E-02	1
							1
VOCs							1
1,1,1-Trichloroethane	1.5E-02	2.7E-02	7.2E-06	1.3E-05	8.7E-07	8.4E-05	1
1,1,2-Trichloro-1,2,2-trifluoroethane	2.5E-02	4.2E-02	1.2E-05	2.0E-05	1.5E-06	1.3E-04	1
1,1-Dichloroethane	NC	NC	NA	NA	NA	NA	1
1,1-Dichloroethene	2.5E-02	4.4E-02	1.2E-05	2.1E-05	1.5E-06	1.4E-04	1
2-Butanone	2.1E+00	1.0E+00	1.0E-03	5.0E-04	1.2E-04	3.2E-03	1
Acetone	6.6E+01	6.6E+02	3.2E-02	3.2E-01	3.8E-03	2.0E+00	1
Benzene	9.1E-03	2.0E-02	4.4E-06	9.7E-06	5.3E-07	6.1E-05	1
Carbon disulfide	NC	NC	NA	NA	NA	NA	1
Chloromethane	NC	NC	NA	NA	NA	NA	1
cis-1,2-Dichloroethene	NC	NC	NA	NA	NA	NA	1
Ethylbenzene	2.4E-03	5.3E-03	1.2E-06	2.6E-06	1.4E-07	1.6E-05	1
m,p-Xylene	7.0E-03	1.6E-02	3.4E-06	7.6E-06	4.1E-07	4.8E-05	1
Methylene chloride	1.7E+00	1.0E+01	8.2E-04	4.9E-03	9.8E-05	3.1E-02	1
o-Xylene	1.7E-03	3.7E-03	8.1E-07	1.8E-06	9.7E-08	1.1E-05	1
p-Isopropyltoluene	0.0E+00	0.0E+00	0.0E+00	0.0E+00	0.0E+00	0.0E+00	1
Toluene	5.6E-03	1.3E-02	2.7E-06	6.2E-06	3.2E-07	4.0E-05	1
Trichloroethene	1.5E-02	2.7E-02	7.0E-06	1.3E-05	8.5E-07	8.2E-05	1
SVOCs							
1-Methylnaphthalene	NC	NC	NA	NA	NA	NA	1
2-Methylnaphthalene	NC	NC	NA	NA	NA	NA	1
Acenaphthene	1.1E-01	4.8E-01	5.5E-05	2.3E-04	6.7E-06	1.5E-03	1
Acenaphthylene	2.4E-02	8.6E-02	1.2E-05	4.1E-05	1.4E-06	2.6E-04	1

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Estimates of Human Intake
Edible Plant Ingestion Pathway for Adult Resident
Old Conservation Yard RFI Site

Intake Equation: Dosage = $\frac{C \times IR \times CF \times F \times EF \times ED \times B}{BW \times AT}$

Exposure Parameters		Units	Typical	RME
Plant concentration	C	mg/kg	CS	CS
Plant ingestion rate	IR	g/day	147	702
Conversion factor	CF	kg/g	1.E-03	1.E-03
Fraction locally grown	F	unitless	0.24	1.0
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	9	24
Bioavailability	B	fraction	CS	CS
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
Anthracene	4.3E-02	1.7E-01	2.1E-05	8.2E-05	2.5E-06	5.2E-04	1
Benzo(a)anthracene	2.7E-03	1.3E-02	1.3E-06	6.1E-06	1.5E-07	3.9E-05	1
Benzo(a)pyrene	1.1E-03	5.1E-03	5.1E-07	2.5E-06	6.1E-08	1.6E-05	1
Benzo(e)pyrene	1.8E-03	7.9E-03	8.7E-07	3.8E-06	1.0E-07	2.4E-05	1
Benzo(b)fluoranthene	1.4E-03	6.2E-03	6.7E-07	3.0E-06	8.0E-08	1.9E-05	1
Benzo(g,h,i)perylene	2.0E-03	7.1E-03	9.5E-07	3.4E-06	1.1E-07	2.2E-05	1
Benzo(k)fluoranthene	1.5E-03	7.4E-03	7.4E-07	3.6E-06	8.9E-08	2.3E-05	1
Chrysene	3.8E-03	1.5E-02	1.8E-06	7.4E-06	2.2E-07	4.7E-05	1
Dibenz(a,h)anthracene	3.9E-04	1.6E-03	1.9E-07	7.6E-07	2.2E-08	4.8E-06	1
Fluoranthene	1.4E-02	6.6E-02	6.6E-06	3.2E-05	7.9E-07	2.0E-04	1
Fluorene	2.5E-02	1.1E-01	1.2E-05	5.1E-05	1.5E-06	3.2E-04	1
Indeno(1,2,3-cd)pyrene	2.8E-04	1.4E-03	1.3E-07	7.0E-07	1.6E-08	4.4E-06	1
Naphthalene	NC	NC	NA	NA	NA	NA	1
Perylene	2.4E-03	1.0E-02	1.1E-06	5.0E-06	1.4E-07	3.2E-05	1
Phenanthrene	1.4E-01	5.7E-01	6.6E-05	2.8E-04	7.9E-06	1.8E-03	1
Pyrene	1.5E-02	6.3E-02	7.3E-06	3.1E-05	8.8E-07	1.9E-04	1
Total Petroleum Hydrocarbons							
C08-C11(Gasoline Range)	1.7E+00	3.8E+00	8.2E-04	1.8E-03	9.8E-05	1.2E-02	1
C11-C14(Kerosene Range)	3.7E+00	7.3E+00	1.8E-03	3.5E-03	2.2E-04	2.3E-02	1
C14-C20(Diesel Range)	1.1E+01	4.5E+01	5.5E-03	2.2E-02	6.6E-04	1.4E-01	1
C20-C30(Lubricant Oil Range)	1.3E+01	6.3E+01	6.5E-03	3.0E-02	7.8E-04	1.9E-01	1
PCDD/PCDFs							
2,3,7,8-TCDD	NC	NC	NA	NA	NA	NA	1
1,2,3,7,8-PeCDD	NC	NC	NA	NA	NA	NA	1
1,2,3,4,7,8-HxCDD	NC	NC	NA	NA	NA	NA	1
1,2,3,6,7,8-HxCDD	NC	NC	NA	NA	NA	NA	1
1,2,3,7,8,9-HxCDD	NC	NC	NA	NA	NA	NA	1
1,2,3,4,6,7,8-HpCDD	NC	NC	NA	NA	NA	NA	1
OCDD	NC	NC	NA	NA	NA	NA	1
2,3,7,8-TCDF	NC	NC	NA	NA	NA	NA	1
1,2,3,7,8-PeCDF	NC	NC	NA	NA	NA	NA	1
2,3,4,7,8-PeCDF	NC	NC	NA	NA	NA	NA	1
1,2,3,4,7,8-HxCDF	NC	NC	NA	NA	NA	NA	1
1,2,3,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA	1
2,3,4,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA	1
1,2,3,7,8,9-HxCDF	NC	NC	NA	NA	NA	NA	1
1,2,3,4,6,7,8-HpCDF	NC	NC	NA	NA	NA	NA	1
1,2,3,4,7,8,9-HpCDF	NC	NC	NA	NA	NA	NA	1
OCDF	NC	NC	NA	NA	NA	NA	1

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Estimates of Human Intake
Edible Plant Ingestion Pathway for Adult Resident
Old Conservation Yard RFI Site

Intake Equation: Dosage = $\frac{C \times IR \times CF \times F \times EF \times ED \times B}{BW \times AT}$

Exposure Parameters		Units	Typical	RME
Plant concentration	C	mg/kg	CS	CS
Plant ingestion rate	IR	g/day	147	702
Conversion factor	CF	kg/g	1.E-03	1.E-03
Fraction locally grown	F	unitless	0.24	1.0
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	9	24
Bioavailability	B	fraction	CS	CS
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
PCBs							
Aroclor-1248	NC	NC	NA	NA	NA	NA	1
Aroclor-1254	3.8E-02	1.7E-01	1.8E-05	8.0E-05	2.2E-06	5.1E-04	1
Aroclor-1260	2.1E-01	2.3E+00	1.0E-04	1.1E-03	1.2E-05	7.0E-03	1
PCB-105	3.4E-05	3.6E-04	1.7E-08	1.8E-07	2.0E-09	1.1E-06	1
PCB-114	6.3E-07	6.5E-06	3.1E-10	3.1E-09	3.7E-11	2.0E-08	1
PCB-118	6.9E-05	7.3E-04	3.3E-08	3.5E-07	4.0E-09	2.2E-06	1
PCB-123	9.7E-07	1.0E-05	4.7E-10	5.0E-09	5.6E-11	3.2E-08	1
PCB-126	2.6E-06	2.8E-05	1.3E-09	1.4E-08	1.5E-10	8.7E-08	1
PCB-156	2.3E-05	2.4E-04	1.1E-08	1.2E-07	1.3E-09	7.4E-07	1
PCB-157	1.0E-05	1.1E-04	4.9E-09	5.2E-08	5.8E-10	3.3E-07	1
PCB-167	1.8E-05	1.9E-04	8.5E-09	9.1E-08	1.0E-09	5.8E-07	1
PCB-169	2.6E-07	2.8E-06	1.3E-10	1.4E-09	1.5E-11	8.7E-09	1
PCB-189	2.6E-06	2.8E-05	1.3E-09	1.4E-08	1.5E-10	8.7E-08	1
PCB-77	3.0E-06	3.2E-05	1.5E-09	1.6E-08	1.8E-10	9.9E-08	1
PCB-81	5.4E-07	5.7E-06	2.6E-10	2.7E-09	3.1E-11	1.8E-08	1

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyls
mg/kg-day - milligrams per kilogram per day
mg/kg - milligrams per kilogram

Estimates of Human Intake
Domestic Groundwater Use for Adult Resident
Old Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED \times B}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Groundwater concentration	C	mg/L	CS	CS
Groundwater ingestion rate$_{vocs}$	IR	L/day	2.0	3.1
Groundwater ingestion rate$_{non\text{-}vocs}$	IR	L/day	1.0	1.5
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	9	24
Bioavailability	B	fraction	CS	CS
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/L)	RME EPC (mg/L)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
Inorganic Compounds							
Antimony	NC	NC	NA	NA	NA	NA	1
Barium	NC	NC	NA	NA	NA	NA	1
Boron	NC	NC	NA	NA	NA	NA	1
Cadmium	NC	NC	NA	NA	NA	NA	1
Copper	1.8E-02	1.8E-02	2.5E-04	3.8E-04	3.0E-05	1.2E-04	1
Fluoride	5.6E-01	5.6E-01	7.7E-03	1.2E-02	9.2E-04	3.8E-03	1
Lead	NC	NC	NA	NA	NA	NA	1
Mercury	NC	NC	NA	NA	NA	NA	1
Nitrate	1.4E+01	1.4E+01	1.9E-01	3.0E-01	2.3E-02	9.6E-02	1
Silver	NC	NC	NA	NA	NA	NA	1
Thallium	5.4E-04	5.4E-04	7.4E-06	1.1E-05	8.9E-07	3.6E-06	1
Zinc	NC	NC	NA	NA	NA	NA	1
VOCs							
1,1,1-Trichloroethane	NC	NC	NA	NA	NA	NA	1
1,1,2-Trichloro-1,2,2-trifluoroethane	NC	NC	NA	NA	NA	NA	1
1,1-Dichloroethane	2.6E-03	2.6E-03	7.1E-05	1.1E-04	8.5E-06	3.5E-05	1
1,1-Dichloroethene	NC	NC	NA	NA	NA	NA	1
2-Butanone	NC	NC	NA	NA	NA	NA	1
Acetone	1.6E-02	1.6E-02	4.4E-04	6.8E-04	5.3E-05	2.2E-04	1
Benzene	5.8E-04	5.8E-04	1.6E-05	2.4E-05	1.9E-06	7.8E-06	1
Carbon disulfide	2.6E-03	2.6E-03	7.1E-05	1.1E-04	8.5E-06	3.5E-05	1
Chloromethane	3.2E-04	3.2E-04	8.8E-06	1.4E-05	1.1E-06	4.3E-06	1
cis-1,2-Dichloroethene	5.1E-02	5.1E-02	1.4E-03	2.2E-03	1.7E-04	6.9E-04	1
Ethylbenzene	NC	NC	NA	NA	NA	NA	1
m,p-Xylene	NC	NC	NA	NA	NA	NA	1
Methylene chloride	6.4E-04	6.4E-04	1.8E-05	2.7E-05	2.1E-06	8.6E-06	1
o-Xylene	NC	NC	NA	NA	NA	NA	1
p-Isopropyltoluene	NC	NC	NA	NA	NA	NA	1
Toluene	1.8E-03	1.8E-03	4.9E-05	7.6E-05	5.9E-06	2.4E-05	1
Trichloroethene	1.0E-02	1.0E-02	2.7E-04	4.2E-04	3.3E-05	1.4E-04	1
SVOCs							
1-Methylnaphthalene	NC	NC	NA	NA	NA	NA	1
2-Methylnaphthalene	NC	NC	NA	NA	NA	NA	1
Acenaphthene	NC	NC	NA	NA	NA	NA	1
Acenaphthylene	NC	NC	NA	NA	NA	NA	1
Anthracene	NC	NC	NA	NA	NA	NA	1

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Estimates of Human Intake
Domestic Groundwater Use for Adult Resident
Old Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED \times B}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Groundwater concentration	C	mg/L	CS	CS
Groundwater ingestion rate$_{vocs}$	IR	L/day	2.0	3.1
Groundwater ingestion rate$_{non\text{-}vocs}$	IR	L/day	1.0	1.5
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	9	24
Bioavailability	B	fraction	CS	CS
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/L)	RME EPC (mg/L)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
Benzo(a)anthracene	NC	NC	NA	NA	NA	NA	1
Benzo(a)pyrene	NC	NC	NA	NA	NA	NA	1
Benzo(b)fluoranthene	NC	NC	NA	NA	NA	NA	1
Benzo(g,h,i)perylene	NC	NC	NA	NA	NA	NA	1
Benzo(k)fluoranthene	NC	NC	NA	NA	NA	NA	1
Chrysene	NC	NC	NA	NA	NA	NA	1
Dibenz(a,h)anthracene	NC	NC	NA	NA	NA	NA	1
Benzo(e)pyrene	NC	NC	NA	NA	NA	NA	1
Fluoranthene	NC	NC	NA	NA	NA	NA	1
Fluorene	NC	NC	NA	NA	NA	NA	1
Indeno(1,2,3-cd)pyrene	NC	NC	NA	NA	NA	NA	1
Naphthalene	NC	NC	NA	NA	NA	NA	1
Perylene	NC	NC	NA	NA	NA	NA	1
Phenanthrene	NC	NC	NA	NA	NA	NA	1
Pyrene	NC	NC	NA	NA	NA	NA	1
Total Petroleum Hydrocarbons							
C08-C11(Gasoline Range)	NC	NC	NA	NA	NA	NA	1
C11-C14(Kerosene Range)	NC	NC	NA	NA	NA	NA	1
C14-C20(Diesel Range)	5.0E-02	5.0E-02	6.8E-04	1.1E-03	8.2E-05	3.4E-04	1
C20-C30(Lubricant Oil Range)	NC	NC	NA	NA	NA	NA	1
PCDD/PCDFs							
2,3,7,8-TCDD	NC	NC	NA	NA	NA	NA	1
1,2,3,7,8-PeCDD	NC	NC	NA	NA	NA	NA	1
1,2,3,4,7,8-HxCDD	NC	NC	NA	NA	NA	NA	1
1,2,3,6,7,8-HxCDD	NC	NC	NA	NA	NA	NA	1
1,2,3,7,8,9-HxCDD	NC	NC	NA	NA	NA	NA	1
1,2,3,4,6,7,8-HpCDD	NC	NC	NA	NA	NA	NA	1
OCDD	NC	NC	NA	NA	NA	NA	1
2,3,7,8-TCDF	NC	NC	NA	NA	NA	NA	1
1,2,3,7,8-PeCDF	NC	NC	NA	NA	NA	NA	1
2,3,4,7,8-PeCDF	NC	NC	NA	NA	NA	NA	1
1,2,3,4,7,8-HxCDF	NC	NC	NA	NA	NA	NA	1
1,2,3,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA	1
2,3,4,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA	1
1,2,3,7,8,9-HxCDF	NC	NC	NA	NA	NA	NA	1
1,2,3,4,6,7,8-HpCDF	NC	NC	NA	NA	NA	NA	1
1,2,3,4,7,8,9-HpCDF	NC	NC	NA	NA	NA	NA	1
OCDF	NC	NC	NA	NA	NA	NA	1

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Estimates of Human Intake
Domestic Groundwater Use for Adult Resident
Old Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED \times B}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Groundwater concentration	C	mg/L	CS	CS
Groundwater ingestion rate$_{vocs}$	IR	L/day	2.0	3.1
Groundwater ingestion rate$_{non\text{-}vocs}$	IR	L/day	1.0	1.5
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	9	24
Bioavailability	B	fraction	CS	CS
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/L)	RME EPC (mg/L)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
PCBs							
Aroclor-1248	NC	NC	NA	NA	NA	NA	1
Aroclor-1254	NC	NC	NA	NA	NA	NA	1
Aroclor-1260	NC	NC	NA	NA	NA	NA	1
PCB-105	NC	NC	NA	NA	NA	NA	1
PCB-114	NC	NC	NA	NA	NA	NA	1
PCB-118	NC	NC	NA	NA	NA	NA	1
PCB-123	NC	NC	NA	NA	NA	NA	1
PCB-126	NC	NC	NA	NA	NA	NA	1
PCB-156	NC	NC	NA	NA	NA	NA	1
PCB-157	NC	NC	NA	NA	NA	NA	1
PCB-167	NC	NC	NA	NA	NA	NA	1
PCB-169	NC	NC	NA	NA	NA	NA	1
PCB-189	NC	NC	NA	NA	NA	NA	1
PCB-77	NC	NC	NA	NA	NA	NA	1
PCB-81	NC	NC	NA	NA	NA	NA	1

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
mg/kg-day - milligrams per kilogram per day
mg/L - milligrams per liter

Estimates of Human Intake
Groundwater to Indoor Air Pathway for Adult Resident
Old Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	7.0	13.2
Fraction of time indoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	9	24
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Inorganic Compounds						
Antimony	NC	NC	NA	NA	NA	NA
Barium	NC	NC	NA	NA	NA	NA
Boron	NC	NC	NA	NA	NA	NA
Cadmium	NC	NC	NA	NA	NA	NA
Copper	NC	NC	NA	NA	NA	NA
Fluoride	NC	NC	NA	NA	NA	NA
Lead	NC	NC	NA	NA	NA	NA
Mercury	NC	NC	NA	NA	NA	NA
Nitrate	NC	NC	NA	NA	NA	NA
Silver	NC	NC	NA	NA	NA	NA
Thallium	NC	NC	NA	NA	NA	NA
Zinc	NC	NC	NA	NA	NA	NA
VOCs						
1,1,1-Trichloroethane	NC	NC	NA	NA	NA	NA
1,1,2-Trichloro-1,2,2-trifluoroethane	NC	NC	NA	NA	NA	NA
1,1-Dichloroethane	NC	NC	NA	NA	NA	NA
1,1-Dichloroethene	NC	NC	NA	NA	NA	NA
2-Butanone	NC	NC	NA	NA	NA	NA
Acetone	NC	NC	NA	NA	NA	NA
Benzene	NC	NC	NA	NA	NA	NA
Carbon disulfide	NC	NC	NA	NA	NA	NA
Chloromethane	2.1E-06	2.1E-06	9.8E-08	2.8E-07	1.2E-08	8.9E-08
cis-1,2-Dichloroethene	9.1E-07	9.1E-07	4.4E-08	1.2E-07	5.2E-09	4.0E-08
Ethylbenzene	NC	NC	NA	NA	NA	NA
m,p-Xylene	NC	NC	NA	NA	NA	NA
Methylene chloride	NC	NC	NA	NA	NA	NA
o-Xylene	NC	NC	NA	NA	NA	NA
p-Isopropyltoluene	NC	NC	NA	NA	NA	NA
Toluene	NC	NC	NA	NA	NA	NA
Trichloroethene	2.7E-05	2.7E-05	1.3E-06	3.7E-06	1.6E-07	1.2E-06
SVOCs						
1-Methylnaphthalene	NC	NC	NA	NA	NA	NA
2-Methylnaphthalene	NC	NC	NA	NA	NA	NA
Acenaphthene	NC	NC	NA	NA	NA	NA
Acenaphthylene	NC	NC	NA	NA	NA	NA
Anthracene	NC	NC	NA	NA	NA	NA
Benzo(a)anthracene	NC	NC	NA	NA	NA	NA

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Estimates of Human Intake
Groundwater to Indoor Air Pathway for Adult Resident
Old Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	7.0	13.2
Fraction of time indoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	9	24
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Benzo(a)pyrene	NC	NC	NA	NA	NA	NA
Benzo(b)fluoranthene	NC	NC	NA	NA	NA	NA
Benzo(g,h,i)perylene	NC	NC	NA	NA	NA	NA
Benzo(k)fluoranthene	NC	NC	NA	NA	NA	NA
Chrysene	NC	NC	NA	NA	NA	NA
Dibenz(a,h)anthracene	NC	NC	NA	NA	NA	NA
Benzo(e)pyrene	NC	NC	NA	NA	NA	NA
Fluoranthene	NC	NC	NA	NA	NA	NA
Fluorene	NC	NC	NA	NA	NA	NA
Indeno(1,2,3-cd)pyrene	NC	NC	NA	NA	NA	NA
Naphthalene	NC	NC	NA	NA	NA	NA
Perylene	NC	NC	NA	NA	NA	NA
Phenanthrene	NC	NC	NA	NA	NA	NA
Pyrene	NC	NC	NA	NA	NA	NA
Total Petroleum Hydrocarbons						
C08-C11(Gasoline Range)	NC	NC	NA	NA	NA	NA
C11-C14(Kerosene Range)	NC	NC	NA	NA	NA	NA
C14-C20(Diesel Range)	NC	NC	NA	NA	NA	NA
C20-C30(Lubricant Oil Range)	NC	NC	NA	NA	NA	NA
PCDD/PCDFs						
2,3,7,8-TCDD	NC	NC	NA	NA	NA	NA
1,2,3,7,8-PeCDD	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,6,7,8-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,7,8,9-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,4,6,7,8-HpCDD	NC	NC	NA	NA	NA	NA
OCDD	NC	NC	NA	NA	NA	NA
2,3,7,8-TCDF	NC	NC	NA	NA	NA	NA
1,2,3,7,8-PeCDF	NC	NC	NA	NA	NA	NA
2,3,4,7,8-PeCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA
2,3,4,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,7,8,9-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,6,7,8-HpCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8,9-HpCDF	NC	NC	NA	NA	NA	NA
OCDF	NC	NC	NA	NA	NA	NA

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Estimates of Human Intake
Groundwater to Indoor Air Pathway for Adult Resident
Old Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	7.0	13.2
Fraction of time indoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	9	24
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
PCBs						
Aroclor-1248	NC	NC	NA	NA	NA	NA
Aroclor-1254	NC	NC	NA	NA	NA	NA
Aroclor-1260	NC	NC	NA	NA	NA	NA
PCB-105	NC	NC	NA	NA	NA	NA
PCB-114	NC	NC	NA	NA	NA	NA
PCB-118	NC	NC	NA	NA	NA	NA
PCB-123	NC	NC	NA	NA	NA	NA
PCB-126	NC	NC	NA	NA	NA	NA
PCB-156	NC	NC	NA	NA	NA	NA
PCB-157	NC	NC	NA	NA	NA	NA
PCB-167	NC	NC	NA	NA	NA	NA
PCB-169	NC	NC	NA	NA	NA	NA
PCB-189	NC	NC	NA	NA	NA	NA
PCB-77	NC	NC	NA	NA	NA	NA
PCB-81	NC	NC	NA	NA	NA	NA

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
mg/kg-day - milligrams per kilogram per day
mg/m^3 - milligrams per cubic meter

Estimates of Human Intake
Soil Vapor to Indoor Air Pathway for Adult Resident
Old Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	7.0	13.2
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	9	24
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Inorganic Compounds						
Antimony	NC	NC	NA	NA	NA	NA
Barium	NC	NC	NA	NA	NA	NA
Boron	NC	NC	NA	NA	NA	NA
Cadmium	NC	NC	NA	NA	NA	NA
Copper	NC	NC	NA	NA	NA	NA
Fluoride	NC	NC	NA	NA	NA	NA
Lead	NC	NC	NA	NA	NA	NA
Mercury	NC	NC	NA	NA	NA	NA
Nitrate	NC	NC	NA	NA	NA	NA
Silver	NC	NC	NA	NA	NA	NA
Thallium	NC	NC	NA	NA	NA	NA
Zinc	NC	NC	NA	NA	NA	NA
VOCs						
1,1,1-Trichloroethane	7.3E-04	9.1E-04	3.5E-05	1.2E-04	4.2E-06	4.0E-05
1,1,2-Trichloro-1,2,2-trifluoroethane	1.3E-03	2.4E-03	6.1E-05	3.3E-04	7.4E-06	1.0E-04
1,1-Dichloroethane	NC	NC	NA	NA	NA	NA
1,1-Dichloroethene	7.7E-04	9.4E-04	3.7E-05	1.3E-04	4.4E-06	4.1E-05
2-Butanone	NC	NC	NA	NA	NA	NA
Acetone	NC	NC	NA	NA	NA	NA
Benzene	6.6E-04	6.6E-04	3.2E-05	9.0E-05	3.8E-06	2.9E-05
Carbon disulfide	NC	NC	NA	NA	NA	NA
Chloromethane	NC	NC	NA	NA	NA	NA
cis-1,2-Dichloroethene	NC	NC	NA	NA	NA	NA
Ethylbenzene	2.7E-04	5.5E-04	1.3E-05	7.4E-05	1.6E-06	2.4E-05
m,p-Xylene	5.9E-04	1.2E-03	2.8E-05	1.6E-04	3.4E-06	5.1E-05
Methylene chloride	7.0E-04	3.5E-02	3.4E-05	4.8E-03	4.1E-06	1.5E-03
o-Xylene	1.3E-04	2.7E-04	6.4E-06	3.6E-05	7.6E-07	1.2E-05
p-Isopropyltoluene	4.2E-04	4.2E-04	2.0E-05	5.7E-05	2.4E-06	1.8E-05
Toluene	6.1E-04	6.6E-04	2.9E-05	8.9E-05	3.5E-06	2.9E-05
Trichloroethene	1.4E-03	4.6E-03	6.6E-05	6.2E-04	7.9E-06	2.0E-04
SVOCs						
1-Methylnaphthalene	NC	NC	NA	NA	NA	NA
2-Methylnaphthalene	NC	NC	NA	NA	NA	NA
Acenaphthene	NC	NC	NA	NA	NA	NA
Acenaphthylene	NC	NC	NA	NA	NA	NA
Anthracene	NC	NC	NA	NA	NA	NA
Benzo(a)anthracene	NC	NC	NA	NA	NA	NA

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Estimates of Human Intake
Soil Vapor to Indoor Air Pathway for Adult Resident
Old Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	7.0	13.2
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	9	24
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Benzo(a)pyrene	NC	NC	NA	NA	NA	NA
Benzo(e)pyrene	NC	NC	NA	NA	NA	NA
Benzo(b)fluoranthene	NC	NC	NA	NA	NA	NA
Benzo(g,h,i)perylene	NC	NC	NA	NA	NA	NA
Benzo(k)fluoranthene	NC	NC	NA	NA	NA	NA
Chrysene	NC	NC	NA	NA	NA	NA
Dibenz(a,h)anthracene	NC	NC	NA	NA	NA	NA
Fluoranthene	NC	NC	NA	NA	NA	NA
Fluorene	NC	NC	NA	NA	NA	NA
Indeno(1,2,3-cd)pyrene	NC	NC	NA	NA	NA	NA
Naphthalene	NC	NC	NA	NA	NA	NA
Perylene	NC	NC	NA	NA	NA	NA
Phenanthrene	NC	NC	NA	NA	NA	NA
Pyrene	NC	NC	NA	NA	NA	NA
Total Petroleum Hydrocarbons						
C11-C14(Kerosene Range)	NC	NC	NA	NA	NA	NA
C14-C20(Diesel Range)	NC	NC	NA	NA	NA	NA
C20-C30(Lubricant Oil Range)	NC	NC	NA	NA	NA	NA
PCDD/PCDFs						
2,3,7,8-TCDD	NC	NC	NA	NA	NA	NA
1,2,3,7,8-PeCDD	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,6,7,8-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,7,8,9-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,4,6,7,8-HpCDD	NC	NC	NA	NA	NA	NA
OCDD	NC	NC	NA	NA	NA	NA
2,3,7,8-TCDF	NC	NC	NA	NA	NA	NA
1,2,3,7,8-PeCDF	NC	NC	NA	NA	NA	NA
2,3,4,7,8-PeCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA
2,3,4,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,7,8,9-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,6,7,8-HpCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8,9-HpCDF	NC	NC	NA	NA	NA	NA
OCDF	NC	NC	NA	NA	NA	NA

Spreadsheet C2-60 (3 of 3)

Estimates of Human Intake
Soil Vapor to Indoor Air Pathway for Adult Resident
Old Conservation Yard RFI Site

Intake Equation:

$$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	7.0	13.2
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	9	24
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
PCBs						
Aroclor-1248	NC	NC	NA	NA	NA	NA
Aroclor-1254	NC	NC	NA	NA	NA	NA
Aroclor-1260	NC	NC	NA	NA	NA	NA
PCB-105	NC	NC	NA	NA	NA	NA
PCB-114	NC	NC	NA	NA	NA	NA
PCB-118	NC	NC	NA	NA	NA	NA
PCB-123	NC	NC	NA	NA	NA	NA
PCB-126	NC	NC	NA	NA	NA	NA
PCB-156	NC	NC	NA	NA	NA	NA
PCB-157	NC	NC	NA	NA	NA	NA
PCB-167	NC	NC	NA	NA	NA	NA
PCB-169	NC	NC	NA	NA	NA	NA
PCB-189	NC	NC	NA	NA	NA	NA
PCB-77	NC	NC	NA	NA	NA	NA
PCB-81	NC	NC	NA	NA	NA	NA

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyls
mg/kg-day - milligrams per kilogram per day
mg/m^3 - milligrams per cubic meter

Estimates of Human Intake
Groundwater to Ambient Air Pathway for Adult Resident
Old Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	7.0	13.2
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	9	24
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Inorganic Compounds						
Antimony	NC	NC	NA	NA	NA	NA
Barium	NC	NC	NA	NA	NA	NA
Boron	NC	NC	NA	NA	NA	NA
Cadmium	NC	NC	NA	NA	NA	NA
Copper	NC	NC	NA	NA	NA	NA
Fluoride	NC	NC	NA	NA	NA	NA
Lead	NC	NC	NA	NA	NA	NA
Mercury	NC	NC	NA	NA	NA	NA
Nitrate	NC	NC	NA	NA	NA	NA
Silver	NC	NC	NA	NA	NA	NA
Thallium	NC	NC	NA	NA	NA	NA
Zinc	NC	NC	NA	NA	NA	NA
VOCs						
1,1,1-Trichloroethane	NC	NC	NA	NA	NA	NA
1,1,2-Trichloro-1,2,2-trifluoroethane	NC	NC	NA	NA	NA	NA
1,1-Dichloroethane	NC	NC	NA	NA	NA	NA
1,1-Dichloroethene	NC	NC	NA	NA	NA	NA
2-Butanone	NC	NC	NA	NA	NA	NA
Acetone	NC	NC	NA	NA	NA	NA
Benzene	NC	NC	NA	NA	NA	NA
Carbon disulfide	NC	NC	NA	NA	NA	NA
Chloromethane	1.3E-07	1.3E-07	6.3E-09	1.8E-08	7.6E-10	5.7E-09
cis-1,2-Dichloroethene	3.2E-08	3.2E-08	1.5E-09	4.4E-09	1.9E-10	1.4E-09
Ethylbenzene	NC	NC	NA	NA	NA	NA
m,p-Xylene	NC	NC	NA	NA	NA	NA
Methylene chloride	NC	NC	NA	NA	NA	NA
o-Xylene	NC	NC	NA	NA	NA	NA
p-Isopropyltoluene	NC	NC	NA	NA	NA	NA
Toluene	NC	NC	NA	NA	NA	NA
Trichloroethene	1.1E-06	1.1E-06	5.2E-08	1.5E-07	6.2E-09	4.7E-08
SVOCs						
1-Methylnaphthalene	NC	NC	NA	NA	NA	NA
2-Methylnaphthalene	NC	NC	NA	NA	NA	NA
Acenaphthene	NC	NC	NA	NA	NA	NA
Acenaphthylene	NC	NC	NA	NA	NA	NA
Anthracene	NC	NC	NA	NA	NA	NA
Benzo(a)anthracene	NC	NC	NA	NA	NA	NA

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Estimates of Human Intake
Groundwater to Ambient Air Pathway for Adult Resident
Old Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	7.0	13.2
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	9	24
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Benzo(a)pyrene	NC	NC	NA	NA	NA	NA
Benzo(b)fluoranthene	NC	NC	NA	NA	NA	NA
Benzo(g,h,i)perylene	NC	NC	NA	NA	NA	NA
Benzo(k)fluoranthene	NC	NC	NA	NA	NA	NA
Chrysene	NC	NC	NA	NA	NA	NA
Dibenz(a,h)anthracene	NC	NC	NA	NA	NA	NA
Benzo(e)pyrene	NC	NC	NA	NA	NA	NA
Fluoranthene	NC	NC	NA	NA	NA	NA
Fluorene	NC	NC	NA	NA	NA	NA
Indeno(1,2,3-cd)pyrene	NC	NC	NA	NA	NA	NA
Naphthalene	NC	NC	NA	NA	NA	NA
Perylene	NC	NC	NA	NA	NA	NA
Phenanthrene	NC	NC	NA	NA	NA	NA
Pyrene	NC	NC	NA	NA	NA	NA
Total Petroleum Hydrocarbons						
C08-C11(Gasoline Range)	NC	NC	NA	NA	NA	NA
C11-C14(Kerosene Range)	NC	NC	NA	NA	NA	NA
C14-C20(Diesel Range)	NC	NC	NA	NA	NA	NA
C20-C30(Lubricant Oil Range)	NC	NC	NA	NA	NA	NA
PCDD/PCDFs						
2,3,7,8-TCDD	NC	NC	NA	NA	NA	NA
1,2,3,7,8-PeCDD	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,6,7,8-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,7,8,9-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,4,6,7,8-HpCDD	NC	NC	NA	NA	NA	NA
OCDD	NC	NC	NA	NA	NA	NA
2,3,7,8-TCDF	NC	NC	NA	NA	NA	NA
1,2,3,7,8-PeCDF	NC	NC	NA	NA	NA	NA
2,3,4,7,8-PeCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA
2,3,4,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,7,8,9-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,6,7,8-HpCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8,9-HpCDF	NC	NC	NA	NA	NA	NA
OCDF	NC	NC	NA	NA	NA	NA

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Estimates of Human Intake
Groundwater to Ambient Air Pathway for Adult Resident
Old Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	7.0	13.2
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	9	24
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
PCBs						
Aroclor-1248	NC	NC	NA	NA	NA	NA
Aroclor-1254	NC	NC	NA	NA	NA	NA
Aroclor-1260	NC	NC	NA	NA	NA	NA
PCB-105	NC	NC	NA	NA	NA	NA
PCB-114	NC	NC	NA	NA	NA	NA
PCB-118	NC	NC	NA	NA	NA	NA
PCB-123	NC	NC	NA	NA	NA	NA
PCB-126	NC	NC	NA	NA	NA	NA
PCB-156	NC	NC	NA	NA	NA	NA
PCB-157	NC	NC	NA	NA	NA	NA
PCB-167	NC	NC	NA	NA	NA	NA
PCB-169	NC	NC	NA	NA	NA	NA
PCB-189	NC	NC	NA	NA	NA	NA
PCB-77	NC	NC	NA	NA	NA	NA
PCB-81	NC	NC	NA	NA	NA	NA

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
mg/kg-day - milligrams per kilogram per day
mg/m^3 - milligrams per cubic meter

Estimates of Human Intake
Soil to Ambient Air Pathway for Adult Resident
Old Conservation Yard RFI Site

Intake Equation:

$$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	7.0	13.2
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	9	24
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Inorganic Compounds						
Antimony	NC	NC	NA	NA	NA	NA
Barium	NC	NC	NA	NA	NA	NA
Boron	NC	NC	NA	NA	NA	NA
Cadmium	NC	NC	NA	NA	NA	NA
Copper	NC	NC	NA	NA	NA	NA
Fluoride	NC	NC	NA	NA	NA	NA
Lead	NC	NC	NA	NA	NA	NA
Mercury	NC	NC	NA	NA	NA	NA
Nitrate	NC	NC	NA	NA	NA	NA
Silver	NC	NC	NA	NA	NA	NA
Thallium	NC	NC	NA	NA	NA	NA
Zinc	NC	NC	NA	NA	NA	NA
VOCs						
1,1,1-Trichloroethane	1.3E-05	1.3E-05	6.1E-07	1.7E-06	7.3E-08	5.5E-07
1,1,2-Trichloro-1,2,2-trifluoroethane	3.3E-05	3.3E-05	1.6E-06	4.5E-06	1.9E-07	1.5E-06
1,1-Dichloroethane	NC	NC	NA	NA	NA	NA
1,1-Dichloroethene	1.4E-05	1.4E-05	6.7E-07	1.9E-06	8.1E-08	6.1E-07
2-Butanone	NC	NC	NA	NA	NA	NA
Acetone	NC	NC	NA	NA	NA	NA
Benzene	9.8E-06	9.8E-06	4.7E-07	1.3E-06	5.6E-08	4.2E-07
Carbon disulfide	NC	NC	NA	NA	NA	NA
Chloromethane	NC	NC	NA	NA	NA	NA
cis-1,2-Dichloroethene	NC	NC	NA	NA	NA	NA
Ethylbenzene	7.4E-06	7.4E-06	3.6E-07	1.0E-06	4.3E-08	3.2E-07
m,p-Xylene	1.7E-05	1.7E-05	8.2E-07	2.3E-06	9.9E-08	7.4E-07
Methylene chloride	5.6E-04	5.6E-04	2.7E-05	7.6E-05	3.2E-06	2.4E-05
o-Xylene	3.9E-06	3.9E-06	1.9E-07	5.3E-07	2.2E-08	1.7E-07
p-Isopropyltoluene	NC	NC	NA	NA	NA	NA
Toluene	9.7E-06	9.7E-06	4.6E-07	1.3E-06	5.6E-08	4.2E-07
Trichloroethene	6.4E-05	6.4E-05	3.1E-06	8.6E-06	3.7E-07	2.8E-06
SVOCs						
1-Methylnaphthalene	NC	NC	NA	NA	NA	NA
2-Methylnaphthalene	NC	NC	NA	NA	NA	NA
Acenaphthene	NC	NC	NA	NA	NA	NA
Acenaphthylene	NC	NC	NA	NA	NA	NA
Anthracene	NC	NC	NA	NA	NA	NA
Benzo(a)anthracene	NC	NC	NA	NA	NA	NA

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Estimates of Human Intake
Soil to Ambient Air Pathway for Adult Resident
Old Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	7.0	13.2
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	9	24
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Benzo(a)pyrene	NC	NC	NA	NA	NA	NA
Benzo(e)pyrene	NC	NC	NA	NA	NA	NA
Benzo(b)fluoranthene	NC	NC	NA	NA	NA	NA
Benzo(g,h,i)perylene	NC	NC	NA	NA	NA	NA
Benzo(k)fluoranthene	NC	NC	NA	NA	NA	NA
Chrysene	NC	NC	NA	NA	NA	NA
Dibenz(a,h)anthracene	NC	NC	NA	NA	NA	NA
Fluoranthene	NC	NC	NA	NA	NA	NA
Fluorene	NC	NC	NA	NA	NA	NA
Indeno(1,2,3-cd)pyrene	NC	NC	NA	NA	NA	NA
Naphthalene	NC	NC	NA	NA	NA	NA
Perylene	NC	NC	NA	NA	NA	NA
Phenanthrene	NC	NC	NA	NA	NA	NA
Pyrene	NC	NC	NA	NA	NA	NA
Total Petroleum Hydrocarbons						
C08-C11(Gasoline Range)	NC	NC	NA	NA	NA	NA
C11-C14(Kerosene Range)	NC	NC	NA	NA	NA	NA
C14-C20(Diesel Range)	NC	NC	NA	NA	NA	NA
C20-C30(Lubricant Oil Range)	NC	NC	NA	NA	NA	NA
PCDD/PCDFs						
2,3,7,8-TCDD	NC	NC	NA	NA	NA	NA
1,2,3,7,8-PeCDD	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,6,7,8-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,7,8,9-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,4,6,7,8-HpCDD	NC	NC	NA	NA	NA	NA
OCDD	NC	NC	NA	NA	NA	NA
2,3,7,8-TCDF	NC	NC	NA	NA	NA	NA
1,2,3,7,8-PeCDF	NC	NC	NA	NA	NA	NA
2,3,4,7,8-PeCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA
2,3,4,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,7,8,9-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,6,7,8-HpCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8,9-HpCDF	NC	NC	NA	NA	NA	NA
OCDF	NC	NC	NA	NA	NA	NA

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Estimates of Human Intake
Soil to Ambient Air Pathway for Adult Resident
Old Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	7.0	13.2
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	9	24
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
PCBs						
Aroclor-1248	NC	NC	NA	NA	NA	NA
Aroclor-1254	NC	NC	NA	NA	NA	NA
Aroclor-1260	NC	NC	NA	NA	NA	NA
PCB-105	NC	NC	NA	NA	NA	NA
PCB-114	NC	NC	NA	NA	NA	NA
PCB-118	NC	NC	NA	NA	NA	NA
PCB-123	NC	NC	NA	NA	NA	NA
PCB-126	NC	NC	NA	NA	NA	NA
PCB-156	NC	NC	NA	NA	NA	NA
PCB-157	NC	NC	NA	NA	NA	NA
PCB-167	NC	NC	NA	NA	NA	NA
PCB-169	NC	NC	NA	NA	NA	NA
PCB-189	NC	NC	NA	NA	NA	NA
PCB-77	NC	NC	NA	NA	NA	NA
PCB-81	NC	NC	NA	NA	NA	NA

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyls
mg/kg-day - milligrams per kilogram per day
mg/m^3 - milligrams per cubic meter

Estimates of Human Intake
Soil Particulate Inhalation Pathway for Adult Resident
Old Conservation Yard RFI Site

Intake Equation:

$$\text{Dosage} = \frac{C \times CF \times IR \times FT \times EF \times ED}{PEF \times BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Inhalation rate	IR	m^3/day	7.0	13.2
Conversion factor	CF	kg/ug	1.E-09	1.E-09
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	9	24
Particulate emission factor	PEF	m^3/ug	2.4	2.4
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Inorganic Compounds						
Antimony	NC	NC	NA	NA	NA	NA
Barium	NC	NC	NA	NA	NA	NA
Boron	4.3E+00	5.2E+00	8.6E-11	3.0E-10	1.0E-11	9.5E-11
Cadmium	5.2E-01	9.9E-01	1.0E-11	5.6E-11	1.2E-12	1.8E-11
Copper	NC	NC	NA	NA	NA	NA
Fluoride	NC	NC	NA	NA	NA	NA
Lead	1.7E+01	2.1E+01	3.4E-10	1.2E-09	4.1E-11	3.7E-10
Mercury	5.0E-01	3.3E+00	1.0E-11	1.8E-10	1.2E-12	5.9E-11
Nitrate	NC	NC	NA	NA	NA	NA
Silver	8.6E-01	1.8E+00	1.7E-11	1.0E-10	2.1E-12	3.2E-11
Thallium	8.6E-01	1.7E+00	1.7E-11	9.6E-11	2.1E-12	3.1E-11
Zinc	6.6E+01	7.4E+01	1.3E-09	4.2E-09	1.6E-10	1.3E-09
VOCs						
1,1,1-Trichloroethane	NC	NC	NA	NA	NA	NA
1,1,2-Trichloro-1,2,2-trifluoroethane	NC	NC	NA	NA	NA	NA
1,1-Dichloroethane	NC	NC	NA	NA	NA	NA
1,1-Dichloroethene	NC	NC	NA	NA	NA	NA
2-Butanone	NC	NC	NA	NA	NA	NA
Acetone	NC	NC	NA	NA	NA	NA
Benzene	NC	NC	NA	NA	NA	NA
Carbon disulfide	NC	NC	NA	NA	NA	NA
Chloromethane	NC	NC	NA	NA	NA	NA
cis-1,2-Dichloroethene	NC	NC	NA	NA	NA	NA
Ethylbenzene	NC	NC	NA	NA	NA	NA
m,p-Xylene	NC	NC	NA	NA	NA	NA
Methylene chloride	NC	NC	NA	NA	NA	NA
o-Xylene	NC	NC	NA	NA	NA	NA
p-Isopropyltoluene	NC	NC	NA	NA	NA	NA
Toluene	NC	NC	NA	NA	NA	NA
Trichloroethene	NC	NC	NA	NA	NA	NA
SVOCs						
1-Methylnaphthalene	1.2E-02	1.3E-02	2.4E-13	7.5E-13	2.9E-14	2.4E-13
2-Methylnaphthalene	1.7E-01	5.6E-01	3.4E-12	3.2E-11	4.1E-13	1.0E-11
Acenaphthene	1.7E-01	7.0E-01	3.4E-12	3.9E-11	4.0E-13	1.3E-11
Acenaphthylene	4.0E-02	1.4E-01	8.0E-13	8.0E-12	9.6E-14	2.6E-12

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Estimates of Human Intake
Soil Particulate Inhalation Pathway for Adult Resident
Old Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times CF \times IR \times FT \times EF \times ED}{PEF \times BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Inhalation rate	IR	m^3/day	7.0	13.2
Conversion factor	CF	kg/ug	1.E-09	1.E-09
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	9	24
Particulate emission factor	PEF	m^3/ug	2.4	2.4
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Anthracene	1.2E-01	4.7E-01	2.4E-12	2.6E-11	2.8E-13	8.5E-12
Benzo(a)anthracene	3.9E-02	1.8E-01	7.7E-13	1.0E-11	9.2E-14	3.3E-12
Benzo(a)pyrene	3.6E-02	1.8E-01	7.3E-13	9.9E-12	8.7E-14	3.2E-12
Benzo(e)pyrene	7.1E-02	3.1E-01	1.4E-12	1.8E-11	1.7E-13	5.6E-12
Benzo(b)fluoranthene	4.4E-02	2.0E-01	8.8E-13	1.1E-11	1.1E-13	3.6E-12
Benzo(g,h,i)perylene	8.4E-02	3.0E-01	1.7E-12	1.7E-11	2.0E-13	5.4E-12
Benzo(k)fluoranthene	3.6E-02	1.8E-01	7.2E-13	9.9E-12	8.7E-14	3.2E-12
Chrysene	5.9E-02	2.4E-01	1.2E-12	1.4E-11	1.4E-13	4.3E-12
Dibenz(a,h)anthracene	2.6E-02	1.0E-01	5.2E-13	5.9E-12	6.2E-14	1.9E-12
Fluoranthene	9.0E-02	4.3E-01	1.8E-12	2.5E-11	2.2E-13	7.8E-12
Fluorene	1.7E-01	6.9E-01	3.3E-12	3.9E-11	4.0E-13	1.3E-11
Indeno(1,2,3-cd)pyrene	3.2E-02	1.7E-01	6.4E-13	9.4E-12	7.6E-14	3.0E-12
Naphthalene	6.3E-02	1.6E-01	1.3E-12	8.8E-12	1.5E-13	2.8E-12
Perylene	4.0E-02	1.8E-01	8.1E-13	1.0E-11	9.7E-14	3.2E-12
Phenanthrene	4.4E-01	1.9E+00	8.8E-12	1.0E-10	1.1E-12	3.3E-11
Pyrene	8.9E-02	3.7E-01	1.8E-12	2.1E-11	2.1E-13	6.7E-12
Total Petroleum Hydrocarbons						
C08-C11(Gasoline Range)	NC	NC	NA	NA	NA	NA
C11-C14(Kerosene Range)	1.1E+01	2.2E+01	2.2E-10	1.2E-09	2.7E-11	3.9E-10
C14-C20(Diesel Range)	6.5E+01	2.6E+02	1.3E-09	1.4E-08	1.6E-10	4.6E-09
C20-C30(Lubricant Oil Range)	2.9E+02	1.4E+03	5.9E-09	7.7E-08	7.0E-10	2.5E-08
PCDD/PCDFs						
2,3,7,8-TCDD	1.0E-06	1.8E-06	2.0E-17	1.0E-16	2.4E-18	3.2E-17
1,2,3,7,8-PeCDD	6.6E-06	5.2E-05	1.3E-16	2.9E-15	1.6E-17	9.4E-16
1,2,3,4,7,8-HxCDD	1.4E-05	5.3E-05	2.9E-16	3.0E-15	3.5E-17	9.5E-16
1,2,3,6,7,8-HxCDD	2.0E-05	1.0E-04	4.0E-16	5.8E-15	4.8E-17	1.9E-15
1,2,3,7,8,9-HxCDD	1.8E-05	8.6E-05	3.6E-16	4.9E-15	4.3E-17	1.6E-15
1,2,3,4,6,7,8-HpCDD	4.9E-04	2.9E-03	9.8E-15	1.6E-13	1.2E-15	5.2E-14
OCDD	3.7E-03	8.2E-03	7.4E-14	4.7E-13	8.9E-15	1.5E-13
2,3,7,8-TCDF	2.2E-06	1.0E-05	4.4E-17	5.7E-16	5.3E-18	1.8E-16
1,2,3,7,8-PeCDF	1.8E-06	9.5E-06	3.6E-17	5.4E-16	4.4E-18	1.7E-16
2,3,4,7,8-PeCDF	5.1E-06	3.0E-05	1.0E-16	1.7E-15	1.2E-17	5.4E-16
1,2,3,4,7,8-HxCDF	1.3E-05	6.2E-05	2.6E-16	3.5E-15	3.1E-17	1.1E-15
1,2,3,6,7,8-HxCDF	4.9E-06	1.0E-05	9.8E-17	5.7E-16	1.2E-17	1.8E-16
2,3,4,6,7,8-HxCDF	5.2E-06	2.9E-05	1.0E-16	1.6E-15	1.3E-17	5.2E-16
1,2,3,7,8,9-HxCDF	2.3E-06	1.0E-05	4.6E-17	5.7E-16	5.5E-18	1.8E-16
1,2,3,4,6,7,8-HpCDF	5.5E-05	1.2E-04	1.1E-15	6.6E-15	1.3E-16	2.1E-15
1,2,3,4,7,8,9-HpCDF	7.2E-06	3.0E-05	1.4E-16	1.7E-15	1.7E-17	5.5E-16
OCDF	1.8E-04	4.1E-04	3.6E-15	2.3E-14	4.4E-16	7.4E-15

Spreadsheet C2-57 (3 of 3)

Estimates of Human Intake
Soil Particulate Inhalation Pathway for Adult Resident
Old Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times CF \times IR \times FT \times EF \times ED}{PEF \times BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Inhalation rate	IR	m^3/day	7.0	13.2
Conversion factor	CF	kg/ug	1.E-09	1.E-09
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	9	24
Particulate emission factor	PEF	m^3/ug	2.4	2.4
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
PCBs						
Aroclor-1248	5.0E+02	5.5E+03	1.0E-08	3.1E-07	1.2E-09	9.9E-08
Aroclor-1254	1.2E+00	5.4E+00	2.5E-11	3.1E-10	2.9E-12	9.8E-11
Aroclor-1260	1.3E+01	1.4E+02	2.7E-10	8.1E-09	3.2E-11	2.6E-09
PCB-105	1.1E-03	1.2E-02	2.2E-14	6.7E-13	2.7E-15	2.1E-13
PCB-114	2.1E-05	2.1E-04	4.1E-16	1.2E-14	4.9E-17	3.8E-15
PCB-118	2.2E-03	2.4E-02	4.5E-14	1.3E-12	5.4E-15	4.3E-13
PCB-123	3.1E-05	3.3E-04	6.3E-16	1.9E-14	7.5E-17	6.0E-15
PCB-126	8.6E-05	9.2E-04	1.7E-15	5.2E-14	2.1E-16	1.7E-14
PCB-156	7.4E-04	7.9E-03	1.5E-14	4.4E-13	1.8E-15	1.4E-13
PCB-157	3.3E-04	3.5E-03	6.6E-15	2.0E-13	7.9E-16	6.4E-14
PCB-167	5.7E-04	6.1E-03	1.1E-14	3.5E-13	1.4E-15	1.1E-13
PCB-169	8.5E-06	9.2E-05	1.7E-16	5.2E-15	2.0E-17	1.7E-15
PCB-189	8.5E-05	9.2E-04	1.7E-15	5.2E-14	2.0E-16	1.7E-14
PCB-77	1.7E-04	1.8E-03	3.4E-15	1.0E-13	4.1E-16	3.3E-14
PCB-81	3.1E-05	3.2E-04	6.1E-16	1.8E-14	7.3E-17	5.9E-15

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyls
mg/kg-day - milligrams per kilogram per day
mg/kg - milligrams per kilogram

Estimates of Human Intake
Soil Dermal Contact Pathway for Adult Resident
Old Conservation Yard RFI Site

Intake Equation: Dosage = $\frac{C \times SA \times AF \times B \times CF \times EF \times ED}{BW \times AT}$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Skin surface area per event	SA	cm^2/day	5700	5700
Soil loading to skin	AF	mg/cm^2	0.01	0.07
Bioavailability	B	fraction	CS	CS
Conversion factor	CF	kg/mg	1.E-06	1.E-06
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	9	24
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
Inorganic Compounds							
Antimony	NC	NC	NA	NA	NA	NA	0.01
Barium	NC	NC	NA	NA	NA	NA	0.01
Boron	4.3E+00	5.2E+00	3.4E-08	2.9E-07	4.0E-09	9.2E-08	0.01
Cadmium	5.2E-01	9.9E-01	4.0E-10	5.4E-09	4.9E-11	1.7E-09	0.00
Copper	NC	NC	NA	NA	NA	NA	0.01
Fluoride	NC	NC	NA	NA	NA	NA	0.01
Lead	1.7E+01	2.1E+01	1.3E-07	1.1E-06	1.6E-08	3.6E-07	0.01
Mercury	5.0E-01	3.3E+00	3.9E-09	1.8E-07	4.7E-10	5.7E-08	0.01
Nitrate	NC	NC	NA	NA	NA	NA	0.01
Silver	8.6E-01	1.8E+00	6.7E-09	9.7E-08	8.1E-10	3.1E-08	0.01
Thallium	8.6E-01	1.7E+00	6.7E-09	9.3E-08	8.1E-10	3.0E-08	0.01
Zinc	6.6E+01	7.4E+01	5.2E-07	4.0E-06	6.2E-08	1.3E-06	0.01
VOCs							
1,1,1-Trichloroethane	3.0E-03	5.5E-03	2.3E-10	3.0E-09	2.8E-11	9.6E-10	0.10
1,1,2-Trichloro-1,2,2-trifluoroethane	1.2E-02	2.1E-02	9.6E-10	1.1E-08	1.2E-10	3.6E-09	0.10
1,1-Dichloroethane	NC	NC	NA	NA	NA	NA	0.10
1,1-Dichloroethene	3.2E-03	5.5E-03	2.5E-10	3.0E-09	3.0E-11	9.6E-10	0.10
2-Butanone	2.2E-02	1.1E-02	1.7E-09	6.0E-09	2.1E-10	1.9E-09	0.10
Acetone	3.5E-01	3.5E+00	2.8E-08	1.9E-06	3.3E-09	6.2E-07	0.10
Benzene	1.1E-03	2.5E-03	8.8E-11	1.4E-09	1.1E-11	4.3E-10	0.10
Carbon disulfide	NC	NC	NA	NA	NA	NA	0.01
Chloromethane	NC	NC	NA	NA	NA	NA	0.10
cis-1,2-Dichloroethene	NC	NC	NA	NA	NA	NA	0.10
Ethylbenzene	1.1E-03	2.5E-03	8.8E-11	1.4E-09	1.1E-11	4.3E-10	0.10
m,p-Xylene	3.2E-03	7.2E-03	2.5E-10	4.0E-09	3.0E-11	1.3E-09	0.10
Methylene chloride	4.1E-02	2.4E-01	3.2E-09	1.3E-07	3.8E-10	4.3E-08	0.10
o-Xylene	7.8E-04	1.7E-03	6.1E-11	9.3E-10	7.3E-12	3.0E-10	0.10
p-Isopropyltoluene	1.9E-03	1.9E-03	1.5E-10	1.0E-09	1.8E-11	3.3E-10	0.10
Toluene	1.5E-03	3.6E-03	1.2E-10	1.9E-09	1.4E-11	6.2E-10	0.10
Trichloroethene	3.0E-03	5.5E-03	2.3E-10	3.0E-09	2.8E-11	9.6E-10	0.10
SVOCs							
1-Methylnaphthalene	1.2E-02	1.3E-02	1.2E-09	9.5E-09	1.5E-10	3.0E-09	0.13
2-Methylnaphthalene	1.7E-01	5.6E-01	1.7E-08	4.0E-07	2.1E-09	1.3E-07	0.13
Acenaphthene	1.7E-01	7.0E-01	1.7E-08	5.0E-07	2.1E-09	1.6E-07	0.13
Acenaphthylene	4.0E-02	1.4E-01	4.1E-09	1.0E-07	4.9E-10	3.2E-08	0.13

Spreadsheet C2-56 (2 of 3)

Estimates of Human Intake
Soil Dermal Contact Pathway for Adult Resident
Old Conservation Yard RFI Site

Intake Equation: Dosage = $\frac{C \times SA \times AF \times B \times CF \times EF \times ED}{BW \times AT}$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Skin surface area per event	SA	cm^2/day	5700	5700
Soil loading to skin	AF	mg/cm^2	0.01	0.07
Bioavailability	B	fraction	CS	CS
Conversion factor	CF	kg/mg	1.E-06	1.E-06
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	9	24
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
Anthracene	1.2E-01	4.7E-01	1.2E-08	3.3E-07	1.4E-09	1.1E-07	0.13
Benzo(a)anthracene	3.9E-02	1.8E-01	3.9E-09	1.3E-07	4.7E-10	4.1E-08	0.13
Benzo(a)pyrene	3.6E-02	1.8E-01	3.7E-09	1.2E-07	4.4E-10	4.0E-08	0.13
Benzo(e)pyrene	7.1E-02	3.1E-01	7.2E-09	2.2E-07	8.6E-10	7.1E-08	0.13
Benzo(b)fluoranthene	4.4E-02	2.0E-01	4.5E-09	1.4E-07	5.3E-10	4.5E-08	0.13
Benzo(g,h,i)perylene	8.4E-02	3.0E-01	8.5E-09	2.1E-07	1.0E-09	6.8E-08	0.13
Benzo(k)fluoranthene	3.6E-02	1.8E-01	3.7E-09	1.2E-07	4.4E-10	4.0E-08	0.13
Chrysene	5.9E-02	2.4E-01	6.0E-09	1.7E-07	7.2E-10	5.4E-08	0.13
Dibenz(a,h)anthracene	2.6E-02	1.0E-01	2.6E-09	7.4E-08	3.2E-10	2.4E-08	0.13
Fluoranthene	9.0E-02	4.3E-01	9.2E-09	3.1E-07	1.1E-09	9.9E-08	0.13
Fluorene	1.7E-01	6.9E-01	1.7E-08	4.9E-07	2.0E-09	1.6E-07	0.13
Indeno(1,2,3-cd)pyrene	3.2E-02	1.7E-01	3.2E-09	1.2E-07	3.9E-10	3.8E-08	0.13
Naphthalene	6.3E-02	1.6E-01	6.4E-09	1.1E-07	7.6E-10	3.6E-08	0.13
Perylene	4.0E-02	1.8E-01	4.1E-09	1.3E-07	4.9E-10	4.0E-08	0.13
Phenanthrene	4.4E-01	1.9E+00	4.5E-08	1.3E-06	5.4E-09	4.2E-07	0.13
Pyrene	8.9E-02	3.7E-01	9.0E-09	2.6E-07	1.1E-09	8.4E-08	0.13
Total Petroleum Hydrocarbons							
C08-C11(Gasoline Range)	9.7E+00	2.2E+01	7.6E-07	1.2E-05	9.1E-08	3.8E-06	0.10
C11-C14(Kerosene Range)	1.1E+01	2.2E+01	1.1E-06	1.5E-05	1.3E-07	4.9E-06	0.13
C14-C20(Diesel Range)	6.5E+01	2.6E+02	6.6E-06	1.8E-04	7.9E-07	5.8E-05	0.13
C20-C30(Lubricant Oil Range)	2.9E+02	1.4E+03	3.0E-05	9.7E-04	3.6E-06	3.1E-04	0.13
PCDD/PCDFs							
2,3,7,8-TCDD	1.0E-06	1.8E-06	2.4E-14	2.9E-13	2.8E-15	9.3E-14	0.03
1,2,3,7,8-PeCDD	6.6E-06	5.2E-05	1.5E-13	8.5E-12	1.8E-14	2.7E-12	0.03
1,2,3,4,7,8-HxCDD	1.4E-05	5.3E-05	3.4E-13	8.6E-12	4.1E-14	2.8E-12	0.03
1,2,3,6,7,8-HxCDD	2.0E-05	1.0E-04	4.7E-13	1.7E-11	5.6E-14	5.4E-12	0.03
1,2,3,7,8,9-HxCDD	1.8E-05	8.6E-05	4.2E-13	1.4E-11	5.0E-14	4.5E-12	0.03
1,2,3,4,6,7,8-HpCDD	4.9E-04	2.9E-03	1.1E-11	4.8E-10	1.4E-12	1.5E-10	0.03
OCDD	3.7E-03	8.2E-03	8.7E-11	1.4E-09	1.0E-11	4.3E-10	0.03
2,3,7,8-TCDF	2.2E-06	1.0E-05	5.1E-14	1.6E-12	6.2E-15	5.2E-13	0.03
1,2,3,7,8-PeCDF	1.8E-06	9.5E-06	4.3E-14	1.6E-12	5.1E-15	5.0E-13	0.03
2,3,4,7,8-PeCDF	5.1E-06	3.0E-05	1.2E-13	4.9E-12	1.4E-14	1.6E-12	0.03
1,2,3,4,7,8-HxCDF	1.3E-05	6.2E-05	3.0E-13	1.0E-11	3.6E-14	3.3E-12	0.03
1,2,3,6,7,8-HxCDF	4.9E-06	1.0E-05	1.2E-13	1.6E-12	1.4E-14	5.2E-13	0.03
2,3,4,6,7,8-HxCDF	5.2E-06	2.9E-05	1.2E-13	4.7E-12	1.5E-14	1.5E-12	0.03
1,2,3,7,8,9-HxCDF	2.3E-06	1.0E-05	5.4E-14	1.7E-12	6.5E-15	5.3E-13	0.03
1,2,3,4,6,7,8-HpCDF	5.5E-05	1.2E-04	1.3E-12	1.9E-11	1.6E-13	6.2E-12	0.03
1,2,3,4,7,8,9-HpCDF	7.2E-06	3.0E-05	1.7E-13	5.0E-12	2.0E-14	1.6E-12	0.03
OCDF	1.8E-04	4.1E-04	4.2E-12	6.7E-11	5.1E-13	2.2E-11	0.03

Spreadsheet C2-56 (3 of 3)

Estimates of Human Intake
Soil Dermal Contact Pathway for Adult Resident
Old Conservation Yard RFI Site

Intake Equation: Dosage = $\frac{C \times SA \times AF \times B \times CF \times EF \times ED}{BW \times AT}$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Skin surface area per event	SA	cm^2/day	5700	5700
Soil loading to skin	AF	mg/cm^2	0.01	0.07
Bioavailability	B	fraction	CS	CS
Conversion factor	CF	kg/mg	1.E-06	1.E-06
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	9	24
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
PCBs							
Aroclor-1248	5.0E+02	5.5E+03	5.5E-05	4.2E-03	6.6E-06	1.3E-03	0.14
Aroclor-1254	1.2E+00	5.4E+00	1.3E-07	4.1E-06	1.6E-08	1.3E-06	0.14
Aroclor-1260	1.3E+01	1.4E+02	1.5E-06	1.1E-04	1.7E-07	3.5E-05	0.14
PCB-105	1.1E-03	1.2E-02	1.2E-10	9.0E-09	1.5E-11	2.9E-09	0.14
PCB-114	2.1E-05	2.1E-04	2.2E-12	1.6E-10	2.7E-13	5.2E-11	0.14
PCB-118	2.2E-03	2.4E-02	2.4E-10	1.8E-08	2.9E-11	5.8E-09	0.14
PCB-123	3.1E-05	3.3E-04	3.4E-12	2.6E-10	4.1E-13	8.2E-11	0.14
PCB-126	8.6E-05	9.2E-04	9.4E-12	7.0E-10	1.1E-12	2.2E-10	0.14
PCB-156	7.4E-04	7.9E-03	8.1E-11	6.0E-09	9.7E-12	1.9E-09	0.14
PCB-157	3.3E-04	3.5E-03	3.6E-11	2.7E-09	4.3E-12	8.6E-10	0.14
PCB-167	5.7E-04	6.1E-03	6.2E-11	4.7E-09	7.5E-12	1.5E-09	0.14
PCB-169	8.5E-06	9.2E-05	9.3E-13	7.0E-11	1.1E-13	2.2E-11	0.14
PCB-189	8.5E-05	9.2E-04	9.3E-12	7.0E-10	1.1E-12	2.2E-10	0.14
PCB-77	1.7E-04	1.8E-03	1.9E-11	1.4E-09	2.3E-12	4.5E-10	0.14
PCB-81	3.1E-05	3.2E-04	3.3E-12	2.5E-10	4.0E-13	7.9E-11	0.14

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005),
except dermal absorption factors which were taken from USEPA (2001).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyls
mg/kg-day - milligrams per kilogram per day
mg/kg - milligrams per kilogram

Estimates of Human Intake
Soil Ingestion Pathway for Adult Resident
Old Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times CF \times FT \times EF \times ED \times B}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Soil ingestion rate	IR	mg/day	50	100
Conversion factor	CF	kg/mg	1.E-06	1.E-06
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	9	24
Bioavailability	B	fraction	CS	CS
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
Inorganic Compounds							
Antimony	NC	NC	NA	NA	NA	NA	1
Barium	NC	NC	NA	NA	NA	NA	1
Boron	4.3E+00	5.2E+00	2.9E-06	7.2E-06	3.5E-07	2.3E-06	1
Cadmium	5.2E-01	9.9E-01	3.6E-07	1.4E-06	4.3E-08	4.4E-07	1
Copper	NC	NC	NA	NA	NA	NA	1
Fluoride	NC	NC	NA	NA	NA	NA	1
Lead	1.7E+01	2.1E+01	1.2E-05	2.8E-05	1.4E-06	9.1E-06	1
Mercury	5.0E-01	3.3E+00	3.4E-07	4.5E-06	4.1E-08	1.4E-06	1
Nitrate	NC	NC	NA	NA	NA	NA	1
Silver	8.6E-01	1.8E+00	5.9E-07	2.4E-06	7.1E-08	7.8E-07	1
Thallium	8.6E-01	1.7E+00	5.9E-07	2.3E-06	7.1E-08	7.5E-07	1
Zinc	6.6E+01	7.4E+01	4.6E-05	1.0E-04	5.5E-06	3.2E-05	1
VOCs							
1,1,1-Trichloroethane	3.0E-03	5.5E-03	2.1E-09	7.5E-09	2.5E-10	2.4E-09	1
1,1,2-Trichloro-1,2,2-trifluoroethane	1.2E-02	2.1E-02	8.4E-09	2.8E-08	1.0E-09	9.0E-09	1
1,1-Dichloroethane	NC	NC	NA	NA	NA	NA	1
1,1-Dichloroethene	3.2E-03	5.5E-03	2.2E-09	7.5E-09	2.6E-10	2.4E-09	1
2-Butanone	2.2E-02	1.1E-02	1.5E-08	1.5E-08	1.8E-09	4.8E-09	1
Acetone	3.5E-01	3.5E+00	2.4E-07	4.8E-06	2.9E-08	1.5E-06	1
Benzene	1.1E-03	2.5E-03	7.8E-10	3.4E-09	9.3E-11	1.1E-09	1
Carbon disulfide	NC	NC	NA	NA	NA	NA	1
Chloromethane	NC	NC	NA	NA	NA	NA	1
cis-1,2-Dichloroethene	NC	NC	NA	NA	NA	NA	1
Ethylbenzene	1.1E-03	2.5E-03	7.8E-10	3.4E-09	9.3E-11	1.1E-09	1
m,p-Xylene	3.2E-03	7.2E-03	2.2E-09	9.9E-09	2.7E-10	3.2E-09	1
Methylene chloride	4.1E-02	2.4E-01	2.8E-08	3.4E-07	3.4E-09	1.1E-07	1
o-Xylene	7.8E-04	1.7E-03	5.3E-10	2.3E-09	6.4E-11	7.5E-10	1
p-Isopropyltoluene	1.9E-03	1.9E-03	1.3E-09	2.6E-09	1.6E-10	8.3E-10	1
Toluene	1.5E-03	3.6E-03	1.1E-09	4.9E-09	1.3E-10	1.6E-09	1
Trichloroethene	3.0E-03	5.5E-03	2.1E-09	7.5E-09	2.5E-10	2.4E-09	1
SVOCs							
1-Methylnaphthalene	1.2E-02	1.3E-02	8.2E-09	1.8E-08	9.8E-10	5.8E-09	1
2-Methylnaphthalene	1.7E-01	5.6E-01	1.2E-07	7.7E-07	1.4E-08	2.5E-07	1
Acenaphthene	1.7E-01	7.0E-01	1.2E-07	9.6E-07	1.4E-08	3.1E-07	1
Acenaphthylene	4.0E-02	1.4E-01	2.7E-08	1.9E-07	3.3E-09	6.2E-08	1
Anthracene	1.2E-01	4.7E-01	8.1E-08	6.4E-07	9.8E-09	2.1E-07	1

Spreadsheet C2-55 (2 of 3)

Estimates of Human Intake
Soil Ingestion Pathway for Adult Resident
Old Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times CF \times FT \times EF \times ED \times B}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Soil ingestion rate	IR	mg/day	50	100
Conversion factor	CF	kg/mg	1.E-06	1.E-06
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	9	24
Bioavailability	B	fraction	CS	CS
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
Benzo(a)anthracene	3.9E-02	1.8E-01	2.6E-08	2.5E-07	3.2E-09	8.0E-08	1
Benzo(a)pyrene	3.6E-02	1.8E-01	2.5E-08	2.4E-07	3.0E-09	7.7E-08	1
Benzo(e)pyrene	7.1E-02	3.1E-01	4.8E-08	4.3E-07	5.8E-09	1.4E-07	1
Benzo(b)fluoranthene	4.4E-02	2.0E-01	3.0E-08	2.7E-07	3.6E-09	8.7E-08	1
Benzo(g,h,i)perylene	8.4E-02	3.0E-01	5.7E-08	4.1E-07	6.9E-09	1.3E-07	1
Benzo(k)fluoranthene	3.6E-02	1.8E-01	2.5E-08	2.4E-07	3.0E-09	7.7E-08	1
Chrysene	5.9E-02	2.4E-01	4.1E-08	3.3E-07	4.9E-09	1.0E-07	1
Dibenz(a,h)anthracene	2.6E-02	1.0E-01	1.8E-08	1.4E-07	2.1E-09	4.6E-08	1
Fluoranthene	9.0E-02	4.3E-01	6.2E-08	5.9E-07	7.4E-09	1.9E-07	1
Fluorene	1.7E-01	6.9E-01	1.1E-07	9.5E-07	1.4E-08	3.0E-07	1
Indeno(1,2,3-cd)pyrene	3.2E-02	1.7E-01	2.2E-08	2.3E-07	2.6E-09	7.3E-08	1
Naphthalene	6.3E-02	1.6E-01	4.3E-08	2.1E-07	5.1E-09	6.9E-08	1
Perylene	4.0E-02	1.8E-01	2.8E-08	2.4E-07	3.3E-09	7.8E-08	1
Phenanthrene	4.4E-01	1.9E+00	3.0E-07	2.5E-06	3.6E-08	8.1E-07	1
Pyrene	8.9E-02	3.7E-01	6.1E-08	5.1E-07	7.3E-09	1.6E-07	1
Total Petroleum Hydrocarbons							
C08-C11(Gasoline Range)	9.7E+00	2.2E+01	6.6E-06	2.9E-05	8.0E-07	9.4E-06	1
C11-C14(Kerosene Range)	1.1E+01	2.2E+01	7.6E-06	3.0E-05	9.1E-07	9.5E-06	1
C14-C20(Diesel Range)	6.5E+01	2.6E+02	4.5E-05	3.5E-04	5.4E-06	1.1E-04	1
C20-C30(Lubricant Oil Range)	2.9E+02	1.4E+03	2.0E-04	1.9E-03	2.4E-05	6.0E-04	1
PCDD/PCDFs							
2,3,7,8-TCDD	1.0E-06	1.8E-06	6.9E-13	2.4E-12	8.3E-14	7.7E-13	1
1,2,3,7,8-PeCDD	6.6E-06	5.2E-05	4.5E-12	7.1E-11	5.4E-13	2.3E-11	1
1,2,3,4,7,8-HxCDD	1.4E-05	5.3E-05	9.9E-12	7.2E-11	1.2E-12	2.3E-11	1
1,2,3,6,7,8-HxCDD	2.0E-05	1.0E-04	1.4E-11	1.4E-10	1.6E-12	4.5E-11	1
1,2,3,7,8,9-HxCDD	1.8E-05	8.6E-05	1.2E-11	1.2E-10	1.5E-12	3.8E-11	1
1,2,3,4,6,7,8-HpCDD	4.9E-04	2.9E-03	3.3E-10	4.0E-09	4.0E-11	1.3E-09	1
OCDD	3.7E-03	8.2E-03	2.5E-09	1.1E-08	3.0E-10	3.6E-09	1
2,3,7,8-TCDF	2.2E-06	1.0E-05	1.5E-12	1.4E-11	1.8E-13	4.4E-12	1
1,2,3,7,8-PeCDF	1.8E-06	9.5E-06	1.2E-12	1.3E-11	1.5E-13	4.2E-12	1
2,3,4,7,8-PeCDF	5.1E-06	3.0E-05	3.5E-12	4.1E-11	4.2E-13	1.3E-11	1
1,2,3,4,7,8-HxCDF	1.3E-05	6.2E-05	8.8E-12	8.5E-11	1.1E-12	2.7E-11	1
1,2,3,6,7,8-HxCDF	4.9E-06	1.0E-05	3.4E-12	1.4E-11	4.0E-13	4.4E-12	1
2,3,4,6,7,8-HxCDF	5.2E-06	2.9E-05	3.6E-12	4.0E-11	4.3E-13	1.3E-11	1
1,2,3,7,8,9-HxCDF	2.3E-06	1.0E-05	1.6E-12	1.4E-11	1.9E-13	4.4E-12	1
1,2,3,4,6,7,8-HpCDF	5.5E-05	1.2E-04	3.8E-11	1.6E-10	4.6E-12	5.1E-11	1
1,2,3,4,7,8,9-HpCDF	7.2E-06	3.0E-05	4.9E-12	4.1E-11	5.9E-13	1.3E-11	1
OCDF	1.8E-04	4.1E-04	1.2E-10	5.6E-10	1.5E-11	1.8E-10	1

Spreadsheet C2-55 (3 of 3)

Estimates of Human Intake
Soil Ingestion Pathway for Adult Resident
Old Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times CF \times FT \times EF \times ED \times B}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Soil ingestion rate	IR	mg/day	50	100
Conversion factor	CF	kg/mg	1.E-06	1.E-06
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	9	24
Bioavailability	B	fraction	CS	CS
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
PCBs							
Aroclor-1248	5.0E+02	5.5E+03	3.4E-04	7.5E-03	4.1E-05	2.4E-03	1
Aroclor-1254	1.2E+00	5.4E+00	8.4E-07	7.4E-06	1.0E-07	2.4E-06	1
Aroclor-1260	1.3E+01	1.4E+02	9.1E-06	2.0E-04	1.1E-06	6.3E-05	1
PCB-105	1.1E-03	1.2E-02	7.6E-10	1.6E-08	9.2E-11	5.2E-09	1
PCB-114	2.1E-05	2.1E-04	1.4E-11	2.9E-10	1.7E-12	9.2E-11	1
PCB-118	2.2E-03	2.4E-02	1.5E-09	3.2E-08	1.8E-10	1.0E-08	1
PCB-123	3.1E-05	3.3E-04	2.2E-11	4.6E-10	2.6E-12	1.5E-10	1
PCB-126	8.6E-05	9.2E-04	5.9E-11	1.3E-09	7.1E-12	4.0E-10	1
PCB-156	7.4E-04	7.9E-03	5.0E-10	1.1E-08	6.1E-11	3.4E-09	1
PCB-157	3.3E-04	3.5E-03	2.2E-10	4.8E-09	2.7E-11	1.5E-09	1
PCB-167	5.7E-04	6.1E-03	3.9E-10	8.4E-09	4.7E-11	2.7E-09	1
PCB-169	8.5E-06	9.2E-05	5.8E-12	1.3E-10	7.0E-13	4.0E-11	1
PCB-189	8.5E-05	9.2E-04	5.8E-11	1.3E-09	7.0E-12	4.0E-10	1
PCB-77	1.7E-04	1.8E-03	1.2E-10	2.5E-09	1.4E-11	8.0E-10	1
PCB-81	3.1E-05	3.2E-04	2.1E-11	4.4E-10	2.5E-12	1.4E-10	1

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyls
mg/kg-day - milligrams per kilogram per day
mg/kg - milligrams per kilogram

Estimates of Human Intake
Groundwater to Ambient Air Pathway for Child Recreator
Old Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	4.4	8.8
Fraction of time outdoors	FT	fraction	1.0	1.0
Exposure frequency	EF	days/year	50	100
Exposure duration	ED	years	6	6
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Inorganic Compounds						
Antimony	NC	NC	NA	NA	NA	NA
Barium	NC	NC	NA	NA	NA	NA
Boron	NC	NC	NA	NA	NA	NA
Cadmium	NC	NC	NA	NA	NA	NA
Copper	NC	NC	NA	NA	NA	NA
Lead	NC	NC	NA	NA	NA	NA
Mercury	NC	NC	NA	NA	NA	NA
Nitrate	NC	NC	NA	NA	NA	NA
Silver	NC	NC	NA	NA	NA	NA
Thallium	NC	NC	NA	NA	NA	NA
Zinc	NC	NC	NA	NA	NA	NA
VOCs						
1,1,1-Trichloroethane	NC	NC	NA	NA	NA	NA
1,1,2-Trichloro-1,2,2-trifluoroethane	NC	NC	NA	NA	NA	NA
1,1-Dichloroethane	NC	NC	NA	NA	NA	NA
1,1-Dichloroethene	NC	NC	NA	NA	NA	NA
2-Butanone	NC	NC	NA	NA	NA	NA
Acetone	NC	NC	NA	NA	NA	NA
Benzene	NC	NC	NA	NA	NA	NA
Carbon disulfide	NC	NC	NA	NA	NA	NA
Chloromethane	1.3E-07	1.3E-07	5.3E-09	2.1E-08	4.2E-10	1.7E-09
cis-1,2-Dichloroethene	3.2E-08	3.2E-08	1.3E-09	5.2E-09	1.0E-10	4.1E-10
Ethylbenzene	NC	NC	NA	NA	NA	NA
m,p-Xylene	NC	NC	NA	NA	NA	NA
Methylene chloride	NC	NC	NA	NA	NA	NA
o-Xylene	NC	NC	NA	NA	NA	NA
p-Isopropyltoluene	NC	NC	NA	NA	NA	NA
Toluene	NC	NC	NA	NA	NA	NA
Trichloroethene	1.1E-06	1.1E-06	4.4E-08	1.7E-07	3.5E-09	1.4E-08
SVOCs						
1-Methylnaphthalene	NC	NC	NA	NA	NA	NA
2-Methylnaphthalene	NC	NC	NA	NA	NA	NA
Acenaphthene	NC	NC	NA	NA	NA	NA
Acenaphthylene	NC	NC	NA	NA	NA	NA
Anthracene	NC	NC	NA	NA	NA	NA
Benzo(a)anthracene	NC	NC	NA	NA	NA	NA
Benzo(a)pyrene	NC	NC	NA	NA	NA	NA

Estimates of Human Intake
Groundwater to Ambient Air Pathway for Child Recreator
Old Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	4.4	8.8
Fraction of time outdoors	FT	fraction	1.0	1.0
Exposure frequency	EF	days/year	50	100
Exposure duration	ED	years	6	6
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Benzo(b)fluoranthene	NC	NC	NA	NA	NA	NA
Benzo(g,h,i)perylene	NC	NC	NA	NA	NA	NA
Benzo(k)fluoranthene	NC	NC	NA	NA	NA	NA
Chrysene	NC	NC	NA	NA	NA	NA
Dibenz(a,h)anthracene	NC	NC	NA	NA	NA	NA
Benzo(e)pyrene	NC	NC	NA	NA	NA	NA
Fluoranthene	NC	NC	NA	NA	NA	NA
Fluorene	NC	NC	NA	NA	NA	NA
Indeno(1,2,3-cd)pyrene	NC	NC	NA	NA	NA	NA
Naphthalene	NC	NC	NA	NA	NA	NA
Perylene	NC	NC	NA	NA	NA	NA
Phenanthrene	NC	NC	NA	NA	NA	NA
Pyrene	NC	NC	NA	NA	NA	NA
Total Petroleum Hydrocarbons						
C08-C11(Gasoline Range)	NC	NC	NA	NA	NA	NA
C11-C14(Kerosene Range)	NC	NC	NA	NA	NA	NA
C14-C20(Diesel Range)	NC	NC	NA	NA	NA	NA
C20-C30(Lubricant Oil Range)	NC	NC	NA	NA	NA	NA
PCDD/PCDFs						
2,3,7,8-TCDD	NC	NC	NA	NA	NA	NA
1,2,3,7,8-PeCDD	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,6,7,8-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,7,8,9-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,4,6,7,8-HpCDD	NC	NC	NA	NA	NA	NA
OCDD	NC	NC	NA	NA	NA	NA
2,3,7,8-TCDF	NC	NC	NA	NA	NA	NA
1,2,3,7,8-PeCDF	NC	NC	NA	NA	NA	NA
2,3,4,7,8-PeCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA
2,3,4,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,7,8,9-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,6,7,8-HpCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8,9-HpCDF	NC	NC	NA	NA	NA	NA
OCDF	NC	NC	NA	NA	NA	NA
PCBs						
Aroclor-1248	NC	NC	NA	NA	NA	NA
Aroclor-1254	NC	NC	NA	NA	NA	NA

Spreadsheet C2-54 (3 of 3)

Estimates of Human Intake
Groundwater to Ambient Air Pathway for Child Recreator
Old Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	4.4	8.8
Fraction of time outdoors	FT	fraction	1.0	1.0
Exposure frequency	EF	days/year	50	100
Exposure duration	ED	years	6	6
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Aroclor-1260	NC	NC	NA	NA	NA	NA
PCB-105	NC	NC	NA	NA	NA	NA
PCB-114	NC	NC	NA	NA	NA	NA
PCB-118	NC	NC	NA	NA	NA	NA
PCB-123	NC	NC	NA	NA	NA	NA
PCB-126	NC	NC	NA	NA	NA	NA
PCB-156	NC	NC	NA	NA	NA	NA
PCB-157	NC	NC	NA	NA	NA	NA
PCB-167	NC	NC	NA	NA	NA	NA
PCB-169	NC	NC	NA	NA	NA	NA
PCB-189	NC	NC	NA	NA	NA	NA
PCB-77	NC	NC	NA	NA	NA	NA
PCB-81	NC	NC	NA	NA	NA	NA

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
mg/kg-day - milligrams per kilogram per day
mg/m^3 - milligrams per cubic meter

Estimates of Human Intake
Soil to Ambient Air Pathway for Child Recreator
Old Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	4.4	8.8
Fraction of time outdoors	FT	fraction	1.0	1.0
Exposure frequency	EF	days/year	50	100
Exposure duration	ED	years	6	6
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Inorganic Compounds						
Antimony	NC	NC	NA	NA	NA	NA
Barium	NC	NC	NA	NA	NA	NA
Boron	NC	NC	NA	NA	NA	NA
Cadmium	NC	NC	NA	NA	NA	NA
Copper	NC	NC	NA	NA	NA	NA
Lead	NC	NC	NA	NA	NA	NA
Mercury	NC	NC	NA	NA	NA	NA
Nitrate	NC	NC	NA	NA	NA	NA
Silver	NC	NC	NA	NA	NA	NA
Thallium	NC	NC	NA	NA	NA	NA
Zinc	NC	NC	NA	NA	NA	NA
VOCs						
1,1,1-Trichloroethane	1.3E-05	1.3E-05	5.1E-07	2.0E-06	4.1E-08	1.6E-07
1,1,2-Trichloro-1,2,2-trifluoroethane	3.3E-05	3.3E-05	1.3E-06	5.4E-06	1.1E-07	4.3E-07
1,1-Dichloroethane	NC	NC	NA	NA	NA	NA
1,1-Dichloroethene	1.4E-05	1.4E-05	5.6E-07	2.2E-06	4.5E-08	1.8E-07
2-Butanone	NC	NC	NA	NA	NA	NA
Acetone	NC	NC	NA	NA	NA	NA
Benzene	9.8E-06	9.8E-06	3.9E-07	1.6E-06	3.1E-08	1.3E-07
Carbon disulfide	NC	NC	NA	NA	NA	NA
Chloromethane	NC	NC	NA	NA	NA	NA
cis-1,2-Dichloroethene	NC	NC	NA	NA	NA	NA
Ethylbenzene	7.4E-06	7.4E-06	3.0E-07	1.2E-06	2.4E-08	9.5E-08
m,p-Xylene	1.7E-05	1.7E-05	6.9E-07	2.7E-06	5.5E-08	2.2E-07
Methylene chloride	5.6E-04	5.6E-04	2.2E-05	9.0E-05	1.8E-06	7.2E-06
o-Xylene	3.9E-06	3.9E-06	1.6E-07	6.3E-07	1.3E-08	5.0E-08
p-Isopropyltoluene	NC	NC	NA	NA	NA	NA
Toluene	9.7E-06	9.7E-06	3.9E-07	1.6E-06	3.1E-08	1.2E-07
Trichloroethene	6.4E-05	6.4E-05	2.6E-06	1.0E-05	2.0E-07	8.2E-07
SVOCs						
1-Methylnaphthalene	NC	NC	NA	NA	NA	NA
2-Methylnaphthalene	NC	NC	NA	NA	NA	NA
Acenaphthene	NC	NC	NA	NA	NA	NA
Acenaphthylene	NC	NC	NA	NA	NA	NA
Anthracene	NC	NC	NA	NA	NA	NA
Benzo(a)anthracene	NC	NC	NA	NA	NA	NA
Benzo(a)pyrene	NC	NC	NA	NA	NA	NA

Estimates of Human Intake
Soil to Ambient Air Pathway for Child Recreator
Old Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	4.4	8.8
Fraction of time outdoors	FT	fraction	1.0	1.0
Exposure frequency	EF	days/year	50	100
Exposure duration	ED	years	6	6
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Benzo(e)pyrene	NC	NC	NA	NA	NA	NA
Benzo(b)fluoranthene	NC	NC	NA	NA	NA	NA
Benzo(g,h,i)perylene	NC	NC	NA	NA	NA	NA
Benzo(k)fluoranthene	NC	NC	NA	NA	NA	NA
Chrysene	NC	NC	NA	NA	NA	NA
Dibenz(a,h)anthracene	NC	NC	NA	NA	NA	NA
Fluoranthene	NC	NC	NA	NA	NA	NA
Fluorene	NC	NC	NA	NA	NA	NA
Indeno(1,2,3-cd)pyrene	NC	NC	NA	NA	NA	NA
Naphthalene	NC	NC	NA	NA	NA	NA
Perylene	NC	NC	NA	NA	NA	NA
Phenanthrene	NC	NC	NA	NA	NA	NA
Pyrene	NC	NC	NA	NA	NA	NA
Total Petroleum Hydrocarbons						
C08-C11(Gasoline Range)	NC	NC	NA	NA	NA	NA
C11-C14(Kerosene Range)	NC	NC	NA	NA	NA	NA
C14-C20(Diesel Range)	NC	NC	NA	NA	NA	NA
C20-C30(Lubricant Oil Range)	NC	NC	NA	NA	NA	NA
PCDD/PCDFs						
2,3,7,8-TCDD	NC	NC	NA	NA	NA	NA
1,2,3,7,8-PeCDD	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,6,7,8-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,7,8,9-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,4,6,7,8-HpCDD	NC	NC	NA	NA	NA	NA
OCDD	NC	NC	NA	NA	NA	NA
2,3,7,8-TCDF	NC	NC	NA	NA	NA	NA
1,2,3,7,8-PeCDF	NC	NC	NA	NA	NA	NA
2,3,4,7,8-PeCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA
2,3,4,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,7,8,9-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,6,7,8-HpCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8,9-HpCDF	NC	NC	NA	NA	NA	NA
OCDF	NC	NC	NA	NA	NA	NA

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Estimates of Human Intake
Soil to Ambient Air Pathway for Child Recreator
Old Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	4.4	8.8
Fraction of time outdoors	FT	fraction	1.0	1.0
Exposure frequency	EF	days/year	50	100
Exposure duration	ED	years	6	6
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
PCBs						
Aroclor-1248	NC	NC	NA	NA	NA	NA
Aroclor-1254	NC	NC	NA	NA	NA	NA
Aroclor-1260	NC	NC	NA	NA	NA	NA
PCB-105	NC	NC	NA	NA	NA	NA
PCB-114	NC	NC	NA	NA	NA	NA
PCB-118	NC	NC	NA	NA	NA	NA
PCB-123	NC	NC	NA	NA	NA	NA
PCB-126	NC	NC	NA	NA	NA	NA
PCB-156	NC	NC	NA	NA	NA	NA
PCB-157	NC	NC	NA	NA	NA	NA
PCB-167	NC	NC	NA	NA	NA	NA
PCB-169	NC	NC	NA	NA	NA	NA
PCB-189	NC	NC	NA	NA	NA	NA
PCB-77	NC	NC	NA	NA	NA	NA
PCB-81	NC	NC	NA	NA	NA	NA

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyls
mg/kg-day - milligrams per kilogram per day
mg/m^3 - milligrams per cubic meter

Estimates of Human Intake
Soil Particulate Inhalation Pathway for Child Recreator
Old Conservation Yard RFI Site

Intake Equation:

$$\text{Dosage} = \frac{C \times CF \times IR \times FT \times EF \times ED}{PEF \times BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Inhalation rate	IR	m^3/day	4.4	8.8
Conversion factor	CF	kg/ug	1.E-09	1.E-09
Fraction of time outdoors	FT	fraction	1.0	1.0
Exposure frequency	EF	days/year	50	100
Exposure duration	ED	years	6	6
Particulate emission factor	PEF	m^3/ug	2.4	2.4
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Inorganic Compounds						
Antimony	NC	NC	NA	NA	NA	NA
Barium	NC	NC	NA	NA	NA	NA
Boron	4.3E+00	5.2E+00	7.2E-11	3.5E-10	5.8E-12	2.8E-11
Cadmium	5.2E-01	9.9E-01	8.7E-12	6.7E-11	6.9E-13	5.3E-12
Copper	NC	NC	NA	NA	NA	NA
Lead	1.7E+01	2.1E+01	2.8E-10	1.4E-09	2.3E-11	1.1E-10
Mercury	5.0E-01	3.3E+00	8.4E-12	2.2E-10	6.7E-13	1.7E-11
Nitrate	NC	NC	NA	NA	NA	NA
Silver	8.6E-01	1.8E+00	1.4E-11	1.2E-10	1.2E-12	9.5E-12
Thallium	8.6E-01	1.7E+00	1.4E-11	1.1E-10	1.2E-12	9.1E-12
Zinc	6.6E+01	7.4E+01	1.1E-09	4.9E-09	8.9E-11	3.9E-10
VOCs						
1,1,1-Trichloroethane	NC	NC	NA	NA	NA	NA
1,1,2-Trichloro-1,2,2-trifluoroethane	NC	NC	NA	NA	NA	NA
1,1-Dichloroethane	NC	NC	NA	NA	NA	NA
1,1-Dichloroethene	NC	NC	NA	NA	NA	NA
2-Butanone	NC	NC	NA	NA	NA	NA
Acetone	NC	NC	NA	NA	NA	NA
Benzene	NC	NC	NA	NA	NA	NA
Carbon disulfide	NC	NC	NA	NA	NA	NA
Chloromethane	NC	NC	NA	NA	NA	NA
cis-1,2-Dichloroethene	NC	NC	NA	NA	NA	NA
Ethylbenzene	NC	NC	NA	NA	NA	NA
m,p-Xylene	NC	NC	NA	NA	NA	NA
Methylene chloride	NC	NC	NA	NA	NA	NA
o-Xylene	NC	NC	NA	NA	NA	NA
p-Isopropyltoluene	NC	NC	NA	NA	NA	NA
Toluene	NC	NC	NA	NA	NA	NA
Trichloroethene	NC	NC	NA	NA	NA	NA
SVOCs						
1-Methylnaphthalene	1.2E-02	1.3E-02	2.0E-13	8.9E-13	1.6E-14	7.1E-14
2-Methylnaphthalene	1.7E-01	5.6E-01	2.9E-12	3.7E-11	2.3E-13	3.0E-12
Acenaphthene	1.7E-01	7.0E-01	2.8E-12	4.7E-11	2.3E-13	3.7E-12
Acenaphthylene	4.0E-02	1.4E-01	6.7E-13	9.5E-12	5.4E-14	7.6E-13
Anthracene	1.2E-01	4.7E-01	2.0E-12	3.1E-11	1.6E-13	2.5E-12

Estimates of Human Intake
Soil Particulate Inhalation Pathway for Child Recreator
Old Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times CF \times IR \times FT \times EF \times ED}{PEF \times BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Inhalation rate	IR	m^3/day	4.4	8.8
Conversion factor	CF	kg/ug	1.E-09	1.E-09
Fraction of time outdoors	FT	fraction	1.0	1.0
Exposure frequency	EF	days/year	50	100
Exposure duration	ED	years	6	6
Particulate emission factor	PEF	m^3/ug	2.4	2.4
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Benzo(a)anthracene	3.9E-02	1.8E-01	6.4E-13	1.2E-11	5.2E-14	9.8E-13
Benzo(e)pyrene	7.1E-02	3.1E-01	1.2E-12	2.1E-11	9.5E-14	1.7E-12
Benzo(a)pyrene	3.6E-02	1.8E-01	6.1E-13	1.2E-11	4.9E-14	9.4E-13
Benzo(b)fluoranthene	4.4E-02	2.0E-01	7.3E-13	1.3E-11	5.9E-14	1.1E-12
Benzo(g,h,i)perylene	8.4E-02	3.0E-01	1.4E-12	2.0E-11	1.1E-13	1.6E-12
Benzo(k)fluoranthene	3.6E-02	1.8E-01	6.1E-13	1.2E-11	4.8E-14	9.4E-13
Chrysene	5.9E-02	2.4E-01	9.9E-13	1.6E-11	7.9E-14	1.3E-12
Dibenz(a,h)anthracene	2.6E-02	1.0E-01	4.3E-13	7.0E-12	3.5E-14	5.6E-13
Fluoranthene	9.0E-02	4.3E-01	1.5E-12	2.9E-11	1.2E-13	2.3E-12
Fluorene	1.7E-01	6.9E-01	2.8E-12	4.6E-11	2.2E-13	3.7E-12
Indeno(1,2,3-cd)pyrene	3.2E-02	1.7E-01	5.3E-13	1.1E-11	4.3E-14	8.9E-13
Naphthalene	6.3E-02	1.6E-01	1.0E-12	1.0E-11	8.4E-14	8.4E-13
Perylene	4.0E-02	1.8E-01	6.8E-13	1.2E-11	5.4E-14	9.5E-13
Phenanthrene	4.4E-01	1.9E+00	7.4E-12	1.2E-10	5.9E-13	9.9E-12
Pyrene	8.9E-02	3.7E-01	1.5E-12	2.5E-11	1.2E-13	2.0E-12
Total Petroleum Hydrocarbons						
C08-C11(Gasoline Range)	NC	NC	NA	NA	NA	NA
C11-C14(Kerosene Range)	1.1E+01	2.2E+01	1.9E-10	1.5E-09	1.5E-11	1.2E-10
C14-C20(Diesel Range)	6.5E+01	2.6E+02	1.1E-09	1.7E-08	8.7E-11	1.4E-09
C20-C30(Lubricant Oil Range)	2.9E+02	1.4E+03	4.9E-09	9.2E-08	3.9E-10	7.3E-09
PCDD/PCDFs						
2,3,7,8-TCDD	1.0E-06	1.8E-06	1.7E-17	1.2E-16	1.4E-18	9.5E-18
1,2,3,7,8-PeCDD	6.6E-06	5.2E-05	1.1E-16	3.5E-15	8.8E-18	2.8E-16
1,2,3,4,7,8-HxCDD	1.4E-05	5.3E-05	2.4E-16	3.5E-15	1.9E-17	2.8E-16
1,2,3,6,7,8-HxCDD	2.0E-05	1.0E-04	3.4E-16	6.9E-15	2.7E-17	5.5E-16
1,2,3,7,8,9-HxCDD	1.8E-05	8.6E-05	3.0E-16	5.8E-15	2.4E-17	4.6E-16
1,2,3,4,6,7,8-HpCDD	4.9E-04	2.9E-03	8.2E-15	1.9E-13	6.5E-16	1.6E-14
OCDD	3.7E-03	8.2E-03	6.2E-14	5.5E-13	4.9E-15	4.4E-14
2,3,7,8-TCDF	2.2E-06	1.0E-05	3.7E-17	6.7E-16	2.9E-18	5.4E-17
1,2,3,7,8-PeCDF	1.8E-06	9.5E-06	3.0E-17	6.4E-16	2.4E-18	5.1E-17
2,3,4,7,8-PeCDF	5.1E-06	3.0E-05	8.6E-17	2.0E-15	6.8E-18	1.6E-16
1,2,3,4,7,8-HxCDF	1.3E-05	6.2E-05	2.2E-16	4.2E-15	1.7E-17	3.3E-16
1,2,3,6,7,8-HxCDF	4.9E-06	1.0E-05	8.2E-17	6.7E-16	6.6E-18	5.4E-17
2,3,4,6,7,8-HxCDF	5.2E-06	2.9E-05	8.8E-17	1.9E-15	7.0E-18	1.5E-16
1,2,3,7,8,9-HxCDF	2.3E-06	1.0E-05	3.8E-17	6.8E-16	3.1E-18	5.4E-17
1,2,3,4,6,7,8-HpCDF	5.5E-05	1.2E-04	9.3E-16	7.9E-15	7.4E-17	6.3E-16
1,2,3,4,7,8,9-HpCDF	7.2E-06	3.0E-05	1.2E-16	2.0E-15	9.7E-18	1.6E-16
OCDF	1.8E-04	4.1E-04	3.0E-15	2.7E-14	2.4E-16	2.2E-15

Estimates of Human Intake
Soil Particulate Inhalation Pathway for Child Recreator
Old Conservation Yard RFI Site

Intake Equation:

$$\text{Dosage} = \frac{C \times CF \times IR \times FT \times EF \times ED}{PEF \times BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Inhalation rate	IR	m^3/day	4.4	8.8
Conversion factor	CF	kg/ug	1.E-09	1.E-09
Fraction of time outdoors	FT	fraction	1.0	1.0
Exposure frequency	EF	days/year	50	100
Exposure duration	ED	years	6	6
Particulate emission factor	PEF	m^3/ug	2.4	2.4
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
PCBs						
Aroclor-1248	5.0E+02	5.5E+03	8.4E-09	3.7E-07	6.7E-10	2.9E-08
Aroclor-1254	1.2E+00	5.4E+00	2.1E-11	3.6E-10	1.6E-12	2.9E-11
Aroclor-1260	1.3E+01	1.4E+02	2.2E-10	9.6E-09	1.8E-11	7.7E-10
PCB-105	1.1E-03	1.2E-02	1.9E-14	7.9E-13	1.5E-15	6.3E-14
PCB-114	2.1E-05	2.1E-04	3.4E-16	1.4E-14	2.8E-17	1.1E-15
PCB-118	2.2E-03	2.4E-02	3.7E-14	1.6E-12	3.0E-15	1.3E-13
PCB-123	3.1E-05	3.3E-04	5.3E-16	2.2E-14	4.2E-17	1.8E-15
PCB-126	8.6E-05	9.2E-04	1.4E-15	6.1E-14	1.2E-16	4.9E-15
PCB-156	7.4E-04	7.9E-03	1.2E-14	5.3E-13	9.9E-16	4.2E-14
PCB-157	3.3E-04	3.5E-03	5.5E-15	2.4E-13	4.4E-16	1.9E-14
PCB-167	5.7E-04	6.1E-03	9.6E-15	4.1E-13	7.6E-16	3.3E-14
PCB-169	8.5E-06	9.2E-05	1.4E-16	6.1E-15	1.1E-17	4.9E-16
PCB-189	8.5E-05	9.2E-04	1.4E-15	6.1E-14	1.1E-16	4.9E-15
PCB-77	1.7E-04	1.8E-03	2.9E-15	1.2E-13	2.3E-16	9.8E-15
PCB-81	3.1E-05	3.2E-04	5.1E-16	2.2E-14	4.1E-17	1.7E-15

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyls
mg/kg-day - milligrams per kilogram per day
mg/kg - milligrams per kilogram

Soil Dermal Contact Pathway for Child Recreator
Old Conservation Yard RFI Site

Intake Equation: Dosage = $\frac{C \times SA \times AF \times B \times CF \times EF \times ED}{BW \times AT}$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Skin surface area per event	SA	cm^2/day	2800	2800
Soil loading to skin	AF	mg/cm^2	0.06	0.20
Bioavailability	B	fraction	CS	CS
Conversion factor	CF	kg/mg	0	0
Exposure frequency	EF	days/year	50	100
Exposure duration	ED	years	6	6
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
Inorganic Compounds							
Antimony	NC	NC	NA	NA	NA	NA	1.0E-02
Barium	NC	NC	NA	NA	NA	NA	1.0E-02
Boron	4.3E+00	5.2E+00	6.6E-08	5.4E-07	5.3E-09	4.3E-08	0.01
Cadmium	5.2E-01	9.9E-01	8.0E-10	1.0E-08	6.4E-11	8.1E-10	0.00
Copper	NC	NC	NA	NA	NA	NA	0.01
Lead	1.7E+01	2.1E+01	2.6E-07	2.1E-06	2.1E-08	1.7E-07	0.01
Mercury	5.0E-01	3.3E+00	7.7E-09	3.3E-07	6.2E-10	2.7E-08	0.01
Nitrate	NC	NC	NA	NA	NA	NA	0.01
Silver	8.6E-01	1.8E+00	1.3E-08	1.8E-07	1.1E-09	1.5E-08	0.01
Thallium	8.6E-01	1.7E+00	1.3E-08	1.7E-07	1.1E-09	1.4E-08	0.01
Zinc	6.6E+01	7.4E+01	1.0E-06	7.5E-06	8.2E-08	6.0E-07	0.01
VOCs							
1,1,1-Trichloroethane	3.0E-03	5.5E-03	4.6E-10	5.6E-09	3.7E-11	4.5E-10	0.10
1,1,2-Trichloro-1,2,2-trifluoroethane	1.2E-02	2.1E-02	1.9E-09	2.1E-08	1.5E-10	1.7E-09	0.10
1,1-Dichloroethane	NC	NC	NA	NA	NA	NA	0.10
1,1-Dichloroethene	3.2E-03	5.5E-03	4.8E-10	5.6E-09	3.9E-11	4.5E-10	0.10
2-Butanone	2.2E-02	1.1E-02	3.4E-09	1.1E-08	2.7E-10	9.0E-10	0.10
Acetone	3.5E-01	3.5E+00	5.4E-08	3.6E-06	4.3E-09	2.9E-07	0.10
Benzene	1.1E-03	2.5E-03	1.7E-10	2.5E-09	1.4E-11	2.0E-10	0.10
Carbon disulfide	NC	NC	NA	NA	NA	NA	0.01
Chloromethane	NC	NC	NA	NA	NA	NA	0.10
cis-1,2-Dichloroethene	NC	NC	NA	NA	NA	NA	0.10
Ethylbenzene	1.1E-03	2.5E-03	1.7E-10	2.5E-09	1.4E-11	2.0E-10	0.10
m,p-Xylene	3.2E-03	7.2E-03	5.0E-10	7.4E-09	4.0E-11	5.9E-10	0.10
Methylene chloride	4.1E-02	2.4E-01	6.3E-09	2.5E-07	5.0E-10	2.0E-08	0.10
o-Xylene	7.8E-04	1.7E-03	1.2E-10	1.7E-09	9.6E-12	1.4E-10	0.10
p-Isopropyltoluene	1.9E-03	1.9E-03	2.9E-10	1.9E-09	2.3E-11	1.6E-10	0.10
Toluene	1.5E-03	3.6E-03	2.4E-10	3.6E-09	1.9E-11	2.9E-10	0.10
Trichloroethene	3.0E-03	5.5E-03	4.6E-10	5.6E-09	3.7E-11	4.5E-10	0.10
SVOCs							
1-Methylnaphthalene	1.2E-02	1.3E-02	2.4E-09	1.8E-08	1.9E-10	1.4E-09	0.13
2-Methylnaphthalene	1.7E-01	5.6E-01	3.4E-08	7.4E-07	2.7E-09	6.0E-08	0.13
Acenaphthene	1.7E-01	7.0E-01	3.4E-08	9.3E-07	2.7E-09	7.4E-08	0.13
Acenaphthylene	4.0E-02	1.4E-01	8.0E-09	1.9E-07	6.4E-10	1.5E-08	0.13
Anthracene	1.2E-01	4.7E-01	2.4E-08	6.2E-07	1.9E-09	5.0E-08	0.13

Soil Dermal Contact Pathway for Child Recreator
Old Conservation Yard RFI Site

Intake Equation: Dosage = $\frac{C \times SA \times AF \times B \times CF \times EF \times ED}{BW \times AT}$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Skin surface area per event	SA	cm^2/day	2800	2800
Soil loading to skin	AF	mg/cm^2	0.06	0.20
Bioavailability	B	fraction	CS	CS
Conversion factor	CF	kg/mg	0	0
Exposure frequency	EF	days/year	50	100
Exposure duration	ED	years	6	6
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
Benzo(a)anthracene	3.9E-02	1.8E-01	7.7E-09	2.4E-07	6.1E-10	1.9E-08	0.13
Benzo(a)pyrene	3.6E-02	1.8E-01	7.2E-09	2.3E-07	5.8E-10	1.9E-08	0.13
Benzo(e)pyrene	7.1E-02	3.1E-01	1.4E-08	4.1E-07	1.1E-09	3.3E-08	0.13
Benzo(b)fluoranthene	4.4E-02	2.0E-01	8.8E-09	2.6E-07	7.0E-10	2.1E-08	0.13
Benzo(g,h,i)perylene	8.4E-02	3.0E-01	1.7E-08	4.0E-07	1.3E-09	3.2E-08	0.13
Benzo(k)fluoranthene	3.6E-02	1.8E-01	7.2E-09	2.3E-07	5.8E-10	1.9E-08	0.13
Chrysene	5.9E-02	2.4E-01	1.2E-08	3.2E-07	9.5E-10	2.5E-08	0.13
Dibenz(a,h)anthracene	2.6E-02	1.0E-01	5.2E-09	1.4E-07	4.1E-10	1.1E-08	0.13
Fluoranthene	9.0E-02	4.3E-01	1.8E-08	5.8E-07	1.4E-09	4.6E-08	0.13
Fluorene	1.7E-01	6.9E-01	3.3E-08	9.2E-07	2.7E-09	7.4E-08	0.13
Indeno(1,2,3-cd)pyrene	3.2E-02	1.7E-01	6.3E-09	2.2E-07	5.1E-10	1.8E-08	0.13
Naphthalene	6.3E-02	1.6E-01	1.2E-08	2.1E-07	1.0E-09	1.7E-08	0.13
Perylene	4.0E-02	1.8E-01	8.1E-09	2.4E-07	6.4E-10	1.9E-08	0.13
Phenanthrene	4.4E-01	1.9E+00	8.8E-08	2.5E-06	7.0E-09	2.0E-07	0.13
Pyrene	8.9E-02	3.7E-01	1.8E-08	4.9E-07	1.4E-09	3.9E-08	0.13
Total Petroleum Hydrocarbons							
C08-C11(Gasoline Range)	9.7E+00	2.2E+01	1.5E-06	2.2E-05	1.2E-07	1.8E-06	0.10
C11-C14(Kerosene Range)	1.1E+01	2.2E+01	2.2E-06	2.9E-05	1.8E-07	2.3E-06	0.13
C14-C20(Diesel Range)	6.5E+01	2.6E+02	1.3E-05	3.4E-04	1.0E-06	2.7E-05	0.13
C20-C30(Lubricant Oil Range)	2.9E+02	1.4E+03	5.8E-05	1.8E-03	4.7E-06	1.5E-04	0.13
PCDD/PCDFs							
2,3,7,8-TCDD	1.0E-06	1.8E-06	4.7E-14	5.4E-13	3.7E-15	4.3E-14	0.03
1,2,3,7,8-PeCDD	6.6E-06	5.2E-05	3.0E-13	1.6E-11	2.4E-14	1.3E-12	0.03
1,2,3,4,7,8-HxCDD	1.4E-05	5.3E-05	6.7E-13	1.6E-11	5.3E-14	1.3E-12	0.03
1,2,3,6,7,8-HxCDD	2.0E-05	1.0E-04	9.2E-13	3.1E-11	7.4E-14	2.5E-12	0.03
1,2,3,7,8,9-HxCDD	1.8E-05	8.6E-05	8.3E-13	2.6E-11	6.6E-14	2.1E-12	0.03
1,2,3,4,6,7,8-HpCDD	4.9E-04	2.9E-03	2.2E-11	8.9E-10	1.8E-12	7.1E-11	0.03
OCDD	3.7E-03	8.2E-03	1.7E-10	2.5E-09	1.4E-11	2.0E-10	0.03
2,3,7,8-TCDF	2.2E-06	1.0E-05	1.0E-13	3.1E-12	8.1E-15	2.5E-13	0.03
1,2,3,7,8-PeCDF	1.8E-06	9.5E-06	8.4E-14	2.9E-12	6.7E-15	2.3E-13	0.03
2,3,4,7,8-PeCDF	5.1E-06	3.0E-05	2.4E-13	9.2E-12	1.9E-14	7.3E-13	0.03
1,2,3,4,7,8-HxCDF	1.3E-05	6.2E-05	5.9E-13	1.9E-11	4.7E-14	1.5E-12	0.03
1,2,3,6,7,8-HxCDF	4.9E-06	1.0E-05	2.3E-13	3.1E-12	1.8E-14	2.5E-13	0.03
2,3,4,6,7,8-HxCDF	5.2E-06	2.9E-05	2.4E-13	8.9E-12	1.9E-14	7.1E-13	0.03
1,2,3,7,8,9-HxCDF	2.3E-06	1.0E-05	1.1E-13	3.1E-12	8.5E-15	2.5E-13	0.03
1,2,3,4,6,7,8-HpCDF	5.5E-05	1.2E-04	2.5E-12	3.6E-11	2.0E-13	2.9E-12	0.03
1,2,3,4,7,8,9-HpCDF	7.2E-06	3.0E-05	3.3E-13	9.3E-12	2.7E-14	7.4E-13	0.03
OCDF	1.8E-04	4.1E-04	8.3E-12	1.3E-10	6.7E-13	1.0E-11	0.03

Soil Dermal Contact Pathway for Child Recreator
Old Conservation Yard RFI Site

Intake Equation: Dosage = $\frac{C \times SA \times AF \times B \times CF \times EF \times ED}{BW \times AT}$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Skin surface area per event	SA	cm^2/day	2800	2800
Soil loading to skin	AF	mg/cm^2	0.06	0.20
Bioavailability	B	fraction	CS	CS
Conversion factor	CF	kg/mg	0	0
Exposure frequency	EF	days/year	50	100
Exposure duration	ED	years	6	6
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
PCBs							
Aroclor-1248	5.0E+02	5.5E+03	1.1E-04	7.8E-03	8.6E-06	6.3E-04	0.14
Aroclor-1254	1.2E+00	5.4E+00	2.6E-07	7.7E-06	2.1E-08	6.2E-07	0.14
Aroclor-1260	1.3E+01	1.4E+02	2.9E-06	2.1E-04	2.3E-07	1.6E-05	0.14
PCB-105	1.1E-03	1.2E-02	2.4E-10	1.7E-08	1.9E-11	1.4E-09	0.14
PCB-114	2.1E-05	2.1E-04	4.4E-12	3.0E-10	3.5E-13	2.4E-11	0.14
PCB-118	2.2E-03	2.4E-02	4.8E-10	3.4E-08	3.8E-11	2.7E-09	0.14
PCB-123	3.1E-05	3.3E-04	6.7E-12	4.8E-10	5.4E-13	3.8E-11	0.14
PCB-126	8.6E-05	9.2E-04	1.8E-11	1.3E-09	1.5E-12	1.1E-10	0.14
PCB-156	7.4E-04	7.9E-03	1.6E-10	1.1E-08	1.3E-11	9.0E-10	0.14
PCB-157	3.3E-04	3.5E-03	7.0E-11	5.1E-09	5.6E-12	4.0E-10	0.14
PCB-167	5.7E-04	6.1E-03	1.2E-10	8.8E-09	9.8E-12	7.0E-10	0.14
PCB-169	8.5E-06	9.2E-05	1.8E-12	1.3E-10	1.5E-13	1.0E-11	0.14
PCB-189	8.5E-05	9.2E-04	1.8E-11	1.3E-09	1.5E-12	1.0E-10	0.14
PCB-77	1.7E-04	1.8E-03	3.7E-11	2.6E-09	3.0E-12	2.1E-10	0.14
PCB-81	3.1E-05	3.2E-04	6.6E-12	4.6E-10	5.2E-13	3.7E-11	0.14

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005),
except dermal absorption factors which were taken from USEPA (2001).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyls
mg/kg-day - milligrams per kilogram per day
mg/kg - milligrams per kilogram

Estimates of Human Intake
Soil Ingestion Pathway for Child Recreator
Old Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times CF \times FT \times EF \times ED \times B}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Soil ingestion rate	IR	mg/day	100	200
Conversion factor	CF	kg/mg	1.E-06	1.E-06
Exposure frequency	EF	days/year	50	100
Exposure duration	ED	years	6	6
Bioavailability	B	fraction	CS	CS
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
Inorganic Compounds							
Antimony	NC	NC	NA	NA	NA	NA	1
Barium	NC	NC	NA	NA	NA	NA	1
Boron	4.3E+00	5.2E+00	3.9E-06	1.9E-05	3.1E-07	1.5E-06	1
Cadmium	5.2E-01	9.9E-01	4.7E-07	3.6E-06	3.8E-08	2.9E-07	1
Copper	NC	NC	NA	NA	NA	NA	1
Lead	1.7E+01	2.1E+01	1.6E-05	7.6E-05	1.2E-06	6.1E-06	1
Mercury	5.0E-01	3.3E+00	4.6E-07	1.2E-05	3.7E-08	9.5E-07	1
Nitrate	NC	NC	NA	NA	NA	NA	1
Silver	8.6E-01	1.8E+00	7.8E-07	6.5E-06	6.3E-08	5.2E-07	1
Thallium	8.6E-01	1.7E+00	7.9E-07	6.2E-06	6.3E-08	5.0E-07	1
Zinc	6.6E+01	7.4E+01	6.1E-05	2.7E-04	4.9E-06	2.2E-05	1
							1
VOCs							1
1,1,1-Trichloroethane	3.0E-03	5.5E-03	2.7E-09	2.0E-08	2.2E-10	1.6E-09	1
1,1,2-Trichloro-1,2,2-trifluoroethane	1.2E-02	2.1E-02	1.1E-08	7.5E-08	9.0E-10	6.0E-09	1
1,1-Dichloroethane	NC	NC	NA	NA	NA	NA	1
1,1-Dichloroethene	3.2E-03	5.5E-03	2.9E-09	2.0E-08	2.3E-10	1.6E-09	1
2-Butanone	2.2E-02	1.1E-02	2.0E-08	4.0E-08	1.6E-09	3.2E-09	1
Acetone	3.5E-01	3.5E+00	3.2E-07	1.3E-05	2.6E-08	1.0E-06	1
Benzene	1.1E-03	2.5E-03	1.0E-09	9.1E-09	8.3E-11	7.2E-10	1
Carbon disulfide	NC	NC	NA	NA	NA	NA	1
Chloromethane	NC	NC	NA	NA	NA	NA	1
cis-1,2-Dichloroethene	NC	NC	NA	NA	NA	NA	1
Ethylbenzene	1.1E-03	2.5E-03	1.0E-09	9.1E-09	8.3E-11	7.2E-10	1
m,p-Xylene	3.2E-03	7.2E-03	3.0E-09	2.6E-08	2.4E-10	2.1E-09	1
Methylene chloride	4.1E-02	2.4E-01	3.7E-08	8.9E-07	3.0E-09	7.2E-08	1
o-Xylene	7.8E-04	1.7E-03	7.1E-10	6.2E-09	5.7E-11	5.0E-10	1
p-Isopropyltoluene	1.9E-03	1.9E-03	1.7E-09	6.9E-09	1.4E-10	5.6E-10	1
Toluene	1.5E-03	3.6E-03	1.4E-09	1.3E-08	1.1E-10	1.0E-09	1
Trichloroethene	3.0E-03	5.5E-03	2.7E-09	2.0E-08	2.2E-10	1.6E-09	1
							1
SVOCs							1
1-Methylnaphthalene	1.2E-02	1.3E-02	1.1E-08	4.9E-08	8.7E-10	3.9E-09	1
2-Methylnaphthalene	1.7E-01	5.6E-01	1.6E-07	2.0E-06	1.2E-08	1.6E-07	1
Acenaphthene	1.7E-01	7.0E-01	1.5E-07	2.6E-06	1.2E-08	2.0E-07	1
Acenaphthylene	4.0E-02	1.4E-01	3.7E-08	5.2E-07	2.9E-09	4.1E-08	1
Anthracene	1.2E-01	4.7E-01	1.1E-07	1.7E-06	8.7E-09	1.4E-07	1
Benzo(a)anthracene	3.9E-02	1.8E-01	3.5E-08	6.7E-07	2.8E-09	5.3E-08	1

Estimates of Human Intake
Soil Ingestion Pathway for Child Recreator
Old Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times CF \times FT \times EF \times ED \times B}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Soil ingestion rate	IR	mg/day	100	200
Conversion factor	CF	kg/mg	1.E-06	1.E-06
Exposure frequency	EF	days/year	50	100
Exposure duration	ED	years	6	6
Bioavailability	B	fraction	CS	CS
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
Benzo(a)pyrene	3.6E-02	1.8E-01	3.3E-08	6.4E-07	2.6E-09	5.1E-08	1
Benzo(e)pyrene	7.1E-02	3.1E-01	6.5E-08	1.1E-06	5.2E-09	9.1E-08	1
Benzo(b)fluoranthene	4.4E-02	2.0E-01	4.0E-08	7.2E-07	3.2E-09	5.8E-08	1
Benzo(g,h,i)perylene	8.4E-02	3.0E-01	7.6E-08	1.1E-06	6.1E-09	8.8E-08	1
Benzo(k)fluoranthene	3.6E-02	1.8E-01	3.3E-08	6.4E-07	2.6E-09	5.1E-08	1
Chrysene	5.9E-02	2.4E-01	5.4E-08	8.7E-07	4.3E-09	7.0E-08	1
Dibenz(a,h)anthracene	2.6E-02	1.0E-01	2.4E-08	3.8E-07	1.9E-09	3.1E-08	1
Fluoranthene	9.0E-02	4.3E-01	8.2E-08	1.6E-06	6.6E-09	1.3E-07	1
Fluorene	1.7E-01	6.9E-01	1.5E-07	2.5E-06	1.2E-08	2.0E-07	1
Indeno(1,2,3-cd)pyrene	3.2E-02	1.7E-01	2.9E-08	6.0E-07	2.3E-09	4.8E-08	1
Naphthalene	6.3E-02	1.6E-01	5.7E-08	5.7E-07	4.6E-09	4.6E-08	1
Perylene	4.0E-02	1.8E-01	3.7E-08	6.5E-07	2.9E-09	5.2E-08	1
Phenanthrene	4.4E-01	1.9E+00	4.0E-07	6.8E-06	3.2E-08	5.4E-07	1
Pyrene	8.9E-02	3.7E-01	8.1E-08	1.4E-06	6.5E-09	1.1E-07	1
Total Petroleum Hydrocarbons							
C08-C11(Gasoline Range)	9.7E+00	2.2E+01	8.8E-06	7.9E-05	7.1E-07	6.3E-06	1
C11-C14(Kerosene Range)	1.1E+01	2.2E+01	1.0E-05	7.9E-05	8.1E-07	6.4E-06	1
C14-C20(Diesel Range)	6.5E+01	2.6E+02	5.9E-05	9.3E-04	4.8E-06	7.5E-05	1
C20-C30(Lubricant Oil Range)	2.9E+02	1.4E+03	2.7E-04	5.0E-03	2.1E-05	4.0E-04	1
PCDD/PCDFs							
2,3,7,8-TCDD	1.0E-06	1.8E-06	9.2E-13	6.5E-12	7.4E-14	5.2E-13	1
1,2,3,7,8-PeCDD	6.6E-06	5.2E-05	6.0E-12	1.9E-10	4.8E-13	1.5E-11	1
1,2,3,4,7,8-HxCDD	1.4E-05	5.3E-05	1.3E-11	1.9E-10	1.1E-12	1.5E-11	1
1,2,3,6,7,8-HxCDD	2.0E-05	1.0E-04	1.8E-11	3.7E-10	1.5E-12	3.0E-11	1
1,2,3,7,8,9-HxCDD	1.8E-05	8.6E-05	1.6E-11	3.2E-10	1.3E-12	2.5E-11	1
1,2,3,4,6,7,8-HpCDD	4.9E-04	2.9E-03	4.5E-10	1.1E-08	3.6E-11	8.5E-10	1
OCDD	3.7E-03	8.2E-03	3.4E-09	3.0E-08	2.7E-10	2.4E-09	1
2,3,7,8-TCDF	2.2E-06	1.0E-05	2.0E-12	3.7E-11	1.6E-13	2.9E-12	1
1,2,3,7,8-PeCDF	1.8E-06	9.5E-06	1.7E-12	3.5E-11	1.3E-13	2.8E-12	1
2,3,4,7,8-PeCDF	5.1E-06	3.0E-05	4.7E-12	1.1E-10	3.7E-13	8.7E-12	1
1,2,3,4,7,8-HxCDF	1.3E-05	6.2E-05	1.2E-11	2.3E-10	9.4E-13	1.8E-11	1
1,2,3,6,7,8-HxCDF	4.9E-06	1.0E-05	4.5E-12	3.7E-11	3.6E-13	2.9E-12	1
2,3,4,6,7,8-HxCDF	5.2E-06	2.9E-05	4.8E-12	1.1E-10	3.8E-13	8.4E-12	1
1,2,3,7,8,9-HxCDF	2.3E-06	1.0E-05	2.1E-12	3.7E-11	1.7E-13	3.0E-12	1
1,2,3,4,6,7,8-HpCDF	5.5E-05	1.2E-04	5.1E-11	4.3E-10	4.0E-12	3.4E-11	1
1,2,3,4,7,8,9-HpCDF	7.2E-06	3.0E-05	6.6E-12	1.1E-10	5.3E-13	8.9E-12	1
OCDF	1.8E-04	4.1E-04	1.7E-10	1.5E-09	1.3E-11	1.2E-10	1

Estimates of Human Intake
Soil Ingestion Pathway for Child Recreator
Old Conservation Yard RFI Site

Intake Equation:

$$\text{Dosage} = \frac{C \times IR \times CF \times FT \times EF \times ED \times B}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Soil ingestion rate	IR	mg/day	100	200
Conversion factor	CF	kg/mg	1.E-06	1.E-06
Exposure frequency	EF	days/year	50	100
Exposure duration	ED	years	6	6
Bioavailability	B	fraction	CS	CS
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
PCBs							
Aroclor-1248	5.0E+02	5.5E+03	4.6E-04	2.0E-02	3.7E-05	1.6E-03	1
Aroclor-1254	1.2E+00	5.4E+00	1.1E-06	2.0E-05	9.0E-08	1.6E-06	1
Aroclor-1260	1.3E+01	1.4E+02	1.2E-05	5.3E-04	9.7E-07	4.2E-05	1
PCB-105	1.1E-03	1.2E-02	1.0E-09	4.3E-08	8.1E-11	3.4E-09	1
PCB-114	2.1E-05	2.1E-04	1.9E-11	7.7E-10	1.5E-12	6.1E-11	1
PCB-118	2.2E-03	2.4E-02	2.0E-09	8.6E-08	1.6E-10	6.9E-09	1
PCB-123	3.1E-05	3.3E-04	2.9E-11	1.2E-09	2.3E-12	9.8E-11	1
PCB-126	8.6E-05	9.2E-04	7.9E-11	3.3E-09	6.3E-12	2.7E-10	1
PCB-156	7.4E-04	7.9E-03	6.7E-10	2.9E-08	5.4E-11	2.3E-09	1
PCB-157	3.3E-04	3.5E-03	3.0E-10	1.3E-08	2.4E-11	1.0E-09	1
PCB-167	5.7E-04	6.1E-03	5.2E-10	2.2E-08	4.2E-11	1.8E-09	1
PCB-169	8.5E-06	9.2E-05	7.8E-12	3.3E-10	6.2E-13	2.7E-11	1
PCB-189	8.5E-05	9.2E-04	7.8E-11	3.3E-09	6.2E-12	2.7E-10	1
PCB-77	1.7E-04	1.8E-03	1.6E-10	6.7E-09	1.3E-11	5.4E-10	1
PCB-81	3.1E-05	3.2E-04	2.8E-11	1.2E-09	2.2E-12	9.5E-11	1

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyls
mg/kg-day - milligrams per kilogram per day
mg/kg - milligrams per kilogram

Estimates of Human Intake
Groundwater to Ambient Air Pathway for Adult Recreator
Old Conservation Yard RFI Site

Intake Equation: Dosage = $\frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	5.2	5.2
Fraction of time outdoors	FT	fraction	1.0	1.0
Exposure frequency	EF	days/year	25	50
Exposure duration	ED	years	9	24
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Inorganic Compounds						
Antimony	NC	NC	NA	NA	NA	NA
Barium	NC	NC	NA	NA	NA	NA
Boron	NC	NC	NA	NA	NA	NA
Cadmium	NC	NC	NA	NA	NA	NA
Copper	NC	NC	NA	NA	NA	NA
Lead	NC	NC	NA	NA	NA	NA
Mercury	NC	NC	NA	NA	NA	NA
Nitrate	NC	NC	NA	NA	NA	NA
Silver	NC	NC	NA	NA	NA	NA
Thallium	NC	NC	NA	NA	NA	NA
Zinc	NC	NC	NA	NA	NA	NA
VOCs						
1,1,1-Trichloroethane	NC	NC	NA	NA	NA	NA
1,1,2-Trichloro-1,2,2-trifluoroethane	NC	NC	NA	NA	NA	NA
1,1-Dichloroethane	NC	NC	NA	NA	NA	NA
1,1-Dichloroethene	NC	NC	NA	NA	NA	NA
2-Butanone	NC	NC	NA	NA	NA	NA
Acetone	NC	NC	NA	NA	NA	NA
Benzene	NC	NC	NA	NA	NA	NA
Carbon disulfide	NC	NC	NA	NA	NA	NA
Chloromethane	1.3E-07	1.3E-07	6.7E-10	1.3E-09	8.0E-11	4.3E-10
cis-1,2-Dichloroethene	3.2E-08	3.2E-08	1.6E-10	3.3E-10	2.0E-11	1.0E-10
Ethylbenzene	NC	NC	NA	NA	NA	NA
m,p-Xylene	NC	NC	NA	NA	NA	NA
Methylene chloride	NC	NC	NA	NA	NA	NA
o-Xylene	NC	NC	NA	NA	NA	NA
p-Isopropyltoluene	NC	NC	NA	NA	NA	NA
Toluene	NC	NC	NA	NA	NA	NA
Trichloroethene	1.1E-06	1.1E-06	5.5E-09	1.1E-08	6.6E-10	3.5E-09
SVOCs						
1-Methylnaphthalene	NC	NC	NA	NA	NA	NA
2-Methylnaphthalene	NC	NC	NA	NA	NA	NA
Acenaphthene	NC	NC	NA	NA	NA	NA
Acenaphthylene	NC	NC	NA	NA	NA	NA
Anthracene	NC	NC	NA	NA	NA	NA
Benzo(a)anthracene	NC	NC	NA	NA	NA	NA
Benzo(a)pyrene	NC	NC	NA	NA	NA	NA

Estimates of Human Intake
Groundwater to Ambient Air Pathway for Adult Recreator
Old Conservation Yard RFI Site

Intake Equation: Dosage = $\frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	5.2	5.2
Fraction of time outdoors	FT	fraction	1.0	1.0
Exposure frequency	EF	days/year	25	50
Exposure duration	ED	years	9	24
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Benzo(b)fluoranthene	NC	NC	NA	NA	NA	NA
Benzo(g,h,i)perylene	NC	NC	NA	NA	NA	NA
Benzo(k)fluoranthene	NC	NC	NA	NA	NA	NA
Chrysene	NC	NC	NA	NA	NA	NA
Dibenz(a,h)anthracene	NC	NC	NA	NA	NA	NA
Fluoranthene	NC	NC	NA	NA	NA	NA
Fluorene	NC	NC	NA	NA	NA	NA
Indeno(1,2,3-cd)pyrene	NC	NC	NA	NA	NA	NA
Naphthalene	NC	NC	NA	NA	NA	NA
Phenanthrene	NC	NC	NA	NA	NA	NA
Pyrene	NC	NC	NA	NA	NA	NA
Total Petroleum Hydrocarbons						
C08-C11(Gasoline Range)	NC	NC	NA	NA	NA	NA
C11-C14(Kerosene Range)	NC	NC	NA	NA	NA	NA
C14-C20(Diesel Range)	NC	NC	NA	NA	NA	NA
C20-C30(Lubricant Oil Range)	NC	NC	NA	NA	NA	NA
PCDD/PCDFs						
2,3,7,8-TCDD	NC	NC	NA	NA	NA	NA
1,2,3,7,8-PeCDD	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,6,7,8-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,7,8,9-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,4,6,7,8-HpCDD	NC	NC	NA	NA	NA	NA
OCDD	NC	NC	NA	NA	NA	NA
2,3,7,8-TCDF	NC	NC	NA	NA	NA	NA
1,2,3,7,8-PeCDF	NC	NC	NA	NA	NA	NA
2,3,4,7,8-PeCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA
2,3,4,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,7,8,9-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,6,7,8-HpCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8,9-HpCDF	NC	NC	NA	NA	NA	NA
OCDF	NC	NC	NA	NA	NA	NA
Aroclor-1248	NC	NC	NA	NA	NA	NA
Aroclor-1254	NC	NC	NA	NA	NA	NA
Aroclor-1260	NC	NC	NA	NA	NA	NA
PCB-105	NC	NC	NA	NA	NA	NA
PCB-114	NC	NC	NA	NA	NA	NA

Estimates of Human Intake
Groundwater to Ambient Air Pathway for Adult Recreator
Old Conservation Yard RFI Site

Intake Equation: Dosage = $\frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	5.2	5.2
Fraction of time outdoors	FT	fraction	1.0	1.0
Exposure frequency	EF	days/year	25	50
Exposure duration	ED	years	9	24
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
PCB-118	NC	NC	NA	NA	NA	NA
PCB-123	NC	NC	NA	NA	NA	NA
PCB-126	NC	NC	NA	NA	NA	NA
PCB-156	NC	NC	NA	NA	NA	NA
PCB-157	NC	NC	NA	NA	NA	NA
PCB-167	NC	NC	NA	NA	NA	NA
PCB-169	NC	NC	NA	NA	NA	NA
PCB-189	NC	NC	NA	NA	NA	NA
PCB-77	NC	NC	NA	NA	NA	NA
PCB-81	NC	NC	NA	NA	NA	NA
PCB-81	NC	NC	NA	NA	NA	NA

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
mg/kg-day - milligrams per kilogram per day
mg/m^3 - milligrams per cubic meter

Estimates of Human Intake
Soil to Ambient Air Pathway for Adult Recreator
Old Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	5.2	5.2
Fraction of time outdoors	FT	fraction	1.0	1.0
Exposure frequency	EF	days/year	25	50
Exposure duration	ED	years	9	24
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Inorganic Compounds						
Antimony	NC	NC	NA	NA	NA	NA
Barium	NC	NC	NA	NA	NA	NA
Boron	NC	NC	NA	NA	NA	NA
Cadmium	NC	NC	NA	NA	NA	NA
Copper	NC	NC	NA	NA	NA	NA
Lead	NC	NC	NA	NA	NA	NA
Mercury	NC	NC	NA	NA	NA	NA
Nitrate	NC	NC	NA	NA	NA	NA
Silver	NC	NC	NA	NA	NA	NA
Thallium	NC	NC	NA	NA	NA	NA
Zinc	NC	NC	NA	NA	NA	NA
VOCs						
1,1,1-Trichloroethane	1.3E-05	1.3E-05	6.4E-08	1.3E-07	7.7E-09	4.1E-08
1,1,2-Trichloro-1,2,2-trifluoroethane	3.3E-05	3.3E-05	1.7E-07	3.4E-07	2.0E-08	1.1E-07
1,1-Dichloroethane	NC	NC	NA	NA	NA	NA
1,1-Dichloroethene	1.4E-05	1.4E-05	7.1E-08	1.4E-07	8.5E-09	4.6E-08
2-Butanone	NC	NC	NA	NA	NA	NA
Acetone	NC	NC	NA	NA	NA	NA
Benzene	9.8E-06	9.8E-06	5.0E-08	9.9E-08	6.0E-09	3.2E-08
Carbon disulfide	NC	NC	NA	NA	NA	NA
Chloromethane	NC	NC	NA	NA	NA	NA
cis-1,2-Dichloroethene	NC	NC	NA	NA	NA	NA
Ethylbenzene	7.4E-06	7.4E-06	3.8E-08	7.5E-08	4.5E-09	2.4E-08
m,p-Xylene	1.7E-05	1.7E-05	8.7E-08	1.7E-07	1.0E-08	5.6E-08
Methylene chloride	5.6E-04	5.6E-04	2.8E-06	5.7E-06	3.4E-07	1.8E-06
o-Xylene	3.9E-06	3.9E-06	2.0E-08	4.0E-08	2.4E-09	1.3E-08
p-Isopropyltoluene	NC	NC	NA	NA	NA	NA
Toluene	9.7E-06	9.7E-06	4.9E-08	9.8E-08	5.9E-09	3.2E-08
Trichloroethene	6.4E-05	6.4E-05	3.2E-07	6.5E-07	3.9E-08	2.1E-07
SVOCs						
1-Methylnaphthalene	NC	NC	NA	NA	NA	NA
2-Methylnaphthalene	NC	NC	NA	NA	NA	NA
Acenaphthene	NC	NC	NA	NA	NA	NA
Acenaphthylene	NC	NC	NA	NA	NA	NA
Anthracene	NC	NC	NA	NA	NA	NA
Benzo(a)anthracene	NC	NC	NA	NA	NA	NA
Benzo(a)pyrene	NC	NC	NA	NA	NA	NA

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Estimates of Human Intake
Soil to Ambient Air Pathway for Adult Recreator
Old Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	5.2	5.2
Fraction of time outdoors	FT	fraction	1.0	1.0
Exposure frequency	EF	days/year	25	50
Exposure duration	ED	years	9	24
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Benzo(e)pyrene	NC	NC	NA	NA	NA	NA
Benzo(b)fluoranthene	NC	NC	NA	NA	NA	NA
Benzo(g,h,i)perylene	NC	NC	NA	NA	NA	NA
Benzo(k)fluoranthene	NC	NC	NA	NA	NA	NA
Chrysene	NC	NC	NA	NA	NA	NA
Dibenz(a,h)anthracene	NC	NC	NA	NA	NA	NA
Fluoranthene	NC	NC	NA	NA	NA	NA
Fluorene	NC	NC	NA	NA	NA	NA
Indeno(1,2,3-cd)pyrene	NC	NC	NA	NA	NA	NA
Naphthalene	NC	NC	NA	NA	NA	NA
Perylene	NC	NC	NA	NA	NA	NA
Phenanthrene	NC	NC	NA	NA	NA	NA
Pyrene	NC	NC	NA	NA	NA	NA
Total Petroleum Hydrocarbons						
C11-C14(Kerosene Range)	NC	NC	NA	NA	NA	NA
C14-C20(Diesel Range)	NC	NC	NA	NA	NA	NA
C20-C30(Lubricant Oil Range)	NC	NC	NA	NA	NA	NA
PCDD/PCDFs						
2,3,7,8-TCDD	NC	NC	NA	NA	NA	NA
1,2,3,7,8-PeCDD	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,6,7,8-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,7,8,9-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,4,6,7,8-HpCDD	NC	NC	NA	NA	NA	NA
OCDD	NC	NC	NA	NA	NA	NA
2,3,7,8-TCDF	NC	NC	NA	NA	NA	NA
1,2,3,7,8-PeCDF	NC	NC	NA	NA	NA	NA
2,3,4,7,8-PeCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA
2,3,4,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,7,8,9-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,6,7,8-HpCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8,9-HpCDF	NC	NC	NA	NA	NA	NA
OCDF	NC	NC	NA	NA	NA	NA

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Estimates of Human Intake
Soil to Ambient Air Pathway for Adult Recreator
Old Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	5.2	5.2
Fraction of time outdoors	FT	fraction	1.0	1.0
Exposure frequency	EF	days/year	25	50
Exposure duration	ED	years	9	24
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
PCBs						
Aroclor-1248	NC	NC	NA	NA	NA	NA
Aroclor-1254	NC	NC	NA	NA	NA	NA
Aroclor-1260	NC	NC	NA	NA	NA	NA
PCB-105	NC	NC	NA	NA	NA	NA
PCB-114	NC	NC	NA	NA	NA	NA
PCB-118	NC	NC	NA	NA	NA	NA
PCB-123	NC	NC	NA	NA	NA	NA
PCB-126	NC	NC	NA	NA	NA	NA
PCB-156	NC	NC	NA	NA	NA	NA
PCB-157	NC	NC	NA	NA	NA	NA
PCB-167	NC	NC	NA	NA	NA	NA
PCB-169	NC	NC	NA	NA	NA	NA
PCB-189	NC	NC	NA	NA	NA	NA
PCB-77	NC	NC	NA	NA	NA	NA
PCB-81	NC	NC	NA	NA	NA	NA

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyls
mg/kg-day - milligrams per kilogram per day
mg/m^3 - milligrams per cubic meter

Estimates of Human Intake
Soil Particulate Inhalation Pathway for Adult Recreator
Old Conservation Yard RFI Site

Intake Equation:

$$\text{Dosage} = \frac{C \times CF \times IR \times FT \times EF \times ED}{PEF \times BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Inhalation rate	IR	m^3/day	5.2	5.2
Conversion factor	CF	kg/ug	1.E-09	1.E-09
Fraction of time outdoors	FT	fraction	1.0	1.0
Exposure frequency	EF	days/year	25	50
Exposure duration	ED	years	9	24
Particulate emission factor	PEF	m^3/ug	2.4	2.4
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Inorganic Compounds						
Antimony	NC	NC	NA	NA	NA	NA
Barium	NC	NC	NA	NA	NA	NA
Boron	4.3E+00	5.2E+00	9.1E-12	2.2E-11	1.1E-12	7.1E-12
Cadmium	5.2E-01	9.9E-01	1.1E-12	4.2E-12	1.3E-13	1.3E-12
Copper	NC	NC	NA	NA	NA	NA
Lead	1.7E+01	2.1E+01	3.6E-11	8.8E-11	4.3E-12	2.8E-11
Mercury	5.0E-01	3.3E+00	1.1E-12	1.4E-11	1.3E-13	4.4E-12
Nitrate	NC	NC	NA	NA	NA	NA
Silver	8.6E-01	1.8E+00	1.8E-12	7.6E-12	2.2E-13	2.4E-12
Thallium	8.6E-01	1.7E+00	1.8E-12	7.2E-12	2.2E-13	2.3E-12
Zinc	NC	NC	NA	NA	NA	NA
VOCs						
1,1,1-Trichloroethane	NC	NC	NA	NA	NA	NA
1,1,2-Trichloro-1,2,2-trifluoroethane	NC	NC	NA	NA	NA	NA
1,1-Dichloroethane	NC	NC	NA	NA	NA	NA
1,1-Dichloroethene	NC	NC	NA	NA	NA	NA
2-Butanone	NC	NC	NA	NA	NA	NA
Acetone	NC	NC	NA	NA	NA	NA
Benzene	NC	NC	NA	NA	NA	NA
Carbon disulfide	NC	NC	NA	NA	NA	NA
Chloromethane	NC	NC	NA	NA	NA	NA
cis-1,2-Dichloroethene	NC	NC	NA	NA	NA	NA
Ethylbenzene	NC	NC	NA	NA	NA	NA
m,p-Xylene	NC	NC	NA	NA	NA	NA
Methylene chloride	NC	NC	NA	NA	NA	NA
o-Xylene	NC	NC	NA	NA	NA	NA
p-Isopropyltoluene	NC	NC	NA	NA	NA	NA
Toluene	NC	NC	NA	NA	NA	NA
Trichloroethene	NC	NC	NA	NA	NA	NA
SVOCs						
1-Methylnaphthalene	1.2E-02	1.3E-02	2.5E-14	5.6E-14	3.0E-15	1.8E-14
2-Methylnaphthalene	1.7E-01	5.6E-01	3.6E-13	2.4E-12	4.3E-14	7.6E-13
Acenaphthene	1.7E-01	7.0E-01	3.6E-13	3.0E-12	4.3E-14	9.5E-13
Acenaphthylene	4.0E-02	1.4E-01	8.5E-14	6.0E-13	1.0E-14	1.9E-13
Anthracene	1.2E-01	4.7E-01	2.5E-13	2.0E-12	3.0E-14	6.4E-13

Estimates of Human Intake
Soil Particulate Inhalation Pathway for Adult Recreator
Old Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times CF \times IR \times FT \times EF \times ED}{PEF \times BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Inhalation rate	IR	m^3/day	5.2	5.2
Conversion factor	CF	kg/ug	1.E-09	1.E-09
Fraction of time outdoors	FT	fraction	1.0	1.0
Exposure frequency	EF	days/year	25	50
Exposure duration	ED	years	9	24
Particulate emission factor	PEF	m^3/ug	2.4	2.4
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Benzo(a)anthracene	3.9E-02	1.8E-01	8.2E-14	7.7E-13	9.8E-15	2.5E-13
Benzo(a)pyrene	3.6E-02	1.8E-01	7.7E-14	7.4E-13	9.2E-15	2.4E-13
Benzo(e)pyrene	7.1E-02	3.1E-01	1.5E-13	1.3E-12	1.8E-14	4.2E-13
Benzo(b)fluoranthene	4.4E-02	2.0E-01	9.3E-14	8.4E-13	1.1E-14	2.7E-13
Benzo(g,h,i)perylene	8.4E-02	3.0E-01	1.8E-13	1.3E-12	2.1E-14	4.1E-13
Benzo(k)fluoranthene	3.6E-02	1.8E-01	7.7E-14	7.4E-13	9.2E-15	2.4E-13
Chrysene	5.9E-02	2.4E-01	1.3E-13	1.0E-12	1.5E-14	3.2E-13
Dibenz(a,h)anthracene	2.6E-02	1.0E-01	5.5E-14	4.4E-13	6.6E-15	1.4E-13
Fluoranthene	9.0E-02	4.3E-01	1.9E-13	1.8E-12	2.3E-14	5.9E-13
Fluorene	1.7E-01	6.9E-01	3.5E-13	2.9E-12	4.2E-14	9.4E-13
Indeno(1,2,3-cd)pyrene	3.2E-02	1.7E-01	6.7E-14	7.0E-13	8.1E-15	2.2E-13
Naphthalene	6.3E-02	1.6E-01	1.3E-13	6.6E-13	1.6E-14	2.1E-13
Phenanthrene	4.4E-01	1.9E+00	9.3E-13	7.9E-12	1.1E-13	2.5E-12
Perylene	4.0E-02	1.8E-01	8.6E-14	7.5E-13	1.0E-14	2.4E-13
Pyrene	8.9E-02	3.7E-01	1.9E-13	1.6E-12	2.3E-14	5.0E-13
Total Petroleum Hydrocarbons						
C08-C11(Gasoline Range)	NC	NC	NA	NA	NA	NA
C11-C14(Kerosene Range)	1.1E+01	2.2E+01	2.3E-11	9.2E-11	2.8E-12	2.9E-11
C14-C20(Diesel Range)	6.5E+01	2.6E+02	1.4E-10	1.1E-09	1.7E-11	3.5E-10
C20-C30(Lubricant Oil Range)	2.9E+02	1.4E+03	6.2E-10	5.8E-09	7.4E-11	1.9E-09
2,3,7,8-TCDD	1.0E-06	1.8E-06	2.1E-18	7.5E-18	2.6E-19	2.4E-18
1,2,3,7,8-PeCDD	6.6E-06	5.2E-05	1.4E-17	2.2E-16	1.7E-18	7.0E-17
1,2,3,4,7,8-HxCDD	1.4E-05	5.3E-05	3.1E-17	2.2E-16	3.7E-18	7.2E-17
1,2,3,6,7,8-HxCDD	2.0E-05	1.0E-04	4.3E-17	4.3E-16	5.1E-18	1.4E-16
1,2,3,7,8,9-HxCDD	1.8E-05	8.6E-05	3.8E-17	3.7E-16	4.6E-18	1.2E-16
1,2,3,4,6,7,8-HpCDD	4.9E-04	2.9E-03	1.0E-15	1.2E-14	1.2E-16	3.9E-15
OCDD	3.7E-03	8.2E-03	7.8E-15	3.5E-14	9.4E-16	1.1E-14
2,3,7,8-TCDF	2.2E-06	1.0E-05	4.7E-18	4.2E-17	5.6E-19	1.4E-17
1,2,3,7,8-PeCDF	1.8E-06	9.5E-06	3.9E-18	4.0E-17	4.6E-19	1.3E-17
2,3,4,7,8-PeCDF	5.1E-06	3.0E-05	1.1E-17	1.3E-16	1.3E-18	4.0E-17
1,2,3,4,7,8-HxCDF	1.3E-05	6.2E-05	2.7E-17	2.6E-16	3.3E-18	8.4E-17
1,2,3,6,7,8-HxCDF	4.9E-06	1.0E-05	1.0E-17	4.2E-17	1.3E-18	1.4E-17
2,3,4,6,7,8-HxCDF	5.2E-06	2.9E-05	1.1E-17	1.2E-16	1.3E-18	3.9E-17
1,2,3,7,8,9-HxCDF	2.3E-06	1.0E-05	4.9E-18	4.3E-17	5.8E-19	1.4E-17
1,2,3,4,6,7,8-HpCDF	5.5E-05	1.2E-04	1.2E-16	5.0E-16	1.4E-17	1.6E-16
1,2,3,4,7,8,9-HpCDF	7.2E-06	3.0E-05	1.5E-17	1.3E-16	1.8E-18	4.1E-17
OCDF	1.8E-04	4.1E-04	3.8E-16	1.7E-15	4.6E-17	5.6E-16

Estimates of Human Intake
Soil Particulate Inhalation Pathway for Adult Recreator
Old Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times CF \times IR \times FT \times EF \times ED}{PEF \times BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Inhalation rate	IR	m^3/day	5.2	5.2
Conversion factor	CF	kg/ug	1.E-09	1.E-09
Fraction of time outdoors	FT	fraction	1.0	1.0
Exposure frequency	EF	days/year	25	50
Exposure duration	ED	years	9	24
Particulate emission factor	PEF	m^3/ug	2.4	2.4
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
PCBs						
Aroclor-1248	5.0E+02	5.5E+03	1.1E-09	2.3E-08	1.3E-10	7.4E-09
Aroclor-1254	1.2E+00	5.4E+00	2.6E-12	2.3E-11	3.1E-13	7.3E-12
Aroclor-1260	1.3E+01	1.4E+02	2.8E-11	6.1E-10	3.4E-12	2.0E-10
PCB-105	1.1E-03	1.2E-02	2.4E-15	5.0E-14	2.8E-16	1.6E-14
PCB-114	2.1E-05	2.1E-04	4.4E-17	8.9E-16	5.2E-18	2.9E-16
PCB-118	2.2E-03	2.4E-02	4.7E-15	1.0E-13	5.7E-16	3.2E-14
PCB-123	3.1E-05	3.3E-04	6.7E-17	1.4E-15	8.0E-18	4.5E-16
PCB-126	8.6E-05	9.2E-04	1.8E-16	3.9E-15	2.2E-17	1.2E-15
PCB-156	7.4E-04	7.9E-03	1.6E-15	3.3E-14	1.9E-16	1.1E-14
PCB-157	3.3E-04	3.5E-03	7.0E-16	1.5E-14	8.3E-17	4.8E-15
PCB-167	5.7E-04	6.1E-03	1.2E-15	2.6E-14	1.5E-16	8.3E-15
PCB-169	8.5E-06	9.2E-05	1.8E-17	3.9E-16	2.2E-18	1.2E-16
PCB-189	8.5E-05	9.2E-04	1.8E-16	3.9E-15	2.2E-17	1.2E-15
PCB-77	1.7E-04	1.8E-03	3.6E-16	7.8E-15	4.4E-17	2.5E-15
PCB-81	3.1E-05	3.2E-04	6.5E-17	1.4E-15	7.8E-18	4.4E-16

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyls
mg/kg-day - milligrams per kilogram per day
mg/kg - milligrams per kilogram

Estimates of Human Intake
Soil Dermal Contact Pathway for Adult Recreator
Old Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times SA \times AF \times B \times CF \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Skin surface area per event	SA	cm^2/day	5700	5700
Soil loading to skin	AF	mg/cm^2	0.01	0.90
Bioavailability	B	fraction	CS	CS
Conversion factor	CF	kg/mg	1.E-06	1.E-06
Exposure frequency	EF	days/year	25	50
Exposure duration	ED	years	9	24
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
Inorganic Compounds							
Antimony	NC	NC	NA	NA	NA	NA	1.0E-02
Barium	NC	NC	NA	NA	NA	NA	1.0E-02
Boron	4.3E+00	5.2E+00	2.4E-09	5.3E-07	2.9E-10	1.7E-07	1.0E-02
Cadmium	5.2E-01	9.9E-01	2.9E-11	1.0E-08	3.5E-12	3.2E-09	1.0E-03
Copper	NC	NC	NA	NA	NA	NA	1.0E-02
Lead	1.7E+01	2.1E+01	9.5E-09	2.1E-06	1.1E-09	6.7E-07	1.0E-02
Mercury	5.0E-01	3.3E+00	2.8E-10	3.3E-07	3.4E-11	1.0E-07	1.0E-02
Nitrate	NC	NC	NA	NA	NA	NA	1.0E-02
Silver	8.6E-01	1.8E+00	4.8E-10	1.8E-07	5.8E-11	5.7E-08	1.0E-02
Thallium	8.6E-01	1.7E+00	4.8E-10	1.7E-07	5.8E-11	5.5E-08	1.0E-02
Zinc	6.6E+01	7.4E+01	3.7E-08	7.4E-06	4.4E-09	2.4E-06	1.0E-02
VOCs							
1,1,1-Trichloroethane	3.0E-03	5.5E-03	1.7E-11	5.5E-09	2.0E-12	1.8E-09	1.0E-01
1,1,2-Trichloro-1,2,2-trifluoroethane	1.2E-02	2.1E-02	6.8E-11	2.1E-08	8.2E-12	6.6E-09	1.0E-01
1,1-Dichloroethane	NC	NC	NA	NA	NA	NA	1.0E-01
1,1-Dichloroethene	3.2E-03	5.5E-03	1.8E-11	5.5E-09	2.1E-12	1.8E-09	1.0E-01
2-Butanone	2.2E-02	1.1E-02	1.2E-10	1.1E-08	1.5E-11	3.5E-09	1.0E-01
Acetone	3.5E-01	3.5E+00	2.0E-09	3.5E-06	2.4E-10	1.1E-06	1.0E-01
Benzene	1.1E-03	2.5E-03	6.3E-12	2.5E-09	7.6E-13	8.0E-10	1.0E-01
Carbon disulfide	NC	NC	NA	NA	NA	NA	1.0E-02
Chloromethane	NC	NC	NA	NA	NA	NA	1.0E-01
cis-1,2-Dichloroethene	NC	NC	NA	NA	NA	NA	1.0E-01
Ethylbenzene	1.1E-03	2.5E-03	6.3E-12	2.5E-09	7.6E-13	8.0E-10	1.0E-01
m,p-Xylene	3.2E-03	7.2E-03	1.8E-11	7.3E-09	2.2E-12	2.3E-09	1.0E-01
Methylene chloride	4.1E-02	2.4E-01	2.3E-10	2.5E-07	2.7E-11	7.9E-08	1.0E-01
o-Xylene	7.8E-04	1.7E-03	4.4E-12	1.7E-09	5.2E-13	5.5E-10	1.0E-01
p-Isopropyltoluene	1.9E-03	1.9E-03	1.1E-11	1.9E-09	1.3E-12	6.1E-10	1.0E-01
Toluene	1.5E-03	3.6E-03	8.6E-12	3.6E-09	1.0E-12	1.1E-09	1.0E-01
Trichloroethene	3.0E-03	5.5E-03	1.7E-11	5.5E-09	2.0E-12	1.8E-09	1.0E-01
SVOCs							
1-Methylnaphthalene	1.2E-02	1.3E-02	8.6E-11	1.7E-08	1.0E-11	5.6E-09	1.3E-01
2-Methylnaphthalene	1.7E-01	5.6E-01	1.2E-09	7.3E-07	1.5E-10	2.3E-07	1.3E-01
Acenaphthene	1.7E-01	7.0E-01	1.2E-09	9.1E-07	1.5E-10	2.9E-07	1.3E-01
Acenaphthylene	4.0E-02	1.4E-01	2.9E-10	1.9E-07	3.5E-11	5.9E-08	1.3E-01
Anthracene	1.2E-01	4.7E-01	8.6E-10	6.1E-07	1.0E-10	2.0E-07	1.3E-01

Estimates of Human Intake
Soil Dermal Contact Pathway for Adult Recreator
Old Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times SA \times AF \times B \times CF \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Skin surface area per event	SA	cm^2/day	5700	5700
Soil loading to skin	AF	mg/cm^2	0.01	0.90
Bioavailability	B	fraction	CS	CS
Conversion factor	CF	kg/mg	1.E-06	1.E-06
Exposure frequency	EF	days/year	25	50
Exposure duration	ED	years	9	24
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
Benzo(a)anthracene	3.9E-02	1.8E-01	2.8E-10	2.4E-07	3.4E-11	7.6E-08	1.3E-01
Benzo(a)pyrene	3.6E-02	1.8E-01	2.6E-10	2.3E-07	3.2E-11	7.3E-08	1.3E-01
Benzo(e)pyrene	7.1E-02	3.1E-01	5.1E-10	4.0E-07	6.2E-11	1.3E-07	1.3E-01
Benzo(b)fluoranthene	4.4E-02	2.0E-01	3.2E-10	2.6E-07	3.8E-11	8.3E-08	1.3E-01
Benzo(g,h,i)perylene	8.4E-02	3.0E-01	6.1E-10	3.9E-07	7.3E-11	1.3E-07	1.3E-01
Benzo(k)fluoranthene	3.6E-02	1.8E-01	2.6E-10	2.3E-07	3.1E-11	7.3E-08	1.3E-01
Chrysene	5.9E-02	2.4E-01	4.3E-10	3.1E-07	5.2E-11	1.0E-07	1.3E-01
Dibenz(a,h)anthracene	2.6E-02	1.0E-01	1.9E-10	1.4E-07	2.3E-11	4.4E-08	1.3E-01
Fluoranthene	9.0E-02	4.3E-01	6.5E-10	5.7E-07	7.9E-11	1.8E-07	1.3E-01
Fluorene	1.7E-01	6.9E-01	1.2E-09	9.0E-07	1.5E-10	2.9E-07	1.3E-01
Indeno(1,2,3-cd)pyrene	3.2E-02	1.7E-01	2.3E-10	2.2E-07	2.8E-11	6.9E-08	1.3E-01
Naphthalene	6.3E-02	1.6E-01	4.5E-10	2.0E-07	5.5E-11	6.5E-08	1.3E-01
Perylene	4.0E-02	1.8E-01	2.9E-10	2.3E-07	3.5E-11	7.4E-08	1.3E-01
Phenanthrene	4.4E-01	1.9E+00	3.2E-09	2.4E-06	3.8E-10	7.7E-07	1.3E-01
Pyrene	8.9E-02	3.7E-01	6.5E-10	4.8E-07	7.7E-11	1.5E-07	1.3E-01
Total Petroleum Hydrocarbons							
C08-C11(Gasoline Range)	9.7E+00	2.2E+01	5.4E-08	2.2E-05	6.5E-09	6.9E-06	1.0E-01
C11-C14(Kerosene Range)	1.1E+01	2.2E+01	8.0E-08	2.8E-05	9.6E-09	9.1E-06	1.3E-01
C14-C20(Diesel Range)	6.5E+01	2.6E+02	4.7E-07	3.3E-04	5.7E-08	1.1E-04	1.3E-01
C20-C30(Lubricant Oil Range)	2.9E+02	1.4E+03	2.1E-06	1.8E-03	2.5E-07	5.7E-04	1.3E-01
PCDD/PCDFs							
2,3,7,8-TCDD	1.0E-06	1.8E-06	1.7E-15	5.3E-13	2.0E-16	1.7E-13	3.0E-02
1,2,3,7,8-PeCDD	6.6E-06	5.2E-05	1.1E-14	1.6E-11	1.3E-15	5.0E-12	3.0E-02
1,2,3,4,7,8-HxCDD	1.4E-05	5.3E-05	2.4E-14	1.6E-11	2.9E-15	5.1E-12	3.0E-02
1,2,3,6,7,8-HxCDD	2.0E-05	1.0E-04	3.4E-14	3.1E-11	4.0E-15	9.9E-12	3.0E-02
1,2,3,7,8,9-HxCDD	1.8E-05	8.6E-05	3.0E-14	2.6E-11	3.6E-15	8.3E-12	3.0E-02
1,2,3,4,6,7,8-HpCDD	4.9E-04	2.9E-03	8.2E-13	8.7E-10	9.8E-14	2.8E-10	3.0E-02
OCDD	3.7E-03	8.2E-03	6.2E-12	2.5E-09	7.4E-13	7.9E-10	3.0E-02
2,3,7,8-TCDF	2.2E-06	1.0E-05	3.7E-15	3.0E-12	4.4E-16	9.6E-13	3.0E-02
1,2,3,7,8-PeCDF	1.8E-06	9.5E-06	3.0E-15	2.9E-12	3.7E-16	9.1E-13	3.0E-02
2,3,4,7,8-PeCDF	5.1E-06	3.0E-05	8.6E-15	9.0E-12	1.0E-15	2.9E-12	3.0E-02
1,2,3,4,7,8-HxCDF	1.3E-05	6.2E-05	2.2E-14	1.9E-11	2.6E-15	6.0E-12	3.0E-02
1,2,3,6,7,8-HxCDF	4.9E-06	1.0E-05	8.2E-15	3.0E-12	9.9E-16	9.6E-13	3.0E-02
2,3,4,6,7,8-HxCDF	5.2E-06	2.9E-05	8.8E-15	8.7E-12	1.1E-15	2.8E-12	3.0E-02
1,2,3,7,8,9-HxCDF	2.3E-06	1.0E-05	3.8E-15	3.1E-12	4.6E-16	9.8E-13	3.0E-02
1,2,3,4,6,7,8-HpCDF	5.5E-05	1.2E-04	9.3E-14	3.5E-11	1.1E-14	1.1E-11	3.0E-02
1,2,3,4,7,8,9-HpCDF	7.2E-06	3.0E-05	1.2E-14	9.1E-12	1.4E-15	2.9E-12	3.0E-02

Estimates of Human Intake
Soil Dermal Contact Pathway for Adult Recreator
Old Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times SA \times AF \times B \times CF \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Skin surface area per event	SA	cm^2/day	5700	5700
Soil loading to skin	AF	mg/cm^2	0.01	0.90
Bioavailability	B	fraction	CS	CS
Conversion factor	CF	kg/mg	1.E-06	1.E-06
Exposure frequency	EF	days/year	25	50
Exposure duration	ED	years	9	24
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
OCDF	1.8E-04	4.1E-04	3.0E-13	1.2E-10	3.6E-14	4.0E-11	3.0E-02
PCBs							
Aroclor-1248	5.0E+02	5.5E+03	3.9E-06	7.7E-03	4.7E-07	2.5E-03	1.4E-01
Aroclor-1254	1.2E+00	5.4E+00	9.6E-09	7.6E-06	1.1E-09	2.4E-06	1.4E-01
Aroclor-1260	1.3E+01	1.4E+02	1.0E-07	2.0E-04	1.2E-08	6.5E-05	1.4E-01
PCB-105	1.1E-03	1.2E-02	8.7E-12	1.7E-08	1.0E-12	5.3E-09	1.4E-01
PCB-114	2.1E-05	2.1E-04	1.6E-13	3.0E-10	1.9E-14	9.5E-11	1.4E-01
PCB-118	2.2E-03	2.4E-02	1.7E-11	3.3E-08	2.1E-12	1.1E-08	1.4E-01
PCB-123	3.1E-05	3.3E-04	2.5E-13	4.7E-10	2.9E-14	1.5E-10	1.4E-01
PCB-126	8.6E-05	9.2E-04	6.7E-13	1.3E-09	8.1E-14	4.1E-10	1.4E-01
PCB-156	7.4E-04	7.9E-03	5.8E-12	1.1E-08	6.9E-13	3.5E-09	1.4E-01
PCB-157	3.3E-04	3.5E-03	2.6E-12	5.0E-09	3.1E-13	1.6E-09	1.4E-01
PCB-167	5.7E-04	6.1E-03	4.5E-12	8.6E-09	5.3E-13	2.8E-09	1.4E-01
PCB-169	8.5E-06	9.2E-05	6.6E-14	1.3E-10	8.0E-15	4.1E-11	1.4E-01
PCB-189	8.5E-05	9.2E-04	6.6E-13	1.3E-09	8.0E-14	4.1E-10	1.4E-01
PCB-77	1.7E-04	1.8E-03	1.3E-12	2.6E-09	1.6E-13	8.2E-10	1.4E-01
PCB-81	3.1E-05	3.2E-04	2.4E-13	4.6E-10	2.9E-14	1.5E-10	1.4E-01

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005),
except dermal absorption factors which were taken from USEPA (2001).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyls
mg/kg-day - milligrams per kilogram per day
mg/kg - milligrams per kilogram

Estimates of Human Intake
Soil Ingestion Pathway for Adult Recreator
Old Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times CF \times FT \times EF \times ED \times B}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Soil ingestion rate	IR	mg/day	50	100
Conversion factor	CF	kg/mg	1.E-06	1.E-06
Exposure frequency	EF	days/year	25	50
Exposure duration	ED	years	9	24
Bioavailability	B	fraction	CS	CS
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
Inorganic Compounds							
Antimony	NC	NC	NA	NA	NA	NA	1
Barium	NC	NC	NA	NA	NA	NA	1
Boron	4.3E+00	5.2E+00	2.1E-07	1.0E-06	2.5E-08	3.3E-07	1
Cadmium	5.2E-01	9.9E-01	2.5E-08	1.9E-07	3.0E-09	6.2E-08	1
Copper	NC	NC	NA	NA	NA	NA	1
Lead	1.7E+01	2.1E+01	8.3E-07	4.1E-06	1.0E-07	1.3E-06	1
Mercury	5.0E-01	3.3E+00	2.5E-08	6.4E-07	3.0E-09	2.0E-07	1
Nitrate	NC	NC	NA	NA	NA	NA	1
Silver	8.6E-01	1.8E+00	4.2E-08	3.5E-07	5.0E-09	1.1E-07	1
Thallium	8.6E-01	1.7E+00	4.2E-08	3.3E-07	5.1E-09	1.1E-07	1
Zinc	6.6E+01	7.4E+01	3.3E-06	1.4E-05	3.9E-07	4.6E-06	1
VOCs							
1,1,1-Trichloroethane	3.0E-03	5.5E-03	1.5E-10	1.1E-09	1.8E-11	3.4E-10	1
1,1,2-Trichloro-1,2,2-trifluoroethane	1.2E-02	2.1E-02	6.0E-10	4.0E-09	7.2E-11	1.3E-09	1
1,1-Dichloroethane	NC	NC	NA	NA	NA	NA	1
1,1-Dichloroethene	3.2E-03	5.5E-03	1.5E-10	1.1E-09	1.9E-11	3.4E-10	1
2-Butanone	2.2E-02	1.1E-02	1.1E-09	2.2E-09	1.3E-10	6.9E-10	1
Acetone	3.5E-01	3.5E+00	1.7E-08	6.9E-07	2.1E-09	2.2E-07	1
Benzene	1.1E-03	2.5E-03	5.5E-11	4.8E-10	6.6E-12	1.6E-10	1
Carbon disulfide	NC	NC	NA	NA	NA	NA	1
Chloromethane	NC	NC	NA	NA	NA	NA	1
cis-1,2-Dichloroethene	NC	NC	NA	NA	NA	NA	1
Ethylbenzene	1.1E-03	2.5E-03	5.5E-11	4.8E-10	6.6E-12	1.6E-10	1
m,p-Xylene	3.2E-03	7.2E-03	1.6E-10	1.4E-09	1.9E-11	4.5E-10	1
Methylene chloride	4.1E-02	2.4E-01	2.0E-09	4.8E-08	2.4E-10	1.5E-08	1
o-Xylene	7.8E-04	1.7E-03	3.8E-11	3.3E-10	4.6E-12	1.1E-10	1
p-Isopropyltoluene	1.9E-03	1.9E-03	9.3E-11	3.7E-10	1.1E-11	1.2E-10	1
Toluene	1.5E-03	3.6E-03	7.6E-11	7.0E-10	9.1E-12	2.2E-10	1
Trichloroethene	3.0E-03	5.5E-03	1.5E-10	1.1E-09	1.8E-11	3.4E-10	1
SVOCs							
1-Methylnaphthalene	1.2E-02	1.3E-02	5.8E-10	2.6E-09	7.0E-11	8.3E-10	1
2-Methylnaphthalene	1.7E-01	5.6E-01	8.3E-09	1.1E-07	1.0E-09	3.5E-08	1
Acenaphthene	1.7E-01	7.0E-01	8.2E-09	1.4E-07	9.9E-10	4.4E-08	1
Acenaphthylene	4.0E-02	1.4E-01	2.0E-09	2.8E-08	2.4E-10	8.9E-09	1
Anthracene	1.2E-01	4.7E-01	5.8E-09	9.2E-08	7.0E-10	2.9E-08	1
Benzo(a)anthracene	3.9E-02	1.8E-01	1.9E-09	3.6E-08	2.3E-10	1.1E-08	1

Estimates of Human Intake
Soil Ingestion Pathway for Adult Recreator
Old Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times CF \times FT \times EF \times ED \times B}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Soil ingestion rate	IR	mg/day	50	100
Conversion factor	CF	kg/mg	1.E-06	1.E-06
Exposure frequency	EF	days/year	25	50
Exposure duration	ED	years	9	24
Bioavailability	B	fraction	CS	CS
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
Benzo(a)pyrene	3.6E-02	1.8E-01	1.8E-09	3.4E-08	2.1E-10	1.1E-08	1
Benzo(e)pyrene	7.1E-02	3.1E-01	3.5E-09	6.1E-08	4.2E-10	1.9E-08	1
Benzo(b)fluoranthene	4.4E-02	2.0E-01	2.1E-09	3.9E-08	2.6E-10	1.2E-08	1
Benzo(g,h,i)perylene	8.4E-02	3.0E-01	4.1E-09	5.9E-08	4.9E-10	1.9E-08	1
Benzo(k)fluoranthene	3.6E-02	1.8E-01	1.8E-09	3.4E-08	2.1E-10	1.1E-08	1
Chrysene	5.9E-02	2.4E-01	2.9E-09	4.7E-08	3.5E-10	1.5E-08	1
Dibenz(a,h)anthracene	2.6E-02	1.0E-01	1.3E-09	2.0E-08	1.5E-10	6.6E-09	1
Fluoranthene	9.0E-02	4.3E-01	4.4E-09	8.5E-08	5.3E-10	2.7E-08	1
Fluorene	1.7E-01	6.9E-01	8.2E-09	1.4E-07	9.8E-10	4.3E-08	1
Indeno(1,2,3-cd)pyrene	3.2E-02	1.7E-01	1.6E-09	3.2E-08	1.9E-10	1.0E-08	1
Naphthalene	6.3E-02	1.6E-01	3.1E-09	3.1E-08	3.7E-10	9.8E-09	1
Perylene	4.0E-02	1.8E-01	2.0E-09	3.5E-08	2.4E-10	1.1E-08	1
Phenanthrene	4.4E-01	1.9E+00	2.1E-08	3.6E-07	2.6E-09	1.2E-07	1
Pyrene	8.9E-02	3.7E-01	4.4E-09	7.3E-08	5.2E-10	2.3E-08	1
Total Petroleum Hydrocarbons							
C08-C11(Gasoline Range)	9.7E+00	2.2E+01	4.7E-07	4.2E-06	5.7E-08	1.3E-06	1
C11-C14(Kerosene Range)	1.1E+01	2.2E+01	5.4E-07	4.3E-06	6.5E-08	1.4E-06	1
C14-C20(Diesel Range)	6.5E+01	2.6E+02	3.2E-06	5.0E-05	3.8E-07	1.6E-05	1
C20-C30(Lubricant Oil Range)	2.9E+02	1.4E+03	1.4E-05	2.7E-04	1.7E-06	8.6E-05	1
PCDD/PCDFs							
2,3,7,8-TCDD	1.0E-06	1.8E-06	5.0E-14	3.5E-13	5.9E-15	1.1E-13	1
1,2,3,7,8-PeCDD	6.6E-06	5.2E-05	3.2E-13	1.0E-11	3.9E-14	3.3E-12	1
1,2,3,4,7,8-HxCDD	1.4E-05	5.3E-05	7.1E-13	1.0E-11	8.5E-14	3.3E-12	1
1,2,3,6,7,8-HxCDD	2.0E-05	1.0E-04	9.8E-13	2.0E-11	1.2E-13	6.4E-12	1
1,2,3,7,8,9-HxCDD	1.8E-05	8.6E-05	8.8E-13	1.7E-11	1.1E-13	5.4E-12	1
1,2,3,4,6,7,8-HpCDD	4.9E-04	2.9E-03	2.4E-11	5.7E-10	2.9E-12	1.8E-10	1
OCDD	3.7E-03	8.2E-03	1.8E-10	1.6E-09	2.2E-11	5.2E-10	1
2,3,7,8-TCDF	2.2E-06	1.0E-05	1.1E-13	2.0E-12	1.3E-14	6.3E-13	1
1,2,3,7,8-PeCDF	1.8E-06	9.5E-06	8.9E-14	1.9E-12	1.1E-14	5.9E-13	1
2,3,4,7,8-PeCDF	5.1E-06	3.0E-05	2.5E-13	5.8E-12	3.0E-14	1.9E-12	1
1,2,3,4,7,8-HxCDF	1.3E-05	6.2E-05	6.3E-13	1.2E-11	7.6E-14	3.9E-12	1
1,2,3,6,7,8-HxCDF	4.9E-06	1.0E-05	2.4E-13	2.0E-12	2.9E-14	6.3E-13	1
2,3,4,6,7,8-HxCDF	5.2E-06	2.9E-05	2.6E-13	5.6E-12	3.1E-14	1.8E-12	1
1,2,3,7,8,9-HxCDF	2.3E-06	1.0E-05	1.1E-13	2.0E-12	1.3E-14	6.4E-13	1
1,2,3,4,6,7,8-HpCDF	5.5E-05	1.2E-04	2.7E-12	2.3E-11	3.3E-13	7.3E-12	1
1,2,3,4,7,8,9-HpCDF	7.2E-06	3.0E-05	3.5E-13	5.9E-12	4.2E-14	1.9E-12	1
OCDF	1.8E-04	4.1E-04	8.9E-12	8.0E-11	1.1E-12	2.6E-11	1

Estimates of Human Intake
Soil Ingestion Pathway for Adult Recreator
Old Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times CF \times FT \times EF \times ED \times B}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Soil ingestion rate	IR	mg/day	50	100
Conversion factor	CF	kg/mg	1.E-06	1.E-06
Exposure frequency	EF	days/year	25	50
Exposure duration	ED	years	9	24
Bioavailability	B	fraction	CS	CS
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
PCBs							
Aroclor-1016	NC	NC	NA	NA	NA	NA	1
Aroclor-1248	5.0E+02	5.5E+03	2.4E-05	1.1E-03	2.9E-06	3.4E-04	1
Aroclor-1254	1.2E+00	5.4E+00	6.0E-08	1.1E-06	7.2E-09	3.4E-07	1
Aroclor-1260	1.3E+01	1.4E+02	6.5E-07	2.8E-05	7.8E-08	9.0E-06	1
PCB-105	1.1E-03	1.2E-02	5.5E-11	2.3E-09	6.5E-12	7.4E-10	1
PCB-114	2.1E-05	2.1E-04	1.0E-12	4.1E-11	1.2E-13	1.3E-11	1
PCB-118	2.2E-03	2.4E-02	1.1E-10	4.6E-09	1.3E-11	1.5E-09	1
PCB-123	3.1E-05	3.3E-04	1.5E-12	6.5E-11	1.8E-13	2.1E-11	1
PCB-126	8.6E-05	9.2E-04	4.2E-12	1.8E-10	5.0E-13	5.7E-11	1
PCB-156	7.4E-04	7.9E-03	3.6E-11	1.5E-09	4.3E-12	4.9E-10	1
PCB-157	3.3E-04	3.5E-03	1.6E-11	6.9E-10	1.9E-12	2.2E-10	1
PCB-167	5.7E-04	6.1E-03	2.8E-11	1.2E-09	3.3E-12	3.9E-10	1
PCB-169	8.5E-06	9.2E-05	4.2E-13	1.8E-11	5.0E-14	5.7E-12	1
PCB-189	8.5E-05	9.2E-04	4.2E-12	1.8E-10	5.0E-13	5.7E-11	1
PCB-77	1.7E-04	1.8E-03	8.4E-12	3.6E-10	1.0E-12	1.1E-10	1
PCB-81	3.1E-05	3.2E-04	1.5E-12	6.3E-11	1.8E-13	2.0E-11	1

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyls
mg/kg-day - milligrams per kilogram per day
mg/kg - milligrams per kilogram

Estimates of Human Intake
Groundwater to Indoor Air Pathway for Adult Worker
Old Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	10.4	16.0
Fraction of time indoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	219	250
Exposure duration	ED	years	9	25
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	9125
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Inorganic Compounds						
Antimony	NC	NC	NA	NA	NA	NA
Barium	NC	NC	NA	NA	NA	NA
Boron	NC	NC	NA	NA	NA	NA
Cadmium	NC	NC	NA	NA	NA	NA
Copper	NC	NC	NA	NA	NA	NA
Lead	NC	NC	NA	NA	NA	NA
Mercury	NC	NC	NA	NA	NA	NA
Nitrate	NC	NC	NA	NA	NA	NA
Silver	NC	NC	NA	NA	NA	NA
Thallium	NC	NC	NA	NA	NA	NA
Zinc	NC	NC	NA	NA	NA	NA
VOCs						
1,1,1-Trichloroethane	NC	NC	NA	NA	NA	NA
1,1,2-Trichloro-1,2,2-trifluoroethane	NC	NC	NA	NA	NA	NA
1,1-Dichloroethane	NC	NC	NA	NA	NA	NA
1,1-Dichloroethene	NC	NC	NA	NA	NA	NA
2-Butanone	NC	NC	NA	NA	NA	NA
Acetone	NC	NC	NA	NA	NA	NA
Benzene	NC	NC	NA	NA	NA	NA
Carbon disulfide	NC	NC	NA	NA	NA	NA
Chloromethane	6.6E-07	6.6E-07	2.9E-08	7.7E-08	3.5E-09	2.6E-08
cis-1,2-Dichloroethene	2.9E-07	2.9E-07	1.3E-08	3.4E-08	1.6E-09	1.1E-08
Ethylbenzene	NC	NC	NA	NA	NA	NA
m,p-Xylene	NC	NC	NA	NA	NA	NA
Methylene chloride	NC	NC	NA	NA	NA	NA
o-Xylene	NC	NC	NA	NA	NA	NA
p-Isopropyltoluene	NC	NC	NA	NA	NA	NA
Toluene	NC	NC	NA	NA	NA	NA
Trichloroethene	8.8E-06	8.8E-06	3.9E-07	1.0E-06	4.7E-08	3.4E-07
SVOCs						
1-Methylnaphthalene	NC	NC	NA	NA	NA	NA
2-Methylnaphthalene	NC	NC	NA	NA	NA	NA
Acenaphthene	NC	NC	NA	NA	NA	NA
Acenaphthylene	NC	NC	NA	NA	NA	NA
Anthracene	NC	NC	NA	NA	NA	NA
Benzo(a)anthracene	NC	NC	NA	NA	NA	NA
Benzo(a)pyrene	NC	NC	NA	NA	NA	NA

Estimates of Human Intake
Groundwater to Indoor Air Pathway for Adult Worker
Old Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	10.4	16.0
Fraction of time indoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	219	250
Exposure duration	ED	years	9	25
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	9125
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Benzo(b)fluoranthene	NC	NC	NA	NA	NA	NA
Benzo(g,h,i)perylene	NC	NC	NA	NA	NA	NA
Benzo(k)fluoranthene	NC	NC	NA	NA	NA	NA
Chrysene	NC	NC	NA	NA	NA	NA
Dibenz(a,h)anthracene	NC	NC	NA	NA	NA	NA
Benzo(e)pyrene	NC	NC	NA	NA	NA	NA
Fluoranthene	NC	NC	NA	NA	NA	NA
Fluorene	NC	NC	NA	NA	NA	NA
Indeno(1,2,3-cd)pyrene	NC	NC	NA	NA	NA	NA
Naphthalene	NC	NC	NA	NA	NA	NA
Perylene	NC	NC	NA	NA	NA	NA
Phenanthrene	NC	NC	NA	NA	NA	NA
Pyrene	NC	NC	NA	NA	NA	NA
Total Petroleum Hydrocarbons						
C08-C11(Gasoline Range)	NC	NC	NA	NA	NA	NA
C11-C14(Kerosene Range)	NC	NC	NA	NA	NA	NA
C14-C20(Diesel Range)	NC	NC	NA	NA	NA	NA
C20-C30(Lubricant Oil Range)	NC	NC	NA	NA	NA	NA
PCDD/PCDFs						
2,3,7,8-TCDD	NC	NC	NA	NA	NA	NA
1,2,3,7,8-PeCDD	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,6,7,8-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,7,8,9-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,4,6,7,8-HpCDD	NC	NC	NA	NA	NA	NA
OCDD	NC	NC	NA	NA	NA	NA
2,3,7,8-TCDF	NC	NC	NA	NA	NA	NA
1,2,3,7,8-PeCDF	NC	NC	NA	NA	NA	NA
2,3,4,7,8-PeCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA
2,3,4,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,7,8,9-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,6,7,8-HpCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8,9-HpCDF	NC	NC	NA	NA	NA	NA
OCDF	NC	NC	NA	NA	NA	NA
PCBs						
Aroclor-1248	NC	NC	NA	NA	NA	NA

Estimates of Human Intake
Groundwater to Indoor Air Pathway for Adult Worker
Old Conservation Yard RFI Site

Intake Equation:

$$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	10.4	16.0
Fraction of time indoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	219	250
Exposure duration	ED	years	9	25
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	9125
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Aroclor-1254	NC	NC	NA	NA	NA	NA
Aroclor-1260	NC	NC	NA	NA	NA	NA
PCB-105	NC	NC	NA	NA	NA	NA
PCB-114	NC	NC	NA	NA	NA	NA
PCB-118	NC	NC	NA	NA	NA	NA
PCB-123	NC	NC	NA	NA	NA	NA
PCB-126	NC	NC	NA	NA	NA	NA
PCB-156	NC	NC	NA	NA	NA	NA
PCB-157	NC	NC	NA	NA	NA	NA
PCB-167	NC	NC	NA	NA	NA	NA
PCB-169	NC	NC	NA	NA	NA	NA
PCB-189	NC	NC	NA	NA	NA	NA
PCB-77	NC	NC	NA	NA	NA	NA
PCB-81	NC	NC	NA	NA	NA	NA

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
mg/kg-day - milligrams per kilogram per day
mg/m^3 - milligrams per cubic meter

Estimates of Human Intake
Soil Vapor to Indoor Air Pathway for Adult Worker
Old Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	10.4	16.0
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	219	250
Exposure duration	ED	years	9	25
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	9125
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Inorganic Compounds						
Antimony	NC	NC	NA	NA	NA	NA
Barium	NC	NC	NA	NA	NA	NA
Boron	NC	NC	NA	NA	NA	NA
Cadmium	NC	NC	NA	NA	NA	NA
Copper	NC	NC	NA	NA	NA	NA
Lead	NC	NC	NA	NA	NA	NA
Mercury	NC	NC	NA	NA	NA	NA
Nitrate	NC	NC	NA	NA	NA	NA
Silver	NC	NC	NA	NA	NA	NA
Thallium	NC	NC	NA	NA	NA	NA
Zinc	NC	NC	NA	NA	NA	NA
VOCs						
1,1,1-Trichloroethane	2.4E-04	3.0E-04	1.1E-05	3.6E-05	1.3E-06	1.2E-05
1,1,2-Trichloro-1,2,2-trifluoroethane	4.3E-04	8.0E-04	1.9E-05	9.4E-05	2.3E-06	3.1E-05
1,1-Dichloroethane	NC	NC	NA	NA	NA	NA
1,1-Dichloroethene	2.6E-04	3.1E-04	1.1E-05	3.7E-05	1.4E-06	1.2E-05
2-Butanone	NC	NC	NA	NA	NA	NA
Acetone	NC	NC	NA	NA	NA	NA
Benzene	2.2E-04	2.2E-04	9.9E-06	2.6E-05	1.2E-06	8.7E-06
Carbon disulfide	NC	NC	NA	NA	NA	NA
Chloromethane	NC	NC	NA	NA	NA	NA
cis-1,2-Dichloroethene	NC	NC	NA	NA	NA	NA
Ethylbenzene	9.1E-05	1.8E-04	4.1E-06	2.1E-05	4.9E-07	7.1E-06
m,p-Xylene	2.0E-04	4.0E-04	8.8E-06	4.6E-05	1.1E-06	1.5E-05
Methylene chloride	2.3E-04	1.2E-02	1.0E-05	1.4E-03	1.3E-06	4.6E-04
o-Xylene	4.4E-05	8.9E-05	2.0E-06	1.0E-05	2.4E-07	3.5E-06
p-Isopropyltoluene	1.4E-04	1.4E-04	6.2E-06	1.6E-05	7.4E-07	5.5E-06
Toluene	2.0E-04	2.2E-04	9.0E-06	2.6E-05	1.1E-06	8.6E-06
Trichloroethene	4.6E-04	1.5E-03	2.0E-05	1.8E-04	2.4E-06	6.0E-05
SVOCs						
1-Methylnaphthalene	NC	NC	NA	NA	NA	NA
2-Methylnaphthalene	NC	NC	NA	NA	NA	NA
Acenaphthene	NC	NC	NA	NA	NA	NA
Acenaphthylene	NC	NC	NA	NA	NA	NA

Estimates of Human Intake
Soil Vapor to Indoor Air Pathway for Adult Worker
Old Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	10.4	16.0
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	219	250
Exposure duration	ED	years	9	25
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	9125
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Anthracene	NC	NC	NA	NA	NA	NA
Benzo(a)anthracene	NC	NC	NA	NA	NA	NA
Benzo(a)pyrene	NC	NC	NA	NA	NA	NA
Benzo(e)pyrene	NC	NC	NA	NA	NA	NA
Benzo(b)fluoranthene	NC	NC	NA	NA	NA	NA
Benzo(g,h,i)perylene	NC	NC	NA	NA	NA	NA
Benzo(k)fluoranthene	NC	NC	NA	NA	NA	NA
Chrysene	NC	NC	NA	NA	NA	NA
Dibenz(a,h)anthracene	NC	NC	NA	NA	NA	NA
Fluoranthene	NC	NC	NA	NA	NA	NA
Fluorene	NC	NC	NA	NA	NA	NA
Indeno(1,2,3-cd)pyrene	NC	NC	NA	NA	NA	NA
Naphthalene	NC	NC	NA	NA	NA	NA
Perylene	NC	NC	NA	NA	NA	NA
Phenanthrene	NC	NC	NA	NA	NA	NA
Pyrene	NC	NC	NA	NA	NA	NA
Total Petroleum Hydrocarbons						
C08-C11(Gasoline Range)	NC	NC	NA	NA	NA	NA
C11-C14(Kerosene Range)	NC	NC	NA	NA	NA	NA
C14-C20(Diesel Range)	NC	NC	NA	NA	NA	NA
C20-C30(Lubricant Oil Range)	NC	NC	NA	NA	NA	NA
PCDD/PCDFs						
2,3,7,8-TCDD	NC	NC	NA	NA	NA	NA
1,2,3,7,8-PeCDD	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,6,7,8-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,7,8,9-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,4,6,7,8-HpCDD	NC	NC	NA	NA	NA	NA
OCDD	NC	NC	NA	NA	NA	NA
2,3,7,8-TCDF	NC	NC	NA	NA	NA	NA
1,2,3,7,8-PeCDF	NC	NC	NA	NA	NA	NA
2,3,4,7,8-PeCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA
2,3,4,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,7,8,9-HxCDF	NC	NC	NA	NA	NA	NA

Estimates of Human Intake
Soil Vapor to Indoor Air Pathway for Adult Worker
Old Conservation Yard RFI Site

Intake Equation:

$$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	10.4	16.0
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	219	250
Exposure duration	ED	years	9	25
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	9125
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
1,2,3,4,6,7,8-HpCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8,9-HpCDF	NC	NC	NA	NA	NA	NA
OCDF	NC	NC	NA	NA	NA	NA
PCBs						
Aroclor-1248	NC	NC	NA	NA	NA	NA
Aroclor-1254	NC	NC	NA	NA	NA	NA
Aroclor-1260	NC	NC	NA	NA	NA	NA
PCB-105	NC	NC	NA	NA	NA	NA
PCB-114	NC	NC	NA	NA	NA	NA
PCB-118	NC	NC	NA	NA	NA	NA
PCB-123	NC	NC	NA	NA	NA	NA
PCB-126	NC	NC	NA	NA	NA	NA
PCB-156	NC	NC	NA	NA	NA	NA
PCB-157	NC	NC	NA	NA	NA	NA
PCB-167	NC	NC	NA	NA	NA	NA
PCB-169	NC	NC	NA	NA	NA	NA
PCB-189	NC	NC	NA	NA	NA	NA
PCB-77	NC	NC	NA	NA	NA	NA
PCB-81	NC	NC	NA	NA	NA	NA

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
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Typical - typical or average exposure as defined in the SRAM (MWH 2005)
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EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCDD/PCDF - Polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.
PCB - polychlorinated biphenyls
mg/kg-day - milligrams per kilogram per day
mg/m^3 - milligrams per cubic meter

Spreadsheet C2-41 (1 of 3)

Estimates of Human Intake
Groundwater to Ambient Air Pathway for Adult Worker
Old Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	10.4	16.0
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	219	250
Exposure duration	ED	years	9	25
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	9125
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Inorganic Compounds						
Antimony	NC	NC	NA	NA	NA	NA
Barium	NC	NC	NA	NA	NA	NA
Boron	NC	NC	NA	NA	NA	NA
Cadmium	NC	NC	NA	NA	NA	NA
Copper	NC	NC	NA	NA	NA	NA
Lead	NC	NC	NA	NA	NA	NA
Mercury	NC	NC	NA	NA	NA	NA
Nitrate	NC	NC	NA	NA	NA	NA
Silver	NC	NC	NA	NA	NA	NA
Thallium	NC	NC	NA	NA	NA	NA
Zinc	NC	NC	NA	NA	NA	NA
VOCs						
1,1,1-Trichloroethane	NC	NC	NA	NA	NA	NA
1,1,2-Trichloro-1,2,2-trifluoroethane	NC	NC	NA	NA	NA	NA
1,1-Dichloroethane	NC	NC	NA	NA	NA	NA
1,1-Dichloroethene	NC	NC	NA	NA	NA	NA
2-Butanone	NC	NC	NA	NA	NA	NA
Acetone	NC	NC	NA	NA	NA	NA
Benzene	NC	NC	NA	NA	NA	NA
Carbon disulfide	NC	NC	NA	NA	NA	NA
Chloromethane	1.3E-07	1.3E-07	5.9E-09	1.5E-08	7.0E-10	5.1E-09
cis-1,2-Dichloroethene	3.2E-08	3.2E-08	1.4E-09	3.8E-09	1.7E-10	1.3E-09
Ethylbenzene	NC	NC	NA	NA	NA	NA
m,p-Xylene	NC	NC	NA	NA	NA	NA
Methylene chloride	NC	NC	NA	NA	NA	NA
o-Xylene	NC	NC	NA	NA	NA	NA
p-Isopropyltoluene	NC	NC	NA	NA	NA	NA
Toluene	NC	NC	NA	NA	NA	NA
Trichloroethene	1.1E-06	1.1E-06	4.8E-08	1.3E-07	5.8E-09	4.2E-08
SVOCs						
1-Methylnaphthalene	NC	NC	NA	NA	NA	NA
2-Methylnaphthalene	NC	NC	NA	NA	NA	NA
Acenaphthene	NC	NC	NA	NA	NA	NA
Acenaphthylene	NC	NC	NA	NA	NA	NA
Anthracene	NC	NC	NA	NA	NA	NA
Benzo(a)anthracene	NC	NC	NA	NA	NA	NA
Benzo(a)pyrene	NC	NC	NA	NA	NA	NA
Benzo(b)fluoranthene	NC	NC	NA	NA	NA	NA
Benzo(g,h,i)perylene	NC	NC	NA	NA	NA	NA
Benzo(k)fluoranthene	NC	NC	NA	NA	NA	NA
Chrysene	NC	NC	NA	NA	NA	NA
Dibenz(a,h)anthracene	NC	NC	NA	NA	NA	NA
Benzo(e)pyrene	NC	NC	NA	NA	NA	NA
Fluoranthene	NC	NC	NA	NA	NA	NA
Fluorene	NC	NC	NA	NA	NA	NA
Indeno(1,2,3-cd)pyrene	NC	NC	NA	NA	NA	NA
Naphthalene	NC	NC	NA	NA	NA	NA
Perylene	NC	NC	NA	NA	NA	NA

Spreadsheet C2-41 (2 of 3)

Estimates of Human Intake
Groundwater to Ambient Air Pathway for Adult Worker
Old Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	10.4	16.0
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	219	250
Exposure duration	ED	years	9	25
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	9125
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Phenanthrene	NC	NC	NA	NA	NA	NA
Pyrene	NC	NC	NA	NA	NA	NA
Total Petroleum Hydrocarbons						
C08-C11(Gasoline Range)	NC	NC	NA	NA	NA	NA
C11-C14(Kerosene Range)	NC	NC	NA	NA	NA	NA
C14-C20(Diesel Range)	NC	NC	NA	NA	NA	NA
C20-C30(Lubricant Oil Range)	NC	NC	NA	NA	NA	NA
PCDD/PCDFs						
2,3,7,8-TCDD	NC	NC	NA	NA	NA	NA
1,2,3,7,8-PeCDD	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,6,7,8-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,7,8,9-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,4,6,7,8-HpCDD	NC	NC	NA	NA	NA	NA
OCDD	NC	NC	NA	NA	NA	NA
2,3,7,8-TCDF	NC	NC	NA	NA	NA	NA
1,2,3,7,8-PeCDF	NC	NC	NA	NA	NA	NA
2,3,4,7,8-PeCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA
2,3,4,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,7,8,9-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,6,7,8-HpCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8,9-HpCDF	NC	NC	NA	NA	NA	NA
OCDF	NC	NC	NA	NA	NA	NA
PCBs						
Aroclor-1248	NC	NC	NA	NA	NA	NA
Aroclor-1254	NC	NC	NA	NA	NA	NA
Aroclor-1260	NC	NC	NA	NA	NA	NA
PCB-105	NC	NC	NA	NA	NA	NA
PCB-114	NC	NC	NA	NA	NA	NA
PCB-118	NC	NC	NA	NA	NA	NA
PCB-123	NC	NC	NA	NA	NA	NA
PCB-126	NC	NC	NA	NA	NA	NA
PCB-156	NC	NC	NA	NA	NA	NA
PCB-157	NC	NC	NA	NA	NA	NA
PCB-167	NC	NC	NA	NA	NA	NA
PCB-169	NC	NC	NA	NA	NA	NA
PCB-189	NC	NC	NA	NA	NA	NA
PCB-77	NC	NC	NA	NA	NA	NA
PCB-81	NC	NC	NA	NA	NA	NA

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration

Spreadsheet C2-41 (3 of 3)

Estimates of Human Intake
Groundwater to Ambient Air Pathway for Adult Worker
Old Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	10.4	16.0
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	219	250
Exposure duration	ED	years	9	25
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	9125
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)

ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCDD/PCDF - Polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.
PCB - polychlorinated biphenyls
mg/kg-day - milligrams per kilogram per day
mg/m^3 - milligrams per cubic meter

Spreadsheet C2-40 (1 of 3)

Estimates of Human Intake
Soil to Ambient Air Pathway for Adult Worker
Old Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	10.4	16.0
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	219	250
Exposure duration	ED	years	9	25
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	9125
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Inorganic Compounds						
Antimony	NC	NC	NA	NA	NA	NA
Barium	NC	NC	NA	NA	NA	NA
Boron	NC	NC	NA	NA	NA	NA
Cadmium	NC	NC	NA	NA	NA	NA
Copper	NC	NC	NA	NA	NA	NA
Lead	NC	NC	NA	NA	NA	NA
Mercury	NC	NC	NA	NA	NA	NA
Nitrate	NC	NC	NA	NA	NA	NA
Silver	NC	NC	NA	NA	NA	NA
Thallium	NC	NC	NA	NA	NA	NA
Zinc	NC	NC	NA	NA	NA	NA
VOCs						
1,1,1-Trichloroethane	1.3E-05	1.3E-05	5.6E-07	1.5E-06	6.8E-08	5.0E-07
1,1,2-Trichloro-1,2,2-trifluoroethane	3.3E-05	3.3E-05	1.5E-06	3.9E-06	1.8E-07	1.3E-06
1,1-Dichloroethane	NC	NC	NA	NA	NA	NA
1,1-Dichloroethene	1.4E-05	1.4E-05	6.2E-07	1.6E-06	7.5E-08	5.5E-07
2-Butanone	NC	NC	NA	NA	NA	NA
Acetone	NC	NC	NA	NA	NA	NA
Benzene	9.8E-06	9.8E-06	4.4E-07	1.1E-06	5.2E-08	3.8E-07
Carbon disulfide	NC	NC	NA	NA	NA	NA
Chloromethane	NC	NC	NA	NA	NA	NA
cis-1,2-Dichloroethene	NC	NC	NA	NA	NA	NA
Ethylbenzene	7.4E-06	7.4E-06	3.3E-07	8.7E-07	4.0E-08	2.9E-07
m,p-Xylene	1.7E-05	1.7E-05	7.6E-07	2.0E-06	9.1E-08	6.7E-07
Methylene chloride	5.6E-04	5.6E-04	2.5E-05	6.6E-05	3.0E-06	2.2E-05
o-Xylene	3.9E-06	3.9E-06	1.7E-07	4.6E-07	2.1E-08	1.5E-07
p-Isopropyltoluene	NC	NC	NA	NA	NA	NA
Toluene	9.7E-06	9.7E-06	4.3E-07	1.1E-06	5.2E-08	3.8E-07
Trichloroethene	6.4E-05	6.4E-05	2.8E-06	7.5E-06	3.4E-07	2.5E-06
SVOCs						
1-Methylnaphthalene	NC	NC	NA	NA	NA	NA
2-Methylnaphthalene	NC	NC	NA	NA	NA	NA
Acenaphthene	NC	NC	NA	NA	NA	NA
Acenaphthylene	NC	NC	NA	NA	NA	NA
Anthracene	NC	NC	NA	NA	NA	NA
Benzo(a)anthracene	NC	NC	NA	NA	NA	NA
Benzo(a)pyrene	NC	NC	NA	NA	NA	NA

Spreadsheet C2-40 (2 of 3)

Estimates of Human Intake
Soil to Ambient Air Pathway for Adult Worker
Old Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	10.4	16.0
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	219	250
Exposure duration	ED	years	9	25
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	9125
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Benzo(e)pyrene	NC	NC	NA	NA	NA	NA
Benzo(b)fluoranthene	NC	NC	NA	NA	NA	NA
Benzo(g,h,i)perylene	NC	NC	NA	NA	NA	NA
Benzo(k)fluoranthene	NC	NC	NA	NA	NA	NA
Chrysene	NC	NC	NA	NA	NA	NA
Dibenz(a,h)anthracene	NC	NC	NA	NA	NA	NA
Fluoranthene	NC	NC	NA	NA	NA	NA
Fluorene	NC	NC	NA	NA	NA	NA
Indeno(1,2,3-cd)pyrene	NC	NC	NA	NA	NA	NA
Naphthalene	NC	NC	NA	NA	NA	NA
Perylene	NC	NC	NA	NA	NA	NA
Phenanthrene	NC	NC	NA	NA	NA	NA
Pyrene	NC	NC	NA	NA	NA	NA
Total Petroleum Hydrocarbons						
C08-C11(Gasoline Range)	NC	NC	NA	NA	NA	NA
C11-C14(Kerosene Range)	NC	NC	NA	NA	NA	NA
C14-C20(Diesel Range)	NC	NC	NA	NA	NA	NA
C20-C30(Lubricant Oil Range)	NC	NC	NA	NA	NA	NA
PCDD/PCDFs						
2,3,7,8-TCDD	NC	NC	NA	NA	NA	NA
1,2,3,7,8-PeCDD	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,6,7,8-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,7,8,9-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,4,6,7,8-HpCDD	NC	NC	NA	NA	NA	NA
OCDD	NC	NC	NA	NA	NA	NA
2,3,7,8-TCDF	NC	NC	NA	NA	NA	NA
1,2,3,7,8-PeCDF	NC	NC	NA	NA	NA	NA
2,3,4,7,8-PeCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA
2,3,4,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,7,8,9-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,6,7,8-HpCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8,9-HpCDF	NC	NC	NA	NA	NA	NA
OCDF	NC	NC	NA	NA	NA	NA

Spreadsheet C2-40 (3 of 3)

Estimates of Human Intake
Soil to Ambient Air Pathway for Adult Worker
Old Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	10.4	16.0
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	219	250
Exposure duration	ED	years	9	25
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	9125
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
PCBs						
Aroclor-1248	NC	NC	NA	NA	NA	NA
Aroclor-1254	NC	NC	NA	NA	NA	NA
Aroclor-1260	NC	NC	NA	NA	NA	NA
PCB-105	NC	NC	NA	NA	NA	NA
PCB-114	NC	NC	NA	NA	NA	NA
PCB-118	NC	NC	NA	NA	NA	NA
PCB-123	NC	NC	NA	NA	NA	NA
PCB-126	NC	NC	NA	NA	NA	NA
PCB-156	NC	NC	NA	NA	NA	NA
PCB-157	NC	NC	NA	NA	NA	NA
PCB-167	NC	NC	NA	NA	NA	NA
PCB-169	NC	NC	NA	NA	NA	NA
PCB-189	NC	NC	NA	NA	NA	NA
PCB-77	NC	NC	NA	NA	NA	NA
PCB-81	NC	NC	NA	NA	NA	NA

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyls
mg/kg-day - milligrams per kilogram per day
mg/m^3 - milligrams per cubic meter

Spreadsheet C2-39 (1 of 3)

Estimates of Human Intake
Soil Particulate Inhalation Pathway for Adult Worker
Old Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times CF \times IR \times FT \times EF \times ED}{PEF \times BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Inhalation rate	IR	m^3/day	10.4	16.0
Conversion factor	CF	kg/ug	1.E-09	1.E-09
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	219	250
Exposure duration	ED	years	9	25
Particulate emission factor	PEF	m^3/ug	2.4	2.4
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	9125
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Inorganic Compounds						
Antimony	NC	NC	NA	NA	NA	NA
Barium	NC	NC	NA	NA	NA	NA
Boron	4.3E+00	5.2E+00	8.0E-11	2.6E-10	9.6E-12	8.6E-11
Cadmium	5.2E-01	9.9E-01	9.6E-12	4.9E-11	1.2E-12	1.6E-11
Copper	NC	NC	NA	NA	NA	NA
Lead	1.7E+01	2.1E+01	3.2E-10	1.0E-09	3.8E-11	3.4E-10
Mercury	5.0E-01	3.3E+00	9.3E-12	1.6E-10	1.1E-12	5.3E-11
Nitrate	NC	NC	NA	NA	NA	NA
Silver	8.6E-01	1.8E+00	1.6E-11	8.7E-11	1.9E-12	2.9E-11
Thallium	8.6E-01	1.7E+00	1.6E-11	8.3E-11	1.9E-12	2.8E-11
Zinc	6.6E+01	7.4E+01	1.2E-09	3.6E-09	1.5E-10	1.2E-09
VOCs						
1,1,1-Trichloroethane	3.0E-03	5.5E-03	NA	NA	NA	NA
1,1,2-Trichloro-1,2,2-trifluoroethane	1.2E-02	2.1E-02	NA	NA	NA	NA
1,1-Dichloroethane	NC	NC	NA	NA	NA	NA
1,1-Dichloroethene	3.2E-03	5.5E-03	NA	NA	NA	NA
2-Butanone	2.2E-02	1.1E-02	NA	NA	NA	NA
Acetone	3.5E-01	3.5E+00	NA	NA	NA	NA
Benzene	1.1E-03	2.5E-03	NA	NA	NA	NA
Carbon disulfide	NC	NC	NA	NA	NA	NA
Chloromethane	NC	NC	NA	NA	NA	NA
cis-1,2-Dichloroethene	NC	NC	NA	NA	NA	NA
Ethylbenzene	1.1E-03	2.5E-03	NA	NA	NA	NA
m,p-Xylene	3.2E-03	7.2E-03	NA	NA	NA	NA
Methylene chloride	4.1E-02	2.4E-01	NA	NA	NA	NA
o-Xylene	7.8E-04	1.7E-03	NA	NA	NA	NA
p-Isopropyltoluene	1.9E-03	1.9E-03	NA	NA	NA	NA
Toluene	1.5E-03	3.6E-03	NA	NA	NA	NA
Trichloroethene	3.0E-03	5.5E-03	NA	NA	NA	NA
SVOCs						
1-Methylnaphthalene	1.2E-02	1.3E-02	2.2E-13	6.5E-13	2.7E-14	2.2E-13
2-Methylnaphthalene	1.7E-01	5.6E-01	3.2E-12	2.7E-11	3.8E-13	9.1E-12
Acenaphthene	1.7E-01	7.0E-01	3.1E-12	3.4E-11	3.8E-13	1.1E-11
Acenaphthylene	4.0E-02	1.4E-01	7.5E-13	6.9E-12	8.9E-14	2.3E-12
Anthracene	1.2E-01	4.7E-01	2.2E-12	2.3E-11	2.6E-13	7.6E-12
Benzo(a)anthracene	3.9E-02	1.8E-01	7.2E-13	8.9E-12	8.6E-14	3.0E-12
Benzo(a)pyrene	3.6E-02	1.8E-01	6.7E-13	8.6E-12	8.1E-14	2.9E-12

Spreadsheet C2-39 (2 of 3)

Estimates of Human Intake
Soil Particulate Inhalation Pathway for Adult Worker
Old Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times CF \times IR \times FT \times EF \times ED}{PEF \times BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Inhalation rate	IR	m^3/day	10.4	16.0
Conversion factor	CF	kg/ug	1.E-09	1.E-09
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	219	250
Exposure duration	ED	years	9	25
Particulate emission factor	PEF	m^3/ug	2.4	2.4
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	9125
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Benzo(e)pyrene	7.1E-02	3.1E-01	1.3E-12	1.5E-11	1.6E-13	5.1E-12
Benzo(b)fluoranthene	4.4E-02	2.0E-01	8.1E-13	9.7E-12	9.8E-14	3.2E-12
Benzo(g,h,i)perylene	8.4E-02	3.0E-01	1.6E-12	1.5E-11	1.9E-13	4.9E-12
Benzo(k)fluoranthene	3.6E-02	1.8E-01	6.7E-13	8.6E-12	8.1E-14	2.9E-12
Chrysene	5.9E-02	2.4E-01	1.1E-12	1.2E-11	1.3E-13	3.9E-12
Dibenz(a,h)anthracene	2.6E-02	1.0E-01	4.8E-13	5.1E-12	5.8E-14	1.7E-12
Fluoranthene	9.0E-02	4.3E-01	1.7E-12	2.1E-11	2.0E-13	7.1E-12
Fluorene	1.7E-01	6.9E-01	3.1E-12	3.4E-11	3.7E-13	1.1E-11
Indeno(1,2,3-cd)pyrene	3.2E-02	1.7E-01	5.9E-13	8.1E-12	7.1E-14	2.7E-12
Naphthalene	6.3E-02	1.6E-01	1.2E-12	7.7E-12	1.4E-13	2.6E-12
Perylene	4.0E-02	1.8E-01	7.5E-13	8.7E-12	9.0E-14	2.9E-12
Phenanthrene	4.4E-01	1.9E+00	8.2E-12	9.1E-11	9.8E-13	3.0E-11
Pyrene	8.9E-02	3.7E-01	1.7E-12	1.8E-11	2.0E-13	6.0E-12
Total Petroleum Hydrocarbons						
C08-C11(Gasoline Range)	9.7E+00	2.2E+01	1.8E-10	1.1E-09	2.2E-11	3.5E-10
C11-C14(Kerosene Range)	1.1E+01	2.2E+01	2.1E-10	1.1E-09	2.5E-11	3.5E-10
C14-C20(Diesel Range)	6.5E+01	2.6E+02	1.2E-09	1.2E-08	1.5E-10	4.2E-09
C20-C30(Lubricant Oil Range)	2.9E+02	1.4E+03	5.4E-09	6.7E-08	6.5E-10	2.2E-08
PCDD/PCDFs						
2,3,7,8-TCDD	1.0E-06	1.8E-06	1.9E-17	8.6E-17	2.3E-18	2.9E-17
1,2,3,7,8-PeCDD	6.6E-06	5.2E-05	1.2E-16	2.5E-15	1.5E-17	8.5E-16
1,2,3,4,7,8-HxCDD	1.4E-05	5.3E-05	2.7E-16	2.6E-15	3.2E-17	8.6E-16
1,2,3,6,7,8-HxCDD	2.0E-05	1.0E-04	3.7E-16	5.0E-15	4.5E-17	1.7E-15
1,2,3,7,8,9-HxCDD	1.8E-05	8.6E-05	3.3E-16	4.2E-15	4.0E-17	1.4E-15
1,2,3,4,6,7,8-HpCDD	4.9E-04	2.9E-03	9.1E-15	1.4E-13	1.1E-15	4.7E-14
OCDD	3.7E-03	8.2E-03	6.9E-14	4.0E-13	8.2E-15	1.3E-13
2,3,7,8-TCDF	2.2E-06	1.0E-05	4.1E-17	4.9E-16	4.9E-18	1.6E-16
1,2,3,7,8-PeCDF	1.8E-06	9.5E-06	3.4E-17	4.6E-16	4.1E-18	1.5E-16
2,3,4,7,8-PeCDF	5.1E-06	3.0E-05	9.5E-17	1.5E-15	1.1E-17	4.9E-16
1,2,3,4,7,8-HxCDF	1.3E-05	6.2E-05	2.4E-16	3.0E-15	2.9E-17	1.0E-15
1,2,3,6,7,8-HxCDF	4.9E-06	1.0E-05	9.1E-17	4.9E-16	1.1E-17	1.6E-16
2,3,4,6,7,8-HxCDF	5.2E-06	2.9E-05	9.7E-17	1.4E-15	1.2E-17	4.7E-16
1,2,3,7,8,9-HxCDF	2.3E-06	1.0E-05	4.3E-17	5.0E-16	5.1E-18	1.7E-16
1,2,3,4,6,7,8-HpCDF	5.5E-05	1.2E-04	1.0E-15	5.7E-15	1.2E-16	1.9E-15
1,2,3,4,7,8,9-HpCDF	7.2E-06	3.0E-05	1.3E-16	1.5E-15	1.6E-17	4.9E-16
OCDF	1.8E-04	4.1E-04	3.4E-15	2.0E-14	4.0E-16	6.7E-15

Spreadsheet C2-39 (3 of 3)

Estimates of Human Intake
Soil Particulate Inhalation Pathway for Adult Worker
Old Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times CF \times IR \times FT \times EF \times ED}{PEF \times BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Inhalation rate	IR	m^3/day	10.4	16.0
Conversion factor	CF	kg/ug	1.E-09	1.E-09
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	219	250
Exposure duration	ED	years	9	25
Particulate emission factor	PEF	m^3/ug	2.4	2.4
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	9125
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
PCBs						
Aroclor-1248	5.0E+02	5.5E+03	9.3E-09	2.7E-07	1.1E-09	8.9E-08
Aroclor-1254	1.2E+00	5.4E+00	2.3E-11	2.6E-10	2.7E-12	8.8E-11
Aroclor-1260	1.3E+01	1.4E+02	2.5E-10	7.0E-09	3.0E-11	2.3E-09
PCB-105	1.1E-03	1.2E-02	2.1E-14	5.8E-13	2.5E-15	1.9E-13
PCB-114	2.1E-05	2.1E-04	3.8E-16	1.0E-14	4.6E-17	3.4E-15
PCB-118	2.2E-03	2.4E-02	4.2E-14	1.2E-12	5.0E-15	3.8E-13
PCB-123	3.1E-05	3.3E-04	5.8E-16	1.6E-14	7.0E-17	5.4E-15
PCB-126	8.6E-05	9.2E-04	1.6E-15	4.5E-14	1.9E-16	1.5E-14
PCB-156	7.4E-04	7.9E-03	1.4E-14	3.8E-13	1.6E-15	1.3E-13
PCB-157	3.3E-04	3.5E-03	6.1E-15	1.7E-13	7.3E-16	5.8E-14
PCB-167	5.7E-04	6.1E-03	1.1E-14	3.0E-13	1.3E-15	1.0E-13
PCB-169	8.5E-06	9.2E-05	1.6E-16	4.5E-15	1.9E-17	1.5E-15
PCB-189	8.5E-05	9.2E-04	1.6E-15	4.5E-14	1.9E-16	1.5E-14
PCB-77	1.7E-04	1.8E-03	3.2E-15	9.0E-14	3.8E-16	3.0E-14
PCB-81	3.1E-05	3.2E-04	5.7E-16	1.6E-14	6.8E-17	5.3E-15

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCDD/PCDF - Polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.
PCB - polychlorinated biphenyls
mg/kg-day - milligrams per kilogram per day
mg/kg - milligrams per kilogram

Spreadsheet C2-38 (1 of 3)

Estimates of Human Intake
Soil Dermal Contact Pathway for Adult Worker
Old Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times SA \times AF \times B \times CF \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Skin surface area per event	SA	cm^2/day	2500	2500
Soil loading to skin	AF	mg/cm^2	0.02	0.20
Bioavailability	B	fraction	CS	CS
Conversion factor	CF	kg/mg	1.E-06	1.E-06
Exposure frequency	EF	days/year	219	250
Exposure duration	ED	years	9	25
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	9125
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
Inorganic Compounds							
Antimony	NC	NC	NA	NA	NA	NA	0.01
Barium	NC	NC	NA	NA	NA	NA	0.01
Boron	4.3E+00	5.2E+00	1.8E-08	2.6E-07	2.2E-09	8.6E-08	0.01
Cadmium	5.2E-01	9.9E-01	2.2E-10	4.9E-09	2.7E-11	1.6E-09	0.00
Copper	NC	NC	NA	NA	NA	NA	0.01
Lead	1.7E+01	2.1E+01	7.3E-08	1.0E-06	8.7E-09	3.4E-07	0.01
Mercury	5.0E-01	3.3E+00	2.2E-09	1.6E-07	2.6E-10	5.3E-08	0.01
Nitrate	NC	NC	NA	NA	NA	NA	0.01
Silver	8.6E-01	1.8E+00	3.7E-09	8.7E-08	4.4E-10	2.9E-08	0.01
Thallium	8.6E-01	1.7E+00	3.7E-09	8.3E-08	4.4E-10	2.8E-08	0.01
Zinc	6.6E+01	7.4E+01	2.8E-07	3.6E-06	3.4E-08	1.2E-06	0.01
VOCs							
1,1,1-Trichloroethane	3.0E-03	5.5E-03	1.3E-10	2.7E-09	1.5E-11	9.0E-10	0.10
1,1,2-Trichloro-1,2,2-trifluoroethane	1.2E-02	2.1E-02	5.3E-10	1.0E-08	6.3E-11	3.3E-09	0.10
1,1-Dichloroethane	NC	NC	NA	NA	NA	NA	0.10
1,1-Dichloroethene	3.2E-03	5.5E-03	1.4E-10	2.7E-09	1.6E-11	9.0E-10	0.10
2-Butanone	2.2E-02	1.1E-02	9.6E-10	5.4E-09	1.1E-10	1.8E-09	0.10
Acetone	3.5E-01	3.5E+00	1.5E-08	1.7E-06	1.8E-09	5.7E-07	0.10
Benzene	1.1E-03	2.5E-03	4.9E-11	1.2E-09	5.8E-12	4.0E-10	0.10
Carbon disulfide	NC	NC	NA	NA	NA	NA	0.01
Chloromethane	NC	NC	NA	NA	NA	NA	0.10
cis-1,2-Dichloroethene	NC	NC	NA	NA	NA	NA	0.10
Ethylbenzene	1.1E-03	2.5E-03	4.9E-11	1.2E-09	5.8E-12	4.0E-10	0.10
m,p-Xylene	3.2E-03	7.2E-03	1.4E-10	3.5E-09	1.7E-11	1.2E-09	0.10
Methylene chloride	4.1E-02	2.4E-01	1.8E-09	1.2E-07	2.1E-10	4.0E-08	0.10
o-Xylene	7.8E-04	1.7E-03	3.3E-11	8.3E-10	4.0E-12	2.8E-10	0.10
p-Isopropyltoluene	1.9E-03	1.9E-03	8.1E-11	9.3E-10	9.8E-12	3.1E-10	0.10
Toluene	1.5E-03	3.6E-03	6.6E-11	1.7E-09	7.9E-12	5.8E-10	0.10
Trichloroethene	3.0E-03	5.5E-03	1.3E-10	2.7E-09	1.5E-11	9.0E-10	0.10
SVOCs							
1-Methylnaphthalene	1.2E-02	1.3E-02	6.6E-10	8.5E-09	8.0E-11	2.8E-09	0.13
2-Methylnaphthalene	1.7E-01	5.6E-01	9.5E-09	3.6E-07	1.1E-09	1.2E-07	0.13
Acenaphthene	1.7E-01	7.0E-01	9.4E-09	4.4E-07	1.1E-09	1.5E-07	0.13
Acenaphthylene	4.0E-02	1.4E-01	2.2E-09	9.0E-08	2.7E-10	3.0E-08	0.13
Anthracene	1.2E-01	4.7E-01	6.6E-09	3.0E-07	7.9E-10	9.9E-08	0.13
Benzo(a)anthracene	3.9E-02	1.8E-01	2.1E-09	1.2E-07	2.6E-10	3.9E-08	0.13

Spreadsheet C2-38 (2 of 3)

Estimates of Human Intake
Soil Dermal Contact Pathway for Adult Worker
Old Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times SA \times AF \times B \times CF \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Skin surface area per event	SA	cm^2/day	2500	2500
Soil loading to skin	AF	mg/cm^2	0.02	0.20
Bioavailability	B	fraction	CS	CS
Conversion factor	CF	kg/mg	1.E-06	1.E-06
Exposure frequency	EF	days/year	219	250
Exposure duration	ED	years	9	25
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	9125
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
Benzo(a)pyrene	3.6E-02	1.8E-01	2.0E-09	1.1E-07	2.4E-10	3.7E-08	0.13
Benzo(e)pyrene	7.1E-02	3.1E-01	3.9E-09	2.0E-07	4.7E-10	6.6E-08	0.13
Benzo(b)fluoranthene	4.4E-02	2.0E-01	2.4E-09	1.3E-07	2.9E-10	4.2E-08	0.13
Benzo(g,h,i)perylene	8.4E-02	3.0E-01	4.7E-09	1.9E-07	5.6E-10	6.4E-08	0.13
Benzo(k)fluoranthene	3.6E-02	1.8E-01	2.0E-09	1.1E-07	2.4E-10	3.7E-08	0.13
Chrysene	5.9E-02	2.4E-01	3.3E-09	1.5E-07	4.0E-10	5.1E-08	0.13
Dibenz(a,h)anthracene	2.6E-02	1.0E-01	1.4E-09	6.7E-08	1.7E-10	2.2E-08	0.13
Fluoranthene	9.0E-02	4.3E-01	5.0E-09	2.8E-07	6.0E-10	9.2E-08	0.13
Fluorene	1.7E-01	6.9E-01	9.3E-09	4.4E-07	1.1E-09	1.5E-07	0.13
Indeno(1,2,3-cd)pyrene	3.2E-02	1.7E-01	1.8E-09	1.1E-07	2.1E-10	3.5E-08	0.13
Naphthalene	6.3E-02	1.6E-01	3.5E-09	1.0E-07	4.2E-10	3.3E-08	0.13
Perylene	4.0E-02	1.8E-01	2.2E-09	1.1E-07	2.7E-10	3.8E-08	0.13
Phenanthrene	4.4E-01	1.9E+00	2.4E-08	1.2E-06	2.9E-09	3.9E-07	0.13
Pyrene	8.9E-02	3.7E-01	5.0E-09	2.4E-07	6.0E-10	7.9E-08	0.13
Total Petroleum Hydrocarbons							
C08-C11(Gasoline Range)	9.7E+00	2.2E+01	4.1E-07	1.1E-05	5.0E-08	3.5E-06	0.10
C11-C14(Kerosene Range)	1.1E+01	2.2E+01	6.2E-07	1.4E-05	7.4E-08	4.6E-06	0.13
C14-C20(Diesel Range)	6.5E+01	2.6E+02	3.6E-06	1.6E-04	4.4E-07	5.4E-05	0.13
C20-C30(Lubricant Oil Range)	2.9E+02	1.4E+03	1.6E-05	8.7E-04	2.0E-06	2.9E-04	0.13
PCDD/PCDFs							
2,3,7,8-TCDD	1.0E-06	1.8E-06	1.3E-14	2.6E-13	1.6E-15	8.6E-14	0.03
1,2,3,7,8-PeCDD	6.6E-06	5.2E-05	8.5E-14	7.6E-12	1.0E-14	2.5E-12	0.03
1,2,3,4,7,8-HxCDD	1.4E-05	5.3E-05	1.9E-13	7.7E-12	2.2E-14	2.6E-12	0.03
1,2,3,6,7,8-HxCDD	2.0E-05	1.0E-04	2.6E-13	1.5E-11	3.1E-14	5.0E-12	0.03
1,2,3,7,8,9-HxCDD	1.8E-05	8.6E-05	2.3E-13	1.3E-11	2.8E-14	4.2E-12	0.03
1,2,3,4,6,7,8-HpCDD	4.9E-04	2.9E-03	6.3E-12	4.3E-10	7.5E-13	1.4E-10	0.03
OCDD	3.7E-03	8.2E-03	4.7E-11	1.2E-09	5.7E-12	4.0E-10	0.03
2,3,7,8-TCDF	2.2E-06	1.0E-05	2.8E-14	1.5E-12	3.4E-15	4.9E-13	0.03
1,2,3,7,8-PeCDF	1.8E-06	9.5E-06	2.3E-14	1.4E-12	2.8E-15	4.6E-13	0.03
2,3,4,7,8-PeCDF	5.1E-06	3.0E-05	6.6E-14	4.4E-12	7.9E-15	1.5E-12	0.03
1,2,3,4,7,8-HxCDF	1.3E-05	6.2E-05	1.7E-13	9.1E-12	2.0E-14	3.0E-12	0.03
1,2,3,6,7,8-HxCDF	4.9E-06	1.0E-05	6.3E-14	1.5E-12	7.6E-15	4.9E-13	0.03
2,3,4,6,7,8-HxCDF	5.2E-06	2.9E-05	6.7E-14	4.2E-12	8.1E-15	1.4E-12	0.03
1,2,3,7,8,9-HxCDF	2.3E-06	1.0E-05	3.0E-14	1.5E-12	3.5E-15	5.0E-13	0.03
1,2,3,4,6,7,8-HpCDF	5.5E-05	1.2E-04	7.1E-13	1.7E-11	8.5E-14	5.7E-12	0.03
1,2,3,4,7,8,9-HpCDF	7.2E-06	3.0E-05	9.3E-14	4.4E-12	1.1E-14	1.5E-12	0.03
OCDF	1.8E-04	4.1E-04	2.3E-12	6.0E-11	2.8E-13	2.0E-11	0.03

Spreadsheet C2-38 (3 of 3)

Estimates of Human Intake
Soil Dermal Contact Pathway for Adult Worker
Old Conservation Yard RFI Site

Intake Equation: $$\text{Dosage} = \frac{C \times SA \times AF \times B \times CF \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Skin surface area per event	SA	cm^2/day	2500	2500
Soil loading to skin	AF	mg/cm^2	0.02	0.20
Bioavailability	B	fraction	CS	CS
Conversion factor	CF	kg/mg	1.E-06	1.E-06
Exposure frequency	EF	days/year	219	250
Exposure duration	ED	years	9	25
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	9125
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
PCBs							
Aroclor-1248	5.0E+02	5.5E+03	3.0E-05	3.8E-03	3.6E-06	1.3E-03	0.14
Aroclor-1254	1.2E+00	5.4E+00	7.4E-08	3.7E-06	8.8E-09	1.2E-06	0.14
Aroclor-1260	1.3E+01	1.4E+02	8.0E-07	9.9E-05	9.6E-08	3.3E-05	0.14
PCB-105	1.1E-03	1.2E-02	6.7E-11	8.1E-09	8.0E-12	2.7E-09	0.14
PCB-114	2.1E-05	2.1E-04	1.2E-12	1.4E-10	1.5E-13	4.8E-11	0.14
PCB-118	2.2E-03	2.4E-02	1.3E-10	1.6E-08	1.6E-11	5.4E-09	0.14
PCB-123	3.1E-05	3.3E-04	1.9E-12	2.3E-10	2.3E-13	7.6E-11	0.14
PCB-126	8.6E-05	9.2E-04	5.2E-12	6.3E-10	6.2E-13	2.1E-10	0.14
PCB-156	7.4E-04	7.9E-03	4.4E-11	5.4E-09	5.3E-12	1.8E-09	0.14
PCB-157	3.3E-04	3.5E-03	2.0E-11	2.4E-09	2.4E-12	8.1E-10	0.14
PCB-167	5.7E-04	6.1E-03	3.4E-11	4.2E-09	4.1E-12	1.4E-09	0.14
PCB-169	8.5E-06	9.2E-05	5.1E-13	6.3E-11	6.1E-14	2.1E-11	0.14
PCB-189	8.5E-05	9.2E-04	5.1E-12	6.3E-10	6.1E-13	2.1E-10	0.14
PCB-77	1.7E-04	1.8E-03	1.0E-11	1.3E-09	1.2E-12	4.2E-10	0.14
PCB-81	3.1E-05	3.2E-04	1.8E-12	2.2E-10	2.2E-13	7.4E-11	0.14

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005), except dermal absorption factors which were taken from USEPA (2001).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCDD/PCDF - Polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.
PCB - polychlorinated biphenyls
mg/kg-day - milligrams per kilogram per day
mg/kg - milligrams per kilogram

Spreadsheet C2-37 (1 of 3)

Estimates of Human Intake
Soil Ingestion Pathway for Adult Worker
Old Conservation Yard RFI Site

Intake Equation: Dosage = $\frac{C \times IR \times CF \times FT \times EF \times ED \times B}{BW \times AT}$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Soil ingestion rate	IR	mg/day	50	200
Conversion factor	CF	kg/mg	1.E-06	1.E-06
Exposure frequency	EF	days/year	219	250
Exposure duration	ED	years	9	25
Bioavailability	B	fraction	CS	CS
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	9125
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
Inorganic Compounds							
Antimony	NC	NC	NA	NA	NA	NA	1
Barium	NC	NC	NA	NA	NA	NA	1
Boron	4.3E+00	5.2E+00	1.8E-06	1.0E-05	2.2E-07	3.4E-06	1
Cadmium	5.2E-01	9.9E-01	2.2E-07	1.9E-06	2.7E-08	6.5E-07	1
Copper	NC	NC	NA	NA	NA	NA	1
Lead	1.7E+01	2.1E+01	7.3E-06	4.1E-05	8.7E-07	1.4E-05	1
Mercury	5.0E-01	3.3E+00	2.2E-07	6.4E-06	2.6E-08	2.1E-06	1
Nitrate	NC	NC	NA	NA	NA	NA	1
Silver	8.6E-01	1.8E+00	3.7E-07	3.5E-06	4.4E-08	1.2E-06	1
Thallium	8.6E-01	1.7E+00	3.7E-07	3.3E-06	4.4E-08	1.1E-06	1
Zinc	6.6E+01	7.4E+01	2.8E-05	1.4E-04	3.4E-06	4.8E-05	1
VOCs							
1,1,1-Trichloroethane	3.0E-03	5.5E-03	1.3E-09	1.1E-08	1.5E-10	3.6E-09	1
1,1,2-Trichloro-1,2,2-trifluoroethane	1.2E-02	2.1E-02	5.3E-09	4.0E-08	6.3E-10	1.3E-08	1
1,1-Dichloroethane	NC	NC	NA	NA	NA	NA	1
1,1-Dichloroethene	3.2E-03	5.5E-03	1.4E-09	1.1E-08	1.6E-10	3.6E-09	1
2-Butanone	2.2E-02	1.1E-02	9.6E-09	2.2E-08	1.1E-09	7.2E-09	1
Acetone	3.5E-01	3.5E+00	1.5E-07	6.9E-06	1.8E-08	2.3E-06	1
Benzene	1.1E-03	2.5E-03	4.9E-10	4.8E-09	5.8E-11	1.6E-09	1
Carbon disulfide	NC	NC	NA	NA	NA	NA	1
Chloromethane	NC	NC	NA	NA	NA	NA	1
cis-1,2-Dichloroethene	NC	NC	NA	NA	NA	NA	1
Ethylbenzene	1.1E-03	2.5E-03	4.9E-10	4.8E-09	5.8E-11	1.6E-09	1
m,p-Xylene	3.2E-03	7.2E-03	1.4E-09	1.4E-08	1.7E-10	4.7E-09	1
Methylene chloride	4.1E-02	2.4E-01	1.8E-08	4.8E-07	2.1E-09	1.6E-07	1
o-Xylene	7.8E-04	1.7E-03	3.3E-10	3.3E-09	4.0E-11	1.1E-09	1
p-Isopropyltoluene	1.9E-03	1.9E-03	8.1E-10	3.7E-09	9.8E-11	1.2E-09	1
Toluene	1.5E-03	3.6E-03	6.6E-10	7.0E-09	7.9E-11	2.3E-09	1
Trichloroethene	3.0E-03	5.5E-03	1.3E-09	1.1E-08	1.5E-10	3.6E-09	1
SVOCs							
1-Methylnaphthalene	1.2E-02	1.3E-02	5.1E-09	2.6E-08	6.1E-10	8.7E-09	1
2-Methylnaphthalene	1.7E-01	5.6E-01	7.3E-08	1.1E-06	8.8E-09	3.7E-07	1
Acenaphthene	1.7E-01	7.0E-01	7.2E-08	1.4E-06	8.7E-09	4.6E-07	1
Acenaphthylene	4.0E-02	1.4E-01	1.7E-08	2.8E-07	2.1E-09	9.3E-08	1
Anthracene	1.2E-01	4.7E-01	5.1E-08	9.2E-07	6.1E-09	3.1E-07	1
Benzo(a)anthracene	3.9E-02	1.8E-01	1.7E-08	3.6E-07	2.0E-09	1.2E-07	1
Benzo(a)pyrene	3.6E-02	1.8E-01	1.6E-08	3.4E-07	1.9E-09	1.1E-07	1
Benzo(e)pyrene	7.1E-02	3.1E-01	3.0E-08	6.1E-07	3.6E-09	2.0E-07	1
Benzo(b)fluoranthene	4.4E-02	2.0E-01	1.9E-08	3.9E-07	2.3E-09	1.3E-07	1

Spreadsheet C2-37 (2 of 3)

Estimates of Human Intake
Soil Ingestion Pathway for Adult Worker
Old Conservation Yard RFI Site

Intake Equation: Dosage = $\frac{C \times IR \times CF \times FT \times EF \times ED \times B}{BW \times AT}$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Soil ingestion rate	IR	mg/day	50	200
Conversion factor	CF	kg/mg	1.E-06	1.E-06
Exposure frequency	EF	days/year	219	250
Exposure duration	ED	years	9	25
Bioavailability	B	fraction	CS	CS
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	9125
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
Benzo(g,h,i)perylene	8.4E-02	3.0E-01	3.6E-08	5.9E-07	4.3E-09	2.0E-07	1
Benzo(k)fluoranthene	3.6E-02	1.8E-01	1.5E-08	3.4E-07	1.9E-09	1.1E-07	1
Chrysene	5.9E-02	2.4E-01	2.5E-08	4.7E-07	3.0E-09	1.6E-07	1
Dibenz(a,h)anthracene	2.6E-02	1.0E-01	1.1E-08	2.0E-07	1.3E-09	6.8E-08	1
Fluoranthene	9.0E-02	4.3E-01	3.9E-08	8.5E-07	4.6E-09	2.8E-07	1
Fluorene	1.7E-01	6.9E-01	7.2E-08	1.4E-06	8.6E-09	4.5E-07	1
Indeno(1,2,3-cd)pyrene	3.2E-02	1.7E-01	1.4E-08	3.2E-07	1.6E-09	1.1E-07	1
Naphthalene	6.3E-02	1.6E-01	2.7E-08	3.1E-07	3.2E-09	1.0E-07	1
Perylene	4.0E-02	1.8E-01	1.7E-08	3.5E-07	2.1E-09	1.2E-07	1
Phenanthrene	4.4E-01	1.9E+00	1.9E-07	3.6E-06	2.3E-08	1.2E-06	1
Pyrene	8.9E-02	3.7E-01	3.8E-08	7.3E-07	4.6E-09	2.4E-07	1
Total Petroleum Hydrocarbons							
C08-C11(Gasoline Range)	9.7E+00	2.2E+01	4.1E-06	4.2E-05	5.0E-07	1.4E-05	1
C11-C14(Kerosene Range)	1.1E+01	2.2E+01	4.7E-06	4.3E-05	5.7E-07	1.4E-05	1
C14-C20(Diesel Range)	6.5E+01	2.6E+02	2.8E-05	5.0E-04	3.4E-06	1.7E-04	1
C20-C30(Lubricant Oil Range)	2.9E+02	1.4E+03	1.3E-04	2.7E-03	1.5E-05	8.9E-04	1
PCDD/PCDFs							
2,3,7,8-TCDD	1.0E-06	1.8E-06	4.3E-13	3.5E-12	5.2E-14	1.2E-12	1
1,2,3,7,8-PeCDD	6.6E-06	5.2E-05	2.8E-12	1.0E-10	3.4E-13	3.4E-11	1
1,2,3,4,7,8-HxCDD	1.4E-05	5.3E-05	6.2E-12	1.0E-10	7.5E-13	3.4E-11	1
1,2,3,6,7,8-HxCDD	2.0E-05	1.0E-04	8.6E-12	2.0E-10	1.0E-12	6.7E-11	1
1,2,3,7,8,9-HxCDD	1.8E-05	8.6E-05	7.7E-12	1.7E-10	9.2E-13	5.6E-11	1
1,2,3,4,6,7,8-HpCDD	4.9E-04	2.9E-03	2.1E-10	5.7E-09	2.5E-11	1.9E-09	1
OCDD	3.7E-03	8.2E-03	1.6E-09	1.6E-08	1.9E-10	5.4E-09	1
2,3,7,8-TCDF	2.2E-06	1.0E-05	9.4E-13	2.0E-11	1.1E-13	6.5E-12	1
1,2,3,7,8-PeCDF	1.8E-06	9.5E-06	7.8E-13	1.9E-11	9.4E-14	6.2E-12	1
2,3,4,7,8-PeCDF	5.1E-06	3.0E-05	2.2E-12	5.8E-11	2.6E-13	1.9E-11	1
1,2,3,4,7,8-HxCDF	1.3E-05	6.2E-05	5.5E-12	1.2E-10	6.6E-13	4.1E-11	1
1,2,3,6,7,8-HxCDF	4.9E-06	1.0E-05	2.1E-12	2.0E-11	2.5E-13	6.5E-12	1
2,3,4,6,7,8-HxCDF	5.2E-06	2.9E-05	2.2E-12	5.6E-11	2.7E-13	1.9E-11	1
1,2,3,7,8,9-HxCDF	2.3E-06	1.0E-05	9.8E-13	2.0E-11	1.2E-13	6.6E-12	1
1,2,3,4,6,7,8-HpCDF	5.5E-05	1.2E-04	2.4E-11	2.3E-10	2.8E-12	7.7E-11	1
1,2,3,4,7,8,9-HpCDF	7.2E-06	3.0E-05	3.1E-12	5.9E-11	3.7E-13	2.0E-11	1
OCDF	1.8E-04	4.1E-04	7.8E-11	8.0E-10	9.3E-12	2.7E-10	1
PCBs							
Aroclor-1248	5.0E+02	5.5E+03	2.1E-04	1.1E-02	2.6E-05	3.6E-03	1
Aroclor-1254	1.2E+00	5.4E+00	5.3E-07	1.1E-05	6.3E-08	3.5E-06	1
Aroclor-1260	1.3E+01	1.4E+02	5.7E-06	2.8E-04	6.8E-07	9.4E-05	1
PCB-105	1.1E-03	1.2E-02	4.8E-10	2.3E-08	5.7E-11	7.7E-09	1
PCB-114	2.1E-05	2.1E-04	8.8E-12	4.1E-10	1.1E-12	1.4E-10	1
PCB-118	2.2E-03	2.4E-02	9.6E-10	4.6E-08	1.1E-10	1.5E-08	1

Spreadsheet C2-37 (3 of 3)

Estimates of Human Intake
Soil Ingestion Pathway for Adult Worker
Old Conservation Yard RFI Site

Intake Equation: Dosage = $\frac{C \times IR \times CF \times FT \times EF \times ED \times B}{BW \times AT}$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Soil ingestion rate	IR	mg/day	50	200
Conversion factor	CF	kg/mg	1.E-06	1.E-06
Exposure frequency	EF	days/year	219	250
Exposure duration	ED	years	9	25
Bioavailability	B	fraction	CS	CS
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	9125
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
PCB-123	3.1E-05	3.3E-04	1.3E-11	6.5E-10	1.6E-12	2.2E-10	1
PCB-126	8.6E-05	9.2E-04	3.7E-11	1.8E-09	4.4E-12	6.0E-10	1
PCB-156	7.4E-04	7.9E-03	3.2E-10	1.5E-08	3.8E-11	5.1E-09	1
PCB-157	3.3E-04	3.5E-03	1.4E-10	6.9E-09	1.7E-11	2.3E-09	1
PCB-167	5.7E-04	6.1E-03	2.4E-10	1.2E-08	2.9E-11	4.0E-09	1
PCB-169	8.5E-06	9.2E-05	3.6E-12	1.8E-10	4.4E-13	6.0E-11	1
PCB-189	8.5E-05	9.2E-04	3.6E-11	1.8E-09	4.4E-12	6.0E-10	1
PCB-77	1.7E-04	1.8E-03	7.4E-11	3.6E-09	8.9E-12	1.2E-09	1
PCB-81	3.1E-05	3.2E-04	1.3E-11	6.3E-10	1.6E-12	2.1E-10	1

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyls
mg/kg-day - milligrams per kilogram per day
mg/kg - milligrams per kilogram

Spreadsheet C2-36 (1 of 4)

Estimated Human Intake for the Child Resident
Old Conservation Yard RFI Site

Central Tendancy Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation of Indoor Air_s		Inhalation Ambient Air_s		Inhalation of Indoor Air_{gw}		Inhalation Ambient Air_{gw}		Domestic Groundwater Use		Plant Consumption	
	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)
Inorganic Compounds																		
Antimony	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Barium	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Boron	2.7E-05	2.2E-06	4.6E-07	3.7E-08	4.8E-10	3.8E-11	-	-	-	-	-	-	-	-	-	-	1.5E-03	1.2E-04
Cadmium	3.3E-06	2.7E-07	5.6E-09	4.5E-10	5.8E-11	4.6E-12	-	-	-	-	-	-	-	-	-	-	1.9E-05	1.5E-06
Copper	-	-	-	-	-	-	-	-	-	-	-	-	-	-	8.6E-04	6.9E-05	-	-
Fluoride	-	-	-	-	-	-	-	-	-	-	-	-	-	-	2.7E-02	2.1E-03	-	-
Lead	1.1E-04	8.7E-06	1.8E-06	1.5E-07	1.9E-09	1.5E-10	-	-	-	-	-	-	-	-	-	-	4.7E-05	3.8E-06
Mercury	3.2E-06	2.6E-07	5.4E-08	4.3E-09	5.6E-11	4.5E-12	-	-	-	-	-	-	-	-	-	-	2.9E-05	2.3E-06
Nitrate	-	-	-	-	-	-	-	-	-	-	-	-	-	-	6.8E-01	5.4E-02	-	-
Silver	5.5E-06	4.4E-07	9.2E-08	7.4E-09	9.6E-11	7.7E-12	-	-	-	-	-	-	-	-	-	-	1.7E-07	1.4E-08
Thallium	5.5E-06	4.4E-07	9.3E-08	7.4E-09	9.7E-11	7.7E-12	-	-	-	-	-	-	-	-	2.6E-05	2.1E-06	1.2E-04	9.8E-06
Zinc	4.2E-04	3.4E-05	7.1E-06	5.7E-07	7.4E-09	5.9E-10	-	-	-	-	-	-	-	-	-	-	9.4E-03	7.5E-04
VOCs																		
1,1,1-Trichloroethane	1.9E-08	1.5E-09	3.2E-09	2.6E-10	-	-	2.0E-04	1.6E-05	3.4E-06	2.7E-07	-	-	-	-	-	-	1.1E-05	8.7E-07
1,1,2-Trichloro-1,2,2-trifluoroethane	7.9E-08	6.3E-09	1.3E-08	1.1E-09	-	-	3.4E-04	2.7E-05	9.0E-06	7.2E-07	-	-	-	-	-	-	1.8E-05	1.5E-06
1,1-Dichloroethane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	2.5E-04	2.0E-05	-	-
1,1-Dichloroethene	2.0E-08	1.6E-09	3.4E-09	2.7E-10	-	-	2.1E-04	1.6E-05	3.8E-06	3.0E-07	-	-	-	-	-	-	1.8E-05	1.5E-06
2-Butanone	1.4E-07	1.1E-08	2.4E-08	1.9E-09	-	-	-	-	-	-	-	-	-	-	-	-	1.5E-03	1.2E-04
Acetone	2.3E-06	1.8E-07	3.8E-07	3.0E-08	-	-	-	-	-	-	-	-	-	-	1.5E-03	1.2E-04	4.8E-02	3.8E-03
Benzene	7.2E-09	5.8E-10	1.2E-09	9.7E-11	-	-	1.8E-04	1.4E-05	2.6E-06	2.1E-07	-	-	-	-	5.6E-05	4.4E-06	6.6E-06	5.3E-07
Carbon disulfide	-	-	-	-	-	-	-	-	-	-	-	-	-	-	2.5E-04	2.0E-05	-	-
Chloromethane	-	-	-	-	-	-	-	-	-	-	5.5E-07	4.4E-08	3.5E-08	2.8E-09	3.1E-05	2.5E-06	-	-
cis-1,2-Dichloroethene	-	-	-	-	-	-	-	-	-	-	2.4E-07	2.0E-08	8.6E-09	6.9E-10	4.9E-03	3.9E-04	-	-
Ethylbenzene	7.2E-09	5.8E-10	1.2E-09	9.7E-11	-	-	7.3E-05	5.9E-06	2.0E-06	1.6E-07	-	-	-	-	-	-	1.8E-06	1.4E-07
m,p-Xylene	2.1E-08	1.7E-09	3.5E-09	2.8E-10	-	-	1.6E-04	1.3E-05	4.6E-06	3.7E-07	-	-	-	-	-	-	5.1E-06	4.1E-07
Methylene chloride	2.6E-07	2.1E-08	4.4E-08	3.5E-09	-	-	1.9E-04	1.5E-05	1.5E-04	1.2E-05	-	-	-	-	6.1E-05	4.9E-06	1.2E-03	9.9E-05
o-Xylene	5.0E-09	4.0E-10	8.4E-10	6.7E-11	-	-	3.6E-05	2.9E-06	1.0E-06	8.4E-08	-	-	-	-	-	-	1.2E-06	9.8E-08
p-Isopropyltoluene	1.2E-08	9.7E-10	2.0E-09	1.6E-10	-	-	1.1E-04	9.0E-06	-	-	-	-	-	-	-	-	0.0E+00	0.0E+00
Toluene	9.9E-09	7.9E-10	1.7E-09	1.3E-10	-	-	1.6E-04	1.3E-05	2.6E-06	2.1E-07	-	-	-	-	1.7E-04	1.4E-05	4.1E-06	3.3E-07
Trichloroethene	1.9E-08	1.5E-09	3.2E-09	2.6E-10	-	-	3.7E-04	2.9E-05	1.7E-05	1.4E-06	7.4E-06	5.9E-07	2.9E-07	2.3E-08	9.6E-04	7.7E-05	1.1E-05	8.5E-07
SVOCs																		
1-Methylnaphthalene	7.6E-08	6.1E-09	1.7E-08	1.3E-09	1.3E-12	1.1E-13	-	-	-	-	-	-	-	-	-	-	6.9E-06	5.5E-07
2-Methylnaphthalene	1.1E-06	8.7E-08	2.4E-07	1.9E-08	1.9E-11	1.5E-12	-	-	-	-	-	-	-	-	-	-	9.9E-05	7.9E-06
Acenaphthene	1.1E-06	8.6E-08	2.4E-07	1.9E-08	1.9E-11	1.5E-12	-	-	-	-	-	-	-	-	-	-	8.3E-05	6.7E-06
Acenaphthylene	2.6E-07	2.1E-08	5.6E-08	4.5E-09	4.5E-12	3.6E-13	-	-	-	-	-	-	-	-	-	-	1.8E-05	1.4E-06
Anthracene	7.6E-07	6.1E-08	1.7E-07	1.3E-08	1.3E-11	1.1E-12	-	-	-	-	-	-	-	-	-	-	3.1E-05	2.5E-06
Benzo(a)anthracene	2.5E-07	2.0E-08	5.4E-08	4.3E-09	4.3E-12	3.4E-13	-	-	-	-	-	-	-	-	-	-	1.9E-06	1.5E-07
Benzo(a)pyrene	2.3E-07	1.9E-08	5.1E-08	4.0E-09	4.1E-12	3.2E-13	-	-	-	-	-	-	-	-	-	-	7.7E-07	6.1E-08
Benzo(e)pyrene	4.5E-07	3.6E-08	9.9E-08	7.9E-09	7.9E-12	6.3E-13	-	-	-	-	-	-	-	-	-	-	1.3E-06	1.1E-07
Benzo(b)fluoranthene	2.8E-07	2.2E-08	6.1E-08	4.9E-09	4.9E-12	3.9E-13	-	-	-	-	-	-	-	-	-	-	1.0E-06	8.0E-08
Benzo(g,h,i)perylene	5.4E-07	4.3E-08	1.2E-07	9.4E-09	9.4E-12	7.5E-13	-	-	-	-	-	-	-	-	-	-	1.4E-06	1.1E-07
Benzo(k)fluoranthene	2.3E-07	1.8E-08	5.0E-08	4.0E-09	4.0E-12	3.2E-13	-	-	-	-	-	-	-	-	-	-	1.1E-06	8.9E-08
Chrysene	3.8E-07	3.0E-08	8.3E-08	6.6E-09	6.6E-12	5.3E-13	-	-	-	-	-	-	-	-	-	-	2.8E-06	2.2E-07
Dibenz(a,h)anthracene	1.7E-07	1.3E-08	3.6E-08	2.9E-09	2.9E-12	2.3E-13	-	-	-	-	-	-	-	-	-	-	2.8E-07	2.3E-08
Fluoranthene	5.8E-07	4.6E-08	1.3E-07	1.0E-08	1.0E-11	8.1E-13	-	-	-	-	-	-	-	-	-	-	1.0E-05	8.0E-07
Fluorene	1.1E-06	8.5E-08	2.3E-07	1.9E-08	1.9E-11	1.5E-12	-	-	-	-	-	-	-	-	-	-	1.8E-05	1.5E-06
Indeno(1,2,3-cd)pyrene	2.0E-07	1.6E-08	4.4E-08	3.6E-09	3.6E-12	2.8E-13	-	-	-	-	-	-	-	-	-	-	2.0E-07	1.6E-08
Naphthalene	4.0E-07	3.2E-08	8.7E-08	7.0E-09	7.0E-12	5.6E-13	-	-	-	-	-	-	-	-	-	-	7.7E-05	6.2E-06
Perylene	2.6E-07	2.1E-08	5.6E-08	4.5E-09	4.5E-12	3.6E-13	-	-	-	-	-	-	-	-	-	-	1.7E-06	1.4E-07
Phenanthrene	2.8E-06	2.2E-07	6.1E-07	4.9E-08	4.9E-11	3.9E-12	-	-	-	-	-	-	-	-	-	-	9.9E-05	7.9E-06
Pyrene	5.7E-07	4.6E-08	1.2E-07	9.9E-09	1.0E-11	8.0E-13	-	-	-	-	-	-	-	-	-	-	1.1E-05	8.8E-07
Total Petroleum Hydrocarbons																		
C08-C11(Gasoline Range)	6.2E-05	5.0E-06	1.0E-05	8.3E-07	-	-	-	-	-	-	-	-	-	-	-	-	1.2E-03	9.8E-05
C11-C14(Kerosene Range)	7.1E-05	5.7E-06	1.5E-05	1.2E-06	1.2E-09	9.9E-11	-	-	-	-	-	-	-	-	-	-	2.7E-03	2.2E-04
C14-C20(Diesel Range)	4.2E-04	3.3E-05	9.1E-05	7.3E-06	7.3E-09	5.8E-10	-	-	-	-	-	-	-	-	2.4E-03	1.9E-04	8.3E-03	6.6E-04
C20-C30(Lubricant Oil Range)	1.9E-03	1.5E-04	4.1E-04	3.3E-05	3.3E-08	2.6E-09	-	-	-	-	-	-	-	-	-	-	9.8E-03	7.8E-04

Spreadsheet C2-36 (2 of 4)

Estimated Human Intake for the Child Resident
Old Conservation Yard RFI Site

Central Tendancy Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation of Indoor Air_s		Inhalation Ambient Air_s		Inhalation of Indoor Air_{gw}		Inhalation Ambient Air_{gw}		Domestic Groundwater Use		Plant Consumption	
	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)
PCDD/PCDFs																		
2,3,7,8-TCDD	6.5E-12	5.2E-13	3.3E-13	2.6E-14	1.1E-16	9.1E-18	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,7,8-PeCDD	4.2E-11	3.4E-12	2.1E-12	1.7E-13	7.4E-16	5.9E-17	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,4,7,8-HxCDD	9.3E-11	7.4E-12	4.7E-12	3.7E-13	1.6E-15	1.3E-16	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,6,7,8-HxCDD	1.3E-10	1.0E-11	6.5E-12	5.2E-13	2.2E-15	1.8E-16	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,7,8,9-HxCDD	1.1E-10	9.2E-12	5.8E-12	4.6E-13	2.0E-15	1.6E-16	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,4,6,7,8-HpCDD	3.1E-09	2.5E-10	1.6E-10	1.3E-11	5.5E-14	4.4E-15	-	-	-	-	-	-	-	-	-	-	-	-
OCDD	2.4E-08	1.9E-09	1.2E-09	9.5E-11	4.1E-13	3.3E-14	-	-	-	-	-	-	-	-	-	-	-	-
2,3,7,8-TCDF	1.4E-11	1.1E-12	7.1E-13	5.7E-14	2.5E-16	2.0E-17	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,7,8-PeCDF	1.2E-11	9.3E-13	5.9E-13	4.7E-14	2.0E-16	1.6E-17	-	-	-	-	-	-	-	-	-	-	-	-
2,3,4,7,8-PeCDF	3.3E-11	2.6E-12	1.6E-12	1.3E-13	5.7E-16	4.6E-17	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,4,7,8-HxCDF	8.2E-11	6.6E-12	4.2E-12	3.3E-13	1.4E-15	1.2E-16	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,6,7,8-HxCDF	3.1E-11	2.5E-12	1.6E-12	1.3E-13	5.5E-16	4.4E-17	-	-	-	-	-	-	-	-	-	-	-	-
2,3,4,6,7,8-HxCDF	3.3E-11	2.7E-12	1.7E-12	1.3E-13	5.9E-16	4.7E-17	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,7,8,9-HxCDF	1.5E-11	1.2E-12	7.4E-13	5.9E-14	2.6E-16	2.1E-17	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,4,6,7,8-HpCDF	3.5E-10	2.8E-11	1.8E-11	1.4E-12	6.2E-15	5.0E-16	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,4,7,8,9-HpCDF	4.6E-11	3.7E-12	2.3E-12	1.9E-13	8.1E-16	6.4E-17	-	-	-	-	-	-	-	-	-	-	-	-
OCDF	1.2E-09	9.3E-11	5.8E-11	4.7E-12	2.0E-14	1.6E-15	-	-	-	-	-	-	-	-	-	-	-	-
PCBs																		
Aroclor-1248	3.2E-03	2.6E-04	7.5E-04	6.0E-05	5.6E-08	4.5E-09	-	-	-	-	-	-	-	-	-	-	-	-
Aroclor-1254	7.8E-06	6.3E-07	1.8E-06	1.5E-07	1.4E-10	1.1E-11	-	-	-	-	-	-	-	-	-	-	2.7E-05	2.2E-06
Aroclor-1260	8.5E-05	6.8E-06	2.0E-05	1.6E-06	1.5E-09	1.2E-10	-	-	-	-	-	-	-	-	-	-	1.5E-04	1.2E-05
PCB-105	7.1E-09	5.7E-10	1.7E-09	1.3E-10	1.2E-13	1.0E-14	-	-	-	-	-	-	-	-	-	-	2.5E-08	2.0E-09
PCB-114	1.3E-10	1.1E-11	3.1E-11	2.5E-12	2.3E-15	1.8E-16	-	-	-	-	-	-	-	-	-	-	4.6E-10	3.7E-11
PCB-118	1.4E-08	1.1E-09	3.4E-09	2.7E-10	2.5E-13	2.0E-14	-	-	-	-	-	-	-	-	-	-	5.0E-08	4.0E-09
PCB-123	2.0E-10	1.6E-11	4.7E-11	3.8E-12	3.5E-15	2.8E-16	-	-	-	-	-	-	-	-	-	-	7.0E-10	5.6E-11
PCB-126	5.5E-10	4.4E-11	1.3E-10	1.0E-11	9.6E-15	7.7E-16	-	-	-	-	-	-	-	-	-	-	1.9E-09	1.5E-10
PCB-156	4.7E-09	3.8E-10	1.1E-09	8.9E-11	8.2E-14	6.6E-15	-	-	-	-	-	-	-	-	-	-	1.6E-08	1.3E-09
PCB-157	2.1E-09	1.7E-10	4.9E-10	3.9E-11	3.7E-14	2.9E-15	-	-	-	-	-	-	-	-	-	-	7.3E-09	5.9E-10
PCB-167	3.6E-09	2.9E-10	8.6E-10	6.9E-11	6.4E-14	5.1E-15	-	-	-	-	-	-	-	-	-	-	1.3E-08	1.0E-09
PCB-169	5.4E-11	4.4E-12	1.3E-11	1.0E-12	9.5E-16	7.6E-17	-	-	-	-	-	-	-	-	-	-	1.9E-10	1.5E-11
PCB-189	5.4E-10	4.3E-11	1.3E-10	1.0E-11	9.5E-15	7.6E-16	-	-	-	-	-	-	-	-	-	-	1.9E-09	1.5E-10
PCB-77	1.1E-09	8.8E-11	2.6E-10	2.1E-11	1.9E-14	1.5E-15	-	-	-	-	-	-	-	-	-	-	2.2E-09	1.8E-10
PCB-81	2.0E-10	1.6E-11	4.6E-11	3.7E-12	3.4E-15	2.7E-16	-	-	-	-	-	-	-	-	-	-	3.9E-10	3.1E-11

Spreadsheet C2-36 (3 of 4)

Estimated Human Intake for the Child Resident
Old Conservation Yard RFI Site

Reasonable Maximum Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation of Indoor Air_s		Inhalation Ambient Air_s		Inhalation of Indoor Air_{gw}		Inhalation Ambient Air_{gw}		Domestic Groundwater Use		Plant Consumption	
	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)
Inorganic Compounds																		
Antimony	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Barium	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Boron	6.7E-05	5.4E-06	1.9E-06	1.5E-07	8.8E-10	7.0E-11	-	-	-	-	-	-	-	-	-	-	1.8E-03	2.1E-03
Cadmium	1.3E-05	1.0E-06	3.6E-08	2.8E-09	1.7E-10	1.3E-11	-	-	-	-	-	-	-	-	-	-	3.7E-05	4.3E-05
Copper	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1.4E-03	1.2E-04	-	-
Fluoride	-	-	-	-	-	-	-	-	-	-	-	-	-	-	4.5E-02	3.6E-03	-	-
Lead	2.6E-04	2.1E-05	7.4E-06	5.9E-07	3.5E-09	2.8E-10	-	-	-	-	-	-	-	-	-	-	5.8E-05	6.8E-05
Mercury	4.2E-05	3.3E-06	1.2E-06	9.3E-08	5.5E-10	4.4E-11	-	-	-	-	-	-	-	-	-	-	1.9E-04	2.2E-04
Nitrate	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1.1E+00	9.1E-02	-	-
Silver	2.3E-05	1.8E-06	6.4E-07	5.1E-08	3.0E-10	2.4E-11	-	-	-	-	-	-	-	-	-	-	3.6E-07	4.2E-07
Thallium	2.2E-05	1.7E-06	6.1E-07	4.9E-08	2.9E-10	2.3E-11	-	-	-	-	-	-	-	-	4.3E-05	3.5E-06	2.4E-04	2.8E-04
Zinc	9.4E-04	7.5E-05	2.6E-05	2.1E-06	1.2E-08	9.9E-10	-	-	-	-	-	-	-	-	-	-	1.0E-02	1.2E-02
VOCs																		
1,1,1-Trichloroethane	7.0E-08	5.6E-09	2.0E-08	1.6E-09	-	-	3.7E-04	2.9E-05	5.1E-06	4.1E-07	-	-	-	-	-	-	2.0E-05	2.3E-05
1,1,2-Trichloro-1,2,2-trifluoroethane	2.6E-07	2.1E-08	7.3E-08	5.9E-09	-	-	9.7E-04	7.8E-05	1.3E-05	1.1E-06	-	-	-	-	-	-	3.0E-05	3.6E-05
1,1-Dichloroethane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	4.2E-04	3.3E-05	-	-
1,1-Dichloroethene	7.0E-08	5.6E-09	2.0E-08	1.6E-09	-	-	3.8E-04	3.0E-05	5.6E-06	4.5E-07	-	-	-	-	-	-	3.2E-05	3.8E-05
2-Butanone	1.4E-07	1.1E-08	3.9E-08	3.2E-09	-	-	-	-	-	-	-	-	-	-	-	-	7.5E-04	8.8E-04
Acetone	4.5E-05	3.6E-06	1.3E-05	1.0E-06	-	-	-	-	-	-	-	-	-	-	2.6E-03	2.0E-04	4.8E-01	5.6E-01
Benzene	3.2E-08	2.5E-09	8.9E-09	7.1E-10	-	-	2.7E-04	2.1E-05	3.9E-06	3.1E-07	-	-	-	-	9.3E-05	7.4E-06	1.5E-05	1.7E-05
Carbon disulfide	-	-	-	-	-	-	-	-	-	-	-	-	-	-	4.2E-04	3.3E-05	-	-
Chloromethane	-	-	-	-	-	-	-	-	-	-	8.3E-07	6.6E-08	5.3E-08	4.2E-09	5.1E-05	4.1E-06	-	-
cis-1,2-Dichloroethene	-	-	-	-	-	-	-	-	-	-	3.7E-07	2.9E-08	1.3E-08	1.0E-09	8.2E-03	6.5E-04	-	-
Ethylbenzene	3.2E-08	2.5E-09	8.9E-09	7.1E-10	-	-	2.2E-04	1.8E-05	3.0E-06	2.4E-07	-	-	-	-	-	-	3.9E-06	4.5E-06
m,p-Xylene	9.2E-08	7.4E-09	2.6E-08	2.1E-09	-	-	4.8E-04	3.8E-05	6.9E-06	5.5E-07	-	-	-	-	-	-	1.1E-05	1.3E-05
Methylene chloride	3.1E-06	2.5E-07	8.8E-07	7.0E-08	-	-	1.4E-02	1.1E-03	2.3E-04	1.8E-05	-	-	-	-	1.0E-04	8.2E-06	7.4E-03	8.6E-03
o-Xylene	2.2E-08	1.7E-09	6.1E-09	4.9E-10	-	-	1.1E-04	8.6E-06	1.6E-06	1.3E-07	-	-	-	-	-	-	2.7E-06	3.1E-06
p-Isopropyltoluene	2.4E-08	1.9E-09	6.8E-09	5.4E-10	-	-	1.7E-04	1.3E-05	-	-	-	-	-	-	-	-	0.0E+00	0.0E+00
Toluene	4.5E-08	3.6E-09	1.3E-08	1.0E-09	-	-	2.7E-04	2.1E-05	3.9E-06	3.1E-07	-	-	-	-	2.9E-04	2.3E-05	9.4E-06	1.1E-05
Trichloroethene	7.0E-08	5.6E-09	2.0E-08	1.6E-09	-	-	1.8E-03	1.5E-04	2.6E-05	2.1E-06	1.1E-05	8.8E-07	4.4E-07	3.5E-08	1.6E-03	1.3E-04	1.9E-05	2.3E-05
SVOCs																		
1-Methylnaphthalene	1.7E-07	1.4E-08	6.2E-08	5.0E-09	2.2E-12	1.8E-13	-	-	-	-	-	-	-	-	-	-	7.7E-06	9.1E-06
2-Methylnaphthalene	7.2E-06	5.7E-07	2.6E-06	2.1E-07	9.4E-11	7.5E-12	-	-	-	-	-	-	-	-	-	-	3.3E-04	3.8E-04
Acenaphthene	8.9E-06	7.1E-07	3.3E-06	2.6E-07	1.2E-10	9.4E-12	-	-	-	-	-	-	-	-	-	-	3.5E-04	4.1E-04
Acenaphthylene	1.8E-06	1.5E-07	6.6E-07	5.3E-08	2.4E-11	1.9E-12	-	-	-	-	-	-	-	-	-	-	6.2E-05	7.3E-05
Anthracene	6.0E-06	4.8E-07	2.2E-06	1.7E-07	7.9E-11	6.3E-12	-	-	-	-	-	-	-	-	-	-	1.2E-04	1.4E-04
Benzo(a)anthracene	2.3E-06	1.9E-07	8.5E-07	6.8E-08	3.1E-11	2.4E-12	-	-	-	-	-	-	-	-	-	-	9.1E-06	1.1E-05
Benzo(a)pyrene	2.2E-06	1.8E-07	8.2E-07	6.5E-08	2.9E-11	2.4E-12	-	-	-	-	-	-	-	-	-	-	3.7E-06	4.3E-06
Benzo(e)pyrene	4.0E-06	3.2E-07	1.4E-06	1.2E-07	5.2E-11	4.2E-12	-	-	-	-	-	-	-	-	-	-	5.8E-06	6.7E-06
Benzo(b)fluoranthene	2.5E-06	2.0E-07	9.2E-07	7.4E-08	3.3E-11	2.7E-12	-	-	-	-	-	-	-	-	-	-	4.5E-06	5.3E-06
Benzo(g,h,i)perylene	3.8E-06	3.1E-07	1.4E-06	1.1E-07	5.0E-11	4.0E-12	-	-	-	-	-	-	-	-	-	-	5.1E-06	6.0E-06
Benzo(k)fluoranthene	2.2E-06	1.8E-07	8.2E-07	6.5E-08	2.9E-11	2.4E-12	-	-	-	-	-	-	-	-	-	-	5.4E-06	6.3E-06
Chrysene	3.1E-06	2.4E-07	1.1E-06	8.9E-08	4.0E-11	3.2E-12	-	-	-	-	-	-	-	-	-	-	1.1E-05	1.3E-05
Dibenz(a,h)anthracene	1.3E-06	1.1E-07	4.9E-07	3.9E-08	1.8E-11	1.4E-12	-	-	-	-	-	-	-	-	-	-	1.1E-06	1.3E-06
Fluoranthene	5.5E-06	4.4E-07	2.0E-06	1.6E-07	7.3E-11	5.8E-12	-	-	-	-	-	-	-	-	-	-	4.8E-05	5.6E-05
Fluorene	8.9E-06	7.1E-07	3.2E-06	2.6E-07	1.2E-10	9.3E-12	-	-	-	-	-	-	-	-	-	-	7.6E-05	8.9E-05
Indeno(1,2,3-cd)pyrene	2.1E-06	1.7E-07	7.7E-07	6.2E-08	2.8E-11	2.2E-12	-	-	-	-	-	-	-	-	-	-	1.0E-06	1.2E-06
Naphthalene	2.0E-06	1.6E-07	7.3E-07	5.8E-08	2.6E-11	2.1E-12	-	-	-	-	-	-	-	-	-	-	1.9E-04	2.3E-04
Perylene	2.3E-06	1.8E-07	8.2E-07	6.6E-08	3.0E-11	2.4E-12	-	-	-	-	-	-	-	-	-	-	7.5E-06	8.8E-06
Phenanthrene	2.4E-05	1.9E-06	8.6E-06	6.9E-07	3.1E-10	2.5E-11	-	-	-	-	-	-	-	-	-	-	4.2E-04	4.9E-04
Pyrene	4.7E-06	3.8E-07	1.7E-06	1.4E-07	6.2E-11	5.0E-12	-	-	-	-	-	-	-	-	-	-	4.6E-05	5.4E-05
Total Petroleum Hydrocarbons																		
C08-C11(Gasoline Range)	2.8E-04	2.2E-05	7.7E-05	6.2E-06	-	-	-	-	-	-	-	-	-	-	-	-	2.7E-03	3.2E-03
C11-C14(Kerosene Range)	2.8E-04	2.2E-05	1.0E-04	8.1E-06	3.6E-09	2.9E-10	-	-	-	-	-	-	-	-	-	-	5.3E-03	6.2E-03
C14-C20(Diesel Range)	3.3E-03	2.6E-04	1.2E-03	9.5E-05	4.3E-08	3.4E-09	-	-	-	-	-	-	-	-	4.0E-03	3.2E-04	3.2E-02	3.8E-02
C20-C30(Lubricant Oil Range)	1.7E-02	1.4E-03	6.4E-03	5.1E-04	2.3E-07	1.8E-08	-	-	-	-	-	-	-	-	-	-	4.6E-02	5.3E-02

Spreadsheet C2-36 (4 of 4)

Estimated Human Intake for the Child Resident
Old Conservation Yard RFI Site

Reasonable Maximum Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation of Indoor Air_s		Inhalation Ambient Air_s		Inhalation of Indoor Air_{gw}		Inhalation Ambient Air_{gw}		Domestic Groundwater Use		Plant Consumption	
	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)
PCDD/PCDFs																		
2,3,7,8-TCDD	2.3E-11	1.8E-12	1.9E-12	1.5E-13	3.0E-16	2.4E-17	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,7,8-PeCDD	6.6E-10	5.3E-11	5.6E-11	4.5E-12	8.7E-15	7.0E-16	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,4,7,8-HxCDD	6.7E-10	5.4E-11	5.7E-11	4.5E-12	8.9E-15	7.1E-16	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,6,7,8-HxCDD	1.3E-09	1.0E-10	1.1E-10	8.8E-12	1.7E-14	1.4E-15	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,7,8,9-HxCDD	1.1E-09	8.8E-11	9.3E-11	7.4E-12	1.4E-14	1.2E-15	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,4,6,7,8-HpCDD	3.7E-08	3.0E-09	3.1E-09	2.5E-10	4.9E-13	3.9E-14	-	-	-	-	-	-	-	-	-	-	-	-
OCDD	1.1E-07	8.4E-09	8.9E-09	7.1E-10	1.4E-12	1.1E-13	-	-	-	-	-	-	-	-	-	-	-	-
2,3,7,8-TCDF	1.3E-10	1.0E-11	1.1E-11	8.6E-13	1.7E-15	1.3E-16	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,7,8-PeCDF	1.2E-10	9.7E-12	1.0E-11	8.2E-13	1.6E-15	1.3E-16	-	-	-	-	-	-	-	-	-	-	-	-
2,3,4,7,8-PeCDF	3.8E-10	3.1E-11	3.2E-11	2.6E-12	5.0E-15	4.0E-16	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,4,7,8-HxCDF	7.9E-10	6.4E-11	6.7E-11	5.3E-12	1.0E-14	8.3E-16	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,6,7,8-HxCDF	1.3E-10	1.0E-11	1.1E-11	8.6E-13	1.7E-15	1.3E-16	-	-	-	-	-	-	-	-	-	-	-	-
2,3,4,6,7,8-HxCDF	3.7E-10	3.0E-11	3.1E-11	2.5E-12	4.8E-15	3.9E-16	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,7,8,9-HxCDF	1.3E-10	1.0E-11	1.1E-11	8.7E-13	1.7E-15	1.4E-16	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,4,6,7,8-HpCDF	1.5E-09	1.2E-10	1.3E-10	1.0E-11	2.0E-14	1.6E-15	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,4,7,8,9-HpCDF	3.9E-10	3.1E-11	3.3E-11	2.6E-12	5.1E-15	4.1E-16	-	-	-	-	-	-	-	-	-	-	-	-
OCDF	5.2E-09	4.2E-10	4.4E-10	3.5E-11	6.9E-14	5.5E-15	-	-	-	-	-	-	-	-	-	-	-	-
PCBs																		
Aroclor-1248	7.0E-02	5.6E-03	2.7E-02	2.2E-03	9.2E-07	7.4E-08	-	-	-	-	-	-	-	-	-	-	-	-
Aroclor-1254	6.9E-05	5.5E-06	2.7E-05	2.2E-06	9.1E-10	7.2E-11	-	-	-	-	-	-	-	-	-	-	1.2E-04	1.4E-04
Aroclor-1260	1.8E-03	1.5E-04	7.2E-04	5.8E-05	2.4E-08	1.9E-09	-	-	-	-	-	-	-	-	-	-	1.6E-03	1.9E-03
PCB-105	1.5E-07	1.2E-08	5.9E-08	4.7E-09	2.0E-12	1.6E-13	-	-	-	-	-	-	-	-	-	-	2.6E-07	3.1E-07
PCB-114	2.7E-09	2.2E-10	1.1E-09	8.4E-11	3.5E-14	2.8E-15	-	-	-	-	-	-	-	-	-	-	4.7E-09	5.5E-09
PCB-118	3.0E-07	2.4E-08	1.2E-07	9.5E-09	4.0E-12	3.2E-13	-	-	-	-	-	-	-	-	-	-	5.3E-07	6.2E-07
PCB-123	4.3E-09	3.4E-10	1.7E-09	1.3E-10	5.6E-14	4.5E-15	-	-	-	-	-	-	-	-	-	-	7.5E-09	8.7E-09
PCB-126	1.2E-08	9.4E-10	4.6E-09	3.7E-10	1.5E-13	1.2E-14	-	-	-	-	-	-	-	-	-	-	2.0E-08	2.4E-08
PCB-156	1.0E-07	8.0E-09	3.9E-08	3.1E-09	1.3E-12	1.1E-13	-	-	-	-	-	-	-	-	-	-	1.8E-07	2.1E-07
PCB-157	4.5E-08	3.6E-09	1.8E-08	1.4E-09	5.9E-13	4.7E-14	-	-	-	-	-	-	-	-	-	-	7.9E-08	9.2E-08
PCB-167	7.9E-08	6.3E-09	3.1E-08	2.5E-09	1.0E-12	8.3E-14	-	-	-	-	-	-	-	-	-	-	1.4E-07	1.6E-07
PCB-169	1.2E-09	9.4E-11	4.6E-10	3.7E-11	1.5E-14	1.2E-15	-	-	-	-	-	-	-	-	-	-	2.0E-09	2.4E-09
PCB-189	1.2E-08	9.4E-10	4.6E-09	3.7E-10	1.5E-13	1.2E-14	-	-	-	-	-	-	-	-	-	-	2.0E-08	2.4E-08
PCB-77	2.3E-08	1.9E-09	9.2E-09	7.4E-10	3.1E-13	2.5E-14	-	-	-	-	-	-	-	-	-	-	2.3E-08	2.7E-08
PCB-81	4.1E-09	3.3E-10	1.6E-09	1.3E-10	5.4E-14	4.4E-15	-	-	-	-	-	-	-	-	-	-	4.1E-09	4.8E-09

Notes:
Inhalation Indoor Air $_{s\text{-}gw}$ - Exposure associated with indoor air concentrations of COPCs modeled from soil vapor, soil, or groundwater.
Inhalation Ambient Air $_{s\text{-}gw}$ - Exposure associated with ambient air concentrations of COPCs modeled from soil or groundwater.
ADD - Average daily dose, as defined in the SRAM (MWH 2005).
LADD - Lifetime average daily dose, as defined in the SRAM (MWH 2005).
The chemicals presented in this table are comprehensive for all media sampled. Not all chemicals were analyzed for or detected in all media.
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyls
COPC - chemical of potential concern
"-" indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
mg/kg-day - milligrams per kilogram day

Spreadsheet C2-35 (1 of 4)

Estimated Human Intake for the Adult Resident
Old Conservation Yard RFI Site

Central Tendancy Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation of Indoor Air$_s$		Inhalation Ambient Air$_s$		Inhalation of Indoor Air$_{gw}$		Inhalation Ambient Air$_{gw}$		Domestic Groundwater Use		Plant Consumption	
	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)
Inorganic Compounds																		
Antimony	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Barium	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Boron	2.9E-06	3.5E-07	3.4E-08	4.0E-09	8.6E-11	1.0E-11	-	-	-	-	-	-	-	-	-	-	9.8E-04	1.2E-04
Cadmium	3.6E-07	4.3E-08	4.0E-10	4.9E-11	1.0E-11	1.2E-12	-	-	-	-	-	-	-	-	-	-	1.3E-05	1.5E-06
Copper	-	-	-	-	-	-	-	-	-	-	-	-	-	-	2.5E-04	3.0E-05	-	-
Fluoride	-	-	-	-	-	-	-	-	-	-	-	-	-	-	7.7E-03	9.2E-04	-	-
Lead	1.2E-05	1.4E-06	1.3E-07	1.6E-08	3.4E-10	4.1E-11	-	-	-	-	-	-	-	-	-	-	3.1E-05	3.8E-06
Mercury	3.4E-07	4.1E-08	3.9E-09	4.7E-10	1.0E-11	1.2E-12	-	-	-	-	-	-	-	-	-	-	1.9E-05	2.3E-06
Nitrate	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1.9E-01	2.3E-02	-	-
Silver	5.9E-07	7.1E-08	6.7E-09	8.1E-10	1.7E-11	2.1E-12	-	-	-	-	-	-	-	-	-	-	1.1E-07	1.4E-08
Thallium	5.9E-07	7.1E-08	6.7E-09	8.1E-10	1.7E-11	2.1E-12	-	-	-	-	-	-	-	-	7.4E-06	8.9E-07	8.1E-05	9.7E-06
Zinc	4.6E-05	5.5E-06	5.2E-07	6.2E-08	1.3E-09	1.6E-10	-	-	-	-	-	-	-	-	-	-	6.2E-03	7.5E-04
VOCs																		
1,1,1-Trichloroethane	2.1E-09	2.5E-10	2.3E-10	2.8E-11	-	-	-	-	6.1E-07	7.3E-08	-	-	-	-	-	-	7.2E-06	8.7E-07
1,1,2-Trichloro-1,2,2-trifluoroethane	8.4E-09	1.0E-09	9.6E-10	1.2E-10	-	-	-	-	1.6E-06	1.9E-07	-	-	-	-	-	-	1.2E-05	1.5E-06
1,1-Dichloroethane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	7.1E-05	8.5E-06	-	-
1,1-Dichloroethene	2.2E-09	2.6E-10	2.5E-10	3.0E-11	-	-	-	-	6.7E-07	8.1E-08	-	-	-	-	-	-	1.2E-05	1.5E-06
2-Butanone	1.5E-08	1.8E-09	1.7E-09	2.1E-10	-	-	-	-	-	-	-	-	-	-	-	-	1.0E-03	1.2E-04
Acetone	2.4E-07	2.9E-08	2.8E-08	3.3E-09	-	-	-	-	-	-	-	-	-	-	4.4E-04	5.3E-05	3.2E-02	3.8E-03
Benzene	7.8E-10	9.3E-11	8.8E-11	1.1E-11	-	-	-	-	4.7E-07	5.6E-08	-	-	-	-	1.6E-05	1.9E-06	4.4E-06	5.3E-07
Carbon disulfide	-	-	-	-	-	-	-	-	-	-	-	-	-	-	7.1E-05	8.5E-06	-	-
Chloromethane	-	-	-	-	-	-	-	-	-	-	9.8E-08	1.2E-08	6.3E-09	7.6E-10	8.8E-06	1.1E-06	-	-
cis-1,2-Dichloroethene	-	-	-	-	-	-	-	-	-	-	4.4E-08	5.2E-09	1.5E-09	1.9E-10	1.4E-03	1.7E-04	-	-
Ethylbenzene	7.8E-10	9.3E-11	8.8E-11	1.1E-11	-	-	-	-	3.6E-07	4.3E-08	-	-	-	-	-	-	1.2E-06	1.4E-07
m,p-Xylene	2.2E-09	2.7E-10	2.5E-10	3.0E-11	-	-	-	-	8.2E-07	9.9E-08	-	-	-	-	-	-	3.4E-06	4.1E-07
Methylene chloride	2.8E-08	3.4E-09	3.2E-09	3.8E-10	-	-	-	-	2.7E-05	3.2E-06	-	-	-	-	1.8E-05	2.1E-06	8.2E-04	9.8E-05
o-Xylene	5.3E-10	6.4E-11	6.1E-11	7.3E-12	-	-	-	-	1.9E-07	2.2E-08	-	-	-	-	-	-	8.1E-07	9.7E-08
p-Isopropyltoluene	1.3E-09	1.6E-10	1.5E-10	1.8E-11	-	-	-	-	-	-	-	-	-	-	-	-	0.0E+00	0.0E+00
Toluene	1.1E-09	1.3E-10	1.2E-10	1.4E-11	-	-	-	-	4.6E-07	5.6E-08	-	-	-	-	4.9E-05	5.9E-06	2.7E-06	3.2E-07
Trichloroethene	2.1E-09	2.5E-10	2.3E-10	2.8E-11	-	-	-	-	3.1E-06	3.7E-07	1.3E-06	1.6E-07	5.2E-08	6.2E-09	2.7E-04	3.3E-05	7.0E-06	8.5E-07
SVOCs																		
1-Methylnaphthalene	8.2E-09	9.8E-10	1.2E-09	1.5E-10	2.4E-13	2.9E-14	-	-	-	-	-	-	-	-	-	-	-	-
2-Methylnaphthalene	1.2E-07	1.4E-08	1.7E-08	2.1E-09	3.4E-12	4.1E-13	-	-	-	-	-	-	-	-	-	-	-	-
Acenaphthene	1.2E-07	1.4E-08	1.7E-08	2.1E-09	3.4E-12	4.0E-13	-	-	-	-	-	-	-	-	-	-	5.5E-05	6.7E-06
Acenaphthylene	2.7E-08	3.3E-09	4.1E-09	4.9E-10	8.0E-13	9.6E-14	-	-	-	-	-	-	-	-	-	-	1.2E-05	1.4E-06
Anthracene	8.1E-08	9.8E-09	1.2E-08	1.4E-09	2.4E-12	2.8E-13	-	-	-	-	-	-	-	-	-	-	2.1E-05	2.5E-06
Benzo(a)anthracene	2.6E-08	3.2E-09	3.9E-09	4.7E-10	7.7E-13	9.2E-14	-	-	-	-	-	-	-	-	-	-	1.3E-06	1.5E-07
Benzo(a)pyrene	2.5E-08	3.0E-09	3.7E-09	4.4E-10	7.3E-13	8.7E-14	-	-	-	-	-	-	-	-	-	-	5.1E-07	6.1E-08
Benzo(e)pyrene	4.8E-08	5.8E-09	7.2E-09	8.6E-10	1.4E-12	1.7E-13	-	-	-	-	-	-	-	-	-	-	8.7E-07	1.0E-07
Benzo(b)fluoranthene	3.0E-08	3.6E-09	4.5E-09	5.3E-10	8.8E-13	1.1E-13	-	-	-	-	-	-	-	-	-	-	6.7E-07	8.0E-08
Benzo(g,h,i)perylene	5.7E-08	6.9E-09	8.5E-09	1.0E-09	1.7E-12	2.0E-13	-	-	-	-	-	-	-	-	-	-	9.5E-07	1.1E-07
Benzo(k)fluoranthene	2.5E-08	3.0E-09	3.7E-09	4.4E-10	7.2E-13	8.7E-14	-	-	-	-	-	-	-	-	-	-	7.4E-07	8.9E-08
Chrysene	4.1E-08	4.9E-09	6.0E-09	7.2E-10	1.2E-12	1.4E-13	-	-	-	-	-	-	-	-	-	-	1.8E-06	2.2E-07
Dibenz(a,h)anthracene	1.8E-08	2.1E-09	2.6E-09	3.2E-10	5.2E-13	6.2E-14	-	-	-	-	-	-	-	-	-	-	1.9E-07	2.2E-08
Fluoranthene	6.2E-08	7.4E-09	9.2E-09	1.1E-09	1.8E-12	2.2E-13	-	-	-	-	-	-	-	-	-	-	6.6E-06	7.9E-07
Fluorene	1.1E-07	1.4E-08	1.7E-08	2.0E-09	3.3E-12	4.0E-13	-	-	-	-	-	-	-	-	-	-	1.2E-05	1.5E-06
Indeno(1,2,3-cd)pyrene	2.2E-08	2.6E-09	3.2E-09	3.9E-10	6.4E-13	7.6E-14	-	-	-	-	-	-	-	-	-	-	1.3E-07	1.6E-08
Naphthalene	4.3E-08	5.1E-09	6.4E-09	7.6E-10	1.3E-12	1.5E-13	-	-	-	-	-	-	-	-	-	-	-	-
Perylene	2.8E-08	3.3E-09	4.1E-09	4.9E-10	8.1E-13	9.7E-14	-	-	-	-	-	-	-	-	-	-	1.1E-06	1.4E-07
Phenanthrene	3.0E-07	3.6E-08	4.5E-08	5.4E-09	8.8E-12	1.1E-12	-	-	-	-	-	-	-	-	-	-	6.6E-05	7.9E-06
Pyrene	6.1E-08	7.3E-09	9.0E-09	1.1E-09	1.8E-12	2.1E-13	-	-	-	-	-	-	-	-	-	-	7.3E-06	8.8E-07

Spreadsheet C2-35 (2 of 4)

Estimated Human Intake for the Adult Resident
Old Conservation Yard RFI Site

Central Tendancy Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation of Indoor Air$_s$		Inhalation Ambient Air$_s$		Inhalation of Indoor Air$_{gw}$		Inhalation Ambient Air$_{gw}$		Domestic Groundwater Use		Plant Consumption	
	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)
Total Petroleum Hydrocarbons																		
C08-C11(Gasoline Range)	6.6E-06	8.0E-07	7.6E-07	9.1E-08	-	-	-	-	-	-	-	-	-	-	-	-	8.2E-04	9.8E-05
C11-C14(Kerosene Range)	7.6E-06	9.1E-07	1.1E-06	1.3E-07	2.2E-10	2.7E-11	-	-	-	-	-	-	-	-	-	-	1.8E-03	2.2E-04
C14-C20(Diesel Range)	4.5E-05	5.4E-06	6.6E-06	7.9E-07	1.3E-09	1.6E-10	-	-	-	-	-	-	-	-	6.8E-04	8.2E-05	5.5E-03	6.6E-04
C20-C30(Lubricant Oil Range)	2.0E-04	2.4E-05	3.0E-05	3.6E-06	5.9E-09	7.0E-10	-	-	-	-	-	-	-	-	-	-	6.5E-03	7.8E-04
							-	-	-	-	-	-	-	-				
PCDD/PCDFs							-	-	-	-	-	-	-	-				
2,3,7,8-TCDD	6.9E-13	8.3E-14	2.4E-14	2.8E-15	2.0E-17	2.4E-18	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,7,8-PeCDD	4.5E-12	5.4E-13	1.5E-13	1.8E-14	1.3E-16	1.6E-17	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,4,7,8-HxCDD	9.9E-12	1.2E-12	3.4E-13	4.1E-14	2.9E-16	3.5E-17	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,6,7,8-HxCDD	1.4E-11	1.6E-12	4.7E-13	5.6E-14	4.0E-16	4.8E-17	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,7,8,9-HxCDD	1.2E-11	1.5E-12	4.2E-13	5.0E-14	3.6E-16	4.3E-17	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,4,6,7,8-HpCDD	3.3E-10	4.0E-11	1.1E-11	1.4E-12	9.8E-15	1.2E-15	-	-	-	-	-	-	-	-	-	-	-	-
OCDD	2.5E-09	3.0E-10	8.7E-11	1.0E-11	7.4E-14	8.9E-15	-	-	-	-	-	-	-	-	-	-	-	-
2,3,7,8-TCDF	1.5E-12	1.8E-13	5.1E-14	6.2E-15	4.4E-17	5.3E-18	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,7,8-PeCDF	1.2E-12	1.5E-13	4.3E-14	5.1E-15	3.6E-17	4.4E-18	-	-	-	-	-	-	-	-	-	-	-	-
2,3,4,7,8-PeCDF	3.5E-12	4.2E-13	1.2E-13	1.4E-14	1.0E-16	1.2E-17	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,4,7,8-HxCDF	8.8E-12	1.1E-12	3.0E-13	3.6E-14	2.6E-16	3.1E-17	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,6,7,8-HxCDF	3.4E-12	4.0E-13	1.2E-13	1.4E-14	9.8E-17	1.2E-17	-	-	-	-	-	-	-	-	-	-	-	-
2,3,4,6,7,8-HxCDF	3.6E-12	4.3E-13	1.2E-13	1.5E-14	1.0E-16	1.3E-17	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,7,8,9-HxCDF	1.6E-12	1.9E-13	5.4E-14	6.5E-15	4.6E-17	5.5E-18	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,4,6,7,8-HpCDF	3.8E-11	4.6E-12	1.3E-12	1.6E-13	1.1E-15	1.3E-16	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,4,7,8,9-HpCDF	4.9E-12	5.9E-13	1.7E-13	2.0E-14	1.4E-16	1.7E-17	-	-	-	-	-	-	-	-	-	-	-	-
OCDF	1.2E-10	1.5E-11	4.2E-12	5.1E-13	3.6E-15	4.4E-16	-	-	-	-	-	-	-	-	-	-	-	-
PCBs																		
Aroclor-1248	3.4E-04	4.1E-05	5.5E-05	6.6E-06	1.0E-08	1.2E-09	-	-	-	-	-	-	-	-	-	-	-	-
Aroclor-1254	8.4E-07	1.0E-07	1.3E-07	1.6E-08	2.5E-11	2.9E-12	-	-	-	-	-	-	-	-	-	-	1.8E-05	2.2E-06
Aroclor-1260	9.1E-06	1.1E-06	1.5E-06	1.7E-07	2.7E-10	3.2E-11	-	-	-	-	-	-	-	-	-	-	1.0E-04	1.2E-05
PCB-105	7.6E-10	9.2E-11	1.2E-10	1.5E-11	2.2E-14	2.7E-15	-	-	-	-	-	-	-	-	-	-	1.7E-08	2.0E-09
PCB-114	1.4E-11	1.7E-12	2.2E-12	2.7E-13	4.1E-16	4.9E-17	-	-	-	-	-	-	-	-	-	-	3.1E-10	3.7E-11
PCB-118	1.5E-09	1.8E-10	2.4E-10	2.9E-11	4.5E-14	5.4E-15	-	-	-	-	-	-	-	-	-	-	3.3E-08	4.0E-09
PCB-123	2.2E-11	2.6E-12	3.4E-12	4.1E-13	6.3E-16	7.5E-17	-	-	-	-	-	-	-	-	-	-	4.7E-10	5.6E-11
PCB-126	5.9E-11	7.1E-12	9.4E-12	1.1E-12	1.7E-15	2.1E-16	-	-	-	-	-	-	-	-	-	-	1.3E-09	1.5E-10
PCB-156	5.0E-10	6.1E-11	8.1E-11	9.7E-12	1.5E-14	1.8E-15	-	-	-	-	-	-	-	-	-	-	1.1E-08	1.3E-09
PCB-157	2.2E-10	2.7E-11	3.6E-11	4.3E-12	6.6E-15	7.9E-16	-	-	-	-	-	-	-	-	-	-	4.9E-09	5.8E-10
PCB-167	3.9E-10	4.7E-11	6.2E-11	7.5E-12	1.1E-14	1.4E-15	-	-	-	-	-	-	-	-	-	-	8.5E-09	1.0E-09
PCB-169	5.8E-12	7.0E-13	9.3E-13	1.1E-13	1.7E-16	2.0E-17	-	-	-	-	-	-	-	-	-	-	1.3E-10	1.5E-11
PCB-189	5.8E-11	7.0E-12	9.3E-12	1.1E-12	1.7E-15	2.0E-16	-	-	-	-	-	-	-	-	-	-	1.3E-09	1.5E-10
PCB-77	1.2E-10	1.4E-11	1.9E-11	2.3E-12	3.4E-15	4.1E-16	-	-	-	-	-	-	-	-	-	-	1.5E-09	1.8E-10
PCB-81	2.1E-11	2.5E-12	3.3E-12	4.0E-13	6.1E-16	7.3E-17	-	-	-	-	-	-	-	-	-	-	2.6E-10	3.1E-11

Spreadsheet C2-35 (3 of 4)

Estimated Human Intake for the Adult Resident
Old Conservation Yard RFI Site

Reasonable Maximum Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation of Indoor Air$_{\xi}$		Inhalation Ambient Air$_{\xi}$		Inhalation of Indoor Air$_{gw}$		Inhalation Ambient Air$_{gw}$		Domestic Grounder Use		Plant Consumption	
	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)
Inorganic Compounds																		
Antimony	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Barium	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Boron	7.2E-06	2.3E-06	2.9E-07	9.2E-08	3.0E-10	9.5E-11	-	-	-	-	-	-	-	-	-	-	1.2E-03	7.7E-03
Cadmium	1.4E-06	4.4E-07	5.4E-09	1.7E-09	5.6E-11	1.8E-11	-	-	-	-	-	-	-	-	-	-	2.5E-05	1.6E-04
Copper	-	-	-	-	-	-	-	-	-	-	-	-	-	-	3.8E-04	1.2E-04	-	-
Fluoride	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1.2E-02	3.8E-03	-	-
Lead	2.8E-05	9.1E-06	1.1E-06	3.6E-07	1.2E-09	3.7E-10	-	-	-	-	-	-	-	-	-	-	3.8E-05	2.4E-04
Mercury	4.5E-06	1.4E-06	1.8E-07	5.7E-08	1.8E-10	5.9E-11	-	-	-	-	-	-	-	-	-	-	1.2E-04	7.9E-04
Nitrate	-	-	-	-	-	-	-	-	-	-	-	-	-	-	3.0E-01	9.6E-02	-	-
Silver	2.4E-06	7.8E-07	9.7E-08	3.1E-08	1.0E-10	3.2E-11	-	-	-	-	-	-	-	-	-	-	2.4E-07	1.5E-06
Thallium	2.3E-06	7.5E-07	9.3E-08	3.0E-08	9.6E-11	3.1E-11	-	-	-	-	-	-	-	-	1.1E-05	3.6E-06	1.6E-04	1.0E-03
Zinc	1.0E-04	3.2E-05	4.0E-06	1.3E-06	4.2E-09	1.3E-09	-	-	-	-	-	-	-	-	-	-	6.9E-03	4.4E-02
VOCs																		
1,1,1-Trichloroethane	7.5E-09	2.4E-09	3.0E-09	9.6E-10	-	-	1.2E-04	4.0E-05	1.7E-06	5.5E-07	-	-	-	-	-	-	1.3E-05	8.4E-05
1,1,2-Trichloro-1,2,2-trifluoroethane	2.8E-08	9.0E-09	1.1E-08	3.6E-09	-	-	3.3E-04	1.0E-04	4.5E-06	1.5E-06	-	-	-	-	-	-	2.0E-05	1.3E-04
1,1-Dichloroethane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1.1E-04	3.5E-05	-	-
1,1-Dichloroethene	7.5E-09	2.4E-09	3.0E-09	9.6E-10	-	-	1.3E-04	4.1E-05	1.9E-06	6.1E-07	-	-	-	-	-	-	2.1E-05	1.4E-04
2-Butanone	1.5E-08	4.8E-09	6.0E-09	1.9E-09	-	-	-	-	-	-	-	-	-	-	-	-	5.0E-04	3.2E-03
Acetone	4.8E-06	1.5E-06	1.9E-06	6.2E-07	-	-	-	-	-	-	-	-	-	-	6.8E-04	2.2E-04	3.2E-01	2.0E+00
Benzene	3.4E-09	1.1E-09	1.4E-09	4.3E-10	-	-	9.0E-05	2.9E-05	1.3E-06	4.2E-07	-	-	-	-	2.4E-05	7.8E-06	9.7E-06	6.1E-05
Carbon disulfide	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1.1E-04	3.5E-05	-	-
Chloromethane	-	-	-	-	-	-	-	-	-	-	2.8E-07	8.9E-08	1.8E-08	5.7E-09	1.4E-05	4.3E-06	-	-
cis-1,2-Dichloroethene	-	-	-	-	-	-	-	-	-	-	1.2E-07	4.0E-08	4.4E-09	1.4E-09	2.2E-03	6.9E-04	-	-
Ethylbenzene	3.4E-09	1.1E-09	1.4E-09	4.3E-10	-	-	7.4E-05	2.4E-05	1.0E-06	3.2E-07	-	-	-	-	-	-	2.6E-06	1.6E-05
m,p-Xylene	9.9E-09	3.2E-09	4.0E-09	1.3E-09	-	-	1.6E-04	5.1E-05	2.3E-06	7.4E-07	-	-	-	-	-	-	7.6E-06	4.8E-05
Methylene chloride	3.4E-07	1.1E-07	1.3E-07	4.3E-08	-	-	4.8E-03	1.5E-03	7.6E-05	2.4E-05	-	-	-	-	2.7E-05	8.6E-06	4.9E-03	3.1E-02
o-Xylene	2.3E-09	7.5E-10	9.3E-10	3.0E-10	-	-	3.6E-05	1.2E-05	5.3E-07	1.7E-07	-	-	-	-	-	-	1.8E-06	1.1E-05
p-Isopropyltoluene	2.6E-09	8.3E-10	1.0E-09	3.3E-10	-	-	5.7E-05	1.8E-05	-	-	-	-	-	-	-	-	0.0E+00	0.0E+00
Toluene	4.9E-09	1.6E-09	1.9E-09	6.2E-10	-	-	8.9E-05	2.9E-05	1.3E-06	4.2E-07	-	-	-	-	7.6E-05	2.4E-05	6.2E-06	4.0E-05
Trichloroethene	7.5E-09	2.4E-09	3.0E-09	9.6E-10	-	-	6.2E-04	2.0E-04	8.6E-06	2.8E-06	3.7E-06	1.2E-06	1.5E-07	4.7E-08	4.2E-04	1.4E-04	1.3E-05	8.2E-05
SVOCs																		
1-Methylnaphthalene	1.8E-08	5.8E-09	9.5E-09	3.0E-09	7.5E-13	2.4E-13	-	-	-	-	-	-	-	-	-	-	-	-
2-Methylnaphthalene	7.7E-07	2.5E-07	4.0E-07	1.3E-07	3.2E-11	1.0E-11	-	-	-	-	-	-	-	-	-	-	-	-
Acenaphthene	9.6E-07	3.1E-07	5.0E-07	1.6E-07	3.9E-11	1.3E-11	-	-	-	-	-	-	-	-	-	-	2.3E-04	1.5E-03
Acenaphthylene	1.9E-07	6.2E-08	1.0E-07	3.2E-08	8.0E-12	2.6E-12	-	-	-	-	-	-	-	-	-	-	4.1E-05	2.6E-04
Anthracene	6.4E-07	2.1E-07	3.3E-07	1.1E-07	2.6E-11	8.5E-12	-	-	-	-	-	-	-	-	-	-	8.2E-05	5.2E-04
Benzo(a)anthracene	2.5E-07	8.0E-08	1.3E-07	4.1E-08	1.0E-11	3.3E-12	-	-	-	-	-	-	-	-	-	-	6.1E-06	3.9E-05
Benzo(a)pyrene	2.4E-07	7.7E-08	1.2E-07	4.0E-08	9.9E-12	3.2E-12	-	-	-	-	-	-	-	-	-	-	2.5E-06	1.6E-05
Benzo(e)pyrene	4.3E-07	1.4E-07	2.2E-07	7.1E-08	1.8E-11	5.6E-12	-	-	-	-	-	-	-	-	-	-	3.8E-06	2.4E-05
Benzo(b)fluoranthene	2.7E-07	8.7E-08	1.4E-07	4.5E-08	1.1E-11	3.6E-12	-	-	-	-	-	-	-	-	-	-	3.0E-06	1.9E-05
Benzo(g,h,i)perylene	4.1E-07	1.3E-07	2.1E-07	6.8E-08	1.7E-11	5.4E-12	-	-	-	-	-	-	-	-	-	-	3.4E-06	2.2E-05
Benzo(k)fluoranthene	2.4E-07	7.7E-08	1.2E-07	4.0E-08	9.9E-12	3.2E-12	-	-	-	-	-	-	-	-	-	-	3.6E-06	2.3E-05
Chrysene	3.3E-07	1.0E-07	1.7E-07	5.4E-08	1.4E-11	4.3E-12	-	-	-	-	-	-	-	-	-	-	7.4E-06	4.7E-05
Dibenz(a,h)anthracene	1.4E-07	4.6E-08	7.4E-08	2.4E-08	5.9E-12	1.9E-12	-	-	-	-	-	-	-	-	-	-	7.6E-07	4.8E-06
Fluoranthene	5.9E-07	1.9E-07	3.1E-07	9.9E-08	2.5E-11	7.8E-12	-	-	-	-	-	-	-	-	-	-	3.2E-05	2.0E-04
Fluorene	9.5E-07	3.0E-07	4.9E-07	1.6E-07	3.9E-11	1.3E-11	-	-	-	-	-	-	-	-	-	-	5.1E-05	3.2E-04
Indeno(1,2,3-cd)pyrene	2.3E-07	7.3E-08	1.2E-07	3.8E-08	9.4E-12	3.0E-12	-	-	-	-	-	-	-	-	-	-	7.0E-07	4.4E-06
Naphthalene	2.1E-07	6.9E-08	1.1E-07	3.6E-08	8.8E-12	2.8E-12	-	-	-	-	-	-	-	-	-	-	-	-
Perylene	2.4E-07	7.8E-08	1.3E-07	4.0E-08	1.0E-11	3.2E-12	-	-	-	-	-	-	-	-	-	-	5.0E-06	3.2E-05
Phenanthrene	2.5E-06	8.1E-07	1.3E-06	4.2E-07	1.0E-10	3.3E-11	-	-	-	-	-	-	-	-	-	-	2.8E-04	1.8E-03
Pyrene	5.1E-07	1.6E-07	2.6E-07	8.4E-08	2.1E-11	6.7E-12	-	-	-	-	-	-	-	-	-	-	3.1E-05	1.9E-04
Total Petroleum Hydrocarbons																		
C08-C11(Gasoline Range)	2.9E-05	9.4E-06	1.2E-05	3.8E-06	-	-	-	-	-	-	-	-	-	-	-	-	1.8E-03	1.2E-02
C11-C14(Kerosene Range)	3.0E-05	9.5E-06	1.5E-05	4.9E-06	1.2E-09	3.9E-10	-	-	-	-	-	-	-	-	-	-	3.5E-03	2.3E-02
C14-C20(Diesel Range)	3.5E-04	1.1E-04	1.8E-04	5.8E-05	1.4E-08	4.6E-09	-	-	-	-	-	-	-	-	1.1E-03	3.4E-04	2.2E-02	1.4E-01
C20-C30(Lubricant Oil Range)	1.9E-03	6.0E-04	9.7E-04	3.1E-04	7.7E-08	2.5E-08	-	-	-	-	-	-	-	-	-	-	3.0E-02	1.9E-01

Estimated Human Intake for the Adult Resident
Old Conservation Yard RFI Site

Reasonable Maximum Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation of Indoor Air$_{s}$		Inhalation Ambient Air$_{s}$		Inhalation of Indoor Air$_{gw}$		Inhalation Ambient Air$_{gw}$		Domestic Grounder Use		Plant Consumption	
	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)
PCDD/PCDFs																		
2,3,7,8-TCDD	2.4E-12	7.7E-13	2.9E-13	9.3E-14	1.0E-16	3.2E-17	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,7,8-PeCDD	7.1E-11	2.3E-11	8.5E-12	2.7E-12	2.9E-15	9.4E-16	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,4,7,8-HxCDD	7.2E-11	2.3E-11	8.6E-12	2.8E-12	3.0E-15	9.5E-16	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,6,7,8-HxCDD	1.4E-10	4.5E-11	1.7E-11	5.4E-12	5.8E-15	1.9E-15	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,7,8,9-HxCDD	1.2E-10	3.8E-11	1.4E-11	4.5E-12	4.9E-15	1.6E-15	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,4,6,7,8-HpCDD	4.0E-09	1.3E-09	4.8E-10	1.5E-10	1.6E-13	5.2E-14	-	-	-	-	-	-	-	-	-	-	-	-
OCDD	1.1E-08	3.6E-09	1.4E-09	4.3E-10	4.7E-13	1.5E-13	-	-	-	-	-	-	-	-	-	-	-	-
2,3,7,8-TCDF	1.4E-11	4.4E-12	1.6E-12	5.2E-13	5.7E-16	1.8E-16	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,7,8-PeCDF	1.3E-11	4.2E-12	1.6E-12	5.0E-13	5.4E-16	1.7E-16	-	-	-	-	-	-	-	-	-	-	-	-
2,3,4,7,8-PeCDF	4.1E-11	1.3E-11	4.9E-12	1.6E-12	1.7E-15	5.4E-16	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,4,7,8-HxCDF	8.5E-11	2.7E-11	1.0E-11	3.3E-12	3.5E-15	1.1E-15	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,6,7,8-HxCDF	1.4E-11	4.4E-12	1.6E-12	5.2E-13	5.7E-16	1.8E-16	-	-	-	-	-	-	-	-	-	-	-	-
2,3,4,6,7,8-HxCDF	4.0E-11	1.3E-11	4.7E-12	1.5E-12	1.6E-15	5.2E-16	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,7,8,9-HxCDF	1.4E-11	4.4E-12	1.7E-12	5.3E-13	5.7E-16	1.8E-16	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,4,6,7,8-HpCDF	1.6E-10	5.1E-11	1.9E-11	6.2E-12	6.6E-15	2.1E-15	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,4,7,8,9-HpCDF	4.1E-11	1.3E-11	5.0E-12	1.6E-12	1.7E-15	5.5E-16	-	-	-	-	-	-	-	-	-	-	-	-
OCDF	5.6E-10	1.8E-10	6.7E-11	2.2E-11	2.3E-14	7.4E-15	-	-	-	-	-	-	-	-	-	-	-	-
PCBs																		
Aroclor-1254	7.4E-06	2.4E-06	4.1E-06	1.3E-06	3.1E-10	9.8E-11	-	-	-	-	-	-	-	-	-	-	8.0E-05	5.1E-04
Aroclor-1260	2.0E-04	6.3E-05	1.1E-04	3.5E-05	8.1E-09	2.6E-09	-	-	-	-	-	-	-	-	-	-	1.1E-03	7.0E-03
PCB-105	1.6E-08	5.2E-09	9.0E-09	2.9E-09	6.7E-13	2.1E-13	-	-	-	-	-	-	-	-	-	-	1.8E-07	1.1E-06
PCB-114	2.9E-10	9.2E-11	1.6E-10	5.2E-11	1.2E-14	3.8E-15	-	-	-	-	-	-	-	-	-	-	3.1E-09	2.0E-08
PCB-118	3.2E-08	1.0E-08	1.8E-08	5.8E-09	1.3E-12	4.3E-13	-	-	-	-	-	-	-	-	-	-	3.5E-07	2.2E-06
PCB-123	4.6E-10	1.5E-10	2.6E-10	8.2E-11	1.9E-14	6.0E-15	-	-	-	-	-	-	-	-	-	-	5.0E-09	3.2E-08
PCB-126	1.3E-09	4.0E-10	7.0E-10	2.2E-10	5.2E-14	1.7E-14	-	-	-	-	-	-	-	-	-	-	1.4E-08	8.7E-08
PCB-156	1.1E-08	3.4E-09	6.0E-09	1.9E-09	4.4E-13	1.4E-13	-	-	-	-	-	-	-	-	-	-	1.2E-07	7.4E-07
PCB-157	4.8E-09	1.5E-09	2.7E-09	8.6E-10	2.0E-13	6.4E-14	-	-	-	-	-	-	-	-	-	-	5.2E-08	3.3E-07
PCB-167	8.4E-09	2.7E-09	4.7E-09	1.5E-09	3.5E-13	1.1E-13	-	-	-	-	-	-	-	-	-	-	9.1E-08	5.8E-07
PCB-169	1.3E-10	4.0E-11	7.0E-11	2.2E-11	5.2E-15	1.7E-15	-	-	-	-	-	-	-	-	-	-	1.4E-09	8.7E-09
PCB-189	1.3E-09	4.0E-10	7.0E-10	2.2E-10	5.2E-14	1.7E-14	-	-	-	-	-	-	-	-	-	-	1.4E-08	8.7E-08
PCB-77	2.5E-09	8.0E-10	1.4E-09	4.5E-10	1.0E-13	3.3E-14	-	-	-	-	-	-	-	-	-	-	1.6E-08	9.9E-08
PCB-81	4.4E-10	1.4E-10	2.5E-10	7.9E-11	1.8E-14	5.9E-15	-	-	-	-	-	-	-	-	-	-	2.7E-09	1.8E-08

Notes:

Inhalation Indoor Air$_{s\text{-}gw}$ - Exposure associated with indoor air concentrations of COPCs modeled from soil vapor, soil, or groundwater.

Inhalation Ambient Air$_{s\text{-}gw}$ - Exposure associated with ambient air concentrations of COPCs modeled from soil or groundwater.

ADD - Average daily dose, as defined in the SRAM (MWH 2005).

LADD - Lifetime average daily dose, as defined in the SRAM (MWH 2005).

The chemicals presented in this table are comprehensive for all media sampled. Not all chemicals were analyzed for or detected in all media.

VOC - volatile organic compound

SVOC - semi-volatile organic compound

PCB - polychlorinated biphenyls

COPC - chemical of potential concern

"-" indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).

mg/kg-day - milligrams per kilogram day

Spreadsheet C2-34 (1 of 4)

Estimated Human Intake for the Child Recreator
Old Conservation Yard RFI Site

Central Tendancy Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation Ambient Air		Inhalation Ambient Air$_{gw}$	
	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)
Inorganic Compounds										
Antimony	-	-	-	-	-	-	-	-	-	-
Barium	-	-	-	-	-	-	-	-	-	-
Boron	3.9E-06	3.1E-07	6.6E-08	5.3E-09	7.2E-11	5.8E-12	-	-	-	-
Cadmium	4.7E-07	3.8E-08	8.0E-10	6.4E-11	8.7E-12	6.9E-13	-	-	-	-
Copper	-	-	-	-	-	-	-	-	-	-
Lead	1.6E-05	1.2E-06	2.6E-07	2.1E-08	2.8E-10	2.3E-11	-	-	-	-
Mercury	4.6E-07	3.7E-08	7.7E-09	6.2E-10	8.4E-12	6.7E-13	-	-	-	-
Nitrate	-	-	-	-	-	-	-	-	-	-
Silver	7.8E-07	6.3E-08	1.3E-08	1.1E-09	1.4E-11	1.2E-12	-	-	-	-
Thallium	7.9E-07	6.3E-08	1.3E-08	1.1E-09	1.4E-11	1.2E-12	-	-	-	-
Zinc	6.1E-05	4.9E-06	1.0E-06	8.2E-08	1.1E-09	8.9E-11	-	-	-	-
Energetic Constituents										
VOCs										
1,1,1-Trichloroethane	2.7E-09	2.2E-10	4.6E-10	3.7E-11	-	-	5.1E-07	4.1E-08	-	-
1,1,2-Trichloro-1,2,2-trifluoroethane	1.1E-08	9.0E-10	1.9E-09	1.5E-10	-	-	1.3E-06	1.1E-07	-	-
1,1-Dichloroethane	-	-	-	-	-	-	-	-	-	-
1,1-Dichloroethene	2.9E-09	2.3E-10	4.8E-10	3.9E-11	-	-	5.6E-07	4.5E-08	-	-
2-Butanone	2.0E-08	1.6E-09	3.4E-09	2.7E-10	-	-	-	-	-	-
Acetone	3.2E-07	2.6E-08	5.4E-08	4.3E-09	-	-	-	-	-	-
Benzene	1.0E-09	8.3E-11	1.7E-10	1.4E-11	-	-	3.9E-07	3.1E-08	-	-
Carbon disulfide	-	-	-	-	-	-	-	-	-	-
Chloromethane	-	-	-	-	-	-	-	-	5.3E-09	4.2E-10
cis-1,2-Dichloroethene	-	-	-	-	-	-	-	-	1.3E-09	1.0E-10
Ethylbenzene	1.0E-09	8.3E-11	1.7E-10	1.4E-11	-	-	3.0E-07	2.4E-08	-	-
m,p-Xylene	3.0E-09	2.4E-10	5.0E-10	4.0E-11	-	-	6.9E-07	5.5E-08	-	-
Methylene chloride	3.7E-08	3.0E-09	6.3E-09	5.0E-10	-	-	2.2E-05	1.8E-06	-	-
o-Xylene	7.1E-10	5.7E-11	1.2E-10	9.6E-12	-	-	1.6E-07	1.3E-08	-	-
p-Isopropyltoluene	1.7E-09	1.4E-10	2.9E-10	2.3E-11	-	-	-	-	-	-
Toluene	1.4E-09	1.1E-10	2.4E-10	1.9E-11	-	-	3.9E-07	3.1E-08	-	-
Trichloroethene	2.7E-09	2.2E-10	4.6E-10	3.7E-11	-	-	2.6E-06	2.0E-07	4.4E-08	3.5E-09
SVOCs										
1-Methylnaphthalene	1.1E-08	8.7E-10	2.4E-09	1.9E-10	2.0E-13	1.6E-14	-	-	-	-
2-Methylnaphthalene	1.6E-07	1.2E-08	3.4E-08	2.7E-09	2.9E-12	2.3E-13	-	-	-	-
Acenaphthene	1.5E-07	1.2E-08	3.4E-08	2.7E-09	2.8E-12	2.3E-13	-	-	-	-
Acenaphthylene	3.7E-08	2.9E-09	8.0E-09	6.4E-10	6.7E-13	5.4E-14	-	-	-	-
Anthracene	1.1E-07	8.7E-09	2.4E-08	1.9E-09	2.0E-12	1.6E-13	-	-	-	-
Benzo(a)anthracene	3.5E-08	2.8E-09	7.7E-09	6.1E-10	6.4E-13	5.2E-14	-	-	-	-
Benzo(a)pyrene	3.3E-08	2.6E-09	7.2E-09	5.8E-10	6.1E-13	4.9E-14	-	-	-	-
Benzo(e)pyrene	6.5E-08	5.2E-09	1.4E-08	1.1E-09	1.2E-12	9.5E-14	-	-	-	-
Benzo(b)fluoranthene	4.0E-08	3.2E-09	8.8E-09	7.0E-10	7.3E-13	5.9E-14	-	-	-	-
Benzo(g,h,i)perylene	7.6E-08	6.1E-09	1.7E-08	1.3E-09	1.4E-12	1.1E-13	-	-	-	-
Benzo(k)fluoranthene	3.3E-08	2.6E-09	7.2E-09	5.8E-10	6.1E-13	4.8E-14	-	-	-	-
Chrysene	5.4E-08	4.3E-09	1.2E-08	9.5E-10	9.9E-13	7.9E-14	-	-	-	-
Dibenz(a,h)anthracene	2.4E-08	1.9E-09	5.2E-09	4.1E-10	4.3E-13	3.5E-14	-	-	-	-
Fluoranthene	8.2E-08	6.6E-09	1.8E-08	1.4E-09	1.5E-12	1.2E-13	-	-	-	-
Fluorene	1.5E-07	1.2E-08	3.3E-08	2.7E-09	2.8E-12	2.2E-13	-	-	-	-
Indeno(1,2,3-cd)pyrene	2.9E-08	2.3E-09	6.3E-09	5.1E-10	5.3E-13	4.3E-14	-	-	-	-
Naphthalene	5.7E-08	4.6E-09	1.2E-08	1.0E-09	1.0E-12	8.4E-14	-	-	-	-
Perylene	3.7E-08	2.9E-09	8.1E-09	6.4E-10	6.8E-13	5.4E-14	-	-	-	-
Phenanthrene	4.0E-07	3.2E-08	8.8E-08	7.0E-09	7.4E-12	5.9E-13	-	-	-	-
Pyrene	8.1E-08	6.5E-09	1.8E-08	1.4E-09	1.5E-12	1.2E-13	-	-	-	-
Total Petroleum Hydrocarbons										
C08-C11(Gasoline Range)	8.8E-06	7.1E-07	1.5E-06	1.2E-07	-	-	-	-	-	-
C11-C14(Kerosene Range)	1.0E-05	8.1E-07	2.2E-06	1.8E-07	1.9E-10	1.5E-11	-	-	-	-
C14-C20(Diesel Range)	5.9E-05	4.8E-06	1.3E-05	1.0E-06	1.1E-09	8.7E-11	-	-	-	-
C20-C30(Lubricant Oil Range)	2.7E-04	2.1E-05	5.8E-05	4.7E-06	4.9E-09	3.9E-10	-	-	-	-

Spreadsheet C2-34 (2 of 4)

Estimated Human Intake for the Child Recreator
Old Conservation Yard RFI Site

Central Tendancy Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation of Indoor Air		Inhalation Ambient Air$_{t-gw}$	
	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)
PCDD/PCDFs										
2,3,7,8-TCDD	9.2E-13	7.4E-14	4.7E-14	3.7E-15	1.7E-17	1.4E-18	-	-	-	-
1,2,3,7,8-PeCDD	6.0E-12	4.8E-13	3.0E-13	2.4E-14	1.1E-16	8.8E-18	-	-	-	-
1,2,3,4,7,8-HxCDD	1.3E-11	1.1E-12	6.7E-13	5.3E-14	2.4E-16	1.9E-17	-	-	-	-
1,2,3,6,7,8-HxCDD	1.8E-11	1.5E-12	9.2E-13	7.4E-14	3.4E-16	2.7E-17	-	-	-	-
1,2,3,7,8,9-HxCDD	1.6E-11	1.3E-12	8.3E-13	6.6E-14	3.0E-16	2.4E-17	-	-	-	-
1,2,3,4,6,7,8-HpCDD	4.5E-10	3.6E-11	2.2E-11	1.8E-12	8.2E-15	6.5E-16	-	-	-	-
OCDD	3.4E-09	2.7E-10	1.7E-10	1.4E-11	6.2E-14	4.9E-15	-	-	-	-
2,3,7,8-TCDF	2.0E-12	1.6E-13	1.0E-13	8.1E-15	3.7E-17	2.9E-18	-	-	-	-
1,2,3,7,8-PeCDF	1.7E-12	1.3E-13	8.4E-14	6.7E-15	3.0E-17	2.4E-18	-	-	-	-
2,3,4,7,8-PeCDF	4.7E-12	3.7E-13	2.4E-13	1.9E-14	8.6E-17	6.8E-18	-	-	-	-
1,2,3,4,7,8-HxCDF	1.2E-11	9.4E-13	5.9E-13	4.7E-14	2.2E-16	1.7E-17	-	-	-	-
1,2,3,6,7,8-HxCDF	4.5E-12	3.6E-13	2.3E-13	1.8E-14	8.2E-17	6.6E-18	-	-	-	-
2,3,4,6,7,8-HxCDF	4.8E-12	3.8E-13	2.4E-13	1.9E-14	8.8E-17	7.0E-18	-	-	-	-
1,2,3,7,8,9-HxCDF	2.1E-12	1.7E-13	1.1E-13	8.5E-15	3.8E-17	3.1E-18	-	-	-	-
1,2,3,4,6,7,8-HpCDF	5.1E-11	4.0E-12	2.5E-12	2.0E-13	9.3E-16	7.4E-17	-	-	-	-
1,2,3,4,7,8,9-HpCDF	6.6E-12	5.3E-13	3.3E-13	2.7E-14	1.2E-16	9.7E-18	-	-	-	-
OCDF	1.7E-10	1.3E-11	8.3E-12	6.7E-13	3.0E-15	2.4E-16	-	-	-	-
PCBs										
Aroclor-1254	1.1E-06	9.0E-08	2.6E-07	2.1E-08	2.1E-11	1.6E-12	-	-	-	-
Aroclor-1260	1.2E-05	9.7E-07	2.9E-06	2.3E-07	2.2E-10	1.8E-11	-	-	-	-
PCB-105	1.0E-09	8.1E-11	2.4E-10	1.9E-11	1.9E-14	1.5E-15	-	-	-	-
PCB-114	1.9E-11	1.5E-12	4.4E-12	3.5E-13	3.4E-16	2.8E-17	-	-	-	-
PCB-118	2.0E-09	1.6E-10	4.8E-10	3.8E-11	3.7E-14	3.0E-15	-	-	-	-
PCB-123	2.9E-11	2.3E-12	6.7E-12	5.4E-13	5.3E-16	4.2E-17	-	-	-	-
PCB-126	7.9E-11	6.3E-12	1.8E-11	1.5E-12	1.4E-15	1.2E-16	-	-	-	-
PCB-156	6.7E-10	5.4E-11	1.6E-10	1.3E-11	1.2E-14	9.9E-16	-	-	-	-
PCB-157	3.0E-10	2.4E-11	7.0E-11	5.6E-12	5.5E-15	4.4E-16	-	-	-	-
PCB-167	5.2E-10	4.2E-11	1.2E-10	9.8E-12	9.6E-15	7.6E-16	-	-	-	-
PCB-169	7.8E-12	6.2E-13	1.8E-12	1.5E-13	1.4E-16	1.1E-17	-	-	-	-
PCB-189	7.8E-11	6.2E-12	1.8E-11	1.5E-12	1.4E-15	1.1E-16	-	-	-	-
PCB-77	1.6E-10	1.3E-11	3.7E-11	3.0E-12	2.9E-15	2.3E-16	-	-	-	-
PCB-81	2.8E-11	2.2E-12	6.6E-12	5.2E-13	5.1E-16	4.1E-17	-	-	-	-

Spreadsheet C2-34 (3 of 4)

Estimated Human Intake for the Child Recreator
Old Conservation Yard RFI Site

Reasonable Maximum Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation of Indoor Air		Inhalation Ambient Air$_{t-gw}$	
	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)
Inorganic Compounds										
Antimony	-	-	-	-	-	-	-	-	-	-
Barium	-	-	-	-	-	-	-	-	-	-
Boron	1.9E-05	1.5E-06	5.4E-07	4.3E-08	3.5E-10	2.8E-11	-	-	-	-
Cadmium	3.6E-06	2.9E-07	1.0E-08	8.1E-10	6.7E-11	5.3E-12	-	-	-	-
Copper	-	-	-	-	-	-	-	-	-	-
Lead	7.6E-05	6.1E-06	2.1E-06	1.7E-07	1.4E-09	1.1E-10	-	-	-	-
Mercury	1.2E-05	9.5E-07	3.3E-07	2.7E-08	2.2E-10	1.7E-11	-	-	-	-
Nitrate	-	-	-	-	-	-	-	-	-	-
Silver	6.5E-06	5.2E-07	1.8E-07	1.5E-08	1.2E-10	9.5E-12	-	-	-	-
Thallium	6.2E-06	5.0E-07	1.7E-07	1.4E-08	1.1E-10	9.1E-12	-	-	-	-
Zinc	2.7E-04	2.2E-05	7.5E-06	6.0E-07	4.9E-09	3.9E-10	-	-	-	-
VOCs										
1,1,1-Trichloroethane	2.0E-08	1.6E-09	5.6E-09	4.5E-10	-	-	2.0E-06	1.6E-07	-	-
1,1,2-Trichloro-1,2,2-trifluoroethane	7.5E-08	6.0E-09	2.1E-08	1.7E-09	-	-	5.4E-06	4.3E-07	-	-
1,1-Dichloroethane	-	-	-	-	-	-	-	-	-	-
1,1-Dichloroethene	2.0E-08	1.6E-09	5.6E-09	4.5E-10	-	-	2.2E-06	1.8E-07	-	-
2-Butanone	4.0E-08	3.2E-09	1.1E-08	9.0E-10	-	-	-	-	-	-
Acetone	1.3E-05	1.0E-06	3.6E-06	2.9E-07	-	-	-	-	-	-
Benzene	9.1E-09	7.2E-10	2.5E-09	2.0E-10	-	-	1.6E-06	1.3E-07	-	-
Carbon disulfide	-	-	-	-	-	-	-	-	-	-
Chloromethane	-	-	-	-	-	-	-	-	2.1E-08	1.7E-09
cis-1,2-Dichloroethene	-	-	-	-	-	-	-	-	5.2E-09	4.1E-10
Ethylbenzene	9.1E-09	7.2E-10	2.5E-09	2.0E-10	-	-	1.2E-06	9.5E-08	-	-
m,p-Xylene	2.6E-08	2.1E-09	7.4E-09	5.9E-10	-	-	2.7E-06	2.2E-07	-	-
Methylene chloride	8.9E-07	7.2E-08	2.5E-07	2.0E-08	-	-	9.0E-05	7.2E-06	-	-
o-Xylene	6.2E-09	5.0E-10	1.7E-09	1.4E-10	-	-	6.3E-07	5.0E-08	-	-
p-Isopropyltoluene	6.9E-09	5.6E-10	1.9E-09	1.6E-10	-	-	-	-	-	-
Toluene	1.3E-08	1.0E-09	3.6E-09	2.9E-10	-	-	1.6E-06	1.2E-07	-	-
Trichloroethene	2.0E-08	1.6E-09	5.6E-09	4.5E-10	-	-	1.0E-05	8.2E-07	1.7E-07	1.4E-08
SVOCs										
1-Methylnaphthalene	4.9E-08	3.9E-09	1.8E-08	1.4E-09	8.9E-13	7.1E-14	-	-	-	-
2-Methylnaphthalene	2.0E-06	1.6E-07	7.4E-07	6.0E-08	3.7E-11	3.0E-12	-	-	-	-
Acenaphthene	2.6E-06	2.0E-07	9.3E-07	7.4E-08	4.7E-11	3.7E-12	-	-	-	-
Acenaphthylene	5.2E-07	4.1E-08	1.9E-07	1.5E-08	9.5E-12	7.6E-13	-	-	-	-
Anthracene	1.7E-06	1.4E-07	6.2E-07	5.0E-08	3.1E-11	2.5E-12	-	-	-	-
Benzo(a)anthracene	6.7E-07	5.3E-08	2.4E-07	1.9E-08	1.2E-11	9.8E-13	-	-	-	-
Benzo(a)pyrene	6.4E-07	5.1E-08	2.3E-07	1.9E-08	1.2E-11	9.4E-13	-	-	-	-
Benzo(b)fluoranthene	7.2E-07	5.8E-08	2.6E-07	2.1E-08	1.3E-11	1.1E-12	-	-	-	-
Benzo(g,h,i)perylene	1.1E-06	8.8E-08	4.0E-07	3.2E-08	2.0E-11	1.6E-12	-	-	-	-
Benzo(k)fluoranthene	6.4E-07	5.1E-08	2.3E-07	1.9E-08	1.2E-11	9.4E-13	-	-	-	-
Chrysene	8.7E-07	7.0E-08	3.2E-07	2.5E-08	1.6E-11	1.3E-12	-	-	-	-
Dibenz(a,h)anthracene	3.8E-07	3.1E-08	1.4E-07	1.1E-08	7.0E-12	5.6E-13	-	-	-	-
Fluoranthene	1.6E-06	1.3E-07	5.8E-07	4.6E-08	2.9E-11	2.3E-12	-	-	-	-
Fluorene	2.5E-06	2.0E-07	9.2E-07	7.4E-08	4.6E-11	3.7E-12	-	-	-	-
Indeno(1,2,3-cd)pyrene	6.0E-07	4.8E-08	2.2E-07	1.8E-08	1.1E-11	8.9E-13	-	-	-	-
Naphthalene	5.7E-07	4.6E-08	2.1E-07	1.7E-08	1.0E-11	8.4E-13	-	-	-	-
Phenanthrene	6.8E-06	5.4E-07	2.5E-06	2.0E-07	1.2E-10	9.9E-12	-	-	-	-
Pyrene	1.4E-06	1.1E-07	4.9E-07	3.9E-08	2.5E-11	2.0E-12	-	-	-	-
Total Petroleum Hydrocarbons										
C08-C11(Gasoline Range)	7.9E-05	6.3E-06	2.2E-05	1.8E-06	-	-	-	-	-	-
C11-C14(Kerosene Range)	7.9E-05	6.4E-06	2.9E-05	2.3E-06	1.5E-09	1.2E-10	-	-	-	-
C14-C20(Diesel Range)	9.3E-04	7.5E-05	3.4E-04	2.7E-05	1.7E-08	1.4E-09	-	-	-	-
C20-C30(Lubricant Oil Range)	5.0E-03	4.0E-04	1.8E-03	1.5E-04	9.2E-08	7.3E-09	-	-	-	-

Spreadsheet C2-34 (4 of 4)

Estimated Human Intake for the Child Recreator
Old Conservation Yard RFI Site

Reasonable Maximum Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation of Indoor Air		Inhalation Ambient Air$_{s-gw}$	
	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)
PCDD/PCDFs										
2,3,7,8-TCDD	6.5E-12	5.2E-13	5.4E-13	4.3E-14	1.2E-16	9.5E-18	-	-	-	-
1,2,3,7,8-PeCDD	1.9E-10	1.5E-11	1.6E-11	1.3E-12	3.5E-15	2.8E-16	-	-	-	-
1,2,3,4,7,8-HxCDD	1.9E-10	1.5E-11	1.6E-11	1.3E-12	3.5E-15	2.8E-16	-	-	-	-
1,2,3,6,7,8-HxCDD	3.7E-10	3.0E-11	3.1E-11	2.5E-12	6.9E-15	5.5E-16	-	-	-	-
1,2,3,7,8,9-HxCDD	3.2E-10	2.5E-11	2.6E-11	2.1E-12	5.8E-15	4.6E-16	-	-	-	-
1,2,3,4,6,7,8-HpCDD	1.1E-08	8.5E-10	8.9E-10	7.1E-11	1.9E-13	1.6E-14	-	-	-	-
OCDD	3.0E-08	2.4E-09	2.5E-09	2.0E-10	5.5E-13	4.4E-14	-	-	-	-
2,3,7,8-TCDF	3.7E-11	2.9E-12	3.1E-12	2.5E-13	6.7E-16	5.4E-17	-	-	-	-
1,2,3,7,8-PeCDF	3.5E-11	2.8E-12	2.9E-12	2.3E-13	6.4E-16	5.1E-17	-	-	-	-
2,3,4,7,8-PeCDF	1.1E-10	8.7E-12	9.2E-12	7.3E-13	2.0E-15	1.6E-16	-	-	-	-
1,2,3,4,7,8-HxCDF	2.3E-10	1.8E-11	1.9E-11	1.5E-12	4.2E-15	3.3E-16	-	-	-	-
1,2,3,6,7,8-HxCDF	3.7E-11	2.9E-12	3.1E-12	2.5E-13	6.7E-16	5.4E-17	-	-	-	-
2,3,4,6,7,8-HxCDF	1.1E-10	8.4E-12	8.9E-12	7.1E-13	1.9E-15	1.5E-16	-	-	-	-
1,2,3,7,8,9-HxCDF	3.7E-11	3.0E-12	3.1E-12	2.5E-13	6.8E-16	5.4E-17	-	-	-	-
1,2,3,4,6,7,8-HpCDF	4.3E-10	3.4E-11	3.6E-11	2.9E-12	7.9E-15	6.3E-16	-	-	-	-
1,2,3,4,7,8,9-HpCDF	1.1E-10	8.9E-12	9.3E-12	7.4E-13	2.0E-15	1.6E-16	-	-	-	-
OCDF	1.5E-09	1.2E-10	1.3E-10	1.0E-11	2.7E-14	2.2E-15	-	-	-	-
PCBs										
Aroclor-1254	2.0E-05	1.6E-06	7.7E-06	6.2E-07	3.6E-10	2.9E-11	-	-	-	-
Aroclor-1260	5.3E-04	4.2E-05	2.1E-04	1.6E-05	9.6E-09	7.7E-10	-	-	-	-
PCB-105	4.3E-08	3.4E-09	1.7E-08	1.4E-09	7.9E-13	6.3E-14	-	-	-	-
PCB-114	7.7E-10	6.1E-11	3.0E-10	2.4E-11	1.4E-14	1.1E-15	-	-	-	-
PCB-118	8.6E-08	6.9E-09	3.4E-08	2.7E-09	1.6E-12	1.3E-13	-	-	-	-
PCB-123	1.2E-09	9.8E-11	4.8E-10	3.8E-11	2.2E-14	1.8E-15	-	-	-	-
PCB-126	3.3E-09	2.7E-10	1.3E-09	1.1E-10	6.1E-14	4.9E-15	-	-	-	-
PCB-156	2.9E-08	2.3E-09	1.1E-08	9.0E-10	5.3E-13	4.2E-14	-	-	-	-
PCB-157	1.3E-08	1.0E-09	5.1E-09	4.0E-10	2.4E-13	1.9E-14	-	-	-	-
PCB-167	2.2E-08	1.8E-09	8.8E-09	7.0E-10	4.1E-13	3.3E-14	-	-	-	-
PCB-169	3.3E-10	2.7E-11	1.3E-10	1.0E-11	6.1E-15	4.9E-16	-	-	-	-
PCB-189	3.3E-09	2.7E-10	1.3E-09	1.0E-10	6.1E-14	4.9E-15	-	-	-	-
PCB-77	6.7E-09	5.4E-10	2.6E-09	2.1E-10	1.2E-13	9.8E-15	-	-	-	-
PCB-81	1.2E-09	9.5E-11	4.6E-10	3.7E-11	2.2E-14	1.7E-15	-	-	-	-

Notes:
Inhalation Ambient Air$_{s-gw}$ - Exposure associated with ambient air concentrations of COPCs modeled from soil or groundwater.
ADD - Average daily dose, as defined in the SRAM (MWH 2005).
LADD - Lifetime average daily dose, as defined in the SRAM (MWH 2005).
The chemicals presented in this table are comprehensive for all media sampled. Not all chemicals were analyzed for or detected in all media.
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyls
COPC - chemical of potential concern
"-" indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
mg/kg-day - milligrams per kilogram per day

Spreadsheet C2-33 (1 of 4)

Estimated Human Intake for the Adult Recreator
Old Conservation Yard RFI Site

Central Tendancy Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation Ambient Air_s		Inhalation Ambient Air_{gw}	
	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)
Inorganic Compounds										
Antimony	-	-	-	-	-	-	-	-	-	-
Barium	-	-	-	-	-	-	-	-	-	-
Boron	2.1E-07	2.5E-08	2.4E-09	2.9E-10	9.1E-12	1.1E-12	-	-	-	-
Cadmium	2.5E-08	3.0E-09	2.9E-11	3.5E-12	1.1E-12	1.3E-13	-	-	-	-
Copper	-	-	-	-	-	-	-	-	-	-
Lead	8.3E-07	1.0E-07	9.5E-09	1.1E-09	3.6E-11	4.3E-12	-	-	-	-
Mercury	2.5E-08	3.0E-09	2.8E-10	3.4E-11	1.1E-12	1.3E-13	-	-	-	-
Nitrate	-	-	-	-	-	-	-	-	-	-
Silver	4.2E-08	5.0E-09	4.8E-10	5.8E-11	1.8E-12	2.2E-13	-	-	-	-
Thallium	4.2E-08	5.1E-09	4.8E-10	5.8E-11	1.8E-12	2.2E-13	-	-	-	-
Zinc	3.3E-06	3.9E-07	3.7E-08	4.4E-09	-	-	-	-	-	-
VOCs										
1,1,1-Trichloroethane	1.5E-10	1.8E-11	1.7E-11	2.0E-12	-	-	6.4E-08	7.7E-09	-	-
1,1,2-Trichloro-1,2,2-trifluoroethane	6.0E-10	7.2E-11	6.8E-11	8.2E-12	-	-	1.7E-07	2.0E-08	-	-
1,1-Dichloroethane	-	-	-	-	-	-	-	-	-	-
1,1-Dichloroethene	1.5E-10	1.9E-11	1.8E-11	2.1E-12	-	-	7.1E-08	8.5E-09	-	-
2-Butanone	1.1E-09	1.3E-10	1.2E-10	1.5E-11	-	-	-	-	-	-
Acetone	1.7E-08	2.1E-09	2.0E-09	2.4E-10	-	-	-	-	-	-
Benzene	5.5E-11	6.6E-12	6.3E-12	7.6E-13	-	-	5.0E-08	6.0E-09	-	-
Chloromethane	-	-	-	-	-	-	-	-	6.7E-10	8.0E-11
cis-1,2-Dichloroethene	-	-	-	-	-	-	-	-	1.6E-10	2.0E-11
Ethylbenzene	5.5E-11	6.6E-12	6.3E-12	7.6E-13	-	-	3.8E-08	4.5E-09	-	-
m,p-Xylene	1.6E-10	1.9E-11	1.8E-11	2.2E-12	-	-	8.7E-08	1.0E-08	-	-
Methylene chloride	2.0E-09	2.4E-10	2.3E-10	2.7E-11	-	-	2.8E-06	3.4E-07	-	-
o-Xylene	3.8E-11	4.6E-12	4.4E-12	5.2E-13	-	-	2.0E-08	2.4E-09	-	-
p-Isopropyltoluene	9.3E-11	1.1E-11	1.1E-11	1.3E-12	-	-	-	-	-	-
Toluene	7.6E-11	9.1E-12	8.6E-12	1.0E-12	-	-	4.9E-08	5.9E-09	-	-
Trichloroethene	1.5E-10	1.8E-11	1.7E-11	2.0E-12	-	-	3.2E-07	3.9E-08	5.5E-09	6.6E-10
SVOCs										
1-Methylnaphthalene	5.8E-10	7.0E-11	8.6E-11	1.0E-11	2.5E-14	3.0E-15	-	-	-	-
2-Methylnaphthalene	8.3E-09	1.0E-09	1.2E-09	1.5E-10	3.6E-13	4.3E-14	-	-	-	-
Acenaphthene	8.2E-09	9.9E-10	1.2E-09	1.5E-10	3.6E-13	4.3E-14	-	-	-	-
Acenaphthylene	2.0E-09	2.4E-10	2.9E-10	3.5E-11	8.5E-14	1.0E-14	-	-	-	-
Anthracene	5.8E-09	7.0E-10	8.6E-10	1.0E-10	2.5E-13	3.0E-14	-	-	-	-
Benzo(a)anthracene	1.9E-09	2.3E-10	2.8E-10	3.4E-11	8.2E-14	9.8E-15	-	-	-	-
Benzo(a)pyrene	1.8E-09	2.1E-10	2.6E-10	3.2E-11	7.7E-14	9.2E-15	-	-	-	-
Benzo(e)pyrene	3.5E-09	4.2E-10	5.1E-10	6.2E-11	1.5E-13	1.8E-14	-	-	-	-
Benzo(b)fluoranthene	2.1E-09	2.6E-10	3.2E-10	3.8E-11	9.3E-14	1.1E-14	-	-	-	-
Benzo(g,h,i)perylene	4.1E-09	4.9E-10	6.1E-10	7.3E-11	1.8E-13	2.1E-14	-	-	-	-
Benzo(k)fluoranthene	1.8E-09	2.1E-10	2.6E-10	3.1E-11	7.7E-14	9.2E-15	-	-	-	-
Chrysene	2.9E-09	3.5E-10	4.3E-10	5.2E-11	1.3E-13	1.5E-14	-	-	-	-
Dibenz(a,h)anthracene	1.3E-09	1.5E-10	1.9E-10	2.3E-11	5.5E-14	6.6E-15	-	-	-	-
Fluoranthene	4.4E-09	5.3E-10	6.5E-10	7.9E-11	1.9E-13	2.3E-14	-	-	-	-
Fluorene	8.2E-09	9.8E-10	1.2E-09	1.5E-10	3.5E-13	4.2E-14	-	-	-	-
Indeno(1,2,3-cd)pyrene	1.6E-09	1.9E-10	2.3E-10	2.8E-11	6.7E-14	8.1E-15	-	-	-	-
Naphthalene	3.1E-09	3.7E-10	4.5E-10	5.5E-11	1.3E-13	1.6E-14	-	-	-	-
Perylene	2.0E-09	2.4E-10	2.9E-10	3.5E-11	8.6E-14	1.0E-14	-	-	-	-
Phenanthrene	2.1E-08	2.6E-09	3.2E-09	3.8E-10	9.3E-13	1.1E-13	-	-	-	-
Pyrene	4.4E-09	5.2E-10	6.5E-10	7.7E-11	1.9E-13	2.3E-14	-	-	-	-
Total Petroleum Hydrocarbons										
C08-C11(Gasoline Range)	4.7E-07	5.7E-08	5.4E-08	6.5E-09	-	-	-	-	-	-
C11-C14(Kerosene Range)	5.4E-07	6.5E-08	8.0E-08	9.6E-09	2.3E-11	2.8E-12	-	-	-	-
C14-C20(Diesel Range)	3.2E-06	3.8E-07	4.7E-07	5.7E-08	1.4E-10	1.7E-11	-	-	-	-
C20-C30(Lubricant Oil Range)	1.4E-05	1.7E-06	2.1E-06	2.5E-07	6.2E-10	7.4E-11	-	-	-	-

Spreadsheet C2-33 (2 of 4)

Estimated Human Intake for the Adult Recreator
Old Conservation Yard RFI Site

Central Tendancy Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation Ambient Air_s		Inhalation Ambient Air_{gw}	
	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)
PCDD/PCDFs										
2,3,7,8-TCDD	5.0E-14	5.9E-15	1.7E-15	2.0E-16	2.1E-18	2.6E-19	-	-	-	-
1,2,3,7,8-PeCDD	3.2E-13	3.9E-14	1.1E-14	1.3E-15	1.4E-17	1.7E-18	-	-	-	-
1,2,3,4,7,8-HxCDD	7.1E-13	8.5E-14	2.4E-14	2.9E-15	3.1E-17	3.7E-18	-	-	-	-
1,2,3,6,7,8-HxCDD	9.8E-13	1.2E-13	3.4E-14	4.0E-15	4.3E-17	5.1E-18	-	-	-	-
1,2,3,7,8,9-HxCDD	8.8E-13	1.1E-13	3.0E-14	3.6E-15	3.8E-17	4.6E-18	-	-	-	-
1,2,3,4,6,7,8-HpCDD	2.4E-11	2.9E-12	8.2E-13	9.8E-14	1.0E-15	1.2E-16	-	-	-	-
OCDD	1.8E-10	2.2E-11	6.2E-12	7.4E-13	7.8E-15	9.4E-16	-	-	-	-
2,3,7,8-TCDF	1.1E-13	1.3E-14	3.7E-15	4.4E-16	4.7E-18	5.6E-19	-	-	-	-
1,2,3,7,8-PeCDF	8.9E-14	1.1E-14	3.0E-15	3.7E-16	3.9E-18	4.6E-19	-	-	-	-
2,3,4,7,8-PeCDF	2.5E-13	3.0E-14	8.6E-15	1.0E-15	1.1E-17	1.3E-18	-	-	-	-
1,2,3,4,7,8-HxCDF	6.3E-13	7.6E-14	2.2E-14	2.6E-15	2.7E-17	3.3E-18	-	-	-	-
1,2,3,6,7,8-HxCDF	2.4E-13	2.9E-14	8.2E-15	9.9E-16	1.0E-17	1.3E-18	-	-	-	-
2,3,4,6,7,8-HxCDF	2.6E-13	3.1E-14	8.8E-15	1.1E-15	1.1E-17	1.3E-18	-	-	-	-
1,2,3,7,8,9-HxCDF	1.1E-13	1.3E-14	3.8E-15	4.6E-16	4.9E-18	5.8E-19	-	-	-	-
1,2,3,4,6,7,8-HpCDF	2.7E-12	3.3E-13	9.3E-14	1.1E-14	1.2E-16	1.4E-17	-	-	-	-
1,2,3,4,7,8,9-HpCDF	3.5E-13	4.2E-14	1.2E-14	1.4E-15	1.5E-17	1.8E-18	-	-	-	-
OCDF	8.9E-12	1.1E-12	3.0E-13	3.6E-14	3.8E-16	4.6E-17	-	-	-	-
PCBs										
Aroclor-1248	2.4E-05	2.9E-06	3.9E-06	4.7E-07	1.1E-09	1.3E-10	-	-	-	-
Aroclor-1254	6.0E-08	7.2E-09	9.6E-09	1.1E-09	2.6E-12	3.1E-13	-	-	-	-
Aroclor-1260	6.5E-07	7.8E-08	1.0E-07	1.2E-08	2.8E-11	3.4E-12	-	-	-	-
PCB-105	5.5E-11	6.5E-12	8.7E-12	1.0E-12	2.4E-15	2.8E-16	-	-	-	-
PCB-114	1.0E-12	1.2E-13	1.6E-13	1.9E-14	4.4E-17	5.2E-18	-	-	-	-
PCB-118	1.1E-10	1.3E-11	1.7E-11	2.1E-12	4.7E-15	5.7E-16	-	-	-	-
PCB-123	1.5E-12	1.8E-13	2.5E-13	2.9E-14	6.7E-17	8.0E-18	-	-	-	-
PCB-126	4.2E-12	5.0E-13	6.7E-13	8.1E-14	1.8E-16	2.2E-17	-	-	-	-
PCB-156	3.6E-11	4.3E-12	5.8E-12	6.9E-13	1.6E-15	1.9E-16	-	-	-	-
PCB-157	1.6E-11	1.9E-12	2.6E-12	3.1E-13	7.0E-16	8.3E-17	-	-	-	-
PCB-167	2.8E-11	3.3E-12	4.5E-12	5.3E-13	1.2E-15	1.5E-16	-	-	-	-
PCB-169	4.2E-13	5.0E-14	6.6E-14	8.0E-15	1.8E-17	2.2E-18	-	-	-	-
PCB-189	4.2E-12	5.0E-13	6.6E-13	8.0E-14	1.8E-16	2.2E-17	-	-	-	-
PCB-77	8.4E-12	1.0E-12	1.3E-12	1.6E-13	3.6E-16	4.4E-17	-	-	-	-
PCB-81	1.5E-12	1.8E-13	2.4E-13	2.9E-14	6.5E-17	7.8E-18	-	-	-	-

Spreadsheet C2-33 (3 of 4)

Estimated Human Intake for the Adult Recreator
Old Conservation Yard RFI Site

Reasonable Maximum Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation Ambient Air_s		Inhalation Ambient Air_{gw}	
	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)
Inorganic Compounds										
Antimony	-	-	-	-	-	-	-	-	-	-
Barium	-	-	-	-	-	-	-	-	-	-
Boron	1.0E-06	3.3E-07	5.3E-07	1.7E-07	2.2E-11	7.1E-12	-	-	-	-
Cadmium	1.9E-07	6.2E-08	1.0E-08	3.2E-09	4.2E-12	1.3E-12	-	-	-	-
Copper	-	-	-	-	-	-	-	-	-	-
Lead	4.1E-06	1.3E-06	2.1E-06	6.7E-07	8.8E-11	2.8E-11	-	-	-	-
Mercury	6.4E-07	2.0E-07	3.3E-07	1.0E-07	1.4E-11	4.4E-12	-	-	-	-
Nitrate	-	-	-	-	-	-	-	-	-	-
Silver	3.5E-07	1.1E-07	1.8E-07	5.7E-08	7.6E-12	2.4E-12	-	-	-	-
Thallium	3.3E-07	1.1E-07	1.7E-07	5.5E-08	7.2E-12	2.3E-12	-	-	-	-
Zinc	1.4E-05	4.6E-06	7.4E-06	2.4E-06	-	-	-	-	-	-
VOCs										
1,1,1-Trichloroethane	1.1E-09	3.4E-10	5.5E-09	1.8E-09	-	-	1.3E-07	4.1E-08	-	-
1,1,2-Trichloro-1,2,2-trifluoroethane	4.0E-09	1.3E-09	2.1E-08	6.6E-09	-	-	3.4E-07	1.1E-07	-	-
1,1-Dichloroethane	-	-	-	-	-	-	-	-	-	-
1,1-Dichloroethene	1.1E-09	3.4E-10	5.5E-09	1.8E-09	-	-	1.4E-07	4.6E-08	-	-
2-Butanone	2.2E-09	6.9E-10	1.1E-08	3.5E-09	-	-	-	-	-	-
Acetone	6.9E-07	2.2E-07	3.5E-06	1.1E-06	-	-	-	-	-	-
Benzene	4.8E-10	1.6E-10	2.5E-09	8.0E-10	-	-	9.9E-08	3.2E-08	-	-
Carbon disulfide	-	-	-	-	-	-	-	-	-	-
Chloromethane	-	-	-	-	-	-	-	-	1.3E-09	4.3E-10
cis-1,2-Dichloroethene	-	-	-	-	-	-	-	-	3.3E-10	1.0E-10
Ethylbenzene	4.8E-10	1.6E-10	2.5E-09	8.0E-10	-	-	7.5E-08	2.4E-08	-	-
m,p-Xylene	1.4E-09	4.5E-10	7.3E-09	2.3E-09	-	-	1.7E-07	5.6E-08	-	-
Methylene chloride	4.8E-08	1.5E-08	2.5E-07	7.9E-08	-	-	5.7E-06	1.8E-06	-	-
o-Xylene	3.3E-10	1.1E-10	1.7E-09	5.5E-10	-	-	4.0E-08	1.3E-08	-	-
p-Isopropyltoluene	3.7E-10	1.2E-10	1.9E-09	6.1E-10	-	-	-	-	-	-
Toluene	7.0E-10	2.2E-10	3.6E-09	1.1E-09	-	-	9.8E-08	3.2E-08	-	-
Trichloroethene	1.1E-09	3.4E-10	5.5E-09	1.8E-09	-	-	6.5E-07	2.1E-07	1.1E-08	3.5E-09
SVOCs										
1-Methylnaphthalene	2.6E-09	8.3E-10	1.7E-08	5.6E-09	5.6E-14	1.8E-14	-	-	-	-
2-Methylnaphthalene	1.1E-07	3.5E-08	7.3E-07	2.3E-07	2.4E-12	7.6E-13	-	-	-	-
Acenaphthene	1.4E-07	4.4E-08	9.1E-07	2.9E-07	3.0E-12	9.5E-13	-	-	-	-
Acenaphthylene	2.8E-08	8.9E-09	1.9E-07	5.9E-08	6.0E-13	1.9E-13	-	-	-	-
Anthracene	9.2E-08	2.9E-08	6.1E-07	2.0E-07	2.0E-12	6.4E-13	-	-	-	-
Benzo(a)anthracene	3.6E-08	1.1E-08	2.4E-07	7.6E-08	7.7E-13	2.5E-13	-	-	-	-
Benzo(a)pyrene	3.4E-08	1.1E-08	2.3E-07	7.3E-08	7.4E-13	2.4E-13	-	-	-	-
Benzo(e)pyrene	6.1E-08	1.9E-08	4.0E-07	1.3E-07	1.3E-12	4.2E-13	-	-	-	-
Benzo(b)fluoranthene	3.9E-08	1.2E-08	2.6E-07	8.3E-08	8.4E-13	2.7E-13	-	-	-	-
Benzo(g,h,i)perylene	5.9E-08	1.9E-08	3.9E-07	1.3E-07	1.3E-12	4.1E-13	-	-	-	-
Benzo(k)fluoranthene	3.4E-08	1.1E-08	2.3E-07	7.3E-08	7.4E-13	2.4E-13	-	-	-	-
Chrysene	4.7E-08	1.5E-08	3.1E-07	1.0E-07	1.0E-12	3.2E-13	-	-	-	-
Dibenz(a,h)anthracene	2.0E-08	6.6E-09	1.4E-07	4.4E-08	4.4E-13	1.4E-13	-	-	-	-
Fluoranthene	8.5E-08	2.7E-08	5.7E-07	1.8E-07	1.8E-12	5.9E-13	-	-	-	-
Fluorene	1.4E-07	4.3E-08	9.0E-07	2.9E-07	2.9E-12	9.4E-13	-	-	-	-
Indeno(1,2,3-cd)pyrene	3.2E-08	1.0E-08	2.2E-07	6.9E-08	7.0E-13	2.2E-13	-	-	-	-
Naphthalene	3.1E-08	9.8E-09	2.0E-07	6.5E-08	6.6E-13	2.1E-13	-	-	-	-
Perylene	3.5E-08	1.1E-08	2.3E-07	7.4E-08	7.5E-13	2.4E-13	-	-	-	-
Phenanthrene	3.6E-07	1.2E-07	2.4E-06	7.7E-07	7.9E-12	2.5E-12	-	-	-	-
Pyrene	7.3E-08	2.3E-08	4.8E-07	1.5E-07	1.6E-12	5.0E-13	-	-	-	-
Total Petroleum Hydrocarbons										
C08-C11(Gasoline Range)	4.2E-06	1.3E-06	2.2E-05	6.9E-06	-	-	-	-	-	-
C11-C14(Kerosene Range)	4.3E-06	1.4E-06	2.8E-05	9.1E-06	9.2E-11	2.9E-11	-	-	-	-
C14-C20(Diesel Range)	5.0E-05	1.6E-05	3.3E-04	1.1E-04	1.1E-09	3.5E-10	-	-	-	-
C20-C30(Lubricant Oil Range)	2.7E-04	8.6E-05	1.8E-03	5.7E-04	5.8E-09	1.9E-09	-	-	-	-

Spreadsheet C2-33 (4 of 4)

Estimated Human Intake for the Adult Recreator
Old Conservation Yard RFI Site

Reasonable Maximum Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation Ambient Air_s		Inhalation Ambient Air_{gw}	
	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)
PCDD/PCDFs										
2,3,7,8-TCDD	3.5E-13	1.1E-13	5.3E-13	1.7E-13	7.5E-18	2.4E-18	-	-	-	-
1,2,3,7,8-PeCDD	1.0E-11	3.3E-12	1.6E-11	5.0E-12	2.2E-16	7.0E-17	-	-	-	-
1,2,3,4,7,8-HxCDD	1.0E-11	3.3E-12	1.6E-11	5.1E-12	2.2E-16	7.2E-17	-	-	-	-
1,2,3,6,7,8-HxCDD	2.0E-11	6.4E-12	3.1E-11	9.9E-12	4.3E-16	1.4E-16	-	-	-	-
1,2,3,7,8,9-HxCDD	1.7E-11	5.4E-12	2.6E-11	8.3E-12	3.7E-16	1.2E-16	-	-	-	-
1,2,3,4,6,7,8-HpCDD	5.7E-10	1.8E-10	8.7E-10	2.8E-10	1.2E-14	3.9E-15	-	-	-	-
OCDD	1.6E-09	5.2E-10	2.5E-09	7.9E-10	3.5E-14	1.1E-14	-	-	-	-
2,3,7,8-TCDF	2.0E-12	6.3E-13	3.0E-12	9.6E-13	4.2E-17	1.4E-17	-	-	-	-
1,2,3,7,8-PeCDF	1.9E-12	5.9E-13	2.9E-12	9.1E-13	4.0E-17	1.3E-17	-	-	-	-
2,3,4,7,8-PeCDF	5.8E-12	1.9E-12	9.0E-12	2.9E-12	1.3E-16	4.0E-17	-	-	-	-
1,2,3,4,7,8-HxCDF	1.2E-11	3.9E-12	1.9E-11	6.0E-12	2.6E-16	8.4E-17	-	-	-	-
1,2,3,6,7,8-HxCDF	2.0E-12	6.3E-13	3.0E-12	9.6E-13	4.2E-17	1.4E-17	-	-	-	-
2,3,4,6,7,8-HxCDF	5.6E-12	1.8E-12	8.7E-12	2.8E-12	1.2E-16	3.9E-17	-	-	-	-
1,2,3,7,8,9-HxCDF	2.0E-12	6.4E-13	3.1E-12	9.8E-13	4.3E-17	1.4E-17	-	-	-	-
1,2,3,4,6,7,8-HpCDF	2.3E-11	7.3E-12	3.5E-11	1.1E-11	5.0E-16	1.6E-16	-	-	-	-
1,2,3,4,7,8,9-HpCDF	5.9E-12	1.9E-12	9.1E-12	2.9E-12	1.3E-16	4.1E-17	-	-	-	-
OCDF	8.0E-11	2.6E-11	1.2E-10	4.0E-11	1.7E-15	5.6E-16	-	-	-	-
PCBs										
Aroclor-1254	1.1E-06	3.4E-07	7.6E-06	2.4E-06	2.3E-11	7.3E-12	-	-	-	-
Aroclor-1260	2.8E-05	9.0E-06	2.0E-04	6.5E-05	6.1E-10	2.0E-10	-	-	-	-
Aroclor-1262	-	-	-	-	-	-	-	-	-	-
PCB-105	2.3E-09	7.4E-10	1.7E-08	5.3E-09	5.0E-14	1.6E-14	-	-	-	-
PCB-114	4.1E-11	1.3E-11	3.0E-10	9.5E-11	8.9E-16	2.9E-16	-	-	-	-
PCB-118	4.6E-09	1.5E-09	3.3E-08	1.1E-08	1.0E-13	3.2E-14	-	-	-	-
PCB-123	6.5E-11	2.1E-11	4.7E-10	1.5E-10	1.4E-15	4.5E-16	-	-	-	-
PCB-126	1.8E-10	5.7E-11	1.3E-09	4.1E-10	3.9E-15	1.2E-15	-	-	-	-
PCB-156	1.5E-09	4.9E-10	1.1E-08	3.5E-09	3.3E-14	1.1E-14	-	-	-	-
PCB-157	6.9E-10	2.2E-10	5.0E-09	1.6E-09	1.5E-14	4.8E-15	-	-	-	-
PCB-167	1.2E-09	3.9E-10	8.6E-09	2.8E-09	2.6E-14	8.3E-15	-	-	-	-
PCB-169	1.8E-11	5.7E-12	1.3E-10	4.1E-11	3.9E-16	1.2E-16	-	-	-	-
PCB-189	1.8E-10	5.7E-11	1.3E-09	4.1E-10	3.9E-15	1.2E-15	-	-	-	-
PCB-77	3.6E-10	1.1E-10	2.6E-09	8.2E-10	7.8E-15	2.5E-15	-	-	-	-
PCB-81	6.3E-11	2.0E-11	4.6E-10	1.5E-10	1.4E-15	4.4E-16	-	-	-	-

Notes:
Inhalation Ambient Air_{s-gw} - Exposure associated with ambient air concentrations of COPCs modeled from soil or groundwate
ADD - Average daily dose, as defined in the SRAM (MWH 2005).
LADD - Lifetime average daily dose, as defined in the SRAM (MWH 2005).
The chemicals presented in this table are comprehensive for all media sampled. Not all chemicals were analyzed for or detected in all media.
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyls
COPC - chemical of potential concern
"-" indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
mg/kg-day - milligrams per kilogram per day

Estimated Human Intake for the Adult Worker
Old Conservation Yard RFI Site

Central Tendancy Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation of Indoor Air_s		Inhalation Ambient Air_s		Inhalation of Indoor Air_{gw}		Inhalation Ambient Air_{gw}	
	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)
Inorganic Compounds														
Antimony	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Barium	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Boron	1.8E-06	2.2E-07	1.8E-08	2.2E-09	8.0E-11	9.6E-12	-	-	-	-	-	-	-	-
Cadmium	2.2E-07	2.7E-08	2.2E-10	2.7E-11	9.6E-12	1.2E-12	-	-	-	-	-	-	-	-
Copper	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Lead	7.3E-06	8.7E-07	7.3E-08	8.7E-09	3.2E-10	3.8E-11	-	-	-	-	-	-	-	-
Mercury	2.2E-07	2.6E-08	2.2E-09	2.6E-10	9.3E-12	1.1E-12	-	-	-	-	-	-	-	-
Nitrate	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Silver	3.7E-07	4.4E-08	3.7E-09	4.4E-10	1.6E-11	1.9E-12	-	-	-	-	-	-	-	-
Thallium	3.7E-07	4.4E-08	3.7E-09	4.4E-10	1.6E-11	1.9E-12	-	-	-	-	-	-	-	-
Zinc	2.8E-05	3.4E-06	2.8E-07	3.4E-08	1.2E-09	1.5E-10	-	-	-	-	-	-	-	-
VOCs														
1,1,1-Trichloroethane	1.3E-09	1.5E-10	1.3E-10	1.5E-11	-	-	1.1E-05	1.3E-06	5.6E-07	6.8E-08	-	-	-	-
1,1,2-Trichloro-1,2,2-trifluoroethane	5.3E-09	6.3E-10	5.3E-10	6.3E-11	-	-	1.9E-05	2.3E-06	1.5E-06	1.8E-07	-	-	-	-
1,1-Dichloroethane	-	-	-	-	-	-	-	-	-	-	-	-	-	-
1,1-Dichloroethene	1.4E-09	1.6E-10	1.4E-10	1.6E-11	-	-	1.1E-05	1.4E-06	6.2E-07	7.5E-08	-	-	-	-
2-Butanone	9.6E-09	1.1E-09	9.6E-10	1.1E-10	-	-	-	-	-	-	-	-	-	-
Acetone	1.5E-07	1.8E-08	1.5E-08	1.8E-09	-	-	-	-	-	-	-	-	-	-
Benzene	4.9E-10	5.8E-11	4.9E-11	5.8E-12	-	-	9.9E-06	1.2E-06	4.4E-07	5.2E-08	-	-	-	-
Chloromethane	-	-	-	-	-	-	-	-	-	-	2.9E-08	3.5E-09	5.9E-09	7.0E-10
cis-1,2-Dichloroethene	-	-	-	-	-	-	-	-	-	-	1.3E-08	1.6E-09	1.4E-09	1.7E-10
Ethylbenzene	4.9E-10	5.8E-11	4.9E-11	5.8E-12	-	-	4.1E-06	4.9E-07	3.3E-07	4.0E-08	-	-	-	-
m,p-Xylene	1.4E-09	1.7E-10	1.4E-10	1.7E-11	-	-	8.8E-06	1.1E-06	7.6E-07	9.1E-08	-	-	-	-
Methylene chloride	1.8E-08	2.1E-09	1.8E-09	2.1E-10	-	-	1.0E-05	1.3E-06	2.5E-05	3.0E-06	-	-	-	-
o-Xylene	3.3E-10	4.0E-11	3.3E-11	4.0E-12	-	-	2.0E-06	2.4E-07	1.7E-07	2.1E-08	-	-	-	-
p-Isopropyltoluene	8.1E-10	9.8E-11	8.1E-11	9.8E-12	-	-	6.2E-06	7.4E-07	-	-	-	-	-	-
Toluene	6.6E-10	7.9E-11	6.6E-11	7.9E-12	-	-	9.0E-06	1.1E-06	4.3E-07	5.2E-08	-	-	-	-
Trichloroethene	1.3E-09	1.5E-10	1.3E-10	1.5E-11	-	-	2.0E-05	2.4E-06	2.8E-06	3.4E-07	3.9E-07	4.7E-08	4.8E-08	5.8E-09
SVOCs														
1-Methylnaphthalene	5.1E-09	6.1E-10	6.6E-10	8.0E-11	2.2E-13	2.7E-14	-	-	-	-	-	-	-	-
2-Methylnaphthalene	7.3E-08	8.8E-09	9.5E-09	1.1E-09	3.2E-12	3.8E-13	-	-	-	-	-	-	-	-
Acenaphthene	7.2E-08	8.7E-09	9.4E-09	1.1E-09	3.1E-12	3.8E-13	-	-	-	-	-	-	-	-
Acenaphthylene	1.7E-08	2.1E-09	2.2E-09	2.7E-10	7.5E-13	8.9E-14	-	-	-	-	-	-	-	-
Anthracene	5.1E-08	6.1E-09	6.6E-09	7.9E-10	2.2E-12	2.6E-13	-	-	-	-	-	-	-	-
Benzo(a)anthracene	1.7E-08	2.0E-09	2.1E-09	2.6E-10	7.2E-13	8.6E-14	-	-	-	-	-	-	-	-
Benzo(a)pyrene	1.6E-08	1.9E-09	2.0E-09	2.4E-10	6.7E-13	8.1E-14	-	-	-	-	-	-	-	-
Benzo(e)pyrene	3.0E-08	3.6E-09	3.9E-09	4.7E-10	1.3E-12	1.6E-13	-	-	-	-	-	-	-	-
Benzo(b)fluoranthene	1.9E-08	2.3E-09	2.4E-09	2.9E-10	8.1E-13	9.8E-14	-	-	-	-	-	-	-	-
Benzo(g,h,i)perylene	3.6E-08	4.3E-09	4.7E-09	5.6E-10	1.6E-12	1.9E-13	-	-	-	-	-	-	-	-
Benzo(k)fluoranthene	1.5E-08	1.9E-09	2.0E-09	2.4E-10	6.7E-13	8.1E-14	-	-	-	-	-	-	-	-
Chrysene	2.5E-08	3.0E-09	3.3E-09	4.0E-10	1.1E-12	1.3E-13	-	-	-	-	-	-	-	-
Dibenz(a,h)anthracene	1.1E-08	1.3E-09	1.4E-09	1.7E-10	4.8E-13	5.8E-14	-	-	-	-	-	-	-	-
Fluoranthene	3.9E-08	4.6E-09	5.0E-09	6.0E-10	1.7E-12	2.0E-13	-	-	-	-	-	-	-	-
Fluorene	7.2E-08	8.6E-09	9.3E-09	1.1E-09	3.1E-12	3.7E-13	-	-	-	-	-	-	-	-
Indeno(1,2,3-cd)pyrene	1.4E-08	1.6E-09	1.8E-09	2.1E-10	5.9E-13	7.1E-14	-	-	-	-	-	-	-	-
Naphthalene	2.7E-08	3.2E-09	3.5E-09	4.2E-10	1.2E-12	1.4E-13	-	-	-	-	-	-	-	-
Perylene	1.7E-08	2.1E-09	2.2E-09	2.7E-10	7.5E-13	9.0E-14	-	-	-	-	-	-	-	-
Phenanthrene	1.9E-07	2.3E-08	2.4E-08	2.9E-09	8.2E-12	9.8E-13	-	-	-	-	-	-	-	-
Pyrene	3.8E-08	4.6E-09	5.0E-09	6.0E-10	1.7E-12	2.0E-13	-	-	-	-	-	-	-	-
Total Petroleum Hydrocarbons														
C08-C11(Gasoline Range)	4.1E-06	5.0E-07	4.1E-07	5.0E-08	1.8E-10	2.2E-11	-	-	-	-	-	-	-	-
C11-C14(Kerosene Range)	4.7E-06	5.7E-07	6.2E-07	7.4E-08	2.1E-10	2.5E-11	-	-	-	-	-	-	-	-
C14-C20(Diesel Range)	2.8E-05	3.4E-06	3.6E-06	4.4E-07	1.2E-09	1.5E-10	-	-	-	-	-	-	-	-
C20-C30(Lubricant Oil Range)	1.3E-04	1.5E-05	1.6E-05	2.0E-06	5.4E-09	6.5E-10	-	-	-	-	-	-	-	-

Spreadsheet C2-32 (2 of 4)

Estimated Human Intake for the Adult Worker
Old Conservation Yard RFI Site

Central Tendancy Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation of Indoor Air_s		Inhalation Ambient Air_s		Inhalation of Indoor Air_{gw}		Inhalation Ambient Air_{gw}	
	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)
PCDD/PCDFs														
2,3,7,8-TCDD	4.3E-13	5.2E-14	1.3E-14	1.6E-15	1.9E-17	2.3E-18	-	-	-	-	-	-	-	-
1,2,3,7,8-PeCDD	2.8E-12	3.4E-13	8.5E-14	1.0E-14	1.2E-16	1.5E-17	-	-	-	-	-	-	-	-
1,2,3,4,7,8-HxCDD	6.2E-12	7.5E-13	1.9E-13	2.2E-14	2.7E-16	3.2E-17	-	-	-	-	-	-	-	-
1,2,3,6,7,8-HxCDD	8.6E-12	1.0E-12	2.6E-13	3.1E-14	3.7E-16	4.5E-17	-	-	-	-	-	-	-	-
1,2,3,7,8,9-HxCDD	7.7E-12	9.2E-13	2.3E-13	2.8E-14	3.3E-16	4.0E-17	-	-	-	-	-	-	-	-
1,2,3,4,6,7,8-HpCDD	2.1E-10	2.5E-11	6.3E-12	7.5E-13	9.1E-15	1.1E-15	-	-	-	-	-	-	-	-
OCDD	1.6E-09	1.9E-10	4.7E-11	5.7E-12	6.9E-14	8.2E-15	-	-	-	-	-	-	-	-
2,3,7,8-TCDF	9.4E-13	1.1E-13	2.8E-14	3.4E-15	4.1E-17	4.9E-18	-	-	-	-	-	-	-	-
1,2,3,7,8-PeCDF	7.8E-13	9.4E-14	2.3E-14	2.8E-15	3.4E-17	4.1E-18	-	-	-	-	-	-	-	-
2,3,4,7,8-PeCDF	2.2E-12	2.6E-13	6.6E-14	7.9E-15	9.5E-17	1.1E-17	-	-	-	-	-	-	-	-
1,2,3,4,7,8-HxCDF	5.5E-12	6.6E-13	1.7E-13	2.0E-14	2.4E-16	2.9E-17	-	-	-	-	-	-	-	-
1,2,3,6,7,8-HxCDF	2.1E-12	2.5E-13	6.3E-14	7.6E-15	9.1E-17	1.1E-17	-	-	-	-	-	-	-	-
2,3,4,6,7,8-HxCDF	2.2E-12	2.7E-13	6.7E-14	8.1E-15	9.7E-17	1.2E-17	-	-	-	-	-	-	-	-
1,2,3,7,8,9-HxCDF	9.8E-13	1.2E-13	3.0E-14	3.5E-15	4.3E-17	5.1E-18	-	-	-	-	-	-	-	-
1,2,3,4,6,7,8-HpCDF	2.4E-11	2.8E-12	7.1E-13	8.5E-14	1.0E-15	1.2E-16	-	-	-	-	-	-	-	-
1,2,3,4,7,8,9-HpCDF	3.1E-12	3.7E-13	9.3E-14	1.1E-14	1.3E-16	1.6E-17	-	-	-	-	-	-	-	-
OCDF	7.8E-11	9.3E-12	2.3E-12	2.8E-13	3.4E-15	4.0E-16	-	-	-	-	-	-	-	-
PCBs														
Aroclor-1248	2.1E-04	2.6E-05	3.0E-05	3.6E-06	9.3E-09	1.1E-09	-	-	-	-	-	-	-	-
Aroclor-1254	5.3E-07	6.3E-08	7.4E-08	8.8E-09	2.3E-11	2.7E-12	-	-	-	-	-	-	-	-
Aroclor-1260	5.7E-06	6.8E-07	8.0E-07	9.6E-08	2.5E-10	3.0E-11	-	-	-	-	-	-	-	-
PCB-105	4.8E-10	5.7E-11	6.7E-11	8.0E-12	2.1E-14	2.5E-15	-	-	-	-	-	-	-	-
PCB-114	8.8E-12	1.1E-12	1.2E-12	1.5E-13	3.8E-16	4.6E-17	-	-	-	-	-	-	-	-
PCB-118	9.6E-10	1.1E-10	1.3E-10	1.6E-11	4.2E-14	5.0E-15	-	-	-	-	-	-	-	-
PCB-123	1.3E-11	1.6E-12	1.9E-12	2.3E-13	5.8E-16	7.0E-17	-	-	-	-	-	-	-	-
PCB-126	3.7E-11	4.4E-12	5.2E-12	6.2E-13	1.6E-15	1.9E-16	-	-	-	-	-	-	-	-
PCB-156	3.2E-10	3.8E-11	4.4E-11	5.3E-12	1.4E-14	1.6E-15	-	-	-	-	-	-	-	-
PCB-157	1.4E-10	1.7E-11	2.0E-11	2.4E-12	6.1E-15	7.3E-16	-	-	-	-	-	-	-	-
PCB-167	2.4E-10	2.9E-11	3.4E-11	4.1E-12	1.1E-14	1.3E-15	-	-	-	-	-	-	-	-
PCB-169	3.6E-12	4.4E-13	5.1E-13	6.1E-14	1.6E-16	1.9E-17	-	-	-	-	-	-	-	-
PCB-189	3.6E-11	4.4E-12	5.1E-12	6.1E-13	1.6E-15	1.9E-16	-	-	-	-	-	-	-	-
PCB-77	7.4E-11	8.9E-12	1.0E-11	1.2E-12	3.2E-15	3.8E-16	-	-	-	-	-	-	-	-
PCB-81	1.3E-11	1.6E-12	1.8E-12	2.2E-13	5.7E-16	6.8E-17	-	-	-	-	-	-	-	-

Spreadsheet C2-32 (3 of 4)

Estimated Human Intake for the Adult Worker
Old Conservation Yard RFI Site

Reasonable Maximum Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation of Indoor Air_s		Inhalation Ambient Air_s		Inhalation of Indoor Air_{gw}		Inhalation Ambient Air_{gw}	
	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)
Inorganic Compounds														
Antimony	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Barium	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Boron	1.0E-05	3.4E-06	2.6E-07	8.6E-08	2.6E-10	8.6E-11	-	-	-	-	-	-	-	-
Cadmium	1.9E-06	6.5E-07	4.9E-09	1.6E-09	4.9E-11	1.6E-11	-	-	-	-	-	-	-	-
Copper	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Lead	4.1E-05	1.4E-05	1.0E-06	3.4E-07	1.0E-09	3.4E-10	-	-	-	-	-	-	-	-
Mercury	6.4E-06	2.1E-06	1.6E-07	5.3E-08	1.6E-10	5.3E-11	-	-	-	-	-	-	-	-
Nitrate	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Silver	3.5E-06	1.2E-06	8.7E-08	2.9E-08	8.7E-11	2.9E-11	-	-	-	-	-	-	-	-
Thallium	3.3E-06	1.1E-06	8.3E-08	2.8E-08	8.3E-11	2.8E-11	-	-	-	-	-	-	-	-
Zinc	1.4E-04	4.8E-05	3.6E-06	1.2E-06	3.6E-09	1.2E-09	-	-	-	-	-	-	-	-
VOCs														
1,1,1-Trichloroethane	1.1E-08	3.6E-09	2.7E-09	9.0E-10	-	-	3.6E-05	1.2E-05	1.5E-06	5.0E-07	-	-	-	-
1,1,2-Trichloro-1,2,2-trifluoroethane	4.0E-08	1.3E-08	1.0E-08	3.3E-09	-	-	9.4E-05	3.1E-05	3.9E-06	1.3E-06	-	-	-	-
1,1-Dichloroethane	-	-	-	-	-	-	-	-	-	-	-	-	-	-
1,1-Dichloroethene	1.1E-08	3.6E-09	2.7E-09	9.0E-10	-	-	3.7E-05	1.2E-05	1.6E-06	5.5E-07	-	-	-	-
2-Butanone	2.2E-08	7.2E-09	5.4E-09	1.8E-09	-	-	-	-	-	-	-	-	-	-
Acetone	6.9E-06	2.3E-06	1.7E-06	5.7E-07	-	-	-	-	-	-	-	-	-	-
Benzene	4.8E-09	1.6E-09	1.2E-09	4.0E-10	-	-	2.6E-05	8.7E-06	1.1E-06	3.8E-07	-	-	-	-
Carbon disulfide	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Chloromethane	-	-	-	-	-	-	-	-	-	-	7.7E-08	2.6E-08	1.5E-08	5.1E-09
cis-1,2-Dichloroethene	-	-	-	-	-	-	-	-	-	-	3.4E-08	1.1E-08	3.8E-09	1.3E-09
Ethylbenzene	4.8E-09	1.6E-09	1.2E-09	4.0E-10	-	-	2.1E-05	7.1E-06	8.7E-07	2.9E-07	-	-	-	-
m,p-Xylene	1.4E-08	4.7E-09	3.5E-09	1.2E-09	-	-	4.6E-05	1.5E-05	2.0E-06	6.7E-07	-	-	-	-
Methylene chloride	4.8E-07	1.6E-07	1.2E-07	4.0E-08	-	-	1.4E-03	4.6E-04	6.6E-05	2.2E-05	-	-	-	-
o-Xylene	3.3E-09	1.1E-09	8.3E-10	2.8E-10	-	-	1.0E-05	3.5E-06	4.6E-07	1.5E-07	-	-	-	-
p-Isopropyltoluene	3.7E-09	1.2E-09	9.3E-10	3.1E-10	-	-	1.6E-05	5.5E-06	-	-	-	-	-	-
Toluene	7.0E-09	2.3E-09	1.7E-09	5.8E-10	-	-	2.6E-05	8.6E-06	1.1E-06	3.8E-07	-	-	-	-
Trichloroethene	1.1E-08	3.6E-09	2.7E-09	9.0E-10	-	-	1.8E-04	6.0E-05	7.5E-06	2.5E-06	1.0E-06	3.4E-07	1.3E-07	4.2E-08
SVOCs														
1-Methylnaphthalene	2.6E-08	8.7E-09	8.5E-09	2.8E-09	6.5E-13	2.2E-13	-	-	-	-	-	-	-	-
2-Methylnaphthalene	1.1E-06	3.7E-07	3.6E-07	1.2E-07	2.7E-11	9.1E-12	-	-	-	-	-	-	-	-
Acenaphthene	1.4E-06	4.6E-07	4.4E-07	1.5E-07	3.4E-11	1.1E-11	-	-	-	-	-	-	-	-
Acenaphthylene	2.8E-07	9.3E-08	9.0E-08	3.0E-08	6.9E-12	2.3E-12	-	-	-	-	-	-	-	-
Anthracene	9.2E-07	3.1E-07	3.0E-07	9.9E-08	2.3E-11	7.6E-12	-	-	-	-	-	-	-	-
Benzo(a)anthracene	3.6E-07	1.2E-07	1.2E-07	3.9E-08	8.9E-12	3.0E-12	-	-	-	-	-	-	-	-
Benzo(a)pyrene	3.4E-07	1.1E-07	1.1E-07	3.7E-08	8.6E-12	2.9E-12	-	-	-	-	-	-	-	-
Benzo(e)pyrene	6.1E-07	2.0E-07	2.0E-07	6.6E-08	1.5E-11	5.1E-12	-	-	-	-	-	-	-	-
Benzo(b)fluoranthene	3.9E-07	1.3E-07	1.3E-07	4.2E-08	9.7E-12	3.2E-12	-	-	-	-	-	-	-	-
Benzo(g,h,i)perylene	5.9E-07	2.0E-07	1.9E-07	6.4E-08	1.5E-11	4.9E-12	-	-	-	-	-	-	-	-
Benzo(k)fluoranthene	3.4E-07	1.1E-07	1.1E-07	3.7E-08	8.6E-12	2.9E-12	-	-	-	-	-	-	-	-
Chrysene	4.7E-07	1.6E-07	1.5E-07	5.1E-08	1.2E-11	3.9E-12	-	-	-	-	-	-	-	-
Dibenz(a,h)anthracene	2.0E-07	6.8E-08	6.7E-08	2.2E-08	5.1E-12	1.7E-12	-	-	-	-	-	-	-	-
Fluoranthene	8.5E-07	2.8E-07	2.8E-07	9.2E-08	2.1E-11	7.1E-12	-	-	-	-	-	-	-	-
Fluorene	1.4E-06	4.5E-07	4.4E-07	1.5E-07	3.4E-11	1.1E-11	-	-	-	-	-	-	-	-
Indeno(1,2,3-cd)pyrene	3.2E-07	1.1E-07	1.1E-07	3.5E-08	8.1E-12	2.7E-12	-	-	-	-	-	-	-	-
Naphthalene	3.1E-07	1.0E-07	1.0E-07	3.3E-08	7.7E-12	2.6E-12	-	-	-	-	-	-	-	-
Perylene	3.5E-07	1.2E-07	1.1E-07	3.8E-08	8.7E-12	2.9E-12	-	-	-	-	-	-	-	-
Phenanthrene	3.6E-06	1.2E-06	1.2E-06	3.9E-07	9.1E-11	3.0E-11	-	-	-	-	-	-	-	-
Pyrene	7.3E-07	2.4E-07	2.4E-07	7.9E-08	1.8E-11	6.0E-12	-	-	-	-	-	-	-	-
Total Petroleum Hydrocarbons														
C08-C11(Gasoline Range)	4.2E-05	1.4E-05	1.1E-05	3.5E-06	1.1E-09	3.5E-10	-	-	-	-	-	-	-	-
C11-C14(Kerosene Range)	4.3E-05	1.4E-05	1.4E-05	4.6E-06	1.1E-09	3.5E-10	-	-	-	-	-	-	-	-
C14-C20(Diesel Range)	5.0E-04	1.7E-04	1.6E-04	5.4E-05	1.2E-08	4.2E-09	-	-	-	-	-	-	-	-
C20-C30(Lubricant Oil Range)	2.7E-03	8.9E-04	8.7E-04	2.9E-04	6.7E-08	2.2E-08	-	-	-	-	-	-	-	-

Spreadsheet C2-32 (4 of 4)

Estimated Human Intake for the Adult Worker
Old Conservation Yard RFI Site

Reasonable Maximum Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation of Indoor Air_s		Inhalation Ambient Air_s		Inhalation of Indoor Air_{gw}		Inhalation Ambient Air_{gw}	
	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)
PCDD/PCDFs														
2,3,7,8-TCDD	3.5E-12	1.2E-12	2.6E-13	8.6E-14	8.6E-17	2.9E-17	-	-	-	-	-	-	-	-
1,2,3,7,8-PeCDD	1.0E-10	3.4E-11	7.6E-12	2.5E-12	2.5E-15	8.5E-16	-	-	-	-	-	-	-	-
1,2,3,4,7,8-HxCDD	1.0E-10	3.4E-11	7.7E-12	2.6E-12	2.6E-15	8.6E-16	-	-	-	-	-	-	-	-
1,2,3,6,7,8-HxCDD	2.0E-10	6.7E-11	1.5E-11	5.0E-12	5.0E-15	1.7E-15	-	-	-	-	-	-	-	-
1,2,3,7,8,9-HxCDD	1.7E-10	5.6E-11	1.3E-11	4.2E-12	4.2E-15	1.4E-15	-	-	-	-	-	-	-	-
1,2,3,4,6,7,8-HpCDD	5.7E-09	1.9E-09	4.3E-10	1.4E-10	1.4E-13	4.7E-14	-	-	-	-	-	-	-	-
OCDD	1.6E-08	5.4E-09	1.2E-09	4.0E-10	4.0E-13	1.3E-13	-	-	-	-	-	-	-	-
2,3,7,8-TCDF	2.0E-11	6.5E-12	1.5E-12	4.9E-13	4.9E-16	1.6E-16	-	-	-	-	-	-	-	-
1,2,3,7,8-PeCDF	1.9E-11	6.2E-12	1.4E-12	4.6E-13	4.6E-16	1.5E-16	-	-	-	-	-	-	-	-
2,3,4,7,8-PeCDF	5.8E-11	1.9E-11	4.4E-12	1.5E-12	1.5E-15	4.9E-16	-	-	-	-	-	-	-	-
1,2,3,4,7,8-HxCDF	1.2E-10	4.1E-11	9.1E-12	3.0E-12	3.0E-15	1.0E-15	-	-	-	-	-	-	-	-
1,2,3,6,7,8-HxCDF	2.0E-11	6.5E-12	1.5E-12	4.9E-13	4.9E-16	1.6E-16	-	-	-	-	-	-	-	-
2,3,4,6,7,8-HxCDF	5.6E-11	1.9E-11	4.2E-12	1.4E-12	1.4E-15	4.7E-16	-	-	-	-	-	-	-	-
1,2,3,7,8,9-HxCDF	2.0E-11	6.6E-12	1.5E-12	5.0E-13	5.0E-16	1.7E-16	-	-	-	-	-	-	-	-
1,2,3,4,6,7,8-HpCDF	2.3E-10	7.7E-11	1.7E-11	5.7E-12	5.7E-15	1.9E-15	-	-	-	-	-	-	-	-
1,2,3,4,7,8,9-HpCDF	5.9E-11	2.0E-11	4.4E-12	1.5E-12	1.5E-15	4.9E-16	-	-	-	-	-	-	-	-
OCDF	8.0E-10	2.7E-10	6.0E-11	2.0E-11	2.0E-14	6.7E-15	-	-	-	-	-	-	-	-
PCBs														
Aroclor-1248	1.1E-02	3.6E-03	3.8E-03	1.3E-03	2.7E-07	8.9E-08	-	-	-	-	-	-	-	-
Aroclor-1254	1.1E-05	3.5E-06	3.7E-06	1.2E-06	2.6E-10	8.8E-11	-	-	-	-	-	-	-	-
Aroclor-1260	2.8E-04	9.4E-05	9.9E-05	3.3E-05	7.0E-09	2.3E-09	-	-	-	-	-	-	-	-
PCB-105	2.3E-08	7.7E-09	8.1E-09	2.7E-09	5.8E-13	1.9E-13	-	-	-	-	-	-	-	-
PCB-114	4.1E-10	1.4E-10	1.4E-10	4.8E-11	1.0E-14	3.4E-15	-	-	-	-	-	-	-	-
PCB-118	4.6E-08	1.5E-08	1.6E-08	5.4E-09	1.2E-12	3.8E-13	-	-	-	-	-	-	-	-
PCB-123	6.5E-10	2.2E-10	2.3E-10	7.6E-11	1.6E-14	5.4E-15	-	-	-	-	-	-	-	-
PCB-126	1.8E-09	6.0E-10	6.3E-10	2.1E-10	4.5E-14	1.5E-14	-	-	-	-	-	-	-	-
PCB-156	1.5E-08	5.1E-09	5.4E-09	1.8E-09	3.8E-13	1.3E-13	-	-	-	-	-	-	-	-
PCB-157	6.9E-09	2.3E-09	2.4E-09	8.1E-10	1.7E-13	5.8E-14	-	-	-	-	-	-	-	-
PCB-167	1.2E-08	4.0E-09	4.2E-09	1.4E-09	3.0E-13	1.0E-13	-	-	-	-	-	-	-	-
PCB-169	1.8E-10	6.0E-11	6.3E-11	2.1E-11	4.5E-15	1.5E-15	-	-	-	-	-	-	-	-
PCB-189	1.8E-09	6.0E-10	6.3E-10	2.1E-10	4.5E-14	1.5E-14	-	-	-	-	-	-	-	-
PCB-77	3.6E-09	1.2E-09	1.3E-09	4.2E-10	9.0E-14	3.0E-14	-	-	-	-	-	-	-	-
PCB-81	6.3E-10	2.1E-10	2.2E-10	7.4E-11	1.6E-14	5.3E-15	-	-	-	-	-	-	-	-

Notes:

Inhalation Indoor Air_{s-gw} - Exposure associated with indoor air concentrations of COPCs modeled from soil vapor, soil, or groundwater.

Inhalation Ambient Air_{s-gw} - Exposure associated with ambient air concentrations of COPCs modeled from soil or groundwater

ADD - Average daily dose, as defined in the SRAM (MWH 2005).

LADD - Lifetime average daily dose, as defined in the SRAM (MWH 2005).

The chemicals presented in this table are comprehensive for all media sampled. Not all chemicals were analyzed for or detected in all media.

VOC - volatile organic compound

SVOC - semi-volatile organic compound

PCB - polychlorinated biphenyls

COPC - chemical of potential concern

"-" indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).

mg/kg-day - milligrams per kilogram per day

Concentration-Toxicity Screen for Soil Depth Intervals[a]
Old Conservation Yard RFI Site

Central Tendancy Exposure

Chemical	Soil (0-2 feet bgs)		Soil (0-10 feet bgs)	
	Noncancer (unitless)	Cancer (unitless)	Noncancer (unitless)	Cancer (unitless)
Inorganic Compounds				
Antimony	NC	NC	5.7E+03	NTV
Barium	NC	NC	4.2E+02	NTV
Boron	2.1E+01	NTV	2.2E+01	NTV
Cadmium	5.2E+02	2.0E-01	5.2E+02	2.0E-01
Copper	NC	NC	3.2E+02	NTV
Lead	4.0E+04	NTV	4.1E+04	NTV
Mercury	1.7E+03	NTV	1.4E+03	NTV
Nitrate	NC	NC	NC	NC
Silver	1.7E+02	NTV	2.3E+02	NTV
Thallium	1.1E+04	NTV	1.2E+04	NTV
Zinc	2.2E+02	NTV	2.5E+02	NTV
VOCs				
1,1,1-Trichloroethane	1.1E-02	NTV	1.2E-02	NTV
1,1,2-Trichloro-1,2,2-trifluoroethane	4.1E-04	NTV	5.0E-04	NTV
1,1-Dichloroethane	NC	NC	NC	NC
1,1-Dichloroethene	6.3E-02	NTV	7.2E-02	NTV
2-Butanone	3.7E-02	NTV	4.6E-02	NTV
Acetone	3.9E-01	NTV	3.4E-01	NTV
Benzene	2.8E-01	1.1E-04	2.4E-01	9.5E-05
Chloromethane	NC	NC	NC	NC
cis-1,2-Dichloroethene	NC	NC	NC	NC
Ethylbenzene	1.1E-02	NTV	9.5E-03	NTV
m,p-Xylene	1.6E-02	NTV	1.4E-02	NTV
Methylene chloride	6.8E-01	5.7E-04	6.3E-01	5.3E-04
o-Xylene	3.9E-03	NTV	3.3E-03	NTV
p-Isopropyltoluene	NTV	NTV	NTV	NTV
Toluene	1.9E-02	NTV	1.5E-02	NTV
Trichloroethene	1.0E+01	3.9E-05	1.2E+01	4.5E-05
SVOCs				
1-Methylnaphthalene	3.0E+00	NTV	3.0E+00	NTV
2-Methylnaphthalene	4.3E+01	NTV	3.7E+01	NTV
Acenaphthene	2.8E+00	NTV	2.3E+00	NTV
Acenaphthylene	1.3E+00	NTV	1.2E+00	NTV
Anthracene	4.0E-01	NTV	3.4E-01	NTV
Benzo(a)anthracene	NTV	4.6E-02	NTV	3.8E-02
Benzo(a)pyrene	NTV	4.4E-01	NTV	3.6E-01
Benzo(e)pyrene	NTV	NTV	NTV	NTV
Benzo(b)fluoranthene	NTV	5.3E-02	NTV	4.3E-02
Benzo(g,h,i)perylene	NTV	NTV	NTV	NTV
Benzo(k)fluoranthene	NTV	4.3E-02	NTV	3.6E-02
Chrysene	NTV	7.1E-03	NTV	5.7E-03
Dibenz(a,h)anthracene	NTV	1.1E-01	NTV	9.0E-02
Fluoranthene	2.3E+00	NTV	1.8E+00	NTV
Fluorene	4.2E+00	NTV	3.5E+00	NTV
Indeno(1,2,3-cd)pyrene	NTV	3.8E-02	NTV	3.2E-02
Naphthalene	3.1E+00	NTV	2.7E+00	NTV
Perylene	NTV	NTV	NTV	NTV
Phenanthrene	1.5E+01	NTV	1.1E+01	NTV
Pyrene	3.0E+00	NTV	2.4E+00	NTV

Concentration-Toxicity Screen for Soil Depth Intervals[a]
Old Conservation Yard RFI Site

Total Petroleum Hydrocarbons				
C08-C11(Gasoline Range)	NTV	NTV	NTV	NTV
C11-C14(Kerosene Range)	NTV	NTV	NTV	NTV
C14-C20(Diesel Range)	NTV	NTV	NTV	NTV
C20-C30(Lubricant Oil Range)	NTV	NTV	NTV	NTV
PCDD/PCDFs				
2,3,7,8-TCDD	NTV	1.3E-01	NTV	1.3E-01
1,2,3,7,8-PeCDD	NTV	8.5E-01	NTV	7.4E-01
1,2,3,4,7,8-HxCDD	NTV	1.9E-01	NTV	1.7E-01
1,2,3,6,7,8-HxCDD	NTV	2.6E-01	NTV	2.4E-01
1,2,3,7,8,9-HxCDD	NTV	2.3E-01	NTV	2.1E-01
1,2,3,4,6,7,8-HpCDD	NTV	6.4E-01	NTV	5.4E-01
OCDD	NTV	1.4E-01	NTV	1.3E-01
2,3,7,8-TCDF	NTV	2.9E-02	NTV	2.9E-02
1,2,3,7,8-PeCDF	NTV	7.1E-03	NTV	7.7E-03
2,3,4,7,8-PeCDF	NTV	2.0E-01	NTV	1.9E-01
1,2,3,4,7,8-HxCDF	NTV	1.7E-01	NTV	1.4E-01
1,2,3,6,7,8-HxCDF	NTV	6.4E-02	NTV	6.3E-02
2,3,4,6,7,8-HxCDF	NTV	6.8E-02	NTV	6.9E-02
1,2,3,7,8,9-HxCDF	NTV	3.0E-02	NTV	3.1E-02
1,2,3,4,6,7,8-HpCDF	NTV	7.2E-02	NTV	6.3E-02
1,2,3,4,7,8,9-HpCDF	NTV	9.4E-03	NTV	7.6E-03
OCDF	NTV	7.1E-03	NTV	5.7E-03
PCBs				
Aroclor-1248	NTV	1.0E+03	NTV	7.9E+02
Aroclor-1254	6.1E+04	2.5E+00	5.0E+04	2.0E+00
Aroclor-1260	NTV	2.7E+01	NTV	2.1E+01
PCB-105	NTV	4.3E-03	NTV	3.4E-03
PCB-114	NTV	8.0E-05	NTV	6.4E-05
PCB-118	NTV	8.7E-03	NTV	6.9E-03
PCB-123	NTV	1.2E-04	NTV	9.7E-05
PCB-126	NTV	1.1E+00	NTV	8.8E-01
PCB-156	NTV	2.9E-03	NTV	2.3E-03
PCB-157	NTV	1.3E-03	NTV	1.0E-03
PCB-167	NTV	2.2E-03	NTV	1.8E-03
PCB-169	NTV	3.3E-02	NTV	2.6E-02
PCB-189	NTV	3.3E-04	NTV	2.6E-04
PCB-77	NTV	2.2E-03	NTV	1.8E-03
PCB-81	NTV	1.2E-03	NTV	9.4E-04
Cumulative Risk	1.1E+05	1.0E+03	1.1E+05	8.2E+02

Concentration-Toxicity Screen for Soil Depth Intervals[a]
Old Conservation Yard RFI Site

Reasonable Maximum Exposure

Chemical	Soil (0-2 feet bgs)		Soil (0-10 feet bgs)	
	Noncancer (unitless)	Cancer (unitless)	Noncancer (unitless)	Cancer (unitless)
Inorganic Compounds				
Antimony	NC	NC	1.3E+04	NTV
Barium	NC	NC	4.5E+02	NTV
Boron	2.6E+01	NTV	2.5E+01	NTV
Cadmium	9.9E+02	3.8E-01	9.9E+02	3.8E-01
Copper	NC	NC	4.3E+02	NTV
Lead	4.8E+04	NTV	6.9E+04	NTV
Mercury	1.1E+04	NTV	8.9E+03	NTV
Nitrate	NC	NC	NC	NC
Silver	3.6E+02	NTV	5.0E+02	NTV
Thallium	2.1E+04	NTV	2.3E+04	NTV
Zinc	2.5E+02	NTV	4.1E+02	NTV
VOCs				
1,1,1-Trichloroethane	2.0E-02	NTV	1.2E-02	NTV
1,1,2-Trichloro-1,2,2-trifluoroethane	6.8E-04	NTV	5.0E-04	NTV
1,1-Dichloroethane	NC	NC	NC	NC
1,1-Dichloroethene	1.1E-01	NTV	7.2E-02	NTV
2-Butanone	1.8E-02	NTV	1.8E-02	NTV
Acetone	3.9E+00	NTV	3.0E+00	NTV
Benzene	6.2E-01	2.5E-04	4.7E-01	1.9E-04
Carbon disulfide	NC	NC	NC	NC
Chloromethane	NC	NC	NC	NC
cis-1,2-Dichloroethene	NC	NC	NC	NC
Ethylbenzene	2.5E-02	NTV	1.9E-02	NTV
m,p-Xylene	3.6E-02	NTV	2.8E-02	NTV
Methylene chloride	4.1E+00	3.4E-03	3.2E+00	2.7E-03
o-Xylene	8.5E-03	NTV	6.5E-03	NTV
p-Isopropyltoluene	NTV	NTV	NTV	NTV
Toluene	4.4E-02	NTV	3.3E-02	NTV
Trichloroethene	1.8E+01	7.2E-05	1.2E+01	4.5E-05
SVOCs				
1-Methylnaphthalene	3.3E+00	NTV	3.3E+00	NTV
2-Methylnaphthalene	1.4E+02	NTV	8.0E+01	NTV
Acenaphthene	1.2E+01	NTV	8.7E+00	NTV
Acenaphthylene	4.7E+00	NTV	3.6E+00	NTV
Anthracene	1.6E+00	NTV	1.2E+00	NTV
Benzo(a)anthracene	NTV	2.2E-01	NTV	1.6E-01
Benzo(a)pyrene	NTV	2.1E+00	NTV	1.6E+00
Benzo(e)pyrene	NTV	NTV	NTV	NTV
Benzo(b)fluoranthene	NTV	2.4E-01	NTV	1.8E-01
Benzo(g,h,i)perylene	NTV	NTV	NTV	NTV
Benzo(k)fluoranthene	NTV	2.1E-01	NTV	1.6E-01
Chrysene	NTV	2.9E-02	NTV	2.1E-02
Dibenz(a,h)anthracene	NTV	4.3E-01	NTV	4.3E-01
Fluoranthene	1.1E+01	NTV	7.9E+00	NTV
Fluorene	1.7E+01	NTV	1.3E+01	NTV
Indeno(1,2,3-cd)pyrene	NTV	2.0E-01	NTV	1.5E-01
Naphthalene	7.8E+00	NTV	6.1E+00	NTV
Perylene	NTV	NTV	NTV	NTV
Phenanthrene	6.2E+01	NTV	4.4E+01	NTV
Pyrene	1.2E+01	NTV	6.7E+00	NTV

Concentration-Toxicity Screen for Soil Depth Intervals[a]
Old Conservation Yard RFI Site

Total Petroleum Hydrocarbons				
C08-C11(Gasoline Range)	NTV	NTV	NTV	NTV
C11-C14(Kerosene Range)	NTV	NTV	NTV	NTV
C14-C20(Diesel Range)	NTV	NTV	NTV	NTV
C20-C30(Lubricant Oil Range)	NTV	NTV	NTV	NTV
PCDD/PCDFs				
2,3,7,8-TCDD	NTV	2.3E-01	NTV	2.6E-01
1,2,3,7,8-PeCDD	NTV	6.8E+00	NTV	4.8E+00
1,2,3,4,7,8-HxCDD	NTV	6.9E-01	NTV	7.1E-01
1,2,3,6,7,8-HxCDD	NTV	1.3E+00	NTV	5.3E-01
1,2,3,7,8,9-HxCDD	NTV	1.1E+00	NTV	1.2E+00
1,2,3,4,6,7,8-HpCDD	NTV	3.8E+00	NTV	3.3E+00
OCDD	NTV	3.2E-01	NTV	2.6E-01
2,3,7,8-TCDF	NTV	1.3E-01	NTV	1.3E-01
1,2,3,7,8-PeCDF	NTV	3.7E-02	NTV	3.7E-02
2,3,4,7,8-PeCDF	NTV	1.2E+00	NTV	1.2E+00
1,2,3,4,7,8-HxCDF	NTV	8.1E-01	NTV	7.8E-01
1,2,3,6,7,8-HxCDF	NTV	1.3E-01	NTV	2.6E-01
2,3,4,6,7,8-HxCDF	NTV	3.8E-01	NTV	3.9E-01
1,2,3,7,8,9-HxCDF	NTV	1.3E-01	NTV	1.4E-01
1,2,3,4,6,7,8-HpCDF	NTV	1.5E-01	NTV	1.2E-01
1,2,3,4,7,8,9-HpCDF	NTV	3.9E-02	NTV	1.6E-02
OCDF	NTV	1.6E-02	NTV	1.2E-02
PCBs				
Aroclor-1248	NTV	1.1E+04	NTV	8.6E+03
Aroclor-1254	2.7E+05	1.1E+01	2.7E+05	1.1E+01
Aroclor-1260	NTV	2.9E+02	NTV	1.5E+02
PCB-105	NTV	4.6E-02	NTV	2.4E-02
PCB-114	NTV	8.2E-04	NTV	4.3E-04
PCB-118	NTV	9.2E-02	NTV	4.8E-02
PCB-123	NTV	1.3E-03	NTV	6.8E-04
PCB-126	NTV	1.2E+01	NTV	6.2E+00
PCB-156	NTV	3.1E-02	NTV	1.6E-02
PCB-157	NTV	1.4E-02	NTV	7.2E-03
PCB-167	NTV	2.4E-02	NTV	1.2E-02
PCB-169	NTV	3.6E-01	NTV	1.9E-01
PCB-189	NTV	3.6E-03	NTV	1.9E-03
PCB-77	NTV	2.4E-02	NTV	1.2E-02
PCB-81	NTV	1.3E-02	NTV	6.6E-03
Cumulative Risk	3.5E+05	1.1E+04	3.9E+05	8.8E+03

Notes:

a. Cancer concentration-toxicity screen value = soil concentration x oral cancer slope factor. Noncancer concentration-toxicity screen value = soil concentration / oral reference dose. Concentration-toxicity screen values are for comparative purposes only and are not an indication of risk.

NTV - indicates that adequate toxicity data were not available for a chemical.

NC - indicates that a chemical was not selected as a soil COPC at the specified depth interval.

VOC - volatile organic compound

SVOC - semi-volatile organic compound

PCB - polychlorinated biphenyls

bgs - below ground surface

Exposure Point Concentrations in Plants

Old Conservation Yard RFI Site

Chemical	Soil Concentrations at 0 to 2 Feet bgs		Soil to Plant Biotransfer Factors[a]		Below Ground Plant Concentrations[b]		Above Ground Plant Concentrations[b]		
	CTE (mg/kg)	RME (mg/kg)	Below Ground Plants (unitless)	Above Ground Plants (unitless)	CTE (mg/kg)	RME (mg/kg)	CTE (mg/kg)	RME (mg/kg)	
Inorganic Compounds									
Boron	4.3E+00	5.2E+00	4.4E-01	5.0E-01	1.9E+00	2.3E+00	2.2E+00	2.6E+00	
Cadmium	5.2E-01	9.9E-01	3.3E-02	6.9E-02	1.7E-02	3.3E-02	3.6E-02	6.9E-02	
Lead	1.7E+01	2.1E+01	2.0E-03	5.7E-03	3.4E-02	4.1E-02	9.6E-02	1.2E-01	
Mercury	5.0E-01	3.3E+00	4.4E-02	1.1E-01	2.2E-02	1.4E-01	5.7E-02	3.7E-01	
Silver	8.6E-01	1.8E+00	4.4E-05	5.0E-04	3.8E-05	7.9E-05	4.3E-04	9.0E-04	
Thallium	8.6E-01	1.7E+00	2.0E-01	1.9E-01	1.7E-01	3.4E-01	1.6E-01	3.2E-01	
Zinc	6.6E+01	7.4E+01	2.0E-01	1.9E-01	1.3E+01	1.5E+01	1.3E+01	1.4E+01	
VOCs									
1,1,1-Trichloroethane	3.0E-03	5.5E-03	9.7E+00	2.8E-01	2.9E-02	5.3E-02	8.3E-04	1.5E-03	
1,1,2-Trichloro-1,2,2-trifluoroethane	1.2E-02	2.1E-02	4.0E+00	1.1E-01	4.9E-02	8.1E-02	1.4E-03	2.3E-03	
1,1-Dichloroethene	3.2E-03	5.5E-03	1.6E+01	4.5E-01	4.9E-02	8.6E-02	1.4E-03	2.5E-03	
1,2-Dichloroethane	NC	NC	3.7E+01	1.1E+00	NC	NC	NC	NC	
2-Butanone	2.2E-02	1.1E-02	1.8E+02	5.2E+00	4.1E+00	2.0E+00	1.2E-01	5.8E-02	c
Acetone	3.5E-01	3.5E+00	3.6E+02	1.0E+01	1.3E+02	1.3E+03	3.7E+00	3.6E+01	d
Benzene	1.1E-03	2.5E-03	1.6E+01	4.5E-01	1.8E-02	3.9E-02	5.1E-04	1.1E-03	c
cis-1,2-Dichloroethene	NC	NC	2.7E+01	7.8E-01	NC	NC	NC	NC	
Ethylbenzene	1.1E-03	2.5E-03	4.2E+00	1.2E-01	4.7E-03	1.0E-02	1.3E-04	2.9E-04	d
m,p-Xylene	3.2E-03	7.2E-03	4.2E+00	1.2E-01	1.4E-02	3.0E-02	3.9E-04	8.7E-04	d
Methylene chloride	4.1E-02	2.4E-01	8.1E+01	2.3E+00	3.3E+00	2.0E+01	9.4E-02	5.6E-01	d
o-Xylene	7.8E-04	1.7E-03	4.2E+00	1.2E-01	3.3E-03	7.1E-03	9.3E-05	2.0E-04	c
p-Isopropyltoluene	1.9E-03	1.9E-03	0.0E+00	0.0E+00	0.0E+00	0.0E+00	0.0E+00	0.0E+00	c
Toluene	1.5E-03	3.6E-03	7.0E+00	2.0E-01	1.1E-02	2.5E-02	3.1E-04	7.2E-04	c
Trichloroethene	3.0E-03	5.5E-03	9.5E+00	2.7E-01	2.8E-02	5.2E-02	8.1E-04	1.5E-03	d
SVOCs									
1-Methylnaphthalene	1.2E-02	1.3E-02	1.6E+00	4.4E-02	1.9E-02	2.1E-02	5.3E-04	5.9E-04	c
2-Methylnaphthalene	1.7E-01	5.6E-01	1.6E+00	4.4E-02	2.7E-01	8.7E-01	7.6E-03	2.5E-02	c
Acenaphthene	1.7E-01	7.0E-01	1.3E+00	3.8E-02	2.2E-01	9.3E-01	6.4E-03	2.6E-02	c
Acenaphthylene	4.0E-02	1.4E-01	1.2E+00	3.4E-02	4.7E-02	1.7E-01	1.3E-03	4.8E-03	c
Anthracene	1.2E-01	4.7E-01	7.1E-01	2.0E-02	8.4E-02	3.3E-01	2.4E-03	9.5E-03	d
Benzo(a)anthracene	3.9E-02	1.8E-01	1.3E-01	3.8E-03	5.2E-03	2.4E-02	1.5E-04	7.0E-04	d
Benzo(a)pyrene	3.6E-02	1.8E-01	5.7E-02	1.6E-03	2.0E-03	9.9E-03	5.9E-05	2.8E-04	d
Benzo(e)pyrene	7.1E-02	3.1E-01	5.0E-02	1.4E-03	3.5E-03	1.5E-02	1.0E-04	4.4E-04	c
Benzo(b)fluoranthene	4.4E-02	2.0E-01	6.1E-02	1.8E-03	2.7E-03	1.2E-02	7.7E-05	3.5E-04	d
Benzo(g,h,i)perylene	8.4E-02	3.0E-01	4.6E-02	1.3E-03	3.8E-03	1.4E-02	1.1E-04	3.9E-04	e
Benzo(k)fluoranthene	3.6E-02	1.8E-01	8.2E-02	2.4E-03	3.0E-03	1.4E-02	8.5E-05	4.1E-04	c

Exposure Point Concentrations in Plants

Old Conservation Yard RFI Site

Chemical	Soil Concentrations at 0 to 2 Feet bgs		Soil to Plant Biotransfer Factors[a]		Below Ground Plant Concentrations[b]		Above Ground Plant Concentrations[b]		
	CTE (mg/kg)	RME (mg/kg)	Below Ground Plants (unitless)	Above Ground Plants (unitless)	CTE (mg/kg)	RME (mg/kg)	CTE (mg/kg)	RME (mg/kg)	
Chrysene	5.9E-02	2.4E-01	1.2E-01	3.6E-03	7.4E-03	3.0E-02	2.1E-04	8.5E-04	[d]
Dibenz(a,h)anthracene	2.6E-02	1.0E-01	2.9E-02	8.3E-04	7.5E-04	3.0E-03	2.2E-05	8.7E-05	[c]
Fluoranthene	9.0E-02	4.3E-01	3.0E-01	8.4E-03	2.7E-02	1.3E-01	7.6E-04	3.7E-03	[d]
Fluorene	1.7E-01	6.9E-01	3.0E-01	8.4E-03	4.9E-02	2.0E-01	1.4E-03	5.8E-03	[f]
Indeno(1,2,3-cd)pyrene	3.2E-02	1.7E-01	1.7E-02	4.8E-04	5.4E-04	2.8E-03	1.5E-05	8.0E-05	[d]
Naphthalene	6.3E-02	1.6E-01	3.3E+00	9.4E-02	2.1E-01	5.1E-01	5.9E-03	1.5E-02	[c]
Perylene	4.0E-02	1.8E-01	1.1E-01	3.2E-03	4.6E-03	2.0E-02	1.3E-04	5.7E-04	[c]
Phenanthrene	4.4E-01	1.9E+00	6.0E-01	1.7E-02	2.6E-01	1.1E+00	7.6E-03	3.2E-02	[c]
Pyrene	8.9E-02	3.7E-01	3.3E-01	9.5E-03	2.9E-02	1.2E-01	8.4E-04	3.5E-03	[d]
Total Petroleum Hydrocarbons									
C08-C11(Gasoline Range)	9.7E+00	2.2E+01	3.4E-01	9.7E-03	3.3E+00	7.3E+00	9.4E-02	2.1E-01	
C11-C14(Kerosene Range)	1.1E+01	2.2E+01	6.6E-01	1.9E-02	7.3E+00	1.4E+01	2.1E-01	4.1E-01	
C14-C20(Diesel Range)	6.5E+01	2.6E+02	3.4E-01	9.7E-03	2.2E+01	8.7E+01	6.3E-01	2.5E+00	
C20-C30(Lubricant Oil Range)	2.9E+02	1.4E+03	8.9E-02	2.5E-03	2.6E+01	1.2E+02	7.5E-01	3.5E+00	
PCDD/PCDFs									
2,3,7,8-TCDD	1.0E-06	1.8E-06	2.3E-02	6.7E-04	2.4E-08	4.1E-08	6.8E-10	1.2E-09	[g]
1,2,3,7,8-PeCDD	6.6E-06	5.2E-05	3.8E-02	1.1E-03	2.5E-07	2.0E-06	7.1E-09	5.6E-08	[g]
1,2,3,4,7,8-HxCDD	1.4E-05	5.3E-05	1.1E-04	3.2E-06	1.6E-09	5.9E-09	4.7E-11	1.7E-10	[g]
1,2,3,6,7,8-HxCDD	2.0E-05	1.0E-04	1.6E-02	4.5E-04	3.2E-07	1.6E-06	9.0E-09	4.6E-08	[g]
1,2,3,7,8,9-HxCDD	1.8E-05	8.6E-05	1.6E-02	4.5E-04	2.8E-07	1.4E-06	8.1E-09	3.9E-08	[g]
1,2,3,4,6,7,8-HpCDD	4.9E-04	2.9E-03	3.0E-05	8.4E-07	1.4E-08	8.6E-08	4.1E-10	2.4E-09	[g]
OCDD	3.7E-03	8.2E-03	7.8E-06	2.2E-07	2.9E-08	6.4E-08	8.2E-10	1.8E-09	[g]
2,3,7,8-TCDF	2.2E-06	1.0E-05	4.4E-02	1.3E-03	9.7E-08	4.4E-07	2.8E-09	1.3E-08	[g]
1,2,3,7,8-PeCDF	1.8E-06	9.5E-06	3.1E-02	8.9E-04	5.7E-08	2.9E-07	1.6E-09	8.4E-09	[g]
2,3,4,7,8-PeCDF	5.1E-06	3.0E-05	2.6E-02	7.5E-04	1.3E-07	7.8E-07	3.8E-09	2.2E-08	[g]
1,2,3,4,7,8-HxCDF	1.3E-05	6.2E-05	1.1E-04	3.2E-06	1.4E-09	7.0E-09	4.1E-11	2.0E-10	[g]
1,2,3,6,7,8-HxCDF	4.9E-06	1.0E-05	1.6E-02	4.5E-04	7.7E-08	1.6E-07	2.2E-09	4.5E-09	[g]
2,3,4,6,7,8-HxCDF	5.2E-06	2.9E-05	1.6E-02	4.5E-04	8.2E-08	4.5E-07	2.4E-09	1.3E-08	[g]
1,2,3,7,8,9-HxCDF	2.3E-06	1.0E-05	1.6E-02	4.5E-04	3.6E-08	1.6E-07	1.0E-09	4.6E-09	[g]
1,2,3,4,6,7,8-HpCDF	5.5E-05	1.2E-04	7.1E-03	2.0E-04	3.9E-07	8.3E-07	1.1E-08	2.4E-08	[g]
1,2,3,4,7,8,9-HpCDF	7.2E-06	3.0E-05	7.1E-03	2.0E-04	5.1E-08	2.1E-07	1.5E-09	6.1E-09	[g]
OCDF	1.8E-04	4.1E-04	7.8E-06	2.2E-07	1.4E-09	3.2E-09	4.0E-11	9.1E-11	[g]

Exposure Point Concentrations in Plants

Old Conservation Yard RFI Site

Chemical	Soil Concentrations at 0 to 2 Feet bgs		Soil to Plant Biotransfer Factors[a]		Below Ground Plant Concentrations[b]		Above Ground Plant Concentrations[b]		
	CTE (mg/kg)	RME (mg/kg)	Below Ground Plants (unitless)	Above Ground Plants (unitless)	CTE (mg/kg)	RME (mg/kg)	CTE (mg/kg)	RME (mg/kg)	
PCBs									
Aroclor-1248	5.0E+02	5.5E+03	0.0E+00	0.0E+00	0.0E+00	0.0E+00	0.0E+00	0.0E+00	
Aroclor-1254	1.2E+00	5.4E+00	6.0E-02	1.7E-03	7.3E-02	3.2E-01	2.1E-03	9.2E-03	c
Aroclor-1260	1.3E+01	1.4E+02	3.1E-02	8.8E-04	4.1E-01	4.4E+00	1.2E-02	1.3E-01	c
PCB-105	1.1E-03	1.2E-02	6.0E-02	1.7E-03	6.7E-05	7.0E-04	1.9E-06	2.0E-05	h
PCB-114	2.1E-05	2.1E-04	6.0E-02	1.7E-03	1.2E-06	1.3E-05	3.5E-08	3.6E-07	h
PCB-118	2.2E-03	2.4E-02	6.0E-02	1.7E-03	1.3E-04	1.4E-03	3.8E-06	4.0E-05	h
PCB-123	3.1E-05	3.3E-04	6.0E-02	1.7E-03	1.9E-06	2.0E-05	5.4E-08	5.7E-07	h
PCB-126	8.6E-05	9.2E-04	6.0E-02	1.7E-03	5.1E-06	5.5E-05	1.5E-07	1.6E-06	h
PCB-156	7.4E-04	7.9E-03	6.0E-02	1.7E-03	4.4E-05	4.7E-04	1.3E-06	1.3E-05	h
PCB-157	3.3E-04	3.5E-03	6.0E-02	1.7E-03	2.0E-05	2.1E-04	5.6E-07	6.0E-06	h
PCB-167	5.7E-04	6.1E-03	6.0E-02	1.7E-03	3.4E-05	3.7E-04	9.7E-07	1.1E-05	h
PCB-169	8.5E-06	9.2E-05	6.0E-02	1.7E-03	5.1E-07	5.5E-06	1.5E-08	1.6E-07	h
PCB-189	8.5E-05	9.2E-04	6.0E-02	1.7E-03	5.1E-06	5.5E-05	1.5E-07	1.6E-06	h
PCB-77	1.7E-04	1.8E-03	3.4E-02	9.7E-04	5.9E-06	6.3E-05	1.7E-07	1.8E-06	c
PCB-81	3.1E-05	3.2E-04	3.4E-02	9.7E-04	1.0E-06	1.1E-05	3.0E-08	3.2E-07	I

Notes:

a. Soil to plant biotransfer factors (PBF) for organic chemicals were estimated using the procedures described by DTSC (1994). For above-ground plants, PBF = 7.7Kow-0.58. For below-ground plants, PBF = 35(7.7Kow-0.58). PBFs reported by Baes et al (1984) were used for inorganic chemicals.

b. Plant exposure point concentrations are in units of milligram per kilogram (mg/kg) wet weight.

c. Kow value otained from the Hazardous Substance Data Base (HSDB).

d. Kow value obtained from DTSC (1994).

e. Kow value obtained from ATSDR.

f. Fluoranthene Kow used as surrogate.

CTE- Central Tendency Exposure

RME- Reasonable Maximum Exposure

VOC - volatile organic compound

SVOC - semi-volatile organic compound

PCDD/PCDF - polychlorinated dibenzo-p-dioxins and dibenzofurans

mg/kg - milligrams per kilogram

bgs - below ground surface

mg/kg - milligram per kilogram

Migration of Volatile COPC from Groundwater to Residential Building Indoor Air
Old Conservation Yard RFI Site

Chemical -Specific Values [a]	CTE Groundwater Concentration[b] C_r^{CTE} (mg/L)	RME Groundwater Concentration[b] C_r^{RME} (mg/L)	CTE Indoor Air Concentration[c] $C_{building}^{CTE}$ (µg/m3)	RME Indoor Air Concentration[c] $C_{building}^{RME}$ (µg/m3)
VOCs				
Chloromethane	3.2E-04	3.2E-04	2.1E-03	2.1E-03
cis-1,2-Dichloroethene	3.5E-04	3.5E-04	9.1E-04	9.1E-04
Trichloroethene	4.3E-03	4.3E-03	2.7E-02	2.7E-02

Site-Specific and Default Values			
Average soil Temperature (T_s)	1.8E+01	C°	Region-specific, estimated from graph presented in USEPA (2002)
Depth below grade to bottom of enclosed space floor (L_f)	1.5E+01	cm	USEPA (2002) default for slab-on-grade construction.
Depth below grade to water table (L_w^t)	1.9E+03	cm	See note (d)
Thickness of soil stratum A (h_A)	3.0E+02	cm	As defined by USEPA (2002), equal to Lwt.
Soil Stratum A SCS soil type	SL		Site-specific - sandy loam
Soil bulk density for soil stratum A (P_b^A)	1.7E+00	g/cm³	Site-specific - as per SRAM (MWH, 2005)
Soil porosity for soil stratum A (n^A)	3.7E-01	cm^3/cm^3	Site-specific - as per SRAM (MWH, 2005)
Soil water filled porosity for soil stratum A (0_w^A)	1.1E-01	cm³/cm³	Site-specific - as per SRAM (MWH, 2005)
Thickness of soil stratum B (h_B)	3.0E+02	cm	Conservatively assumed to be 10 feet
Soil Stratum B SCS soil type	Weathered Bedrock		
Soil bulk density for soil stratum B (P_b^B)	1.7E+00	g/cm³	Site-specific - as per SRAM (MWH, 2005)
Soil porosity for soil stratum B (n^B)	2.0E-01	cm^3/cm^3	Site-specific - as per SRAM (MWH, 2005)
Soil water filled porosity for soil stratum B (0_w^B)	5.3E-02	cm³/cm³	Site-specific - as per SRAM (MWH, 2005)
Weathered bedrock fractures (ϕwbr)	1.0E-04	cm^3/cm^3	MWH (2003)
Thickness of soil stratum C (h_C)	1.2E+03	cm	L_w-h_A - h_B
Soil Stratum C SCS soil type	Unweathered Bedrock		
Soil bulk density for soil stratum C (P_b^C)	1.7E+00	g/cm³	Site-specific - as per SRAM (MWH, 2005)
Soil porosity for soil stratum C (n^C)	1.3E-01	cm^3/cm^3	Site-specific - as per SRAM (MWH, 2005)
Soil water filled porosity for soil stratum C (0_w^C)	5.1E-02	cm³/cm³	Site-specific - as per SRAM (MWH, 2005)
Unweathered bedrock fractures (ϕubr)	5.0E-05	cm^3/cm^3	MWH (2003)
Enclosed space floor thickness (L_{crack})	1.5E+01	cm	USEPA (2002) default value.
Soil building pressure differential (^P)	4.0E+01	(g/cm-s²)	USEPA (2002) default value.
Enclosed space floor length (L_B)	1.0E+03	cm	USEPA (2002) default value.
Enclosed space floor width (W_B)	1.0E+03	cm	USEPA (2002) default value.
Enclosed space height (H_B)	2.4E+02	cm	USEPA (2002) default value.
Floor-wall seam crack width (w)	1.0E-01	cm	USEPA (2002) default value.
Indoor air exchange rate (ER)	5.0E-01	(1/hour)	DTSC (2005) default value.

Notes:

a. USEPA (2004) chemical-specific physical/chemical property values used to model soil to indoor air COPC concentrations.

b. Exposure point concentrations (EPC) as presented in Spreadsheet C2-13.

c. Indoor air concentrations estimated using USEPA (2004) Johnson and Ettinger Indoor Air Model as modified as per the SRAM (MWH 2005).

d. Depth below grade to water table estimated as the average depth to groundwater.

COPC - chemical of potential concern

UCL - upper confidence limit

CTE - Central Tendency Exposure

RME - Reasonable Maximum Exposure

Migration of Volatile COPC from Groundwater to Commercial Building Indoor Air
Old Conservation Yard RFI Site

Chemical -Specific Values[a]	CTE Groundwater Concentration[b] C_{rCTE} (mg/L)	RME Groundwater Concentration[b] C_{rRME} (mg/L)	CTE Indoor Air Concentration[c] $C_{buildingCTE}$ (µg/m3)	RME Indoor Air Concentration[c] $C_{buildingRME}$ (µg/m3)
VOCs				
Chloromethane	3.2E-04	3.2E-04	6.6E-04	6.6E-04
cis-1,2-Dichloroethene	3.5E-04	3.5E-04	2.9E-04	2.9E-04
Trichloroethene	4.3E-03	4.3E-03	8.8E-03	8.8E-03

Site-Specific and Default Values			
Average soil Temperature (T_s)	1.8E+01	C°	Region-specific, estimated from graph presented in USEPA (200
Depth below grade to bottom of enclosed space floor ($_f$)	1.5E+01	cm	USEPA (2002) default for slab-on-grade constructior
Depth below grade to water table (L_w)	1.9E+03	cm	See note (d)
Thickness of soil stratum A (l_A)	3.0E+02	cm	Conservatively assumed to be 10 fee
Soil Stratum A SCS soil type	SL		Site-specific - sandy loam
Soil bulk density for soil stratum A (l_b^A)	1.7E+00	g/cm³	Site-specific - as per SRAM (MWH, 2005
Soil porosity for soil stratum A (n^A)	3.7E-01	cm^3/cm^3	Site-specific - as per SRAM (MWH, 2005)
Soil water filled porosity for soil stratum A ($_w^A$)	1.1E-01	cm³/cm³	Site-specific - as per SRAM (MWH, 2005
Thickness of soil stratum B (l_B)	3.0E+02	cm	Conservatively assumed to be 10 fee
Soil Stratum B SCS soil type	Weathered Bedrock		
Soil bulk density for soil stratum B (l_b^B)	1.7E+00	g/cm³	Site-specific - as per SRAM (MWH, 2005
Soil porosity for soil stratum B (n^B)	2.0E-01	cm^3/cm^3	Site-specific - as per SRAM (MWH, 2005)
Soil water filled porosity for soil stratum B ($_w^B$)	5.3E-02	cm³/cm³	Site-specific - as per SRAM (MWH, 2005
Weathered bedrock fractures (ϕwbr)	1.0E-04	cm^3/cm^3	MWH (2003)
Thickness of soil stratum C (l_C)	1.2E+03	cm	L_w-h_A - h_B
Soil Stratum C SCS soil type	Unweathered Bedrock		
Soil bulk density for soil stratum C (l_b^C)	1.7E+00	g/cm³	Site-specific - as per SRAM (MWH, 2005
Soil porosity for soil stratum C (n^C)	1.3E-01	cm^3/cm^3	Site-specific - as per SRAM (MWH, 2005)
Soil water filled porosity for soil stratum C ($_w^C$)	5.1E-02	cm³/cm³	Site-specific - as per SRAM (MWH, 2005
Unweathered bedrock fractures (ϕubr)	5.0E-05	cm^3/cm^3	MWH (2003)
Enclosed space floor thickness (L_{crack})	1.5E+01	cm	USEPA (2002) default value.
Soil building pressure differential (^P)	2.0E+01	(g/cm-s²)	Mid-point of range presented in USEPA (1997), to account for slab-on-grade construction.
Enclosed space floor length (L_B)	3.0E+03	cm	Site-specific - based on 10,000 f² commercial building
Enclosed space floor width (W_B)	3.0E+03	cm	Site-specific - based on 10,000 f² commercial building
Enclosed space height (H_B)	3.7E+02	cm	Site-specific - based single story building with 12 foot ceilings.
Floor-wall seam crack width (w)	1.0E-01	cm	USEPA (2002) default value.
Indoor air exchange rate (ER)	1.0E+00	(1/hour)	DTSC (2005) default value.
Average vapor flow rate into building (Qsoil)	5.0E+00	(l/m) per 100 m^2	Site-specific - as per SRAM (MWH, 2005)

Notes:

a. USEPA (2004) chemical-specific physical/chemical property values used to model soil to indoor air COPC concentrations.

b. Exposure point concentrations (EPC) as presented in Spreadsheet C2-13.

c. Indoor air concentrations estimated using USEPA (2004) Johnson and Ettinger Indoor Air Model as modified as per the SRAM (MWH 2005).

d. Depth below grade to water table estimated as the average depth to groundwater.

Migration of Volatile COPC from Soil Vapor to Residential Building Indoor Air
Old Conservation Yard RFI Site

Chemical -Specific Values[a]	CTE Soil Soil Vapor Concentration[b] C_r^{CTE} (µg/L)		RME Soil Vapor Concentration[b] C_r^{RME} (µg/L)		CTE Indoor Air Concentration[c] $C_{building}^{CTE}$ (µg/m^3)	RME Indoor Air Concentration[c] $C_{building}^{RME}$ (µg/m^3)
VOCs						
1,1,1-Trichloroethane	5.8E-01		7.3E-01		7.3E-01	9.1E-01
1,1,2-Trichloro-1,2,2-trifluoroethane	1.0E+00		1.9E+00		1.3E+00	2.4E+00
1,1-Dichloroethene	5.7E-01		7.0E-01		7.7E-01	9.4E-01
Benzene	5.0E-01	c	5.0E-01	c	6.6E-01	6.6E-01
Ethylbenzene	2.2E-01	c	4.4E-01	c	2.7E-01	5.5E-01
m,p-Xylene	5.0E-01	c	1.0E+00	c	5.9E-01	1.2E+00
Methylene chloride	5.0E-01	d	2.5E+01	d	7.0E-01	3.5E+01
o-Xylene	1.0E-01	c	2.0E-01	c	1.3E-01	2.7E-01
p-Isopropyltoluene	3.8E-01	c	3.8E-01	c	4.2E-01	4.2E-01
Toluene	4.6E-01	c	5.0E-01	c	6.1E-01	6.6E-01
Trichloroethene	1.1E+00		3.6E+00		1.4E+00	4.6E+00
Xylenes (Total)	5.0E-01	c	1.0E+00	c	5.9E-01	1.2E+00

Site-Specific and Default Values			
Average soil Temperature (T_s)	1.8E+01	C°	Region-specific, estimated from graph presented in USEPA (2002)
Depth below grade to bottom of enclosed space floor (L_f)	1.5E+01	cm	USEPA (2002) default for slab-on-grade construction.
Depth below grade to top of contamination (L_t)	9.1E+01	cm	Site specific. All chemicals ND 1.5 or 2.5 feet, first detects at 4 feet bgs, therefore assumed to be 3 feet bgs.
Thickness of soil stratum A (h_A)	1.5E+01	cm	As defined by USEPA (2002), equal to Lt.
Soil Stratum A SCS soil type	SL		Site-specific - sandy loam
Soil bulk density for soil stratum A (P_b^A)	1.7E+00	g/cm^3	Site-specific - as per SRAM (MWH, 2005)
Soil porosity for soil stratum A (n^A)	3.7E-01	cm^3/cm^3	Site-specific - as per SRAM (MWH, 2005)
Soil water filled porosity for soil stratum A (0_w^A)	1.1E-01	cm^3/cm^3	Site-specific - as per SRAM (MWH, 2005)
Enclosed space floor thickness (L_{crack})	1.5E+01	cm	USEPA (2002) default value.
Soil building pressure differential (^P)	4.0E+01	(g/cm-s^2)	USEPA (2002) default value.
Enclosed space floor length (L_B)	1.0E+03	cm	USEPA (2002) default value.
Enclosed space floor width (W_B)	1.0E+03	cm	USEPA (2002) default value.
Enclosed space height (H_B)	2.4E+02	cm	USEPA (2002) default value.
Floor-wall seam crack width (w)	1.0E-01	cm	USEPA (2002) default value.
Indoor air exchange rate (ER)	5.0E-01	(1/hour)	DTSC (2005) default value.

Notes:

a. USEPA (2004) chemical-specific physical/chemical property values used to model soil to indoor air COPC concentrations, with the exception of p-isopropylbenzene. Physical/chemical property values for n-propylbenzene were used.

b. Exposure point concentrations (EPC) for soil vapor 0 to 10 feet bgs, as presented in Spreadsheet C2-12.

c. Indoor air concentrations estimated using USEPA (2004) Johnson and Ettinger Indoor Air Model as modified by USEPA (2004), Version 3.1.

Migration of Volatile COPC from Soil Vapor to Residential Building Indoor Air
Old Conservation Yard RFI Site

d. EPC based on 1/2 the DL for soil vapor since chemical was detected in soil and tested for in soil vapor.
e. EPCs estimated by application of the soil to soil vapor partitioning component of the Johnson and Ettinger (1991) model to EPCs in soil at 0 to 10 feet bgs.
COPC - chemical of potential concern
UCL - upper confidence limit
CTE - Central Tendency Exposure
RME - Reasonable Maximum Exposure
VOC - volatile organic compound
µg/L - micrograms per liter
µg/m3 - micrograms per cubic meter

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Migration of Volatile COPC from Soil Vapor to Commercial Building Indoor Air
Old Conservation Yard RFI Site

Chemical -Specific Values [a]	CTE Soil Vapor Concentration[b] C_r^{CTE} (µg/L)		RME Soil Vapor Concentration[b] C_r^{RME} (µg/L)		CTE Indoor Air Concentration[c] $C_{building}^{CTE}$ (µg/m^3)	RME Indoor Air Concentration[c] $C_{building}^{RME}$ (µg/m^3)
VOCs						
1,1,1-Trichloroethane	5.8E-01		7.3E-01		2.4E-01	3.0E-01
1,1,2-Trichloro-1,2,2-trifluoroethane	1.0E+00		1.9E+00		4.3E-01	8.0E-01
1,1-Dichloroethene	5.7E-01		7.0E-01		2.6E-01	3.1E-01
Benzene	5.0E-01	c	5.0E-01	c	2.2E-01	2.2E-01
Ethylbenzene	2.2E-01	c	4.4E-01	c	9.1E-02	1.8E-01
m,p-Xylene	5.0E-01	c	1.0E+00	c	2.0E-01	4.0E-01
Methylene chloride	5.0E-01	d	2.5E+01	d	2.3E-01	1.2E+01
o-Xylene	1.0E-01	c	2.0E-01	c	4.4E-02	8.9E-02
p-Isopropyltoluene	3.8E-01	c	3.8E-01	c	1.4E-01	1.4E-01
Toluene	4.6E-01	c	5.0E-01	c	2.0E-01	2.2E-01
Trichloroethene	1.1E+00		3.6E+00		4.6E-01	1.5E+00
Xylenes (Total)	5.0E-01	c	1.0E+00	c	2.0E-01	4.0E-01

Site-Specific and Default Values			
Average soil Temperature (T_s)	1.8E+01	C°	Region-specific, estimated from graph presented in USEPA (2002)
Depth below grade to bottom of enclosed space floor (L_f)	1.5E+01	cm	USEPA (2002) default for slab-on-grade construction.
Depth below grade to top of contamination (L_t)	9.1E+01	cm	Site specific. All chemicals ND 1.5 or 2.5 feet, first detects at 4 feet bgs, therefore assumed to be 3 feet bgs.
Thickness of soil stratum A (h_A)	9.1E+01	cm	As defined by USEPA (2002), equal to Lt.
Soil Stratum A SCS soil type	SL		Site-specific - sandy loam
Soil bulk density for soil stratum A (P_b^A)	1.7E+00	g/cm^3	Site-specific - as per SRAM (MWH, 2005)
Soil porosity for soil stratum A (n^A)	3.7E-01	cm^3/cm^3	Site-specific - as per SRAM (MWH, 2005)
Soil water filled porosity for soil stratum A (0_w^A)	1.1E-01	cm^3/cm^3	Site-specific - as per SRAM (MWH, 2005)
Enclosed space floor thickness (L_{crack})	1.5E+01	cm	USEPA (2002) default value.
Soil building pressure differential (^P)	4.0E+01	(g/cm-s^2)	USEPA (2002) default value.
Enclosed space floor length (L_B)	3.0E+03	cm	Site-specific - based on 10,000 ft^2 commercial building.
Enclosed space floor width (W_B)	3.0E+03	cm	Site-specific - based on 10,000 ft^2 commercial building.
Enclosed space height (H_B)	3.7E+02	cm	Site-specific - based single story building with 12 foot ceilings.
Floor-wall seam crack width (w)	1.0E-01	cm	USEPA (2002) default value.
Indoor air exchange rate (ER)	1.0E+00	(1/hour)	DTSC (2005) default value.
Average vapor flow rate into building (Qsoil)	5.0E+00	(l/m) per 100 m^2	Site-specific - as per SRAM (MWH, 2005)

Notes:

a. USEPA (2004) chemical-specific physical/chemical property values used to model soil to indoor air COPC concentrations, with the exception of p-isopropylbenzene. Physical/chemical property values for n-propylbenzene were used.

b. Exposure point concentrations (EPC) for soil vapor 0 to 10 feet bgs, as presented in Spreadsheet C2-12.

c. Indoor air concentrations estimated using USEPA (2004) Johnson and Ettinger Indoor Air Model as modified by USEPA (2004), Version 3.1.

Migration of Volatile COPC from Soil Vapor to Commercial Building Indoor Air
Old Conservation Yard RFI Site

d. EPC based on 1/2 the DL for soil vapor since chemical was detected in soil and tested for in soil vapor.

e. EPCs estimated by application of the soil to soil vapor partitioning component of the Johnson and Ettinger (1991) model to EPCs in soil at 0 to 10 feet bgs.

CTE - Central Tendency Exposure

RME - Reasonable Maximum Exposure

COPC - chemical of potential concern

VOC - volatile organic compound

µg/L - micrograms per liter

µg/m3 - micrograms per cubic meter

Flux Rates and Ambient Air Concentrations Estimated for Volatile COPC in Groundwater
Old Conservation Yard RFI Site

Volatile COPC	6-Year[a] Exposure Flux Rate Js (mg/sec-m^2)	9-Year[b] Exposure Flux Rate Js (mg/sec-m^2)	24-Year[c] Exposure Flux Rate Js (mg/sec-m^2)	25-Year[d] Exposure Flux Rate Js (mg/sec-m^2)	6-Year[a] Time-Averaged Air Concentration Ca (mg/m^3)	9-Year[b] Time-Averaged Air Concentration Ca (mg/m^3)	24-Year[c] Time-Averaged Air Concentration Ca (mg/m^3)	25-Year[d] Time-Averaged Air Concentration Ca (mg/m^3)
VOCs								
Chloromethane	5.4E-09	5.4E-09	5.4E-09	5.4E-09	1.3E-07	1.3E-07	1.3E-07	1.3E-07
cis-1,2-Dichloroethene	1.3E-09	1.3E-09	1.3E-09	1.3E-09	3.2E-08	3.2E-08	3.2E-08	3.2E-08
Trichloroethene	4.5E-08	4.5E-08	4.5E-08	4.5E-08	1.1E-06	1.1E-06	1.1E-06	1.1E-06
Site-Specific Values								
Length of box (L)	198 m [e]							
Mixing height (H)	2 m [f]							
Wind speed (WS)	2 m/s [g]							

Notes:

a. 6-year exposure is applicable to average and RME residential and recreational child scenario.
b. 9-year exposure is applicable to average worker scenario.
c. 24-year exposure is applicable to average and RME residential and recreational adult scenario.
d. 25-year exposure is applicable to RME worker scenario.
e. Site-specific; equal to the square root of the total area of the RFI site.
f. EPA default value.
g. Site-specific value, as presented in the SRAM (MWH 2005).
COPC - chemical of potential concern
VOC - volatile organic compound
mg/sec-m^2 - milligram per second per square meter
mg/m^3 - milligram per cubic meter

Spreadsheet C2-22 (1 of 1)

Parameter Values Used for Migration of Volatile COPC from Groundwater to Ambient Air
Old Conservation Yard RFI Site

Constituent	RME Soil Vapor Concentration Cs (ug/m^3)	Diffusivity in air D_a (cm^2/s)	Diffusivity in water D_w (cm^2/s)	Henry's law constant at reference temperature H (atm-m^3/mol)	Organic carbon partition coefficient K_{oc} (cm^3/g)	Effective diffusion coefficient D^{eff}_A (cm^2/s)
Chloromethane	9.76E+01	1.26E-01	6.50E-06	8.80E-03	2.12E+00	1.06E-02
cis-1,2-Dichloroethene	4.37E+01	7.36E-02	1.13E-05	4.07E-03	3.55E+01	6.21E-03
Trichloroethene	1.31E+03	7.90E-02	9.10E-06	1.03E-02	1.66E+02	6.67E-03

Site-Specific and Default Values

Organic carbon content of soil (f_{oc})	2.3E-03	fraction	Site-specific - as per SRAM (MWH, 2005)
Soil bulk density for soil stratum (P_b)	1.7E+00	g/cm^3	Site-specific - as per SRAM (MWH, 2005)
Soil porosity (n)	3.7E-01	cm^3/cm^3	Site-specific - as per SRAM (MWH, 2005)
Soil water filled porosity (0_w)	1.1E-01	cm^3/cm^3	Site-specific - as per SRAM (MWH, 2005)
Depth to groundwater (L)	1859	cm	Site-specific
Site Area (A)	9.7	acres	Site-specific
Q/C coefficient A	12	unitless	USEPA (2002) default
Q/C coefficient B	18	unitless	USEPA (2002) default
Q/C coefficient C	210	unitless	USEPA (2002) default
Q/C	41	g/m2-s/kg/m3	USEPA (2002)
Water recharge (R)	1.0E-09	m/s	Site-specific - as per SRAM (MWH, 2005)

Flux Rates and Ambient Air Concentrations Estimated for Volatile COPC in Soils at 0 to 10 Feet bgs
Old Conservation Yard RFI Site

Volatile COPC	6-Year[a] Exposure Flux Rate Js (mg/sec-m^2)	9-Year[b] Exposure Flux Rate Js (mg/sec-m^2)	24-Year[c] Exposure Flux Rate Js (mg/sec-m^2)	25-Year[d] Exposure Flux Rate Js (mg/sec-m^2)	6-Year[a] Time-Averaged Air Concentration Ca (mg/m^3)	9-Year[b] Time-Averaged Air Concentration Ca (mg/m^3)	Time-Averaged Air Concentration Ca (mg/m^3)	Time-Averaged Air Concentration Ca (mg/m^3)
VOCs								
1,1,1-Trichloroethane	5.2E-04	5.2E-04	5.2E-04	5.2E-04	1.3E-05	1.3E-05	1.3E-05	1.3E-05
1,1,2-Trichloro-1,2,2-trifluoroethane	1.4E-03	1.4E-03	1.4E-03	1.4E-03	3.3E-05	3.3E-05	3.3E-05	3.3E-05
1,1-Dichloroethene	5.8E-04	5.8E-04	5.8E-04	5.8E-04	1.4E-05	1.4E-05	1.4E-05	1.4E-05
Benzene	4.0E-04	4.0E-04	4.0E-04	4.0E-04	9.8E-06	9.8E-06	9.8E-06	9.8E-06
Ethylbenzene	3.1E-04	3.1E-04	3.1E-04	3.1E-04	7.4E-06	7.4E-06	7.4E-06	7.4E-06
m,p-Xylene	7.1E-04	7.1E-04	7.1E-04	7.1E-04	1.7E-05	1.7E-05	1.7E-05	1.7E-05
Methylene chloride	2.3E-02	2.3E-02	2.3E-02	2.3E-02	5.6E-04	5.6E-04	5.6E-04	5.6E-04
o-Xylene	1.6E-04	1.6E-04	1.6E-04	1.6E-04	3.9E-06	3.9E-06	3.9E-06	3.9E-06
Toluene	4.0E-04	4.0E-04	4.0E-04	4.0E-04	9.7E-06	9.7E-06	9.7E-06	9.7E-06
Trichloroethene	2.6E-03	2.6E-03	2.6E-03	2.6E-03	6.4E-05	6.4E-05	6.4E-05	6.4E-05
Xylenes (Total)	7.1E-04	7.1E-04	7.1E-04	7.1E-04	1.7E-05	1.7E-05	1.7E-05	1.7E-05

Site-Specific Values		
Length of box (L)	198 m	[e]
Mixing height (H)	2 m	[f]
Wind speed (WS)	2 m/s	[g]

Notes:
a. 6-year exposure is applicable to average and RME residential and recreational child scenario.
b. 9-year exposure is applicable to average worker scenario.
c. 24-year exposure is applicable to CTE and RME residential and recreational adult scenario.
d. 25-year exposure is applicable to RME worker scenario.
e. Site-specific; equal to the square root of the total area of the RFI site.
f. USEPA default value.
g. Site-specific value, as presented in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyl
PCDD/PCDF - polychlorinated dibenzo-p-dioxins and dibenzofurans
COPC - chemical of potential concern
bgs - below ground surface
mg/sec-m^2 - milligram per second per square meter
mg/m^3 - milligram per cubic meter

Spreadsheet C2-20 (1 of 1)

Parameter Values Used for Migration of Volatile COPC from Soil to Ambient Air
Old Conservation Yard RFI Site

Constituent	RME Soil Vapor Concentration Cs (ug/m^3)	Diffusivity in air D_a (cm^2/s)	Diffusivity in water D_w (cm^2/s)	Henry's law constant at reference temperature H (atm-m^3/mol)	Organic carbon partition coefficient K_{oc} (cm^3/g)	Effective diffusion coefficient D^{eff}_A (cm^2/s)
1,1,1-Trichloroethane	7.28E+02	7.80E-02	8.80E-06	1.72E-02	1.10E+02	6.58E-03
1,1,2-Trichloro-1,2,2-trifluoroethane	1.92E+03	7.80E-02	8.20E-06	4.80E-01	1.11E+04	6.58E-03
1,1-Dichloroethene	6.98E+02	9.00E-02	1.04E-05	2.60E-02	5.89E+01	7.59E-03
Benzene	5.00E+02	8.80E-02	9.80E-06	5.54E-03	5.89E+01	7.43E-03
Ethylbenzene	4.44E+02	7.50E-02	7.80E-06	7.86E-03	3.63E+02	6.33E-03
m,p-Xylene	1.00E+03	7.69E-02	8.44E-06	7.64E-03	3.89E+02	6.49E-03
Methylene chloride	2.50E+04	1.01E-01	1.17E-05	2.18E-03	1.17E+01	8.52E-03
o-Xylene	2.01E+02	8.70E-02	1.00E-05	5.18E-03	3.63E+02	7.34E-03
Toluene	5.00E+02	8.70E-02	8.60E-06	6.62E-03	1.82E+02	7.34E-03
Xylenes (Total)	1.00E+03	7.69E-02	8.44E-06	7.64E-03	3.89E+02	6.49E-03
Trichloroethene	3.63E+03	7.90E-02	9.10E-06	1.03E-02	1.66E+02	6.67E-03

Site-Specific and Default Values

Organic carbon content of soil (f_{oc})	2.3E-03	fraction	Site-specific - as per SRAM (MWH, 2005)
Soil bulk density for soil stratum (P_b)	1.7E+00	g/cm^3	Site-specific - as per SRAM (MWH, 2005)
Soil porosity (n)	3.7E-01	cm^3/cm^3	Site-specific - as per SRAM (MWH, 2005)
Soil water filled porosity (0_w)	1.1E-01	cm^3/cm^3	Site-specific - as per SRAM (MWH, 2005)
Soil depth (L)	91	cm	Site-specific
Site Area (A)	9.7	acres	Site-specific
Q/C coefficient A	12	unitless	USEPA (2002) default
Q/C coefficient B	18	unitless	USEPA (2002) default
Q/C coefficient C	210	unitless	USEPA (2002) default
Q/C	41	g/m2-s/kg/m3	USEPA (2002)
Water recharge (R)	1.0E-09	m/s	Site-specific - as per SRAM (MWH, 2005)

Estimation of Fugitive Dust Exposure Point Concentrations
Old Conservation Yard RFI Site

$$Ca = \frac{Cs}{PEF}$$

Where,

Ca = concentration of COPC in air (mg/m^3)
Cs = concentration of COPC in soil (mg/kg)
PEF = particulate emission factor (m^3/kg)

Chemical	CTE Soil Concentration [a] (mg/kg)	RME Soil Concentration [a] (mg/kg)	CTE Air Concentration (mg/m^3)	RME Air Concentration (mg/m^3)
Non-Volatile COPCs in Soils (0-2 feet bgs)				
Inorganic Compounds				
Boron	4.3E+00	5.2E+00	1.8E-09	2.2E-09
Cadmium	5.2E-01	9.9E-01	2.2E-10	4.2E-10
Lead	1.7E+01	2.1E+01	7.1E-09	8.7E-09
Mercury	5.0E-01	3.3E+00	2.1E-10	1.4E-09
Silver	8.6E-01	1.8E+00	3.6E-10	7.5E-10
Thallium	8.6E-01	1.7E+00	3.6E-10	7.1E-10
Zinc	6.6E+01	7.4E+01	2.8E-08	3.1E-08
SVOCs				
2-Methylnaphthalene	1.7E-01	5.6E-01	7.2E-11	2.3E-10
Acenaphthene	1.7E-01	7.0E-01	7.1E-11	2.9E-10
Acenaphthylene	4.0E-02	1.4E-01	1.7E-11	6.0E-11
Anthracene	1.2E-01	4.7E-01	5.0E-11	2.0E-10
Benzo(a)anthracene	3.9E-02	1.8E-01	1.6E-11	7.7E-11
Benzo(a)pyrene	3.6E-02	1.8E-01	1.5E-11	7.4E-11
Benzo(b)fluoranthene	4.4E-02	2.0E-01	1.8E-11	8.3E-11
Benzo(e)pyrene	7.1E-02	3.1E-01	3.0E-11	1.3E-10
Benzo(g,h,i)perylene	8.4E-02	3.0E-01	3.5E-11	1.3E-10
Benzo(k)fluoranthene	3.6E-02	1.8E-01	1.5E-11	7.4E-11
Chrysene	5.9E-02	2.4E-01	2.5E-11	1.0E-10
Dibenz(a,h)anthracene	2.6E-02	1.0E-01	1.1E-11	4.4E-11
Fluoranthene	9.0E-02	4.3E-01	3.8E-11	1.8E-10
Fluorene	1.7E-01	6.9E-01	7.0E-11	2.9E-10
Indeno(1,2,3-cd)pyrene	3.2E-02	1.7E-01	1.3E-11	7.0E-11
Naphthalene	6.3E-02	1.6E-01	2.6E-11	6.6E-11
Perylene	4.0E-02	1.8E-01	1.7E-11	7.4E-11
Phenanthrene	4.4E-01	1.9E+00	1.8E-10	7.8E-10
Pyrene	8.9E-02	3.7E-01	3.7E-11	1.6E-10
Total Petroleum Hydrocarbons				
C08-C11(Gasoline Range)	9.7E+00	2.2E+01	4.1E-09	9.0E-09
C11-C14(Kerosene Range)	1.1E+01	2.2E+01	4.6E-09	9.1E-09
C14-C20(Diesel Range)	6.5E+01	2.6E+02	2.7E-08	1.1E-07
C20-C30(Lubricant Oil Range)	2.9E+02	1.4E+03	1.2E-07	5.7E-07
PCDD/PCDFs				
2,3,7,8-TCDD	1.0E-06	1.8E-06	4.2E-16	7.4E-16
1,2,3,7,8-PeCDD	6.6E-06	5.2E-05	2.8E-15	2.2E-14
1,2,3,4,7,8-HxCDD	1.4E-05	5.3E-05	6.1E-15	2.2E-14
1,2,3,6,7,8-HxCDD	2.0E-05	1.0E-04	8.4E-15	4.3E-14
1,2,3,7,8,9-HxCDD	1.8E-05	8.6E-05	7.5E-15	3.6E-14
1,2,3,4,6,7,8-HpCDD	4.9E-04	2.9E-03	2.1E-13	1.2E-12
OCDD	3.7E-03	8.2E-03	1.6E-12	3.5E-12
2,3,7,8-TCDF	2.2E-06	1.0E-05	9.2E-16	4.2E-15
1,2,3,7,8-PeCDF	1.8E-06	9.5E-06	7.6E-16	4.0E-15
2,3,4,7,8-PeCDF	5.1E-06	3.0E-05	2.1E-15	1.3E-14

Estimation of Fugitive Dust Exposure Point Concentrations
Old Conservation Yard RFI Site

$$Ca = \frac{Cs}{PEF}$$

Where,

Ca = concentration of COPC in air (mg/m^3)
Cs = concentration of COPC in soil (mg/kg)
PEF = particulate emission factor (m^3/kg)

Chemical	CTE Soil Concentration [a] (mg/kg)	RME Soil Concentration [a] (mg/kg)	CTE Air Concentration (mg/m^3)	RME Air Concentration (mg/m^3)
1,2,3,4,7,8-HxCDF	1.3E-05	6.2E-05	5.4E-15	2.6E-14
1,2,3,6,7,8-HxCDF	4.9E-06	1.0E-05	2.1E-15	4.2E-15
2,3,4,6,7,8-HxCDF	5.2E-06	2.9E-05	2.2E-15	1.2E-14
1,2,3,7,8,9-HxCDF	2.3E-06	1.0E-05	9.6E-16	4.3E-15
1,2,3,4,6,7,8-HpCDF	5.5E-05	1.2E-04	2.3E-14	4.9E-14
1,2,3,4,7,8,9-HpCDF	7.2E-06	3.0E-05	3.0E-15	1.3E-14
OCDF	1.8E-04	4.1E-04	7.6E-14	1.7E-13
PCBs				
Aroclor-1248	5.0E+02	5.5E+03	2.1E-07	2.3E-06
Aroclor-1254	1.2E+00	5.4E+00	5.2E-10	2.3E-09
Aroclor-1260	1.3E+01	1.4E+02	5.6E-09	6.0E-08
PCB-105	1.1E-03	1.2E-02	4.7E-13	5.0E-12
PCB-114	2.1E-05	2.1E-04	8.6E-15	8.8E-14
PCB-118	2.2E-03	2.4E-02	9.4E-13	9.9E-12
PCB-123	3.1E-05	3.3E-04	1.3E-14	1.4E-13
PCB-126	8.6E-05	9.2E-04	3.6E-14	3.8E-13
PCB-156	7.4E-04	7.9E-03	3.1E-13	3.3E-12
PCB-157	3.3E-04	3.5E-03	1.4E-13	1.5E-12
PCB-167	5.7E-04	6.1E-03	2.4E-13	2.6E-12
PCB-169	8.5E-06	9.2E-05	3.6E-15	3.8E-14
PCB-189	8.5E-05	9.2E-04	3.6E-14	3.8E-13
PCB-77	1.7E-04	1.8E-03	7.2E-14	7.7E-13
PCB-81	3.1E-05	3.2E-04	1.3E-14	1.4E-13

Notes:
a. Exposure point concentrations as presented in Spreadsheets C2-10 and C2-11 for soil at 0 to 2 and 0 to 10 feet bgs, respectively.
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyl
PCDD/PCDF - polychlorinated dibenzo-p-dioxins and dibenzofurans
CTE - Central Tendency Exposure
RME - Reasonable Maximum Exposure
bgs - below ground surface
mg/kg - milligram per kilogram
mg/m^3 - milligram per cubic meter

Spreadsheet C2-18 (1 of 1)

Estimation of Particulate Emission Factor (PEF)
Old Conservation Yard RFI Site

$$PEF = \frac{LS\,x\,V\,x\,3{,}600\,\mathrm{sec}/hour}{A}\,x\,\frac{1{,}000\,g/kg}{0.036\,x\,(1-G)\,x\left(\frac{U_m}{U_t}\right)3\,x\,F(x)}$$

PEF Parameters		Value	Units
PEF =	particulate emission factor	2.4E+09	m^3/kg
LS =	width of the contaminated area (site-specific)[a]	198	m
V =	wind speed in the mixing zone (site specific)[b]	1.78	m/s
A =	area of contaminated area (site-specific)[a]	39,255	m^2
G =	fraction of vegetative/paved road/building cover (USEPA default)[b]	0.50	unitless
0.036 =	respirable fraction (USEPA default)[b]	0.036	g/m^2-hr
U_m =	annual windspeed (site-specific)[b]	1.78	m/s
U_t =	equivalent threshold of windspeed at 7 m (USEPA default)[b]	11.32	m/s
F(x) =	function dependent on Um/Ut (USEPA default)[b]	0.19	unitless

Notes:

a. Based on the total area of non-volatile COPC contamination.

b. SRAM (MWH 2005)

COPC - chemical of potential concern

TPH to Petroleum Constituent Extrapolation for Soil (0-10 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
C08-C11 (Gasoline Range)	MJ110	1.40E+02	7.0E+01	U		-	-
C11-C14 (Kerosene Range)	MJ110	1.40E+02	7.0E+01	U		-	-
C14-C20 (Diesel Range)	MJ110	9.20E+01	9.2E+01	J		-	-
C20-C30 (Lubricant Oil Range)	MJ110	6.70E+02	6.7E+02			-	-
C11-C30	MJ110	-	8.3E+02	-		-	-
Benzene	MJ110	-	-	-	1.2E-04	8.4E-03	8.4E-03
Ethylbenzene	MJ110	-	-	-	1.2E-04	8.4E-03	8.4E-03
Toluene	MJ110	-	-	-	1.2E-04	8.4E-03	8.4E-03
m,p-Xylene	MJ110	-	-	-	3.6E-04	2.5E-02	2.5E-02
o-Xylene	MJ110	-	-	-	8.0E-05	5.6E-03	5.6E-03
Xylene (total)	MJ110	-	-	-	4.4E-04	3.1E-02	3.1E-02
2-Methylnaphthalene	MJ110	6.48E-03	3.2E-03	UJ	2.8E-02	1.9E+00	3.2E-03
Acenaphthene	MJ110	1.96E-03	9.8E-04	U	5.7E-04	4.8E-01	9.8E-04
Acenaphthylene	MJ110	1.96E-03	9.8E-04	U	7.0E-05	5.8E-02	9.8E-04
Anthracene	MJ110	1.96E-03	9.8E-04	UJ	3.7E-04	3.1E-01	9.8E-04
Benzo(a)anthracene	MJ110	1.96E-03	9.8E-04	U	2.7E-05	2.2E-02	9.8E-04
Benzo(a)pyrene	MJ110	1.96E-03	9.8E-04	U	2.7E-05	2.3E-02	9.8E-04
Benzo(b)fluoranthene	MJ110	1.96E-03	9.8E-04	U	4.3E-05	3.6E-02	9.8E-04
Benzo(e)pyrene	MJ110	1.72E-01	1.72E-01		2.1E-04	1.72E-01	1.72E-01
Benzo(g,h,i)perylene	MJ110	1.84E-01	1.8E-01		2.2E-04	1.8E-01	1.8E-01
Benzo(k)fluoranthene	MJ110	4.63E-03	4.6E-03		2.1E-05	1.7E-02	4.6E-03
Chrysene	MJ110	2.01E-02	2.0E-02		5.9E-05	4.9E-02	2.0E-02
Dibenz(a,h)anthracene	MJ110	9.21E-03	9.2E-03		1.1E-05	9.2E-03	9.2E-03
Fluoranthene	MJ110	5.60E-03	5.6E-03		7.5E-05	6.2E-02	5.6E-03
Fluorene	MJ110	4.28E-03	2.1E-03	UJ	5.7E-04	4.7E-01	2.1E-03
Indeno(1,2,3-cd)pyrene	MJ110	1.23E-02	1.2E-02		2.4E-05	2.0E-02	1.2E-02
Naphthalene	MJ110	1.08E-02	5.4E-03	UJ	6.9E-03	4.9E-01	5.4E-03
Perylene	MJ110	9.81E-02	9.8E-02		1.2E-04	9.8E-02	9.8E-02
Phenanthrene	MJ110	9.11E-03	9.1E-03	J	1.5E-03	1.3E+00	9.1E-03
Pyrene	MJ110	5.87E-03	5.9E-03		1.4E-04	1.1E-01	5.9E-03
C08-C11 (Gasoline Range)	OLDCONS1	1.00E-01	5.0E-02	U		-	-
C11-C14 (Kerosene Range)	OLDCONS1	1.00E-01	5.0E-02	U		-	-
C14-C20 (Diesel Range)	OLDCONS1	6.40E+01	6.4E+01			-	-
C20-C30 (Lubricant Oil Range)	OLDCONS1	1.00E-01	5.0E-02	U		-	-
C11-C30	OLDCONS1	-	6.4E+01	-		-	-
Benzene	OLDCONS1	5.00E-03	2.5E-03	U	1.2E-04	6.0E-06	6.0E-06
Ethylbenzene	OLDCONS1	5.00E-03	2.5E-03	U	1.2E-04	6.0E-06	6.0E-06
Toluene	OLDCONS1	3.00E-03	3.0E-03	J	1.2E-04	6.0E-06	3.0E-03
m,p-Xylene	OLDCONS1	-	-	-	3.6E-04	1.8E-05	1.8E-05
o-Xylene	OLDCONS1	-	-	-	8.0E-05	4.0E-06	4.0E-06
Xylene (total)	OLDCONS1	5.00E-03	2.5E-03	U	4.4E-04	2.2E-05	2.2E-05
2-Methylnaphthalene	OLDCONS1	3.00E-01	1.5E-01	U	2.8E-02	1.4E-03	1.4E-03
Acenaphthene	OLDCONS1	3.00E-01	1.5E-01	U	5.7E-04	3.7E-02	3.7E-02
Acenaphthylene	OLDCONS1	3.00E-01	1.5E-01	U	7.0E-05	4.5E-03	4.5E-03
Anthracene	OLDCONS1	3.00E-01	1.5E-01	U	3.7E-04	2.4E-02	2.4E-02
Benzo(a)anthracene	OLDCONS1	3.00E-01	1.5E-01	U	2.7E-05	1.7E-03	1.7E-03
Benzo(a)pyrene	OLDCONS1	3.00E-01	1.5E-01	U	2.7E-05	1.7E-03	1.7E-03
Benzo(b)fluoranthene	OLDCONS1	3.00E-01	1.5E-01	U	4.3E-05	2.8E-03	2.8E-03
Benzo(e)pyrene	OLDCONS1	-	-	-	2.1E-04	1.3E-02	1.3E-02
Benzo(g,h,i)perylene	OLDCONS1	3.00E-01	1.5E-01	U	2.2E-04	1.4E-02	1.4E-02
Benzo(k)fluoranthene	OLDCONS1	3.00E-01	1.5E-01	U	2.1E-05	1.3E-03	1.3E-03
Chrysene	OLDCONS1	5.00E-01	5.0E-01		5.9E-05	3.8E-03	5.0E-01
Dibenz(a,h)anthracene	OLDCONS1	3.00E-01	1.5E-01	U	1.1E-05	7.1E-04	7.1E-04
Fluoranthene	OLDCONS1	2.10E+00	2.1E+00		7.5E-05	4.8E-03	2.1E+00
Fluorene	OLDCONS1	3.00E-01	1.5E-01	U	5.7E-04	3.6E-02	3.6E-02

TPH to Petroleum Constituent Extrapolation for Soil (0-10 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Indeno(1,2,3-cd)pyrene	OLDCONS1	3.00E-01	1.5E-01	U	2.4E-05	1.5E-03	1.5E-03
Naphthalene	OLDCONS1	3.00E-01	1.5E-01	U	6.9E-03	3.5E-04	3.5E-04
Perylene	OLDCONS1	-	-	-	1.2E-04	7.6E-03	7.6E-03
Phenanthrene	OLDCONS1	1.60E+00	1.6E+00		1.5E-03	9.8E-02	1.6E+00
Pyrene	OLDCONS1	1.00E+00	1.0E+00		1.4E-04	8.7E-03	1.0E+00
C08-C11 (Gasoline Range)	OLDCONS2	1.00E-01	5.0E-02	U		-	-
C11-C14 (Kerosene Range)	OLDCONS2	1.00E-01	5.0E-02	U		-	-
C14-C20 (Diesel Range)	OLDCONS2	4.00E+00	4.0E+00			-	-
C20-C30 (Lubricant Oil Range)	OLDCONS2	-	-	-		-	-
C11-C30	OLDCONS2	-	4.1E+00	-		-	-
Benzene	OLDCONS2	5.00E-03	2.5E-03	U	1.2E-04	6.0E-06	6.0E-06
Ethylbenzene	OLDCONS2	5.00E-03	2.5E-03	U	1.2E-04	6.0E-06	6.0E-06
Toluene	OLDCONS2	7.00E-03	7.0E-03	J	1.2E-04	6.0E-06	7.0E-03
m,p-Xylene	OLDCONS2	-	-	-	3.6E-04	1.8E-05	1.8E-05
o-Xylene	OLDCONS2	-	-	-	8.0E-05	4.0E-06	4.0E-06
Xylene (total)	OLDCONS2	1.30E-02	1.3E-02		4.4E-04	2.2E-05	1.3E-02
2-Methylnaphthalene	OLDCONS2	3.00E-01	1.5E-01	U	2.8E-02	1.4E-03	1.4E-03
Acenaphthene	OLDCONS2	3.00E-01	1.5E-01	U	5.7E-04	2.3E-03	2.3E-03
Acenaphthylene	OLDCONS2	3.00E-01	1.5E-01	U	7.0E-05	2.8E-04	2.8E-04
Anthracene	OLDCONS2	3.00E-01	1.5E-01	U	3.7E-04	1.5E-03	1.5E-03
Benzo(a)anthracene	OLDCONS2	3.00E-01	1.5E-01	U	2.7E-05	1.1E-04	1.1E-04
Benzo(a)pyrene	OLDCONS2	3.00E-01	1.5E-01	U	2.7E-05	1.1E-04	1.1E-04
Benzo(b)fluoranthene	OLDCONS2	3.00E-01	1.5E-01	U	4.3E-05	1.8E-04	1.8E-04
Benzo(e)pyrene	OLDCONS2	-	-	-	2.1E-04	8.4E-04	8.4E-04
Benzo(g,h,i)perylene	OLDCONS2	3.00E-01	1.5E-01	U	2.2E-04	9.0E-04	9.0E-04
Benzo(k)fluoranthene	OLDCONS2	3.00E-01	1.5E-01	U	2.1E-05	8.3E-05	8.3E-05
Chrysene	OLDCONS2	3.00E-01	1.5E-01	U	5.9E-05	2.4E-04	2.4E-04
Dibenz(a,h)anthracene	OLDCONS2	3.00E-01	1.5E-01	U	1.1E-05	4.5E-05	4.5E-05
Fluoranthene	OLDCONS2	3.00E-01	1.5E-01	U	7.5E-05	3.0E-04	3.0E-04
Fluorene	OLDCONS2	3.00E-01	1.5E-01	U	5.7E-04	2.3E-03	2.3E-03
Indeno(1,2,3-cd)pyrene	OLDCONS2	3.00E-01	1.5E-01	U	2.4E-05	9.7E-05	9.7E-05
Naphthalene	OLDCONS2	3.00E-01	1.5E-01	U	6.9E-03	3.5E-04	3.5E-04
Perylene	OLDCONS2	-	-	-	1.2E-04	4.8E-04	4.8E-04
Phenanthrene	OLDCONS2	3.00E-01	1.5E-01	U	1.5E-03	6.2E-03	6.2E-03
Pyrene	OLDCONS2	3.00E-01	1.5E-01	U	1.4E-04	5.5E-04	5.5E-04
C08-C11 (Gasoline Range)	OLDCONS3	1.00E-01	5.0E-02	U		-	-
C11-C14 (Kerosene Range)	OLDCONS3	1.00E-01	5.0E-02	U		-	-
C14-C20 (Diesel Range)	OLDCONS3	1.00E-01	5.0E-02	U		-	-
C20-C30 (Lubricant Oil Range)	OLDCONS3	4.00E+03	4.0E+03			-	-
C11-C30	OLDCONS3	-	4.0E+03	-		-	-
Benzene	OLDCONS3	5.00E-03	2.5E-03	U	1.2E-04	6.0E-06	6.0E-06
Ethylbenzene	OLDCONS3	5.00E-03	2.5E-03	U	1.2E-04	6.0E-06	6.0E-06
Toluene	OLDCONS3	5.00E-03	2.5E-03	U	1.2E-04	6.0E-06	6.0E-06
m,p-Xylene	OLDCONS3	-	-	-	3.6E-04	1.8E-05	1.8E-05
o-Xylene	OLDCONS3	-	-	-	8.0E-05	4.0E-06	4.0E-06
Xylenes (total)	OLDCONS3	6.00E-03	6.0E-03		#N/A	#N/A	6.0E-03
2-Methylnaphthalene	OLDCONS3	3.00E+00	1.5E+00	U	2.8E-02	1.4E-03	1.4E-03
Acenaphthene	OLDCONS3	3.00E+00	1.5E+00	U	5.7E-04	2.3E+00	1.5E+00
Acenaphthylene	OLDCONS3	3.00E+00	1.5E+00	U	7.0E-05	2.8E-01	2.8E-01
Anthracene	OLDCONS3	3.00E+00	1.5E+00	U	3.7E-04	1.5E+00	1.5E+00
Benzo(a)anthracene	OLDCONS3	3.00E+00	1.5E+00	U	2.7E-05	1.1E-01	1.1E-01
Benzo(a)pyrene	OLDCONS3	3.00E+00	1.5E+00	U	2.7E-05	1.1E-01	1.1E-01
Benzo(b)fluoranthene	OLDCONS3	3.00E+00	1.5E+00	U	4.3E-05	1.7E-01	1.7E-01
Benzo(e)pyrene	OLDCONS3	-	-	-	2.1E-04	8.3E-01	8.3E-01
Benzo(g,h,i)perylene	OLDCONS3	3.00E+00	1.5E+00	U	2.2E-04	8.8E-01	8.8E-01
Benzo(k)fluoranthene	OLDCONS3	3.00E+00	1.5E+00	U	2.1E-05	8.2E-02	8.2E-02

TPH to Petroleum Constituent Extrapolation for Soil (0-10 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Chrysene	OLDCONS3	3.00E+00	1.5E+00	U	5.9E-05	2.3E-01	2.3E-01
Dibenz(a,h)anthracene	OLDCONS3	3.00E+00	1.5E+00	U	1.1E-05	4.4E-02	4.4E-02
Fluoranthene	OLDCONS3	3.00E+00	1.5E+00	U	7.5E-05	3.0E-01	3.0E-01
Fluorene	OLDCONS3	3.00E+00	1.5E+00	U	5.7E-04	2.3E+00	1.5E+00
Indeno(1,2,3-cd)pyrene	OLDCONS3	3.00E+00	1.5E+00	U	2.4E-05	9.6E-02	9.6E-02
Naphthalene	OLDCONS3	3.00E+00	1.5E+00	U	6.9E-03	3.5E-04	3.5E-04
Perylene	OLDCONS3	-	-	-	1.2E-04	4.7E-01	4.7E-01
Phenanthrene	OLDCONS3	3.00E+00	1.5E+00	U	1.5E-03	6.1E+00	1.5E+00
Pyrene	OLDCONS3	3.00E+00	1.5E+00	U	1.4E-04	5.5E-01	5.5E-01
C08-C11 (Gasoline Range)	OLDCONS4	1.00E-01	5.0E-02	U		-	-
C11-C14 (Kerosene Range)	OLDCONS4	1.00E-01	5.0E-02	U		-	-
C14-C20 (Diesel Range)	OLDCONS4	2.00E+00	2.0E+00			-	-
C20-C30 (Lubricant Oil Range)	OLDCONS4	-	-			-	-
C11-C30	OLDCONS4	-	2.1E+00	-		-	-
Benzene	OLDCONS4	5.00E-03	2.5E-03	U	1.2E-04	6.0E-06	6.0E-06
Ethylbenzene	OLDCONS4	5.00E-03	2.5E-03	U	1.2E-04	6.0E-06	6.0E-06
Toluene	OLDCONS4	5.00E-03	2.5E-03	U	1.2E-04	6.0E-06	6.0E-06
m,p-Xylene	OLDCONS4	-	-	-	3.6E-04	1.8E-05	1.8E-05
o-Xylene	OLDCONS4	-	-	-	8.0E-05	4.0E-06	4.0E-06
Xylene (total)	OLDCONS4	5.00E-03	2.5E-03	U	4.4E-04	2.2E-05	2.2E-05
2-Methylnaphthalene	OLDCONS4	2.00E-02	1.0E-02	U	2.8E-02	1.4E-03	1.4E-03
Acenaphthene	OLDCONS4	3.00E-02	1.5E-02	U	5.7E-04	1.2E-03	1.2E-03
Acenaphthylene	OLDCONS4	3.00E-02	1.5E-02	U	7.0E-05	1.4E-04	1.4E-04
Anthracene	OLDCONS4	3.00E-02	1.5E-02	U	3.7E-04	7.7E-04	7.7E-04
Benzo(a)anthracene	OLDCONS4	3.00E-02	1.5E-02	U	2.7E-05	5.5E-05	5.5E-05
Benzo(a)pyrene	OLDCONS4	3.00E-02	1.5E-02	U	2.7E-05	5.6E-05	5.6E-05
Benzo(b)fluoranthene	OLDCONS4	3.00E-02	1.5E-02	U	4.3E-05	8.9E-05	8.9E-05
Benzo(e)pyrene	OLDCONS4	-	-	-	2.1E-04	4.2E-04	4.2E-04
Benzo(g,h,i)perylene	OLDCONS4	3.00E-02	1.5E-02	U	2.2E-04	4.5E-04	4.5E-04
Benzo(k)fluoranthene	OLDCONS4	3.00E-02	1.5E-02	U	2.1E-05	4.2E-05	4.2E-05
Chrysene	OLDCONS4	3.00E-02	1.5E-02	U	5.9E-05	1.2E-04	1.2E-04
Dibenz(a,h)anthracene	OLDCONS4	3.00E-02	1.5E-02	U	1.1E-05	2.3E-05	2.3E-05
Fluoranthene	OLDCONS4	3.00E-02	1.5E-02	U	7.5E-05	1.5E-04	1.5E-04
Fluorene	OLDCONS4	3.00E-02	1.5E-02	U	5.7E-04	1.2E-03	1.2E-03
Indeno(1,2,3-cd)pyrene	OLDCONS4	3.00E-02	1.5E-02	U	2.4E-05	4.9E-05	4.9E-05
Naphthalene	OLDCONS4	2.00E-02	1.0E-02	U	6.9E-03	3.5E-04	3.5E-04
Perylene	OLDCONS4	-	-	-	1.2E-04	2.4E-04	2.4E-04
Phenanthrene	OLDCONS4	3.00E-02	1.5E-02	U	1.5E-03	3.1E-03	3.1E-03
Pyrene	OLDCONS4	3.00E-02	1.5E-02	U	1.4E-04	2.8E-04	2.8E-04
C08-C11 (Gasoline Range)	OLDCONS5	1.00E-01	5.0E-02	U		-	-
C11-C14 (Kerosene Range)	OLDCONS5	1.00E-01	5.0E-02	U		-	-
C14-C20 (Diesel Range)	OLDCONS5	3.00E-01	3.0E-01			-	-
C20-C30 (Lubricant Oil Range)	OLDCONS5	-	-			-	-
C11-C30	OLDCONS5	-	3.5E-01	-		-	-
Benzene	OLDCONS5	5.00E-03	2.5E-03	U	1.2E-04	6.0E-06	6.0E-06
Ethylbenzene	OLDCONS5	5.00E-03	2.5E-03	U	1.2E-04	6.0E-06	6.0E-06
Toluene	OLDCONS5	1.40E-02	1.4E-02	J	1.2E-04	6.0E-06	1.4E-02
m,p-Xylene	OLDCONS5	-	-	-	3.6E-04	1.8E-05	1.8E-05
o-Xylene	OLDCONS5	-	-	-	8.0E-05	4.0E-06	4.0E-06
Xylene (total)	OLDCONS5	1.00E-02	1.0E-02		4.4E-04	2.2E-05	1.0E-02
2-Methylnaphthalene	OLDCONS5	3.00E-01	1.5E-01	U	2.8E-02	1.4E-03	1.4E-03
Acenaphthene	OLDCONS5	3.00E-01	1.5E-01	U	5.7E-04	2.0E-04	2.0E-04
Acenaphthylene	OLDCONS5	3.00E-01	1.5E-01	U	7.0E-05	2.5E-05	2.5E-05
Anthracene	OLDCONS5	3.00E-01	1.5E-01	U	3.7E-04	1.3E-04	1.3E-04
Benzo(a)anthracene	OLDCONS5	3.00E-01	1.5E-01	U	2.7E-05	9.4E-06	9.4E-06
Benzo(a)pyrene	OLDCONS5	3.00E-01	1.5E-01	U	2.7E-05	9.5E-06	9.5E-06

TPH to Petroleum Constituent Extrapolation for Soil (0-10 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Benzo(b)fluoranthene	OLDCONS5	3.00E-01	1.5E-01	U	4.3E-05	1.5E-05	1.5E-05
Benzo(e)pyrene	OLDCONS5	-	-	-	2.1E-04	7.2E-05	7.2E-05
Benzo(g,h,i)perylene	OLDCONS5	3.00E-01	1.5E-01	U	2.2E-04	7.7E-05	7.7E-05
Benzo(k)fluoranthene	OLDCONS5	3.00E-01	1.5E-01	U	2.1E-05	7.2E-06	7.2E-06
Chrysene	OLDCONS5	3.00E-01	1.5E-01	U	5.9E-05	2.1E-05	2.1E-05
Dibenz(a,h)anthracene	OLDCONS5	3.00E-01	1.5E-01	U	1.1E-05	3.9E-06	3.9E-06
Fluoranthene	OLDCONS5	3.00E-01	1.5E-01	U	7.5E-05	2.6E-05	2.6E-05
Fluorene	OLDCONS5	3.00E-01	1.5E-01	U	5.7E-04	2.0E-04	2.0E-04
Indeno(1,2,3-cd)pyrene	OLDCONS5	3.00E-01	1.5E-01	U	2.4E-05	8.4E-06	8.4E-06
Naphthalene	OLDCONS5	3.00E-01	1.5E-01	U	6.9E-03	3.5E-04	3.5E-04
Perylene	OLDCONS5	-	-	-	1.2E-04	4.1E-05	4.1E-05
Phenanthrene	OLDCONS5	3.00E-01	1.5E-01	U	1.5E-03	5.4E-04	5.4E-04
Pyrene	OLDCONS5	3.00E-01	1.5E-01	U	1.4E-04	4.8E-05	4.8E-05
C08-C11 (Gasoline Range)	OLDCONS6	1.00E-01	5.0E-02	U		-	-
C11-C14 (Kerosene Range)	OLDCONS6	1.00E-01	5.0E-02	U		-	-
C14-C20 (Diesel Range)	OLDCONS6	1.00E-01	5.0E-02	U		-	-
C20-C30 (Lubricant Oil Range)	OLDCONS6	5.00E+00	5.0E+00			-	-
C11-C30	OLDCONS6	-	5.1E+00	-		-	-
Benzene	OLDCONS6	5.00E-03	2.5E-03	U	1.2E-04	6.0E-06	6.0E-06
Ethylbenzene	OLDCONS6	5.00E-03	2.5E-03	U	1.2E-04	6.0E-06	6.0E-06
Toluene	OLDCONS6	5.00E-03	2.5E-03	U	1.2E-04	6.0E-06	6.0E-06
m,p-Xylene	OLDCONS6	-	-	-	3.6E-04	1.8E-05	1.8E-05
o-Xylene	OLDCONS6	-	-	-	8.0E-05	4.0E-06	4.0E-06
Xylene (total)	OLDCONS6	5.00E-03	2.5E-03	U	4.4E-04	2.2E-05	2.2E-05
2-Methylnaphthalene	OLDCONS6	3.00E-02	1.5E-02	U	2.8E-02	1.4E-03	1.4E-03
Acenaphthene	OLDCONS6	3.00E-02	1.5E-02	U	5.7E-04	2.9E-03	2.9E-03
Acenaphthylene	OLDCONS6	3.00E-02	1.5E-02	U	7.0E-05	3.6E-04	3.6E-04
Anthracene	OLDCONS6	3.00E-02	1.5E-02	U	3.7E-04	1.9E-03	1.9E-03
Benzo(a)anthracene	OLDCONS6	3.00E-02	1.5E-02	U	2.7E-05	1.4E-04	1.4E-04
Benzo(a)pyrene	OLDCONS6	3.00E-02	1.5E-02	U	2.7E-05	1.4E-04	1.4E-04
Benzo(b)fluoranthene	OLDCONS6	3.00E-02	1.5E-02	U	4.3E-05	2.2E-04	2.2E-04
Benzo(e)pyrene	OLDCONS6	-	-	-	2.1E-04	1.1E-03	1.1E-03
Benzo(g,h,i)perylene	OLDCONS6	3.00E-02	1.5E-02	U	2.2E-04	1.1E-03	1.1E-03
Benzo(k)fluoranthene	OLDCONS6	3.00E-02	1.5E-02	U	2.1E-05	1.0E-04	1.0E-04
Chrysene	OLDCONS6	3.00E-02	1.5E-02	U	5.9E-05	3.0E-04	3.0E-04
Dibenz(a,h)anthracene	OLDCONS6	3.00E-02	1.5E-02	U	1.1E-05	5.6E-05	5.6E-05
Fluoranthene	OLDCONS6	3.00E-02	1.5E-02	U	7.5E-05	3.8E-04	3.8E-04
Fluorene	OLDCONS6	3.00E-02	1.5E-02	U	5.7E-04	2.9E-03	2.9E-03
Indeno(1,2,3-cd)pyrene	OLDCONS6	3.00E-02	1.5E-02	U	2.4E-05	1.2E-04	1.2E-04
Naphthalene	OLDCONS6	3.00E-02	1.5E-02	U	6.9E-03	3.5E-04	3.5E-04
Perylene	OLDCONS6	-	-	-	1.2E-04	6.0E-04	6.0E-04
Phenanthrene	OLDCONS6	3.00E-02	1.5E-02	U	1.5E-03	7.8E-03	7.8E-03
Pyrene	OLDCONS6	3.00E-02	1.5E-02	U	1.4E-04	7.0E-04	7.0E-04
C08-C11 (Gasoline Range)	RD033	1.10E+01	5.5E+00	UJ		-	-
C11-C14 (Kerosene Range)	RD033	1.10E+01	5.5E+00	UJ		-	-
C14-C20 (Diesel Range)	RD033	1.10E+01	5.5E+00	UJ		-	-
C20-C30 (Lubricant Oil Range)	RD033	1.10E+01	5.5E+00	UJ		-	-
C11-C30	RD033	-	1.7E+01	-		-	-
Benzene	RD033	1.10E-02	5.5E-03	U	1.2E-04	6.6E-04	6.6E-04
Ethylbenzene	RD033	1.10E-02	5.5E-03	U	1.2E-04	6.6E-04	6.6E-04
Toluene	RD033	1.10E-02	5.5E-03	U	1.2E-04	6.6E-04	6.6E-04
m,p-Xylene	RD033	1.10E-02	5.5E-03	U	3.6E-04	2.0E-03	2.0E-03
o-Xylene	RD033	1.10E-02	5.5E-03	U	8.0E-05	4.4E-04	4.4E-04
Xylene (total)	RD033	-	-	-	4.4E-04	2.4E-03	2.4E-03
2-Methylnaphthalene	RD033	-	-	-	2.8E-02	1.5E-01	1.5E-01
Acenaphthene	RD033	-	-	-	5.7E-04	9.5E-03	9.5E-03

TPH to Petroleum Constituent Extrapolation for Soil (0-10 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Acenaphthylene	RD033	-	-	-	7.0E-05	1.2E-03	1.2E-03
Anthracene	RD033	-	-	-	3.7E-04	6.2E-03	6.2E-03
Benzo(a)anthracene	RD033	-	-	-	2.7E-05	4.4E-04	4.4E-04
Benzo(a)pyrene	RD033	-	-	-	2.7E-05	4.5E-04	4.5E-04
Benzo(b)fluoranthene	RD033	-	-	-	4.3E-05	7.1E-04	7.1E-04
Benzo(e)pyrene	RD033	-	-	-	2.1E-04	3.4E-03	3.4E-03
Benzo(g,h,i)perylene	RD033	-	-	-	2.2E-04	3.6E-03	3.6E-03
Benzo(k)fluoranthene	RD033	-	-	-	2.1E-05	3.4E-04	3.4E-04
Chrysene	RD033	-	-	-	5.9E-05	9.7E-04	9.7E-04
Dibenz(a,h)anthracene	RD033	-	-	-	1.1E-05	1.8E-04	1.8E-04
Fluoranthene	RD033	-	-	-	7.5E-05	1.2E-03	1.2E-03
Fluorene	RD033	-	-	-	5.7E-04	9.4E-03	9.4E-03
Indeno(1,2,3-cd)pyrene	RD033	-	-	-	2.4E-05	4.0E-04	4.0E-04
Naphthalene	RD033	-	-	-	6.9E-03	3.8E-02	3.8E-02
Perylene	RD033	-	-	-	1.2E-04	1.9E-03	1.9E-03
Phenanthrene	RD033	-	-	-	1.5E-03	2.5E-02	2.5E-02
Pyrene	RD033	-	-	-	1.4E-04	2.2E-03	2.2E-03
C08-C11 (Gasoline Range)	RD035RE	1.10E+01	5.5E+00	UJ		-	-
C11-C14 (Kerosene Range)	RD035RE	1.10E+01	5.5E+00	UJ		-	-
C14-C20 (Diesel Range)	RD035RE	1.10E+01	5.5E+00	UJ		-	-
C20-C30 (Lubricant Oil Range)	RD035RE	1.10E+01	5.5E+00	UJ		-	-
C11-C30	RD035RE	-	1.7E+01	-		-	-
Benzene	RD035RE	6.00E-03	3.0E-03	U	1.2E-04	6.6E-04	6.6E-04
Ethylbenzene	RD035RE	6.00E-03	3.0E-03	U	1.2E-04	6.6E-04	6.6E-04
Toluene	RD035RE	6.00E-03	3.0E-03	U	1.2E-04	6.6E-04	6.6E-04
m,p-Xylene	RD035RE	6.00E-03	3.0E-03	U	3.6E-04	2.0E-03	2.0E-03
o-Xylene	RD035RE	6.00E-03	3.0E-03	U	8.0E-05	4.4E-04	4.4E-04
Xylene (total)	RD035RE	-	-	-	4.4E-04	2.4E-03	2.4E-03
2-Methylnaphthalene	RD035RE	-	-	-	2.8E-02	1.5E-01	1.5E-01
Acenaphthene	RD035RE	-	-	-	5.7E-04	9.5E-03	9.5E-03
Acenaphthylene	RD035RE	-	-	-	7.0E-05	1.2E-03	1.2E-03
Anthracene	RD035RE	-	-	-	3.7E-04	6.2E-03	6.2E-03
Benzo(a)anthracene	RD035RE	-	-	-	2.7E-05	4.4E-04	4.4E-04
Benzo(a)pyrene	RD035RE	-	-	-	2.7E-05	4.5E-04	4.5E-04
Benzo(b)fluoranthene	RD035RE	-	-	-	4.3E-05	7.1E-04	7.1E-04
Benzo(e)pyrene	RD035RE	-	-	-	2.1E-04	3.4E-03	3.4E-03
Benzo(g,h,i)perylene	RD035RE	-	-	-	2.2E-04	3.6E-03	3.6E-03
Benzo(k)fluoranthene	RD035RE	-	-	-	2.1E-05	3.4E-04	3.4E-04
Chrysene	RD035RE	-	-	-	5.9E-05	9.7E-04	9.7E-04
Dibenz(a,h)anthracene	RD035RE	-	-	-	1.1E-05	1.8E-04	1.8E-04
Fluoranthene	RD035RE	-	-	-	7.5E-05	1.2E-03	1.2E-03
Fluorene	RD035RE	-	-	-	5.7E-04	9.4E-03	9.4E-03
Indeno(1,2,3-cd)pyrene	RD035RE	-	-	-	2.4E-05	4.0E-04	4.0E-04
Naphthalene	RD035RE	-	-	-	6.9E-03	3.8E-02	3.8E-02
Perylene	RD035RE	-	-	-	1.2E-04	1.9E-03	1.9E-03
Phenanthrene	RD035RE	-	-	-	1.5E-03	2.5E-02	2.5E-02
Pyrene	RD035RE	-	-	-	1.4E-04	2.2E-03	2.2E-03
C08-C11 (Gasoline Range)	RD037	1.10E+01	5.5E+00	UJ		-	-
C11-C14 (Kerosene Range)	RD037	1.10E+01	5.5E+00	UJ		-	-
C14-C20 (Diesel Range)	RD037	1.10E+01	5.5E+00	UJ		-	-
C20-C30 (Lubricant Oil Range)	RD037	1.10E+01	5.5E+00	UJ		-	-
C11-C30	RD037	-	1.7E+01	-		-	-
Benzene	RD037	6.00E-03	3.0E-03	U	1.2E-04	6.6E-04	6.6E-04
Ethylbenzene	RD037	6.00E-03	3.0E-03	U	1.2E-04	6.6E-04	6.6E-04
Toluene	RD037	6.00E-03	3.0E-03	U	1.2E-04	6.6E-04	6.6E-04
m,p-Xylene	RD037	6.00E-03	3.0E-03	U	3.6E-04	2.0E-03	2.0E-03

TPH to Petroleum Constituent Extrapolation for Soil (0-10 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
o-Xylene	RD037	6.00E-03	3.0E-03	U	8.0E-05	4.4E-04	4.4E-04
Xylene (total)	RD037	-	-	-	4.4E-04	2.4E-03	2.4E-03
2-Methylnaphthalene	RD037	-	-	-	2.8E-02	1.5E-01	1.5E-01
Acenaphthene	RD037	-	-	-	5.7E-04	9.5E-03	9.5E-03
Acenaphthylene	RD037	-	-	-	7.0E-05	1.2E-03	1.2E-03
Anthracene	RD037	-	-	-	3.7E-04	6.2E-03	6.2E-03
Benzo(a)anthracene	RD037	-	-	-	2.7E-05	4.4E-04	4.4E-04
Benzo(a)pyrene	RD037	-	-	-	2.7E-05	4.5E-04	4.5E-04
Benzo(b)fluoranthene	RD037	-	-	-	4.3E-05	7.1E-04	7.1E-04
Benzo(e)pyrene	RD037	-	-	-	2.1E-04	3.4E-03	3.4E-03
Benzo(g,h,i)perylene	RD037	-	-	-	2.2E-04	3.6E-03	3.6E-03
Benzo(k)fluoranthene	RD037	-	-	-	2.1E-05	3.4E-04	3.4E-04
Chrysene	RD037	-	-	-	5.9E-05	9.7E-04	9.7E-04
Dibenz(a,h)anthracene	RD037	-	-	-	1.1E-05	1.8E-04	1.8E-04
Fluoranthene	RD037	-	-	-	7.5E-05	1.2E-03	1.2E-03
Fluorene	RD037	-	-	-	5.7E-04	9.4E-03	9.4E-03
Indeno(1,2,3-cd)pyrene	RD037	-	-	-	2.4E-05	4.0E-04	4.0E-04
Naphthalene	RD037	-	-	-	6.9E-03	3.8E-02	3.8E-02
Perylene	RD037	-	-	-	1.2E-04	1.9E-03	1.9E-03
Phenanthrene	RD037	-	-	-	1.5E-03	2.5E-02	2.5E-02
Pyrene	RD037	-	-	-	1.4E-04	2.2E-03	2.2E-03
C08-C11 (Gasoline Range)	RD038RE	1.10E+01	5.5E+00	UJ		-	-
C11-C14 (Kerosene Range)	RD038RE	1.10E+01	5.5E+00	UJ		-	-
C14-C20 (Diesel Range)	RD038RE	1.10E+01	5.5E+00	UJ		-	-
C20-C30 (Lubricant Oil Range)	RD038RE	1.10E+01	5.5E+00	UJ		-	-
C11-C30	RD038RE	-	1.7E+01	-		-	-
Benzene	RD038RE	6.00E-03	3.0E-03	U	1.2E-04	6.6E-04	6.6E-04
Ethylbenzene	RD038RE	6.00E-03	3.0E-03	U	1.2E-04	6.6E-04	6.6E-04
Toluene	RD038RE	6.00E-03	3.0E-03	U	1.2E-04	6.6E-04	6.6E-04
m,p-Xylene	RD038RE	6.00E-03	3.0E-03	U	3.6E-04	2.0E-03	2.0E-03
o-Xylene	RD038RE	6.00E-03	3.0E-03	U	8.0E-05	4.4E-04	4.4E-04
Xylene (total)	RD038RE	-	-	-	4.4E-04	2.4E-03	2.4E-03
2-Methylnaphthalene	RD038RE	-	-	-	2.8E-02	1.5E-01	1.5E-01
Acenaphthene	RD038RE	-	-	-	5.7E-04	9.5E-03	9.5E-03
Acenaphthylene	RD038RE	-	-	-	7.0E-05	1.2E-03	1.2E-03
Anthracene	RD038RE	-	-	-	3.7E-04	6.2E-03	6.2E-03
Benzo(a)anthracene	RD038RE	-	-	-	2.7E-05	4.4E-04	4.4E-04
Benzo(a)pyrene	RD038RE	-	-	-	2.7E-05	4.5E-04	4.5E-04
Benzo(b)fluoranthene	RD038RE	-	-	-	4.3E-05	7.1E-04	7.1E-04
Benzo(e)pyrene	RD038RE	-	-	-	2.1E-04	3.4E-03	3.4E-03
Benzo(g,h,i)perylene	RD038RE	-	-	-	2.2E-04	3.6E-03	3.6E-03
Benzo(k)fluoranthene	RD038RE	-	-	-	2.1E-05	3.4E-04	3.4E-04
Chrysene	RD038RE	-	-	-	5.9E-05	9.7E-04	9.7E-04
Dibenz(a,h)anthracene	RD038RE	-	-	-	1.1E-05	1.8E-04	1.8E-04
Fluoranthene	RD038RE	-	-	-	7.5E-05	1.2E-03	1.2E-03
Fluorene	RD038RE	-	-	-	5.7E-04	9.4E-03	9.4E-03
Indeno(1,2,3-cd)pyrene	RD038RE	-	-	-	2.4E-05	4.0E-04	4.0E-04
Naphthalene	RD038RE	-	-	-	6.9E-03	3.8E-02	3.8E-02
Perylene	RD038RE	-	-	-	1.2E-04	1.9E-03	1.9E-03
Phenanthrene	RD038RE	-	-	-	1.5E-03	2.5E-02	2.5E-02
Pyrene	RD038RE	-	-	-	1.4E-04	2.2E-03	2.2E-03
C08-C11 (Gasoline Range)	RD063	4.20E+01	4.2E+01	J		-	-
C11-C14 (Kerosene Range)	RD063	1.10E+01	5.5E+00	UJ		-	-
C14-C20 (Diesel Range)	RD063	1.10E+01	5.5E+00	UJ		-	-
C20-C30 (Lubricant Oil Range)	RD063	1.10E+01	5.5E+00	UJ		-	-
C11-C30	RD063	-	1.7E+01	-		-	-

TPH to Petroleum Constituent Extrapolation for Soil (0-10 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Benzene	RD063	6.00E-03	3.0E-03	U	1.2E-04	5.0E-03	3.0E-03
Ethylbenzene	RD063	6.00E-03	3.0E-03	U	1.2E-04	5.0E-03	3.0E-03
Toluene	RD063	6.00E-03	3.0E-03	U	1.2E-04	5.0E-03	3.0E-03
m,p-Xylene	RD063	6.00E-03	3.0E-03	U	3.6E-04	1.5E-02	3.0E-03
o-Xylene	RD063	6.00E-03	3.0E-03	U	8.0E-05	3.4E-03	3.0E-03
Xylene (total)	RD063	-	-	-	4.4E-04	1.8E-02	1.8E-02
2-Methylnaphthalene	RD063	-	-	-	2.8E-02	1.2E+00	1.2E+00
Acenaphthene	RD063	-	-	-	5.7E-04	9.5E-03	9.5E-03
Acenaphthylene	RD063	-	-	-	7.0E-05	1.2E-03	1.2E-03
Anthracene	RD063	-	-	-	3.7E-04	6.2E-03	6.2E-03
Benzo(a)anthracene	RD063	-	-	-	2.7E-05	4.4E-04	4.4E-04
Benzo(a)pyrene	RD063	-	-	-	2.7E-05	4.5E-04	4.5E-04
Benzo(b)fluoranthene	RD063	-	-	-	4.3E-05	7.1E-04	7.1E-04
Benzo(e)pyrene	RD063	-	-	-	2.1E-04	3.4E-03	3.4E-03
Benzo(g,h,i)perylene	RD063	-	-	-	2.2E-04	3.6E-03	3.6E-03
Benzo(k)fluoranthene	RD063	-	-	-	2.1E-05	3.4E-04	3.4E-04
Chrysene	RD063	-	-	-	5.9E-05	9.7E-04	9.7E-04
Dibenz(a,h)anthracene	RD063	-	-	-	1.1E-05	1.8E-04	1.8E-04
Fluoranthene	RD063	-	-	-	7.5E-05	1.2E-03	1.2E-03
Fluorene	RD063	-	-	-	5.7E-04	9.4E-03	9.4E-03
Indeno(1,2,3-cd)pyrene	RD063	-	-	-	2.4E-05	4.0E-04	4.0E-04
Naphthalene	RD063	-	-	-	6.9E-03	2.9E-01	2.9E-01
Perylene	RD063	-	-	-	1.2E-04	1.9E-03	1.9E-03
Phenanthrene	RD063	-	-	-	1.5E-03	2.5E-02	2.5E-02
Pyrene	RD063	-	-	-	1.4E-04	2.2E-03	2.2E-03
C08-C11 (Gasoline Range)	RD064	1.10E+01	5.5E+00	UJ		-	-
C11-C14 (Kerosene Range)	RD064	1.10E+01	5.5E+00	UJ		-	-
C14-C20 (Diesel Range)	RD064	1.60E+02	1.6E+02	J		-	-
C20-C30 (Lubricant Oil Range)	RD064	8.30E+01	8.3E+01	J		-	-
C11-C30	RD064	-	2.5E+02	-		-	-
Benzene	RD064	2.70E-02	1.4E-02	U	1.2E-04	6.6E-04	6.6E-04
Ethylbenzene	RD064	2.70E-02	1.4E-02	U	1.2E-04	6.6E-04	6.6E-04
Toluene	RD064	2.70E-02	1.4E-02	U	1.2E-04	6.6E-04	6.6E-04
m,p-Xylene	RD064	2.70E-02	1.4E-02	U	3.6E-04	2.0E-03	2.0E-03
o-Xylene	RD064	2.70E-02	1.4E-02	U	8.0E-05	4.4E-04	4.4E-04
Xylene (total)	RD064	-	-	-	4.4E-04	2.4E-03	2.4E-03
2-Methylnaphthalene	RD064	-	-	-	2.8E-02	1.5E-01	1.5E-01
Acenaphthene	RD064	-	-	-	5.7E-04	1.4E-01	1.4E-01
Acenaphthylene	RD064	-	-	-	7.0E-05	1.7E-02	1.7E-02
Anthracene	RD064	-	-	-	3.7E-04	9.3E-02	9.3E-02
Benzo(a)anthracene	RD064	-	-	-	2.7E-05	6.7E-03	6.7E-03
Benzo(a)pyrene	RD064	-	-	-	2.7E-05	6.8E-03	6.8E-03
Benzo(b)fluoranthene	RD064	-	-	-	4.3E-05	1.1E-02	1.1E-02
Benzo(e)pyrene	RD064	-	-	-	2.1E-04	5.1E-02	5.1E-02
Benzo(g,h,i)perylene	RD064	-	-	-	2.2E-04	5.5E-02	5.5E-02
Benzo(k)fluoranthene	RD064	-	-	-	2.1E-05	5.1E-03	5.1E-03
Chrysene	RD064	-	-	-	5.9E-05	1.5E-02	1.5E-02
Dibenz(a,h)anthracene	RD064	-	-	-	1.1E-05	2.8E-03	2.8E-03
Fluoranthene	RD064	-	-	-	7.5E-05	1.9E-02	1.9E-02
Fluorene	RD064	-	-	-	5.7E-04	1.4E-01	1.4E-01
Indeno(1,2,3-cd)pyrene	RD064	-	-	-	2.4E-05	6.0E-03	6.0E-03
Naphthalene	RD064	-	-	-	6.9E-03	3.8E-02	3.8E-02
Perylene	RD064	-	-	-	1.2E-04	2.9E-02	2.9E-02
Phenanthrene	RD064	-	-	-	1.5E-03	3.8E-01	3.8E-01
Pyrene	RD064	-	-	-	1.4E-04	3.4E-02	3.4E-02
C08-C11 (Gasoline Range)	RD065	1.10E+01	5.5E+00	UJ		-	-

TPH to Petroleum Constituent Extrapolation for Soil (0-10 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
C11-C14 (Kerosene Range)	RD065	1.10E+01	5.5E+00	UJ		-	-
C14-C20 (Diesel Range)	RD065	1.10E+01	5.5E+00	UJ		-	-
C20-C30 (Lubricant Oil Range)	RD065	8.50E+01	8.5E+01	J		-	-
C11-C30	RD065	-	9.6E+01	-		-	-
Benzene	RD065	-	-	-	1.2E-04	6.6E-04	6.6E-04
Ethylbenzene	RD065	-	-	-	1.2E-04	6.6E-04	6.6E-04
Toluene	RD065	-	-	-	1.2E-04	6.6E-04	6.6E-04
m,p-Xylene	RD065	-	-	-	3.6E-04	2.0E-03	2.0E-03
o-Xylene	RD065	-	-	-	8.0E-05	4.4E-04	4.4E-04
Xylene (total)	RD065	-	-	-	4.4E-04	2.4E-03	2.4E-03
2-Methylnaphthalene	RD065	-	-	-	2.8E-02	1.5E-01	1.5E-01
Acenaphthene	RD065	-	-	-	5.7E-04	5.5E-02	5.5E-02
Acenaphthylene	RD065	-	-	-	7.0E-05	6.7E-03	6.7E-03
Anthracene	RD065	-	-	-	3.7E-04	3.6E-02	3.6E-02
Benzo(a)anthracene	RD065	-	-	-	2.7E-05	2.6E-03	2.6E-03
Benzo(a)pyrene	RD065	-	-	-	2.7E-05	2.6E-03	2.6E-03
Benzo(b)fluoranthene	RD065	-	-	-	4.3E-05	4.2E-03	4.2E-03
Benzo(e)pyrene	RD065	-	-	-	2.1E-04	2.0E-02	2.0E-02
Benzo(g,h,i)perylene	RD065	-	-	-	2.2E-04	2.1E-02	2.1E-02
Benzo(k)fluoranthene	RD065	-	-	-	2.1E-05	2.0E-03	2.0E-03
Chrysene	RD065	-	-	-	5.9E-05	5.6E-03	5.6E-03
Dibenz(a,h)anthracene	RD065	-	-	-	1.1E-05	1.1E-03	1.1E-03
Fluoranthene	RD065	-	-	-	7.5E-05	7.2E-03	7.2E-03
Fluorene	RD065	-	-	-	5.7E-04	5.5E-02	5.5E-02
Indeno(1,2,3-cd)pyrene	RD065	-	-	-	2.4E-05	2.3E-03	2.3E-03
Naphthalene	RD065	-	-	-	6.9E-03	3.8E-02	3.8E-02
Perylene	RD065	-	-	-	1.2E-04	1.1E-02	1.1E-02
Phenanthrene	RD065	-	-	-	1.5E-03	1.5E-01	1.5E-01
Pyrene	RD065	-	-	-	1.4E-04	1.3E-02	1.3E-02
C08-C11 (Gasoline Range)	RD066	1.20E+01	6.0E+00	UJ		-	-
C11-C14 (Kerosene Range)	RD066	1.20E+01	6.0E+00	UJ		-	-
C14-C20 (Diesel Range)	RD066	1.20E+01	6.0E+00	UJ		-	-
C20-C30 (Lubricant Oil Range)	RD066	1.20E+01	6.0E+00	UJ		-	-
C11-C30	RD066	-	1.8E+01	-		-	-
Benzene	RD066	-	-	-	1.2E-04	7.2E-04	7.2E-04
Ethylbenzene	RD066	-	-	-	1.2E-04	7.2E-04	7.2E-04
Toluene	RD066	-	-	-	1.2E-04	7.2E-04	7.2E-04
m,p-Xylene	RD066	-	-	-	3.6E-04	2.2E-03	2.2E-03
o-Xylene	RD066	-	-	-	8.0E-05	4.8E-04	4.8E-04
Xylene (total)	RD066	-	-	-	4.4E-04	2.6E-03	2.6E-03
2-Methylnaphthalene	RD066	-	-	-	2.8E-02	1.7E-01	1.7E-01
Acenaphthene	RD066	-	-	-	5.7E-04	1.0E-02	1.0E-02
Acenaphthylene	RD066	-	-	-	7.0E-05	1.3E-03	1.3E-03
Anthracene	RD066	-	-	-	3.7E-04	6.7E-03	6.7E-03
Benzo(a)anthracene	RD066	-	-	-	2.7E-05	4.9E-04	4.9E-04
Benzo(a)pyrene	RD066	-	-	-	2.7E-05	4.9E-04	4.9E-04
Benzo(b)fluoranthene	RD066	-	-	-	4.3E-05	7.8E-04	7.8E-04
Benzo(e)pyrene	RD066	-	-	-	2.1E-04	3.7E-03	3.7E-03
Benzo(g,h,i)perylene	RD066	-	-	-	2.2E-04	4.0E-03	4.0E-03
Benzo(k)fluoranthene	RD066	-	-	-	2.1E-05	3.7E-04	3.7E-04
Chrysene	RD066	-	-	-	5.9E-05	1.1E-03	1.1E-03
Dibenz(a,h)anthracene	RD066	-	-	-	1.1E-05	2.0E-04	2.0E-04
Fluoranthene	RD066	-	-	-	7.5E-05	1.3E-03	1.3E-03
Fluorene	RD066	-	-	-	5.7E-04	1.0E-02	1.0E-02
Indeno(1,2,3-cd)pyrene	RD066	-	-	-	2.4E-05	4.3E-04	4.3E-04
Naphthalene	RD066	-	-	-	6.9E-03	4.2E-02	4.2E-02

TPH to Petroleum Constituent Extrapolation for Soil (0-10 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Perylene	RD066	-	-	-	1.2E-04	2.1E-03	2.1E-03
Phenanthrene	RD066	-	-	-	1.5E-03	2.8E-02	2.8E-02
Pyrene	RD066	-	-	-	1.4E-04	2.5E-03	2.5E-03
C08-C11 (Gasoline Range)	RD067	1.20E+01	6.0E+00	UJ		-	-
C11-C14 (Kerosene Range)	RD067	1.20E+01	6.0E+00	UJ		-	-
C14-C20 (Diesel Range)	RD067	1.20E+01	6.0E+00	UJ		-	-
C20-C30 (Lubricant Oil Range)	RD067	1.10E+02	1.1E+02	J		-	-
C11-C30	RD067	-	1.2E+02	-		-	-
Benzene	RD067	-	-	-	1.2E-04	7.2E-04	7.2E-04
Ethylbenzene	RD067	-	-	-	1.2E-04	7.2E-04	7.2E-04
Toluene	RD067	-	-	-	1.2E-04	7.2E-04	7.2E-04
m,p-Xylene	RD067	-	-	-	3.6E-04	2.2E-03	2.2E-03
o-Xylene	RD067	-	-	-	8.0E-05	4.8E-04	4.8E-04
Xylene (total)	RD067	-	-	-	4.4E-04	2.6E-03	2.6E-03
2-Methylnaphthalene	RD067	-	-	-	2.8E-02	1.7E-01	1.7E-01
Acenaphthene	RD067	-	-	-	5.7E-04	7.0E-02	7.0E-02
Acenaphthylene	RD067	-	-	-	7.0E-05	8.5E-03	8.5E-03
Anthracene	RD067	-	-	-	3.7E-04	4.6E-02	4.6E-02
Benzo(a)anthracene	RD067	-	-	-	2.7E-05	3.3E-03	3.3E-03
Benzo(a)pyrene	RD067	-	-	-	2.7E-05	3.3E-03	3.3E-03
Benzo(b)fluoranthene	RD067	-	-	-	4.3E-05	5.3E-03	5.3E-03
Benzo(e)pyrene	RD067	-	-	-	2.1E-04	2.5E-02	2.5E-02
Benzo(g,h,i)perylene	RD067	-	-	-	2.2E-04	2.7E-02	2.7E-02
Benzo(k)fluoranthene	RD067	-	-	-	2.1E-05	2.5E-03	2.5E-03
Chrysene	RD067	-	-	-	5.9E-05	7.2E-03	7.2E-03
Dibenz(a,h)anthracene	RD067	-	-	-	1.1E-05	1.4E-03	1.4E-03
Fluoranthene	RD067	-	-	-	7.5E-05	9.1E-03	9.1E-03
Fluorene	RD067	-	-	-	5.7E-04	6.9E-02	6.9E-02
Indeno(1,2,3-cd)pyrene	RD067	-	-	-	2.4E-05	2.9E-03	2.9E-03
Naphthalene	RD067	-	-	-	6.9E-03	4.2E-02	4.2E-02
Perylene	RD067	-	-	-	1.2E-04	1.4E-02	1.4E-02
Phenanthrene	RD067	-	-	-	1.5E-03	1.9E-01	1.9E-01
Pyrene	RD067	-	-	-	1.4E-04	1.7E-02	1.7E-02
C08-C11 (Gasoline Range)	RD068	1.09E+02	5.5E+01	UJ		-	-
C11-C14 (Kerosene Range)	RD068	1.09E+02	5.5E+01	UJ		-	-
C14-C20 (Diesel Range)	RD068	1.20E+03	1.2E+03	J		-	-
C20-C30 (Lubricant Oil Range)	RD068	3.50E+03	3.5E+03	J		-	-
C11-C30	RD068	-	4.8E+03	-		-	-
Benzene	RD068	-	-	-	1.2E-04	6.5E-03	6.5E-03
Ethylbenzene	RD068	-	-	-	1.2E-04	6.5E-03	6.5E-03
Toluene	RD068	-	-	-	1.2E-04	6.5E-03	6.5E-03
m,p-Xylene	RD068	-	-	-	3.6E-04	2.0E-02	2.0E-02
o-Xylene	RD068	-	-	-	8.0E-05	4.4E-03	4.4E-03
Xylene (total)	RD068	-	-	-	4.4E-04	2.4E-02	2.4E-02
2-Methylnaphthalene	RD068	-	-	-	2.8E-02	1.5E+00	1.5E+00
Acenaphthene	RD068	-	-	-	5.7E-04	2.7E+00	2.7E+00
Acenaphthylene	RD068	-	-	-	7.0E-05	3.3E-01	3.3E-01
Anthracene	RD068	-	-	-	3.7E-04	1.8E+00	1.8E+00
Benzo(a)anthracene	RD068	-	-	-	2.7E-05	1.3E-01	1.3E-01
Benzo(a)pyrene	RD068	-	-	-	2.7E-05	1.3E-01	1.3E-01
Benzo(b)fluoranthene	RD068	-	-	-	4.3E-05	2.1E-01	2.1E-01
Benzo(e)pyrene	RD068	-	-	-	2.1E-04	9.8E-01	9.8E-01
Benzo(g,h,i)perylene	RD068	-	-	-	2.2E-04	1.1E+00	1.1E+00
Benzo(k)fluoranthene	RD068	-	-	-	2.1E-05	9.8E-02	9.8E-02
Chrysene	RD068	-	-	-	5.9E-05	2.8E-01	2.8E-01
Dibenz(a,h)anthracene	RD068	-	-	-	1.1E-05	5.3E-02	5.3E-02

TPH to Petroleum Constituent Extrapolation for Soil (0-10 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Fluoranthene	RD068	-	-	-	7.5E-05	3.6E-01	3.6E-01
Fluorene	RD068	-	-	-	5.7E-04	2.7E+00	2.7E+00
Indeno(1,2,3-cd)pyrene	RD068	-	-	-	2.4E-05	1.1E-01	1.1E-01
Naphthalene	RD068	-	-	-	6.9E-03	3.8E-01	3.8E-01
Perylene	RD068	-	-	-	1.2E-04	5.6E-01	5.6E-01
Phenanthrene	RD068	-	-	-	1.5E-03	7.3E+00	7.3E+00
Pyrene	RD068	-	-	-	1.4E-04	6.5E-01	6.5E-01
C08-C11 (Gasoline Range)	RD069	1.10E+01	5.5E+00	UJ		-	-
C11-C14 (Kerosene Range)	RD069	1.10E+01	5.5E+00	UJ		-	-
C14-C20 (Diesel Range)	RD069	1.10E+01	5.5E+00	UJ		-	-
C20-C30 (Lubricant Oil Range)	RD069	1.10E+01	5.5E+00	UJ		-	-
C11-C30	RD069	-	1.7E+01	-		-	-
Benzene	RD069	-	-	-	1.2E-04	6.6E-04	6.6E-04
Ethylbenzene	RD069	-	-	-	1.2E-04	6.6E-04	6.6E-04
Toluene	RD069	-	-	-	1.2E-04	6.6E-04	6.6E-04
m,p-Xylene	RD069	-	-	-	3.6E-04	2.0E-03	2.0E-03
o-Xylene	RD069	-	-	-	8.0E-05	4.4E-04	4.4E-04
Xylene (total)	RD069	-	-	-	4.4E-04	2.4E-03	2.4E-03
2-Methylnaphthalene	RD069	-	-	-	2.8E-02	1.5E-01	1.5E-01
Acenaphthene	RD069	-	-	-	5.7E-04	9.5E-03	9.5E-03
Acenaphthylene	RD069	-	-	-	7.0E-05	1.2E-03	1.2E-03
Anthracene	RD069	-	-	-	3.7E-04	6.2E-03	6.2E-03
Benzo(a)anthracene	RD069	-	-	-	2.7E-05	4.4E-04	4.4E-04
Benzo(a)pyrene	RD069	-	-	-	2.7E-05	4.5E-04	4.5E-04
Benzo(b)fluoranthene	RD069	-	-	-	4.3E-05	7.1E-04	7.1E-04
Benzo(e)pyrene	RD069	-	-	-	2.1E-04	3.4E-03	3.4E-03
Benzo(g,h,i)perylene	RD069	-	-	-	2.2E-04	3.6E-03	3.6E-03
Benzo(k)fluoranthene	RD069	-	-	-	2.1E-05	3.4E-04	3.4E-04
Chrysene	RD069	-	-	-	5.9E-05	9.7E-04	9.7E-04
Dibenz(a,h)anthracene	RD069	-	-	-	1.1E-05	1.8E-04	1.8E-04
Fluoranthene	RD069	-	-	-	7.5E-05	1.2E-03	1.2E-03
Fluorene	RD069	-	-	-	5.7E-04	9.4E-03	9.4E-03
Indeno(1,2,3-cd)pyrene	RD069	-	-	-	2.4E-05	4.0E-04	4.0E-04
Naphthalene	RD069	-	-	-	6.9E-03	3.8E-02	3.8E-02
Perylene	RD069	-	-	-	1.2E-04	1.9E-03	1.9E-03
Phenanthrene	RD069	-	-	-	1.5E-03	2.5E-02	2.5E-02
Pyrene	RD069	-	-	-	1.4E-04	2.2E-03	2.2E-03
C08-C11 (Gasoline Range)	RD070	1.10E+01	5.5E+00	UJ		-	-
C11-C14 (Kerosene Range)	RD070	1.10E+01	5.5E+00	UJ		-	-
C14-C20 (Diesel Range)	RD070	1.10E+01	5.5E+00	UJ		-	-
C20-C30 (Lubricant Oil Range)	RD070	1.10E+01	5.5E+00	UJ		-	-
C11-C30	RD070	-	1.7E+01	-		-	-
Benzene	RD070	-	-	-	1.2E-04	6.6E-04	6.6E-04
Ethylbenzene	RD070	-	-	-	1.2E-04	6.6E-04	6.6E-04
Toluene	RD070	-	-	-	1.2E-04	6.6E-04	6.6E-04
m,p-Xylene	RD070	-	-	-	3.6E-04	2.0E-03	2.0E-03
o-Xylene	RD070	-	-	-	8.0E-05	4.4E-04	4.4E-04
Xylene (total)	RD070	-	-	-	4.4E-04	2.4E-03	2.4E-03
2-Methylnaphthalene	RD070	-	-	-	2.8E-02	1.5E-01	1.5E-01
Acenaphthene	RD070	-	-	-	5.7E-04	9.5E-03	9.5E-03
Acenaphthylene	RD070	-	-	-	7.0E-05	1.2E-03	1.2E-03
Anthracene	RD070	-	-	-	3.7E-04	6.2E-03	6.2E-03
Benzo(a)anthracene	RD070	-	-	-	2.7E-05	4.4E-04	4.4E-04
Benzo(a)pyrene	RD070	-	-	-	2.7E-05	4.5E-04	4.5E-04
Benzo(b)fluoranthene	RD070	-	-	-	4.3E-05	7.1E-04	7.1E-04
Benzo(e)pyrene	RD070	-	-	-	2.1E-04	3.4E-03	3.4E-03

TPH to Petroleum Constituent Extrapolation for Soil (0-10 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Benzo(g,h,i)perylene	RD070	-	-	-	2.2E-04	3.6E-03	3.6E-03
Benzo(k)fluoranthene	RD070	-	-	-	2.1E-05	3.4E-04	3.4E-04
Chrysene	RD070	-	-	-	5.9E-05	9.7E-04	9.7E-04
Dibenz(a,h)anthracene	RD070	-	-	-	1.1E-05	1.8E-04	1.8E-04
Fluoranthene	RD070	-	-	-	7.5E-05	1.2E-03	1.2E-03
Fluorene	RD070	-	-	-	5.7E-04	9.4E-03	9.4E-03
Indeno(1,2,3-cd)pyrene	RD070	-	-	-	2.4E-05	4.0E-04	4.0E-04
Naphthalene	RD070	-	-	-	6.9E-03	3.8E-02	3.8E-02
Perylene	RD070	-	-	-	1.2E-04	1.9E-03	1.9E-03
Phenanthrene	RD070	-	-	-	1.5E-03	2.5E-02	2.5E-02
Pyrene	RD070	-	-	-	1.4E-04	2.2E-03	2.2E-03
C08-C11 (Gasoline Range)	RD071	1.10E+01	5.5E+00	UJ		-	-
C11-C14 (Kerosene Range)	RD071	1.10E+01	5.5E+00	UJ		-	-
C14-C20 (Diesel Range)	RD071	1.10E+01	5.5E+00	UJ		-	-
C20-C30 (Lubricant Oil Range)	RD071	1.10E+01	5.5E+00	UJ		-	-
C11-C30	RD071	-	1.7E+01	-		-	-
Benzene	RD071	-	-	-	1.2E-04	6.6E-04	6.6E-04
Ethylbenzene	RD071	-	-	-	1.2E-04	6.6E-04	6.6E-04
Toluene	RD071	-	-	-	1.2E-04	6.6E-04	6.6E-04
m,p-Xylene	RD071	-	-	-	3.6E-04	2.0E-03	2.0E-03
o-Xylene	RD071	-	-	-	8.0E-05	4.4E-04	4.4E-04
Xylene (total)	RD071	-	-	-	4.4E-04	2.4E-03	2.4E-03
2-Methylnaphthalene	RD071	-	-	-	2.8E-02	1.5E-01	1.5E-01
Acenaphthene	RD071	-	-	-	5.7E-04	9.5E-03	9.5E-03
Acenaphthylene	RD071	-	-	-	7.0E-05	1.2E-03	1.2E-03
Anthracene	RD071	-	-	-	3.7E-04	6.2E-03	6.2E-03
Benzo(a)anthracene	RD071	-	-	-	2.7E-05	4.4E-04	4.4E-04
Benzo(a)pyrene	RD071	-	-	-	2.7E-05	4.5E-04	4.5E-04
Benzo(b)fluoranthene	RD071	-	-	-	4.3E-05	7.1E-04	7.1E-04
Benzo(e)pyrene	RD071	-	-	-	2.1E-04	3.4E-03	3.4E-03
Benzo(g,h,i)perylene	RD071	-	-	-	2.2E-04	3.6E-03	3.6E-03
Benzo(k)fluoranthene	RD071	-	-	-	2.1E-05	3.4E-04	3.4E-04
Chrysene	RD071	-	-	-	5.9E-05	9.7E-04	9.7E-04
Dibenz(a,h)anthracene	RD071	-	-	-	1.1E-05	1.8E-04	1.8E-04
Fluoranthene	RD071	-	-	-	7.5E-05	1.2E-03	1.2E-03
Fluorene	RD071	-	-	-	5.7E-04	9.4E-03	9.4E-03
Indeno(1,2,3-cd)pyrene	RD071	-	-	-	2.4E-05	4.0E-04	4.0E-04
Naphthalene	RD071	-	-	-	6.9E-03	3.8E-02	3.8E-02
Perylene	RD071	-	-	-	1.2E-04	1.9E-03	1.9E-03
Phenanthrene	RD071	-	-	-	1.5E-03	2.5E-02	2.5E-02
Pyrene	RD071	-	-	-	1.4E-04	2.2E-03	2.2E-03
C08-C11 (Gasoline Range)	RD072	1.10E+01	5.5E+00	UJ		-	-
C11-C14 (Kerosene Range)	RD072	1.10E+01	5.5E+00	UJ		-	-
C14-C20 (Diesel Range)	RD072	1.10E+01	5.5E+00	UJ		-	-
C20-C30 (Lubricant Oil Range)	RD072	1.10E+01	5.5E+00	UJ		-	-
C11-C30	RD072	-	1.7E+01	-		-	-
Benzene	RD072	-	-	-	1.2E-04	6.6E-04	6.6E-04
Ethylbenzene	RD072	-	-	-	1.2E-04	6.6E-04	6.6E-04
Toluene	RD072	-	-	-	1.2E-04	6.6E-04	6.6E-04
m,p-Xylene	RD072	-	-	-	3.6E-04	2.0E-03	2.0E-03
o-Xylene	RD072	-	-	-	8.0E-05	4.4E-04	4.4E-04
Xylene (total)	RD072	-	-	-	4.4E-04	2.4E-03	2.4E-03
2-Methylnaphthalene	RD072	-	-	-	2.8E-02	1.5E-01	1.5E-01
Acenaphthene	RD072	-	-	-	5.7E-04	9.5E-03	9.5E-03
Acenaphthylene	RD072	-	-	-	7.0E-05	1.2E-03	1.2E-03
Anthracene	RD072	-	-	-	3.7E-04	6.2E-03	6.2E-03

TPH to Petroleum Constituent Extrapolation for Soil (0-10 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Benzo(a)anthracene	RD072	-	-	-	2.7E-05	4.4E-04	4.4E-04
Benzo(a)pyrene	RD072	-	-	-	2.7E-05	4.5E-04	4.5E-04
Benzo(b)fluoranthene	RD072	-	-	-	4.3E-05	7.1E-04	7.1E-04
Benzo(e)pyrene	RD072	-	-	-	2.1E-04	3.4E-03	3.4E-03
Benzo(g,h,i)perylene	RD072	-	-	-	2.2E-04	3.6E-03	3.6E-03
Benzo(k)fluoranthene	RD072	-	-	-	2.1E-05	3.4E-04	3.4E-04
Chrysene	RD072	-	-	-	5.9E-05	9.7E-04	9.7E-04
Dibenz(a,h)anthracene	RD072	-	-	-	1.1E-05	1.8E-04	1.8E-04
Fluoranthene	RD072	-	-	-	7.5E-05	1.2E-03	1.2E-03
Fluorene	RD072	-	-	-	5.7E-04	9.4E-03	9.4E-03
Indeno(1,2,3-cd)pyrene	RD072	-	-	-	2.4E-05	4.0E-04	4.0E-04
Naphthalene	RD072	-	-	-	6.9E-03	3.8E-02	3.8E-02
Perylene	RD072	-	-	-	1.2E-04	1.9E-03	1.9E-03
Phenanthrene	RD072	-	-	-	1.5E-03	2.5E-02	2.5E-02
Pyrene	RD072	-	-	-	1.4E-04	2.2E-03	2.2E-03
C08-C11 (Gasoline Range)	RD176	1.20E+01	6.0E+00	UJ		-	-
C11-C14 (Kerosene Range)	RD176	1.20E+01	6.0E+00	UJ		-	-
C14-C20 (Diesel Range)	RD176	1.20E+01	6.0E+00	UJ		-	-
C20-C30 (Lubricant Oil Range)	RD176	1.20E+01	6.0E+00	UJ		-	-
C11-C30	RD176	-	1.8E+01	-		-	-
Benzene	RD176	-	-	-	1.2E-04	7.2E-04	7.2E-04
Ethylbenzene	RD176	-	-	-	1.2E-04	7.2E-04	7.2E-04
Toluene	RD176	-	-	-	1.2E-04	7.2E-04	7.2E-04
m,p-Xylene	RD176	-	-	-	3.6E-04	2.2E-03	2.2E-03
o-Xylene	RD176	-	-	-	8.0E-05	4.8E-04	4.8E-04
Xylene (total)	RD176	-	-	-	4.4E-04	2.6E-03	2.6E-03
2-Methylnaphthalene	RD176	-	-	-	2.8E-02	1.7E-01	1.7E-01
Acenaphthene	RD176	-	-	-	5.7E-04	1.0E-02	1.0E-02
Acenaphthylene	RD176	-	-	-	7.0E-05	1.3E-03	1.3E-03
Anthracene	RD176	-	-	-	3.7E-04	6.7E-03	6.7E-03
Benzo(a)anthracene	RD176	-	-	-	2.7E-05	4.9E-04	4.9E-04
Benzo(a)pyrene	RD176	-	-	-	2.7E-05	4.9E-04	4.9E-04
Benzo(b)fluoranthene	RD176	-	-	-	4.3E-05	7.8E-04	7.8E-04
Benzo(e)pyrene	RD176	-	-	-	2.1E-04	3.7E-03	3.7E-03
Benzo(g,h,i)perylene	RD176	-	-	-	2.2E-04	4.0E-03	4.0E-03
Benzo(k)fluoranthene	RD176	-	-	-	2.1E-05	3.7E-04	3.7E-04
Chrysene	RD176	-	-	-	5.9E-05	1.1E-03	1.1E-03
Dibenz(a,h)anthracene	RD176	-	-	-	1.1E-05	2.0E-04	2.0E-04
Fluoranthene	RD176	-	-	-	7.5E-05	1.3E-03	1.3E-03
Fluorene	RD176	-	-	-	5.7E-04	1.0E-02	1.0E-02
Indeno(1,2,3-cd)pyrene	RD176	-	-	-	2.4E-05	4.3E-04	4.3E-04
Naphthalene	RD176	-	-	-	6.9E-03	4.2E-02	4.2E-02
Perylene	RD176	-	-	-	1.2E-04	2.1E-03	2.1E-03
Phenanthrene	RD176	-	-	-	1.5E-03	2.8E-02	2.8E-02
Pyrene	RD176	-	-	-	1.4E-04	2.5E-03	2.5E-03
C08-C11 (Gasoline Range)	RD266	1.10E+01	5.5E+00	UJ		-	-
C11-C14 (Kerosene Range)	RD266	1.10E+01	5.5E+00	UJ		-	-
C14-C20 (Diesel Range)	RD266	1.10E+01	5.5E+00	UJ		-	-
C20-C30 (Lubricant Oil Range)	RD266	1.10E+01	5.5E+00	UJ		-	-
C11-C30	RD266	-	1.7E+01	-		-	-
Benzene	RD266	-	-	-	1.2E-04	6.6E-04	6.6E-04
Ethylbenzene	RD266	-	-	-	1.2E-04	6.6E-04	6.6E-04
Toluene	RD266	-	-	-	1.2E-04	6.6E-04	6.6E-04
m,p-Xylene	RD266	-	-	-	3.6E-04	2.0E-03	2.0E-03
o-Xylene	RD266	-	-	-	8.0E-05	4.4E-04	4.4E-04
Xylene (total)	RD266	-	-	-	4.4E-04	2.4E-03	2.4E-03

TPH to Petroleum Constituent Extrapolation for Soil (0-10 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
2-Methylnaphthalene	RD266	-	-	-	2.8E-02	1.5E-01	1.5E-01
Acenaphthene	RD266	-	-	-	5.7E-04	9.5E-03	9.5E-03
Acenaphthylene	RD266	-	-	-	7.0E-05	1.2E-03	1.2E-03
Anthracene	RD266	-	-	-	3.7E-04	6.2E-03	6.2E-03
Benzo(a)anthracene	RD266	-	-	-	2.7E-05	4.4E-04	4.4E-04
Benzo(a)pyrene	RD266	-	-	-	2.7E-05	4.5E-04	4.5E-04
Benzo(b)fluoranthene	RD266	-	-	-	4.3E-05	7.1E-04	7.1E-04
Benzo(e)pyrene	RD266	-	-	-	2.1E-04	3.4E-03	3.4E-03
Benzo(g,h,i)perylene	RD266	-	-	-	2.2E-04	3.6E-03	3.6E-03
Benzo(k)fluoranthene	RD266	-	-	-	2.1E-05	3.4E-04	3.4E-04
Chrysene	RD266	-	-	-	5.9E-05	9.7E-04	9.7E-04
Dibenz(a,h)anthracene	RD266	-	-	-	1.1E-05	1.8E-04	1.8E-04
Fluoranthene	RD266	-	-	-	7.5E-05	1.2E-03	1.2E-03
Fluorene	RD266	-	-	-	5.7E-04	9.4E-03	9.4E-03
Indeno(1,2,3-cd)pyrene	RD266	-	-	-	2.4E-05	4.0E-04	4.0E-04
Naphthalene	RD266	-	-	-	6.9E-03	3.8E-02	3.8E-02
Perylene	RD266	-	-	-	1.2E-04	1.9E-03	1.9E-03
Phenanthrene	RD266	-	-	-	1.5E-03	2.5E-02	2.5E-02
Pyrene	RD266	-	-	-	1.4E-04	2.2E-03	2.2E-03
C08-C11 (Gasoline Range)	RD727	1.10E+01	5.5E+00	UJ		-	-
C11-C14 (Kerosene Range)	RD727	1.10E+01	5.5E+00	UJ		-	-
C14-C20 (Diesel Range)	RD727	1.10E+01	5.5E+00	UJ		-	-
C20-C30 (Lubricant Oil Range)	RD727	1.10E+01	5.5E+00	UJ		-	-
C11-C30	RD727	-	1.7E+01	-		-	-
Benzene	RD727	6.00E-03	3.0E-03	U	1.2E-04	6.6E-04	6.6E-04
Ethylbenzene	RD727	6.00E-03	3.0E-03	U	1.2E-04	6.6E-04	6.6E-04
Toluene	RD727	6.00E-03	3.0E-03	U	1.2E-04	6.6E-04	6.6E-04
m,p-Xylene	RD727	6.00E-03	3.0E-03	U	3.6E-04	2.0E-03	2.0E-03
o-Xylene	RD727	6.00E-03	3.0E-03	U	8.0E-05	4.4E-04	4.4E-04
Xylene (total)	RD727	-	-	-	4.4E-04	2.4E-03	2.4E-03
2-Methylnaphthalene	RD727	-	-	-	2.8E-02	1.5E-01	1.5E-01
Acenaphthene	RD727	-	-	-	5.7E-04	9.5E-03	9.5E-03
Acenaphthylene	RD727	-	-	-	7.0E-05	1.2E-03	1.2E-03
Anthracene	RD727	-	-	-	3.7E-04	6.2E-03	6.2E-03
Benzo(a)anthracene	RD727	-	-	-	2.7E-05	4.4E-04	4.4E-04
Benzo(a)pyrene	RD727	-	-	-	2.7E-05	4.5E-04	4.5E-04
Benzo(b)fluoranthene	RD727	-	-	-	4.3E-05	7.1E-04	7.1E-04
Benzo(e)pyrene	RD727	-	-	-	2.1E-04	3.4E-03	3.4E-03
Benzo(g,h,i)perylene	RD727	-	-	-	2.2E-04	3.6E-03	3.6E-03
Benzo(k)fluoranthene	RD727	-	-	-	2.1E-05	3.4E-04	3.4E-04
Chrysene	RD727	-	-	-	5.9E-05	9.7E-04	9.7E-04
Dibenz(a,h)anthracene	RD727	-	-	-	1.1E-05	1.8E-04	1.8E-04
Fluoranthene	RD727	-	-	-	7.5E-05	1.2E-03	1.2E-03
Fluorene	RD727	-	-	-	5.7E-04	9.4E-03	9.4E-03
Indeno(1,2,3-cd)pyrene	RD727	-	-	-	2.4E-05	4.0E-04	4.0E-04
Naphthalene	RD727	-	-	-	6.9E-03	3.8E-02	3.8E-02
Perylene	RD727	-	-	-	1.2E-04	1.9E-03	1.9E-03
Phenanthrene	RD727	-	-	-	1.5E-03	2.5E-02	2.5E-02
Pyrene	RD727	-	-	-	1.4E-04	2.2E-03	2.2E-03
C08-C11 (Gasoline Range)	RD728	5.80E+01	2.9E+01	UJ		-	-
C11-C14 (Kerosene Range)	RD728	5.80E+01	2.9E+01	UJ		-	-
C14-C20 (Diesel Range)	RD728	2.10E+02	2.1E+02	J		-	-
C20-C30 (Lubricant Oil Range)	RD728	9.20E+02	9.2E+02	J		-	-
C11-C30	RD728	-	1.2E+03	-		-	-
Benzene	RD728	-	-	-	1.2E-04	3.5E-03	3.5E-03
Ethylbenzene	RD728	-	-	-	1.2E-04	3.5E-03	3.5E-03

TPH to Petroleum Constituent Extrapolation for Soil (0-10 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Toluene	RD728	-	-	-	1.2E-04	3.5E-03	3.5E-03
m,p-Xylene	RD728	-	-	-	3.6E-04	1.0E-02	1.0E-02
o-Xylene	RD728	-	-	-	8.0E-05	2.3E-03	2.3E-03
Xylene (total)	RD728	-	-	-	4.4E-04	1.3E-02	1.3E-02
2-Methylnaphthalene	RD728	-	-	-	2.8E-02	8.0E-01	8.0E-01
Acenaphthene	RD728	-	-	-	5.7E-04	6.6E-01	6.6E-01
Acenaphthylene	RD728	-	-	-	7.0E-05	8.1E-02	8.1E-02
Anthracene	RD728	-	-	-	3.7E-04	4.3E-01	4.3E-01
Benzo(a)anthracene	RD728	-	-	-	2.7E-05	3.1E-02	3.1E-02
Benzo(a)pyrene	RD728	-	-	-	2.7E-05	3.2E-02	3.2E-02
Benzo(b)fluoranthene	RD728	-	-	-	4.3E-05	5.0E-02	5.0E-02
Benzo(e)pyrene	RD728	-	-	-	2.1E-04	2.4E-01	2.4E-01
Benzo(g,h,i)perylene	RD728	-	-	-	2.2E-04	2.6E-01	2.6E-01
Benzo(k)fluoranthene	RD728	-	-	-	2.1E-05	2.4E-02	2.4E-02
Chrysene	RD728	-	-	-	5.9E-05	6.8E-02	6.8E-02
Dibenz(a,h)anthracene	RD728	-	-	-	1.1E-05	1.3E-02	1.3E-02
Fluoranthene	RD728	-	-	-	7.5E-05	8.7E-02	8.7E-02
Fluorene	RD728	-	-	-	5.7E-04	6.6E-01	6.6E-01
Indeno(1,2,3-cd)pyrene	RD728	-	-	-	2.4E-05	2.8E-02	2.8E-02
Naphthalene	RD728	-	-	-	6.9E-03	2.0E-01	2.0E-01
Perylene	RD728	-	-	-	1.2E-04	1.4E-01	1.4E-01
Phenanthrene	RD728	-	-	-	1.5E-03	1.8E+00	1.8E+00
Pyrene	RD728	-	-	-	1.4E-04	1.6E-01	1.6E-01
C08-C11 (Gasoline Range)	RD737	1.50E+01	7.5E+00	UJ		-	-
C11-C14 (Kerosene Range)	RD737	1.50E+01	7.5E+00	UJ		-	-
C14-C20 (Diesel Range)	RD737	1.50E+01	7.5E+00	UJ		-	-
C20-C30 (Lubricant Oil Range)	RD737	1.50E+01	7.5E+00	UJ		-	-
C11-C30	RD737	-	2.3E+01	-		-	-
Benzene	RD737	-	-	-	1.2E-04	9.0E-04	9.0E-04
Ethylbenzene	RD737	-	-	-	1.2E-04	9.0E-04	9.0E-04
Toluene	RD737	-	-	-	1.2E-04	9.0E-04	9.0E-04
m,p-Xylene	RD737	-	-	-	3.6E-04	2.7E-03	2.7E-03
o-Xylene	RD737	-	-	-	8.0E-05	6.0E-04	6.0E-04
Xylene (total)	RD737	-	-	-	4.4E-04	3.3E-03	3.3E-03
2-Methylnaphthalene	RD737	-	-	-	2.8E-02	2.1E-01	2.1E-01
Acenaphthene	RD737	-	-	-	5.7E-04	1.3E-02	1.3E-02
Acenaphthylene	RD737	-	-	-	7.0E-05	1.6E-03	1.6E-03
Anthracene	RD737	-	-	-	3.7E-04	8.4E-03	8.4E-03
Benzo(a)anthracene	RD737	-	-	-	2.7E-05	6.1E-04	6.1E-04
Benzo(a)pyrene	RD737	-	-	-	2.7E-05	6.1E-04	6.1E-04
Benzo(b)fluoranthene	RD737	-	-	-	4.3E-05	9.7E-04	9.7E-04
Benzo(e)pyrene	RD737	-	-	-	2.1E-04	4.7E-03	4.7E-03
Benzo(g,h,i)perylene	RD737	-	-	-	2.2E-04	5.0E-03	5.0E-03
Benzo(k)fluoranthene	RD737	-	-	-	2.1E-05	4.6E-04	4.6E-04
Chrysene	RD737	-	-	-	5.9E-05	1.3E-03	1.3E-03
Dibenz(a,h)anthracene	RD737	-	-	-	1.1E-05	2.5E-04	2.5E-04
Fluoranthene	RD737	-	-	-	7.5E-05	1.7E-03	1.7E-03
Fluorene	RD737	-	-	-	5.7E-04	1.3E-02	1.3E-02
Indeno(1,2,3-cd)pyrene	RD737	-	-	-	2.4E-05	5.4E-04	5.4E-04
Naphthalene	RD737	-	-	-	6.9E-03	5.2E-02	5.2E-02
Perylene	RD737	-	-	-	1.2E-04	2.7E-03	2.7E-03
Phenanthrene	RD737	-	-	-	1.5E-03	3.4E-02	3.4E-02
Pyrene	RD737	-	-	-	1.4E-04	3.1E-03	3.1E-03
C08-C11 (Gasoline Range)	RD738	1.10E+01	5.5E+00	UJ		-	-
C11-C14 (Kerosene Range)	RD738	1.10E+01	5.5E+00	UJ		-	-
C14-C20 (Diesel Range)	RD738	1.10E+01	5.5E+00	UJ		-	-

TPH to Petroleum Constituent Extrapolation for Soil (0-10 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
C20-C30 (Lubricant Oil Range)	RD738	1.10E+01	5.5E+00	UJ		-	-
C11-C30	RD738	-	1.7E+01	-		-	-
Benzene	RD738	6.00E-03	3.0E-03	U	1.2E-04	6.6E-04	6.6E-04
Ethylbenzene	RD738	6.00E-03	3.0E-03	U	1.2E-04	6.6E-04	6.6E-04
Toluene	RD738	6.00E-03	3.0E-03	U	1.2E-04	6.6E-04	6.6E-04
m,p-Xylene	RD738	6.00E-03	3.0E-03	U	3.6E-04	2.0E-03	2.0E-03
o-Xylene	RD738	6.00E-03	3.0E-03	U	8.0E-05	4.4E-04	4.4E-04
Xylene (total)	RD738	-	-	-	4.4E-04	2.4E-03	2.4E-03
2-Methylnaphthalene	RD738	-	-	-	2.8E-02	1.5E-01	1.5E-01
Acenaphthene	RD738	-	-	-	5.7E-04	9.5E-03	9.5E-03
Acenaphthylene	RD738	-	-	-	7.0E-05	1.2E-03	1.2E-03
Anthracene	RD738	-	-	-	3.7E-04	6.2E-03	6.2E-03
Benzo(a)anthracene	RD738	-	-	-	2.7E-05	4.4E-04	4.4E-04
Benzo(a)pyrene	RD738	-	-	-	2.7E-05	4.5E-04	4.5E-04
Benzo(b)fluoranthene	RD738	-	-	-	4.3E-05	7.1E-04	7.1E-04
Benzo(e)pyrene	RD738	-	-	-	2.1E-04	3.4E-03	3.4E-03
Benzo(g,h,i)perylene	RD738	-	-	-	2.2E-04	3.6E-03	3.6E-03
Benzo(k)fluoranthene	RD738	-	-	-	2.1E-05	3.4E-04	3.4E-04
Chrysene	RD738	-	-	-	5.9E-05	9.7E-04	9.7E-04
Dibenz(a,h)anthracene	RD738	-	-	-	1.1E-05	1.8E-04	1.8E-04
Fluoranthene	RD738	-	-	-	7.5E-05	1.2E-03	1.2E-03
Fluorene	RD738	-	-	-	5.7E-04	9.4E-03	9.4E-03
Indeno(1,2,3-cd)pyrene	RD738	-	-	-	2.4E-05	4.0E-04	4.0E-04
Naphthalene	RD738	-	-	-	6.9E-03	3.8E-02	3.8E-02
Perylene	RD738	-	-	-	1.2E-04	1.9E-03	1.9E-03
Phenanthrene	RD738	-	-	-	1.5E-03	2.5E-02	2.5E-02
Pyrene	RD738	-	-	-	1.4E-04	2.2E-03	2.2E-03
C08-C11 (Gasoline Range)	RJ772	3.40E+00	1.7E+00	U		-	-
C11-C14 (Kerosene Range)	RJ772	3.40E+00	1.7E+00	U		-	-
C14-C20 (Diesel Range)	RJ772	3.40E+00	1.7E+00	U		-	-
C20-C30 (Lubricant Oil Range)	RJ772	1.80E+01	1.8E+01			-	-
C11-C30	RJ772	-	2.1E+01	-		-	-
Benzene	RJ772	-	-	-	1.2E-04	2.0E-04	2.0E-04
Ethylbenzene	RJ772	-	-	-	1.2E-04	2.0E-04	2.0E-04
Toluene	RJ772	-	-	-	1.2E-04	2.0E-04	2.0E-04
m,p-Xylene	RJ772	-	-	-	3.6E-04	6.1E-04	6.1E-04
o-Xylene	RJ772	-	-	-	8.0E-05	1.4E-04	1.4E-04
Xylene (total)	RJ772	-	-	-	4.4E-04	7.5E-04	7.5E-04
2-Methylnaphthalene	RJ772	3.00E-03	1.5E-03	U	2.8E-02	4.7E-02	1.5E-03
Acenaphthene	RJ772	3.00E-03	1.5E-03	U	5.7E-04	1.2E-02	1.5E-03
Acenaphthylene	RJ772	3.00E-03	1.5E-03	U	7.0E-05	1.5E-03	1.5E-03
Anthracene	RJ772	3.00E-03	1.5E-03	U	3.7E-04	8.0E-03	1.5E-03
Benzo(a)anthracene	RJ772	9.00E-03	9.0E-03		2.7E-05	5.8E-04	9.0E-03
Benzo(a)pyrene	RJ772	8.00E-03	8.0E-03		2.7E-05	5.8E-04	8.0E-03
Benzo(b)fluoranthene	RJ772	1.80E-02	1.8E-02		4.3E-05	9.3E-04	1.8E-02
Benzo(e)pyrene	RJ772	-	-	-	2.1E-04	4.4E-03	4.4E-03
Benzo(g,h,i)perylene	RJ772	6.00E-03	6.0E-03		2.2E-04	4.7E-03	6.0E-03
Benzo(k)fluoranthene	RJ772	1.70E-02	1.7E-02		2.1E-05	4.4E-04	1.7E-02
Chrysene	RJ772	2.20E-02	2.2E-02		5.9E-05	1.3E-03	2.2E-02
Dibenz(a,h)anthracene	RJ772	3.00E-03	1.5E-03	U	1.1E-05	2.4E-04	2.4E-04
Fluoranthene	RJ772	1.80E-02	1.8E-02		7.5E-05	1.6E-03	1.8E-02
Fluorene	RJ772	3.00E-03	1.5E-03	U	5.7E-04	1.2E-02	1.5E-03
Indeno(1,2,3-cd)pyrene	RJ772	6.00E-03	6.0E-03		2.4E-05	5.1E-04	6.0E-03
Naphthalene	RJ772	3.00E-03	1.5E-03	U	6.9E-03	1.2E-02	1.5E-03
Perylene	RJ772	-	-	-	1.2E-04	2.5E-03	2.5E-03
Phenanthrene	RJ772	7.00E-03	7.0E-03		1.5E-03	3.3E-02	7.0E-03

TPH to Petroleum Constituent Extrapolation for Soil (0-10 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Pyrene	RJ772	1.70E-02	1.7E-02		1.4E-04	2.9E-03	1.7E-02
C08-C11 (Gasoline Range)	RJ774	1.70E+01	8.5E+00	U		-	-
C11-C14 (Kerosene Range)	RJ774	1.70E+01	8.5E+00	U		-	-
C14-C20 (Diesel Range)	RJ774	6.50E+00	6.5E+00	J		-	-
C20-C30 (Lubricant Oil Range)	RJ774	5.50E+02	5.5E+02			-	-
C11-C30	RJ774	-	5.7E+02	-		-	-
Benzene	RJ774	-	-	-	1.2E-04	1.0E-03	1.0E-03
Ethylbenzene	RJ774	-	-	-	1.2E-04	1.0E-03	1.0E-03
Toluene	RJ774	-	-	-	1.2E-04	1.0E-03	1.0E-03
m,p-Xylene	RJ774	-	-	-	3.6E-04	3.1E-03	3.1E-03
o-Xylene	RJ774	-	-	-	8.0E-05	6.8E-04	6.8E-04
Xylene (total)	RJ774	-	-	-	4.4E-04	3.7E-03	3.7E-03
2-Methylnaphthalene	RJ774	3.00E-03	1.5E-03	U	2.8E-02	2.3E-01	1.5E-03
Acenaphthene	RJ774	3.00E-03	1.5E-03	U	5.7E-04	3.2E-01	1.5E-03
Acenaphthylene	RJ774	3.00E-03	1.5E-03	U	7.0E-05	4.0E-02	1.5E-03
Anthracene	RJ774	3.00E-03	1.5E-03	U	3.7E-04	2.1E-01	1.5E-03
Benzo(a)anthracene	RJ774	3.00E-03	1.5E-03	U	2.7E-05	1.5E-02	1.5E-03
Benzo(a)pyrene	RJ774	3.00E-03	1.5E-03	U	2.7E-05	1.5E-02	1.5E-03
Benzo(b)fluoranthene	RJ774	3.00E-03	1.5E-03	U	4.3E-05	2.4E-02	1.5E-03
Benzo(e)pyrene	RJ774	-	-	-	2.1E-04	1.2E-01	1.2E-01
Benzo(g,h,i)perylene	RJ774	3.00E-03	1.5E-03	U	2.2E-04	1.2E-01	1.5E-03
Benzo(k)fluoranthene	RJ774	3.00E-03	1.5E-03	U	2.1E-05	1.2E-02	1.5E-03
Chrysene	RJ774	4.00E-03	4.0E-03		5.9E-05	3.3E-02	4.0E-03
Dibenz(a,h)anthracene	RJ774	3.00E-03	1.5E-03	U	1.1E-05	6.3E-03	1.5E-03
Fluoranthene	RJ774	4.00E-03	4.0E-03		7.5E-05	4.2E-02	4.0E-03
Fluorene	RJ774	3.00E-03	1.5E-03	U	5.7E-04	3.2E-01	1.5E-03
Indeno(1,2,3-cd)pyrene	RJ774	3.00E-03	1.5E-03	U	2.4E-05	1.4E-02	1.5E-03
Naphthalene	RJ774	3.00E-03	1.5E-03	U	6.9E-03	5.9E-02	1.5E-03
Perylene	RJ774	-	-	-	1.2E-04	6.7E-02	6.7E-02
Phenanthrene	RJ774	6.00E-03	6.0E-03		1.5E-03	8.7E-01	6.0E-03
Pyrene	RJ774	5.00E-03	5.0E-03		1.4E-04	7.7E-02	5.0E-03
C08-C11 (Gasoline Range)	RJ776	3.60E+00	1.8E+00	U		-	-
C11-C14 (Kerosene Range)	RJ776	3.60E+00	1.8E+00	U		-	-
C14-C20 (Diesel Range)	RJ776	3.60E+00	1.8E+00	U		-	-
C20-C30 (Lubricant Oil Range)	RJ776	3.60E+00	1.8E+00	U		-	-
C11-C30	RJ776	-	5.4E+00	-		-	-
Benzene	RJ776	-	-	-	1.2E-04	2.2E-04	2.2E-04
Ethylbenzene	RJ776	-	-	-	1.2E-04	2.2E-04	2.2E-04
Toluene	RJ776	-	-	-	1.2E-04	2.2E-04	2.2E-04
m,p-Xylene	RJ776	-	-	-	3.6E-04	6.5E-04	6.5E-04
o-Xylene	RJ776	-	-	-	8.0E-05	1.4E-04	1.4E-04
Xylene (total)	RJ776	-	-	-	4.4E-04	7.9E-04	7.9E-04
2-Methylnaphthalene	RJ776	4.00E-03	2.0E-03	U	2.8E-02	5.0E-02	2.0E-03
Acenaphthene	RJ776	4.00E-03	2.0E-03	U	5.7E-04	3.1E-03	2.0E-03
Acenaphthylene	RJ776	4.00E-03	2.0E-03	U	7.0E-05	3.8E-04	3.8E-04
Anthracene	RJ776	4.00E-03	2.0E-03	U	3.7E-04	2.0E-03	2.0E-03
Benzo(a)anthracene	RJ776	4.00E-03	2.0E-03	U	2.7E-05	1.5E-04	1.5E-04
Benzo(a)pyrene	RJ776	4.00E-03	2.0E-03	U	2.7E-05	1.5E-04	1.5E-04
Benzo(b)fluoranthene	RJ776	4.00E-03	2.0E-03	U	4.3E-05	2.3E-04	2.3E-04
Benzo(e)pyrene	RJ776	-	-	-	2.1E-04	1.1E-03	1.1E-03
Benzo(g,h,i)perylene	RJ776	4.00E-03	2.0E-03	U	2.2E-04	1.2E-03	1.2E-03
Benzo(k)fluoranthene	RJ776	4.00E-03	2.0E-03	U	2.1E-05	1.1E-04	1.1E-04
Chrysene	RJ776	4.00E-03	2.0E-03	U	5.9E-05	3.2E-04	3.2E-04
Dibenz(a,h)anthracene	RJ776	4.00E-03	2.0E-03	U	1.1E-05	6.0E-05	6.0E-05
Fluoranthene	RJ776	4.00E-03	2.0E-03	U	7.5E-05	4.0E-04	4.0E-04
Fluorene	RJ776	4.00E-03	2.0E-03	U	5.7E-04	3.1E-03	2.0E-03

TPH to Petroleum Constituent Extrapolation for Soil (0-10 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Indeno(1,2,3-cd)pyrene	RJ776	4.00E-03	2.0E-03	U	2.4E-05	1.3E-04	1.3E-04
Naphthalene	RJ776	4.00E-03	2.0E-03	U	6.9E-03	1.3E-02	2.0E-03
Perylene	RJ776	-	-	-	1.2E-04	6.4E-04	6.4E-04
Phenanthrene	RJ776	4.00E-03	2.0E-03	U	1.5E-03	8.3E-03	2.0E-03
Pyrene	RJ776	4.00E-03	2.0E-03	U	1.4E-04	7.4E-04	7.4E-04
C08-C11 (Gasoline Range)	RJ781	3.50E+00	1.8E+00	U		-	-
C11-C14 (Kerosene Range)	RJ781	3.50E+00	1.8E+00	U		-	-
C14-C20 (Diesel Range)	RJ781	3.50E+00	1.8E+00	U		-	-
C20-C30 (Lubricant Oil Range)	RJ781	1.80E+01	1.8E+01			-	-
C11-C30	RJ781	-	2.2E+01	-		-	-
Benzene	RJ781	-	-	-	1.2E-04	2.1E-04	2.1E-04
Ethylbenzene	RJ781	-	-	-	1.2E-04	2.1E-04	2.1E-04
Toluene	RJ781	-	-	-	1.2E-04	2.1E-04	2.1E-04
m,p-Xylene	RJ781	-	-	-	3.6E-04	6.3E-04	6.3E-04
o-Xylene	RJ781	-	-	-	8.0E-05	1.4E-04	1.4E-04
Xylene (total)	RJ781	-	-	-	4.4E-04	7.7E-04	7.7E-04
2-Methylnaphthalene	RJ781	3.00E-03	1.5E-03	U	2.8E-02	4.8E-02	1.5E-03
Acenaphthene	RJ781	3.00E-03	1.5E-03	U	5.7E-04	1.2E-02	1.5E-03
Acenaphthylene	RJ781	3.00E-03	1.5E-03	U	7.0E-05	1.5E-03	1.5E-03
Anthracene	RJ781	3.00E-03	1.5E-03	U	3.7E-04	8.0E-03	1.5E-03
Benzo(a)anthracene	RJ781	3.00E-03	1.5E-03	U	2.7E-05	5.8E-04	5.8E-04
Benzo(a)pyrene	RJ781	3.00E-03	1.5E-03	U	2.7E-05	5.8E-04	5.8E-04
Benzo(b)fluoranthene	RJ781	3.00E-03	1.5E-03	U	4.3E-05	9.3E-04	9.3E-04
Benzo(e)pyrene	RJ781	-	-	-	2.1E-04	4.4E-03	4.4E-03
Benzo(g,h,i)perylene	RJ781	3.00E-03	1.5E-03	U	2.2E-04	4.8E-03	1.5E-03
Benzo(k)fluoranthene	RJ781	3.00E-03	1.5E-03	U	2.1E-05	4.4E-04	4.4E-04
Chrysene	RJ781	3.00E-03	1.5E-03	U	5.9E-05	1.3E-03	1.3E-03
Dibenz(a,h)anthracene	RJ781	3.00E-03	1.5E-03	U	1.1E-05	2.4E-04	2.4E-04
Fluoranthene	RJ781	3.00E-03	1.5E-03	U	7.5E-05	1.6E-03	1.5E-03
Fluorene	RJ781	3.00E-03	1.5E-03	U	5.7E-04	1.2E-02	1.5E-03
Indeno(1,2,3-cd)pyrene	RJ781	3.00E-03	1.5E-03	U	2.4E-05	5.2E-04	5.2E-04
Naphthalene	RJ781	3.00E-03	1.5E-03	U	6.9E-03	1.2E-02	1.5E-03
Perylene	RJ781	-	-	-	1.2E-04	2.5E-03	2.5E-03
Phenanthrene	RJ781	3.00E-03	1.5E-03	U	1.5E-03	3.3E-02	1.5E-03
Pyrene	RJ781	3.00E-03	1.5E-03	U	1.4E-04	2.9E-03	1.5E-03
C08-C11 (Gasoline Range)	RJ782	1.70E+01	8.5E+00	U		-	-
C11-C14 (Kerosene Range)	RJ782	1.70E+01	8.5E+00	U		-	-
C14-C20 (Diesel Range)	RJ782	1.70E+00	1.7E+00	J		-	-
C20-C30 (Lubricant Oil Range)	RJ782	1.20E+02	1.2E+02			-	-
C11-C30	RJ782	-	1.3E+02	-		-	-
Benzene	RJ782	-	-	-	1.2E-04	1.0E-03	1.0E-03
Ethylbenzene	RJ782	-	-	-	1.2E-04	1.0E-03	1.0E-03
Toluene	RJ782	-	-	-	1.2E-04	1.0E-03	1.0E-03
m,p-Xylene	RJ782	-	-	-	3.6E-04	3.1E-03	3.1E-03
o-Xylene	RJ782	-	-	-	8.0E-05	6.8E-04	6.8E-04
Xylene (total)	RJ782	-	-	-	4.4E-04	3.7E-03	3.7E-03
2-Methylnaphthalene	RJ782	3.00E-03	1.5E-03	U	2.8E-02	2.3E-01	1.5E-03
Acenaphthene	RJ782	3.00E-03	1.5E-03	U	5.7E-04	7.5E-02	1.5E-03
Acenaphthylene	RJ782	3.00E-03	1.5E-03	U	7.0E-05	9.1E-03	1.5E-03
Anthracene	RJ782	3.00E-03	1.5E-03	U	3.7E-04	4.9E-02	1.5E-03
Benzo(a)anthracene	RJ782	4.00E-03	4.0E-03		2.7E-05	3.5E-03	4.0E-03
Benzo(a)pyrene	RJ782	6.00E-03	6.0E-03		2.7E-05	3.5E-03	6.0E-03
Benzo(b)fluoranthene	RJ782	8.00E-03	8.0E-03		4.3E-05	5.6E-03	8.0E-03
Benzo(e)pyrene	RJ782	-	-	-	2.1E-04	2.7E-02	2.7E-02
Benzo(g,h,i)perylene	RJ782	3.00E-03	1.5E-03	U	2.2E-04	2.9E-02	1.5E-03
Benzo(k)fluoranthene	RJ782	7.00E-03	7.0E-03		2.1E-05	2.7E-03	7.0E-03

TPH to Petroleum Constituent Extrapolation for Soil (0-10 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Chrysene	RJ782	8.00E-03	8.0E-03		5.9E-05	7.6E-03	8.0E-03
Dibenz(a,h)anthracene	RJ782	3.00E-03	1.5E-03	U	1.1E-05	1.4E-03	1.4E-03
Fluoranthene	RJ782	9.00E-03	9.0E-03		7.5E-05	9.7E-03	9.0E-03
Fluorene	RJ782	3.00E-03	1.5E-03	U	5.7E-04	7.4E-02	1.5E-03
Indeno(1,2,3-cd)pyrene	RJ782	3.00E-03	1.5E-03	U	2.4E-05	3.1E-03	1.5E-03
Naphthalene	RJ782	3.00E-03	1.5E-03	U	6.9E-03	5.9E-02	1.5E-03
Perylene	RJ782	-	-	-	1.2E-04	1.5E-02	1.5E-02
Phenanthrene	RJ782	4.00E-03	4.0E-03		1.5E-03	2.0E-01	4.0E-03
Pyrene	RJ782	9.00E-03	9.0E-03		1.4E-04	1.8E-02	9.0E-03
C08-C11 (Gasoline Range)	RS287	1.10E+01	5.5E+00	U		-	-
C11-C14 (Kerosene Range)	RS287	1.10E+01	5.5E+00	U		-	-
C14-C20 (Diesel Range)	RS287	1.10E+01	5.5E+00	U		-	-
C20-C30 (Lubricant Oil Range)	RS287	1.10E+01	5.5E+00	U		-	-
C11-C30	RS287	-	1.7E+01	-		-	-
Benzene	RS287	5.00E-03	2.5E-03	U	1.2E-04	6.6E-04	6.6E-04
Ethylbenzene	RS287	5.00E-03	2.5E-03	U	1.2E-04	6.6E-04	6.6E-04
Toluene	RS287	5.00E-03	2.5E-03	U	1.2E-04	6.6E-04	6.6E-04
m,p-Xylene	RS287	5.00E-03	2.5E-03	U	3.6E-04	2.0E-03	2.0E-03
o-Xylene	RS287	5.00E-03	2.5E-03	U	8.0E-05	4.4E-04	4.4E-04
Xylene (total)	RS287	-	-	-	4.4E-04	2.4E-03	2.4E-03
2-Methylnaphthalene	RS287	-	-	-	2.8E-02	1.5E-01	1.5E-01
Acenaphthene	RS287	3.20E-02	1.6E-02	U	5.7E-04	9.5E-03	9.5E-03
Acenaphthylene	RS287	3.20E-02	1.6E-02	U	7.0E-05	1.2E-03	1.2E-03
Anthracene	RS287	3.20E-02	1.6E-02	U	3.7E-04	6.2E-03	6.2E-03
Benzo(a)anthracene	RS287	3.20E-02	1.6E-02	U	2.7E-05	4.4E-04	4.4E-04
Benzo(a)pyrene	RS287	3.20E-02	1.6E-02	U	2.7E-05	4.5E-04	4.5E-04
Benzo(b)fluoranthene	RS287	3.20E-02	1.6E-02	U	4.3E-05	7.1E-04	7.1E-04
Benzo(e)pyrene	RS287	-	-	-	2.1E-04	3.4E-03	3.4E-03
Benzo(g,h,i)perylene	RS287	3.20E-02	1.6E-02	U	2.2E-04	3.6E-03	3.6E-03
Benzo(k)fluoranthene	RS287	3.20E-02	1.6E-02	U	2.1E-05	3.4E-04	3.4E-04
Chrysene	RS287	3.20E-02	1.6E-02	U	5.9E-05	9.7E-04	9.7E-04
Dibenz(a,h)anthracene	RS287	3.20E-02	1.6E-02	U	1.1E-05	1.8E-04	1.8E-04
Fluoranthene	RS287	3.20E-02	1.6E-02	U	7.5E-05	1.2E-03	1.2E-03
Fluorene	RS287	3.20E-02	1.6E-02	U	5.7E-04	9.4E-03	9.4E-03
Indeno(1,2,3-cd)pyrene	RS287	3.20E-02	1.6E-02	U	2.4E-05	4.0E-04	4.0E-04
Naphthalene	RS287	3.20E-02	1.6E-02	U	6.9E-03	3.8E-02	1.6E-02
Perylene	RS287	-	-	-	1.2E-04	1.9E-03	1.9E-03
Phenanthrene	RS287	3.20E-02	1.6E-02	U	1.5E-03	2.5E-02	1.6E-02
Pyrene	RS287	3.20E-02	1.6E-02	U	1.4E-04	2.2E-03	2.2E-03
C08-C11 (Gasoline Range)	RS288	5.40E+01	2.7E+01	U		-	-
C11-C14 (Kerosene Range)	RS288	5.40E+01	2.7E+01	U		-	-
C14-C20 (Diesel Range)	RS288	7.60E+01	7.6E+01			-	-
C20-C30 (Lubricant Oil Range)	RS288	2.50E+02	2.5E+02			-	-
C11-C30	RS288	-	3.5E+02	-		-	-
Benzene	RS288	-	-	-	1.2E-04	3.2E-03	3.2E-03
Ethylbenzene	RS288	-	-	-	1.2E-04	3.2E-03	3.2E-03
Toluene	RS288	-	-	-	1.2E-04	3.2E-03	3.2E-03
m,p-Xylene	RS288	-	-	-	3.6E-04	9.7E-03	9.7E-03
o-Xylene	RS288	-	-	-	8.0E-05	2.2E-03	2.2E-03
Xylene (total)	RS288	-	-	-	4.4E-04	1.2E-02	1.2E-02
2-Methylnaphthalene	RS288DL	-	-	-	2.8E-02	7.4E-01	7.4E-01
Acenaphthene	RS288DL	3.20E+00	1.6E+00	U	5.7E-04	2.0E-01	2.0E-01
Acenaphthylene	RS288DL	3.20E+00	1.6E+00	U	7.0E-05	2.5E-02	2.5E-02
Anthracene	RS288DL	3.20E+00	1.6E+00	U	3.7E-04	1.3E-01	1.3E-01
Benzo(a)anthracene	RS288DL	3.20E+00	1.6E+00	U	2.7E-05	9.5E-03	9.5E-03
Benzo(a)pyrene	RS288DL	3.20E+00	1.6E+00	U	2.7E-05	9.6E-03	9.6E-03

TPH to Petroleum Constituent Extrapolation for Soil (0-10 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Benzo(b)fluoranthene	RS288DL	3.20E+00	1.6E+00	U	4.3E-05	1.5E-02	1.5E-02
Benzo(e)pyrene	RS288DL	-	-	-	2.1E-04	7.3E-02	7.3E-02
Benzo(g,h,i)perylene	RS288DL	3.20E+00	1.6E+00	U	2.2E-04	7.8E-02	7.8E-02
Benzo(k)fluoranthene	RS288DL	3.20E+00	1.6E+00	U	2.1E-05	7.2E-03	7.2E-03
Chrysene	RS288DL	3.20E+00	1.6E+00	U	5.9E-05	2.1E-02	2.1E-02
Dibenz(a,h)anthracene	RS288DL	3.20E+00	1.6E+00	U	1.1E-05	3.9E-03	3.9E-03
Fluoranthene	RS288DL	3.20E+00	1.6E+00	U	7.5E-05	2.6E-02	2.6E-02
Fluorene	RS288DL	3.20E+00	1.6E+00	U	5.7E-04	2.0E-01	2.0E-01
Indeno(1,2,3-cd)pyrene	RS288DL	3.20E+00	1.6E+00	U	2.4E-05	8.5E-03	8.5E-03
Naphthalene	RS288DL	3.20E+00	1.6E+00	U	6.9E-03	1.9E-01	1.9E-01
Perylene	RS288DL	-	-	-	1.2E-04	4.2E-02	4.2E-02
Phenanthrene	RS288DL	3.20E+00	1.6E+00	U	1.5E-03	5.4E-01	5.4E-01
Pyrene	RS288DL	3.20E+00	1.6E+00	U	1.4E-04	4.8E-02	4.8E-02
C08-C11 (Gasoline Range)	RS289	1.00E+01	5.0E+00	U		-	-
C11-C14 (Kerosene Range)	RS289	1.00E+01	5.0E+00	U		-	-
C14-C20 (Diesel Range)	RS289	1.00E+01	5.0E+00	U		-	-
C20-C30 (Lubricant Oil Range)	RS289	3.90E+01	3.9E+01			-	-
C11-C30	RS289	-	4.9E+01	-		-	-
Benzene	RS289	-	-	-	1.2E-04	6.0E-04	6.0E-04
Ethylbenzene	RS289	-	-	-	1.2E-04	6.0E-04	6.0E-04
Toluene	RS289	-	-	-	1.2E-04	6.0E-04	6.0E-04
m,p-Xylene	RS289	-	-	-	3.6E-04	1.8E-03	1.8E-03
o-Xylene	RS289	-	-	-	8.0E-05	4.0E-04	4.0E-04
Xylene (total)	RS289	-	-	-	4.4E-04	2.2E-03	2.2E-03
2-Methylnaphthalene	RS289DL	-	-	-	2.8E-02	1.4E-01	1.4E-01
Acenaphthene	RS289DL	3.20E-01	1.6E-01	U	5.7E-04	2.8E-02	2.8E-02
Acenaphthylene	RS289DL	3.20E-01	1.6E-01	U	7.0E-05	3.4E-03	3.4E-03
Anthracene	RS289DL	3.20E-01	1.6E-01	U	3.7E-04	1.8E-02	1.8E-02
Benzo(a)anthracene	RS289DL	3.20E-01	1.6E-01	U	2.7E-05	1.3E-03	1.3E-03
Benzo(a)pyrene	RS289DL	3.20E-01	1.6E-01	U	2.7E-05	1.3E-03	1.3E-03
Benzo(b)fluoranthene	RS289DL	3.20E-01	1.6E-01	U	4.3E-05	2.1E-03	2.1E-03
Benzo(e)pyrene	RS289DL	-	-	-	2.1E-04	1.0E-02	1.0E-02
Benzo(g,h,i)perylene	RS289DL	3.20E-01	1.6E-01	U	2.2E-04	1.1E-02	1.1E-02
Benzo(k)fluoranthene	RS289DL	3.20E-01	1.6E-01	U	2.1E-05	1.0E-03	1.0E-03
Chrysene	RS289DL	3.20E-01	1.6E-01	U	5.9E-05	2.9E-03	2.9E-03
Dibenz(a,h)anthracene	RS289DL	3.20E-01	1.6E-01	U	1.1E-05	5.4E-04	5.4E-04
Fluoranthene	RS289DL	3.20E-01	1.6E-01	U	7.5E-05	3.7E-03	3.7E-03
Fluorene	RS289DL	3.20E-01	1.6E-01	U	5.7E-04	2.8E-02	2.8E-02
Indeno(1,2,3-cd)pyrene	RS289DL	3.20E-01	1.6E-01	U	2.4E-05	1.2E-03	1.2E-03
Naphthalene	RS289DL	3.20E-01	1.6E-01	U	6.9E-03	3.5E-02	3.5E-02
Perylene	RS289DL	-	-	-	1.2E-04	5.8E-03	5.8E-03
Phenanthrene	RS289DL	3.20E-01	1.6E-01	U	1.5E-03	7.5E-02	7.5E-02
Pyrene	RS289DL	3.20E-01	1.6E-01	U	1.4E-04	6.7E-03	6.7E-03
C08-C11 (Gasoline Range)	RS290	1.10E+01	5.5E+00	U		-	-
C11-C14 (Kerosene Range)	RS290	1.10E+01	5.5E+00	U		-	-
C14-C20 (Diesel Range)	RS290	1.10E+01	5.5E+00	U		-	-
C20-C30 (Lubricant Oil Range)	RS290	4.20E+01	4.2E+01			-	-
C11-C30	RS290	-	5.3E+01	-		-	-
Benzene	RS290	-	-	-	1.2E-04	6.6E-04	6.6E-04
Ethylbenzene	RS290	-	-	-	1.2E-04	6.6E-04	6.6E-04
Toluene	RS290	-	-	-	1.2E-04	6.6E-04	6.6E-04
m,p-Xylene	RS290	-	-	-	3.6E-04	2.0E-03	2.0E-03
o-Xylene	RS290	-	-	-	8.0E-05	4.4E-04	4.4E-04
Xylene (total)	RS290	-	-	-	4.4E-04	2.4E-03	2.4E-03
2-Methylnaphthalene	RS290	-	-	-	2.8E-02	1.5E-01	1.5E-01
Acenaphthene	RS290	3.30E-02	1.7E-02	U	5.7E-04	3.0E-02	1.7E-02

TPH to Petroleum Constituent Extrapolation for Soil (0-10 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Acenaphthylene	RS290	3.30E-02	1.7E-02	U	7.0E-05	3.7E-03	3.7E-03
Anthracene	RS290	3.30E-02	1.7E-02	U	3.7E-04	2.0E-02	1.7E-02
Benzo(a)anthracene	RS290	3.30E-02	1.7E-02	U	2.7E-05	1.4E-03	1.4E-03
Benzo(a)pyrene	RS290	3.30E-02	1.7E-02	U	2.7E-05	1.4E-03	1.4E-03
Benzo(b)fluoranthene	RS290	3.30E-02	1.7E-02	U	4.3E-05	2.3E-03	2.3E-03
Benzo(e)pyrene	RS290	-	-	-	2.1E-04	1.1E-02	1.1E-02
Benzo(g,h,i)perylene	RS290	3.30E-02	1.7E-02	U	2.2E-04	1.2E-02	1.2E-02
Benzo(k)fluoranthene	RS290	3.30E-02	1.7E-02	U	2.1E-05	1.1E-03	1.1E-03
Chrysene	RS290	3.30E-02	1.7E-02	U	5.9E-05	3.1E-03	3.1E-03
Dibenz(a,h)anthracene	RS290	3.30E-02	1.7E-02	U	1.1E-05	5.9E-04	5.9E-04
Fluoranthene	RS290	3.30E-02	1.7E-02	U	7.5E-05	4.0E-03	4.0E-03
Fluorene	RS290	3.30E-02	1.7E-02	U	5.7E-04	3.0E-02	1.7E-02
Indeno(1,2,3-cd)pyrene	RS290	3.30E-02	1.7E-02	U	2.4E-05	1.3E-03	1.3E-03
Naphthalene	RS290	3.30E-02	1.7E-02	U	6.9E-03	3.8E-02	1.7E-02
Perylene	RS290	-	-	-	1.2E-04	6.2E-03	6.2E-03
Phenanthrene	RS290	3.30E-02	1.7E-02	U	1.5E-03	8.1E-02	1.7E-02
Pyrene	RS290	3.30E-02	1.7E-02	U	1.4E-04	7.2E-03	7.2E-03
C08-C11 (Gasoline Range)	RS291	1.10E+01	5.5E+00	U		-	-
C11-C14 (Kerosene Range)	RS291	1.10E+01	5.5E+00	U		-	-
C14-C20 (Diesel Range)	RS291	1.10E+01	5.5E+00	U		-	-
C20-C30 (Lubricant Oil Range)	RS291	1.10E+01	5.5E+00	U		-	-
C11-C30	RS291	-	1.7E+01	-		-	-
Benzene	RS291	5.00E-03	2.5E-03	U	1.2E-04	6.6E-04	6.6E-04
Ethylbenzene	RS291	5.00E-03	2.5E-03	U	1.2E-04	6.6E-04	6.6E-04
Toluene	RS291	5.00E-03	2.5E-03	U	1.2E-04	6.6E-04	6.6E-04
m,p-Xylene	RS291	5.00E-03	2.5E-03	U	3.6E-04	2.0E-03	2.0E-03
o-Xylene	RS291	5.00E-03	2.5E-03	U	8.0E-05	4.4E-04	4.4E-04
Xylene (total)	RS291	-	-	-	4.4E-04	2.4E-03	2.4E-03
2-Methylnaphthalene	RS291	-	-	-	2.8E-02	1.5E-01	1.5E-01
Acenaphthene	RS291	3.20E-02	1.6E-02	U	5.7E-04	9.5E-03	9.5E-03
Acenaphthylene	RS291	3.20E-02	1.6E-02	U	7.0E-05	1.2E-03	1.2E-03
Anthracene	RS291	3.20E-02	1.6E-02	U	3.7E-04	6.2E-03	6.2E-03
Benzo(a)anthracene	RS291	3.20E-02	1.6E-02	U	2.7E-05	4.4E-04	4.4E-04
Benzo(a)pyrene	RS291	3.20E-02	1.6E-02	U	2.7E-05	4.5E-04	4.5E-04
Benzo(b)fluoranthene	RS291	3.20E-02	1.6E-02	U	4.3E-05	7.1E-04	7.1E-04
Benzo(e)pyrene	RS291	-	-	-	2.1E-04	3.4E-03	3.4E-03
Benzo(g,h,i)perylene	RS291	3.20E-02	1.6E-02	U	2.2E-04	3.6E-03	3.6E-03
Benzo(k)fluoranthene	RS291	3.20E-02	1.6E-02	U	2.1E-05	3.4E-04	3.4E-04
Chrysene	RS291	3.20E-02	1.6E-02	U	5.9E-05	9.7E-04	9.7E-04
Dibenz(a,h)anthracene	RS291	3.20E-02	1.6E-02	U	1.1E-05	1.8E-04	1.8E-04
Fluoranthene	RS291	3.20E-02	1.6E-02	U	7.5E-05	1.2E-03	1.2E-03
Fluorene	RS291	3.20E-02	1.6E-02	U	5.7E-04	9.4E-03	9.4E-03
Indeno(1,2,3-cd)pyrene	RS291	3.20E-02	1.6E-02	U	2.4E-05	4.0E-04	4.0E-04
Naphthalene	RS291	3.20E-02	1.6E-02	U	6.9E-03	3.8E-02	1.6E-02
Perylene	RS291	-	-	-	1.2E-04	1.9E-03	1.9E-03
Phenanthrene	RS291	3.20E-02	1.6E-02	U	1.5E-03	2.5E-02	1.6E-02
Pyrene	RS291	3.20E-02	1.6E-02	U	1.4E-04	2.2E-03	2.2E-03
C08-C11 (Gasoline Range)	RS292	1.10E+01	5.5E+00	U		-	-
C11-C14 (Kerosene Range)	RS292	1.10E+01	5.5E+00	U		-	-
C14-C20 (Diesel Range)	RS292	1.10E+01	5.5E+00	U		-	-
C20-C30 (Lubricant Oil Range)	RS292	1.10E+01	5.5E+00	U		-	-
C11-C30	RS292	-	1.7E+01	-		-	-
Benzene	RS292	-	-	-	1.2E-04	6.6E-04	6.6E-04
Ethylbenzene	RS292	-	-	-	1.2E-04	6.6E-04	6.6E-04
Toluene	RS292	-	-	-	1.2E-04	6.6E-04	6.6E-04
m,p-Xylene	RS292	-	-	-	3.6E-04	2.0E-03	2.0E-03

TPH to Petroleum Constituent Extrapolation for Soil (0-10 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
o-Xylene	RS292	-	-	-	8.0E-05	4.4E-04	4.4E-04
Xylene (total)	RS292	-	-	-	4.4E-04	2.4E-03	2.4E-03
2-Methylnaphthalene	RS292	-	-	-	2.8E-02	1.5E-01	1.5E-01
Acenaphthene	RS292	3.40E-02	1.7E-02	U	5.7E-04	9.5E-03	9.5E-03
Acenaphthylene	RS292	3.40E-02	1.7E-02	U	7.0E-05	1.2E-03	1.2E-03
Anthracene	RS292	3.40E-02	1.7E-02	U	3.7E-04	6.2E-03	6.2E-03
Benzo(a)anthracene	RS292	3.40E-02	1.7E-02	U	2.7E-05	4.4E-04	4.4E-04
Benzo(a)pyrene	RS292	3.40E-02	1.7E-02	U	2.7E-05	4.5E-04	4.5E-04
Benzo(b)fluoranthene	RS292	3.40E-02	1.7E-02	U	4.3E-05	7.1E-04	7.1E-04
Benzo(e)pyrene	RS292	-	-	-	2.1E-04	3.4E-03	3.4E-03
Benzo(g,h,i)perylene	RS292	3.40E-02	1.7E-02	U	2.2E-04	3.6E-03	3.6E-03
Benzo(k)fluoranthene	RS292	3.40E-02	1.7E-02	U	2.1E-05	3.4E-04	3.4E-04
Chrysene	RS292	3.40E-02	1.7E-02	U	5.9E-05	9.7E-04	9.7E-04
Dibenz(a,h)anthracene	RS292	3.40E-02	1.7E-02	U	1.1E-05	1.8E-04	1.8E-04
Fluoranthene	RS292	3.40E-02	1.7E-02	U	7.5E-05	1.2E-03	1.2E-03
Fluorene	RS292	3.40E-02	1.7E-02	U	5.7E-04	9.4E-03	9.4E-03
Indeno(1,2,3-cd)pyrene	RS292	3.40E-02	1.7E-02	U	2.4E-05	4.0E-04	4.0E-04
Naphthalene	RS292	3.40E-02	1.7E-02	U	6.9E-03	3.8E-02	1.7E-02
Perylene	RS292	-	-	-	1.2E-04	1.9E-03	1.9E-03
Phenanthrene	RS292	3.40E-02	1.7E-02	U	1.5E-03	2.5E-02	1.7E-02
Pyrene	RS292	3.40E-02	1.7E-02	U	1.4E-04	2.2E-03	2.2E-03
C08-C11 (Gasoline Range)	RS293	5.20E+01	2.6E+01	U		-	-
C11-C14 (Kerosene Range)	RS293	8.90E+01	8.9E+01			-	-
C14-C20 (Diesel Range)	RS293	7.00E+02	7.0E+02			-	-
C20-C30 (Lubricant Oil Range)	RS293	7.20E+02	7.2E+02			-	-
C11-C30	RS293	-	1.5E+03	-		-	-
Benzene	RS293	-	-	-	1.2E-04	3.1E-03	3.1E-03
Ethylbenzene	RS293	-	-	-	1.2E-04	3.1E-03	3.1E-03
Toluene	RS293	-	-	-	1.2E-04	3.1E-03	3.1E-03
m,p-Xylene	RS293	-	-	-	3.6E-04	9.4E-03	9.4E-03
o-Xylene	RS293	-	-	-	8.0E-05	2.1E-03	2.1E-03
Xylene (total)	RS293	-	-	-	4.4E-04	1.1E-02	1.1E-02
2-Methylnaphthalene	RS293	-	-	-	2.8E-02	7.2E-01	7.2E-01
Acenaphthene	RS293	-	-	-	5.7E-04	8.6E-01	8.6E-01
Acenaphthylene	RS293	-	-	-	7.0E-05	1.1E-01	1.1E-01
Anthracene	RS293	-	-	-	3.7E-04	5.6E-01	5.6E-01
Benzo(a)anthracene	RS293	-	-	-	2.7E-05	4.1E-02	4.1E-02
Benzo(a)pyrene	RS293	-	-	-	2.7E-05	4.1E-02	4.1E-02
Benzo(b)fluoranthene	RS293	-	-	-	4.3E-05	6.5E-02	6.5E-02
Benzo(e)pyrene	RS293	-	-	-	2.1E-04	3.1E-01	3.1E-01
Benzo(g,h,i)perylene	RS293	-	-	-	2.2E-04	3.3E-01	3.3E-01
Benzo(k)fluoranthene	RS293	-	-	-	2.1E-05	3.1E-02	3.1E-02
Chrysene	RS293	-	-	-	5.9E-05	8.9E-02	8.9E-02
Dibenz(a,h)anthracene	RS293	-	-	-	1.1E-05	1.7E-02	1.7E-02
Fluoranthene	RS293	-	-	-	7.5E-05	1.1E-01	1.1E-01
Fluorene	RS293	-	-	-	5.7E-04	8.6E-01	8.6E-01
Indeno(1,2,3-cd)pyrene	RS293	-	-	-	2.4E-05	3.6E-02	3.6E-02
Naphthalene	RS293	-	-	-	6.9E-03	1.8E-01	1.8E-01
Perylene	RS293	-	-	-	1.2E-04	1.8E-01	1.8E-01
Phenanthrene	RS293	-	-	-	1.5E-03	2.3E+00	2.3E+00
Pyrene	RS293	-	-	-	1.4E-04	2.1E-01	2.1E-01
C08-C11 (Gasoline Range)	RS294	1.10E+01	5.5E+00	U		-	-
C11-C14 (Kerosene Range)	RS294	1.10E+01	5.5E+00	U		-	-
C14-C20 (Diesel Range)	RS294	1.10E+01	5.5E+00	U		-	-
C20-C30 (Lubricant Oil Range)	RS294	1.10E+01	5.5E+00	U		-	-
C11-C30	RS294	-	1.7E+01	-		-	-

TPH to Petroleum Constituent Extrapolation for Soil (0-10 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Benzene	RS294	-	-	-	1.2E-04	6.6E-04	6.6E-04
Ethylbenzene	RS294	-	-	-	1.2E-04	6.6E-04	6.6E-04
Toluene	RS294	-	-	-	1.2E-04	6.6E-04	6.6E-04
m,p-Xylene	RS294	-	-	-	3.6E-04	2.0E-03	2.0E-03
o-Xylene	RS294	-	-	-	8.0E-05	4.4E-04	4.4E-04
Xylene (total)	RS294	-	-	-	4.4E-04	2.4E-03	2.4E-03
2-Methylnaphthalene	RS294	-	-	-	2.8E-02	1.5E-01	1.5E-01
Acenaphthene	RS294	-	-	-	5.7E-04	9.5E-03	9.5E-03
Acenaphthylene	RS294	-	-	-	7.0E-05	1.2E-03	1.2E-03
Anthracene	RS294	-	-	-	3.7E-04	6.2E-03	6.2E-03
Benzo(a)anthracene	RS294	-	-	-	2.7E-05	4.4E-04	4.4E-04
Benzo(a)pyrene	RS294	-	-	-	2.7E-05	4.5E-04	4.5E-04
Benzo(b)fluoranthene	RS294	-	-	-	4.3E-05	7.1E-04	7.1E-04
Benzo(e)pyrene	RS294	-	-	-	2.1E-04	3.4E-03	3.4E-03
Benzo(g,h,i)perylene	RS294	-	-	-	2.2E-04	3.6E-03	3.6E-03
Benzo(k)fluoranthene	RS294	-	-	-	2.1E-05	3.4E-04	3.4E-04
Chrysene	RS294	-	-	-	5.9E-05	9.7E-04	9.7E-04
Dibenz(a,h)anthracene	RS294	-	-	-	1.1E-05	1.8E-04	1.8E-04
Fluoranthene	RS294	-	-	-	7.5E-05	1.2E-03	1.2E-03
Fluorene	RS294	-	-	-	5.7E-04	9.4E-03	9.4E-03
Indeno(1,2,3-cd)pyrene	RS294	-	-	-	2.4E-05	4.0E-04	4.0E-04
Naphthalene	RS294	-	-	-	6.9E-03	3.8E-02	3.8E-02
Perylene	RS294	-	-	-	1.2E-04	1.9E-03	1.9E-03
Phenanthrene	RS294	-	-	-	1.5E-03	2.5E-02	2.5E-02
Pyrene	RS294	-	-	-	1.4E-04	2.2E-03	2.2E-03
C08-C11 (Gasoline Range)	RS295	1.10E+01	5.5E+00	U		-	-
C11-C14 (Kerosene Range)	RS295	1.10E+01	5.5E+00	U		-	-
C14-C20 (Diesel Range)	RS295	1.10E+01	5.5E+00	U		-	-
C20-C30 (Lubricant Oil Range)	RS295	1.10E+01	5.5E+00	U		-	-
C11-C30	RS295	-	1.7E+01	-		-	-
Benzene	RS295	-	-	-	1.2E-04	6.6E-04	6.6E-04
Ethylbenzene	RS295	-	-	-	1.2E-04	6.6E-04	6.6E-04
Toluene	RS295	-	-	-	1.2E-04	6.6E-04	6.6E-04
m,p-Xylene	RS295	-	-	-	3.6E-04	2.0E-03	2.0E-03
o-Xylene	RS295	-	-	-	8.0E-05	4.4E-04	4.4E-04
Xylene (total)	RS295	-	-	-	4.4E-04	2.4E-03	2.4E-03
2-Methylnaphthalene	RS295	-	-	-	2.8E-02	1.5E-01	1.5E-01
Acenaphthene	RS295	-	-	-	5.7E-04	9.5E-03	9.5E-03
Acenaphthylene	RS295	-	-	-	7.0E-05	1.2E-03	1.2E-03
Anthracene	RS295	-	-	-	3.7E-04	6.2E-03	6.2E-03
Benzo(a)anthracene	RS295	-	-	-	2.7E-05	4.4E-04	4.4E-04
Benzo(a)pyrene	RS295	-	-	-	2.7E-05	4.5E-04	4.5E-04
Benzo(b)fluoranthene	RS295	-	-	-	4.3E-05	7.1E-04	7.1E-04
Benzo(e)pyrene	RS295	-	-	-	2.1E-04	3.4E-03	3.4E-03
Benzo(g,h,i)perylene	RS295	-	-	-	2.2E-04	3.6E-03	3.6E-03
Benzo(k)fluoranthene	RS295	-	-	-	2.1E-05	3.4E-04	3.4E-04
Chrysene	RS295	-	-	-	5.9E-05	9.7E-04	9.7E-04
Dibenz(a,h)anthracene	RS295	-	-	-	1.1E-05	1.8E-04	1.8E-04
Fluoranthene	RS295	-	-	-	7.5E-05	1.2E-03	1.2E-03
Fluorene	RS295	-	-	-	5.7E-04	9.4E-03	9.4E-03
Indeno(1,2,3-cd)pyrene	RS295	-	-	-	2.4E-05	4.0E-04	4.0E-04
Naphthalene	RS295	-	-	-	6.9E-03	3.8E-02	3.8E-02
Perylene	RS295	-	-	-	1.2E-04	1.9E-03	1.9E-03
Phenanthrene	RS295	-	-	-	1.5E-03	2.5E-02	2.5E-02
Pyrene	RS295	-	-	-	1.4E-04	2.2E-03	2.2E-03
C08-C11 (Gasoline Range)	RS296	1.10E+01	5.5E+00	U		-	-

TPH to Petroleum Constituent Extrapolation for Soil (0-10 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
C11-C14 (Kerosene Range)	RS296	1.10E+01	5.5E+00	U		-	-
C14-C20 (Diesel Range)	RS296	1.10E+01	5.5E+00	U		-	-
C20-C30 (Lubricant Oil Range)	RS296	1.10E+01	5.5E+00	U		-	-
C11-C30	RS296	-	1.7E+01	-		-	-
Benzene	RS296	-	-	-	1.2E-04	6.6E-04	6.6E-04
Ethylbenzene	RS296	-	-	-	1.2E-04	6.6E-04	6.6E-04
Toluene	RS296	-	-	-	1.2E-04	6.6E-04	6.6E-04
m,p-Xylene	RS296	-	-	-	3.6E-04	2.0E-03	2.0E-03
o-Xylene	RS296	-	-	-	8.0E-05	4.4E-04	4.4E-04
Xylene (total)	RS296	-	-	-	4.4E-04	2.4E-03	2.4E-03
2-Methylnaphthalene	RS296	-	-	-	2.8E-02	1.5E-01	1.5E-01
Acenaphthene	RS296	-	-	-	5.7E-04	9.5E-03	9.5E-03
Acenaphthylene	RS296	-	-	-	7.0E-05	1.2E-03	1.2E-03
Anthracene	RS296	-	-	-	3.7E-04	6.2E-03	6.2E-03
Benzo(a)anthracene	RS296	-	-	-	2.7E-05	4.4E-04	4.4E-04
Benzo(a)pyrene	RS296	-	-	-	2.7E-05	4.5E-04	4.5E-04
Benzo(b)fluoranthene	RS296	-	-	-	4.3E-05	7.1E-04	7.1E-04
Benzo(e)pyrene	RS296	-	-	-	2.1E-04	3.4E-03	3.4E-03
Benzo(g,h,i)perylene	RS296	-	-	-	2.2E-04	3.6E-03	3.6E-03
Benzo(k)fluoranthene	RS296	-	-	-	2.1E-05	3.4E-04	3.4E-04
Chrysene	RS296	-	-	-	5.9E-05	9.7E-04	9.7E-04
Dibenz(a,h)anthracene	RS296	-	-	-	1.1E-05	1.8E-04	1.8E-04
Fluoranthene	RS296	-	-	-	7.5E-05	1.2E-03	1.2E-03
Fluorene	RS296	-	-	-	5.7E-04	9.4E-03	9.4E-03
Indeno(1,2,3-cd)pyrene	RS296	-	-	-	2.4E-05	4.0E-04	4.0E-04
Naphthalene	RS296	-	-	-	6.9E-03	3.8E-02	3.8E-02
Perylene	RS296	-	-	-	1.2E-04	1.9E-03	1.9E-03
Phenanthrene	RS296	-	-	-	1.5E-03	2.5E-02	2.5E-02
Pyrene	RS296	-	-	-	1.4E-04	2.2E-03	2.2E-03
C08-C11 (Gasoline Range)	RS297	1.20E+01	6.0E+00	U		-	-
C11-C14 (Kerosene Range)	RS297	1.20E+01	6.0E+00	U		-	-
C14-C20 (Diesel Range)	RS297	1.20E+01	6.0E+00	U		-	-
C20-C30 (Lubricant Oil Range)	RS297	1.20E+01	6.0E+00	U		-	-
C11-C30	RS297	-	1.8E+01	-		-	-
Benzene	RS297	-	-	-	1.2E-04	7.2E-04	7.2E-04
Ethylbenzene	RS297	-	-	-	1.2E-04	7.2E-04	7.2E-04
Toluene	RS297	-	-	-	1.2E-04	7.2E-04	7.2E-04
m,p-Xylene	RS297	-	-	-	3.6E-04	2.2E-03	2.2E-03
o-Xylene	RS297	-	-	-	8.0E-05	4.8E-04	4.8E-04
Xylene (total)	RS297	-	-	-	4.4E-04	2.6E-03	2.6E-03
2-Methylnaphthalene	RS297	-	-	-	2.8E-02	1.7E-01	1.7E-01
Acenaphthene	RS297	-	-	-	5.7E-04	1.0E-02	1.0E-02
Acenaphthylene	RS297	-	-	-	7.0E-05	1.3E-03	1.3E-03
Anthracene	RS297	-	-	-	3.7E-04	6.7E-03	6.7E-03
Benzo(a)anthracene	RS297	-	-	-	2.7E-05	4.9E-04	4.9E-04
Benzo(a)pyrene	RS297	-	-	-	2.7E-05	4.9E-04	4.9E-04
Benzo(b)fluoranthene	RS297	-	-	-	4.3E-05	7.8E-04	7.8E-04
Benzo(e)pyrene	RS297	-	-	-	2.1E-04	3.7E-03	3.7E-03
Benzo(g,h,i)perylene	RS297	-	-	-	2.2E-04	4.0E-03	4.0E-03
Benzo(k)fluoranthene	RS297	-	-	-	2.1E-05	3.7E-04	3.7E-04
Chrysene	RS297	-	-	-	5.9E-05	1.1E-03	1.1E-03
Dibenz(a,h)anthracene	RS297	-	-	-	1.1E-05	2.0E-04	2.0E-04
Fluoranthene	RS297	-	-	-	7.5E-05	1.3E-03	1.3E-03
Fluorene	RS297	-	-	-	5.7E-04	1.0E-02	1.0E-02
Indeno(1,2,3-cd)pyrene	RS297	-	-	-	2.4E-05	4.3E-04	4.3E-04
Naphthalene	RS297	-	-	-	6.9E-03	4.2E-02	4.2E-02

TPH to Petroleum Constituent Extrapolation for Soil (0-10 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Perylene	RS297	-	-	-	1.2E-04	2.1E-03	2.1E-03
Phenanthrene	RS297	-	-	-	1.5E-03	2.8E-02	2.8E-02
Pyrene	RS297	-	-	-	1.4E-04	2.5E-03	2.5E-03
C08-C11 (Gasoline Range)	RS298	1.20E+01	6.0E+00	U		-	-
C11-C14 (Kerosene Range)	RS298	1.20E+01	6.0E+00	U		-	-
C14-C20 (Diesel Range)	RS298	1.20E+01	6.0E+00	U		-	-
C20-C30 (Lubricant Oil Range)	RS298	1.20E+01	6.0E+00	U		-	-
C11-C30	RS298	-	1.8E+01	-		-	-
Benzene	RS298	-	-	-	1.2E-04	7.2E-04	7.2E-04
Ethylbenzene	RS298	-	-	-	1.2E-04	7.2E-04	7.2E-04
Toluene	RS298	-	-	-	1.2E-04	7.2E-04	7.2E-04
m,p-Xylene	RS298	-	-	-	3.6E-04	2.2E-03	2.2E-03
o-Xylene	RS298	-	-	-	8.0E-05	4.8E-04	4.8E-04
Xylene (total)	RS298	-	-	-	4.4E-04	2.6E-03	2.6E-03
2-Methylnaphthalene	RS298	-	-	-	2.8E-02	1.7E-01	1.7E-01
Acenaphthene	RS298	-	-	-	5.7E-04	1.0E-02	1.0E-02
Acenaphthylene	RS298	-	-	-	7.0E-05	1.3E-03	1.3E-03
Anthracene	RS298	-	-	-	3.7E-04	6.7E-03	6.7E-03
Benzo(a)anthracene	RS298	-	-	-	2.7E-05	4.9E-04	4.9E-04
Benzo(a)pyrene	RS298	-	-	-	2.7E-05	4.9E-04	4.9E-04
Benzo(b)fluoranthene	RS298	-	-	-	4.3E-05	7.8E-04	7.8E-04
Benzo(e)pyrene	RS298	-	-	-	2.1E-04	3.7E-03	3.7E-03
Benzo(g,h,i)perylene	RS298	-	-	-	2.2E-04	4.0E-03	4.0E-03
Benzo(k)fluoranthene	RS298	-	-	-	2.1E-05	3.7E-04	3.7E-04
Chrysene	RS298	-	-	-	5.9E-05	1.1E-03	1.1E-03
Dibenz(a,h)anthracene	RS298	-	-	-	1.1E-05	2.0E-04	2.0E-04
Fluoranthene	RS298	-	-	-	7.5E-05	1.3E-03	1.3E-03
Fluorene	RS298	-	-	-	5.7E-04	1.0E-02	1.0E-02
Indeno(1,2,3-cd)pyrene	RS298	-	-	-	2.4E-05	4.3E-04	4.3E-04
Naphthalene	RS298	-	-	-	6.9E-03	4.2E-02	4.2E-02
Perylene	RS298	-	-	-	1.2E-04	2.1E-03	2.1E-03
Phenanthrene	RS298	-	-	-	1.5E-03	2.8E-02	2.8E-02
Pyrene	RS298	-	-	-	1.4E-04	2.5E-03	2.5E-03
C08-C11 (Gasoline Range)	RS302	1.20E+01	6.0E+00	U		-	-
C11-C14 (Kerosene Range)	RS302	1.20E+01	6.0E+00	U		-	-
C14-C20 (Diesel Range)	RS302	1.20E+01	6.0E+00	U		-	-
C20-C30 (Lubricant Oil Range)	RS302	1.20E+01	6.0E+00	U		-	-
C11-C30	RS302	-	1.8E+01	-		-	-
Benzene	RS302	6.00E-03	3.0E-03	U	1.2E-04	7.2E-04	7.2E-04
Ethylbenzene	RS302	6.00E-03	3.0E-03	U	1.2E-04	7.2E-04	7.2E-04
Toluene	RS302	6.00E-03	3.0E-03	U	1.2E-04	7.2E-04	7.2E-04
m,p-Xylene	RS302	6.00E-03	3.0E-03	U	3.6E-04	2.2E-03	2.2E-03
o-Xylene	RS302	6.00E-03	3.0E-03	U	8.0E-05	4.8E-04	4.8E-04
Xylene (total)	RS302	-	-	-	4.4E-04	2.6E-03	2.6E-03
2-Methylnaphthalene	RS302	-	-	-	2.8E-02	1.7E-01	1.7E-01
Acenaphthene	RS302	3.60E-02	1.8E-02	U	5.7E-04	1.0E-02	1.0E-02
Acenaphthylene	RS302	3.60E-02	1.8E-02	U	7.0E-05	1.3E-03	1.3E-03
Anthracene	RS302	3.60E-02	1.8E-02	U	3.7E-04	6.7E-03	6.7E-03
Benzo(a)anthracene	RS302	3.60E-02	1.8E-02	U	2.7E-05	4.9E-04	4.9E-04
Benzo(a)pyrene	RS302	3.60E-02	1.8E-02	U	2.7E-05	4.9E-04	4.9E-04
Benzo(b)fluoranthene	RS302	3.60E-02	1.8E-02	U	4.3E-05	7.8E-04	7.8E-04
Benzo(e)pyrene	RS302	-	-	-	2.1E-04	3.7E-03	3.7E-03
Benzo(g,h,i)perylene	RS302	3.60E-02	1.8E-02	U	2.2E-04	4.0E-03	4.0E-03
Benzo(k)fluoranthene	RS302	3.60E-02	1.8E-02	U	2.1E-05	3.7E-04	3.7E-04
Chrysene	RS302	3.60E-02	1.8E-02	U	5.9E-05	1.1E-03	1.1E-03
Dibenz(a,h)anthracene	RS302	3.60E-02	1.8E-02	U	1.1E-05	2.0E-04	2.0E-04

TPH to Petroleum Constituent Extrapolation for Soil (0-10 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Fluoranthene	RS302	3.60E-02	1.8E-02	U	7.5E-05	1.3E-03	1.3E-03
Fluorene	RS302	3.60E-02	1.8E-02	U	5.7E-04	1.0E-02	1.0E-02
Indeno(1,2,3-cd)pyrene	RS302	3.60E-02	1.8E-02	U	2.4E-05	4.3E-04	4.3E-04
Naphthalene	RS302	3.60E-02	1.8E-02	U	6.9E-03	4.2E-02	1.8E-02
Perylene	RS302	-	-	-	1.2E-04	2.1E-03	2.1E-03
Phenanthrene	RS302	3.60E-02	1.8E-02	U	1.5E-03	2.8E-02	1.8E-02
Pyrene	RS302	3.60E-02	1.8E-02	U	1.4E-04	2.5E-03	2.5E-03
C08-C11 (Gasoline Range)	RS303	1.10E+01	5.5E+00	U		-	-
C11-C14 (Kerosene Range)	RS303	1.10E+01	5.5E+00	U		-	-
C14-C20 (Diesel Range)	RS303	1.10E+01	5.5E+00	U		-	-
C20-C30 (Lubricant Oil Range)	RS303	1.10E+01	5.5E+00	U		-	-
C11-C30	RS303	-	1.7E+01	-		-	-
Benzene	RS303	-	-	-	1.2E-04	6.6E-04	6.6E-04
Ethylbenzene	RS303	-	-	-	1.2E-04	6.6E-04	6.6E-04
Toluene	RS303	-	-	-	1.2E-04	6.6E-04	6.6E-04
m,p-Xylene	RS303	-	-	-	3.6E-04	2.0E-03	2.0E-03
o-Xylene	RS303	-	-	-	8.0E-05	4.4E-04	4.4E-04
Xylene (total)	RS303	-	-	-	4.4E-04	2.4E-03	2.4E-03
2-Methylnaphthalene	RS303	-	-	-	2.8E-02	1.5E-01	1.5E-01
Acenaphthene	RS303	-	-	-	5.7E-04	9.5E-03	9.5E-03
Acenaphthylene	RS303	-	-	-	7.0E-05	1.2E-03	1.2E-03
Anthracene	RS303	-	-	-	3.7E-04	6.2E-03	6.2E-03
Benzo(a)anthracene	RS303	-	-	-	2.7E-05	4.4E-04	4.4E-04
Benzo(a)pyrene	RS303	-	-	-	2.7E-05	4.5E-04	4.5E-04
Benzo(b)fluoranthene	RS303	-	-	-	4.3E-05	7.1E-04	7.1E-04
Benzo(e)pyrene	RS303	-	-	-	2.1E-04	3.4E-03	3.4E-03
Benzo(g,h,i)perylene	RS303	-	-	-	2.2E-04	3.6E-03	3.6E-03
Benzo(k)fluoranthene	RS303	-	-	-	2.1E-05	3.4E-04	3.4E-04
Chrysene	RS303	-	-	-	5.9E-05	9.7E-04	9.7E-04
Dibenz(a,h)anthracene	RS303	-	-	-	1.1E-05	1.8E-04	1.8E-04
Fluoranthene	RS303	-	-	-	7.5E-05	1.2E-03	1.2E-03
Fluorene	RS303	-	-	-	5.7E-04	9.4E-03	9.4E-03
Indeno(1,2,3-cd)pyrene	RS303	-	-	-	2.4E-05	4.0E-04	4.0E-04
Naphthalene	RS303	-	-	-	6.9E-03	3.8E-02	3.8E-02
Perylene	RS303	-	-	-	1.2E-04	1.9E-03	1.9E-03
Phenanthrene	RS303	-	-	-	1.5E-03	2.5E-02	2.5E-02
Pyrene	RS303	-	-	-	1.4E-04	2.2E-03	2.2E-03
C08-C11 (Gasoline Range)	RS321	1.10E+01	5.5E+00	U		-	-
C11-C14 (Kerosene Range)	RS321	1.10E+01	5.5E+00	U		-	-
C14-C20 (Diesel Range)	RS321	1.10E+01	5.5E+00	U		-	-
C20-C30 (Lubricant Oil Range)	RS321	1.10E+01	5.5E+00	U		-	-
C11-C30	RS321	-	1.7E+01	-		-	-
Benzene	RS321	-	-	-	1.2E-04	6.6E-04	6.6E-04
Ethylbenzene	RS321	-	-	-	1.2E-04	6.6E-04	6.6E-04
Toluene	RS321	-	-	-	1.2E-04	6.6E-04	6.6E-04
m,p-Xylene	RS321	-	-	-	3.6E-04	2.0E-03	2.0E-03
o-Xylene	RS321	-	-	-	8.0E-05	4.4E-04	4.4E-04
Xylene (total)	RS321	-	-	-	4.4E-04	2.4E-03	2.4E-03
2-Methylnaphthalene	RS321	-	-	-	2.8E-02	1.5E-01	1.5E-01
Acenaphthene	RS321	-	-	-	5.7E-04	9.5E-03	9.5E-03
Acenaphthylene	RS321	-	-	-	7.0E-05	1.2E-03	1.2E-03
Anthracene	RS321	-	-	-	3.7E-04	6.2E-03	6.2E-03
Benzo(a)anthracene	RS321	-	-	-	2.7E-05	4.4E-04	4.4E-04
Benzo(a)pyrene	RS321	-	-	-	2.7E-05	4.5E-04	4.5E-04
Benzo(b)fluoranthene	RS321	-	-	-	4.3E-05	7.1E-04	7.1E-04
Benzo(e)pyrene	RS321	-	-	-	2.1E-04	3.4E-03	3.4E-03

TPH to Petroleum Constituent Extrapolation for Soil (0-10 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Benzo(g,h,i)perylene	RS321	-	-	-	2.2E-04	3.6E-03	3.6E-03
Benzo(k)fluoranthene	RS321	-	-	-	2.1E-05	3.4E-04	3.4E-04
Chrysene	RS321	-	-	-	5.9E-05	9.7E-04	9.7E-04
Dibenz(a,h)anthracene	RS321	-	-	-	1.1E-05	1.8E-04	1.8E-04
Fluoranthene	RS321	-	-	-	7.5E-05	1.2E-03	1.2E-03
Fluorene	RS321	-	-	-	5.7E-04	9.4E-03	9.4E-03
Indeno(1,2,3-cd)pyrene	RS321	-	-	-	2.4E-05	4.0E-04	4.0E-04
Naphthalene	RS321	-	-	-	6.9E-03	3.8E-02	3.8E-02
Perylene	RS321	-	-	-	1.2E-04	1.9E-03	1.9E-03
Phenanthrene	RS321	-	-	-	1.5E-03	2.5E-02	2.5E-02
Pyrene	RS321	-	-	-	1.4E-04	2.2E-03	2.2E-03
C08-C11 (Gasoline Range)	RS581	1.40E+01	7.0E+00	UJ		-	-
C11-C14 (Kerosene Range)	RS581	1.40E+01	7.0E+00	UJ		-	-
C14-C20 (Diesel Range)	RS581	1.40E+01	7.0E+00	UJ		-	-
C20-C30 (Lubricant Oil Range)	RS581	1.40E+01	7.0E+00	UJ		-	-
C11-C30	RS581	-	2.1E+01	-		-	-
Benzene	RS581	-	-	-	1.2E-04	8.4E-04	8.4E-04
Ethylbenzene	RS581	-	-	-	1.2E-04	8.4E-04	8.4E-04
Toluene	RS581	-	-	-	1.2E-04	8.4E-04	8.4E-04
m,p-Xylene	RS581	-	-	-	3.6E-04	2.5E-03	2.5E-03
o-Xylene	RS581	-	-	-	8.0E-05	5.6E-04	5.6E-04
Xylene (total)	RS581	-	-	-	4.4E-04	3.1E-03	3.1E-03
2-Methylnaphthalene	RS581	-	-	-	2.8E-02	1.9E-01	1.9E-01
Acenaphthene	RS581	-	-	-	5.7E-04	1.2E-02	1.2E-02
Acenaphthylene	RS581	-	-	-	7.0E-05	1.5E-03	1.5E-03
Anthracene	RS581	-	-	-	3.7E-04	7.8E-03	7.8E-03
Benzo(a)anthracene	RS581	-	-	-	2.7E-05	5.7E-04	5.7E-04
Benzo(a)pyrene	RS581	-	-	-	2.7E-05	5.7E-04	5.7E-04
Benzo(b)fluoranthene	RS581	-	-	-	4.3E-05	9.1E-04	9.1E-04
Benzo(e)pyrene	RS581	-	-	-	2.1E-04	4.3E-03	4.3E-03
Benzo(g,h,i)perylene	RS581	-	-	-	2.2E-04	4.6E-03	4.6E-03
Benzo(k)fluoranthene	RS581	-	-	-	2.1E-05	4.3E-04	4.3E-04
Chrysene	RS581	-	-	-	5.9E-05	1.2E-03	1.2E-03
Dibenz(a,h)anthracene	RS581	-	-	-	1.1E-05	2.3E-04	2.3E-04
Fluoranthene	RS581	-	-	-	7.5E-05	1.6E-03	1.6E-03
Fluorene	RS581	-	-	-	5.7E-04	1.2E-02	1.2E-02
Indeno(1,2,3-cd)pyrene	RS581	-	-	-	2.4E-05	5.1E-04	5.1E-04
Naphthalene	RS581	-	-	-	6.9E-03	4.9E-02	4.9E-02
Perylene	RS581	-	-	-	1.2E-04	2.5E-03	2.5E-03
Phenanthrene	RS581	-	-	-	1.5E-03	3.2E-02	3.2E-02
Pyrene	RS581	-	-	-	1.4E-04	2.9E-03	2.9E-03
C08-C11 (Gasoline Range)	RS668	1.30E+01	6.5E+00	UJ		-	-
C11-C14 (Kerosene Range)	RS668	1.30E+01	6.5E+00	UJ		-	-
C14-C20 (Diesel Range)	RS668	1.30E+01	6.5E+00	UJ		-	-
C20-C30 (Lubricant Oil Range)	RS668	1.30E+01	6.5E+00	UJ		-	-
C11-C30	RS668	-	2.0E+01	-		-	-
Benzene	RS668	-	-	-	1.2E-04	7.8E-04	7.8E-04
Ethylbenzene	RS668	-	-	-	1.2E-04	7.8E-04	7.8E-04
Toluene	RS668	-	-	-	1.2E-04	7.8E-04	7.8E-04
m,p-Xylene	RS668	-	-	-	3.6E-04	2.3E-03	2.3E-03
o-Xylene	RS668	-	-	-	8.0E-05	5.2E-04	5.2E-04
Xylene (total)	RS668	-	-	-	4.4E-04	2.9E-03	2.9E-03
2-Methylnaphthalene	RS668	-	-	-	2.8E-02	1.8E-01	1.8E-01
Acenaphthene	RS668	-	-	-	5.7E-04	1.1E-02	1.1E-02
Acenaphthylene	RS668	-	-	-	7.0E-05	1.4E-03	1.4E-03
Anthracene	RS668	-	-	-	3.7E-04	7.3E-03	7.3E-03

TPH to Petroleum Constituent Extrapolation for Soil (0-10 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Benzo(a)anthracene	RS668	-	-	-	2.7E-05	5.3E-04	5.3E-04
Benzo(a)pyrene	RS668	-	-	-	2.7E-05	5.3E-04	5.3E-04
Benzo(b)fluoranthene	RS668	-	-	-	4.3E-05	8.4E-04	8.4E-04
Benzo(e)pyrene	RS668	-	-	-	2.1E-04	4.0E-03	4.0E-03
Benzo(g,h,i)perylene	RS668	-	-	-	2.2E-04	4.3E-03	4.3E-03
Benzo(k)fluoranthene	RS668	-	-	-	2.1E-05	4.0E-04	4.0E-04
Chrysene	RS668	-	-	-	5.9E-05	1.1E-03	1.1E-03
Dibenz(a,h)anthracene	RS668	-	-	-	1.1E-05	2.2E-04	2.2E-04
Fluoranthene	RS668	-	-	-	7.5E-05	1.5E-03	1.5E-03
Fluorene	RS668	-	-	-	5.7E-04	1.1E-02	1.1E-02
Indeno(1,2,3-cd)pyrene	RS668	-	-	-	2.4E-05	4.7E-04	4.7E-04
Naphthalene	RS668	-	-	-	6.9E-03	4.5E-02	4.5E-02
Perylene	RS668	-	-	-	1.2E-04	2.3E-03	2.3E-03
Phenanthrene	RS668	-	-	-	1.5E-03	3.0E-02	3.0E-02
Pyrene	RS668	-	-	-	1.4E-04	2.7E-03	2.7E-03
C08-C11 (Gasoline Range)	RS669	1.20E+01	6.0E+00	UJ		-	-
C11-C14 (Kerosene Range)	RS669	1.20E+01	6.0E+00	UJ		-	-
C14-C20 (Diesel Range)	RS669	1.20E+01	6.0E+00	UJ		-	-
C20-C30 (Lubricant Oil Range)	RS669	1.20E+01	6.0E+00	UJ		-	-
C11-C30	RS669	-	1.8E+01	-		-	-
Benzene	RS669	-	-	-	1.2E-04	7.2E-04	7.2E-04
Ethylbenzene	RS669	-	-	-	1.2E-04	7.2E-04	7.2E-04
Toluene	RS669	-	-	-	1.2E-04	7.2E-04	7.2E-04
m,p-Xylene	RS669	-	-	-	3.6E-04	2.2E-03	2.2E-03
o-Xylene	RS669	-	-	-	8.0E-05	4.8E-04	4.8E-04
Xylene (total)	RS669	-	-	-	4.4E-04	2.6E-03	2.6E-03
2-Methylnaphthalene	RS669	-	-	-	2.8E-02	1.7E-01	1.7E-01
Acenaphthene	RS669	-	-	-	5.7E-04	1.0E-02	1.0E-02
Acenaphthylene	RS669	-	-	-	7.0E-05	1.3E-03	1.3E-03
Anthracene	RS669	-	-	-	3.7E-04	6.7E-03	6.7E-03
Benzo(a)anthracene	RS669	-	-	-	2.7E-05	4.9E-04	4.9E-04
Benzo(a)pyrene	RS669	-	-	-	2.7E-05	4.9E-04	4.9E-04
Benzo(b)fluoranthene	RS669	-	-	-	4.3E-05	7.8E-04	7.8E-04
Benzo(e)pyrene	RS669	-	-	-	2.1E-04	3.7E-03	3.7E-03
Benzo(g,h,i)perylene	RS669	-	-	-	2.2E-04	4.0E-03	4.0E-03
Benzo(k)fluoranthene	RS669	-	-	-	2.1E-05	3.7E-04	3.7E-04
Chrysene	RS669	-	-	-	5.9E-05	1.1E-03	1.1E-03
Dibenz(a,h)anthracene	RS669	-	-	-	1.1E-05	2.0E-04	2.0E-04
Fluoranthene	RS669	-	-	-	7.5E-05	1.3E-03	1.3E-03
Fluorene	RS669	-	-	-	5.7E-04	1.0E-02	1.0E-02
Indeno(1,2,3-cd)pyrene	RS669	-	-	-	2.4E-05	4.3E-04	4.3E-04
Naphthalene	RS669	-	-	-	6.9E-03	4.2E-02	4.2E-02
Perylene	RS669	-	-	-	1.2E-04	2.1E-03	2.1E-03
Phenanthrene	RS669	-	-	-	1.5E-03	2.8E-02	2.8E-02
Pyrene	RS669	-	-	-	1.4E-04	2.5E-03	2.5E-03
C08-C11 (Gasoline Range)	RS670	1.10E+01	5.5E+00	UJ		-	-
C11-C14 (Kerosene Range)	RS670	1.10E+01	5.5E+00	UJ		-	-
C14-C20 (Diesel Range)	RS670	1.10E+01	5.5E+00	UJ		-	-
C20-C30 (Lubricant Oil Range)	RS670	1.10E+01	5.5E+00	UJ		-	-
C11-C30	RS670	-	1.7E+01	-		-	-
Benzene	RS670	-	-	-	1.2E-04	6.6E-04	6.6E-04
Ethylbenzene	RS670	-	-	-	1.2E-04	6.6E-04	6.6E-04
Toluene	RS670	-	-	-	1.2E-04	6.6E-04	6.6E-04
m,p-Xylene	RS670	-	-	-	3.6E-04	2.0E-03	2.0E-03
o-Xylene	RS670	-	-	-	8.0E-05	4.4E-04	4.4E-04
Xylene (total)	RS670	-	-	-	4.4E-04	2.4E-03	2.4E-03

TPH to Petroleum Constituent Extrapolation for Soil (0-10 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
2-Methylnaphthalene	RS670	-	-	-	2.8E-02	1.5E-01	1.5E-01
Acenaphthene	RS670	-	-	-	5.7E-04	9.5E-03	9.5E-03
Acenaphthylene	RS670	-	-	-	7.0E-05	1.2E-03	1.2E-03
Anthracene	RS670	-	-	-	3.7E-04	6.2E-03	6.2E-03
Benzo(a)anthracene	RS670	-	-	-	2.7E-05	4.4E-04	4.4E-04
Benzo(a)pyrene	RS670	-	-	-	2.7E-05	4.5E-04	4.5E-04
Benzo(b)fluoranthene	RS670	-	-	-	4.3E-05	7.1E-04	7.1E-04
Benzo(e)pyrene	RS670	-	-	-	2.1E-04	3.4E-03	3.4E-03
Benzo(g,h,i)perylene	RS670	-	-	-	2.2E-04	3.6E-03	3.6E-03
Benzo(k)fluoranthene	RS670	-	-	-	2.1E-05	3.4E-04	3.4E-04
Chrysene	RS670	-	-	-	5.9E-05	9.7E-04	9.7E-04
Dibenz(a,h)anthracene	RS670	-	-	-	1.1E-05	1.8E-04	1.8E-04
Fluoranthene	RS670	-	-	-	7.5E-05	1.2E-03	1.2E-03
Fluorene	RS670	-	-	-	5.7E-04	9.4E-03	9.4E-03
Indeno(1,2,3-cd)pyrene	RS670	-	-	-	2.4E-05	4.0E-04	4.0E-04
Naphthalene	RS670	-	-	-	6.9E-03	3.8E-02	3.8E-02
Perylene	RS670	-	-	-	1.2E-04	1.9E-03	1.9E-03
Phenanthrene	RS670	-	-	-	1.5E-03	2.5E-02	2.5E-02
Pyrene	RS670	-	-	-	1.4E-04	2.2E-03	2.2E-03
C08-C11 (Gasoline Range)	RS671DL	1.09E+02	5.5E+01	UJ		-	-
C11-C14 (Kerosene Range)	RS671DL	1.09E+02	5.5E+01	UJ		-	-
C14-C20 (Diesel Range)	RS671DL	1.10E+03	1.1E+03	J		-	-
C20-C30 (Lubricant Oil Range)	RS671DL	8.30E+03	8.3E+03	J		-	-
C11-C30	RS671DL	-	9.5E+03	-		-	-
Benzene	RS671DL	-	-	-	1.2E-04	6.5E-03	6.5E-03
Ethylbenzene	RS671DL	-	-	-	1.2E-04	6.5E-03	6.5E-03
Toluene	RS671DL	-	-	-	1.2E-04	6.5E-03	6.5E-03
m,p-Xylene	RS671DL	-	-	-	3.6E-04	2.0E-02	2.0E-02
o-Xylene	RS671DL	-	-	-	8.0E-05	4.4E-03	4.4E-03
Xylene (total)	RS671DL	-	-	-	4.4E-04	2.4E-02	2.4E-02
2-Methylnaphthalene	RS671DL	-	-	-	2.8E-02	1.5E+00	1.5E+00
Acenaphthene	RS671DL	-	-	-	5.7E-04	5.4E+00	5.4E+00
Acenaphthylene	RS671DL	-	-	-	7.0E-05	6.6E-01	6.6E-01
Anthracene	RS671DL	-	-	-	3.7E-04	3.5E+00	3.5E+00
Benzo(a)anthracene	RS671DL	-	-	-	2.7E-05	2.5E-01	2.5E-01
Benzo(a)pyrene	RS671DL	-	-	-	2.7E-05	2.6E-01	2.6E-01
Benzo(b)fluoranthene	RS671DL	-	-	-	4.3E-05	4.1E-01	4.1E-01
Benzo(e)pyrene	RS671DL	-	-	-	2.1E-04	2.0E+00	2.0E+00
Benzo(g,h,i)perylene	RS671DL	-	-	-	2.2E-04	2.1E+00	2.1E+00
Benzo(k)fluoranthene	RS671DL	-	-	-	2.1E-05	1.9E-01	1.9E-01
Chrysene	RS671DL	-	-	-	5.9E-05	5.5E-01	5.5E-01
Dibenz(a,h)anthracene	RS671DL	-	-	-	1.1E-05	1.0E-01	1.0E-01
Fluoranthene	RS671DL	-	-	-	7.5E-05	7.1E-01	7.1E-01
Fluorene	RS671DL	-	-	-	5.7E-04	5.4E+00	5.4E+00
Indeno(1,2,3-cd)pyrene	RS671DL	-	-	-	2.4E-05	2.3E-01	2.3E-01
Naphthalene	RS671DL	-	-	-	6.9E-03	3.8E-01	3.8E-01
Perylene	RS671DL	-	-	-	1.2E-04	1.1E+00	1.1E+00
Phenanthrene	RS671DL	-	-	-	1.5E-03	1.4E+01	1.4E+01
Pyrene	RS671DL	-	-	-	1.4E-04	1.3E+00	1.3E+00
C08-C11 (Gasoline Range)	RS806	1.10E+01	5.5E+00	UJ		-	-
C11-C14 (Kerosene Range)	RS806	1.10E+01	5.5E+00	UJ		-	-
C14-C20 (Diesel Range)	RS806	1.10E+01	5.5E+00	UJ		-	-
C20-C30 (Lubricant Oil Range)	RS806	1.10E+01	5.5E+00	UJ		-	-
C11-C30	RS806	-	1.7E+01	-		-	-
Benzene	RS806	-	-	-	1.2E-04	6.6E-04	6.6E-04
Ethylbenzene	RS806	-	-	-	1.2E-04	6.6E-04	6.6E-04

TPH to Petroleum Constituent Extrapolation for Soil (0-10 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Toluene	RS806	-	-	-	1.2E-04	6.6E-04	6.6E-04
m,p-Xylene	RS806	-	-	-	3.6E-04	2.0E-03	2.0E-03
o-Xylene	RS806	-	-	-	8.0E-05	4.4E-04	4.4E-04
Xylene (total)	RS806	-	-	-	4.4E-04	2.4E-03	2.4E-03
2-Methylnaphthalene	RS806	-	-	-	2.8E-02	1.5E-01	1.5E-01
Acenaphthene	RS806	-	-	-	5.7E-04	9.5E-03	9.5E-03
Acenaphthylene	RS806	-	-	-	7.0E-05	1.2E-03	1.2E-03
Anthracene	RS806	-	-	-	3.7E-04	6.2E-03	6.2E-03
Benzo(a)anthracene	RS806	-	-	-	2.7E-05	4.4E-04	4.4E-04
Benzo(a)pyrene	RS806	-	-	-	2.7E-05	4.5E-04	4.5E-04
Benzo(b)fluoranthene	RS806	-	-	-	4.3E-05	7.1E-04	7.1E-04
Benzo(e)pyrene	RS806	-	-	-	2.1E-04	3.4E-03	3.4E-03
Benzo(g,h,i)perylene	RS806	-	-	-	2.2E-04	3.6E-03	3.6E-03
Benzo(k)fluoranthene	RS806	-	-	-	2.1E-05	3.4E-04	3.4E-04
Chrysene	RS806	-	-	-	5.9E-05	9.7E-04	9.7E-04
Dibenz(a,h)anthracene	RS806	-	-	-	1.1E-05	1.8E-04	1.8E-04
Fluoranthene	RS806	-	-	-	7.5E-05	1.2E-03	1.2E-03
Fluorene	RS806	-	-	-	5.7E-04	9.4E-03	9.4E-03
Indeno(1,2,3-cd)pyrene	RS806	-	-	-	2.4E-05	4.0E-04	4.0E-04
Naphthalene	RS806	-	-	-	6.9E-03	3.8E-02	3.8E-02
Perylene	RS806	-	-	-	1.2E-04	1.9E-03	1.9E-03
Phenanthrene	RS806	-	-	-	1.5E-03	2.5E-02	2.5E-02
Pyrene	RS806	-	-	-	1.4E-04	2.2E-03	2.2E-03
C08-C11 (Gasoline Range)	RS878	1.00E+01	5.0E+00	UJ		-	-
C11-C14 (Kerosene Range)	RS878	1.00E+01	5.0E+00	UJ		-	-
C14-C20 (Diesel Range)	RS878	1.00E+01	5.0E+00	UJ		-	-
C20-C30 (Lubricant Oil Range)	RS878	1.00E+01	5.0E+00	UJ		-	-
C11-C30	RS878	-	1.5E+01	-		-	-
Benzene	RS878	-	-	-	1.2E-04	6.0E-04	6.0E-04
Ethylbenzene	RS878	-	-	-	1.2E-04	6.0E-04	6.0E-04
Toluene	RS878	-	-	-	1.2E-04	6.0E-04	6.0E-04
m,p-Xylene	RS878	-	-	-	3.6E-04	1.8E-03	1.8E-03
o-Xylene	RS878	-	-	-	8.0E-05	4.0E-04	4.0E-04
Xylene (total)	RS878	-	-	-	4.4E-04	2.2E-03	2.2E-03
2-Methylnaphthalene	RS878	-	-	-	2.8E-02	1.4E-01	1.4E-01
Acenaphthene	RS878	3.10E-02	1.6E-02	U	5.7E-04	8.6E-03	8.6E-03
Acenaphthylene	RS878	3.10E-02	1.6E-02	U	7.0E-05	1.1E-03	1.1E-03
Anthracene	RS878	3.10E-02	1.6E-02	U	3.7E-04	5.6E-03	5.6E-03
Benzo(a)anthracene	RS878	3.10E-02	1.6E-02	U	2.7E-05	4.0E-04	4.0E-04
Benzo(a)pyrene	RS878	3.10E-02	1.6E-02	U	2.7E-05	4.1E-04	4.1E-04
Benzo(b)fluoranthene	RS878	3.10E-02	1.6E-02	U	4.3E-05	6.5E-04	6.5E-04
Benzo(e)pyrene	RS878	-	-	-	2.1E-04	3.1E-03	3.1E-03
Benzo(g,h,i)perylene	RS878	3.10E-02	1.6E-02	U	2.2E-04	3.3E-03	3.3E-03
Benzo(k)fluoranthene	RS878	3.10E-02	1.6E-02	U	2.1E-05	3.1E-04	3.1E-04
Chrysene	RS878	3.10E-02	1.6E-02	U	5.9E-05	8.8E-04	8.8E-04
Dibenz(a,h)anthracene	RS878	3.10E-02	1.6E-02	U	1.1E-05	1.7E-04	1.7E-04
Fluoranthene	RS878	3.10E-02	1.6E-02	U	7.5E-05	1.1E-03	1.1E-03
Fluorene	RS878	3.10E-02	1.6E-02	U	5.7E-04	8.5E-03	8.5E-03
Indeno(1,2,3-cd)pyrene	RS878	3.10E-02	1.6E-02	U	2.4E-05	3.6E-04	3.6E-04
Naphthalene	RS878	3.10E-02	1.6E-02	U	6.9E-03	3.5E-02	1.6E-02
Perylene	RS878	-	-	-	1.2E-04	1.8E-03	1.8E-03
Phenanthrene	RS878	3.10E-02	1.6E-02	U	1.5E-03	2.3E-02	1.6E-02
Pyrene	RS878	3.10E-02	1.6E-02	U	1.4E-04	2.0E-03	2.0E-03
C08-C11 (Gasoline Range)	RS879	1.00E+01	5.0E+00	UJ		-	-
C11-C14 (Kerosene Range)	RS879	1.00E+01	5.0E+00	UJ		-	-
C14-C20 (Diesel Range)	RS879	1.00E+01	5.0E+00	UJ		-	-

TPH to Petroleum Constituent Extrapolation for Soil (0-10 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
C20-C30 (Lubricant Oil Range)	RS879	1.00E+01	5.0E+00	UJ		-	-
C11-C30	RS879	-	1.5E+01	-		-	-
Benzene	RS879	1.00E-02	5.0E-03	U	1.2E-04	6.0E-04	6.0E-04
Ethylbenzene	RS879	1.00E-02	5.0E-03	U	1.2E-04	6.0E-04	6.0E-04
Toluene	RS879	1.00E-02	5.0E-03	U	1.2E-04	6.0E-04	6.0E-04
m,p-Xylene	RS879	1.00E-02	5.0E-03	U	3.6E-04	1.8E-03	1.8E-03
o-Xylene	RS879	1.00E-02	5.0E-03	U	8.0E-05	4.0E-04	4.0E-04
Xylene (total)	RS879	-	-	-	4.4E-04	2.2E-03	2.2E-03
2-Methylnaphthalene	RS879	-	-	-	2.8E-02	1.4E-01	1.4E-01
Acenaphthene	RS879	3.10E-02	1.6E-02	U	5.7E-04	8.6E-03	8.6E-03
Acenaphthylene	RS879	3.10E-02	1.6E-02	U	7.0E-05	1.1E-03	1.1E-03
Anthracene	RS879	3.10E-02	1.6E-02	U	3.7E-04	5.6E-03	5.6E-03
Benzo(a)anthracene	RS879	3.10E-02	1.6E-02	U	2.7E-05	4.0E-04	4.0E-04
Benzo(a)pyrene	RS879	3.10E-02	1.6E-02	U	2.7E-05	4.1E-04	4.1E-04
Benzo(b)fluoranthene	RS879	3.10E-02	1.6E-02	U	4.3E-05	6.5E-04	6.5E-04
Benzo(e)pyrene	RS879	-	-	-	2.1E-04	3.1E-03	3.1E-03
Benzo(g,h,i)perylene	RS879	3.10E-02	1.6E-02	U	2.2E-04	3.3E-03	3.3E-03
Benzo(k)fluoranthene	RS879	3.10E-02	1.6E-02	U	2.1E-05	3.1E-04	3.1E-04
Chrysene	RS879	3.10E-02	1.6E-02	U	5.9E-05	8.8E-04	8.8E-04
Dibenz(a,h)anthracene	RS879	3.10E-02	1.6E-02	U	1.1E-05	1.7E-04	1.7E-04
Fluoranthene	RS879	3.10E-02	1.6E-02	U	7.5E-05	1.1E-03	1.1E-03
Fluorene	RS879	3.10E-02	1.6E-02	U	5.7E-04	8.5E-03	8.5E-03
Indeno(1,2,3-cd)pyrene	RS879	3.10E-02	1.6E-02	U	2.4E-05	3.6E-04	3.6E-04
Naphthalene	RS879	3.10E-02	1.6E-02	U	6.9E-03	3.5E-02	1.6E-02
Perylene	RS879	-	-	-	1.2E-04	1.8E-03	1.8E-03
Phenanthrene	RS879	3.10E-02	1.6E-02	U	1.5E-03	2.3E-02	1.6E-02
Pyrene	RS879	3.10E-02	1.6E-02	U	1.4E-04	2.0E-03	2.0E-03
C08-C11 (Gasoline Range)	RS880	1.10E+01	5.5E+00	UJ		-	-
C11-C14 (Kerosene Range)	RS880	1.10E+01	5.5E+00	UJ		-	-
C14-C20 (Diesel Range)	RS880	1.10E+01	5.5E+00	UJ		-	-
C20-C30 (Lubricant Oil Range)	RS880	1.10E+01	5.5E+00	UJ		-	-
C11-C30	RS880	-	1.7E+01	-		-	-
Benzene	RS880	6.00E-03	3.0E-03	U	1.2E-04	6.6E-04	6.6E-04
Ethylbenzene	RS880	6.00E-03	3.0E-03	U	1.2E-04	6.6E-04	6.6E-04
Toluene	RS880	6.00E-03	3.0E-03	U	1.2E-04	6.6E-04	6.6E-04
m,p-Xylene	RS880	6.00E-03	3.0E-03	U	3.6E-04	2.0E-03	2.0E-03
o-Xylene	RS880	6.00E-03	3.0E-03	U	8.0E-05	4.4E-04	4.4E-04
Xylene (total)	RS880	-	-	-	4.4E-04	2.4E-03	2.4E-03
2-Methylnaphthalene	RS880	-	-	-	2.8E-02	1.5E-01	1.5E-01
Acenaphthene	RS880	3.40E-02	1.7E-02	U	5.7E-04	9.5E-03	9.5E-03
Acenaphthylene	RS880	3.40E-02	1.7E-02	U	7.0E-05	1.2E-03	1.2E-03
Anthracene	RS880	3.40E-02	1.7E-02	U	3.7E-04	6.2E-03	6.2E-03
Benzo(a)anthracene	RS880	3.40E-02	1.7E-02	U	2.7E-05	4.4E-04	4.4E-04
Benzo(a)pyrene	RS880	3.40E-02	1.7E-02	U	2.7E-05	4.5E-04	4.5E-04
Benzo(b)fluoranthene	RS880	3.40E-02	1.7E-02	U	4.3E-05	7.1E-04	7.1E-04
Benzo(e)pyrene	RS880	-	-	-	2.1E-04	3.4E-03	3.4E-03
Benzo(g,h,i)perylene	RS880	3.40E-02	1.7E-02	U	2.2E-04	3.6E-03	3.6E-03
Benzo(k)fluoranthene	RS880	3.40E-02	1.7E-02	U	2.1E-05	3.4E-04	3.4E-04
Chrysene	RS880	3.40E-02	1.7E-02	U	5.9E-05	9.7E-04	9.7E-04
Dibenz(a,h)anthracene	RS880	3.40E-02	1.7E-02	U	1.1E-05	1.8E-04	1.8E-04
Fluoranthene	RS880	3.40E-02	1.7E-02	U	7.5E-05	1.2E-03	1.2E-03
Fluorene	RS880	3.40E-02	1.7E-02	U	5.7E-04	9.4E-03	9.4E-03
Indeno(1,2,3-cd)pyrene	RS880	3.40E-02	1.7E-02	U	2.4E-05	4.0E-04	4.0E-04
Naphthalene	RS880	3.40E-02	1.7E-02	U	6.9E-03	3.8E-02	1.7E-02
Perylene	RS880	-	-	-	1.2E-04	1.9E-03	1.9E-03
Phenanthrene	RS880	3.40E-02	1.7E-02	U	1.5E-03	2.5E-02	1.7E-02

TPH to Petroleum Constituent Extrapolation for Soil (0-10 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Pyrene	RS880	3.40E-02	1.7E-02	U	1.4E-04	2.2E-03	2.2E-03
C08-C11 (Gasoline Range)	RS881	5.30E+01	2.7E+01	UJ		-	-
C11-C14 (Kerosene Range)	RS881	5.30E+01	2.7E+01	UJ		-	-
C14-C20 (Diesel Range)	RS881	5.30E+01	2.7E+01	UJ		-	-
C20-C30 (Lubricant Oil Range)	RS881	9.50E+01	9.5E+01			-	-
C11-C30	RS881	-	1.5E+02	-		-	-
Benzene	RS881	-	-	-	1.2E-04	3.2E-03	3.2E-03
Ethylbenzene	RS881	-	-	-	1.2E-04	3.2E-03	3.2E-03
Toluene	RS881	-	-	-	1.2E-04	3.2E-03	3.2E-03
m,p-Xylene	RS881	-	-	-	3.6E-04	9.5E-03	9.5E-03
o-Xylene	RS881	-	-	-	8.0E-05	2.1E-03	2.1E-03
Xylene (total)	RS881	-	-	-	4.4E-04	1.2E-02	1.2E-02
2-Methylnaphthalene	RS881	-	-	-	2.8E-02	7.3E-01	7.3E-01
Acenaphthene	RS881	-	-	-	5.7E-04	8.5E-02	8.5E-02
Acenaphthylene	RS881	-	-	-	7.0E-05	1.0E-02	1.0E-02
Anthracene	RS881	-	-	-	3.7E-04	5.5E-02	5.5E-02
Benzo(a)anthracene	RS881	-	-	-	2.7E-05	4.0E-03	4.0E-03
Benzo(a)pyrene	RS881	-	-	-	2.7E-05	4.0E-03	4.0E-03
Benzo(b)fluoranthene	RS881	-	-	-	4.3E-05	6.4E-03	6.4E-03
Benzo(e)pyrene	RS881	-	-	-	2.1E-04	3.1E-02	3.1E-02
Benzo(g,h,i)perylene	RS881	-	-	-	2.2E-04	3.3E-02	3.3E-02
Benzo(k)fluoranthene	RS881	-	-	-	2.1E-05	3.0E-03	3.0E-03
Chrysene	RS881	-	-	-	5.9E-05	8.7E-03	8.7E-03
Dibenz(a,h)anthracene	RS881	-	-	-	1.1E-05	1.6E-03	1.6E-03
Fluoranthene	RS881	-	-	-	7.5E-05	1.1E-02	1.1E-02
Fluorene	RS881	-	-	-	5.7E-04	8.4E-02	8.4E-02
Indeno(1,2,3-cd)pyrene	RS881	-	-	-	2.4E-05	3.6E-03	3.6E-03
Naphthalene	RS881	-	-	-	6.9E-03	1.8E-01	1.8E-01
Perylene	RS881	-	-	-	1.2E-04	1.7E-02	1.7E-02
Phenanthrene	RS881	-	-	-	1.5E-03	2.3E-01	2.3E-01
Pyrene	RS881	-	-	-	1.4E-04	2.0E-02	2.0E-02
C08-C11 (Gasoline Range)	MJ683	1.10E+01	5.5E+00	U		-	-
C11-C14 (Kerosene Range)	MJ683	1.10E+01	5.5E+00	U		-	-
C14-C20 (Diesel Range)	MJ683	8.80E+00	8.8E+00	J		-	-
C20-C30 (Lubricant Oil Range)	MJ683	5.20E+01	5.2E+01			-	-
C11-C30	MJ683	-	6.6E+01	-		-	-
Benzene	MJ683	-	-	-	1.2E-04	6.6E-04	6.6E-04
Ethylbenzene	MJ683	-	-	-	1.2E-04	6.6E-04	6.6E-04
Toluene	MJ683	-	-	-	1.2E-04	6.6E-04	6.6E-04
m,p-Xylene	MJ683	-	-	-	3.6E-04	2.0E-03	2.0E-03
o-Xylene	MJ683	-	-	-	8.0E-05	4.4E-04	4.4E-04
Xylene (total)	MJ683	-	-	-	4.4E-04	2.4E-03	2.4E-03
2-Methylnaphthalene	MJ683	4.00E-02	4.0E-02		2.8E-02	1.5E-01	4.0E-02
Acenaphthene	MJ683	2.40E-02	1.2E-02	U	5.7E-04	3.8E-02	1.2E-02
Acenaphthylene	MJ683	2.40E-02	1.2E-02	U	7.0E-05	4.6E-03	4.6E-03
Anthracene	MJ683	3.80E-02	3.8E-02		3.7E-04	2.5E-02	3.8E-02
Benzo(a)anthracene	MJ683	2.70E-01	2.7E-01		2.7E-05	1.8E-03	2.7E-01
Benzo(a)pyrene	MJ683	2.60E-01	2.6E-01		2.7E-05	1.8E-03	2.6E-01
Benzo(b)fluoranthene	MJ683	4.20E-01	4.2E-01		4.3E-05	2.9E-03	4.2E-01
Benzo(e)pyrene	MJ683	-	-	-	2.1E-04	1.4E-02	1.4E-02
Benzo(g,h,i)perylene	MJ683	7.30E-02	7.3E-02		2.2E-04	1.5E-02	7.3E-02
Benzo(k)fluoranthene	MJ683	3.00E-01	3.0E-01		2.1E-05	1.4E-03	3.0E-01
Chrysene	MJ683	4.40E-01	4.4E-01		5.9E-05	3.9E-03	4.4E-01
Dibenz(a,h)anthracene	MJ683	2.50E-02	2.5E-02		1.1E-05	7.3E-04	2.5E-02
Fluoranthene	MJ683	5.80E-01	5.8E-01		7.5E-05	5.0E-03	5.8E-01
Fluorene	MJ683	2.40E-02	1.2E-02	U	5.7E-04	3.8E-02	1.2E-02

TPH to Petroleum Constituent Extrapolation for Soil (0-10 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Indeno(1,2,3-cd)pyrene	MJ683	1.00E-01	1.0E-01		2.4E-05	1.6E-03	1.0E-01
Naphthalene	MJ683	3.10E-02	3.1E-02		6.9E-03	3.8E-02	3.1E-02
Perylene	MJ683	-	-	-	1.2E-04	7.8E-03	7.8E-03
Phenanthrene	MJ683	2.50E-01	2.5E-01		1.5E-03	1.0E-01	2.5E-01
Pyrene	MJ683	6.00E-01	6.0E-01		1.4E-04	9.0E-03	6.0E-01
C08-C11 (Gasoline Range)	MJ696	5.60E+00	2.8E+00	U		-	-
C11-C14 (Kerosene Range)	MJ696	5.60E+00	2.8E+00	U		-	-
C14-C20 (Diesel Range)	MJ696	5.60E+00	2.8E+00	U		-	-
C20-C30 (Lubricant Oil Range)	MJ696	5.60E+00	2.8E+00	U		-	-
C11-C30	MJ696	-	8.4E+00	-		-	-
Benzene	MJ696	-	-	-	1.2E-04	3.4E-04	3.4E-04
Ethylbenzene	MJ696	-	-	-	1.2E-04	3.4E-04	3.4E-04
Toluene	MJ696	-	-	-	1.2E-04	3.4E-04	3.4E-04
m,p-Xylene	MJ696	-	-	-	3.6E-04	1.0E-03	1.0E-03
o-Xylene	MJ696	-	-	-	8.0E-05	2.2E-04	2.2E-04
Xylene (total)	MJ696	-	-	-	4.4E-04	1.2E-03	1.2E-03
2-Methylnaphthalene	MJ696	-	-	-	2.8E-02	7.7E-02	7.7E-02
Acenaphthene	MJ696	-	-	-	5.7E-04	4.8E-03	4.8E-03
Acenaphthylene	MJ696	-	-	-	7.0E-05	5.9E-04	5.9E-04
Anthracene	MJ696	-	-	-	3.7E-04	3.1E-03	3.1E-03
Benzo(a)anthracene	MJ696	-	-	-	2.7E-05	2.3E-04	2.3E-04
Benzo(a)pyrene	MJ696	-	-	-	2.7E-05	2.3E-04	2.3E-04
Benzo(b)fluoranthene	MJ696	-	-	-	4.3E-05	3.6E-04	3.6E-04
Benzo(e)pyrene	MJ696	-	-	-	2.1E-04	1.7E-03	1.7E-03
Benzo(g,h,i)perylene	MJ696	-	-	-	2.2E-04	1.9E-03	1.9E-03
Benzo(k)fluoranthene	MJ696	-	-	-	2.1E-05	1.7E-04	1.7E-04
Chrysene	MJ696	-	-	-	5.9E-05	4.9E-04	4.9E-04
Dibenz(a,h)anthracene	MJ696	-	-	-	1.1E-05	9.3E-05	9.3E-05
Fluoranthene	MJ696	-	-	-	7.5E-05	6.3E-04	6.3E-04
Fluorene	MJ696	-	-	-	5.7E-04	4.8E-03	4.8E-03
Indeno(1,2,3-cd)pyrene	MJ696	-	-	-	2.4E-05	2.0E-04	2.0E-04
Naphthalene	MJ696	-	-	-	6.9E-03	1.9E-02	1.9E-02
Perylene	MJ696	-	-	-	1.2E-04	9.9E-04	9.9E-04
Phenanthrene	MJ696	-	-	-	1.5E-03	1.3E-02	1.3E-02
Pyrene	MJ696	-	-	-	1.4E-04	1.1E-03	1.1E-03
C08-C11 (Gasoline Range)	MJ697	1.10E+01	5.5E+00	U		-	-
C11-C14 (Kerosene Range)	MJ697	1.30E+01	1.3E+01			-	-
C14-C20 (Diesel Range)	MJ697	5.90E+01	5.9E+01			-	-
C20-C30 (Lubricant Oil Range)	MJ697	6.00E+01	6.0E+01			-	-
C11-C30	MJ697	-	1.3E+02	-		-	-
Benzene	MJ697	-	-	-	1.2E-04	6.6E-04	6.6E-04
Ethylbenzene	MJ697	-	-	-	1.2E-04	6.6E-04	6.6E-04
Toluene	MJ697	-	-	-	1.2E-04	6.6E-04	6.6E-04
m,p-Xylene	MJ697	-	-	-	3.6E-04	2.0E-03	2.0E-03
o-Xylene	MJ697	-	-	-	8.0E-05	4.4E-04	4.4E-04
Xylene (total)	MJ697	-	-	-	4.4E-04	2.4E-03	2.4E-03
2-Methylnaphthalene	MJ697	-	-	-	2.8E-02	1.5E-01	1.5E-01
Acenaphthene	MJ697	-	-	-	5.7E-04	7.6E-02	7.6E-02
Acenaphthylene	MJ697	-	-	-	7.0E-05	9.3E-03	9.3E-03
Anthracene	MJ697	-	-	-	3.7E-04	4.9E-02	4.9E-02
Benzo(a)anthracene	MJ697	-	-	-	2.7E-05	3.6E-03	3.6E-03
Benzo(a)pyrene	MJ697	-	-	-	2.7E-05	3.6E-03	3.6E-03
Benzo(b)fluoranthene	MJ697	-	-	-	4.3E-05	5.7E-03	5.7E-03
Benzo(e)pyrene	MJ697	-	-	-	2.1E-04	2.7E-02	2.7E-02
Benzo(g,h,i)perylene	MJ697	-	-	-	2.2E-04	2.9E-02	2.9E-02
Benzo(k)fluoranthene	MJ697	-	-	-	2.1E-05	2.7E-03	2.7E-03

TPH to Petroleum Constituent Extrapolation for Soil (0-10 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Chrysene	MJ697	-	-	-	5.9E-05	7.7E-03	7.7E-03
Dibenz(a,h)anthracene	MJ697	-	-	-	1.1E-05	1.5E-03	1.5E-03
Fluoranthene	MJ697	-	-	-	7.5E-05	9.9E-03	9.9E-03
Fluorene	MJ697	-	-	-	5.7E-04	7.5E-02	7.5E-02
Indeno(1,2,3-cd)pyrene	MJ697	-	-	-	2.4E-05	3.2E-03	3.2E-03
Naphthalene	MJ697	-	-	-	6.9E-03	3.8E-02	3.8E-02
Perylene	MJ697	-	-	-	1.2E-04	1.6E-02	1.6E-02
Phenanthrene	MJ697	-	-	-	1.5E-03	2.0E-01	2.0E-01
Pyrene	MJ697	-	-	-	1.4E-04	1.8E-02	1.8E-02
C08-C11 (Gasoline Range)	MJ698	5.60E+00	2.8E+00	U		-	-
C11-C14 (Kerosene Range)	MJ698	5.60E+00	2.8E+00	U		-	-
C14-C20 (Diesel Range)	MJ698	5.60E+00	2.8E+00	U		-	-
C20-C30 (Lubricant Oil Range)	MJ698	5.60E+00	2.8E+00	U		-	-
C11-C30	MJ698	-	8.4E+00	-		-	-
Benzene	MJ698	-	-	-	1.2E-04	3.4E-04	3.4E-04
Ethylbenzene	MJ698	-	-	-	1.2E-04	3.4E-04	3.4E-04
Toluene	MJ698	-	-	-	1.2E-04	3.4E-04	3.4E-04
m,p-Xylene	MJ698	-	-	-	3.6E-04	1.0E-03	1.0E-03
o-Xylene	MJ698	-	-	-	8.0E-05	2.2E-04	2.2E-04
Xylene (total)	MJ698	-	-	-	4.4E-04	1.2E-03	1.2E-03
2-Methylnaphthalene	MJ698	-	-	-	2.8E-02	7.7E-02	7.7E-02
Acenaphthene	MJ698	-	-	-	5.7E-04	4.8E-03	4.8E-03
Acenaphthylene	MJ698	-	-	-	7.0E-05	5.9E-04	5.9E-04
Anthracene	MJ698	-	-	-	3.7E-04	3.1E-03	3.1E-03
Benzo(a)anthracene	MJ698	-	-	-	2.7E-05	2.3E-04	2.3E-04
Benzo(a)pyrene	MJ698	-	-	-	2.7E-05	2.3E-04	2.3E-04
Benzo(b)fluoranthene	MJ698	-	-	-	4.3E-05	3.6E-04	3.6E-04
Benzo(e)pyrene	MJ698	-	-	-	2.1E-04	1.7E-03	1.7E-03
Benzo(g,h,i)perylene	MJ698	-	-	-	2.2E-04	1.9E-03	1.9E-03
Benzo(k)fluoranthene	MJ698	-	-	-	2.1E-05	1.7E-04	1.7E-04
Chrysene	MJ698	-	-	-	5.9E-05	4.9E-04	4.9E-04
Dibenz(a,h)anthracene	MJ698	-	-	-	1.1E-05	9.3E-05	9.3E-05
Fluoranthene	MJ698	-	-	-	7.5E-05	6.3E-04	6.3E-04
Fluorene	MJ698	-	-	-	5.7E-04	4.8E-03	4.8E-03
Indeno(1,2,3-cd)pyrene	MJ698	-	-	-	2.4E-05	2.0E-04	2.0E-04
Naphthalene	MJ698	-	-	-	6.9E-03	1.9E-02	1.9E-02
Perylene	MJ698	-	-	-	1.2E-04	9.9E-04	9.9E-04
Phenanthrene	MJ698	-	-	-	1.5E-03	1.3E-02	1.3E-02
Pyrene	MJ698	-	-	-	1.4E-04	1.1E-03	1.1E-03
C08-C11 (Gasoline Range)	MJ704	5.20E+00	2.6E+00	U		-	-
C11-C14 (Kerosene Range)	MJ704	5.20E+00	2.6E+00	U		-	-
C14-C20 (Diesel Range)	MJ704	5.20E+00	2.6E+00	U		-	-
C20-C30 (Lubricant Oil Range)	MJ704	5.20E+00	2.6E+00	U		-	-
C11-C30	MJ704	-	7.8E+00	-		-	-
Benzene	MJ704	-	-	-	1.2E-04	3.1E-04	3.1E-04
Ethylbenzene	MJ704	-	-	-	1.2E-04	3.1E-04	3.1E-04
Toluene	MJ704	-	-	-	1.2E-04	3.1E-04	3.1E-04
m,p-Xylene	MJ704	-	-	-	3.6E-04	9.4E-04	9.4E-04
o-Xylene	MJ704	-	-	-	8.0E-05	2.1E-04	2.1E-04
Xylene (total)	MJ704	-	-	-	4.4E-04	1.1E-03	1.1E-03
2-Methylnaphthalene	MJ704	2.10E-02	1.1E-02	U	2.8E-02	7.2E-02	1.1E-02
Acenaphthene	MJ704	2.10E-02	1.1E-02	U	5.7E-04	4.5E-03	4.5E-03
Acenaphthylene	MJ704	2.10E-02	1.1E-02	U	7.0E-05	5.5E-04	5.5E-04
Anthracene	MJ704	3.90E-02	3.9E-02		3.7E-04	2.9E-03	3.9E-02
Benzo(a)anthracene	MJ704	3.30E-01	3.3E-01		2.7E-05	2.1E-04	3.3E-01
Benzo(a)pyrene	MJ704	1.90E-01	1.9E-01		2.7E-05	2.1E-04	1.9E-01

TPH to Petroleum Constituent Extrapolation for Soil (0-10 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Benzo(b)fluoranthene	MJ704	2.50E-01	2.5E-01		4.3E-05	3.4E-04	2.5E-01
Benzo(e)pyrene	MJ704	-	-	-	2.1E-04	1.6E-03	1.6E-03
Benzo(g,h,i)perylene	MJ704	8.70E-02	8.7E-02		2.2E-04	1.7E-03	8.7E-02
Benzo(k)fluoranthene	MJ704	2.10E-01	2.1E-01		2.1E-05	1.6E-04	2.1E-01
Chrysene	MJ704	4.00E-01	4.0E-01		5.9E-05	4.6E-04	4.0E-01
Dibenz(a,h)anthracene	MJ704	3.30E-02	3.3E-02		1.1E-05	8.6E-05	3.3E-02
Fluoranthene	MJ704	5.90E-01	5.9E-01		7.5E-05	5.8E-04	5.9E-01
Fluorene	MJ704	2.10E-02	1.1E-02	U	5.7E-04	4.4E-03	4.4E-03
Indeno(1,2,3-cd)pyrene	MJ704	1.10E-01	1.1E-01		2.4E-05	1.9E-04	1.1E-01
Naphthalene	MJ704	2.10E-02	1.1E-02	U	6.9E-03	1.8E-02	1.1E-02
Perylene	MJ704	-	-	-	1.2E-04	9.2E-04	9.2E-04
Phenanthrene	MJ704	3.30E-01	3.3E-01		1.5E-03	1.2E-02	3.3E-01
Pyrene	MJ704	4.80E-01	4.8E-01		1.4E-04	1.1E-03	4.8E-01
C08-C11 (Gasoline Range)	MJ705	5.40E+00	2.7E+00	U		-	-
C11-C14 (Kerosene Range)	MJ705	5.40E+00	2.7E+00	U		-	-
C14-C20 (Diesel Range)	MJ705	5.40E+00	2.7E+00	U		-	-
C20-C30 (Lubricant Oil Range)	MJ705	5.40E+00	2.7E+00	U		-	-
C11-C30	MJ705	-	8.1E+00	-		-	-
Benzene	MJ705	-	-	-	1.2E-04	3.2E-04	3.2E-04
Ethylbenzene	MJ705	-	-	-	1.2E-04	3.2E-04	3.2E-04
Toluene	MJ705	-	-	-	1.2E-04	3.2E-04	3.2E-04
m,p-Xylene	MJ705	-	-	-	3.6E-04	9.7E-04	9.7E-04
o-Xylene	MJ705	-	-	-	8.0E-05	2.2E-04	2.2E-04
Xylene (total)	MJ705	-	-	-	4.4E-04	1.2E-03	1.2E-03
2-Methylnaphthalene	MJ705	2.20E-02	1.1E-02	U	2.8E-02	7.4E-02	1.1E-02
Acenaphthene	MJ705	2.20E-02	1.1E-02	U	5.7E-04	4.6E-03	4.6E-03
Acenaphthylene	MJ705	2.20E-02	1.1E-02	U	7.0E-05	5.7E-04	5.7E-04
Anthracene	MJ705	2.20E-02	1.1E-02	U	3.7E-04	3.0E-03	3.0E-03
Benzo(a)anthracene	MJ705	2.20E-02	1.1E-02	U	2.7E-05	2.2E-04	2.2E-04
Benzo(a)pyrene	MJ705	2.20E-02	1.1E-02	U	2.7E-05	2.2E-04	2.2E-04
Benzo(b)fluoranthene	MJ705	2.20E-02	1.1E-02	U	4.3E-05	3.5E-04	3.5E-04
Benzo(e)pyrene	MJ705	-	-	-	2.1E-04	1.7E-03	1.7E-03
Benzo(g,h,i)perylene	MJ705	2.20E-02	1.1E-02	U	2.2E-04	1.8E-03	1.8E-03
Benzo(k)fluoranthene	MJ705	2.20E-02	1.1E-02	U	2.1E-05	1.7E-04	1.7E-04
Chrysene	MJ705	2.20E-02	1.1E-02	U	5.9E-05	4.8E-04	4.8E-04
Dibenz(a,h)anthracene	MJ705	2.20E-02	1.1E-02	U	1.1E-05	9.0E-05	9.0E-05
Fluoranthene	MJ705	2.20E-02	1.1E-02	U	7.5E-05	6.1E-04	6.1E-04
Fluorene	MJ705	2.20E-02	1.1E-02	U	5.7E-04	4.6E-03	4.6E-03
Indeno(1,2,3-cd)pyrene	MJ705	2.20E-02	1.1E-02	U	2.4E-05	1.9E-04	1.9E-04
Naphthalene	MJ705	2.20E-02	1.1E-02	U	6.9E-03	1.9E-02	1.1E-02
Perylene	MJ705	-	-	-	1.2E-04	9.6E-04	9.6E-04
Phenanthrene	MJ705	2.20E-02	1.1E-02	U	1.5E-03	1.2E-02	1.1E-02
Pyrene	MJ705	2.20E-02	1.1E-02	U	1.4E-04	1.1E-03	1.1E-03
C08-C11 (Gasoline Range)	MJ707	1.00E+01	5.0E+00	U		-	-
C11-C14 (Kerosene Range)	MJ707	1.00E+01	5.0E+00	U		-	-
C14-C20 (Diesel Range)	MJ707	1.00E+01	5.0E+00	U		-	-
C20-C30 (Lubricant Oil Range)	MJ707	1.00E+01	5.0E+00	U		-	-
C11-C30	MJ707	-	1.5E+01	-		-	-
Benzene	MJ707	-	-	-	1.2E-04	6.0E-04	6.0E-04
Ethylbenzene	MJ707	-	-	-	1.2E-04	6.0E-04	6.0E-04
Toluene	MJ707	-	-	-	1.2E-04	6.0E-04	6.0E-04
m,p-Xylene	MJ707	-	-	-	3.6E-04	1.8E-03	1.8E-03
o-Xylene	MJ707	-	-	-	8.0E-05	4.0E-04	4.0E-04
Xylene (total)	MJ707	-	-	-	4.4E-04	2.2E-03	2.2E-03
2-Methylnaphthalene	MJ707	2.00E-02	1.0E-02	U	2.8E-02	1.4E-01	1.0E-02
Acenaphthene	MJ707	2.00E-02	1.0E-02	U	5.7E-04	8.6E-03	8.6E-03

TPH to Petroleum Constituent Extrapolation for Soil (0-10 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Acenaphthylene	MJ707	2.00E-02	1.0E-02	U	7.0E-05	1.1E-03	1.1E-03
Anthracene	MJ707	2.00E-02	1.0E-02	U	3.7E-04	5.6E-03	5.6E-03
Benzo(a)anthracene	MJ707	2.00E-02	1.0E-02	U	2.7E-05	4.0E-04	4.0E-04
Benzo(a)pyrene	MJ707	2.00E-02	1.0E-02	U	2.7E-05	4.1E-04	4.1E-04
Benzo(b)fluoranthene	MJ707	2.00E-02	1.0E-02	U	4.3E-05	6.5E-04	6.5E-04
Benzo(e)pyrene	MJ707	-	-	-	2.1E-04	3.1E-03	3.1E-03
Benzo(g,h,i)perylene	MJ707	2.00E-02	1.0E-02	U	2.2E-04	3.3E-03	3.3E-03
Benzo(k)fluoranthene	MJ707	2.00E-02	1.0E-02	U	2.1E-05	3.1E-04	3.1E-04
Chrysene	MJ707	2.00E-02	1.0E-02	U	5.9E-05	8.8E-04	8.8E-04
Dibenz(a,h)anthracene	MJ707	2.00E-02	1.0E-02	U	1.1E-05	1.7E-04	1.7E-04
Fluoranthene	MJ707	2.00E-02	1.0E-02	U	7.5E-05	1.1E-03	1.1E-03
Fluorene	MJ707	2.00E-02	1.0E-02	U	5.7E-04	8.5E-03	8.5E-03
Indeno(1,2,3-cd)pyrene	MJ707	2.00E-02	1.0E-02	U	2.4E-05	3.6E-04	3.6E-04
Naphthalene	MJ707	2.00E-02	1.0E-02	U	6.9E-03	3.5E-02	1.0E-02
Perylene	MJ707	-	-	-	1.2E-04	1.8E-03	1.8E-03
Phenanthrene	MJ707	2.00E-02	1.0E-02	U	1.5E-03	2.3E-02	1.0E-02
Pyrene	MJ707	2.00E-02	1.0E-02	U	1.4E-04	2.0E-03	2.0E-03
C08-C11 (Gasoline Range)	MJ708	1.10E+01	5.5E+00	U		-	-
C11-C14 (Kerosene Range)	MJ708	1.10E+01	5.5E+00	U		-	-
C14-C20 (Diesel Range)	MJ708	1.10E+01	5.5E+00	U		-	-
C20-C30 (Lubricant Oil Range)	MJ708	4.50E+00	4.5E+00	J		-	-
C11-C30	MJ708	-	1.6E+01	-		-	-
Benzene	MJ708	-	-	-	1.2E-04	6.6E-04	6.6E-04
Ethylbenzene	MJ708	-	-	-	1.2E-04	6.6E-04	6.6E-04
Toluene	MJ708	-	-	-	1.2E-04	6.6E-04	6.6E-04
m,p-Xylene	MJ708	-	-	-	3.6E-04	2.0E-03	2.0E-03
o-Xylene	MJ708	-	-	-	8.0E-05	4.4E-04	4.4E-04
Xylene (total)	MJ708	-	-	-	4.4E-04	2.4E-03	2.4E-03
2-Methylnaphthalene	MJ708	2.10E-02	1.1E-02	U	2.8E-02	1.5E-01	1.1E-02
Acenaphthene	MJ708	2.10E-02	1.1E-02	U	5.7E-04	8.9E-03	8.9E-03
Acenaphthylene	MJ708	2.10E-02	1.1E-02	U	7.0E-05	1.1E-03	1.1E-03
Anthracene	MJ708	2.10E-02	1.1E-02	U	3.7E-04	5.8E-03	5.8E-03
Benzo(a)anthracene	MJ708	2.10E-02	1.1E-02	U	2.7E-05	4.2E-04	4.2E-04
Benzo(a)pyrene	MJ708	2.10E-02	1.1E-02	U	2.7E-05	4.2E-04	4.2E-04
Benzo(b)fluoranthene	MJ708	2.10E-02	1.1E-02	U	4.3E-05	6.7E-04	6.7E-04
Benzo(e)pyrene	MJ708	-	-	-	2.1E-04	3.2E-03	3.2E-03
Benzo(g,h,i)perylene	MJ708	2.10E-02	1.1E-02	U	2.2E-04	3.4E-03	3.4E-03
Benzo(k)fluoranthene	MJ708	2.10E-02	1.1E-02	U	2.1E-05	3.2E-04	3.2E-04
Chrysene	MJ708	2.10E-02	1.1E-02	U	5.9E-05	9.1E-04	9.1E-04
Dibenz(a,h)anthracene	MJ708	2.10E-02	1.1E-02	U	1.1E-05	1.7E-04	1.7E-04
Fluoranthene	MJ708	2.10E-02	1.1E-02	U	7.5E-05	1.2E-03	1.2E-03
Fluorene	MJ708	2.10E-02	1.1E-02	U	5.7E-04	8.8E-03	8.8E-03
Indeno(1,2,3-cd)pyrene	MJ708	2.10E-02	1.1E-02	U	2.4E-05	3.7E-04	3.7E-04
Naphthalene	MJ708	2.10E-02	1.1E-02	U	6.9E-03	3.8E-02	1.1E-02
Perylene	MJ708	-	-	-	1.2E-04	1.8E-03	1.8E-03
Phenanthrene	MJ708	2.10E-02	1.1E-02	U	1.5E-03	2.4E-02	1.1E-02
Pyrene	MJ708	2.10E-02	1.1E-02	U	1.4E-04	2.1E-03	2.1E-03
C08-C11 (Gasoline Range)	MJ710	5.30E+00	2.7E+00	U		-	-
C11-C14 (Kerosene Range)	MJ710	5.30E+00	2.7E+00	U		-	-
C14-C20 (Diesel Range)	MJ710	5.30E+00	2.7E+00	U		-	-
C20-C30 (Lubricant Oil Range)	MJ710	2.20E+00	2.2E+00	J		-	-
C11-C30	MJ710	-	7.5E+00	-		-	-
Benzene	MJ710	-	-	-	1.2E-04	3.2E-04	3.2E-04
Ethylbenzene	MJ710	-	-	-	1.2E-04	3.2E-04	3.2E-04
Toluene	MJ710	-	-	-	1.2E-04	3.2E-04	3.2E-04
m,p-Xylene	MJ710	-	-	-	3.6E-04	9.5E-04	9.5E-04

TPH to Petroleum Constituent Extrapolation for Soil (0-10 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
o-Xylene	MJ710	-	-	-	8.0E-05	2.1E-04	2.1E-04
Xylene (total)	MJ710	-	-	-	4.4E-04	1.2E-03	1.2E-03
2-Methylnaphthalene	MJ710	2.10E-02	1.1E-02	U	2.8E-02	7.3E-02	1.1E-02
Acenaphthene	MJ710	2.10E-02	1.1E-02	U	5.7E-04	4.3E-03	4.3E-03
Acenaphthylene	MJ710	2.10E-02	1.1E-02	U	7.0E-05	5.3E-04	5.3E-04
Anthracene	MJ710	2.10E-02	1.1E-02	U	3.7E-04	2.8E-03	2.8E-03
Benzo(a)anthracene	MJ710	2.10E-02	1.1E-02	U	2.7E-05	2.0E-04	2.0E-04
Benzo(a)pyrene	MJ710	2.10E-02	1.1E-02	U	2.7E-05	2.0E-04	2.0E-04
Benzo(b)fluoranthene	MJ710	2.10E-02	1.1E-02	U	4.3E-05	3.2E-04	3.2E-04
Benzo(e)pyrene	MJ710	-	-	-	2.1E-04	1.6E-03	1.6E-03
Benzo(g,h,i)perylene	MJ710	2.10E-02	1.1E-02	U	2.2E-04	1.7E-03	1.7E-03
Benzo(k)fluoranthene	MJ710	2.10E-02	1.1E-02	U	2.1E-05	1.5E-04	1.5E-04
Chrysene	MJ710	2.10E-02	1.1E-02	U	5.9E-05	4.4E-04	4.4E-04
Dibenz(a,h)anthracene	MJ710	2.10E-02	1.1E-02	U	1.1E-05	8.3E-05	8.3E-05
Fluoranthene	MJ710	2.10E-02	1.1E-02	U	7.5E-05	5.6E-04	5.6E-04
Fluorene	MJ710	2.10E-02	1.1E-02	U	5.7E-04	4.3E-03	4.3E-03
Indeno(1,2,3-cd)pyrene	MJ710	2.10E-02	1.1E-02	U	2.4E-05	1.8E-04	1.8E-04
Naphthalene	MJ710	2.10E-02	1.1E-02	U	6.9E-03	1.8E-02	1.1E-02
Perylene	MJ710	-	-	-	1.2E-04	8.8E-04	8.8E-04
Phenanthrene	MJ710	2.10E-02	1.1E-02	U	1.5E-03	1.1E-02	1.1E-02
Pyrene	MJ710	2.10E-02	1.1E-02	U	1.4E-04	1.0E-03	1.0E-03
C08-C11 (Gasoline Range)	MJ720	6.00E+00	3.0E+00	U		-	-
C11-C14 (Kerosene Range)	MJ720	6.00E+00	3.0E+00	U		-	-
C14-C20 (Diesel Range)	MJ720	6.00E+00	3.0E+00	U		-	-
C20-C30 (Lubricant Oil Range)	MJ720	6.00E+00	3.0E+00	U		-	-
C11-C30	MJ720	-	9.0E+00	-		-	-
Benzene	MJ720	-	-	-	1.2E-04	3.6E-04	3.6E-04
Ethylbenzene	MJ720	-	-	-	1.2E-04	3.6E-04	3.6E-04
Toluene	MJ720	-	-	-	1.2E-04	3.6E-04	3.6E-04
m,p-Xylene	MJ720	-	-	-	3.6E-04	1.1E-03	1.1E-03
o-Xylene	MJ720	-	-	-	8.0E-05	2.4E-04	2.4E-04
Xylene (total)	MJ720	-	-	-	4.4E-04	1.3E-03	1.3E-03
2-Methylnaphthalene	MJ720	-	-	-	2.8E-02	8.3E-02	8.3E-02
Acenaphthene	MJ720	-	-	-	5.7E-04	5.2E-03	5.2E-03
Acenaphthylene	MJ720	-	-	-	7.0E-05	6.3E-04	6.3E-04
Anthracene	MJ720	-	-	-	3.7E-04	3.4E-03	3.4E-03
Benzo(a)anthracene	MJ720	-	-	-	2.7E-05	2.4E-04	2.4E-04
Benzo(a)pyrene	MJ720	-	-	-	2.7E-05	2.4E-04	2.4E-04
Benzo(b)fluoranthene	MJ720	-	-	-	4.3E-05	3.9E-04	3.9E-04
Benzo(e)pyrene	MJ720	-	-	-	2.1E-04	1.9E-03	1.9E-03
Benzo(g,h,i)perylene	MJ720	-	-	-	2.2E-04	2.0E-03	2.0E-03
Benzo(k)fluoranthene	MJ720	-	-	-	2.1E-05	1.8E-04	1.8E-04
Chrysene	MJ720	-	-	-	5.9E-05	5.3E-04	5.3E-04
Dibenz(a,h)anthracene	MJ720	-	-	-	1.1E-05	1.0E-04	1.0E-04
Fluoranthene	MJ720	-	-	-	7.5E-05	6.7E-04	6.7E-04
Fluorene	MJ720	-	-	-	5.7E-04	5.1E-03	5.1E-03
Indeno(1,2,3-cd)pyrene	MJ720	-	-	-	2.4E-05	2.2E-04	2.2E-04
Naphthalene	MJ720	-	-	-	6.9E-03	2.1E-02	2.1E-02
Perylene	MJ720	-	-	-	1.2E-04	1.1E-03	1.1E-03
Phenanthrene	MJ720	-	-	-	1.5E-03	1.4E-02	1.4E-02
Pyrene	MJ720	-	-	-	1.4E-04	1.2E-03	1.2E-03
C08-C11 (Gasoline Range)	MJ721	5.70E+00	2.9E+00	U		-	-
C11-C14 (Kerosene Range)	MJ721	5.70E+00	2.9E+00	U		-	-
C14-C20 (Diesel Range)	MJ721	5.70E+00	2.9E+00	U		-	-
C20-C30 (Lubricant Oil Range)	MJ721	5.70E+00	2.9E+00	U		-	-
C11-C30	MJ721	-	8.6E+00	-		-	-

TPH to Petroleum Constituent Extrapolation for Soil (0-10 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Benzene	MJ721	-	-	-	1.2E-04	3.4E-04	3.4E-04
Ethylbenzene	MJ721	-	-	-	1.2E-04	3.4E-04	3.4E-04
Toluene	MJ721	-	-	-	1.2E-04	3.4E-04	3.4E-04
m,p-Xylene	MJ721	-	-	-	3.6E-04	1.0E-03	1.0E-03
o-Xylene	MJ721	-	-	-	8.0E-05	2.3E-04	2.3E-04
Xylene (total)	MJ721	-	-	-	4.4E-04	1.3E-03	1.3E-03
2-Methylnaphthalene	MJ721	-	-	-	2.8E-02	7.9E-02	7.9E-02
Acenaphthene	MJ721	-	-	-	5.7E-04	4.9E-03	4.9E-03
Acenaphthylene	MJ721	-	-	-	7.0E-05	6.0E-04	6.0E-04
Anthracene	MJ721	-	-	-	3.7E-04	3.2E-03	3.2E-03
Benzo(a)anthracene	MJ721	-	-	-	2.7E-05	2.3E-04	2.3E-04
Benzo(a)pyrene	MJ721	-	-	-	2.7E-05	2.3E-04	2.3E-04
Benzo(b)fluoranthene	MJ721	-	-	-	4.3E-05	3.7E-04	3.7E-04
Benzo(e)pyrene	MJ721	-	-	-	2.1E-04	1.8E-03	1.8E-03
Benzo(g,h,i)perylene	MJ721	-	-	-	2.2E-04	1.9E-03	1.9E-03
Benzo(k)fluoranthene	MJ721	-	-	-	2.1E-05	1.8E-04	1.8E-04
Chrysene	MJ721	-	-	-	5.9E-05	5.0E-04	5.0E-04
Dibenz(a,h)anthracene	MJ721	-	-	-	1.1E-05	9.5E-05	9.5E-05
Fluoranthene	MJ721	-	-	-	7.5E-05	6.4E-04	6.4E-04
Fluorene	MJ721	-	-	-	5.7E-04	4.9E-03	4.9E-03
Indeno(1,2,3-cd)pyrene	MJ721	-	-	-	2.4E-05	2.1E-04	2.1E-04
Naphthalene	MJ721	-	-	-	6.9E-03	2.0E-02	2.0E-02
Perylene	MJ721	-	-	-	1.2E-04	1.0E-03	1.0E-03
Phenanthrene	MJ721	-	-	-	1.5E-03	1.3E-02	1.3E-02
Pyrene	MJ721	-	-	-	1.4E-04	1.2E-03	1.2E-03
C08-C11 (Gasoline Range)	MJ722	5.60E+00	2.8E+00	U		-	-
C11-C14 (Kerosene Range)	MJ722	5.60E+00	2.8E+00	U		-	-
C14-C20 (Diesel Range)	MJ722	5.60E+00	2.8E+00	U		-	-
C20-C30 (Lubricant Oil Range)	MJ722	5.60E+00	2.8E+00	U		-	-
C11-C30	MJ722	-	8.4E+00	-		-	-
Benzene	MJ722	-	-	-	1.2E-04	3.4E-04	3.4E-04
Ethylbenzene	MJ722	-	-	-	1.2E-04	3.4E-04	3.4E-04
Toluene	MJ722	-	-	-	1.2E-04	3.4E-04	3.4E-04
m,p-Xylene	MJ722	-	-	-	3.6E-04	1.0E-03	1.0E-03
o-Xylene	MJ722	-	-	-	8.0E-05	2.2E-04	2.2E-04
Xylene (total)	MJ722	-	-	-	4.4E-04	1.2E-03	1.2E-03
2-Methylnaphthalene	MJ722	-	-	-	2.8E-02	7.7E-02	7.7E-02
Acenaphthene	MJ722	-	-	-	5.7E-04	4.8E-03	4.8E-03
Acenaphthylene	MJ722	-	-	-	7.0E-05	5.9E-04	5.9E-04
Anthracene	MJ722	-	-	-	3.7E-04	3.1E-03	3.1E-03
Benzo(a)anthracene	MJ722	-	-	-	2.7E-05	2.3E-04	2.3E-04
Benzo(a)pyrene	MJ722	-	-	-	2.7E-05	2.3E-04	2.3E-04
Benzo(b)fluoranthene	MJ722	-	-	-	4.3E-05	3.6E-04	3.6E-04
Benzo(e)pyrene	MJ722	-	-	-	2.1E-04	1.7E-03	1.7E-03
Benzo(g,h,i)perylene	MJ722	-	-	-	2.2E-04	1.9E-03	1.9E-03
Benzo(k)fluoranthene	MJ722	-	-	-	2.1E-05	1.7E-04	1.7E-04
Chrysene	MJ722	-	-	-	5.9E-05	4.9E-04	4.9E-04
Dibenz(a,h)anthracene	MJ722	-	-	-	1.1E-05	9.3E-05	9.3E-05
Fluoranthene	MJ722	-	-	-	7.5E-05	6.3E-04	6.3E-04
Fluorene	MJ722	-	-	-	5.7E-04	4.8E-03	4.8E-03
Indeno(1,2,3-cd)pyrene	MJ722	-	-	-	2.4E-05	2.0E-04	2.0E-04
Naphthalene	MJ722	-	-	-	6.9E-03	1.9E-02	1.9E-02
Perylene	MJ722	-	-	-	1.2E-04	9.9E-04	9.9E-04
Phenanthrene	MJ722	-	-	-	1.5E-03	1.3E-02	1.3E-02
Pyrene	MJ722	-	-	-	1.4E-04	1.1E-03	1.1E-03
C08-C11 (Gasoline Range)	MJ739	5.60E+00	2.8E+00	U		-	-

TPH to Petroleum Constituent Extrapolation for Soil (0-10 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
C11-C14 (Kerosene Range)	MJ739	5.60E+00	2.8E+00	U		-	-
C14-C20 (Diesel Range)	MJ739	5.60E+00	2.8E+00	U		-	-
C20-C30 (Lubricant Oil Range)	MJ739	5.60E+00	2.8E+00	U		-	-
C11-C30	MJ739	-	8.4E+00	-		-	-
Benzene	MJ739	-	-	-	1.2E-04	3.4E-04	3.4E-04
Ethylbenzene	MJ739	-	-	-	1.2E-04	3.4E-04	3.4E-04
Toluene	MJ739	-	-	-	1.2E-04	3.4E-04	3.4E-04
m,p-Xylene	MJ739	-	-	-	3.6E-04	1.0E-03	1.0E-03
o-Xylene	MJ739	-	-	-	8.0E-05	2.2E-04	2.2E-04
Xylene (total)	MJ739	-	-	-	4.4E-04	1.2E-03	1.2E-03
2-Methylnaphthalene	MJ739	-	-	-	2.8E-02	7.7E-02	7.7E-02
Acenaphthene	MJ739	-	-	-	5.7E-04	4.8E-03	4.8E-03
Acenaphthylene	MJ739	-	-	-	7.0E-05	5.9E-04	5.9E-04
Anthracene	MJ739	-	-	-	3.7E-04	3.1E-03	3.1E-03
Benzo(a)anthracene	MJ739	-	-	-	2.7E-05	2.3E-04	2.3E-04
Benzo(a)pyrene	MJ739	-	-	-	2.7E-05	2.3E-04	2.3E-04
Benzo(b)fluoranthene	MJ739	-	-	-	4.3E-05	3.6E-04	3.6E-04
Benzo(e)pyrene	MJ739	-	-	-	2.1E-04	1.7E-03	1.7E-03
Benzo(g,h,i)perylene	MJ739	-	-	-	2.2E-04	1.9E-03	1.9E-03
Benzo(k)fluoranthene	MJ739	-	-	-	2.1E-05	1.7E-04	1.7E-04
Chrysene	MJ739	-	-	-	5.9E-05	4.9E-04	4.9E-04
Dibenz(a,h)anthracene	MJ739	-	-	-	1.1E-05	9.3E-05	9.3E-05
Fluoranthene	MJ739	-	-	-	7.5E-05	6.3E-04	6.3E-04
Fluorene	MJ739	-	-	-	5.7E-04	4.8E-03	4.8E-03
Indeno(1,2,3-cd)pyrene	MJ739	-	-	-	2.4E-05	2.0E-04	2.0E-04
Naphthalene	MJ739	-	-	-	6.9E-03	1.9E-02	1.9E-02
Perylene	MJ739	-	-	-	1.2E-04	9.9E-04	9.9E-04
Phenanthrene	MJ739	-	-	-	1.5E-03	1.3E-02	1.3E-02
Pyrene	MJ739	-	-	-	1.4E-04	1.1E-03	1.1E-03
C08-C11 (Gasoline Range)	MJ787	3.00E+00	3.0E+00	J		-	-
C11-C14 (Kerosene Range)	MJ787	6.40E+00	3.2E+00	U		-	-
C14-C20 (Diesel Range)	MJ787	6.00E+00	6.0E+00	J		-	-
C20-C30 (Lubricant Oil Range)	MJ787	2.20E+01	2.2E+01	J		-	-
C11-C30	MJ787	-	3.1E+01	-		-	-
Benzene	MJ787	-	-	-	1.2E-04	3.6E-04	3.6E-04
Ethylbenzene	MJ787	-	-	-	1.2E-04	3.6E-04	3.6E-04
Toluene	MJ787	-	-	-	1.2E-04	3.6E-04	3.6E-04
m,p-Xylene	MJ787	-	-	-	3.6E-04	1.1E-03	1.1E-03
o-Xylene	MJ787	-	-	-	8.0E-05	2.4E-04	2.4E-04
Xylene (total)	MJ787	-	-	-	4.4E-04	1.3E-03	1.3E-03
2-Methylnaphthalene	MJ787	5.20E-03	5.2E-03	J	2.8E-02	8.3E-02	5.2E-03
Acenaphthene	MJ787	2.70E-02	1.4E-02	U	5.7E-04	1.8E-02	1.4E-02
Acenaphthylene	MJ787	2.70E-02	1.4E-02	U	7.0E-05	2.2E-03	2.2E-03
Anthracene	MJ787	2.70E-02	1.4E-02	U	3.7E-04	1.2E-02	1.2E-02
Benzo(a)anthracene	MJ787	9.00E-03	9.0E-03	J	2.7E-05	8.4E-04	9.0E-03
Benzo(a)pyrene	MJ787	3.60E-03	3.6E-03	J	2.7E-05	8.5E-04	3.6E-03
Benzo(b)fluoranthene	MJ787	3.90E-03	3.9E-03	J	4.3E-05	1.4E-03	3.9E-03
Benzo(e)pyrene	MJ787	-	-	-	2.1E-04	6.5E-03	6.5E-03
Benzo(g,h,i)perylene	MJ787	4.80E-03	4.8E-03	J	2.2E-04	6.9E-03	4.8E-03
Benzo(k)fluoranthene	MJ787	2.70E-02	1.4E-02	U	2.1E-05	6.4E-04	6.4E-04
Chrysene	MJ787	2.80E-02	2.8E-02		5.9E-05	1.8E-03	2.8E-02
Dibenz(a,h)anthracene	MJ787	2.70E-02	1.4E-02	U	1.1E-05	3.5E-04	3.5E-04
Fluoranthene	MJ787	1.20E-02	1.2E-02	J	7.5E-05	2.3E-03	1.2E-02
Fluorene	MJ787	2.70E-02	1.4E-02	U	5.7E-04	1.8E-02	1.4E-02
Indeno(1,2,3-cd)pyrene	MJ787	2.70E-02	1.4E-02	U	2.4E-05	7.5E-04	7.5E-04
Naphthalene	MJ787	1.10E-02	1.1E-02	J	6.9E-03	2.1E-02	1.1E-02

TPH to Petroleum Constituent Extrapolation for Soil (0-10 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Perylene	MJ787	-	-	-	1.2E-04	3.7E-03	3.7E-03
Phenanthrene	MJ787	1.00E-02	1.0E-02	J	1.5E-03	4.8E-02	1.0E-02
Pyrene	MJ787	1.20E-02	1.2E-02	J	1.4E-04	4.3E-03	1.2E-02
C08-C11 (Gasoline Range)	MJ788	6.10E+00	3.1E+00	U		-	-
C11-C14 (Kerosene Range)	MJ788	6.10E+00	3.1E+00	U		-	-
C14-C20 (Diesel Range)	MJ788	6.10E+00	3.1E+00	U		-	-
C20-C30 (Lubricant Oil Range)	MJ788	2.50E+00	2.5E+00	J		-	-
C11-C30	MJ788	-	8.6E+00	-		-	-
Benzene	MJ788	-	-	-	1.2E-04	3.7E-04	3.7E-04
Ethylbenzene	MJ788	-	-	-	1.2E-04	3.7E-04	3.7E-04
Toluene	MJ788	-	-	-	1.2E-04	3.7E-04	3.7E-04
m,p-Xylene	MJ788	-	-	-	3.6E-04	1.1E-03	1.1E-03
o-Xylene	MJ788	-	-	-	8.0E-05	2.4E-04	2.4E-04
Xylene (total)	MJ788	-	-	-	4.4E-04	1.3E-03	1.3E-03
2-Methylnaphthalene	MJ788	2.40E-02	1.2E-02	U	2.8E-02	8.4E-02	1.2E-02
Acenaphthene	MJ788	2.40E-02	1.2E-02	U	5.7E-04	4.9E-03	4.9E-03
Acenaphthylene	MJ788	2.40E-02	1.2E-02	U	7.0E-05	6.0E-04	6.0E-04
Anthracene	MJ788	2.40E-02	1.2E-02	U	3.7E-04	3.2E-03	3.2E-03
Benzo(a)anthracene	MJ788	4.10E-03	4.1E-03	J	2.7E-05	2.3E-04	4.1E-03
Benzo(a)pyrene	MJ788	2.40E-02	1.2E-02	U	2.7E-05	2.3E-04	2.3E-04
Benzo(b)fluoranthene	MJ788	2.40E-02	1.2E-02	U	4.3E-05	3.7E-04	3.7E-04
Benzo(e)pyrene	MJ788	-	-	-	2.1E-04	1.8E-03	1.8E-03
Benzo(g,h,i)perylene	MJ788	2.40E-02	1.2E-02	U	2.2E-04	1.9E-03	1.9E-03
Benzo(k)fluoranthene	MJ788	2.40E-02	1.2E-02	U	2.1E-05	1.8E-04	1.8E-04
Chrysene	MJ788	2.40E-02	1.2E-02	U	5.9E-05	5.0E-04	5.0E-04
Dibenz(a,h)anthracene	MJ788	2.40E-02	1.2E-02	U	1.1E-05	9.5E-05	9.5E-05
Fluoranthene	MJ788	2.40E-02	1.2E-02	U	7.5E-05	6.4E-04	6.4E-04
Fluorene	MJ788	2.40E-02	1.2E-02	U	5.7E-04	4.9E-03	4.9E-03
Indeno(1,2,3-cd)pyrene	MJ788	2.40E-02	1.2E-02	U	2.4E-05	2.1E-04	2.1E-04
Naphthalene	MJ788	2.40E-02	1.2E-02	U	6.9E-03	2.1E-02	1.2E-02
Perylene	MJ788	-	-	-	1.2E-04	1.0E-03	1.0E-03
Phenanthrene	MJ788	2.40E-02	1.2E-02	U	1.5E-03	1.3E-02	1.2E-02
Pyrene	MJ788	2.40E-02	1.2E-02	U	1.4E-04	1.2E-03	1.2E-03
C08-C11 (Gasoline Range)	MJ789	2.30E+00	2.3E+00	J		-	-
C11-C14 (Kerosene Range)	MJ789	5.60E+00	2.8E+00	U		-	-
C14-C20 (Diesel Range)	MJ789	3.30E+00	3.3E+00	J		-	-
C20-C30 (Lubricant Oil Range)	MJ789	1.40E+01	1.4E+01	J		-	-
C11-C30	MJ789	-	2.0E+01	-		-	-
Benzene	MJ789	-	-	-	1.2E-04	2.8E-04	2.8E-04
Ethylbenzene	MJ789	-	-	-	1.2E-04	2.8E-04	2.8E-04
Toluene	MJ789	-	-	-	1.2E-04	2.8E-04	2.8E-04
m,p-Xylene	MJ789	-	-	-	3.6E-04	8.3E-04	8.3E-04
o-Xylene	MJ789	-	-	-	8.0E-05	1.8E-04	1.8E-04
Xylene (total)	MJ789	-	-	-	4.4E-04	1.0E-03	1.0E-03
2-Methylnaphthalene	MJ789	2.20E-02	1.1E-02	U	2.8E-02	6.3E-02	1.1E-02
Acenaphthene	MJ789	2.20E-02	1.1E-02	U	5.7E-04	1.2E-02	1.1E-02
Acenaphthylene	MJ789	2.20E-02	1.1E-02	U	7.0E-05	1.4E-03	1.4E-03
Anthracene	MJ789	2.20E-02	1.1E-02	U	3.7E-04	7.5E-03	7.5E-03
Benzo(a)anthracene	MJ789	2.20E-02	1.1E-02	U	2.7E-05	5.4E-04	5.4E-04
Benzo(a)pyrene	MJ789	2.20E-02	1.1E-02	U	2.7E-05	5.5E-04	5.5E-04
Benzo(b)fluoranthene	MJ789	2.20E-02	1.1E-02	U	4.3E-05	8.7E-04	8.7E-04
Benzo(e)pyrene	MJ789	-	-	-	2.1E-04	4.2E-03	4.2E-03
Benzo(g,h,i)perylene	MJ789	2.20E-02	1.1E-02	U	2.2E-04	4.4E-03	4.4E-03
Benzo(k)fluoranthene	MJ789	2.20E-02	1.1E-02	U	2.1E-05	4.1E-04	4.1E-04
Chrysene	MJ789	2.20E-02	1.1E-02	U	5.9E-05	1.2E-03	1.2E-03
Dibenz(a,h)anthracene	MJ789	2.20E-02	1.1E-02	U	1.1E-05	2.2E-04	2.2E-04

TPH to Petroleum Constituent Extrapolation for Soil (0-10 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Fluoranthene	MJ789	2.20E-02	1.1E-02	U	7.5E-05	1.5E-03	1.5E-03
Fluorene	MJ789	2.20E-02	1.1E-02	U	5.7E-04	1.1E-02	1.1E-02
Indeno(1,2,3-cd)pyrene	MJ789	2.20E-02	1.1E-02	U	2.4E-05	4.8E-04	4.8E-04
Naphthalene	MJ789	2.20E-02	1.1E-02	U	6.9E-03	1.6E-02	1.1E-02
Perylene	MJ789	2.20E-02	1.1E-02	U	1.2E-04	2.4E-03	2.4E-03
Phenanthrene	MJ789	2.20E-02	1.1E-02	U	1.5E-03	3.1E-02	1.1E-02
Pyrene	MJ789	2.20E-02	1.1E-02	U	1.4E-04	2.7E-03	2.7E-03
C08-C11 (Gasoline Range)	MJ790	2.70E+00	2.7E+00	J		-	-
C11-C14 (Kerosene Range)	MJ790	6.10E+00	3.1E+00	U		-	-
C14-C20 (Diesel Range)	MJ790	3.10E+00	3.1E+00	J		-	-
C20-C30 (Lubricant Oil Range)	MJ790	1.00E+01	1.0E+01	J		-	-
C11-C30	MJ790	-	1.6E+01	-		-	-
Benzene	MJ790	-	-	-	1.2E-04	3.2E-04	3.2E-04
Ethylbenzene	MJ790	-	-	-	1.2E-04	3.2E-04	3.2E-04
Toluene	MJ790	-	-	-	1.2E-04	3.2E-04	3.2E-04
m,p-Xylene	MJ790	-	-	-	3.6E-04	9.7E-04	9.7E-04
o-Xylene	MJ790	-	-	-	8.0E-05	2.2E-04	2.2E-04
Xylene (total)	MJ790	-	-	-	4.4E-04	1.2E-03	1.2E-03
2-Methylnaphthalene	MJ790	2.40E-02	1.2E-02	U	2.8E-02	7.4E-02	1.2E-02
Acenaphthene	MJ790	2.40E-02	1.2E-02	U	5.7E-04	9.3E-03	9.3E-03
Acenaphthylene	MJ790	2.40E-02	1.2E-02	U	7.0E-05	1.1E-03	1.1E-03
Anthracene	MJ790	2.40E-02	1.2E-02	U	3.7E-04	6.0E-03	6.0E-03
Benzo(a)anthracene	MJ790	2.40E-02	1.2E-02	U	2.7E-05	4.4E-04	4.4E-04
Benzo(a)pyrene	MJ790	2.40E-02	1.2E-02	U	2.7E-05	4.4E-04	4.4E-04
Benzo(b)fluoranthene	MJ790	2.40E-02	1.2E-02	U	4.3E-05	7.0E-04	7.0E-04
Benzo(e)pyrene	MJ790	-	-	-	2.1E-04	3.3E-03	3.3E-03
Benzo(g,h,i)perylene	MJ790	2.40E-02	1.2E-02	U	2.2E-04	3.6E-03	3.6E-03
Benzo(k)fluoranthene	MJ790	2.40E-02	1.2E-02	U	2.1E-05	3.3E-04	3.3E-04
Chrysene	MJ790	2.40E-02	1.2E-02	U	5.9E-05	9.5E-04	9.5E-04
Dibenz(a,h)anthracene	MJ790	2.40E-02	1.2E-02	U	1.1E-05	1.8E-04	1.8E-04
Fluoranthene	MJ790	2.40E-02	1.2E-02	U	7.5E-05	1.2E-03	1.2E-03
Fluorene	MJ790	2.40E-02	1.2E-02	U	5.7E-04	9.2E-03	9.2E-03
Indeno(1,2,3-cd)pyrene	MJ790	2.40E-02	1.2E-02	U	2.4E-05	3.9E-04	3.9E-04
Naphthalene	MJ790	2.40E-02	1.2E-02	U	6.9E-03	1.9E-02	1.2E-02
Perylene	MJ790	-	-	-	1.2E-04	1.9E-03	1.9E-03
Phenanthrene	MJ790	2.40E-02	1.2E-02	U	1.5E-03	2.5E-02	1.2E-02
Pyrene	MJ790	2.40E-02	1.2E-02	U	1.4E-04	2.2E-03	2.2E-03
C08-C11 (Gasoline Range)	MJ791	5.80E+00	2.9E+00	U		-	-
C11-C14 (Kerosene Range)	MJ791	5.80E+00	2.9E+00	U		-	-
C14-C20 (Diesel Range)	MJ791	5.80E+00	2.9E+00	U		-	-
C20-C30 (Lubricant Oil Range)	MJ791	5.80E+00	2.9E+00	U		-	-
C11-C30	MJ791	-	8.7E+00	-		-	-
Benzene	MJ791	-	-	-	1.2E-04	3.5E-04	3.5E-04
Ethylbenzene	MJ791	-	-	-	1.2E-04	3.5E-04	3.5E-04
Toluene	MJ791	-	-	-	1.2E-04	3.5E-04	3.5E-04
m,p-Xylene	MJ791	-	-	-	3.6E-04	1.0E-03	1.0E-03
o-Xylene	MJ791	-	-	-	8.0E-05	2.3E-04	2.3E-04
Xylene (total)	MJ791	-	-	-	4.4E-04	1.3E-03	1.3E-03
2-Methylnaphthalene	MJ791	2.30E-02	1.2E-02	U	2.8E-02	8.0E-02	1.2E-02
Acenaphthene	MJ791	2.30E-02	1.2E-02	U	5.7E-04	5.0E-03	5.0E-03
Acenaphthylene	MJ791	2.30E-02	1.2E-02	U	7.0E-05	6.1E-04	6.1E-04
Anthracene	MJ791	2.30E-02	1.2E-02	U	3.7E-04	3.2E-03	3.2E-03
Benzo(a)anthracene	MJ791	3.30E-03	3.3E-03	J	2.7E-05	2.3E-04	3.3E-03
Benzo(a)pyrene	MJ791	2.30E-02	1.2E-02	U	2.7E-05	2.4E-04	2.4E-04
Benzo(b)fluoranthene	MJ791	2.30E-02	1.2E-02	U	4.3E-05	3.8E-04	3.8E-04
Benzo(e)pyrene	MJ791	-	-	-	2.1E-04	1.8E-03	1.8E-03

TPH to Petroleum Constituent Extrapolation for Soil (0-10 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Benzo(g,h,i)perylene	MJ791	2.30E-02	1.2E-02	U	2.2E-04	1.9E-03	1.9E-03
Benzo(k)fluoranthene	MJ791	2.30E-02	1.2E-02	U	2.1E-05	1.8E-04	1.8E-04
Chrysene	MJ791	2.30E-02	1.2E-02	U	5.9E-05	5.1E-04	5.1E-04
Dibenz(a,h)anthracene	MJ791	2.30E-02	1.2E-02	U	1.1E-05	9.6E-05	9.6E-05
Fluoranthene	MJ791	2.30E-02	1.2E-02	U	7.5E-05	6.5E-04	6.5E-04
Fluorene	MJ791	2.30E-02	1.2E-02	U	5.7E-04	4.9E-03	4.9E-03
Indeno(1,2,3-cd)pyrene	MJ791	2.30E-02	1.2E-02	U	2.4E-05	2.1E-04	2.1E-04
Naphthalene	MJ791	2.30E-02	1.2E-02	U	6.9E-03	2.0E-02	1.2E-02
Perylene	MJ791	-	-	-	1.2E-04	1.0E-03	1.0E-03
Phenanthrene	MJ791	2.30E-02	1.2E-02	U	1.5E-03	1.3E-02	1.2E-02
Pyrene	MJ791	2.30E-02	1.2E-02	U	1.4E-04	1.2E-03	1.2E-03
C08-C11 (Gasoline Range)	MJ794	6.00E+00	3.0E+00	U		-	-
C11-C14 (Kerosene Range)	MJ794	6.00E+00	3.0E+00	U		-	-
C14-C20 (Diesel Range)	MJ794	6.00E+00	3.0E+00	U		-	-
C20-C30 (Lubricant Oil Range)	MJ794	7.70E+00	7.7E+00	J		-	-
C11-C30	MJ794	-	1.4E+01	-		-	-
Benzene	MJ794	-	-	-	1.2E-04	3.6E-04	3.6E-04
Ethylbenzene	MJ794	-	-	-	1.2E-04	3.6E-04	3.6E-04
Toluene	MJ794	-	-	-	1.2E-04	3.6E-04	3.6E-04
m,p-Xylene	MJ794	-	-	-	3.6E-04	1.1E-03	1.1E-03
o-Xylene	MJ794	-	-	-	8.0E-05	2.4E-04	2.4E-04
Xylene (total)	MJ794	-	-	-	4.4E-04	1.3E-03	1.3E-03
2-Methylnaphthalene	MJ794	2.40E-02	1.2E-02	U	2.8E-02	8.3E-02	1.2E-02
Acenaphthene	MJ794	2.40E-02	1.2E-02	U	5.7E-04	7.8E-03	7.8E-03
Acenaphthylene	MJ794	2.40E-02	1.2E-02	U	7.0E-05	9.6E-04	9.6E-04
Anthracene	MJ794	2.40E-02	1.2E-02	U	3.7E-04	5.1E-03	5.1E-03
Benzo(a)anthracene	MJ794	4.40E-03	4.4E-03	J	2.7E-05	3.7E-04	4.4E-03
Benzo(a)pyrene	MJ794	2.40E-02	1.2E-02	U	2.7E-05	3.7E-04	3.7E-04
Benzo(b)fluoranthene	MJ794	2.40E-02	1.2E-02	U	4.3E-05	5.9E-04	5.9E-04
Benzo(e)pyrene	MJ794	-	-	-	2.1E-04	2.8E-03	2.8E-03
Benzo(g,h,i)perylene	MJ794	2.40E-02	1.2E-02	U	2.2E-04	3.0E-03	3.0E-03
Benzo(k)fluoranthene	MJ794	2.40E-02	1.2E-02	U	2.1E-05	2.8E-04	2.8E-04
Chrysene	MJ794	2.40E-02	1.2E-02	U	5.9E-05	8.0E-04	8.0E-04
Dibenz(a,h)anthracene	MJ794	2.40E-02	1.2E-02	U	1.1E-05	1.5E-04	1.5E-04
Fluoranthene	MJ794	2.40E-02	1.2E-02	U	7.5E-05	1.0E-03	1.0E-03
Fluorene	MJ794	2.40E-02	1.2E-02	U	5.7E-04	7.8E-03	7.8E-03
Indeno(1,2,3-cd)pyrene	MJ794	2.40E-02	1.2E-02	U	2.4E-05	3.3E-04	3.3E-04
Naphthalene	MJ794	2.40E-02	1.2E-02	U	6.9E-03	2.1E-02	1.2E-02
Perylene	MJ794	-	-	-	1.2E-04	1.6E-03	1.6E-03
Phenanthrene	MJ794	2.40E-02	1.2E-02	U	1.5E-03	2.1E-02	1.2E-02
Pyrene	MJ794	2.40E-02	1.2E-02	U	1.4E-04	1.9E-03	1.9E-03
C08-C11 (Gasoline Range)	MJ795	2.10E+01	1.1E+01	U		-	-
C11-C14 (Kerosene Range)	MJ795	2.10E+01	1.1E+01	U		-	-
C14-C20 (Diesel Range)	MJ795	2.10E+01	1.1E+01	U		-	-
C20-C30 (Lubricant Oil Range)	MJ795	2.80E+01	2.8E+01	J		-	-
C11-C30	MJ795	-	4.9E+01	-		-	-
Benzene	MJ795	-	-	-	1.2E-04	1.3E-03	1.3E-03
Ethylbenzene	MJ795	-	-	-	1.2E-04	1.3E-03	1.3E-03
Toluene	MJ795	-	-	-	1.2E-04	1.3E-03	1.3E-03
m,p-Xylene	MJ795	-	-	-	3.6E-04	3.8E-03	3.8E-03
o-Xylene	MJ795	-	-	-	8.0E-05	8.4E-04	8.4E-04
Xylene (total)	MJ795	-	-	-	4.4E-04	4.6E-03	4.6E-03
2-Methylnaphthalene	MJ795	1.10E-02	1.1E-02	J	2.8E-02	2.9E-01	1.1E-02
Acenaphthene	MJ795	1.50E-02	1.5E-02	J	5.7E-04	2.8E-02	1.5E-02
Acenaphthylene	MJ795	2.80E-02	1.4E-02	U	7.0E-05	3.4E-03	3.4E-03
Anthracene	MJ795	2.80E-02	1.4E-02	U	3.7E-04	1.8E-02	1.4E-02

TPH to Petroleum Constituent Extrapolation for Soil (0-10 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Benzo(a)anthracene	MJ795	6.30E-03	6.3E-03	J	2.7E-05	1.3E-03	6.3E-03
Benzo(a)pyrene	MJ795	2.80E-02	1.4E-02	U	2.7E-05	1.3E-03	1.3E-03
Benzo(b)fluoranthene	MJ795	2.80E-02	1.4E-02	U	4.3E-05	2.1E-03	2.1E-03
Benzo(e)pyrene	MJ795	-	-	-	2.1E-04	1.0E-02	1.0E-02
Benzo(g,h,i)perylene	MJ795	2.80E-02	1.4E-02	U	2.2E-04	1.1E-02	1.1E-02
Benzo(k)fluoranthene	MJ795	2.80E-02	1.4E-02	U	2.1E-05	1.0E-03	1.0E-03
Chrysene	MJ795	2.80E-02	1.4E-02	U	5.9E-05	2.9E-03	2.9E-03
Dibenz(a,h)anthracene	MJ795	2.80E-02	1.4E-02	U	1.1E-05	5.4E-04	5.4E-04
Fluoranthene	MJ795	5.80E-03	5.8E-03	J	7.5E-05	3.7E-03	5.8E-03
Fluorene	MJ795	2.80E-02	1.4E-02	U	5.7E-04	2.8E-02	1.4E-02
Indeno(1,2,3-cd)pyrene	MJ795	2.80E-02	1.4E-02	U	2.4E-05	1.2E-03	1.2E-03
Naphthalene	MJ795	2.20E-02	2.2E-02	J	6.9E-03	7.3E-02	2.2E-02
Perylene	MJ795	-	-	-	1.2E-04	5.8E-03	5.8E-03
Phenanthrene	MJ795	9.40E-03	9.4E-03	J	1.5E-03	7.5E-02	9.4E-03
Pyrene	MJ795	1.90E-02	1.9E-02	J	1.4E-04	6.7E-03	1.9E-02
C08-C11 (Gasoline Range)	MJ796	1.30E+01	6.5E+00	U		-	-
C11-C14 (Kerosene Range)	MJ796	1.30E+01	6.5E+00	U		-	-
C14-C20 (Diesel Range)	MJ796	8.50E+00	8.5E+00	J		-	-
C20-C30 (Lubricant Oil Range)	MJ796	2.10E+01	2.1E+01	J		-	-
C11-C30	MJ796	-	3.6E+01	-		-	-
Benzene	MJ796	-	-	-	1.2E-04	7.8E-04	7.8E-04
Ethylbenzene	MJ796	-	-	-	1.2E-04	7.8E-04	7.8E-04
Toluene	MJ796	-	-	-	1.2E-04	7.8E-04	7.8E-04
m,p-Xylene	MJ796	-	-	-	3.6E-04	2.3E-03	2.3E-03
o-Xylene	MJ796	-	-	-	8.0E-05	5.2E-04	5.2E-04
Xylene (total)	MJ796	-	-	-	4.4E-04	2.9E-03	2.9E-03
2-Methylnaphthalene	MJ796	2.60E-02	1.3E-02	U	2.8E-02	1.8E-01	1.3E-02
Acenaphthene	MJ796	2.60E-02	1.3E-02	U	5.7E-04	2.1E-02	1.3E-02
Acenaphthylene	MJ796	2.60E-02	1.3E-02	U	7.0E-05	2.5E-03	2.5E-03
Anthracene	MJ796	2.60E-02	1.3E-02	U	3.7E-04	1.3E-02	1.3E-02
Benzo(a)anthracene	MJ796	5.70E-03	5.7E-03	J	2.7E-05	9.7E-04	5.7E-03
Benzo(a)pyrene	MJ796	2.60E-02	1.3E-02	U	2.7E-05	9.8E-04	9.8E-04
Benzo(b)fluoranthene	MJ796	2.60E-02	1.3E-02	U	4.3E-05	1.6E-03	1.6E-03
Benzo(e)pyrene	MJ796	-	-	-	2.1E-04	7.4E-03	7.4E-03
Benzo(g,h,i)perylene	MJ796	2.60E-02	1.3E-02	U	2.2E-04	8.0E-03	8.0E-03
Benzo(k)fluoranthene	MJ796	2.60E-02	1.3E-02	U	2.1E-05	7.4E-04	7.4E-04
Chrysene	MJ796	7.20E-03	7.2E-03	J	5.9E-05	2.1E-03	7.2E-03
Dibenz(a,h)anthracene	MJ796	2.60E-02	1.3E-02	U	1.1E-05	4.0E-04	4.0E-04
Fluoranthene	MJ796	5.50E-03	5.5E-03	J	7.5E-05	2.7E-03	5.5E-03
Fluorene	MJ796	2.60E-02	1.3E-02	U	5.7E-04	2.0E-02	1.3E-02
Indeno(1,2,3-cd)pyrene	MJ796	2.60E-02	1.3E-02	U	2.4E-05	8.7E-04	8.7E-04
Naphthalene	MJ796	6.20E-03	6.2E-03	J	6.9E-03	4.5E-02	6.2E-03
Perylene	MJ796	-	-	-	1.2E-04	4.2E-03	4.2E-03
Phenanthrene	MJ796	2.60E-02	1.3E-02	U	1.5E-03	5.5E-02	1.3E-02
Pyrene	MJ796	5.90E-03	5.9E-03	J	1.4E-04	4.9E-03	5.9E-03
C08-C11 (Gasoline Range)	MJ798	7.30E+00	7.3E+00	J		-	-
C11-C14 (Kerosene Range)	MJ798	3.30E+00	3.3E+00	J		-	-
C14-C20 (Diesel Range)	MJ798	1.10E+01	1.1E+01	J		-	-
C20-C30 (Lubricant Oil Range)	MJ798	6.40E+01	6.4E+01			-	-
C11-C30	MJ798	-	7.8E+01	-		-	-
Benzene	MJ798	-	-	-	1.2E-04	8.8E-04	8.8E-04
Ethylbenzene	MJ798	-	-	-	1.2E-04	8.8E-04	8.8E-04
Toluene	MJ798	-	-	-	1.2E-04	8.8E-04	8.8E-04
m,p-Xylene	MJ798	-	-	-	3.6E-04	2.6E-03	2.6E-03
o-Xylene	MJ798	-	-	-	8.0E-05	5.8E-04	5.8E-04
Xylene (total)	MJ798	-	-	-	4.4E-04	3.2E-03	3.2E-03

TPH to Petroleum Constituent Extrapolation for Soil (0-10 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
2-Methylnaphthalene	MJ798	7.10E-03	7.1E-03	J	2.8E-02	2.0E-01	7.1E-03
Acenaphthene	MJ798	1.30E-02	1.3E-02	J	5.7E-04	4.5E-02	1.3E-02
Acenaphthylene	MJ798	2.20E-02	1.1E-02	U	7.0E-05	5.5E-03	5.5E-03
Anthracene	MJ798	2.20E-02	1.1E-02	U	3.7E-04	2.9E-02	1.1E-02
Benzo(a)anthracene	MJ798	2.20E-02	1.1E-02	U	2.7E-05	2.1E-03	2.1E-03
Benzo(a)pyrene	MJ798	5.90E-03	5.9E-03	J	2.7E-05	2.1E-03	5.9E-03
Benzo(b)fluoranthene	MJ798	2.20E-02	1.1E-02	U	4.3E-05	3.4E-03	3.4E-03
Benzo(e)pyrene	MJ798	-	-	-	2.1E-04	1.6E-02	1.6E-02
Benzo(g,h,i)perylene	MJ798	4.90E-03	4.9E-03	J	2.2E-04	1.7E-02	4.9E-03
Benzo(k)fluoranthene	MJ798	1.40E-02	1.4E-02	J	2.1E-05	1.6E-03	1.4E-02
Chrysene	MJ798	5.30E-02	5.3E-02		5.9E-05	4.6E-03	5.3E-02
Dibenz(a,h)anthracene	MJ798	2.20E-02	1.1E-02	U	1.1E-05	8.7E-04	8.7E-04
Fluoranthene	MJ798	2.10E-02	2.1E-02	J	7.5E-05	5.9E-03	2.1E-02
Fluorene	MJ798	2.20E-02	1.1E-02	U	5.7E-04	4.4E-02	1.1E-02
Indeno(1,2,3-cd)pyrene	MJ798	2.20E-02	1.1E-02	U	2.4E-05	1.9E-03	1.9E-03
Naphthalene	MJ798	9.10E-03	9.1E-03	J	6.9E-03	5.1E-02	9.1E-03
Perylene	MJ798	-	-	-	1.2E-04	9.2E-03	9.2E-03
Phenanthrene	MJ798	1.10E-02	1.1E-02	J	1.5E-03	1.2E-01	1.1E-02
Pyrene	MJ798	1.80E-02	1.8E-02	J	1.4E-04	1.1E-02	1.8E-02
C08-C11 (Gasoline Range)	MJ799	5.40E+00	2.7E+00	U		-	-
C11-C14 (Kerosene Range)	MJ799	5.40E+00	2.7E+00	U		-	-
C14-C20 (Diesel Range)	MJ799	2.70E+00	2.7E+00	J		-	-
C20-C30 (Lubricant Oil Range)	MJ799	1.60E+01	1.6E+01	J		-	-
C11-C30	MJ799	-	2.1E+01	-		-	-
Benzene	MJ799	-	-	-	1.2E-04	3.2E-04	3.2E-04
Ethylbenzene	MJ799	-	-	-	1.2E-04	3.2E-04	3.2E-04
Toluene	MJ799	-	-	-	1.2E-04	3.2E-04	3.2E-04
m,p-Xylene	MJ799	-	-	-	3.6E-04	9.7E-04	9.7E-04
o-Xylene	MJ799	-	-	-	8.0E-05	2.2E-04	2.2E-04
Xylene (total)	MJ799	-	-	-	4.4E-04	1.2E-03	1.2E-03
2-Methylnaphthalene	MJ799	2.20E-02	1.1E-02	U	2.8E-02	7.4E-02	1.1E-02
Acenaphthene	MJ799	2.20E-02	1.1E-02	U	5.7E-04	1.2E-02	1.1E-02
Acenaphthylene	MJ799	2.20E-02	1.1E-02	U	7.0E-05	1.5E-03	1.5E-03
Anthracene	MJ799	2.20E-02	1.1E-02	U	3.7E-04	8.0E-03	8.0E-03
Benzo(a)anthracene	MJ799	3.40E-03	3.4E-03	J	2.7E-05	5.8E-04	3.4E-03
Benzo(a)pyrene	MJ799	2.20E-02	1.1E-02	U	2.7E-05	5.8E-04	5.8E-04
Benzo(b)fluoranthene	MJ799	2.20E-02	1.1E-02	U	4.3E-05	9.3E-04	9.3E-04
Benzo(e)pyrene	MJ799	-	-	-	2.1E-04	4.4E-03	4.4E-03
Benzo(g,h,i)perylene	MJ799	2.20E-02	1.1E-02	U	2.2E-04	4.7E-03	4.7E-03
Benzo(k)fluoranthene	MJ799	2.20E-02	1.1E-02	U	2.1E-05	4.4E-04	4.4E-04
Chrysene	MJ799	2.20E-02	1.1E-02	U	5.9E-05	1.3E-03	1.3E-03
Dibenz(a,h)anthracene	MJ799	2.20E-02	1.1E-02	U	1.1E-05	2.4E-04	2.4E-04
Fluoranthene	MJ799	2.20E-02	1.1E-02	U	7.5E-05	1.6E-03	1.6E-03
Fluorene	MJ799	2.20E-02	1.1E-02	U	5.7E-04	1.2E-02	1.1E-02
Indeno(1,2,3-cd)pyrene	MJ799	2.20E-02	1.1E-02	U	2.4E-05	5.1E-04	5.1E-04
Naphthalene	MJ799	2.20E-02	1.1E-02	U	6.9E-03	1.9E-02	1.1E-02
Perylene	MJ799	-	-	-	1.2E-04	2.5E-03	2.5E-03
Phenanthrene	MJ799	2.20E-02	1.1E-02	U	1.5E-03	3.3E-02	1.1E-02
Pyrene	MJ799	2.20E-02	1.1E-02	U	1.4E-04	2.9E-03	2.9E-03
C08-C11 (Gasoline Range)	MJ800	1.10E+01	5.5E+00	U		-	-
C11-C14 (Kerosene Range)	MJ800	1.10E+01	5.5E+00	U		-	-
C14-C20 (Diesel Range)	MJ800	1.10E+01	5.5E+00	U		-	-
C20-C30 (Lubricant Oil Range)	MJ800	5.20E+00	5.2E+00	J		-	-
C11-C30	MJ800	-	1.6E+01	-		-	-
Benzene	MJ800	-	-	-	1.2E-04	6.6E-04	6.6E-04
Ethylbenzene	MJ800	-	-	-	1.2E-04	6.6E-04	6.6E-04

TPH to Petroleum Constituent Extrapolation for Soil (0-10 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Toluene	MJ800	-	-	-	1.2E-04	6.6E-04	6.6E-04
m,p-Xylene	MJ800	-	-	-	3.6E-04	2.0E-03	2.0E-03
o-Xylene	MJ800	-	-	-	8.0E-05	4.4E-04	4.4E-04
Xylene (total)	MJ800	-	-	-	4.4E-04	2.4E-03	2.4E-03
2-Methylnaphthalene	MJ800	2.20E-02	1.1E-02	U	2.8E-02	1.5E-01	1.1E-02
Acenaphthene	MJ800	2.20E-02	1.1E-02	U	5.7E-04	9.3E-03	9.3E-03
Acenaphthylene	MJ800	2.20E-02	1.1E-02	U	7.0E-05	1.1E-03	1.1E-03
Anthracene	MJ800	2.20E-02	1.1E-02	U	3.7E-04	6.0E-03	6.0E-03
Benzo(a)anthracene	MJ800	2.20E-02	1.1E-02	U	2.7E-05	4.4E-04	4.4E-04
Benzo(a)pyrene	MJ800	2.20E-02	1.1E-02	U	2.7E-05	4.4E-04	4.4E-04
Benzo(b)fluoranthene	MJ800	2.20E-02	1.1E-02	U	4.3E-05	7.0E-04	7.0E-04
Benzo(e)pyrene	MJ800	-	-	-	2.1E-04	3.3E-03	3.3E-03
Benzo(g,h,i)perylene	MJ800	2.20E-02	1.1E-02	U	2.2E-04	3.6E-03	3.6E-03
Benzo(k)fluoranthene	MJ800	2.20E-02	1.1E-02	U	2.1E-05	3.3E-04	3.3E-04
Chrysene	MJ800	2.20E-02	1.1E-02	U	5.9E-05	9.5E-04	9.5E-04
Dibenz(a,h)anthracene	MJ800	2.20E-02	1.1E-02	U	1.1E-05	1.8E-04	1.8E-04
Fluoranthene	MJ800	2.20E-02	1.1E-02	U	7.5E-05	1.2E-03	1.2E-03
Fluorene	MJ800	2.20E-02	1.1E-02	U	5.7E-04	9.2E-03	9.2E-03
Indeno(1,2,3-cd)pyrene	MJ800	2.20E-02	1.1E-02	U	2.4E-05	3.9E-04	3.9E-04
Naphthalene	MJ800	2.20E-02	1.1E-02	U	6.9E-03	3.8E-02	1.1E-02
Perylene	MJ800	-	-	-	1.2E-04	1.9E-03	1.9E-03
Phenanthrene	MJ800	2.20E-02	1.1E-02	U	1.5E-03	2.5E-02	1.1E-02
Pyrene	MJ800	2.20E-02	1.1E-02	U	1.4E-04	2.2E-03	2.2E-03
C08-C11 (Gasoline Range)	MJ806	5.70E+00	2.9E+00	U		-	-
C11-C14 (Kerosene Range)	MJ806	5.70E+00	2.9E+00	U		-	-
C14-C20 (Diesel Range)	MJ806	5.70E+00	2.9E+00	U		-	-
C20-C30 (Lubricant Oil Range)	MJ806	1.80E+01	1.8E+01	J		-	-
C11-C30	MJ806	-	2.4E+01	-		-	-
Benzene	MJ806	-	-	-	1.2E-04	3.4E-04	3.4E-04
Ethylbenzene	MJ806	-	-	-	1.2E-04	3.4E-04	3.4E-04
Toluene	MJ806	-	-	-	1.2E-04	3.4E-04	3.4E-04
m,p-Xylene	MJ806	-	-	-	3.6E-04	1.0E-03	1.0E-03
o-Xylene	MJ806	-	-	-	8.0E-05	2.3E-04	2.3E-04
Xylene (total)	MJ806	-	-	-	4.4E-04	1.3E-03	1.3E-03
2-Methylnaphthalene	MJ806	7.50E-03	7.5E-03	J	2.8E-02	7.9E-02	7.5E-03
Acenaphthene	MJ806	2.30E-02	1.2E-02	U	5.7E-04	1.4E-02	1.2E-02
Acenaphthylene	MJ806	2.30E-02	1.2E-02	U	7.0E-05	1.7E-03	1.7E-03
Anthracene	MJ806	2.30E-02	1.2E-02	U	3.7E-04	8.8E-03	8.8E-03
Benzo(a)anthracene	MJ806	2.30E-02	1.2E-02	U	2.7E-05	6.4E-04	6.4E-04
Benzo(a)pyrene	MJ806	2.60E-03	2.6E-03	J	2.7E-05	6.4E-04	2.6E-03
Benzo(b)fluoranthene	MJ806	2.20E-03	2.2E-03	J	4.3E-05	1.0E-03	2.2E-03
Benzo(e)pyrene	MJ806	-	-	-	2.1E-04	4.9E-03	4.9E-03
Benzo(g,h,i)perylene	MJ806	2.30E-02	1.2E-02	U	2.2E-04	5.2E-03	5.2E-03
Benzo(k)fluoranthene	MJ806	2.30E-02	1.2E-02	U	2.1E-05	4.9E-04	4.9E-04
Chrysene	MJ806	1.00E-02	1.0E-02	J	5.9E-05	1.4E-03	1.0E-02
Dibenz(a,h)anthracene	MJ806	2.30E-02	1.2E-02	U	1.1E-05	2.6E-04	2.6E-04
Fluoranthene	MJ806	3.90E-03	3.9E-03	J	7.5E-05	1.8E-03	3.9E-03
Fluorene	MJ806	2.30E-02	1.2E-02	U	5.7E-04	1.3E-02	1.2E-02
Indeno(1,2,3-cd)pyrene	MJ806	2.30E-02	1.2E-02	U	2.4E-05	5.7E-04	5.7E-04
Naphthalene	MJ806	7.90E-03	7.9E-03	J	6.9E-03	2.0E-02	7.9E-03
Perylene	MJ806	-	-	-	1.2E-04	2.8E-03	2.8E-03
Phenanthrene	MJ806	2.30E-02	1.2E-02	U	1.5E-03	3.6E-02	1.2E-02
Pyrene	MJ806	9.30E-03	9.3E-03	J	1.4E-04	3.2E-03	9.3E-03
C08-C11 (Gasoline Range)	MJ808	5.90E+00	3.0E+00	U		-	-
C11-C14 (Kerosene Range)	MJ808	5.90E+00	3.0E+00	U		-	-
C14-C20 (Diesel Range)	MJ808	7.00E+00	7.0E+00	J		-	-

TPH to Petroleum Constituent Extrapolation for Soil (0-10 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
C20-C30 (Lubricant Oil Range)	MJ808	8.80E+00	8.8E+00	J		-	-
C11-C30	MJ808	-	1.9E+01	-		-	-
Benzene	MJ808	-	-	-	1.2E-04	3.5E-04	3.5E-04
Ethylbenzene	MJ808	-	-	-	1.2E-04	3.5E-04	3.5E-04
Toluene	MJ808	-	-	-	1.2E-04	3.5E-04	3.5E-04
m,p-Xylene	MJ808	-	-	-	3.6E-04	1.1E-03	1.1E-03
o-Xylene	MJ808	-	-	-	8.0E-05	2.4E-04	2.4E-04
Xylene (total)	MJ808	-	-	-	4.4E-04	1.3E-03	1.3E-03
2-Methylnaphthalene	MJ808	2.50E-02	1.3E-02	U	2.8E-02	8.1E-02	1.3E-02
Acenaphthene	MJ808	2.50E-02	1.3E-02	U	5.7E-04	1.1E-02	1.1E-02
Acenaphthylene	MJ808	2.50E-02	1.3E-02	U	7.0E-05	1.3E-03	1.3E-03
Anthracene	MJ808	2.50E-02	1.3E-02	U	3.7E-04	7.0E-03	7.0E-03
Benzo(a)anthracene	MJ808	5.50E-03	5.5E-03	J	2.7E-05	5.1E-04	5.5E-03
Benzo(a)pyrene	MJ808	2.50E-02	1.3E-02	U	2.7E-05	5.1E-04	5.1E-04
Benzo(b)fluoranthene	MJ808	2.30E-03	2.3E-03	J	4.3E-05	8.1E-04	2.3E-03
Benzo(e)pyrene	MJ808	-	-	-	2.1E-04	3.9E-03	3.9E-03
Benzo(g,h,i)perylene	MJ808	2.50E-02	1.3E-02	U	2.2E-04	4.1E-03	4.1E-03
Benzo(k)fluoranthene	MJ808	2.50E-02	1.3E-02	U	2.1E-05	3.8E-04	3.8E-04
Chrysene	MJ808	7.80E-03	7.8E-03	J	5.9E-05	1.1E-03	7.8E-03
Dibenz(a,h)anthracene	MJ808	2.50E-02	1.3E-02	U	1.1E-05	2.1E-04	2.1E-04
Fluoranthene	MJ808	6.10E-03	6.1E-03	J	7.5E-05	1.4E-03	6.1E-03
Fluorene	MJ808	2.50E-02	1.3E-02	U	5.7E-04	1.1E-02	1.1E-02
Indeno(1,2,3-cd)pyrene	MJ808	2.50E-02	1.3E-02	U	2.4E-05	4.5E-04	4.5E-04
Naphthalene	MJ808	2.50E-02	1.3E-02	U	6.9E-03	2.0E-02	1.3E-02
Perylene	MJ808	-	-	-	1.2E-04	2.2E-03	2.2E-03
Phenanthrene	MJ808	2.50E-02	1.3E-02	U	1.5E-03	2.9E-02	1.3E-02
Pyrene	MJ808	5.10E-03	5.1E-03	J	1.4E-04	2.6E-03	5.1E-03

Notes:

a. Petroleum constituent concentrations estimated and selected as described in Section 2.8 of the SRAM.

"-" not applicable

EF - extrapolation factor

mg/kg - milligrams per kilogram

Aroclor to PCB Congener Extrapolation for Soil (0-10 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentrations (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF_{1254}	EF_{1260}	Estimated Concentrations Aroclor-1254 (mg/kg)	Estimated Concentrations Aroclor-1260 (mg/kg)	Estimated Concentrations PCB_{MAX} (mg/kg)
Aroclor-1254	MJ669	7.5E-02	7.5E-02	J	-	-	-	-	-
Aroclor-1260	MJ669	4.3E-02	4.3E-02	J	-	-	-	-	-
PCB-105	MJ669	-	-	-	1.2E-01	8.2E-02	9.3E-06	3.5E-06	9.3E-06
PCB-114	MJ669	-	-	-	4.5E-03	1.5E-03	3.4E-07	6.3E-08	3.4E-07
PCB-118	MJ669	-	-	-	2.7E-01	1.6E-01	2.0E-05	7.0E-06	2.0E-05
PCB-123	MJ669	-	-	-	3.0E-03	2.3E-03	2.2E-07	1.0E-07	2.2E-07
PCB-126	MJ669	-	-	-	7.5E-03	6.4E-03	5.6E-07	2.7E-07	5.6E-07
PCB-156	MJ669	-	-	-	6.3E-02	5.5E-02	4.7E-06	2.3E-06	4.7E-06
PCB-157	MJ669	-	-	-	1.2E-02	2.5E-02	9.3E-07	1.1E-06	1.1E-06
PCB-167	MJ669	-	-	-	2.1E-02	4.3E-02	1.5E-06	1.8E-06	1.8E-06
PCB-169	MJ669	-	-	-	3.7E-04	6.4E-04	2.7E-08	2.7E-08	2.7E-08
PCB-189	MJ669	-	-	-	3.0E-03	6.4E-03	2.2E-07	2.7E-07	2.7E-07
PCB-77	MJ669	-	-	-	1.5E-02	1.3E-02	1.2E-06	5.5E-07	1.2E-06
PCB-81	MJ669	-	-	-	3.0E-03	2.3E-03	2.2E-07	9.7E-08	2.2E-07
Aroclor-1254	MJ670	3.7E-02	3.7E-02	J	-	-	-	-	-
Aroclor-1260	MJ670	4.6E-02	4.6E-02	J	-	-	-	-	-
PCB-105	MJ670	-	-	-	1.2E-01	8.2E-02	4.6E-06	3.8E-06	4.6E-06
PCB-114	MJ670	-	-	-	4.5E-03	1.5E-03	1.7E-07	6.7E-08	1.7E-07
PCB-118	MJ670	-	-	-	2.7E-01	1.6E-01	9.9E-06	7.5E-06	9.9E-06
PCB-123	MJ670	-	-	-	3.0E-03	2.3E-03	1.1E-07	1.1E-07	1.1E-07
PCB-126	MJ670	-	-	-	7.5E-03	6.4E-03	2.8E-07	2.9E-07	2.9E-07
PCB-156	MJ670	-	-	-	6.3E-02	5.5E-02	2.3E-06	2.5E-06	2.5E-06
PCB-157	MJ670	-	-	-	1.2E-02	2.5E-02	4.6E-07	1.1E-06	1.1E-06
PCB-167	MJ670	-	-	-	2.1E-02	4.3E-02	7.6E-07	2.0E-06	2.0E-06
PCB-169	MJ670	-	-	-	3.7E-04	6.4E-04	1.4E-08	2.9E-08	2.9E-08
PCB-189	MJ670	-	-	-	3.0E-03	6.4E-03	1.1E-07	2.9E-07	2.9E-07
PCB-77	MJ670	-	-	-	1.5E-02	1.3E-02	5.7E-07	5.9E-07	5.9E-07
PCB-81	MJ670	-	-	-	3.0E-03	2.3E-03	1.1E-07	1.0E-07	1.1E-07
Aroclor-1254	MJ671	1.2E-01	1.2E-01	J	-	-	-	-	-
Aroclor-1260	MJ671	8.5E-02	8.5E-02	J	-	-	-	-	-
PCB-105	MJ671	-	-	-	1.2E-01	8.2E-02	1.5E-05	7.0E-06	1.5E-05
PCB-114	MJ671	-	-	-	4.5E-03	1.5E-03	5.4E-07	1.2E-07	5.4E-07
PCB-118	MJ671	-	-	-	2.7E-01	1.6E-01	3.2E-05	1.4E-05	3.2E-05
PCB-123	MJ671	-	-	-	3.0E-03	2.3E-03	3.6E-07	2.0E-07	3.6E-07
PCB-126	MJ671	-	-	-	7.5E-03	6.4E-03	9.0E-07	5.4E-07	9.0E-07
PCB-156	MJ671	-	-	-	6.3E-02	5.5E-02	7.5E-06	4.6E-06	7.5E-06
PCB-157	MJ671	-	-	-	1.2E-02	2.5E-02	1.5E-06	2.1E-06	2.1E-06
PCB-167	MJ671	-	-	-	2.1E-02	4.3E-02	2.5E-06	3.6E-06	3.6E-06
PCB-169	MJ671	-	-	-	3.7E-04	6.4E-04	4.4E-08	5.4E-08	5.4E-08
PCB-189	MJ671	-	-	-	3.0E-03	6.4E-03	3.6E-07	5.4E-07	5.4E-07
PCB-77	MJ671	-	-	-	1.5E-02	1.3E-02	1.9E-06	1.1E-06	1.9E-06
PCB-81	MJ671	-	-	-	3.0E-03	2.3E-03	3.6E-07	1.9E-07	3.6E-07
Aroclor-1254	MJ683	4.0E-01	2.0E-01	U	-	-	-	-	-
Aroclor-1260	MJ683	9.5E-02	9.5E-02		-	-	-	-	-
PCB-105	MJ683	-	-	-	1.2E-01	8.2E-02	2.5E-05	7.8E-06	2.5E-05
PCB-114	MJ683	-	-	-	4.5E-03	1.5E-03	9.1E-07	1.4E-07	9.1E-07
PCB-118	MJ683	-	-	-	2.7E-01	1.6E-01	5.4E-05	1.6E-05	5.4E-05
PCB-123	MJ683	-	-	-	3.0E-03	2.3E-03	6.0E-07	2.2E-07	6.0E-07
PCB-126	MJ683	-	-	-	7.5E-03	6.4E-03	1.5E-06	6.0E-07	1.5E-06
PCB-156	MJ683	-	-	-	6.3E-02	5.5E-02	1.3E-05	5.2E-06	1.3E-05
PCB-157	MJ683	-	-	-	1.2E-02	2.5E-02	2.5E-06	2.3E-06	2.5E-06
PCB-167	MJ683	-	-	-	2.1E-02	4.3E-02	4.1E-06	4.1E-06	4.1E-06
PCB-169	MJ683	-	-	-	3.7E-04	6.4E-04	7.3E-08	6.0E-08	7.3E-08
PCB-189	MJ683	-	-	-	3.0E-03	6.4E-03	6.0E-07	6.0E-07	6.0E-07
PCB-77	MJ683	-	-	-	1.5E-02	1.3E-02	3.1E-06	1.2E-06	3.1E-06
PCB-81	MJ683	-	-	-	3.0E-03	2.3E-03	6.0E-07	2.1E-07	6.0E-07

Aroclor to PCB Congener Extrapolation for Soil (0-10 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentrations (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF_{1254}	EF_{1260}	Estimated Concentrations Aroclor-1254 (mg/kg)	Estimated Concentrations Aroclor-1260 (mg/kg)	Estimated Concentrations PCB_{MAX} (mg/kg)
Aroclor-1254	MJ688	5.4E-02	2.7E-02	UJ	-	-	-	-	-
Aroclor-1260	MJ688	5.4E-02	2.7E-02	UJ	-	-	-	-	-
PCB-105	MJ688	-	-	-	1.2E-01	8.2E-02	3.3E-06	2.2E-06	3.3E-06
PCB-114	MJ688	-	-	-	4.5E-03	1.5E-03	1.2E-07	3.9E-08	1.2E-07
PCB-118	MJ688	-	-	-	2.7E-01	1.6E-01	7.2E-06	4.4E-06	7.2E-06
PCB-123	MJ688	-	-	-	3.0E-03	2.3E-03	8.1E-08	6.3E-08	8.1E-08
PCB-126	MJ688	-	-	-	7.5E-03	6.4E-03	2.0E-07	1.7E-07	2.0E-07
PCB-156	MJ688	-	-	-	6.3E-02	5.5E-02	1.7E-06	1.5E-06	1.7E-06
PCB-157	MJ688	-	-	-	1.2E-02	2.5E-02	3.3E-07	6.6E-07	6.6E-07
PCB-167	MJ688	-	-	-	2.1E-02	4.3E-02	5.6E-07	1.2E-06	1.2E-06
PCB-169	MJ688	-	-	-	3.7E-04	6.4E-04	9.9E-09	1.7E-08	1.7E-08
PCB-189	MJ688	-	-	-	3.0E-03	6.4E-03	8.1E-08	1.7E-07	1.7E-07
PCB-77	MJ688	-	-	-	1.5E-02	1.3E-02	4.2E-07	3.4E-07	4.2E-07
PCB-81	MJ688	-	-	-	3.0E-03	2.3E-03	8.1E-08	6.1E-08	8.1E-08
Aroclor-1254	MJ689	5.5E-02	2.8E-02	UJ	-	-	-	-	-
Aroclor-1260	MJ689	5.5E-02	2.8E-02	UJ	-	-	-	-	-
PCB-105	MJ689	-	-	-	1.2E-01	8.2E-02	3.4E-06	2.3E-06	3.4E-06
PCB-114	MJ689	-	-	-	4.5E-03	1.5E-03	1.2E-07	4.0E-08	1.2E-07
PCB-118	MJ689	-	-	-	2.7E-01	1.6E-01	7.4E-06	4.5E-06	7.4E-06
PCB-123	MJ689	-	-	-	3.0E-03	2.3E-03	8.2E-08	6.4E-08	8.2E-08
PCB-126	MJ689	-	-	-	7.5E-03	6.4E-03	2.1E-07	1.8E-07	2.1E-07
PCB-156	MJ689	-	-	-	6.3E-02	5.5E-02	1.7E-06	1.5E-06	1.7E-06
PCB-157	MJ689	-	-	-	1.2E-02	2.5E-02	3.4E-07	6.8E-07	6.8E-07
PCB-167	MJ689	-	-	-	2.1E-02	4.3E-02	5.7E-07	1.2E-06	1.2E-06
PCB-169	MJ689	-	-	-	3.7E-04	6.4E-04	1.0E-08	1.8E-08	1.8E-08
PCB-189	MJ689	-	-	-	3.0E-03	6.4E-03	8.2E-08	1.8E-07	1.8E-07
PCB-77	MJ689	-	-	-	1.5E-02	1.3E-02	4.3E-07	3.5E-07	4.3E-07
PCB-81	MJ689	-	-	-	3.0E-03	2.3E-03	8.2E-08	6.2E-08	8.2E-08
Aroclor-1254	MJ690	5.5E-02	2.8E-02	UJ	-	-	-	-	-
Aroclor-1260	MJ690	3.2E-02	3.2E-02	J	-	-	-	-	-
PCB-105	MJ690	-	-	-	1.2E-01	8.2E-02	3.4E-06	2.6E-06	3.4E-06
PCB-114	MJ690	-	-	-	4.5E-03	1.5E-03	1.2E-07	4.7E-08	1.2E-07
PCB-118	MJ690	-	-	-	2.7E-01	1.6E-01	7.4E-06	5.2E-06	7.4E-06
PCB-123	MJ690	-	-	-	3.0E-03	2.3E-03	8.2E-08	7.4E-08	8.2E-08
PCB-126	MJ690	-	-	-	7.5E-03	6.4E-03	2.1E-07	2.0E-07	2.1E-07
PCB-156	MJ690	-	-	-	6.3E-02	5.5E-02	1.7E-06	1.7E-06	1.7E-06
PCB-157	MJ690	-	-	-	1.2E-02	2.5E-02	3.4E-07	7.9E-07	7.9E-07
PCB-167	MJ690	-	-	-	2.1E-02	4.3E-02	5.7E-07	1.4E-06	1.4E-06
PCB-169	MJ690	-	-	-	3.7E-04	6.4E-04	1.0E-08	2.0E-08	2.0E-08
PCB-189	MJ690	-	-	-	3.0E-03	6.4E-03	8.2E-08	2.0E-07	2.0E-07
PCB-77	MJ690	-	-	-	1.5E-02	1.3E-02	4.3E-07	4.1E-07	4.3E-07
PCB-81	MJ690	-	-	-	3.0E-03	2.3E-03	8.2E-08	7.2E-08	8.2E-08
Aroclor-1254	MJ704	5.2E-02	2.6E-02	U	-	-	-	-	-
Aroclor-1260	MJ704	5.2E-02	2.6E-02	U	-	-	-	-	-
PCB-105	MJ704	-	-	-	1.2E-01	8.2E-02	3.2E-06	2.1E-06	3.2E-06
PCB-114	MJ704	-	-	-	4.5E-03	1.5E-03	1.2E-07	3.8E-08	1.2E-07
PCB-118	MJ704	-	-	-	2.7E-01	1.6E-01	7.0E-06	4.3E-06	7.0E-06
PCB-123	MJ704	-	-	-	3.0E-03	2.3E-03	7.8E-08	6.0E-08	7.8E-08
PCB-126	MJ704	-	-	-	7.5E-03	6.4E-03	2.0E-07	1.7E-07	2.0E-07
PCB-156	MJ704	-	-	-	6.3E-02	5.5E-02	1.6E-06	1.4E-06	1.6E-06
PCB-157	MJ704	-	-	-	1.2E-02	2.5E-02	3.2E-07	6.4E-07	6.4E-07
PCB-167	MJ704	-	-	-	2.1E-02	4.3E-02	5.4E-07	1.1E-06	1.1E-06
PCB-169	MJ704	-	-	-	3.7E-04	6.4E-04	9.5E-09	1.7E-08	1.7E-08
PCB-189	MJ704	-	-	-	3.0E-03	6.4E-03	7.8E-08	1.7E-07	1.7E-07
PCB-77	MJ704	-	-	-	1.5E-02	1.3E-02	4.0E-07	3.3E-07	4.0E-07
PCB-81	MJ704	-	-	-	3.0E-03	2.3E-03	7.8E-08	5.9E-08	7.8E-08
Aroclor-1254	MJ705	8.1E-02	4.1E-02	U	-	-	-	-	-
Aroclor-1260	MJ705	8.1E-02	4.1E-02	U	-	-	-	-	-

Aroclor to PCB Congener Extrapolation for Soil (0-10 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentrations (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF_{1254}	EF_{1260}	Estimated Concentrations Aroclor-1254 (mg/kg)	Estimated Concentrations Aroclor-1260 (mg/kg)	Estimated Concentrations PCB_{MAX} (mg/kg)
PCB-105	MJ705	-	-	-	1.2E-01	8.2E-02	5.0E-06	3.3E-06	5.0E-06
PCB-114	MJ705	-	-	-	4.5E-03	1.5E-03	1.8E-07	5.9E-08	1.8E-07
PCB-118	MJ705	-	-	-	2.7E-01	1.6E-01	1.1E-05	6.6E-06	1.1E-05
PCB-123	MJ705	-	-	-	3.0E-03	2.3E-03	1.2E-07	9.4E-08	1.2E-07
PCB-126	MJ705	-	-	-	7.5E-03	6.4E-03	3.0E-07	2.6E-07	3.0E-07
PCB-156	MJ705	-	-	-	6.3E-02	5.5E-02	2.5E-06	2.2E-06	2.5E-06
PCB-157	MJ705	-	-	-	1.2E-02	2.5E-02	5.0E-07	9.9E-07	9.9E-07
PCB-167	MJ705	-	-	-	2.1E-02	4.3E-02	8.4E-07	1.7E-06	1.7E-06
PCB-169	MJ705	-	-	-	3.7E-04	6.4E-04	1.5E-08	2.6E-08	2.6E-08
PCB-189	MJ705	-	-	-	3.0E-03	6.4E-03	1.2E-07	2.6E-07	2.6E-07
PCB-77	MJ705	-	-	-	1.5E-02	1.3E-02	6.3E-07	5.2E-07	6.3E-07
PCB-81	MJ705	-	-	-	3.0E-03	2.3E-03	1.2E-07	9.1E-08	1.2E-07
Aroclor-1254	MJ707	5.1E-02	2.6E-02	U	-	-	-	-	-
Aroclor-1260	MJ707	5.1E-02	2.6E-02	U	-	-	-	-	-
PCB-105	MJ707	-	-	-	1.2E-01	8.2E-02	3.2E-06	2.1E-06	3.2E-06
PCB-114	MJ707	-	-	-	4.5E-03	1.5E-03	1.2E-07	3.7E-08	1.2E-07
PCB-118	MJ707	-	-	-	2.7E-01	1.6E-01	6.8E-06	4.2E-06	6.8E-06
PCB-123	MJ707	-	-	-	3.0E-03	2.3E-03	7.6E-08	5.9E-08	7.6E-08
PCB-126	MJ707	-	-	-	7.5E-03	6.4E-03	1.9E-07	1.6E-07	1.9E-07
PCB-156	MJ707	-	-	-	6.3E-02	5.5E-02	1.6E-06	1.4E-06	1.6E-06
PCB-157	MJ707	-	-	-	1.2E-02	2.5E-02	3.2E-07	6.3E-07	6.3E-07
PCB-167	MJ707	-	-	-	2.1E-02	4.3E-02	5.3E-07	1.1E-06	1.1E-06
PCB-169	MJ707	-	-	-	3.7E-04	6.4E-04	9.3E-09	1.6E-08	1.6E-08
PCB-189	MJ707	-	-	-	3.0E-03	6.4E-03	7.6E-08	1.6E-07	1.6E-07
PCB-77	MJ707	-	-	-	1.5E-02	1.3E-02	3.9E-07	3.2E-07	3.9E-07
PCB-81	MJ707	-	-	-	3.0E-03	2.3E-03	7.6E-08	5.7E-08	7.6E-08
Aroclor-1254	MJ708	7.9E-02	4.0E-02	U	-	-	-	-	-
Aroclor-1260	MJ708	7.9E-02	4.0E-02	U	-	-	-	-	-
PCB-105	MJ708	-	-	-	1.2E-01	8.2E-02	4.9E-06	3.2E-06	4.9E-06
PCB-114	MJ708	-	-	-	4.5E-03	1.5E-03	1.8E-07	5.7E-08	1.8E-07
PCB-118	MJ708	-	-	-	2.7E-01	1.6E-01	1.1E-05	6.5E-06	1.1E-05
PCB-123	MJ708	-	-	-	3.0E-03	2.3E-03	1.2E-07	9.2E-08	1.2E-07
PCB-126	MJ708	-	-	-	7.5E-03	6.4E-03	3.0E-07	2.5E-07	3.0E-07
PCB-156	MJ708	-	-	-	6.3E-02	5.5E-02	2.5E-06	2.2E-06	2.5E-06
PCB-157	MJ708	-	-	-	1.2E-02	2.5E-02	4.9E-07	9.7E-07	9.7E-07
PCB-167	MJ708	-	-	-	2.1E-02	4.3E-02	8.1E-07	1.7E-06	1.7E-06
PCB-169	MJ708	-	-	-	3.7E-04	6.4E-04	1.4E-08	2.5E-08	2.5E-08
PCB-189	MJ708	-	-	-	3.0E-03	6.4E-03	1.2E-07	2.5E-07	2.5E-07
PCB-77	MJ708	-	-	-	1.5E-02	1.3E-02	6.1E-07	5.0E-07	6.1E-07
PCB-81	MJ708	-	-	-	3.0E-03	2.3E-03	1.2E-07	8.9E-08	1.2E-07
Aroclor-1254	MJ709	5.4E-02	2.7E-02	UJ	-	-	-	-	-
Aroclor-1260	MJ709	5.4E-02	2.7E-02	UJ	-	-	-	-	-
PCB-105	MJ709	-	-	-	1.2E-01	8.2E-02	3.3E-06	2.2E-06	3.3E-06
PCB-114	MJ709	-	-	-	4.5E-03	1.5E-03	1.2E-07	3.9E-08	1.2E-07
PCB-118	MJ709	-	-	-	2.7E-01	1.6E-01	7.2E-06	4.4E-06	7.2E-06
PCB-123	MJ709	-	-	-	3.0E-03	2.3E-03	8.1E-08	6.3E-08	8.1E-08
PCB-126	MJ709	-	-	-	7.5E-03	6.4E-03	2.0E-07	1.7E-07	2.0E-07
PCB-156	MJ709	-	-	-	6.3E-02	5.5E-02	1.7E-06	1.5E-06	1.7E-06
PCB-157	MJ709	-	-	-	1.2E-02	2.5E-02	3.3E-07	6.6E-07	6.6E-07
PCB-167	MJ709	-	-	-	2.1E-02	4.3E-02	5.6E-07	1.2E-06	1.2E-06
PCB-169	MJ709	-	-	-	3.7E-04	6.4E-04	9.9E-09	1.7E-08	1.7E-08
PCB-189	MJ709	-	-	-	3.0E-03	6.4E-03	8.1E-08	1.7E-07	1.7E-07
PCB-77	MJ709	-	-	-	1.5E-02	1.3E-02	4.2E-07	3.4E-07	4.2E-07
PCB-81	MJ709	-	-	-	3.0E-03	2.3E-03	8.1E-08	6.1E-08	8.1E-08
Aroclor-1254	MJ710	7.9E-02	4.0E-02	U	-	-	-	-	-
Aroclor-1260	MJ710	2.3E-01	2.3E-01		-	-	-	-	-
PCB-105	MJ710	-	-	-	1.2E-01	8.2E-02	4.9E-06	1.9E-05	1.9E-05
PCB-114	MJ710	-	-	-	4.5E-03	1.5E-03	1.8E-07	3.3E-07	3.3E-07

Aroclor to PCB Congener Extrapolation for Soil (0-10 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentrations (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF_{1254}	EF_{1260}	Estimated Concentrations Aroclor-1254 (mg/kg)	Estimated Concentrations Aroclor-1260 (mg/kg)	Estimated Concentrations PCB_{MAX} (mg/kg)
PCB-118	MJ710	-	-	-	2.7E-01	1.6E-01	1.1E-05	3.8E-05	3.8E-05
PCB-123	MJ710	-	-	-	3.0E-03	2.3E-03	1.2E-07	5.3E-07	5.3E-07
PCB-126	MJ710	-	-	-	7.5E-03	6.4E-03	3.0E-07	1.5E-06	1.5E-06
PCB-156	MJ710	-	-	-	6.3E-02	5.5E-02	2.5E-06	1.3E-05	1.3E-05
PCB-157	MJ710	-	-	-	1.2E-02	2.5E-02	4.9E-07	5.6E-06	5.6E-06
PCB-167	MJ710	-	-	-	2.1E-02	4.3E-02	8.1E-07	9.8E-06	9.8E-06
PCB-169	MJ710	-	-	-	3.7E-04	6.4E-04	1.4E-08	1.5E-07	1.5E-07
PCB-189	MJ710	-	-	-	3.0E-03	6.4E-03	1.2E-07	1.5E-06	1.5E-06
PCB-77	MJ710	-	-	-	1.5E-02	1.3E-02	6.1E-07	2.9E-06	2.9E-06
PCB-81	MJ710	-	-	-	3.0E-03	2.3E-03	1.2E-07	5.2E-07	5.2E-07
Aroclor-1254	MJ739	8.4E-02	4.2E-02	U	-	-	-	-	-
Aroclor-1260	MJ739	8.4E-02	4.2E-02	U	-	-	-	-	-
PCB-105	MJ739	-	-	-	1.2E-01	8.2E-02	5.2E-06	3.4E-06	5.2E-06
PCB-114	MJ739	-	-	-	4.5E-03	1.5E-03	1.9E-07	6.1E-08	1.9E-07
PCB-118	MJ739	-	-	-	2.7E-01	1.6E-01	1.1E-05	6.9E-06	1.1E-05
PCB-123	MJ739	-	-	-	3.0E-03	2.3E-03	1.3E-07	9.7E-08	1.3E-07
PCB-126	MJ739	-	-	-	7.5E-03	6.4E-03	3.2E-07	2.7E-07	3.2E-07
PCB-156	MJ739	-	-	-	6.3E-02	5.5E-02	2.6E-06	2.3E-06	2.6E-06
PCB-157	MJ739	-	-	-	1.2E-02	2.5E-02	5.2E-07	1.0E-06	1.0E-06
PCB-167	MJ739	-	-	-	2.1E-02	4.3E-02	8.7E-07	1.8E-06	1.8E-06
PCB-169	MJ739	-	-	-	3.7E-04	6.4E-04	1.5E-08	2.7E-08	2.7E-08
PCB-189	MJ739	-	-	-	3.0E-03	6.4E-03	1.3E-07	2.7E-07	2.7E-07
PCB-77	MJ739	-	-	-	1.5E-02	1.3E-02	6.5E-07	5.3E-07	6.5E-07
PCB-81	MJ739	-	-	-	3.0E-03	2.3E-03	1.3E-07	9.5E-08	1.3E-07
Aroclor-1254	MJ744	2.6E-01	2.6E-01		-	-	-	-	-
Aroclor-1260	MJ744	9.2E-02	4.6E-02	U	-	-	-	-	-
PCB-105	MJ744	-	-	-	1.2E-01	8.2E-02	3.2E-05	3.8E-06	3.2E-05
PCB-114	MJ744	-	-	-	4.5E-03	1.5E-03	1.2E-06	6.7E-08	1.2E-06
PCB-118	MJ744	-	-	-	2.7E-01	1.6E-01	7.0E-05	7.5E-06	7.0E-05
PCB-123	MJ744	-	-	-	3.0E-03	2.3E-03	7.8E-07	1.1E-07	7.8E-07
PCB-126	MJ744	-	-	-	7.5E-03	6.4E-03	2.0E-06	2.9E-07	2.0E-06
PCB-156	MJ744	-	-	-	6.3E-02	5.5E-02	1.6E-05	2.5E-06	1.6E-05
PCB-157	MJ744	-	-	-	1.2E-02	2.5E-02	3.2E-06	1.1E-06	3.2E-06
PCB-167	MJ744	-	-	-	2.1E-02	4.3E-02	5.4E-06	2.0E-06	5.4E-06
PCB-169	MJ744	-	-	-	3.7E-04	6.4E-04	9.5E-08	2.9E-08	9.5E-08
PCB-189	MJ744	-	-	-	3.0E-03	6.4E-03	7.8E-07	2.9E-07	7.8E-07
PCB-77	MJ744	-	-	-	1.5E-02	1.3E-02	4.0E-06	5.9E-07	4.0E-06
PCB-81	MJ744	-	-	-	3.0E-03	2.3E-03	7.8E-07	1.0E-07	7.8E-07
Aroclor-1254	MJ745	3.5E-01	3.5E-01		-	-	-	-	-
Aroclor-1260	MJ745	1.0E-01	5.0E-02	U	-	-	-	-	-
PCB-105	MJ745	-	-	-	1.2E-01	8.2E-02	4.3E-05	4.1E-06	4.3E-05
PCB-114	MJ745	-	-	-	4.5E-03	1.5E-03	1.6E-06	7.3E-08	1.6E-06
PCB-118	MJ745	-	-	-	2.7E-01	1.6E-01	9.4E-05	8.2E-06	9.4E-05
PCB-123	MJ745	-	-	-	3.0E-03	2.3E-03	1.0E-06	1.2E-07	1.0E-06
PCB-126	MJ745	-	-	-	7.5E-03	6.4E-03	2.6E-06	3.2E-07	2.6E-06
PCB-156	MJ745	-	-	-	6.3E-02	5.5E-02	2.2E-05	2.7E-06	2.2E-05
PCB-157	MJ745	-	-	-	1.2E-02	2.5E-02	4.3E-06	1.2E-06	4.3E-06
PCB-167	MJ745	-	-	-	2.1E-02	4.3E-02	7.2E-06	2.1E-06	7.2E-06
PCB-169	MJ745	-	-	-	3.7E-04	6.4E-04	1.3E-07	3.2E-08	1.3E-07
PCB-189	MJ745	-	-	-	3.0E-03	6.4E-03	1.0E-06	3.2E-07	1.0E-06
PCB-77	MJ745	-	-	-	1.5E-02	1.3E-02	5.4E-06	6.4E-07	5.4E-06
PCB-81	MJ745	-	-	-	3.0E-03	2.3E-03	1.0E-06	1.1E-07	1.0E-06
Aroclor-1254	MJ746	1.8E-01	9.0E-02	UJ	-	-	-	-	-
Aroclor-1260	MJ746	1.8E-01	9.0E-02	UJ	-	-	-	-	-
PCB-105	MJ746	-	-	-	1.2E-01	8.2E-02	1.1E-05	7.4E-06	1.1E-05
PCB-114	MJ746	-	-	-	4.5E-03	1.5E-03	4.1E-07	1.3E-07	4.1E-07
PCB-118	MJ746	-	-	-	2.7E-01	1.6E-01	2.4E-05	1.5E-05	2.4E-05
PCB-123	MJ746	-	-	-	3.0E-03	2.3E-03	2.7E-07	2.1E-07	2.7E-07

Aroclor to PCB Congener Extrapolation for Soil (0-10 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentrations (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF_{1254}	EF_{1260}	Estimated Concentrations Aroclor-1254 (mg/kg)	Estimated Concentrations Aroclor-1260 (mg/kg)	Estimated Concentrations PCB_{MAX} (mg/kg)
PCB-126	MJ746	-	-	-	7.5E-03	6.4E-03	6.8E-07	5.7E-07	6.8E-07
PCB-156	MJ746	-	-	-	6.3E-02	5.5E-02	5.7E-06	4.9E-06	5.7E-06
PCB-157	MJ746	-	-	-	1.2E-02	2.5E-02	1.1E-06	2.2E-06	2.2E-06
PCB-167	MJ746	-	-	-	2.1E-02	4.3E-02	1.9E-06	3.8E-06	3.8E-06
PCB-169	MJ746	-	-	-	3.7E-04	6.4E-04	3.3E-08	5.7E-08	5.7E-08
PCB-189	MJ746	-	-	-	3.0E-03	6.4E-03	2.7E-07	5.7E-07	5.7E-07
PCB-77	MJ746	-	-	-	1.5E-02	1.3E-02	1.4E-06	1.1E-06	1.4E-06
PCB-81	MJ746	-	-	-	3.0E-03	2.3E-03	2.7E-07	2.0E-07	2.7E-07
Aroclor-1254	MJ747	1.8E-01	9.0E-02	UJ	-	-	-	-	-
Aroclor-1260	MJ747	1.8E-01	9.0E-02	UJ	-	-	-	-	-
PCB-105	MJ747	-	-	-	1.2E-01	8.2E-02	1.1E-05	7.4E-06	1.1E-05
PCB-114	MJ747	-	-	-	4.5E-03	1.5E-03	4.1E-07	1.3E-07	4.1E-07
PCB-118	MJ747	-	-	-	2.7E-01	1.6E-01	2.4E-05	1.5E-05	2.4E-05
PCB-123	MJ747	-	-	-	3.0E-03	2.3E-03	2.7E-07	2.1E-07	2.7E-07
PCB-126	MJ747	-	-	-	7.5E-03	6.4E-03	6.8E-07	5.7E-07	6.8E-07
PCB-156	MJ747	-	-	-	6.3E-02	5.5E-02	5.7E-06	4.9E-06	5.7E-06
PCB-157	MJ747	-	-	-	1.2E-02	2.5E-02	1.1E-06	2.2E-06	2.2E-06
PCB-167	MJ747	-	-	-	2.1E-02	4.3E-02	1.9E-06	3.8E-06	3.8E-06
PCB-169	MJ747	-	-	-	3.7E-04	6.4E-04	3.3E-08	5.7E-08	5.7E-08
PCB-189	MJ747	-	-	-	3.0E-03	6.4E-03	2.7E-07	5.7E-07	5.7E-07
PCB-77	MJ747	-	-	-	1.5E-02	1.3E-02	1.4E-06	1.1E-06	1.4E-06
PCB-81	MJ747	-	-	-	3.0E-03	2.3E-03	2.7E-07	2.0E-07	2.7E-07
Aroclor-1254	MJ748	2.2E-01	2.2E-01	J	-	-	-	-	-
Aroclor-1260	MJ748	2.0E-01	2.0E-01	J	-	-	-	-	-
PCB-105	MJ748	-	-	-	1.2E-01	8.2E-02	2.7E-05	1.6E-05	2.7E-05
PCB-114	MJ748	-	-	-	4.5E-03	1.5E-03	1.0E-06	2.9E-07	1.0E-06
PCB-118	MJ748	-	-	-	2.7E-01	1.6E-01	5.9E-05	3.3E-05	5.9E-05
PCB-123	MJ748	-	-	-	3.0E-03	2.3E-03	6.6E-07	4.6E-07	6.6E-07
PCB-126	MJ748	-	-	-	7.5E-03	6.4E-03	1.7E-06	1.3E-06	1.7E-06
PCB-156	MJ748	-	-	-	6.3E-02	5.5E-02	1.4E-05	1.1E-05	1.4E-05
PCB-157	MJ748	-	-	-	1.2E-02	2.5E-02	2.7E-06	4.9E-06	4.9E-06
PCB-167	MJ748	-	-	-	2.1E-02	4.3E-02	4.5E-06	8.5E-06	8.5E-06
PCB-169	MJ748	-	-	-	3.7E-04	6.4E-04	8.1E-08	1.3E-07	1.3E-07
PCB-189	MJ748	-	-	-	3.0E-03	6.4E-03	6.6E-07	1.3E-06	1.3E-06
PCB-77	MJ748	-	-	-	1.5E-02	1.3E-02	3.4E-06	2.5E-06	3.4E-06
PCB-81	MJ748	-	-	-	3.0E-03	2.3E-03	6.6E-07	4.5E-07	6.6E-07
Aroclor-1254	MJ750	4.6E-01	4.6E-01	J	-	-	-	-	-
Aroclor-1260	MJ750	2.0E-01	1.0E-01	UJ	-	-	-	-	-
PCB-105	MJ750	-	-	-	1.2E-01	8.2E-02	5.7E-05	8.2E-06	5.7E-05
PCB-114	MJ750	-	-	-	4.5E-03	1.5E-03	2.1E-06	1.5E-07	2.1E-06
PCB-118	MJ750	-	-	-	2.7E-01	1.6E-01	1.2E-04	1.6E-05	1.2E-04
PCB-123	MJ750	-	-	-	3.0E-03	2.3E-03	1.4E-06	2.3E-07	1.4E-06
PCB-126	MJ750	-	-	-	7.5E-03	6.4E-03	3.5E-06	6.4E-07	3.5E-06
PCB-156	MJ750	-	-	-	6.3E-02	5.5E-02	2.9E-05	5.5E-06	2.9E-05
PCB-157	MJ750	-	-	-	1.2E-02	2.5E-02	5.7E-06	2.5E-06	5.7E-06
PCB-167	MJ750	-	-	-	2.1E-02	4.3E-02	9.5E-06	4.3E-06	9.5E-06
PCB-169	MJ750	-	-	-	3.7E-04	6.4E-04	1.7E-07	6.4E-08	1.7E-07
PCB-189	MJ750	-	-	-	3.0E-03	6.4E-03	1.4E-06	6.4E-07	1.4E-06
PCB-77	MJ750	-	-	-	1.5E-02	1.3E-02	7.1E-06	1.3E-06	7.1E-06
PCB-81	MJ750	-	-	-	3.0E-03	2.3E-03	1.4E-06	2.3E-07	1.4E-06
Aroclor-1254	MJ752	8.9E-02	4.5E-02	UJ	-	-	-	-	-
Aroclor-1260	MJ752	8.9E-02	4.5E-02	UJ	-	-	-	-	-
PCB-105	MJ752	-	-	-	1.2E-01	8.2E-02	5.5E-06	3.6E-06	5.5E-06
PCB-114	MJ752	-	-	-	4.5E-03	1.5E-03	2.0E-07	6.5E-08	2.0E-07
PCB-118	MJ752	-	-	-	2.7E-01	1.6E-01	1.2E-05	7.3E-06	1.2E-05
PCB-123	MJ752	-	-	-	3.0E-03	2.3E-03	1.3E-07	1.0E-07	1.3E-07
PCB-126	MJ752	-	-	-	7.5E-03	6.4E-03	3.3E-07	2.8E-07	3.3E-07
PCB-156	MJ752	-	-	-	6.3E-02	5.5E-02	2.8E-06	2.4E-06	2.8E-06

Aroclor to PCB Congener Extrapolation for Soil (0-10 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentrations (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF_{1254}	EF_{1260}	Estimated Concentrations Aroclor-1254 (mg/kg)	Estimated Concentrations Aroclor-1260 (mg/kg)	Estimated Concentrations PCB_{MAX} (mg/kg)
PCB-157	MJ752	-	-	-	1.2E-02	2.5E-02	5.5E-07	1.1E-06	1.1E-06
PCB-167	MJ752	-	-	-	2.1E-02	4.3E-02	9.2E-07	1.9E-06	1.9E-06
PCB-169	MJ752	-	-	-	3.7E-04	6.4E-04	1.6E-08	2.8E-08	2.8E-08
PCB-189	MJ752	-	-	-	3.0E-03	6.4E-03	1.3E-07	2.8E-07	2.8E-07
PCB-77	MJ752	-	-	-	1.5E-02	1.3E-02	6.9E-07	5.7E-07	6.9E-07
PCB-81	MJ752	-	-	-	3.0E-03	2.3E-03	1.3E-07	1.0E-07	1.3E-07
Aroclor-1254	MJ754	2.4E-01	2.4E-01	J	-	-	-	-	-
Aroclor-1260	MJ754	1.1E-01	1.1E-01	J	-	-	-	-	-
PCB-105	MJ754	-	-	-	1.2E-01	8.2E-02	3.0E-05	9.0E-06	3.0E-05
PCB-114	MJ754	-	-	-	4.5E-03	1.5E-03	1.1E-06	1.6E-07	1.1E-06
PCB-118	MJ754	-	-	-	2.7E-01	1.6E-01	6.4E-05	1.8E-05	6.4E-05
PCB-123	MJ754	-	-	-	3.0E-03	2.3E-03	7.2E-07	2.6E-07	7.2E-07
PCB-126	MJ754	-	-	-	7.5E-03	6.4E-03	1.8E-06	7.0E-07	1.8E-06
PCB-156	MJ754	-	-	-	6.3E-02	5.5E-02	1.5E-05	6.0E-06	1.5E-05
PCB-157	MJ754	-	-	-	1.2E-02	2.5E-02	3.0E-06	2.7E-06	3.0E-06
PCB-167	MJ754	-	-	-	2.1E-02	4.3E-02	4.9E-06	4.7E-06	4.9E-06
PCB-169	MJ754	-	-	-	3.7E-04	6.4E-04	8.8E-08	7.0E-08	8.8E-08
PCB-189	MJ754	-	-	-	3.0E-03	6.4E-03	7.2E-07	7.0E-07	7.2E-07
PCB-77	MJ754	-	-	-	1.5E-02	1.3E-02	3.7E-06	1.4E-06	3.7E-06
PCB-81	MJ754	-	-	-	3.0E-03	2.3E-03	7.2E-07	2.5E-07	7.2E-07
Aroclor-1254	MJ756	6.0E-02	6.0E-02	J	-	-	-	-	-
Aroclor-1260	MJ756	8.4E-02	4.2E-02	UJ	-	-	-	-	-
PCB-105	MJ756	-	-	-	1.2E-01	8.2E-02	7.4E-06	3.4E-06	7.4E-06
PCB-114	MJ756	-	-	-	4.5E-03	1.5E-03	2.7E-07	6.1E-08	2.7E-07
PCB-118	MJ756	-	-	-	2.7E-01	1.6E-01	1.6E-05	6.9E-06	1.6E-05
PCB-123	MJ756	-	-	-	3.0E-03	2.3E-03	1.8E-07	9.7E-08	1.8E-07
PCB-126	MJ756	-	-	-	7.5E-03	6.4E-03	4.5E-07	2.7E-07	4.5E-07
PCB-156	MJ756	-	-	-	6.3E-02	5.5E-02	3.8E-06	2.3E-06	3.8E-06
PCB-157	MJ756	-	-	-	1.2E-02	2.5E-02	7.4E-07	1.0E-06	1.0E-06
PCB-167	MJ756	-	-	-	2.1E-02	4.3E-02	1.2E-06	1.8E-06	1.8E-06
PCB-169	MJ756	-	-	-	3.7E-04	6.4E-04	2.2E-08	2.7E-08	2.7E-08
PCB-189	MJ756	-	-	-	3.0E-03	6.4E-03	1.8E-07	2.7E-07	2.7E-07
PCB-77	MJ756	-	-	-	1.5E-02	1.3E-02	9.3E-07	5.3E-07	9.3E-07
PCB-81	MJ756	-	-	-	3.0E-03	2.3E-03	1.8E-07	9.5E-08	1.8E-07
Aroclor-1254	MJ759	4.8E-01	4.8E-01	J	-	-	-	-	-
Aroclor-1260	MJ759	1.8E-01	9.0E-02	UJ	-	-	-	-	-
PCB-105	MJ759	-	-	-	1.2E-01	8.2E-02	5.9E-05	7.4E-06	5.9E-05
PCB-114	MJ759	-	-	-	4.5E-03	1.5E-03	2.2E-06	1.3E-07	2.2E-06
PCB-118	MJ759	-	-	-	2.7E-01	1.6E-01	1.3E-04	1.5E-05	1.3E-04
PCB-123	MJ759	-	-	-	3.0E-03	2.3E-03	1.4E-06	2.1E-07	1.4E-06
PCB-126	MJ759	-	-	-	7.5E-03	6.4E-03	3.6E-06	5.7E-07	3.6E-06
PCB-156	MJ759	-	-	-	6.3E-02	5.5E-02	3.0E-05	4.9E-06	3.0E-05
PCB-157	MJ759	-	-	-	1.2E-02	2.5E-02	5.9E-06	2.2E-06	5.9E-06
PCB-167	MJ759	-	-	-	2.1E-02	4.3E-02	9.9E-06	3.8E-06	9.9E-06
PCB-169	MJ759	-	-	-	3.7E-04	6.4E-04	1.8E-07	5.7E-08	1.8E-07
PCB-189	MJ759	-	-	-	3.0E-03	6.4E-03	1.4E-06	5.7E-07	1.4E-06
PCB-77	MJ759	-	-	-	1.5E-02	1.3E-02	7.4E-06	1.1E-06	7.4E-06
PCB-81	MJ759	-	-	-	3.0E-03	2.3E-03	1.4E-06	2.0E-07	1.4E-06
Aroclor-1254	MJ761	6.6E-01	6.6E-01	J	-	-	-	-	-
Aroclor-1260	MJ761	1.8E-01	9.0E-02	UJ	-	-	-	-	-
PCB-105	MJ761	-	-	-	1.2E-01	8.2E-02	8.2E-05	7.4E-06	8.2E-05
PCB-114	MJ761	-	-	-	4.5E-03	1.5E-03	3.0E-06	1.3E-07	3.0E-06
PCB-118	MJ761	-	-	-	2.7E-01	1.6E-01	1.8E-04	1.5E-05	1.8E-04
PCB-123	MJ761	-	-	-	3.0E-03	2.3E-03	2.0E-06	2.1E-07	2.0E-06
PCB-126	MJ761	-	-	-	7.5E-03	6.4E-03	5.0E-06	5.7E-07	5.0E-06
PCB-156	MJ761	-	-	-	6.3E-02	5.5E-02	4.2E-05	4.9E-06	4.2E-05
PCB-157	MJ761	-	-	-	1.2E-02	2.5E-02	8.2E-06	2.2E-06	8.2E-06
PCB-167	MJ761	-	-	-	2.1E-02	4.3E-02	1.4E-05	3.8E-06	1.4E-05

Aroclor to PCB Congener Extrapolation for Soil (0-10 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentrations (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF_{1254}	EF_{1260}	Estimated Concentrations Aroclor-1254 (mg/kg)	Estimated Concentrations Aroclor-1260 (mg/kg)	Estimated Concentrations PCB_{MAX} (mg/kg)
PCB-169	MJ761	-	-	-	3.7E-04	6.4E-04	2.4E-07	5.7E-08	2.4E-07
PCB-189	MJ761	-	-	-	3.0E-03	6.4E-03	2.0E-06	5.7E-07	2.0E-06
PCB-77	MJ761	-	-	-	1.5E-02	1.3E-02	1.0E-05	1.1E-06	1.0E-05
PCB-81	MJ761	-	-	-	3.0E-03	2.3E-03	2.0E-06	2.0E-07	2.0E-06
Aroclor-1254	MJ763	1.9E-01	9.5E-02	UJ	-	-	-	-	-
Aroclor-1260	MJ763	1.9E-01	9.5E-02	UJ	-	-	-	-	-
PCB-105	MJ763	-	-	-	1.2E-01	8.2E-02	1.2E-05	7.8E-06	1.2E-05
PCB-114	MJ763	-	-	-	4.5E-03	1.5E-03	4.3E-07	1.4E-07	4.3E-07
PCB-118	MJ763	-	-	-	2.7E-01	1.6E-01	2.5E-05	1.6E-05	2.5E-05
PCB-123	MJ763	-	-	-	3.0E-03	2.3E-03	2.8E-07	2.2E-07	2.8E-07
PCB-126	MJ763	-	-	-	7.5E-03	6.4E-03	7.1E-07	6.0E-07	7.1E-07
PCB-156	MJ763	-	-	-	6.3E-02	5.5E-02	6.0E-06	5.2E-06	6.0E-06
PCB-157	MJ763	-	-	-	1.2E-02	2.5E-02	1.2E-06	2.3E-06	2.3E-06
PCB-167	MJ763	-	-	-	2.1E-02	4.3E-02	2.0E-06	4.1E-06	4.1E-06
PCB-169	MJ763	-	-	-	3.7E-04	6.4E-04	3.5E-08	6.0E-08	6.0E-08
PCB-189	MJ763	-	-	-	3.0E-03	6.4E-03	2.8E-07	6.0E-07	6.0E-07
PCB-77	MJ763	-	-	-	1.5E-02	1.3E-02	1.5E-06	1.2E-06	1.5E-06
PCB-81	MJ763	-	-	-	3.0E-03	2.3E-03	2.8E-07	2.1E-07	2.8E-07
Aroclor-1254	MJ781	8.9E-02	4.5E-02	U	-	-	-	-	-
Aroclor-1260	MJ781	8.9E-02	4.5E-02	U	-	-	-	-	-
PCB-105	MJ781	-	-	-	1.2E-01	8.2E-02	5.5E-06	3.6E-06	5.5E-06
PCB-114	MJ781	-	-	-	4.5E-03	1.5E-03	2.0E-07	6.5E-08	2.0E-07
PCB-118	MJ781	-	-	-	2.7E-01	1.6E-01	1.2E-05	7.3E-06	1.2E-05
PCB-123	MJ781	-	-	-	3.0E-03	2.3E-03	1.3E-07	1.0E-07	1.3E-07
PCB-126	MJ781	-	-	-	7.5E-03	6.4E-03	3.3E-07	2.8E-07	3.3E-07
PCB-156	MJ781	-	-	-	6.3E-02	5.5E-02	2.8E-06	2.4E-06	2.8E-06
PCB-157	MJ781	-	-	-	1.2E-02	2.5E-02	5.5E-07	1.1E-06	1.1E-06
PCB-167	MJ781	-	-	-	2.1E-02	4.3E-02	9.2E-07	1.9E-06	1.9E-06
PCB-169	MJ781	-	-	-	3.7E-04	6.4E-04	1.6E-08	2.8E-08	2.8E-08
PCB-189	MJ781	-	-	-	3.0E-03	6.4E-03	1.3E-07	2.8E-07	2.8E-07
PCB-77	MJ781	-	-	-	1.5E-02	1.3E-02	6.9E-07	5.7E-07	6.9E-07
PCB-81	MJ781	-	-	-	3.0E-03	2.3E-03	1.3E-07	1.0E-07	1.3E-07
Aroclor-1254	MJ782RE	5.4E+00	5.4E+00	J	-	-	-	-	-
Aroclor-1260	MJ782RE	4.3E-01	4.3E-01	J	-	-	-	-	-
PCB-105	MJ782RE	-	-	-	1.2E-01	8.2E-02	6.7E-04	3.5E-05	6.7E-04
PCB-114	MJ782RE	-	-	-	4.5E-03	1.5E-03	2.4E-05	6.3E-07	2.4E-05
PCB-118	MJ782RE	-	-	-	2.7E-01	1.6E-01	1.4E-03	7.0E-05	1.4E-03
PCB-123	MJ782RE	-	-	-	3.0E-03	2.3E-03	1.6E-05	1.0E-06	1.6E-05
PCB-126	MJ782RE	-	-	-	7.5E-03	6.4E-03	4.1E-05	2.7E-06	4.1E-05
PCB-156	MJ782RE	-	-	-	6.3E-02	5.5E-02	3.4E-04	2.3E-05	3.4E-04
PCB-157	MJ782RE	-	-	-	1.2E-02	2.5E-02	6.7E-05	1.1E-05	6.7E-05
PCB-167	MJ782RE	-	-	-	2.1E-02	4.3E-02	1.1E-04	1.8E-05	1.1E-04
PCB-169	MJ782RE	-	-	-	3.7E-04	6.4E-04	2.0E-06	2.7E-07	2.0E-06
PCB-189	MJ782RE	-	-	-	3.0E-03	6.4E-03	1.6E-05	2.7E-06	1.6E-05
PCB-77	MJ782RE	-	-	-	1.5E-02	1.3E-02	8.4E-05	5.5E-06	8.4E-05
PCB-81	MJ782RE	-	-	-	3.0E-03	2.3E-03	1.6E-05	9.7E-07	1.6E-05
Aroclor-1254	MJ783	8.9E-02	4.5E-02	U	-	-	-	-	-
Aroclor-1260	MJ783	8.9E-02	4.5E-02	U	-	-	-	-	-
PCB-105	MJ783	-	-	-	1.2E-01	8.2E-02	5.5E-06	3.6E-06	5.5E-06
PCB-114	MJ783	-	-	-	4.5E-03	1.5E-03	2.0E-07	6.5E-08	2.0E-07
PCB-118	MJ783	-	-	-	2.7E-01	1.6E-01	1.2E-05	7.3E-06	1.2E-05
PCB-123	MJ783	-	-	-	3.0E-03	2.3E-03	1.3E-07	1.0E-07	1.3E-07
PCB-126	MJ783	-	-	-	7.5E-03	6.4E-03	3.3E-07	2.8E-07	3.3E-07
PCB-156	MJ783	-	-	-	6.3E-02	5.5E-02	2.8E-06	2.4E-06	2.8E-06
PCB-157	MJ783	-	-	-	1.2E-02	2.5E-02	5.5E-07	1.1E-06	1.1E-06
PCB-167	MJ783	-	-	-	2.1E-02	4.3E-02	9.2E-07	1.9E-06	1.9E-06
PCB-169	MJ783	-	-	-	3.7E-04	6.4E-04	1.6E-08	2.8E-08	2.8E-08
PCB-189	MJ783	-	-	-	3.0E-03	6.4E-03	1.3E-07	2.8E-07	2.8E-07

Aroclor to PCB Congener Extrapolation for Soil (0-10 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentrations (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF_{1254}	EF_{1260}	Estimated Concentrations Aroclor-1254 (mg/kg)	Estimated Concentrations Aroclor-1260 (mg/kg)	Estimated Concentrations PCB_{MAX} (mg/kg)
PCB-77	MJ783	-	-	-	1.5E-02	1.3E-02	6.9E-07	5.7E-07	6.9E-07
PCB-81	MJ783	-	-	-	3.0E-03	2.3E-03	1.3E-07	1.0E-07	1.3E-07
Aroclor-1254	MJ784	8.6E+01	4.3E+01	U	-	-	-	-	-
Aroclor-1260	MJ784	6.3E+02	6.3E+02	J	-	-	-	-	-
PCB-105	MJ784	-	-	-	1.2E-01	8.2E-02	5.3E-03	5.2E-02	5.2E-02
PCB-114	MJ784	-	-	-	4.5E-03	1.5E-03	2.0E-04	9.2E-04	9.2E-04
PCB-118	MJ784	-	-	-	2.7E-01	1.6E-01	1.2E-02	1.0E-01	1.0E-01
PCB-123	MJ784	-	-	-	3.0E-03	2.3E-03	1.3E-04	1.5E-03	1.5E-03
PCB-126	MJ784	-	-	-	7.5E-03	6.4E-03	3.2E-04	4.0E-03	4.0E-03
PCB-156	MJ784	-	-	-	6.3E-02	5.5E-02	2.7E-03	3.4E-02	3.4E-02
PCB-157	MJ784	-	-	-	1.2E-02	2.5E-02	5.3E-04	1.5E-02	1.5E-02
PCB-167	MJ784	-	-	-	2.1E-02	4.3E-02	8.9E-04	2.7E-02	2.7E-02
PCB-169	MJ784	-	-	-	3.7E-04	6.4E-04	1.6E-05	4.0E-04	4.0E-04
PCB-189	MJ784	-	-	-	3.0E-03	6.4E-03	1.3E-04	4.0E-03	4.0E-03
PCB-77	MJ784	-	-	-	1.5E-02	1.3E-02	6.6E-04	8.0E-03	8.0E-03
PCB-81	MJ784	-	-	-	3.0E-03	2.3E-03	1.3E-04	1.4E-03	1.4E-03
Aroclor-1254	MJ786	9.4E-02	4.7E-02	U	-	-	-	-	-
Aroclor-1260	MJ786	9.4E-02	4.7E-02	U	-	-	-	-	-
PCB-105	MJ786	-	-	-	1.2E-01	8.2E-02	5.8E-06	3.8E-06	5.8E-06
PCB-114	MJ786	-	-	-	4.5E-03	1.5E-03	2.1E-07	6.8E-08	2.1E-07
PCB-118	MJ786	-	-	-	2.7E-01	1.6E-01	1.3E-05	7.7E-06	1.3E-05
PCB-123	MJ786	-	-	-	3.0E-03	2.3E-03	1.4E-07	1.1E-07	1.4E-07
PCB-126	MJ786	-	-	-	7.5E-03	6.4E-03	3.5E-07	3.0E-07	3.5E-07
PCB-156	MJ786	-	-	-	6.3E-02	5.5E-02	3.0E-06	2.6E-06	3.0E-06
PCB-157	MJ786	-	-	-	1.2E-02	2.5E-02	5.8E-07	1.2E-06	1.2E-06
PCB-167	MJ786	-	-	-	2.1E-02	4.3E-02	9.7E-07	2.0E-06	2.0E-06
PCB-169	MJ786	-	-	-	3.7E-04	6.4E-04	1.7E-08	3.0E-08	3.0E-08
PCB-189	MJ786	-	-	-	3.0E-03	6.4E-03	1.4E-07	3.0E-07	3.0E-07
PCB-77	MJ786	-	-	-	1.5E-02	1.3E-02	7.3E-07	6.0E-07	7.3E-07
PCB-81	MJ786	-	-	-	3.0E-03	2.3E-03	1.4E-07	1.1E-07	1.4E-07
Aroclor-1254	MJ787	2.5E-01	2.5E-01	J	-	-	-	-	-
Aroclor-1260	MJ787	9.6E-02	4.8E-02	U	-	-	-	-	-
PCB-105	MJ787	-	-	-	1.2E-01	8.2E-02	3.1E-05	3.9E-06	3.1E-05
PCB-114	MJ787	-	-	-	4.5E-03	1.5E-03	1.1E-06	7.0E-08	1.1E-06
PCB-118	MJ787	-	-	-	2.7E-01	1.6E-01	6.7E-05	7.9E-06	6.7E-05
PCB-123	MJ787	-	-	-	3.0E-03	2.3E-03	7.5E-07	1.1E-07	7.5E-07
PCB-126	MJ787	-	-	-	7.5E-03	6.4E-03	1.9E-06	3.1E-07	1.9E-06
PCB-156	MJ787	-	-	-	6.3E-02	5.5E-02	1.6E-05	2.6E-06	1.6E-05
PCB-157	MJ787	-	-	-	1.2E-02	2.5E-02	3.1E-06	1.2E-06	3.1E-06
PCB-167	MJ787	-	-	-	2.1E-02	4.3E-02	5.2E-06	2.1E-06	5.2E-06
PCB-169	MJ787	-	-	-	3.7E-04	6.4E-04	9.1E-08	3.1E-08	9.1E-08
PCB-189	MJ787	-	-	-	3.0E-03	6.4E-03	7.5E-07	3.1E-07	7.5E-07
PCB-77	MJ787	-	-	-	1.5E-02	1.3E-02	3.9E-06	6.1E-07	3.9E-06
PCB-81	MJ787	-	-	-	3.0E-03	2.3E-03	7.5E-07	1.1E-07	7.5E-07
Aroclor-1254	MJ788	9.1E-02	4.6E-02	U	-	-	-	-	-
Aroclor-1260	MJ788	9.1E-02	4.6E-02	U	-	-	-	-	-
PCB-105	MJ788	-	-	-	1.2E-01	8.2E-02	5.6E-06	3.7E-06	5.6E-06
PCB-114	MJ788	-	-	-	4.5E-03	1.5E-03	2.1E-07	6.6E-08	2.1E-07
PCB-118	MJ788	-	-	-	2.7E-01	1.6E-01	1.2E-05	7.4E-06	1.2E-05
PCB-123	MJ788	-	-	-	3.0E-03	2.3E-03	1.4E-07	1.1E-07	1.4E-07
PCB-126	MJ788	-	-	-	7.5E-03	6.4E-03	3.4E-07	2.9E-07	3.4E-07
PCB-156	MJ788	-	-	-	6.3E-02	5.5E-02	2.9E-06	2.5E-06	2.9E-06
PCB-157	MJ788	-	-	-	1.2E-02	2.5E-02	5.6E-07	1.1E-06	1.1E-06
PCB-167	MJ788	-	-	-	2.1E-02	4.3E-02	9.4E-07	1.9E-06	1.9E-06
PCB-169	MJ788	-	-	-	3.7E-04	6.4E-04	1.7E-08	2.9E-08	2.9E-08
PCB-189	MJ788	-	-	-	3.0E-03	6.4E-03	1.4E-07	2.9E-07	2.9E-07
PCB-77	MJ788	-	-	-	1.5E-02	1.3E-02	7.0E-07	5.8E-07	7.0E-07
PCB-81	MJ788	-	-	-	3.0E-03	2.3E-03	1.4E-07	1.0E-07	1.4E-07

Aroclor to PCB Congener Extrapolation for Soil (0-10 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentrations (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF_{1254}	EF_{1260}	Estimated Concentrations Aroclor-1254 (mg/kg)	Estimated Concentrations Aroclor-1260 (mg/kg)	Estimated Concentrations PCB_{MAX} (mg/kg)
Aroclor-1254	MJ789	5.6E-02	2.8E-02	U	-	-	-	-	-
Aroclor-1260	MJ789	5.6E-02	2.8E-02	U	-	-	-	-	-
PCB-105	MJ789	-	-	-	1.2E-01	8.2E-02	3.5E-06	2.3E-06	3.5E-06
PCB-114	MJ789	-	-	-	4.5E-03	1.5E-03	1.3E-07	4.1E-08	1.3E-07
PCB-118	MJ789	-	-	-	2.7E-01	1.6E-01	7.5E-06	4.6E-06	7.5E-06
PCB-123	MJ789	-	-	-	3.0E-03	2.3E-03	8.4E-08	6.5E-08	8.4E-08
PCB-126	MJ789	-	-	-	7.5E-03	6.4E-03	2.1E-07	1.8E-07	2.1E-07
PCB-156	MJ789	-	-	-	6.3E-02	5.5E-02	1.8E-06	1.5E-06	1.8E-06
PCB-157	MJ789	-	-	-	1.2E-02	2.5E-02	3.5E-07	6.9E-07	6.9E-07
PCB-167	MJ789	-	-	-	2.1E-02	4.3E-02	5.8E-07	1.2E-06	1.2E-06
PCB-169	MJ789	-	-	-	3.7E-04	6.4E-04	1.0E-08	1.8E-08	1.8E-08
PCB-189	MJ789	-	-	-	3.0E-03	6.4E-03	8.4E-08	1.8E-07	1.8E-07
PCB-77	MJ789	-	-	-	1.5E-02	1.3E-02	4.3E-07	3.6E-07	4.3E-07
PCB-81	MJ789	-	-	-	3.0E-03	2.3E-03	8.4E-08	6.3E-08	8.4E-08
Aroclor-1254	MJ790	9.1E-02	4.6E-02	U	-	-	-	-	-
Aroclor-1260	MJ790	9.1E-02	4.6E-02	U	-	-	-	-	-
PCB-105	MJ790	-	-	-	1.2E-01	8.2E-02	5.6E-06	3.7E-06	5.6E-06
PCB-114	MJ790	-	-	-	4.5E-03	1.5E-03	2.1E-07	6.6E-08	2.1E-07
PCB-118	MJ790	-	-	-	2.7E-01	1.6E-01	1.2E-05	7.4E-06	1.2E-05
PCB-123	MJ790	-	-	-	3.0E-03	2.3E-03	1.4E-07	1.1E-07	1.4E-07
PCB-126	MJ790	-	-	-	7.5E-03	6.4E-03	3.4E-07	2.9E-07	3.4E-07
PCB-156	MJ790	-	-	-	6.3E-02	5.5E-02	2.9E-06	2.5E-06	2.9E-06
PCB-157	MJ790	-	-	-	1.2E-02	2.5E-02	5.6E-07	1.1E-06	1.1E-06
PCB-167	MJ790	-	-	-	2.1E-02	4.3E-02	9.4E-07	1.9E-06	1.9E-06
PCB-169	MJ790	-	-	-	3.7E-04	6.4E-04	1.7E-08	2.9E-08	2.9E-08
PCB-189	MJ790	-	-	-	3.0E-03	6.4E-03	1.4E-07	2.9E-07	2.9E-07
PCB-77	MJ790	-	-	-	1.5E-02	1.3E-02	7.0E-07	5.8E-07	7.0E-07
PCB-81	MJ790	-	-	-	3.0E-03	2.3E-03	1.4E-07	1.0E-07	1.4E-07
Aroclor-1254	MJ791	8.6E-02	4.3E-02	U	-	-	-	-	-
Aroclor-1260	MJ791	8.6E-02	4.3E-02	U	-	-	-	-	-
PCB-105	MJ791	-	-	-	1.2E-01	8.2E-02	5.3E-06	3.5E-06	5.3E-06
PCB-114	MJ791	-	-	-	4.5E-03	1.5E-03	2.0E-07	6.3E-08	2.0E-07
PCB-118	MJ791	-	-	-	2.7E-01	1.6E-01	1.2E-05	7.0E-06	1.2E-05
PCB-123	MJ791	-	-	-	3.0E-03	2.3E-03	1.3E-07	1.0E-07	1.3E-07
PCB-126	MJ791	-	-	-	7.5E-03	6.4E-03	3.2E-07	2.7E-07	3.2E-07
PCB-156	MJ791	-	-	-	6.3E-02	5.5E-02	2.7E-06	2.3E-06	2.7E-06
PCB-157	MJ791	-	-	-	1.2E-02	2.5E-02	5.3E-07	1.1E-06	1.1E-06
PCB-167	MJ791	-	-	-	2.1E-02	4.3E-02	8.9E-07	1.8E-06	1.8E-06
PCB-169	MJ791	-	-	-	3.7E-04	6.4E-04	1.6E-08	2.7E-08	2.7E-08
PCB-189	MJ791	-	-	-	3.0E-03	6.4E-03	1.3E-07	2.7E-07	2.7E-07
PCB-77	MJ791	-	-	-	1.5E-02	1.3E-02	6.6E-07	5.5E-07	6.6E-07
PCB-81	MJ791	-	-	-	3.0E-03	2.3E-03	1.3E-07	9.7E-08	1.3E-07
Aroclor-1254	MJ794	9.0E-02	4.5E-02	U	-	-	-	-	-
Aroclor-1260	MJ794	9.0E-02	4.5E-02	U	-	-	-	-	-
PCB-105	MJ794	-	-	-	1.2E-01	8.2E-02	5.6E-06	3.7E-06	5.6E-06
PCB-114	MJ794	-	-	-	4.5E-03	1.5E-03	2.0E-07	6.5E-08	2.0E-07
PCB-118	MJ794	-	-	-	2.7E-01	1.6E-01	1.2E-05	7.4E-06	1.2E-05
PCB-123	MJ794	-	-	-	3.0E-03	2.3E-03	1.3E-07	1.0E-07	1.3E-07
PCB-126	MJ794	-	-	-	7.5E-03	6.4E-03	3.4E-07	2.9E-07	3.4E-07
PCB-156	MJ794	-	-	-	6.3E-02	5.5E-02	2.8E-06	2.5E-06	2.8E-06
PCB-157	MJ794	-	-	-	1.2E-02	2.5E-02	5.6E-07	1.1E-06	1.1E-06
PCB-167	MJ794	-	-	-	2.1E-02	4.3E-02	9.3E-07	1.9E-06	1.9E-06
PCB-169	MJ794	-	-	-	3.7E-04	6.4E-04	1.6E-08	2.9E-08	2.9E-08
PCB-189	MJ794	-	-	-	3.0E-03	6.4E-03	1.3E-07	2.9E-07	2.9E-07
PCB-77	MJ794	-	-	-	1.5E-02	1.3E-02	7.0E-07	5.7E-07	7.0E-07
PCB-81	MJ794	-	-	-	3.0E-03	2.3E-03	1.3E-07	1.0E-07	1.3E-07
Aroclor-1254	MJ795	1.0E-01	5.0E-02	U	-	-	-	-	-
Aroclor-1260	MJ795	1.0E-01	5.0E-02	U	-	-	-	-	-

Aroclor to PCB Congener Extrapolation for Soil (0-10 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentrations (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF_{1254}	EF_{1260}	Estimated Concentrations Aroclor-1254 (mg/kg)	Estimated Concentrations Aroclor-1260 (mg/kg)	Estimated Concentrations PCB_{MAX} (mg/kg)
PCB-105	MJ795	-	-	-	1.2E-01	8.2E-02	6.2E-06	4.1E-06	6.2E-06
PCB-114	MJ795	-	-	-	4.5E-03	1.5E-03	2.3E-07	7.3E-08	2.3E-07
PCB-118	MJ795	-	-	-	2.7E-01	1.6E-01	1.3E-05	8.2E-06	1.3E-05
PCB-123	MJ795	-	-	-	3.0E-03	2.3E-03	1.5E-07	1.2E-07	1.5E-07
PCB-126	MJ795	-	-	-	7.5E-03	6.4E-03	3.8E-07	3.2E-07	3.8E-07
PCB-156	MJ795	-	-	-	6.3E-02	5.5E-02	3.1E-06	2.7E-06	3.1E-06
PCB-157	MJ795	-	-	-	1.2E-02	2.5E-02	6.2E-07	1.2E-06	1.2E-06
PCB-167	MJ795	-	-	-	2.1E-02	4.3E-02	1.0E-06	2.1E-06	2.1E-06
PCB-169	MJ795	-	-	-	3.7E-04	6.4E-04	1.8E-08	3.2E-08	3.2E-08
PCB-189	MJ795	-	-	-	3.0E-03	6.4E-03	1.5E-07	3.2E-07	3.2E-07
PCB-77	MJ795	-	-	-	1.5E-02	1.3E-02	7.7E-07	6.4E-07	7.7E-07
PCB-81	MJ795	-	-	-	3.0E-03	2.3E-03	1.5E-07	1.1E-07	1.5E-07
Aroclor-1254	MJ796	1.9E-01	9.5E-02	U	-	-	-	-	-
Aroclor-1260	MJ796	1.9E-01	9.5E-02	U	-	-	-	-	-
PCB-105	MJ796	-	-	-	1.2E-01	8.2E-02	1.2E-05	7.8E-06	1.2E-05
PCB-114	MJ796	-	-	-	4.5E-03	1.5E-03	4.3E-07	1.4E-07	4.3E-07
PCB-118	MJ796	-	-	-	2.7E-01	1.6E-01	2.5E-05	1.6E-05	2.5E-05
PCB-123	MJ796	-	-	-	3.0E-03	2.3E-03	2.8E-07	2.2E-07	2.8E-07
PCB-126	MJ796	-	-	-	7.5E-03	6.4E-03	7.1E-07	6.0E-07	7.1E-07
PCB-156	MJ796	-	-	-	6.3E-02	5.5E-02	6.0E-06	5.2E-06	6.0E-06
PCB-157	MJ796	-	-	-	1.2E-02	2.5E-02	1.2E-06	2.3E-06	2.3E-06
PCB-167	MJ796	-	-	-	2.1E-02	4.3E-02	2.0E-06	4.1E-06	4.1E-06
PCB-169	MJ796	-	-	-	3.7E-04	6.4E-04	3.5E-08	6.0E-08	6.0E-08
PCB-189	MJ796	-	-	-	3.0E-03	6.4E-03	2.8E-07	6.0E-07	6.0E-07
PCB-77	MJ796	-	-	-	1.5E-02	1.3E-02	1.5E-06	1.2E-06	1.5E-06
PCB-81	MJ796	-	-	-	3.0E-03	2.3E-03	2.8E-07	2.1E-07	2.8E-07
Aroclor-1254	MJ798	8.4E-02	4.2E-02	U	-	-	-	-	-
Aroclor-1260	MJ798	8.4E-02	4.2E-02	U	-	-	-	-	-
PCB-105	MJ798	-	-	-	1.2E-01	8.2E-02	5.2E-06	3.4E-06	5.2E-06
PCB-114	MJ798	-	-	-	4.5E-03	1.5E-03	1.9E-07	6.1E-08	1.9E-07
PCB-118	MJ798	-	-	-	2.7E-01	1.6E-01	1.1E-05	6.9E-06	1.1E-05
PCB-123	MJ798	-	-	-	3.0E-03	2.3E-03	1.3E-07	9.7E-08	1.3E-07
PCB-126	MJ798	-	-	-	7.5E-03	6.4E-03	3.2E-07	2.7E-07	3.2E-07
PCB-156	MJ798	-	-	-	6.3E-02	5.5E-02	2.6E-06	2.3E-06	2.6E-06
PCB-157	MJ798	-	-	-	1.2E-02	2.5E-02	5.2E-07	1.0E-06	1.0E-06
PCB-167	MJ798	-	-	-	2.1E-02	4.3E-02	8.7E-07	1.8E-06	1.8E-06
PCB-169	MJ798	-	-	-	3.7E-04	6.4E-04	1.5E-08	2.7E-08	2.7E-08
PCB-189	MJ798	-	-	-	3.0E-03	6.4E-03	1.3E-07	2.7E-07	2.7E-07
PCB-77	MJ798	-	-	-	1.5E-02	1.3E-02	6.5E-07	5.3E-07	6.5E-07
PCB-81	MJ798	-	-	-	3.0E-03	2.3E-03	1.3E-07	9.5E-08	1.3E-07
Aroclor-1254	MJ799	8.2E-02	4.1E-02	U	-	-	-	-	-
Aroclor-1260	MJ799	8.2E-02	4.1E-02	U	-	-	-	-	-
PCB-105	MJ799	-	-	-	1.2E-01	8.2E-02	5.1E-06	3.4E-06	5.1E-06
PCB-114	MJ799	-	-	-	4.5E-03	1.5E-03	1.9E-07	6.0E-08	1.9E-07
PCB-118	MJ799	-	-	-	2.7E-01	1.6E-01	1.1E-05	6.7E-06	1.1E-05
PCB-123	MJ799	-	-	-	3.0E-03	2.3E-03	1.2E-07	9.5E-08	1.2E-07
PCB-126	MJ799	-	-	-	7.5E-03	6.4E-03	3.1E-07	2.6E-07	3.1E-07
PCB-156	MJ799	-	-	-	6.3E-02	5.5E-02	2.6E-06	2.2E-06	2.6E-06
PCB-157	MJ799	-	-	-	1.2E-02	2.5E-02	5.1E-07	1.0E-06	1.0E-06
PCB-167	MJ799	-	-	-	2.1E-02	4.3E-02	8.5E-07	1.8E-06	1.8E-06
PCB-169	MJ799	-	-	-	3.7E-04	6.4E-04	1.5E-08	2.6E-08	2.6E-08
PCB-189	MJ799	-	-	-	3.0E-03	6.4E-03	1.2E-07	2.6E-07	2.6E-07
PCB-77	MJ799	-	-	-	1.5E-02	1.3E-02	6.3E-07	5.2E-07	6.3E-07
PCB-81	MJ799	-	-	-	3.0E-03	2.3E-03	1.2E-07	9.2E-08	1.2E-07
Aroclor-1254	MJ800	8.1E-02	4.1E-02	U	-	-	-	-	-
Aroclor-1260	MJ800	8.1E-02	4.1E-02	U	-	-	-	-	-
PCB-105	MJ800	-	-	-	1.2E-01	8.2E-02	5.0E-06	3.3E-06	5.0E-06
PCB-114	MJ800	-	-	-	4.5E-03	1.5E-03	1.8E-07	5.9E-08	1.8E-07

Aroclor to PCB Congener Extrapolation for Soil (0-10 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentrations (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF_{1254}	EF_{1260}	Estimated Concentrations Aroclor-1254 (mg/kg)	Estimated Concentrations Aroclor-1260 (mg/kg)	Estimated Concentrations PCB_{MAX} (mg/kg)
PCB-118	MJ800	-	-	-	2.7E-01	1.6E-01	1.1E-05	6.6E-06	1.1E-05
PCB-123	MJ800	-	-	-	3.0E-03	2.3E-03	1.2E-07	9.4E-08	1.2E-07
PCB-126	MJ800	-	-	-	7.5E-03	6.4E-03	3.0E-07	2.6E-07	3.0E-07
PCB-156	MJ800	-	-	-	6.3E-02	5.5E-02	2.5E-06	2.2E-06	2.5E-06
PCB-157	MJ800	-	-	-	1.2E-02	2.5E-02	5.0E-07	9.9E-07	9.9E-07
PCB-167	MJ800	-	-	-	2.1E-02	4.3E-02	8.4E-07	1.7E-06	1.7E-06
PCB-169	MJ800	-	-	-	3.7E-04	6.4E-04	1.5E-08	2.6E-08	2.6E-08
PCB-189	MJ800	-	-	-	3.0E-03	6.4E-03	1.2E-07	2.6E-07	2.6E-07
PCB-77	MJ800	-	-	-	1.5E-02	1.3E-02	6.3E-07	5.2E-07	6.3E-07
PCB-81	MJ800	-	-	-	3.0E-03	2.3E-03	1.2E-07	9.1E-08	1.2E-07
Aroclor-1254	MJ803	9.6E-02	4.8E-02	U	-	-	-	-	-
Aroclor-1260	MJ803	9.6E-02	4.8E-02	U	-	-	-	-	-
PCB-105	MJ803	-	-	-	1.2E-01	8.2E-02	5.9E-06	3.9E-06	5.9E-06
PCB-114	MJ803	-	-	-	4.5E-03	1.5E-03	2.2E-07	7.0E-08	2.2E-07
PCB-118	MJ803	-	-	-	2.7E-01	1.6E-01	1.3E-05	7.9E-06	1.3E-05
PCB-123	MJ803	-	-	-	3.0E-03	2.3E-03	1.4E-07	1.1E-07	1.4E-07
PCB-126	MJ803	-	-	-	7.5E-03	6.4E-03	3.6E-07	3.1E-07	3.6E-07
PCB-156	MJ803	-	-	-	6.3E-02	5.5E-02	3.0E-06	2.6E-06	3.0E-06
PCB-157	MJ803	-	-	-	1.2E-02	2.5E-02	5.9E-07	1.2E-06	1.2E-06
PCB-167	MJ803	-	-	-	2.1E-02	4.3E-02	9.9E-07	2.1E-06	2.1E-06
PCB-169	MJ803	-	-	-	3.7E-04	6.4E-04	1.8E-08	3.1E-08	3.1E-08
PCB-189	MJ803	-	-	-	3.0E-03	6.4E-03	1.4E-07	3.1E-07	3.1E-07
PCB-77	MJ803	-	-	-	1.5E-02	1.3E-02	7.4E-07	6.1E-07	7.4E-07
PCB-81	MJ803	-	-	-	3.0E-03	2.3E-03	1.4E-07	1.1E-07	1.4E-07
Aroclor-1254	MJ805	9.4E-02	4.7E-02	U	-	-	-	-	-
Aroclor-1260	MJ805	9.4E-02	4.7E-02	U	-	-	-	-	-
PCB-105	MJ805	-	-	-	1.2E-01	8.2E-02	5.8E-06	3.8E-06	5.8E-06
PCB-114	MJ805	-	-	-	4.5E-03	1.5E-03	2.1E-07	6.8E-08	2.1E-07
PCB-118	MJ805	-	-	-	2.7E-01	1.6E-01	1.3E-05	7.7E-06	1.3E-05
PCB-123	MJ805	-	-	-	3.0E-03	2.3E-03	1.4E-07	1.1E-07	1.4E-07
PCB-126	MJ805	-	-	-	7.5E-03	6.4E-03	3.5E-07	3.0E-07	3.5E-07
PCB-156	MJ805	-	-	-	6.3E-02	5.5E-02	3.0E-06	2.6E-06	3.0E-06
PCB-157	MJ805	-	-	-	1.2E-02	2.5E-02	5.8E-07	1.2E-06	1.2E-06
PCB-167	MJ805	-	-	-	2.1E-02	4.3E-02	9.7E-07	2.0E-06	2.0E-06
PCB-169	MJ805	-	-	-	3.7E-04	6.4E-04	1.7E-08	3.0E-08	3.0E-08
PCB-189	MJ805	-	-	-	3.0E-03	6.4E-03	1.4E-07	3.0E-07	3.0E-07
PCB-77	MJ805	-	-	-	1.5E-02	1.3E-02	7.3E-07	6.0E-07	7.3E-07
PCB-81	MJ805	-	-	-	3.0E-03	2.3E-03	1.4E-07	1.1E-07	1.4E-07
Aroclor-1254	MJ806	8.6E-02	4.3E-02	U	-	-	-	-	-
Aroclor-1260	MJ806	8.6E-02	4.3E-02	U	-	-	-	-	-
PCB-105	MJ806	-	-	-	1.2E-01	8.2E-02	5.3E-06	3.5E-06	5.3E-06
PCB-114	MJ806	-	-	-	4.5E-03	1.5E-03	2.0E-07	6.3E-08	2.0E-07
PCB-118	MJ806	-	-	-	2.7E-01	1.6E-01	1.2E-05	7.0E-06	1.2E-05
PCB-123	MJ806	-	-	-	3.0E-03	2.3E-03	1.3E-07	1.0E-07	1.3E-07
PCB-126	MJ806	-	-	-	7.5E-03	6.4E-03	3.2E-07	2.7E-07	3.2E-07
PCB-156	MJ806	-	-	-	6.3E-02	5.5E-02	2.7E-06	2.3E-06	2.7E-06
PCB-157	MJ806	-	-	-	1.2E-02	2.5E-02	5.3E-07	1.1E-06	1.1E-06
PCB-167	MJ806	-	-	-	2.1E-02	4.3E-02	8.9E-07	1.8E-06	1.8E-06
PCB-169	MJ806	-	-	-	3.7E-04	6.4E-04	1.6E-08	2.7E-08	2.7E-08
PCB-189	MJ806	-	-	-	3.0E-03	6.4E-03	1.3E-07	2.7E-07	2.7E-07
PCB-77	MJ806	-	-	-	1.5E-02	1.3E-02	6.6E-07	5.5E-07	6.6E-07
PCB-81	MJ806	-	-	-	3.0E-03	2.3E-03	1.3E-07	9.7E-08	1.3E-07
Aroclor-1254	MJ808	8.9E+00	4.5E+00	U	-	-	-	-	-
Aroclor-1260	MJ808	8.9E+00	4.5E+00	U	-	-	-	-	-
PCB-105	MJ808	-	-	-	1.2E-01	8.2E-02	5.5E-04	3.6E-04	5.5E-04
PCB-114	MJ808	-	-	-	4.5E-03	1.5E-03	2.0E-05	6.5E-06	2.0E-05
PCB-118	MJ808	-	-	-	2.7E-01	1.6E-01	1.2E-03	7.3E-04	1.2E-03
PCB-123	MJ808	-	-	-	3.0E-03	2.3E-03	1.3E-05	1.0E-05	1.3E-05

Aroclor to PCB Congener Extrapolation for Soil (0-10 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentrations (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF_{1254}	EF_{1260}	Estimated Concentrations Aroclor-1254 (mg/kg)	Estimated Concentrations Aroclor-1260 (mg/kg)	Estimated Concentrations PCB_{MAX} (mg/kg)
PCB-126	MJ808	-	-	-	7.5E-03	6.4E-03	3.3E-05	2.8E-05	3.3E-05
PCB-156	MJ808	-	-	-	6.3E-02	5.5E-02	2.8E-04	2.4E-04	2.8E-04
PCB-157	MJ808	-	-	-	1.2E-02	2.5E-02	5.5E-05	1.1E-04	1.1E-04
PCB-167	MJ808	-	-	-	2.1E-02	4.3E-02	9.2E-05	1.9E-04	1.9E-04
PCB-169	MJ808	-	-	-	3.7E-04	6.4E-04	1.6E-06	2.8E-06	2.8E-06
PCB-189	MJ808	-	-	-	3.0E-03	6.4E-03	1.3E-05	2.8E-05	2.8E-05
PCB-77	MJ808	-	-	-	1.5E-02	1.3E-02	6.9E-05	5.7E-05	6.9E-05
PCB-81	MJ808	-	-	-	3.0E-03	2.3E-03	1.3E-05	1.0E-05	1.3E-05
Aroclor-1254	MJ814	5.6E-02	2.8E-02	U	-	-	-	-	-
Aroclor-1260	MJ814	5.6E-02	2.8E-02	U	-	-	-	-	-
PCB-105	MJ814	-	-	-	1.2E-01	8.2E-02	3.5E-06	2.3E-06	3.5E-06
PCB-114	MJ814	-	-	-	4.5E-03	1.5E-03	1.3E-07	4.1E-08	1.3E-07
PCB-118	MJ814	-	-	-	2.7E-01	1.6E-01	7.5E-06	4.6E-06	7.5E-06
PCB-123	MJ814	-	-	-	3.0E-03	2.3E-03	8.4E-08	6.5E-08	8.4E-08
PCB-126	MJ814	-	-	-	7.5E-03	6.4E-03	2.1E-07	1.8E-07	2.1E-07
PCB-156	MJ814	-	-	-	6.3E-02	5.5E-02	1.8E-06	1.5E-06	1.8E-06
PCB-157	MJ814	-	-	-	1.2E-02	2.5E-02	3.5E-07	6.9E-07	6.9E-07
PCB-167	MJ814	-	-	-	2.1E-02	4.3E-02	5.8E-07	1.2E-06	1.2E-06
PCB-169	MJ814	-	-	-	3.7E-04	6.4E-04	1.0E-08	1.8E-08	1.8E-08
PCB-189	MJ814	-	-	-	3.0E-03	6.4E-03	8.4E-08	1.8E-07	1.8E-07
PCB-77	MJ814	-	-	-	1.5E-02	1.3E-02	4.3E-07	3.6E-07	4.3E-07
PCB-81	MJ814	-	-	-	3.0E-03	2.3E-03	8.4E-08	6.3E-08	8.4E-08
Aroclor-1254	MT801	5.1E-02	2.6E-02	U	-	-	-	-	-
Aroclor-1260	MT801	5.1E-02	2.6E-02	U	-	-	-	-	-
PCB-105	MT801	-	-	-	1.2E-01	8.2E-02	3.2E-06	2.1E-06	3.2E-06
PCB-114	MT801	-	-	-	4.5E-03	1.5E-03	1.2E-07	3.7E-08	1.2E-07
PCB-118	MT801	-	-	-	2.7E-01	1.6E-01	6.8E-06	4.2E-06	6.8E-06
PCB-123	MT801	-	-	-	3.0E-03	2.3E-03	7.6E-08	5.9E-08	7.6E-08
PCB-126	MT801	-	-	-	7.5E-03	6.4E-03	1.9E-07	1.6E-07	1.9E-07
PCB-156	MT801	-	-	-	6.3E-02	5.5E-02	1.6E-06	1.4E-06	1.6E-06
PCB-157	MT801	-	-	-	1.2E-02	2.5E-02	3.2E-07	6.3E-07	6.3E-07
PCB-167	MT801	-	-	-	2.1E-02	4.3E-02	5.3E-07	1.1E-06	1.1E-06
PCB-169	MT801	-	-	-	3.7E-04	6.4E-04	9.3E-09	1.6E-08	1.6E-08
PCB-189	MT801	-	-	-	3.0E-03	6.4E-03	7.6E-08	1.6E-07	1.6E-07
PCB-77	MT801	-	-	-	1.5E-02	1.3E-02	3.9E-07	3.2E-07	3.9E-07
PCB-81	MT801	-	-	-	3.0E-03	2.3E-03	7.6E-08	5.7E-08	7.6E-08
Aroclor-1254	MT802	5.1E-02	2.6E-02	U	-	-	-	-	-
Aroclor-1260	MT802	5.1E-02	2.6E-02	U	-	-	-	-	-
PCB-105	MT802	-	-	-	1.2E-01	8.2E-02	3.2E-06	2.1E-06	3.2E-06
PCB-114	MT802	-	-	-	4.5E-03	1.5E-03	1.2E-07	3.7E-08	1.2E-07
PCB-118	MT802	-	-	-	2.7E-01	1.6E-01	6.8E-06	4.2E-06	6.8E-06
PCB-123	MT802	-	-	-	3.0E-03	2.3E-03	7.6E-08	5.9E-08	7.6E-08
PCB-126	MT802	-	-	-	7.5E-03	6.4E-03	1.9E-07	1.6E-07	1.9E-07
PCB-156	MT802	-	-	-	6.3E-02	5.5E-02	1.6E-06	1.4E-06	1.6E-06
PCB-157	MT802	-	-	-	1.2E-02	2.5E-02	3.2E-07	6.3E-07	6.3E-07
PCB-167	MT802	-	-	-	2.1E-02	4.3E-02	5.3E-07	1.1E-06	1.1E-06
PCB-169	MT802	-	-	-	3.7E-04	6.4E-04	9.3E-09	1.6E-08	1.6E-08
PCB-189	MT802	-	-	-	3.0E-03	6.4E-03	7.6E-08	1.6E-07	1.6E-07
PCB-77	MT802	-	-	-	1.5E-02	1.3E-02	3.9E-07	3.2E-07	3.9E-07
PCB-81	MT802	-	-	-	3.0E-03	2.3E-03	7.6E-08	5.7E-08	7.6E-08
Aroclor-1254	RJ772	9.4E-02	9.4E-02	J	-	-	-	-	-
Aroclor-1260	RJ772	2.0E-02	2.0E-02	J	-	-	-	-	-
PCB-105	RJ772	-	-	-	1.2E-01	8.2E-02	1.2E-05	1.6E-06	1.2E-05
PCB-114	RJ772	-	-	-	4.5E-03	1.5E-03	4.3E-07	2.9E-08	4.3E-07
PCB-118	RJ772	-	-	-	2.7E-01	1.6E-01	2.5E-05	3.3E-06	2.5E-05
PCB-123	RJ772	-	-	-	3.0E-03	2.3E-03	2.8E-07	4.6E-08	2.8E-07
PCB-126	RJ772	-	-	-	7.5E-03	6.4E-03	7.1E-07	1.3E-07	7.1E-07
PCB-156	RJ772	-	-	-	6.3E-02	5.5E-02	5.9E-06	1.1E-06	5.9E-06

Aroclor to PCB Congener Extrapolation for Soil (0-10 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentrations (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF_{1254}	EF_{1260}	Estimated Concentrations Aroclor-1254 (mg/kg)	Estimated Concentrations Aroclor-1260 (mg/kg)	Estimated Concentrations PCB_{MAX} (mg/kg)
PCB-157	RJ772	-	-	-	1.2E-02	2.5E-02	1.2E-06	4.9E-07	1.2E-06
PCB-167	RJ772	-	-	-	2.1E-02	4.3E-02	1.9E-06	8.5E-07	1.9E-06
PCB-169	RJ772	-	-	-	3.7E-04	6.4E-04	3.4E-08	1.3E-08	3.4E-08
PCB-189	RJ772	-	-	-	3.0E-03	6.4E-03	2.8E-07	1.3E-07	2.8E-07
PCB-77	RJ772	-	-	-	1.5E-02	1.3E-02	1.5E-06	2.5E-07	1.5E-06
PCB-81	RJ772	-	-	-	3.0E-03	2.3E-03	2.8E-07	4.5E-08	2.8E-07
Aroclor-1254	RJ774	3.4E-02	1.7E-02	U	-	-	-	-	-
Aroclor-1260	RJ774	3.4E-02	1.7E-02	U	-	-	-	-	-
PCB-105	RJ774	-	-	-	1.2E-01	8.2E-02	2.1E-06	1.4E-06	2.1E-06
PCB-114	RJ774	-	-	-	4.5E-03	1.5E-03	7.7E-08	2.5E-08	7.7E-08
PCB-118	RJ774	-	-	-	2.7E-01	1.6E-01	4.6E-06	2.8E-06	4.6E-06
PCB-123	RJ774	-	-	-	3.0E-03	2.3E-03	5.1E-08	3.9E-08	5.1E-08
PCB-126	RJ774	-	-	-	7.5E-03	6.4E-03	1.3E-07	1.1E-07	1.3E-07
PCB-156	RJ774	-	-	-	6.3E-02	5.5E-02	1.1E-06	9.3E-07	1.1E-06
PCB-157	RJ774	-	-	-	1.2E-02	2.5E-02	2.1E-07	4.2E-07	4.2E-07
PCB-167	RJ774	-	-	-	2.1E-02	4.3E-02	3.5E-07	7.3E-07	7.3E-07
PCB-169	RJ774	-	-	-	3.7E-04	6.4E-04	6.2E-09	1.1E-08	1.1E-08
PCB-189	RJ774	-	-	-	3.0E-03	6.4E-03	5.1E-08	1.1E-07	1.1E-07
PCB-77	RJ774	-	-	-	1.5E-02	1.3E-02	2.6E-07	2.2E-07	2.6E-07
PCB-81	RJ774	-	-	-	3.0E-03	2.3E-03	5.1E-08	3.8E-08	5.1E-08
Aroclor-1254	RJ776	3.5E-02	1.8E-02	U	-	-	-	-	-
Aroclor-1260	RJ776	3.5E-02	1.8E-02	U	-	-	-	-	-
PCB-105	RJ776	-	-	-	1.2E-01	8.2E-02	2.2E-06	1.4E-06	2.2E-06
PCB-114	RJ776	-	-	-	4.5E-03	1.5E-03	7.9E-08	2.5E-08	7.9E-08
PCB-118	RJ776	-	-	-	2.7E-01	1.6E-01	4.7E-06	2.9E-06	4.7E-06
PCB-123	RJ776	-	-	-	3.0E-03	2.3E-03	5.2E-08	4.1E-08	5.2E-08
PCB-126	RJ776	-	-	-	7.5E-03	6.4E-03	1.3E-07	1.1E-07	1.3E-07
PCB-156	RJ776	-	-	-	6.3E-02	5.5E-02	1.1E-06	9.5E-07	1.1E-06
PCB-157	RJ776	-	-	-	1.2E-02	2.5E-02	2.2E-07	4.3E-07	4.3E-07
PCB-167	RJ776	-	-	-	2.1E-02	4.3E-02	3.6E-07	7.5E-07	7.5E-07
PCB-169	RJ776	-	-	-	3.7E-04	6.4E-04	6.4E-09	1.1E-08	1.1E-08
PCB-189	RJ776	-	-	-	3.0E-03	6.4E-03	5.2E-08	1.1E-07	1.1E-07
PCB-77	RJ776	-	-	-	1.5E-02	1.3E-02	2.7E-07	2.2E-07	2.7E-07
PCB-81	RJ776	-	-	-	3.0E-03	2.3E-03	5.2E-08	3.9E-08	5.2E-08
Aroclor-1254	RJ777	3.5E-02	1.8E-02	U	-	-	-	-	-
Aroclor-1260	RJ777	3.5E-02	1.8E-02	U	-	-	-	-	-
PCB-105	RJ777	-	-	-	1.2E-01	8.2E-02	2.2E-06	1.4E-06	2.2E-06
PCB-114	RJ777	-	-	-	4.5E-03	1.5E-03	7.9E-08	2.5E-08	7.9E-08
PCB-118	RJ777	-	-	-	2.7E-01	1.6E-01	4.7E-06	2.9E-06	4.7E-06
PCB-123	RJ777	-	-	-	3.0E-03	2.3E-03	5.2E-08	4.1E-08	5.2E-08
PCB-126	RJ777	-	-	-	7.5E-03	6.4E-03	1.3E-07	1.1E-07	1.3E-07
PCB-156	RJ777	-	-	-	6.3E-02	5.5E-02	1.1E-06	9.5E-07	1.1E-06
PCB-157	RJ777	-	-	-	1.2E-02	2.5E-02	2.2E-07	4.3E-07	4.3E-07
PCB-167	RJ777	-	-	-	2.1E-02	4.3E-02	3.6E-07	7.5E-07	7.5E-07
PCB-169	RJ777	-	-	-	3.7E-04	6.4E-04	6.4E-09	1.1E-08	1.1E-08
PCB-189	RJ777	-	-	-	3.0E-03	6.4E-03	5.2E-08	1.1E-07	1.1E-07
PCB-77	RJ777	-	-	-	1.5E-02	1.3E-02	2.7E-07	2.2E-07	2.7E-07
PCB-81	RJ777	-	-	-	3.0E-03	2.3E-03	5.2E-08	3.9E-08	5.2E-08
Aroclor-1254	RJ781	3.5E-02	1.8E-02	U	-	-	-	-	-
Aroclor-1260	RJ781	3.5E-02	1.8E-02	U	-	-	-	-	-
PCB-105	RJ781	-	-	-	1.2E-01	8.2E-02	2.2E-06	1.4E-06	2.2E-06
PCB-114	RJ781	-	-	-	4.5E-03	1.5E-03	7.9E-08	2.5E-08	7.9E-08
PCB-118	RJ781	-	-	-	2.7E-01	1.6E-01	4.7E-06	2.9E-06	4.7E-06
PCB-123	RJ781	-	-	-	3.0E-03	2.3E-03	5.2E-08	4.1E-08	5.2E-08
PCB-126	RJ781	-	-	-	7.5E-03	6.4E-03	1.3E-07	1.1E-07	1.3E-07
PCB-156	RJ781	-	-	-	6.3E-02	5.5E-02	1.1E-06	9.5E-07	1.1E-06
PCB-157	RJ781	-	-	-	1.2E-02	2.5E-02	2.2E-07	4.3E-07	4.3E-07
PCB-167	RJ781	-	-	-	2.1E-02	4.3E-02	3.6E-07	7.5E-07	7.5E-07

Aroclor to PCB Congener Extrapolation for Soil (0-10 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentrations (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF_{1254}	EF_{1260}	Estimated Concentrations Aroclor-1254 (mg/kg)	Estimated Concentrations Aroclor-1260 (mg/kg)	Estimated Concentrations PCB_{MAX} (mg/kg)
PCB-169	RJ781	-	-	-	3.7E-04	6.4E-04	6.4E-09	1.1E-08	1.1E-08
PCB-189	RJ781	-	-	-	3.0E-03	6.4E-03	5.2E-08	1.1E-07	1.1E-07
PCB-77	RJ781	-	-	-	1.5E-02	1.3E-02	2.7E-07	2.2E-07	2.7E-07
PCB-81	RJ781	-	-	-	3.0E-03	2.3E-03	5.2E-08	3.9E-08	5.2E-08
Aroclor-1254	RJ782	6.7E-02	3.4E-02	U	-	-	-	-	-
Aroclor-1260	RJ782	6.7E-02	3.4E-02	U	-	-	-	-	-
PCB-105	RJ782	-	-	-	1.2E-01	8.2E-02	4.1E-06	2.7E-06	4.1E-06
PCB-114	RJ782	-	-	-	4.5E-03	1.5E-03	1.5E-07	4.9E-08	1.5E-07
PCB-118	RJ782	-	-	-	2.7E-01	1.6E-01	9.0E-06	5.5E-06	9.0E-06
PCB-123	RJ782	-	-	-	3.0E-03	2.3E-03	1.0E-07	7.8E-08	1.0E-07
PCB-126	RJ782	-	-	-	7.5E-03	6.4E-03	2.5E-07	2.1E-07	2.5E-07
PCB-156	RJ782	-	-	-	6.3E-02	5.5E-02	2.1E-06	1.8E-06	2.1E-06
PCB-157	RJ782	-	-	-	1.2E-02	2.5E-02	4.1E-07	8.2E-07	8.2E-07
PCB-167	RJ782	-	-	-	2.1E-02	4.3E-02	6.9E-07	1.4E-06	1.4E-06
PCB-169	RJ782	-	-	-	3.7E-04	6.4E-04	1.2E-08	2.1E-08	2.1E-08
PCB-189	RJ782	-	-	-	3.0E-03	6.4E-03	1.0E-07	2.1E-07	2.1E-07
PCB-77	RJ782	-	-	-	1.5E-02	1.3E-02	5.2E-07	4.3E-07	5.2E-07
PCB-81	RJ782	-	-	-	3.0E-03	2.3E-03	1.0E-07	7.5E-08	1.0E-07
Aroclor-1254	RS288	1.1E-01	5.5E-02	U	-	-	-	-	-
Aroclor-1260	RS288	1.1E-01	5.5E-02	U	-	-	-	-	-
PCB-105	RS288	-	-	-	1.2E-01	8.2E-02	6.8E-06	4.5E-06	6.8E-06
PCB-114	RS288	-	-	-	4.5E-03	1.5E-03	2.5E-07	8.0E-08	2.5E-07
PCB-118	RS288	-	-	-	2.7E-01	1.6E-01	1.5E-05	9.0E-06	1.5E-05
PCB-123	RS288	-	-	-	3.0E-03	2.3E-03	1.6E-07	1.3E-07	1.6E-07
PCB-126	RS288	-	-	-	7.5E-03	6.4E-03	4.1E-07	3.5E-07	4.1E-07
PCB-156	RS288	-	-	-	6.3E-02	5.5E-02	3.5E-06	3.0E-06	3.5E-06
PCB-157	RS288	-	-	-	1.2E-02	2.5E-02	6.8E-07	1.4E-06	1.4E-06
PCB-167	RS288	-	-	-	2.1E-02	4.3E-02	1.1E-06	2.4E-06	2.4E-06
PCB-169	RS288	-	-	-	3.7E-04	6.4E-04	2.0E-08	3.5E-08	3.5E-08
PCB-189	RS288	-	-	-	3.0E-03	6.4E-03	1.6E-07	3.5E-07	3.5E-07
PCB-77	RS288	-	-	-	1.5E-02	1.3E-02	8.5E-07	7.0E-07	8.5E-07
PCB-81	RS288	-	-	-	3.0E-03	2.3E-03	1.6E-07	1.2E-07	1.6E-07
Aroclor-1254	RS293	1.1E-01	5.5E-02	U	-	-	-	-	-
Aroclor-1260	RS293	1.1E-01	5.5E-02	U	-	-	-	-	-
PCB-105	RS293	-	-	-	1.2E-01	8.2E-02	6.8E-06	4.5E-06	6.8E-06
PCB-114	RS293	-	-	-	4.5E-03	1.5E-03	2.5E-07	8.0E-08	2.5E-07
PCB-118	RS293	-	-	-	2.7E-01	1.6E-01	1.5E-05	9.0E-06	1.5E-05
PCB-123	RS293	-	-	-	3.0E-03	2.3E-03	1.6E-07	1.3E-07	1.6E-07
PCB-126	RS293	-	-	-	7.5E-03	6.4E-03	4.1E-07	3.5E-07	4.1E-07
PCB-156	RS293	-	-	-	6.3E-02	5.5E-02	3.5E-06	3.0E-06	3.5E-06
PCB-157	RS293	-	-	-	1.2E-02	2.5E-02	6.8E-07	1.4E-06	1.4E-06
PCB-167	RS293	-	-	-	2.1E-02	4.3E-02	1.1E-06	2.4E-06	2.4E-06
PCB-169	RS293	-	-	-	3.7E-04	6.4E-04	2.0E-08	3.5E-08	3.5E-08
PCB-189	RS293	-	-	-	3.0E-03	6.4E-03	1.6E-07	3.5E-07	3.5E-07
PCB-77	RS293	-	-	-	1.5E-02	1.3E-02	8.5E-07	7.0E-07	8.5E-07
PCB-81	RS293	-	-	-	3.0E-03	2.3E-03	1.6E-07	1.2E-07	1.6E-07
Aroclor-1254	RS294	1.1E-01	5.5E-02	U	-	-	-	-	-
Aroclor-1260	RS294	1.1E-01	5.5E-02	U	-	-	-	-	-
PCB-105	RS294	-	-	-	1.2E-01	8.2E-02	6.8E-06	4.5E-06	6.8E-06
PCB-114	RS294	-	-	-	4.5E-03	1.5E-03	2.5E-07	8.0E-08	2.5E-07
PCB-118	RS294	-	-	-	2.7E-01	1.6E-01	1.5E-05	9.0E-06	1.5E-05
PCB-123	RS294	-	-	-	3.0E-03	2.3E-03	1.6E-07	1.3E-07	1.6E-07
PCB-126	RS294	-	-	-	7.5E-03	6.4E-03	4.1E-07	3.5E-07	4.1E-07
PCB-156	RS294	-	-	-	6.3E-02	5.5E-02	3.5E-06	3.0E-06	3.5E-06
PCB-157	RS294	-	-	-	1.2E-02	2.5E-02	6.8E-07	1.4E-06	1.4E-06
PCB-167	RS294	-	-	-	2.1E-02	4.3E-02	1.1E-06	2.4E-06	2.4E-06
PCB-169	RS294	-	-	-	3.7E-04	6.4E-04	2.0E-08	3.5E-08	3.5E-08
PCB-189	RS294	-	-	-	3.0E-03	6.4E-03	1.6E-07	3.5E-07	3.5E-07

Aroclor to PCB Congener Extrapolation for Soil (0-10 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentrations (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF_{1254}	EF_{1260}	Estimated Concentrations Aroclor-1254 (mg/kg)	Estimated Concentrations Aroclor-1260 (mg/kg)	Estimated Concentrations PCB_{MAX} (mg/kg)
PCB-77	RS294	-	-	-	1.5E-02	1.3E-02	8.5E-07	7.0E-07	8.5E-07
PCB-81	RS294	-	-	-	3.0E-03	2.3E-03	1.6E-07	1.2E-07	1.6E-07
Aroclor-1254	RS320	1.1E-01	5.5E-02	U	-	-	-	-	-
Aroclor-1260	RS320	1.1E-01	5.5E-02	U	-	-	-	-	-
PCB-105	RS320	-	-	-	1.2E-01	8.2E-02	6.8E-06	4.5E-06	6.8E-06
PCB-114	RS320	-	-	-	4.5E-03	1.5E-03	2.5E-07	8.0E-08	2.5E-07
PCB-118	RS320	-	-	-	2.7E-01	1.6E-01	1.5E-05	9.0E-06	1.5E-05
PCB-123	RS320	-	-	-	3.0E-03	2.3E-03	1.6E-07	1.3E-07	1.6E-07
PCB-126	RS320	-	-	-	7.5E-03	6.4E-03	4.1E-07	3.5E-07	4.1E-07
PCB-156	RS320	-	-	-	6.3E-02	5.5E-02	3.5E-06	3.0E-06	3.5E-06
PCB-157	RS320	-	-	-	1.2E-02	2.5E-02	6.8E-07	1.4E-06	1.4E-06
PCB-167	RS320	-	-	-	2.1E-02	4.3E-02	1.1E-06	2.4E-06	2.4E-06
PCB-169	RS320	-	-	-	3.7E-04	6.4E-04	2.0E-08	3.5E-08	3.5E-08
PCB-189	RS320	-	-	-	3.0E-03	6.4E-03	1.6E-07	3.5E-07	3.5E-07
PCB-77	RS320	-	-	-	1.5E-02	1.3E-02	8.5E-07	7.0E-07	8.5E-07
PCB-81	RS320	-	-	-	3.0E-03	2.3E-03	1.6E-07	1.2E-07	1.6E-07
Aroclor-1254	RS323	2.2E+00	2.2E+00		-	-	-	-	-
Aroclor-1260	RS323	1.0E+00	5.0E-01	U	-	-	-	-	-
PCB-105	RS323	-	-	-	1.2E-01	8.2E-02	2.7E-04	4.1E-05	2.7E-04
PCB-114	RS323	-	-	-	4.5E-03	1.5E-03	1.0E-05	7.3E-07	1.0E-05
PCB-118	RS323	-	-	-	2.7E-01	1.6E-01	5.9E-04	8.2E-05	5.9E-04
PCB-123	RS323	-	-	-	3.0E-03	2.3E-03	6.6E-06	1.2E-06	6.6E-06
PCB-126	RS323	-	-	-	7.5E-03	6.4E-03	1.7E-05	3.2E-06	1.7E-05
PCB-156	RS323	-	-	-	6.3E-02	5.5E-02	1.4E-04	2.7E-05	1.4E-04
PCB-157	RS323	-	-	-	1.2E-02	2.5E-02	2.7E-05	1.2E-05	2.7E-05
PCB-167	RS323	-	-	-	2.1E-02	4.3E-02	4.5E-05	2.1E-05	4.5E-05
PCB-169	RS323	-	-	-	3.7E-04	6.4E-04	8.1E-07	3.2E-07	8.1E-07
PCB-189	RS323	-	-	-	3.0E-03	6.4E-03	6.6E-06	3.2E-06	6.6E-06
PCB-77	RS323	-	-	-	1.5E-02	1.3E-02	3.4E-05	6.4E-06	3.4E-05
PCB-81	RS323	-	-	-	3.0E-03	2.3E-03	6.6E-06	1.1E-06	6.6E-06
Aroclor-1254	RS324	1.1E-01	5.5E-02	U	-	-	-	-	-
Aroclor-1260	RS324	1.1E-01	5.5E-02	U	-	-	-	-	-
PCB-105	RS324	-	-	-	1.2E-01	8.2E-02	6.8E-06	4.5E-06	6.8E-06
PCB-114	RS324	-	-	-	4.5E-03	1.5E-03	2.5E-07	8.0E-08	2.5E-07
PCB-118	RS324	-	-	-	2.7E-01	1.6E-01	1.5E-05	9.0E-06	1.5E-05
PCB-123	RS324	-	-	-	3.0E-03	2.3E-03	1.6E-07	1.3E-07	1.6E-07
PCB-126	RS324	-	-	-	7.5E-03	6.4E-03	4.1E-07	3.5E-07	4.1E-07
PCB-156	RS324	-	-	-	6.3E-02	5.5E-02	3.5E-06	3.0E-06	3.5E-06
PCB-157	RS324	-	-	-	1.2E-02	2.5E-02	6.8E-07	1.4E-06	1.4E-06
PCB-167	RS324	-	-	-	2.1E-02	4.3E-02	1.1E-06	2.4E-06	2.4E-06
PCB-169	RS324	-	-	-	3.7E-04	6.4E-04	2.0E-08	3.5E-08	3.5E-08
PCB-189	RS324	-	-	-	3.0E-03	6.4E-03	1.6E-07	3.5E-07	3.5E-07
PCB-77	RS324	-	-	-	1.5E-02	1.3E-02	8.5E-07	7.0E-07	8.5E-07
PCB-81	RS324	-	-	-	3.0E-03	2.3E-03	1.6E-07	1.2E-07	1.6E-07

Notes:
PCBs - polychlorinated biphenyls
EF- Extrapolation Factor (ng congener/kg soil)/(µg Aroclor/kg soil)
"-" not applicable
mg/kg - milligrams per kilogram
ug/kg - micrograms per kilogram
ng/kg - nanograms per kilogram
bgs- below ground surface
PCB_{MAX} = the maximum of the extrapolated 1254 and 1260 concentrations

TPH to Petroleum Constituent Extrapolation for Soil (0-2 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration[a] (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
C08-C11 (Gasoline Range)	MJ110	1.40E+02	7.0E+01	U		-	-
C11-C14 (Kerosene Range)	MJ110	1.40E+02	7.0E+01	U		-	-
C14-C20 (Diesel Range)	MJ110	9.20E+01	9.2E+01	J		-	-
C20-C30 (Lubricant Oil Range)	MJ110	6.70E+02	6.7E+02			-	-
C11-C30	MJ110	-	8.3E+02	-		-	-
Benzene	MJ110	-	-	-	1.2E-04	8.4E-03	8.4E-03
Ethylbenzene	MJ110	-	-	-	1.2E-04	8.4E-03	8.4E-03
Toluene	MJ110	-	-	-	1.2E-04	8.4E-03	8.4E-03
m,p-Xylene	MJ110	-	-	-	3.6E-04	2.5E-02	2.5E-02
o-Xylene	MJ110	-	-	-	8.0E-05	5.6E-03	5.6E-03
Xylene (total)	MJ110	-	-	-	4.4E-04	3.1E-02	3.1E-02
2-Methylnaphthalene	MJ110	6.48E-03	3.2E-03	UJ	2.8E-02	1.9E+00	3.2E-03
Acenaphthene	MJ110	1.96E-03	9.8E-04	U	5.7E-04	4.8E-01	9.8E-04
Acenaphthylene	MJ110	1.96E-03	9.8E-04	U	7.0E-05	5.8E-02	9.8E-04
Anthracene	MJ110	1.96E-03	9.8E-04	UJ	3.7E-04	3.1E-01	9.8E-04
Benzo(a)anthracene	MJ110	1.96E-03	9.8E-04	U	2.7E-05	2.2E-02	9.8E-04
Benzo(a)pyrene	MJ110	1.96E-03	9.8E-04	U	2.7E-05	2.3E-02	9.8E-04
Benzo(b)fluoranthene	MJ110	1.96E-03	9.8E-04	U	4.3E-05	3.6E-02	9.8E-04
Benzo(e)pyrene	MJ110	1.72E-01	1.7E-01		2.1E-04	1.7E-01	1.7E-01
Benzo(g,h,i)perylene	MJ110	1.84E-01	1.8E-01		2.2E-04	1.8E-01	1.8E-01
Benzo(k)fluoranthene	MJ110	4.63E-03	4.6E-03		2.1E-05	1.7E-02	4.6E-03
Chrysene	MJ110	2.01E-02	2.0E-02		5.9E-05	4.9E-02	2.0E-02
Dibenz(a,h)anthracene	MJ110	9.21E-03	9.2E-03		1.1E-05	9.2E-03	9.2E-03
Fluoranthene	MJ110	5.60E-03	5.6E-03		7.5E-05	6.2E-02	5.6E-03
Fluorene	MJ110	4.28E-03	2.1E-03	UJ	5.7E-04	4.7E-01	2.1E-03
Indeno(1,2,3-cd)pyrene	MJ110	1.23E-02	1.2E-02		2.4E-05	2.0E-02	1.2E-02
Naphthalene	MJ110	1.08E-02	5.4E-03	UJ	6.9E-03	4.9E-01	5.4E-03
Perylene	MJ110	9.81E-02	9.8E-02		1.2E-04	9.8E-02	9.8E-02
Phenanthrene	MJ110	9.11E-03	9.1E-03	J	1.5E-03	1.3E+00	9.1E-03
Pyrene	MJ110	5.87E-03	5.9E-03		1.4E-04	1.1E-01	5.9E-03
C08-C11 (Gasoline Range)	OLDCONS	1.00E-01	5.0E-02	U		-	-
C11-C14 (Kerosene Range)	OLDCONS	1.00E-01	5.0E-02	U		-	-
C14-C20 (Diesel Range)	OLDCONS	6.40E+01	6.4E+01			-	-
C20-C30 (Lubricant Oil Range)	OLDCONS	1.00E-01	5.0E-02	U		-	-
C11-C30	OLDCONS	-	6.4E+01	-		-	-
Benzene	OLDCONS	5.00E-03	2.5E-03	U	1.2E-04	6.0E-06	6.0E-06
Ethylbenzene	OLDCONS	5.00E-03	2.5E-03	U	1.2E-04	6.0E-06	6.0E-06
Toluene	OLDCONS	3.00E-03	3.0E-03	J	1.2E-04	6.0E-06	3.0E-03
m,p-Xylene	OLDCONS	-	-	-	3.6E-04	1.8E-05	1.8E-05
o-Xylene	OLDCONS	-	-	-	8.0E-05	4.0E-06	4.0E-06
Xylene (total)	OLDCONS	5.00E-03	2.5E-03	U	4.4E-04	2.2E-05	2.2E-05
2-Methylnaphthalene	OLDCONS	3.00E-01	1.5E-01	U	2.8E-02	1.4E-03	1.4E-03
Acenaphthene	OLDCONS	3.00E-01	1.5E-01	U	5.7E-04	3.7E-02	3.7E-02
Acenaphthylene	OLDCONS	3.00E-01	1.5E-01	U	7.0E-05	4.5E-03	4.5E-03
Anthracene	OLDCONS	3.00E-01	1.5E-01	U	3.7E-04	2.4E-02	2.4E-02
Benzo(a)anthracene	OLDCONS	3.00E-01	1.5E-01	U	2.7E-05	1.7E-03	1.7E-03
Benzo(a)pyrene	OLDCONS	3.00E-01	1.5E-01	U	2.7E-05	1.7E-03	1.7E-03
Benzo(b)fluoranthene	OLDCONS	3.00E-01	1.5E-01	U	4.3E-05	2.8E-03	2.8E-03
Benzo(e)pyrene	OLDCONS	-	-	-	2.1E-04	1.3E-02	1.3E-02
Benzo(g,h,i)perylene	OLDCONS	3.00E-01	1.5E-01	U	2.2E-04	1.4E-02	1.4E-02
Benzo(k)fluoranthene	OLDCONS	3.00E-01	1.5E-01	U	2.1E-05	1.3E-03	1.3E-03
Chrysene	OLDCONS	5.00E-01	5.0E-01		5.9E-05	3.8E-03	5.0E-01
Dibenz(a,h)anthracene	OLDCONS	3.00E-01	1.5E-01	U	1.1E-05	7.1E-04	7.1E-04
Fluoranthene	OLDCONS	2.10E+00	2.1E+00		7.5E-05	4.8E-03	2.1E+00
Fluorene	OLDCONS	3.00E-01	1.5E-01	U	5.7E-04	3.6E-02	3.6E-02

TPH to Petroleum Constituent Extrapolation for Soil (0-2 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration[a] (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Indeno(1,2,3-cd)pyrene	OLDCONS	3.00E-01	1.5E-01	U	2.4E-05	1.5E-03	1.5E-03
Naphthalene	OLDCONS	3.00E-01	1.5E-01	U	6.9E-03	3.5E-04	3.5E-04
Perylene	OLDCONS	-	-	-	1.2E-04	7.6E-03	7.6E-03
Phenanthrene	OLDCONS	1.60E+00	1.6E+00		1.5E-03	9.8E-02	1.6E+00
Pyrene	OLDCONS	1.00E+00	1.0E+00		1.4E-04	8.7E-03	1.0E+00
C08-C11 (Gasoline Range)	OLDCONS	1.00E-01	5.0E-02	U		-	-
C11-C14 (Kerosene Range)	OLDCONS	1.00E-01	5.0E-02	U		-	-
C14-C20 (Diesel Range)	OLDCONS	4.00E+00	4.0E+00			-	-
C20-C30 (Lubricant Oil Range)	OLDCONS	-	-	-		-	-
C11-C30	OLDCONS	-	4.1E+00	-		-	-
Benzene	OLDCONS	5.00E-03	2.5E-03	U	1.2E-04	6.0E-06	6.0E-06
Ethylbenzene	OLDCONS	5.00E-03	2.5E-03	U	1.2E-04	6.0E-06	6.0E-06
Toluene	OLDCONS	7.00E-03	7.0E-03	J	1.2E-04	6.0E-06	7.0E-03
m,p-Xylene	OLDCONS	-	-	-	3.6E-04	1.8E-05	1.8E-05
o-Xylene	OLDCONS	-	-	-	8.0E-05	4.0E-06	4.0E-06
Xylene (total)	OLDCONS	1.30E-02	1.3E-02		4.4E-04	2.2E-05	1.3E-02
2-Methylnaphthalene	OLDCONS	3.00E-01	1.5E-01	U	2.8E-02	1.4E-03	1.4E-03
Acenaphthene	OLDCONS	3.00E-01	1.5E-01	U	5.7E-04	2.3E-03	2.3E-03
Acenaphthylene	OLDCONS	3.00E-01	1.5E-01	U	7.0E-05	2.8E-04	2.8E-04
Anthracene	OLDCONS	3.00E-01	1.5E-01	U	3.7E-04	1.5E-03	1.5E-03
Benzo(a)anthracene	OLDCONS	3.00E-01	1.5E-01	U	2.7E-05	1.1E-04	1.1E-04
Benzo(a)pyrene	OLDCONS	3.00E-01	1.5E-01	U	2.7E-05	1.1E-04	1.1E-04
Benzo(b)fluoranthene	OLDCONS	3.00E-01	1.5E-01	U	4.3E-05	1.8E-04	1.8E-04
Benzo(e)pyrene	OLDCONS	-	-	-	2.1E-04	8.4E-04	8.4E-04
Benzo(g,h,i)perylene	OLDCONS	3.00E-01	1.5E-01	U	2.2E-04	9.0E-04	9.0E-04
Benzo(k)fluoranthene	OLDCONS	3.00E-01	1.5E-01	U	2.1E-05	8.3E-05	8.3E-05
Chrysene	OLDCONS	3.00E-01	1.5E-01	U	5.9E-05	2.4E-04	2.4E-04
Dibenz(a,h)anthracene	OLDCONS	3.00E-01	1.5E-01	U	1.1E-05	4.5E-05	4.5E-05
Fluoranthene	OLDCONS	3.00E-01	1.5E-01	U	7.5E-05	3.0E-04	3.0E-04
Fluorene	OLDCONS	3.00E-01	1.5E-01	U	5.7E-04	2.3E-03	2.3E-03
Indeno(1,2,3-cd)pyrene	OLDCONS	3.00E-01	1.5E-01	U	2.4E-05	9.7E-05	9.7E-05
Naphthalene	OLDCONS	3.00E-01	1.5E-01	U	6.9E-03	3.5E-04	3.5E-04
Perylene	OLDCONS	-	-	-	1.2E-04	4.8E-04	4.8E-04
Phenanthrene	OLDCONS	3.00E-01	1.5E-01	U	1.5E-03	6.2E-03	6.2E-03
Pyrene	OLDCONS	3.00E-01	1.5E-01	U	1.4E-04	5.5E-04	5.5E-04
C08-C11 (Gasoline Range)	OLDCONS	1.00E-01	5.0E-02	U		-	-
C11-C14 (Kerosene Range)	OLDCONS	1.00E-01	5.0E-02	U		-	-
C14-C20 (Diesel Range)	OLDCONS	2.00E+00	2.0E+00			-	-
C20-C30 (Lubricant Oil Range)	OLDCONS	-	-			-	-
C11-C30	OLDCONS	-	2.1E+00	-		-	-
Benzene	OLDCONS	5.00E-03	2.5E-03	U	1.2E-04	6.0E-06	6.0E-06
Ethylbenzene	OLDCONS	5.00E-03	2.5E-03	U	1.2E-04	6.0E-06	6.0E-06
Toluene	OLDCONS	5.00E-03	2.5E-03	U	1.2E-04	6.0E-06	6.0E-06
m,p-Xylene	OLDCONS	-	-	-	3.6E-04	1.8E-05	1.8E-05
o-Xylene	OLDCONS	-	-	-	8.0E-05	4.0E-06	4.0E-06
Xylene (total)	OLDCONS	5.00E-03	2.5E-03	U	4.4E-04	2.2E-05	2.2E-05
2-Methylnaphthalene	OLDCONS	2.00E-02	1.0E-02	U	2.8E-02	1.4E-03	1.4E-03
Acenaphthene	OLDCONS	3.00E-02	1.5E-02	U	5.7E-04	1.2E-03	1.2E-03
Acenaphthylene	OLDCONS	3.00E-02	1.5E-02	U	7.0E-05	1.4E-04	1.4E-04
Anthracene	OLDCONS	3.00E-02	1.5E-02	U	3.7E-04	7.7E-04	7.7E-04
Benzo(a)anthracene	OLDCONS	3.00E-02	1.5E-02	U	2.7E-05	5.5E-05	5.5E-05
Benzo(a)pyrene	OLDCONS	3.00E-02	1.5E-02	U	2.7E-05	5.6E-05	5.6E-05
Benzo(b)fluoranthene	OLDCONS	3.00E-02	1.5E-02	U	4.3E-05	8.9E-05	8.9E-05
Benzo(e)pyrene	OLDCONS	-	-	-	2.1E-04	4.2E-04	4.2E-04
Benzo(g,h,i)perylene	OLDCONS	3.00E-02	1.5E-02	U	2.2E-04	4.5E-04	4.5E-04
Benzo(k)fluoranthene	OLDCONS	3.00E-02	1.5E-02	U	2.1E-05	4.2E-05	4.2E-05

TPH to Petroleum Constituent Extrapolation for Soil (0-2 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration[a] (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Chrysene	OLDCONS	3.00E-02	1.5E-02	U	5.9E-05	1.2E-04	1.2E-04
Dibenz(a,h)anthracene	OLDCONS	3.00E-02	1.5E-02	U	1.1E-05	2.3E-05	2.3E-05
Fluoranthene	OLDCONS	3.00E-02	1.5E-02	U	7.5E-05	1.5E-04	1.5E-04
Fluorene	OLDCONS	3.00E-02	1.5E-02	U	5.7E-04	1.2E-03	1.2E-03
Indeno(1,2,3-cd)pyrene	OLDCONS	3.00E-02	1.5E-02	U	2.4E-05	4.9E-05	4.9E-05
Naphthalene	OLDCONS	2.00E-02	1.0E-02	U	6.9E-03	3.5E-04	3.5E-04
Perylene	OLDCONS	-	-	-	1.2E-04	2.4E-04	2.4E-04
Phenanthrene	OLDCONS	3.00E-02	1.5E-02	U	1.5E-03	3.1E-03	3.1E-03
Pyrene	OLDCONS	3.00E-02	1.5E-02	U	1.4E-04	2.8E-04	2.8E-04
C08-C11 (Gasoline Range)	OLDCONS	1.00E-01	5.0E-02	U		-	-
C11-C14 (Kerosene Range)	OLDCONS	1.00E-01	5.0E-02	U		-	-
C14-C20 (Diesel Range)	OLDCONS	3.00E-01	3.0E-01			-	-
C20-C30 (Lubricant Oil Range)	OLDCONS	-	-			-	-
C11-C30	OLDCONS	-	3.5E-01	-		-	-
Benzene	OLDCONS	5.00E-03	2.5E-03	U	1.2E-04	6.0E-06	6.0E-06
Ethylbenzene	OLDCONS	5.00E-03	2.5E-03	U	1.2E-04	6.0E-06	6.0E-06
Toluene	OLDCONS	1.40E-02	1.4E-02	J	1.2E-04	6.0E-06	1.4E-02
m,p-Xylene	OLDCONS	-	-	-	3.6E-04	1.8E-05	1.8E-05
o-Xylene	OLDCONS	-	-	-	8.0E-05	4.0E-06	4.0E-06
Xylene (total)	OLDCONS	1.00E-02	1.0E-02		4.4E-04	2.2E-05	1.0E-02
2-Methylnaphthalene	OLDCONS	3.00E-01	1.5E-01	U	2.8E-02	1.4E-03	1.4E-03
Acenaphthene	OLDCONS	3.00E-01	1.5E-01	U	5.7E-04	2.0E-04	2.0E-04
Acenaphthylene	OLDCONS	3.00E-01	1.5E-01	U	7.0E-05	2.5E-05	2.5E-05
Anthracene	OLDCONS	3.00E-01	1.5E-01	U	3.7E-04	1.3E-04	1.3E-04
Benzo(a)anthracene	OLDCONS	3.00E-01	1.5E-01	U	2.7E-05	9.4E-06	9.4E-06
Benzo(a)pyrene	OLDCONS	3.00E-01	1.5E-01	U	2.7E-05	9.5E-06	9.5E-06
Benzo(b)fluoranthene	OLDCONS	3.00E-01	1.5E-01	U	4.3E-05	1.5E-05	1.5E-05
Benzo(e)pyrene	OLDCONS	-	-	-	2.1E-04	7.2E-05	7.2E-05
Benzo(g,h,i)perylene	OLDCONS	3.00E-01	1.5E-01	U	2.2E-04	7.7E-05	7.7E-05
Benzo(k)fluoranthene	OLDCONS	3.00E-01	1.5E-01	U	2.1E-05	7.2E-06	7.2E-06
Chrysene	OLDCONS	3.00E-01	1.5E-01	U	5.9E-05	2.1E-05	2.1E-05
Dibenz(a,h)anthracene	OLDCONS	3.00E-01	1.5E-01	U	1.1E-05	3.9E-06	3.9E-06
Fluoranthene	OLDCONS	3.00E-01	1.5E-01	U	7.5E-05	2.6E-05	2.6E-05
Fluorene	OLDCONS	3.00E-01	1.5E-01	U	5.7E-04	2.0E-04	2.0E-04
Indeno(1,2,3-cd)pyrene	OLDCONS	3.00E-01	1.5E-01	U	2.4E-05	8.4E-06	8.4E-06
Naphthalene	OLDCONS	3.00E-01	1.5E-01	U	6.9E-03	3.5E-04	3.5E-04
Perylene	OLDCONS	-	-	-	1.2E-04	4.1E-05	4.1E-05
Phenanthrene	OLDCONS	3.00E-01	1.5E-01	U	1.5E-03	5.4E-04	5.4E-04
Pyrene	OLDCONS	3.00E-01	1.5E-01	U	1.4E-04	4.8E-05	4.8E-05
C08-C11 (Gasoline Range)	OLDCONS	1.00E-01	5.0E-02	U		-	-
C11-C14 (Kerosene Range)	OLDCONS	1.00E-01	5.0E-02	U		-	-
C14-C20 (Diesel Range)	OLDCONS	1.00E-01	5.0E-02	U		-	-
C20-C30 (Lubricant Oil Range)	OLDCONS	5.00E+00	5.0E+00			-	-
C11-C30	OLDCONS	-	5.1E+00	-		-	-
Benzene	OLDCONS	5.00E-03	2.5E-03	U	1.2E-04	6.0E-06	6.0E-06
Ethylbenzene	OLDCONS	5.00E-03	2.5E-03	U	1.2E-04	6.0E-06	6.0E-06
Toluene	OLDCONS	5.00E-03	2.5E-03	U	1.2E-04	6.0E-06	6.0E-06
m,p-Xylene	OLDCONS	-	-	-	3.6E-04	1.8E-05	1.8E-05
o-Xylene	OLDCONS	-	-	-	8.0E-05	4.0E-06	4.0E-06
Xylene (total)	OLDCONS	5.00E-03	2.5E-03	U	4.4E-04	2.2E-05	2.2E-05
2-Methylnaphthalene	OLDCONS	3.00E-02	1.5E-02	U	2.8E-02	1.4E-03	1.4E-03
Acenaphthene	OLDCONS	3.00E-02	1.5E-02	U	5.7E-04	2.9E-03	2.9E-03
Acenaphthylene	OLDCONS	3.00E-02	1.5E-02	U	7.0E-05	3.6E-04	3.6E-04
Anthracene	OLDCONS	3.00E-02	1.5E-02	U	3.7E-04	1.9E-03	1.9E-03
Benzo(a)anthracene	OLDCONS	3.00E-02	1.5E-02	U	2.7E-05	1.4E-04	1.4E-04
Benzo(a)pyrene	OLDCONS	3.00E-02	1.5E-02	U	2.7E-05	1.4E-04	1.4E-04

TPH to Petroleum Constituent Extrapolation for Soil (0-2 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration[a] (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Benzo(b)fluoranthene	OLDCONS	3.00E-02	1.5E-02	U	4.3E-05	2.2E-04	2.2E-04
Benzo(e)pyrene	OLDCONS	-	-	-	2.1E-04	1.1E-03	1.1E-03
Benzo(g,h,i)perylene	OLDCONS	3.00E-02	1.5E-02	U	2.2E-04	1.1E-03	1.1E-03
Benzo(k)fluoranthene	OLDCONS	3.00E-02	1.5E-02	U	2.1E-05	1.0E-04	1.0E-04
Chrysene	OLDCONS	3.00E-02	1.5E-02	U	5.9E-05	3.0E-04	3.0E-04
Dibenz(a,h)anthracene	OLDCONS	3.00E-02	1.5E-02	U	1.1E-05	5.6E-05	5.6E-05
Fluoranthene	OLDCONS	3.00E-02	1.5E-02	U	7.5E-05	3.8E-04	3.8E-04
Fluorene	OLDCONS	3.00E-02	1.5E-02	U	5.7E-04	2.9E-03	2.9E-03
Indeno(1,2,3-cd)pyrene	OLDCONS	3.00E-02	1.5E-02	U	2.4E-05	1.2E-04	1.2E-04
Naphthalene	OLDCONS	3.00E-02	1.5E-02	U	6.9E-03	3.5E-04	3.5E-04
Perylene	OLDCONS	-	-	-	1.2E-04	6.0E-04	6.0E-04
Phenanthrene	OLDCONS	3.00E-02	1.5E-02	U	1.5E-03	7.8E-03	7.8E-03
Pyrene	OLDCONS	3.00E-02	1.5E-02	U	1.4E-04	7.0E-04	7.0E-04
C08-C11 (Gasoline Range)	RD033	1.10E+01	5.5E+00	UJ		-	-
C11-C14 (Kerosene Range)	RD033	1.10E+01	5.5E+00	UJ		-	-
C14-C20 (Diesel Range)	RD033	1.10E+01	5.5E+00	UJ		-	-
C20-C30 (Lubricant Oil Range)	RD033	1.10E+01	5.5E+00	UJ		-	-
C11-C30	RD033	-	1.7E+01	-		-	-
Benzene	RD033	1.10E-02	5.5E-03	U	1.2E-04	6.6E-04	6.6E-04
Ethylbenzene	RD033	1.10E-02	5.5E-03	U	1.2E-04	6.6E-04	6.6E-04
Toluene	RD033	1.10E-02	5.5E-03	U	1.2E-04	6.6E-04	6.6E-04
m,p-Xylene	RD033	1.10E-02	5.5E-03	U	3.6E-04	2.0E-03	2.0E-03
o-Xylene	RD033	1.10E-02	5.5E-03	U	8.0E-05	4.4E-04	4.4E-04
Xylene (total)	RD033	-	-	-	4.4E-04	2.4E-03	2.4E-03
2-Methylnaphthalene	RD033	-	-	-	2.8E-02	1.5E-01	1.5E-01
Acenaphthene	RD033	-	-	-	5.7E-04	9.5E-03	9.5E-03
Acenaphthylene	RD033	-	-	-	7.0E-05	1.2E-03	1.2E-03
Anthracene	RD033	-	-	-	3.7E-04	6.2E-03	6.2E-03
Benzo(a)anthracene	RD033	-	-	-	2.7E-05	4.4E-04	4.4E-04
Benzo(a)pyrene	RD033	-	-	-	2.7E-05	4.5E-04	4.5E-04
Benzo(b)fluoranthene	RD033	-	-	-	4.3E-05	7.1E-04	7.1E-04
Benzo(e)pyrene	RD033	-	-	-	2.1E-04	3.4E-03	3.4E-03
Benzo(g,h,i)perylene	RD033	-	-	-	2.2E-04	3.6E-03	3.6E-03
Benzo(k)fluoranthene	RD033	-	-	-	2.1E-05	3.4E-04	3.4E-04
Chrysene	RD033	-	-	-	5.9E-05	9.7E-04	9.7E-04
Dibenz(a,h)anthracene	RD033	-	-	-	1.1E-05	1.8E-04	1.8E-04
Fluoranthene	RD033	-	-	-	7.5E-05	1.2E-03	1.2E-03
Fluorene	RD033	-	-	-	5.7E-04	9.4E-03	9.4E-03
Indeno(1,2,3-cd)pyrene	RD033	-	-	-	2.4E-05	4.0E-04	4.0E-04
Naphthalene	RD033	-	-	-	6.9E-03	3.8E-02	3.8E-02
Perylene	RD033	-	-	-	1.2E-04	1.9E-03	1.9E-03
Phenanthrene	RD033	-	-	-	1.5E-03	2.5E-02	2.5E-02
Pyrene	RD033	-	-	-	1.4E-04	2.2E-03	2.2E-03
C08-C11 (Gasoline Range)	RD037	1.10E+01	5.5E+00	UJ		-	-
C11-C14 (Kerosene Range)	RD037	1.10E+01	5.5E+00	UJ		-	-
C14-C20 (Diesel Range)	RD037	1.10E+01	5.5E+00	UJ		-	-
C20-C30 (Lubricant Oil Range)	RD037	1.10E+01	5.5E+00	UJ		-	-
C11-C30	RD037	-	1.7E+01	-		-	-
Benzene	RD037	6.00E-03	3.0E-03	U	1.2E-04	6.6E-04	6.6E-04
Ethylbenzene	RD037	6.00E-03	3.0E-03	U	1.2E-04	6.6E-04	6.6E-04
Toluene	RD037	6.00E-03	3.0E-03	U	1.2E-04	6.6E-04	6.6E-04
m,p-Xylene	RD037	6.00E-03	3.0E-03	U	3.6E-04	2.0E-03	2.0E-03
o-Xylene	RD037	6.00E-03	3.0E-03	U	8.0E-05	4.4E-04	4.4E-04
Xylene (total)	RD037	-	-	-	4.4E-04	2.4E-03	2.4E-03
2-Methylnaphthalene	RD037	-	-	-	2.8E-02	1.5E-01	1.5E-01
Acenaphthene	RD037	-	-	-	5.7E-04	9.5E-03	9.5E-03

TPH to Petroleum Constituent Extrapolation for Soil (0-2 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration[a] (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Acenaphthylene	RD037	-	-	-	7.0E-05	1.2E-03	1.2E-03
Anthracene	RD037	-	-	-	3.7E-04	6.2E-03	6.2E-03
Benzo(a)anthracene	RD037	-	-	-	2.7E-05	4.4E-04	4.4E-04
Benzo(a)pyrene	RD037	-	-	-	2.7E-05	4.5E-04	4.5E-04
Benzo(b)fluoranthene	RD037	-	-	-	4.3E-05	7.1E-04	7.1E-04
Benzo(e)pyrene	RD037	-	-	-	2.1E-04	3.4E-03	3.4E-03
Benzo(g,h,i)perylene	RD037	-	-	-	2.2E-04	3.6E-03	3.6E-03
Benzo(k)fluoranthene	RD037	-	-	-	2.1E-05	3.4E-04	3.4E-04
Chrysene	RD037	-	-	-	5.9E-05	9.7E-04	9.7E-04
Dibenz(a,h)anthracene	RD037	-	-	-	1.1E-05	1.8E-04	1.8E-04
Fluoranthene	RD037	-	-	-	7.5E-05	1.2E-03	1.2E-03
Fluorene	RD037	-	-	-	5.7E-04	9.4E-03	9.4E-03
Indeno(1,2,3-cd)pyrene	RD037	-	-	-	2.4E-05	4.0E-04	4.0E-04
Naphthalene	RD037	-	-	-	6.9E-03	3.8E-02	3.8E-02
Perylene	RD037	-	-	-	1.2E-04	1.9E-03	1.9E-03
Phenanthrene	RD037	-	-	-	1.5E-03	2.5E-02	2.5E-02
Pyrene	RD037	-	-	-	1.4E-04	2.2E-03	2.2E-03
C08-C11 (Gasoline Range)	RD063	4.20E+01	4.2E+01	J		-	-
C11-C14 (Kerosene Range)	RD063	1.10E+01	5.5E+00	UJ		-	-
C14-C20 (Diesel Range)	RD063	1.10E+01	5.5E+00	UJ		-	-
C20-C30 (Lubricant Oil Range)	RD063	1.10E+01	5.5E+00	UJ		-	-
C11-C30	RD063	-	1.7E+01	-		-	-
Benzene	RD063	6.00E-03	3.0E-03	U	1.2E-04	5.0E-03	3.0E-03
Ethylbenzene	RD063	6.00E-03	3.0E-03	U	1.2E-04	5.0E-03	3.0E-03
Toluene	RD063	6.00E-03	3.0E-03	U	1.2E-04	5.0E-03	3.0E-03
m,p-Xylene	RD063	6.00E-03	3.0E-03	U	3.6E-04	1.5E-02	3.0E-03
o-Xylene	RD063	6.00E-03	3.0E-03	U	8.0E-05	3.4E-03	3.0E-03
Xylene (total)	RD063	-	-	-	4.4E-04	1.8E-02	1.8E-02
2-Methylnaphthalene	RD063	-	-	-	2.8E-02	1.2E+00	1.2E+00
Acenaphthene	RD063	-	-	-	5.7E-04	9.5E-03	9.5E-03
Acenaphthylene	RD063	-	-	-	7.0E-05	1.2E-03	1.2E-03
Anthracene	RD063	-	-	-	3.7E-04	6.2E-03	6.2E-03
Benzo(a)anthracene	RD063	-	-	-	2.7E-05	4.4E-04	4.4E-04
Benzo(a)pyrene	RD063	-	-	-	2.7E-05	4.5E-04	4.5E-04
Benzo(b)fluoranthene	RD063	-	-	-	4.3E-05	7.1E-04	7.1E-04
Benzo(e)pyrene	RD063	-	-	-	2.1E-04	3.4E-03	3.4E-03
Benzo(g,h,i)perylene	RD063	-	-	-	2.2E-04	3.6E-03	3.6E-03
Benzo(k)fluoranthene	RD063	-	-	-	2.1E-05	3.4E-04	3.4E-04
Chrysene	RD063	-	-	-	5.9E-05	9.7E-04	9.7E-04
Dibenz(a,h)anthracene	RD063	-	-	-	1.1E-05	1.8E-04	1.8E-04
Fluoranthene	RD063	-	-	-	7.5E-05	1.2E-03	1.2E-03
Fluorene	RD063	-	-	-	5.7E-04	9.4E-03	9.4E-03
Indeno(1,2,3-cd)pyrene	RD063	-	-	-	2.4E-05	4.0E-04	4.0E-04
Naphthalene	RD063	-	-	-	6.9E-03	2.9E-01	2.9E-01
Perylene	RD063	-	-	-	1.2E-04	1.9E-03	1.9E-03
Phenanthrene	RD063	-	-	-	1.5E-03	2.5E-02	2.5E-02
Pyrene	RD063	-	-	-	1.4E-04	2.2E-03	2.2E-03
C08-C11 (Gasoline Range)	RD065	1.10E+01	5.5E+00	UJ		-	-
C11-C14 (Kerosene Range)	RD065	1.10E+01	5.5E+00	UJ		-	-
C14-C20 (Diesel Range)	RD065	1.10E+01	5.5E+00	UJ		-	-
C20-C30 (Lubricant Oil Range)	RD065	8.50E+01	8.5E+01	J		-	-
C11-C30	RD065	-	9.6E+01	-		-	-
Benzene	RD065	-	-	-	1.2E-04	6.6E-04	6.6E-04
Ethylbenzene	RD065	-	-	-	1.2E-04	6.6E-04	6.6E-04
Toluene	RD065	-	-	-	1.2E-04	6.6E-04	6.6E-04
m,p-Xylene	RD065	-	-	-	3.6E-04	2.0E-03	2.0E-03

TPH to Petroleum Constituent Extrapolation for Soil (0-2 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration[a] (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
o-Xylene	RD065	-	-	-	8.0E-05	4.4E-04	4.4E-04
Xylene (total)	RD065	-	-	-	4.4E-04	2.4E-03	2.4E-03
2-Methylnaphthalene	RD065	-	-	-	2.8E-02	1.5E-01	1.5E-01
Acenaphthene	RD065	-	-	-	5.7E-04	5.5E-02	5.5E-02
Acenaphthylene	RD065	-	-	-	7.0E-05	6.7E-03	6.7E-03
Anthracene	RD065	-	-	-	3.7E-04	3.6E-02	3.6E-02
Benzo(a)anthracene	RD065	-	-	-	2.7E-05	2.6E-03	2.6E-03
Benzo(a)pyrene	RD065	-	-	-	2.7E-05	2.6E-03	2.6E-03
Benzo(b)fluoranthene	RD065	-	-	-	4.3E-05	4.2E-03	4.2E-03
Benzo(e)pyrene	RD065	-	-	-	2.1E-04	2.0E-02	2.0E-02
Benzo(g,h,i)perylene	RD065	-	-	-	2.2E-04	2.1E-02	2.1E-02
Benzo(k)fluoranthene	RD065	-	-	-	2.1E-05	2.0E-03	2.0E-03
Chrysene	RD065	-	-	-	5.9E-05	5.6E-03	5.6E-03
Dibenz(a,h)anthracene	RD065	-	-	-	1.1E-05	1.1E-03	1.1E-03
Fluoranthene	RD065	-	-	-	7.5E-05	7.2E-03	7.2E-03
Fluorene	RD065	-	-	-	5.7E-04	5.5E-02	5.5E-02
Indeno(1,2,3-cd)pyrene	RD065	-	-	-	2.4E-05	2.3E-03	2.3E-03
Naphthalene	RD065	-	-	-	6.9E-03	3.8E-02	3.8E-02
Perylene	RD065	-	-	-	1.2E-04	1.1E-02	1.1E-02
Phenanthrene	RD065	-	-	-	1.5E-03	1.5E-01	1.5E-01
Pyrene	RD065	-	-	-	1.4E-04	1.3E-02	1.3E-02
C08-C11 (Gasoline Range)	RD067	1.20E+01	6.0E+00	UJ		-	-
C11-C14 (Kerosene Range)	RD067	1.20E+01	6.0E+00	UJ		-	-
C14-C20 (Diesel Range)	RD067	1.20E+01	6.0E+00	UJ		-	-
C20-C30 (Lubricant Oil Range)	RD067	1.10E+02	1.1E+02	J		-	-
C11-C30	RD067	-	1.2E+02	-		-	-
Benzene	RD067	-	-	-	1.2E-04	7.2E-04	7.2E-04
Ethylbenzene	RD067	-	-	-	1.2E-04	7.2E-04	7.2E-04
Toluene	RD067	-	-	-	1.2E-04	7.2E-04	7.2E-04
m,p-Xylene	RD067	-	-	-	3.6E-04	2.2E-03	2.2E-03
o-Xylene	RD067	-	-	-	8.0E-05	4.8E-04	4.8E-04
Xylene (total)	RD067	-	-	-	4.4E-04	2.6E-03	2.6E-03
2-Methylnaphthalene	RD067	-	-	-	2.8E-02	1.7E-01	1.7E-01
Acenaphthene	RD067	-	-	-	5.7E-04	7.0E-02	7.0E-02
Acenaphthylene	RD067	-	-	-	7.0E-05	8.5E-03	8.5E-03
Anthracene	RD067	-	-	-	3.7E-04	4.6E-02	4.6E-02
Benzo(a)anthracene	RD067	-	-	-	2.7E-05	3.3E-03	3.3E-03
Benzo(a)pyrene	RD067	-	-	-	2.7E-05	3.3E-03	3.3E-03
Benzo(b)fluoranthene	RD067	-	-	-	4.3E-05	5.3E-03	5.3E-03
Benzo(e)pyrene	RD067	-	-	-	2.1E-04	2.5E-02	2.5E-02
Benzo(g,h,i)perylene	RD067	-	-	-	2.2E-04	2.7E-02	2.7E-02
Benzo(k)fluoranthene	RD067	-	-	-	2.1E-05	2.5E-03	2.5E-03
Chrysene	RD067	-	-	-	5.9E-05	7.2E-03	7.2E-03
Dibenz(a,h)anthracene	RD067	-	-	-	1.1E-05	1.4E-03	1.4E-03
Fluoranthene	RD067	-	-	-	7.5E-05	9.1E-03	9.1E-03
Fluorene	RD067	-	-	-	5.7E-04	6.9E-02	6.9E-02
Indeno(1,2,3-cd)pyrene	RD067	-	-	-	2.4E-05	2.9E-03	2.9E-03
Naphthalene	RD067	-	-	-	6.9E-03	4.2E-02	4.2E-02
Perylene	RD067	-	-	-	1.2E-04	1.4E-02	1.4E-02
Phenanthrene	RD067	-	-	-	1.5E-03	1.9E-01	1.9E-01
Pyrene	RD067	-	-	-	1.4E-04	1.7E-02	1.7E-02
C08-C11 (Gasoline Range)	RD068	1.09E+02	5.5E+01	UJ		-	-
C11-C14 (Kerosene Range)	RD068	1.09E+02	5.5E+01	UJ		-	-
C14-C20 (Diesel Range)	RD068	1.20E+03	1.2E+03	J		-	-
C20-C30 (Lubricant Oil Range)	RD068	3.50E+03	3.5E+03	J		-	-
C11-C30	RD068	-	4.8E+03	-		-	-

TPH to Petroleum Constituent Extrapolation for Soil (0-2 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration[a] (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Benzene	RD068	-	-	-	1.2E-04	6.5E-03	6.5E-03
Ethylbenzene	RD068	-	-	-	1.2E-04	6.5E-03	6.5E-03
Toluene	RD068	-	-	-	1.2E-04	6.5E-03	6.5E-03
m,p-Xylene	RD068	-	-	-	3.6E-04	2.0E-02	2.0E-02
o-Xylene	RD068	-	-	-	8.0E-05	4.4E-03	4.4E-03
Xylene (total)	RD068	-	-	-	4.4E-04	2.4E-02	2.4E-02
2-Methylnaphthalene	RD068	-	-	-	2.8E-02	1.5E+00	1.5E+00
Acenaphthene	RD068	-	-	-	5.7E-04	2.7E+00	2.7E+00
Acenaphthylene	RD068	-	-	-	7.0E-05	3.3E-01	3.3E-01
Anthracene	RD068	-	-	-	3.7E-04	1.8E+00	1.8E+00
Benzo(a)anthracene	RD068	-	-	-	2.7E-05	1.3E-01	1.3E-01
Benzo(a)pyrene	RD068	-	-	-	2.7E-05	1.3E-01	1.3E-01
Benzo(b)fluoranthene	RD068	-	-	-	4.3E-05	2.1E-01	2.1E-01
Benzo(e)pyrene	RD068	-	-	-	2.1E-04	9.8E-01	9.8E-01
Benzo(g,h,i)perylene	RD068	-	-	-	2.2E-04	1.1E+00	1.1E+00
Benzo(k)fluoranthene	RD068	-	-	-	2.1E-05	9.8E-02	9.8E-02
Chrysene	RD068	-	-	-	5.9E-05	2.8E-01	2.8E-01
Dibenz(a,h)anthracene	RD068	-	-	-	1.1E-05	5.3E-02	5.3E-02
Fluoranthene	RD068	-	-	-	7.5E-05	3.6E-01	3.6E-01
Fluorene	RD068	-	-	-	5.7E-04	2.7E+00	2.7E+00
Indeno(1,2,3-cd)pyrene	RD068	-	-	-	2.4E-05	1.1E-01	1.1E-01
Naphthalene	RD068	-	-	-	6.9E-03	3.8E-01	3.8E-01
Perylene	RD068	-	-	-	1.2E-04	5.6E-01	5.6E-01
Phenanthrene	RD068	-	-	-	1.5E-03	7.3E+00	7.3E+00
Pyrene	RD068	-	-	-	1.4E-04	6.5E-01	6.5E-01
C08-C11 (Gasoline Range)	RD069	1.10E+01	5.5E+00	UJ		-	-
C11-C14 (Kerosene Range)	RD069	1.10E+01	5.5E+00	UJ		-	-
C14-C20 (Diesel Range)	RD069	1.10E+01	5.5E+00	UJ		-	-
C20-C30 (Lubricant Oil Range)	RD069	1.10E+01	5.5E+00	UJ		-	-
C11-C30	RD069	-	1.7E+01	-		-	-
Benzene	RD069	-	-	-	1.2E-04	6.6E-04	6.6E-04
Ethylbenzene	RD069	-	-	-	1.2E-04	6.6E-04	6.6E-04
Toluene	RD069	-	-	-	1.2E-04	6.6E-04	6.6E-04
m,p-Xylene	RD069	-	-	-	3.6E-04	2.0E-03	2.0E-03
o-Xylene	RD069	-	-	-	8.0E-05	4.4E-04	4.4E-04
Xylene (total)	RD069	-	-	-	4.4E-04	2.4E-03	2.4E-03
2-Methylnaphthalene	RD069	-	-	-	2.8E-02	1.5E-01	1.5E-01
Acenaphthene	RD069	-	-	-	5.7E-04	9.5E-03	9.5E-03
Acenaphthylene	RD069	-	-	-	7.0E-05	1.2E-03	1.2E-03
Anthracene	RD069	-	-	-	3.7E-04	6.2E-03	6.2E-03
Benzo(a)anthracene	RD069	-	-	-	2.7E-05	4.4E-04	4.4E-04
Benzo(a)pyrene	RD069	-	-	-	2.7E-05	4.5E-04	4.5E-04
Benzo(b)fluoranthene	RD069	-	-	-	4.3E-05	7.1E-04	7.1E-04
Benzo(e)pyrene	RD069	-	-	-	2.1E-04	3.4E-03	3.4E-03
Benzo(g,h,i)perylene	RD069	-	-	-	2.2E-04	3.6E-03	3.6E-03
Benzo(k)fluoranthene	RD069	-	-	-	2.1E-05	3.4E-04	3.4E-04
Chrysene	RD069	-	-	-	5.9E-05	9.7E-04	9.7E-04
Dibenz(a,h)anthracene	RD069	-	-	-	1.1E-05	1.8E-04	1.8E-04
Fluoranthene	RD069	-	-	-	7.5E-05	1.2E-03	1.2E-03
Fluorene	RD069	-	-	-	5.7E-04	9.4E-03	9.4E-03
Indeno(1,2,3-cd)pyrene	RD069	-	-	-	2.4E-05	4.0E-04	4.0E-04
Naphthalene	RD069	-	-	-	6.9E-03	3.8E-02	3.8E-02
Perylene	RD069	-	-	-	1.2E-04	1.9E-03	1.9E-03
Phenanthrene	RD069	-	-	-	1.5E-03	2.5E-02	2.5E-02
Pyrene	RD069	-	-	-	1.4E-04	2.2E-03	2.2E-03
C08-C11 (Gasoline Range)	RD071	1.10E+01	5.5E+00	UJ		-	-

TPH to Petroleum Constituent Extrapolation for Soil (0-2 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration[a] (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
C11-C14 (Kerosene Range)	RD071	1.10E+01	5.5E+00	UJ		-	-
C14-C20 (Diesel Range)	RD071	1.10E+01	5.5E+00	UJ		-	-
C20-C30 (Lubricant Oil Range)	RD071	1.10E+01	5.5E+00	UJ		-	-
C11-C30	RD071	-	1.7E+01	-		-	-
Benzene	RD071	-	-	-	1.2E-04	6.6E-04	6.6E-04
Ethylbenzene	RD071	-	-	-	1.2E-04	6.6E-04	6.6E-04
Toluene	RD071	-	-	-	1.2E-04	6.6E-04	6.6E-04
m,p-Xylene	RD071	-	-	-	3.6E-04	2.0E-03	2.0E-03
o-Xylene	RD071	-	-	-	8.0E-05	4.4E-04	4.4E-04
Xylene (total)	RD071	-	-	-	4.4E-04	2.4E-03	2.4E-03
2-Methylnaphthalene	RD071	-	-	-	2.8E-02	1.5E-01	1.5E-01
Acenaphthene	RD071	-	-	-	5.7E-04	9.5E-03	9.5E-03
Acenaphthylene	RD071	-	-	-	7.0E-05	1.2E-03	1.2E-03
Anthracene	RD071	-	-	-	3.7E-04	6.2E-03	6.2E-03
Benzo(a)anthracene	RD071	-	-	-	2.7E-05	4.4E-04	4.4E-04
Benzo(a)pyrene	RD071	-	-	-	2.7E-05	4.5E-04	4.5E-04
Benzo(b)fluoranthene	RD071	-	-	-	4.3E-05	7.1E-04	7.1E-04
Benzo(e)pyrene	RD071	-	-	-	2.1E-04	3.4E-03	3.4E-03
Benzo(g,h,i)perylene	RD071	-	-	-	2.2E-04	3.6E-03	3.6E-03
Benzo(k)fluoranthene	RD071	-	-	-	2.1E-05	3.4E-04	3.4E-04
Chrysene	RD071	-	-	-	5.9E-05	9.7E-04	9.7E-04
Dibenz(a,h)anthracene	RD071	-	-	-	1.1E-05	1.8E-04	1.8E-04
Fluoranthene	RD071	-	-	-	7.5E-05	1.2E-03	1.2E-03
Fluorene	RD071	-	-	-	5.7E-04	9.4E-03	9.4E-03
Indeno(1,2,3-cd)pyrene	RD071	-	-	-	2.4E-05	4.0E-04	4.0E-04
Naphthalene	RD071	-	-	-	6.9E-03	3.8E-02	3.8E-02
Perylene	RD071	-	-	-	1.2E-04	1.9E-03	1.9E-03
Phenanthrene	RD071	-	-	-	1.5E-03	2.5E-02	2.5E-02
Pyrene	RD071	-	-	-	1.4E-04	2.2E-03	2.2E-03
C08-C11 (Gasoline Range)	RD176	1.20E+01	6.0E+00	UJ		-	-
C11-C14 (Kerosene Range)	RD176	1.20E+01	6.0E+00	UJ		-	-
C14-C20 (Diesel Range)	RD176	1.20E+01	6.0E+00	UJ		-	-
C20-C30 (Lubricant Oil Range)	RD176	1.20E+01	6.0E+00	UJ		-	-
C11-C30	RD176	-	1.8E+01	-		-	-
Benzene	RD176	-	-	-	1.2E-04	7.2E-04	7.2E-04
Ethylbenzene	RD176	-	-	-	1.2E-04	7.2E-04	7.2E-04
Toluene	RD176	-	-	-	1.2E-04	7.2E-04	7.2E-04
m,p-Xylene	RD176	-	-	-	3.6E-04	2.2E-03	2.2E-03
o-Xylene	RD176	-	-	-	8.0E-05	4.8E-04	4.8E-04
Xylene (total)	RD176	-	-	-	4.4E-04	2.6E-03	2.6E-03
2-Methylnaphthalene	RD176	-	-	-	2.8E-02	1.7E-01	1.7E-01
Acenaphthene	RD176	-	-	-	5.7E-04	1.0E-02	1.0E-02
Acenaphthylene	RD176	-	-	-	7.0E-05	1.3E-03	1.3E-03
Anthracene	RD176	-	-	-	3.7E-04	6.7E-03	6.7E-03
Benzo(a)anthracene	RD176	-	-	-	2.7E-05	4.9E-04	4.9E-04
Benzo(a)pyrene	RD176	-	-	-	2.7E-05	4.9E-04	4.9E-04
Benzo(b)fluoranthene	RD176	-	-	-	4.3E-05	7.8E-04	7.8E-04
Benzo(e)pyrene	RD176	-	-	-	2.1E-04	3.7E-03	3.7E-03
Benzo(g,h,i)perylene	RD176	-	-	-	2.2E-04	4.0E-03	4.0E-03
Benzo(k)fluoranthene	RD176	-	-	-	2.1E-05	3.7E-04	3.7E-04
Chrysene	RD176	-	-	-	5.9E-05	1.1E-03	1.1E-03
Dibenz(a,h)anthracene	RD176	-	-	-	1.1E-05	2.0E-04	2.0E-04
Fluoranthene	RD176	-	-	-	7.5E-05	1.3E-03	1.3E-03
Fluorene	RD176	-	-	-	5.7E-04	1.0E-02	1.0E-02
Indeno(1,2,3-cd)pyrene	RD176	-	-	-	2.4E-05	4.3E-04	4.3E-04
Naphthalene	RD176	-	-	-	6.9E-03	4.2E-02	4.2E-02

TPH to Petroleum Constituent Extrapolation for Soil (0-2 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration[a] (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Perylene	RD176	-	-	-	1.2E-04	2.1E-03	2.1E-03
Phenanthrene	RD176	-	-	-	1.5E-03	2.8E-02	2.8E-02
Pyrene	RD176	-	-	-	1.4E-04	2.5E-03	2.5E-03
C08-C11 (Gasoline Range)	RD727	1.10E+01	5.5E+00	UJ		-	-
C11-C14 (Kerosene Range)	RD727	1.10E+01	5.5E+00	UJ		-	-
C14-C20 (Diesel Range)	RD727	1.10E+01	5.5E+00	UJ		-	-
C20-C30 (Lubricant Oil Range)	RD727	1.10E+01	5.5E+00	UJ		-	-
C11-C30	RD727	-	1.7E+01	-		-	-
Benzene	RD727	6.00E-03	3.0E-03	U	1.2E-04	6.6E-04	6.6E-04
Ethylbenzene	RD727	6.00E-03	3.0E-03	U	1.2E-04	6.6E-04	6.6E-04
Toluene	RD727	6.00E-03	3.0E-03	U	1.2E-04	6.6E-04	6.6E-04
m,p-Xylene	RD727	6.00E-03	3.0E-03	U	3.6E-04	2.0E-03	2.0E-03
o-Xylene	RD727	6.00E-03	3.0E-03	U	8.0E-05	4.4E-04	4.4E-04
Xylene (total)	RD727	-	-	-	4.4E-04	2.4E-03	2.4E-03
2-Methylnaphthalene	RD727	-	-	-	2.8E-02	1.5E-01	1.5E-01
Acenaphthene	RD727	-	-	-	5.7E-04	9.5E-03	9.5E-03
Acenaphthylene	RD727	-	-	-	7.0E-05	1.2E-03	1.2E-03
Anthracene	RD727	-	-	-	3.7E-04	6.2E-03	6.2E-03
Benzo(a)anthracene	RD727	-	-	-	2.7E-05	4.4E-04	4.4E-04
Benzo(a)pyrene	RD727	-	-	-	2.7E-05	4.5E-04	4.5E-04
Benzo(b)fluoranthene	RD727	-	-	-	4.3E-05	7.1E-04	7.1E-04
Benzo(e)pyrene	RD727	-	-	-	2.1E-04	3.4E-03	3.4E-03
Benzo(g,h,i)perylene	RD727	-	-	-	2.2E-04	3.6E-03	3.6E-03
Benzo(k)fluoranthene	RD727	-	-	-	2.1E-05	3.4E-04	3.4E-04
Chrysene	RD727	-	-	-	5.9E-05	9.7E-04	9.7E-04
Dibenz(a,h)anthracene	RD727	-	-	-	1.1E-05	1.8E-04	1.8E-04
Fluoranthene	RD727	-	-	-	7.5E-05	1.2E-03	1.2E-03
Fluorene	RD727	-	-	-	5.7E-04	9.4E-03	9.4E-03
Indeno(1,2,3-cd)pyrene	RD727	-	-	-	2.4E-05	4.0E-04	4.0E-04
Naphthalene	RD727	-	-	-	6.9E-03	3.8E-02	3.8E-02
Perylene	RD727	-	-	-	1.2E-04	1.9E-03	1.9E-03
Phenanthrene	RD727	-	-	-	1.5E-03	2.5E-02	2.5E-02
Pyrene	RD727	-	-	-	1.4E-04	2.2E-03	2.2E-03
C08-C11 (Gasoline Range)	RD728	5.80E+01	2.9E+01	UJ		-	-
C11-C14 (Kerosene Range)	RD728	5.80E+01	2.9E+01	UJ		-	-
C14-C20 (Diesel Range)	RD728	2.10E+02	2.1E+02	J		-	-
C20-C30 (Lubricant Oil Range)	RD728	9.20E+02	9.2E+02	J		-	-
C11-C30	RD728	-	1.2E+03	-		-	-
Benzene	RD728	-	-	-	1.2E-04	3.5E-03	3.5E-03
Ethylbenzene	RD728	-	-	-	1.2E-04	3.5E-03	3.5E-03
Toluene	RD728	-	-	-	1.2E-04	3.5E-03	3.5E-03
m,p-Xylene	RD728	-	-	-	3.6E-04	1.0E-02	1.0E-02
o-Xylene	RD728	-	-	-	8.0E-05	2.3E-03	2.3E-03
Xylene (total)	RD728	-	-	-	4.4E-04	1.3E-02	1.3E-02
2-Methylnaphthalene	RD728	-	-	-	2.8E-02	8.0E-01	8.0E-01
Acenaphthene	RD728	-	-	-	5.7E-04	6.6E-01	6.6E-01
Acenaphthylene	RD728	-	-	-	7.0E-05	8.1E-02	8.1E-02
Anthracene	RD728	-	-	-	3.7E-04	4.3E-01	4.3E-01
Benzo(a)anthracene	RD728	-	-	-	2.7E-05	3.1E-02	3.1E-02
Benzo(a)pyrene	RD728	-	-	-	2.7E-05	3.2E-02	3.2E-02
Benzo(b)fluoranthene	RD728	-	-	-	4.3E-05	5.0E-02	5.0E-02
Benzo(e)pyrene	RD728	-	-	-	2.1E-04	2.4E-01	2.4E-01
Benzo(g,h,i)perylene	RD728	-	-	-	2.2E-04	2.6E-01	2.6E-01
Benzo(k)fluoranthene	RD728	-	-	-	2.1E-05	2.4E-02	2.4E-02
Chrysene	RD728	-	-	-	5.9E-05	6.8E-02	6.8E-02
Dibenz(a,h)anthracene	RD728	-	-	-	1.1E-05	1.3E-02	1.3E-02

TPH to Petroleum Constituent Extrapolation for Soil (0-2 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration[a] (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Fluoranthene	RD728	-	-	-	7.5E-05	8.7E-02	8.7E-02
Fluorene	RD728	-	-	-	5.7E-04	6.6E-01	6.6E-01
Indeno(1,2,3-cd)pyrene	RD728	-	-	-	2.4E-05	2.8E-02	2.8E-02
Naphthalene	RD728	-	-	-	6.9E-03	2.0E-01	2.0E-01
Perylene	RD728	-	-	-	1.2E-04	1.4E-01	1.4E-01
Phenanthrene	RD728	-	-	-	1.5E-03	1.8E+00	1.8E+00
Pyrene	RD728	-	-	-	1.4E-04	1.6E-01	1.6E-01
C08-C11 (Gasoline Range)	RD737	1.50E+01	7.5E+00	UJ		-	-
C11-C14 (Kerosene Range)	RD737	1.50E+01	7.5E+00	UJ		-	-
C14-C20 (Diesel Range)	RD737	1.50E+01	7.5E+00	UJ		-	-
C20-C30 (Lubricant Oil Range)	RD737	1.50E+01	7.5E+00	UJ		-	-
C11-C30	RD737	-	2.3E+01	-		-	-
Benzene	RD737	-	-	-	1.2E-04	9.0E-04	9.0E-04
Ethylbenzene	RD737	-	-	-	1.2E-04	9.0E-04	9.0E-04
Toluene	RD737	-	-	-	1.2E-04	9.0E-04	9.0E-04
m,p-Xylene	RD737	-	-	-	3.6E-04	2.7E-03	2.7E-03
o-Xylene	RD737	-	-	-	8.0E-05	6.0E-04	6.0E-04
Xylene (total)	RD737	-	-	-	4.4E-04	3.3E-03	3.3E-03
2-Methylnaphthalene	RD737	-	-	-	2.8E-02	2.1E-01	2.1E-01
Acenaphthene	RD737	-	-	-	5.7E-04	1.3E-02	1.3E-02
Acenaphthylene	RD737	-	-	-	7.0E-05	1.6E-03	1.6E-03
Anthracene	RD737	-	-	-	3.7E-04	8.4E-03	8.4E-03
Benzo(a)anthracene	RD737	-	-	-	2.7E-05	6.1E-04	6.1E-04
Benzo(a)pyrene	RD737	-	-	-	2.7E-05	6.1E-04	6.1E-04
Benzo(b)fluoranthene	RD737	-	-	-	4.3E-05	9.7E-04	9.7E-04
Benzo(e)pyrene	RD737	-	-	-	2.1E-04	4.7E-03	4.7E-03
Benzo(g,h,i)perylene	RD737	-	-	-	2.2E-04	5.0E-03	5.0E-03
Benzo(k)fluoranthene	RD737	-	-	-	2.1E-05	4.6E-04	4.6E-04
Chrysene	RD737	-	-	-	5.9E-05	1.3E-03	1.3E-03
Dibenz(a,h)anthracene	RD737	-	-	-	1.1E-05	2.5E-04	2.5E-04
Fluoranthene	RD737	-	-	-	7.5E-05	1.7E-03	1.7E-03
Fluorene	RD737	-	-	-	5.7E-04	1.3E-02	1.3E-02
Indeno(1,2,3-cd)pyrene	RD737	-	-	-	2.4E-05	5.4E-04	5.4E-04
Naphthalene	RD737	-	-	-	6.9E-03	5.2E-02	5.2E-02
Perylene	RD737	-	-	-	1.2E-04	2.7E-03	2.7E-03
Phenanthrene	RD737	-	-	-	1.5E-03	3.4E-02	3.4E-02
Pyrene	RD737	-	-	-	1.4E-04	3.1E-03	3.1E-03
C08-C11 (Gasoline Range)	RD738	1.10E+01	5.5E+00	UJ		-	-
C11-C14 (Kerosene Range)	RD738	1.10E+01	5.5E+00	UJ		-	-
C14-C20 (Diesel Range)	RD738	1.10E+01	5.5E+00	UJ		-	-
C20-C30 (Lubricant Oil Range)	RD738	1.10E+01	5.5E+00	UJ		-	-
C11-C30	RD738	-	1.7E+01	-		-	-
Benzene	RD738	6.00E-03	3.0E-03	U	1.2E-04	6.6E-04	6.6E-04
Ethylbenzene	RD738	6.00E-03	3.0E-03	U	1.2E-04	6.6E-04	6.6E-04
Toluene	RD738	6.00E-03	3.0E-03	U	1.2E-04	6.6E-04	6.6E-04
m,p-Xylene	RD738	6.00E-03	3.0E-03	U	3.6E-04	2.0E-03	2.0E-03
o-Xylene	RD738	6.00E-03	3.0E-03	U	8.0E-05	4.4E-04	4.4E-04
Xylene (total)	RD738	-	-	-	4.4E-04	2.4E-03	2.4E-03
2-Methylnaphthalene	RD738	-	-	-	2.8E-02	1.5E-01	1.5E-01
Acenaphthene	RD738	-	-	-	5.7E-04	9.5E-03	9.5E-03
Acenaphthylene	RD738	-	-	-	7.0E-05	1.2E-03	1.2E-03
Anthracene	RD738	-	-	-	3.7E-04	6.2E-03	6.2E-03
Benzo(a)anthracene	RD738	-	-	-	2.7E-05	4.4E-04	4.4E-04
Benzo(a)pyrene	RD738	-	-	-	2.7E-05	4.5E-04	4.5E-04
Benzo(b)fluoranthene	RD738	-	-	-	4.3E-05	7.1E-04	7.1E-04
Benzo(e)pyrene	RD738	-	-	-	2.1E-04	3.4E-03	3.4E-03

TPH to Petroleum Constituent Extrapolation for Soil (0-2 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration[a] (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Benzo(g,h,i)perylene	RD738	-	-	-	2.2E-04	3.6E-03	3.6E-03
Benzo(k)fluoranthene	RD738	-	-	-	2.1E-05	3.4E-04	3.4E-04
Chrysene	RD738	-	-	-	5.9E-05	9.7E-04	9.7E-04
Dibenz(a,h)anthracene	RD738	-	-	-	1.1E-05	1.8E-04	1.8E-04
Fluoranthene	RD738	-	-	-	7.5E-05	1.2E-03	1.2E-03
Fluorene	RD738	-	-	-	5.7E-04	9.4E-03	9.4E-03
Indeno(1,2,3-cd)pyrene	RD738	-	-	-	2.4E-05	4.0E-04	4.0E-04
Naphthalene	RD738	-	-	-	6.9E-03	3.8E-02	3.8E-02
Perylene	RD738	-	-	-	1.2E-04	1.9E-03	1.9E-03
Phenanthrene	RD738	-	-	-	1.5E-03	2.5E-02	2.5E-02
Pyrene	RD738	-	-	-	1.4E-04	2.2E-03	2.2E-03
C08-C11 (Gasoline Range)	RJ782	1.70E+01	8.5E+00	U		-	-
C11-C14 (Kerosene Range)	RJ782	1.70E+01	8.5E+00	U		-	-
C14-C20 (Diesel Range)	RJ782	1.70E+00	1.7E+00	J		-	-
C20-C30 (Lubricant Oil Range)	RJ782	1.20E+02	1.2E+02			-	-
C11-C30	RJ782	-	1.3E+02	-		-	-
Benzene	RJ782	-	-	-	1.2E-04	1.0E-03	1.0E-03
Ethylbenzene	RJ782	-	-	-	1.2E-04	1.0E-03	1.0E-03
Toluene	RJ782	-	-	-	1.2E-04	1.0E-03	1.0E-03
m,p-Xylene	RJ782	-	-	-	3.6E-04	3.1E-03	3.1E-03
o-Xylene	RJ782	-	-	-	8.0E-05	6.8E-04	6.8E-04
Xylene (total)	RJ782	-	-	-	4.4E-04	3.7E-03	3.7E-03
2-Methylnaphthalene	RJ782	3.00E-03	1.5E-03	U	2.8E-02	2.3E-01	1.5E-03
Acenaphthene	RJ782	3.00E-03	1.5E-03	U	5.7E-04	7.5E-02	1.5E-03
Acenaphthylene	RJ782	3.00E-03	1.5E-03	U	7.0E-05	9.1E-03	1.5E-03
Anthracene	RJ782	3.00E-03	1.5E-03	U	3.7E-04	4.9E-02	1.5E-03
Benzo(a)anthracene	RJ782	4.00E-03	4.0E-03		2.7E-05	3.5E-03	4.0E-03
Benzo(a)pyrene	RJ782	6.00E-03	6.0E-03		2.7E-05	3.5E-03	6.0E-03
Benzo(b)fluoranthene	RJ782	8.00E-03	8.0E-03		4.3E-05	5.6E-03	8.0E-03
Benzo(e)pyrene	RJ782	-	-	-	2.1E-04	2.7E-02	2.7E-02
Benzo(g,h,i)perylene	RJ782	3.00E-03	1.5E-03	U	2.2E-04	2.9E-02	1.5E-03
Benzo(k)fluoranthene	RJ782	7.00E-03	7.0E-03		2.1E-05	2.7E-03	7.0E-03
Chrysene	RJ782	8.00E-03	8.0E-03		5.9E-05	7.6E-03	8.0E-03
Dibenz(a,h)anthracene	RJ782	3.00E-03	1.5E-03	U	1.1E-05	1.4E-03	1.4E-03
Fluoranthene	RJ782	9.00E-03	9.0E-03		7.5E-05	9.7E-03	9.0E-03
Fluorene	RJ782	3.00E-03	1.5E-03	U	5.7E-04	7.4E-02	1.5E-03
Indeno(1,2,3-cd)pyrene	RJ782	3.00E-03	1.5E-03	U	2.4E-05	3.1E-03	1.5E-03
Naphthalene	RJ782	3.00E-03	1.5E-03	U	6.9E-03	5.9E-02	1.5E-03
Perylene	RJ782	-	-	-	1.2E-04	1.5E-02	1.5E-02
Phenanthrene	RJ782	4.00E-03	4.0E-03		1.5E-03	2.0E-01	4.0E-03
Pyrene	RJ782	9.00E-03	9.0E-03		1.4E-04	1.8E-02	9.0E-03
C08-C11 (Gasoline Range)	RS288	5.40E+01	2.7E+01	U		-	-
C11-C14 (Kerosene Range)	RS288	5.40E+01	2.7E+01	U		-	-
C14-C20 (Diesel Range)	RS288	7.60E+01	7.6E+01			-	-
C20-C30 (Lubricant Oil Range)	RS288	2.50E+02	2.5E+02			-	-
C11-C30	RS288	-	3.5E+02	-		-	-
Benzene	RS288	-	-	-	1.2E-04	3.2E-03	3.2E-03
Ethylbenzene	RS288	-	-	-	1.2E-04	3.2E-03	3.2E-03
Toluene	RS288	-	-	-	1.2E-04	3.2E-03	3.2E-03
m,p-Xylene	RS288	-	-	-	3.6E-04	9.7E-03	9.7E-03
o-Xylene	RS288	-	-	-	8.0E-05	2.2E-03	2.2E-03
Xylene (total)	RS288	-	-	-	4.4E-04	1.2E-02	1.2E-02
2-Methylnaphthalene	RS288DL	-	-	-	2.8E-02	7.4E-01	7.4E-01
Acenaphthene	RS288DL	3.20E+00	1.6E+00	U	5.7E-04	2.0E-01	2.0E-01
Acenaphthylene	RS288DL	3.20E+00	1.6E+00	U	7.0E-05	2.5E-02	2.5E-02
Anthracene	RS288DL	3.20E+00	1.6E+00	U	3.7E-04	1.3E-01	1.3E-01

TPH to Petroleum Constituent Extrapolation for Soil (0-2 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration[a] (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Benzo(a)anthracene	RS288DL	3.20E+00	1.6E+00	U	2.7E-05	9.5E-03	9.5E-03
Benzo(a)pyrene	RS288DL	3.20E+00	1.6E+00	U	2.7E-05	9.6E-03	9.6E-03
Benzo(b)fluoranthene	RS288DL	3.20E+00	1.6E+00	U	4.3E-05	1.5E-02	1.5E-02
Benzo(e)pyrene	RS288DL	-	-	-	2.1E-04	7.3E-02	7.3E-02
Benzo(g,h,i)perylene	RS288DL	3.20E+00	1.6E+00	U	2.2E-04	7.8E-02	7.8E-02
Benzo(k)fluoranthene	RS288DL	3.20E+00	1.6E+00	U	2.1E-05	7.2E-03	7.2E-03
Chrysene	RS288DL	3.20E+00	1.6E+00	U	5.9E-05	2.1E-02	2.1E-02
Dibenz(a,h)anthracene	RS288DL	3.20E+00	1.6E+00	U	1.1E-05	3.9E-03	3.9E-03
Fluoranthene	RS288DL	3.20E+00	1.6E+00	U	7.5E-05	2.6E-02	2.6E-02
Fluorene	RS288DL	3.20E+00	1.6E+00	U	5.7E-04	2.0E-01	2.0E-01
Indeno(1,2,3-cd)pyrene	RS288DL	3.20E+00	1.6E+00	U	2.4E-05	8.5E-03	8.5E-03
Naphthalene	RS288DL	3.20E+00	1.6E+00	U	6.9E-03	1.9E-01	1.9E-01
Perylene	RS288DL	-	-	-	1.2E-04	4.2E-02	4.2E-02
Phenanthrene	RS288DL	3.20E+00	1.6E+00	U	1.5E-03	5.4E-01	5.4E-01
Pyrene	RS288DL	3.20E+00	1.6E+00	U	1.4E-04	4.8E-02	4.8E-02
C08-C11 (Gasoline Range)	RS290	1.10E+01	5.5E+00	U		-	-
C11-C14 (Kerosene Range)	RS290	1.10E+01	5.5E+00	U		-	-
C14-C20 (Diesel Range)	RS290	1.10E+01	5.5E+00	U		-	-
C20-C30 (Lubricant Oil Range)	RS290	4.20E+01	4.2E+01			-	-
C11-C30	RS290	-	5.3E+01	-		-	-
Benzene	RS290	-	-	-	1.2E-04	6.6E-04	6.6E-04
Ethylbenzene	RS290	-	-	-	1.2E-04	6.6E-04	6.6E-04
Toluene	RS290	-	-	-	1.2E-04	6.6E-04	6.6E-04
m,p-Xylene	RS290	-	-	-	3.6E-04	2.0E-03	2.0E-03
o-Xylene	RS290	-	-	-	8.0E-05	4.4E-04	4.4E-04
Xylene (total)	RS290	-	-	-	4.4E-04	2.4E-03	2.4E-03
2-Methylnaphthalene	RS290	-	-	-	2.8E-02	1.5E-01	1.5E-01
Acenaphthene	RS290	3.30E-02	1.7E-02	U	5.7E-04	3.0E-02	1.7E-02
Acenaphthylene	RS290	3.30E-02	1.7E-02	U	7.0E-05	3.7E-03	3.7E-03
Anthracene	RS290	3.30E-02	1.7E-02	U	3.7E-04	2.0E-02	1.7E-02
Benzo(a)anthracene	RS290	3.30E-02	1.7E-02	U	2.7E-05	1.4E-03	1.4E-03
Benzo(a)pyrene	RS290	3.30E-02	1.7E-02	U	2.7E-05	1.4E-03	1.4E-03
Benzo(b)fluoranthene	RS290	3.30E-02	1.7E-02	U	4.3E-05	2.3E-03	2.3E-03
Benzo(e)pyrene	RS290	-	-	-	2.1E-04	1.1E-02	1.1E-02
Benzo(g,h,i)perylene	RS290	3.30E-02	1.7E-02	U	2.2E-04	1.2E-02	1.2E-02
Benzo(k)fluoranthene	RS290	3.30E-02	1.7E-02	U	2.1E-05	1.1E-03	1.1E-03
Chrysene	RS290	3.30E-02	1.7E-02	U	5.9E-05	3.1E-03	3.1E-03
Dibenz(a,h)anthracene	RS290	3.30E-02	1.7E-02	U	1.1E-05	5.9E-04	5.9E-04
Fluoranthene	RS290	3.30E-02	1.7E-02	U	7.5E-05	4.0E-03	4.0E-03
Fluorene	RS290	3.30E-02	1.7E-02	U	5.7E-04	3.0E-02	1.7E-02
Indeno(1,2,3-cd)pyrene	RS290	3.30E-02	1.7E-02	U	2.4E-05	1.3E-03	1.3E-03
Naphthalene	RS290	3.30E-02	1.7E-02	U	6.9E-03	3.8E-02	1.7E-02
Perylene	RS290	-	-	-	1.2E-04	6.2E-03	6.2E-03
Phenanthrene	RS290	3.30E-02	1.7E-02	U	1.5E-03	8.1E-02	1.7E-02
Pyrene	RS290	3.30E-02	1.7E-02	U	1.4E-04	7.2E-03	7.2E-03
C08-C11 (Gasoline Range)	RS291	1.10E+01	5.5E+00	U		-	-
C11-C14 (Kerosene Range)	RS291	1.10E+01	5.5E+00	U		-	-
C14-C20 (Diesel Range)	RS291	1.10E+01	5.5E+00	U		-	-
C20-C30 (Lubricant Oil Range)	RS291	1.10E+01	5.5E+00	U		-	-
C11-C30	RS291	-	1.7E+01	-		-	-
Benzene	RS291	5.00E-03	2.5E-03	U	1.2E-04	6.6E-04	6.6E-04
Ethylbenzene	RS291	5.00E-03	2.5E-03	U	1.2E-04	6.6E-04	6.6E-04
Toluene	RS291	5.00E-03	2.5E-03	U	1.2E-04	6.6E-04	6.6E-04
m,p-Xylene	RS291	5.00E-03	2.5E-03	U	3.6E-04	2.0E-03	2.0E-03
o-Xylene	RS291	5.00E-03	2.5E-03	U	8.0E-05	4.4E-04	4.4E-04
Xylene (total)	RS291	-	-	-	4.4E-04	2.4E-03	2.4E-03

TPH to Petroleum Constituent Extrapolation for Soil (0-2 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration[a] (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
2-Methylnaphthalene	RS291	-	-	-	2.8E-02	1.5E-01	1.5E-01
Acenaphthene	RS291	3.20E-02	1.6E-02	U	5.7E-04	9.5E-03	9.5E-03
Acenaphthylene	RS291	3.20E-02	1.6E-02	U	7.0E-05	1.2E-03	1.2E-03
Anthracene	RS291	3.20E-02	1.6E-02	U	3.7E-04	6.2E-03	6.2E-03
Benzo(a)anthracene	RS291	3.20E-02	1.6E-02	U	2.7E-05	4.4E-04	4.4E-04
Benzo(a)pyrene	RS291	3.20E-02	1.6E-02	U	2.7E-05	4.5E-04	4.5E-04
Benzo(b)fluoranthene	RS291	3.20E-02	1.6E-02	U	4.3E-05	7.1E-04	7.1E-04
Benzo(e)pyrene	RS291	-	-	-	2.1E-04	3.4E-03	3.4E-03
Benzo(g,h,i)perylene	RS291	3.20E-02	1.6E-02	U	2.2E-04	3.6E-03	3.6E-03
Benzo(k)fluoranthene	RS291	3.20E-02	1.6E-02	U	2.1E-05	3.4E-04	3.4E-04
Chrysene	RS291	3.20E-02	1.6E-02	U	5.9E-05	9.7E-04	9.7E-04
Dibenz(a,h)anthracene	RS291	3.20E-02	1.6E-02	U	1.1E-05	1.8E-04	1.8E-04
Fluoranthene	RS291	3.20E-02	1.6E-02	U	7.5E-05	1.2E-03	1.2E-03
Fluorene	RS291	3.20E-02	1.6E-02	U	5.7E-04	9.4E-03	9.4E-03
Indeno(1,2,3-cd)pyrene	RS291	3.20E-02	1.6E-02	U	2.4E-05	4.0E-04	4.0E-04
Naphthalene	RS291	3.20E-02	1.6E-02	U	6.9E-03	3.8E-02	1.6E-02
Perylene	RS291	-	-	-	1.2E-04	1.9E-03	1.9E-03
Phenanthrene	RS291	3.20E-02	1.6E-02	U	1.5E-03	2.5E-02	1.6E-02
Pyrene	RS291	3.20E-02	1.6E-02	U	1.4E-04	2.2E-03	2.2E-03
C08-C11 (Gasoline Range)	RS292	1.10E+01	5.5E+00	U		-	-
C11-C14 (Kerosene Range)	RS292	1.10E+01	5.5E+00	U		-	-
C14-C20 (Diesel Range)	RS292	1.10E+01	5.5E+00	U		-	-
C20-C30 (Lubricant Oil Range)	RS292	1.10E+01	5.5E+00	U		-	-
C11-C30	RS292	-	1.7E+01	-		-	-
Benzene	RS292	-	-	-	1.2E-04	6.6E-04	6.6E-04
Ethylbenzene	RS292	-	-	-	1.2E-04	6.6E-04	6.6E-04
Toluene	RS292	-	-	-	1.2E-04	6.6E-04	6.6E-04
m,p-Xylene	RS292	-	-	-	3.6E-04	2.0E-03	2.0E-03
o-Xylene	RS292	-	-	-	8.0E-05	4.4E-04	4.4E-04
Xylene (total)	RS292	-	-	-	4.4E-04	2.4E-03	2.4E-03
2-Methylnaphthalene	RS292	-	-	-	2.8E-02	1.5E-01	1.5E-01
Acenaphthene	RS292	3.40E-02	1.7E-02	U	5.7E-04	9.5E-03	9.5E-03
Acenaphthylene	RS292	3.40E-02	1.7E-02	U	7.0E-05	1.2E-03	1.2E-03
Anthracene	RS292	3.40E-02	1.7E-02	U	3.7E-04	6.2E-03	6.2E-03
Benzo(a)anthracene	RS292	3.40E-02	1.7E-02	U	2.7E-05	4.4E-04	4.4E-04
Benzo(a)pyrene	RS292	3.40E-02	1.7E-02	U	2.7E-05	4.5E-04	4.5E-04
Benzo(b)fluoranthene	RS292	3.40E-02	1.7E-02	U	4.3E-05	7.1E-04	7.1E-04
Benzo(e)pyrene	RS292	-	-	-	2.1E-04	3.4E-03	3.4E-03
Benzo(g,h,i)perylene	RS292	3.40E-02	1.7E-02	U	2.2E-04	3.6E-03	3.6E-03
Benzo(k)fluoranthene	RS292	3.40E-02	1.7E-02	U	2.1E-05	3.4E-04	3.4E-04
Chrysene	RS292	3.40E-02	1.7E-02	U	5.9E-05	9.7E-04	9.7E-04
Dibenz(a,h)anthracene	RS292	3.40E-02	1.7E-02	U	1.1E-05	1.8E-04	1.8E-04
Fluoranthene	RS292	3.40E-02	1.7E-02	U	7.5E-05	1.2E-03	1.2E-03
Fluorene	RS292	3.40E-02	1.7E-02	U	5.7E-04	9.4E-03	9.4E-03
Indeno(1,2,3-cd)pyrene	RS292	3.40E-02	1.7E-02	U	2.4E-05	4.0E-04	4.0E-04
Naphthalene	RS292	3.40E-02	1.7E-02	U	6.9E-03	3.8E-02	1.7E-02
Perylene	RS292	-	-	-	1.2E-04	1.9E-03	1.9E-03
Phenanthrene	RS292	3.40E-02	1.7E-02	U	1.5E-03	2.5E-02	1.7E-02
Pyrene	RS292	3.40E-02	1.7E-02	U	1.4E-04	2.2E-03	2.2E-03
C08-C11 (Gasoline Range)	RS293	5.20E+01	2.6E+01	U		-	-
C11-C14 (Kerosene Range)	RS293	8.90E+01	8.9E+01			-	-
C14-C20 (Diesel Range)	RS293	7.00E+02	7.0E+02			-	-
C20-C30 (Lubricant Oil Range)	RS293	7.20E+02	7.2E+02			-	-
C11-C30	RS293	-	1.5E+03	-		-	-
Benzene	RS293	-	-	-	1.2E-04	3.1E-03	3.1E-03
Ethylbenzene	RS293	-	-	-	1.2E-04	3.1E-03	3.1E-03

TPH to Petroleum Constituent Extrapolation for Soil (0-2 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration[a] (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Toluene	RS293	-	-	-	1.2E-04	3.1E-03	3.1E-03
m,p-Xylene	RS293	-	-	-	3.6E-04	9.4E-03	9.4E-03
o-Xylene	RS293	-	-	-	8.0E-05	2.1E-03	2.1E-03
Xylene (total)	RS293	-	-	-	4.4E-04	1.1E-02	1.1E-02
2-Methylnaphthalene	RS293	-	-	-	2.8E-02	7.2E-01	7.2E-01
Acenaphthene	RS293	-	-	-	5.7E-04	8.6E-01	8.6E-01
Acenaphthylene	RS293	-	-	-	7.0E-05	1.1E-01	1.1E-01
Anthracene	RS293	-	-	-	3.7E-04	5.6E-01	5.6E-01
Benzo(a)anthracene	RS293	-	-	-	2.7E-05	4.1E-02	4.1E-02
Benzo(a)pyrene	RS293	-	-	-	2.7E-05	4.1E-02	4.1E-02
Benzo(b)fluoranthene	RS293	-	-	-	4.3E-05	6.5E-02	6.5E-02
Benzo(e)pyrene	RS293	-	-	-	2.1E-04	3.1E-01	3.1E-01
Benzo(g,h,i)perylene	RS293	-	-	-	2.2E-04	3.3E-01	3.3E-01
Benzo(k)fluoranthene	RS293	-	-	-	2.1E-05	3.1E-02	3.1E-02
Chrysene	RS293	-	-	-	5.9E-05	8.9E-02	8.9E-02
Dibenz(a,h)anthracene	RS293	-	-	-	1.1E-05	1.7E-02	1.7E-02
Fluoranthene	RS293	-	-	-	7.5E-05	1.1E-01	1.1E-01
Fluorene	RS293	-	-	-	5.7E-04	8.6E-01	8.6E-01
Indeno(1,2,3-cd)pyrene	RS293	-	-	-	2.4E-05	3.6E-02	3.6E-02
Naphthalene	RS293	-	-	-	6.9E-03	1.8E-01	1.8E-01
Perylene	RS293	-	-	-	1.2E-04	1.8E-01	1.8E-01
Phenanthrene	RS293	-	-	-	1.5E-03	2.3E+00	2.3E+00
Pyrene	RS293	-	-	-	1.4E-04	2.1E-01	2.1E-01
C08-C11 (Gasoline Range)	RS294	1.10E+01	5.5E+00	U		-	-
C11-C14 (Kerosene Range)	RS294	1.10E+01	5.5E+00	U		-	-
C14-C20 (Diesel Range)	RS294	1.10E+01	5.5E+00	U		-	-
C20-C30 (Lubricant Oil Range)	RS294	1.10E+01	5.5E+00	U		-	-
C11-C30	RS294	-	1.7E+01	-		-	-
Benzene	RS294	-	-	-	1.2E-04	6.6E-04	6.6E-04
Ethylbenzene	RS294	-	-	-	1.2E-04	6.6E-04	6.6E-04
Toluene	RS294	-	-	-	1.2E-04	6.6E-04	6.6E-04
m,p-Xylene	RS294	-	-	-	3.6E-04	2.0E-03	2.0E-03
o-Xylene	RS294	-	-	-	8.0E-05	4.4E-04	4.4E-04
Xylene (total)	RS294	-	-	-	4.4E-04	2.4E-03	2.4E-03
2-Methylnaphthalene	RS294	-	-	-	2.8E-02	1.5E-01	1.5E-01
Acenaphthene	RS294	-	-	-	5.7E-04	9.5E-03	9.5E-03
Acenaphthylene	RS294	-	-	-	7.0E-05	1.2E-03	1.2E-03
Anthracene	RS294	-	-	-	3.7E-04	6.2E-03	6.2E-03
Benzo(a)anthracene	RS294	-	-	-	2.7E-05	4.4E-04	4.4E-04
Benzo(a)pyrene	RS294	-	-	-	2.7E-05	4.5E-04	4.5E-04
Benzo(b)fluoranthene	RS294	-	-	-	4.3E-05	7.1E-04	7.1E-04
Benzo(e)pyrene	RS294	-	-	-	2.1E-04	3.4E-03	3.4E-03
Benzo(g,h,i)perylene	RS294	-	-	-	2.2E-04	3.6E-03	3.6E-03
Benzo(k)fluoranthene	RS294	-	-	-	2.1E-05	3.4E-04	3.4E-04
Chrysene	RS294	-	-	-	5.9E-05	9.7E-04	9.7E-04
Dibenz(a,h)anthracene	RS294	-	-	-	1.1E-05	1.8E-04	1.8E-04
Fluoranthene	RS294	-	-	-	7.5E-05	1.2E-03	1.2E-03
Fluorene	RS294	-	-	-	5.7E-04	9.4E-03	9.4E-03
Indeno(1,2,3-cd)pyrene	RS294	-	-	-	2.4E-05	4.0E-04	4.0E-04
Naphthalene	RS294	-	-	-	6.9E-03	3.8E-02	3.8E-02
Perylene	RS294	-	-	-	1.2E-04	1.9E-03	1.9E-03
Phenanthrene	RS294	-	-	-	1.5E-03	2.5E-02	2.5E-02
Pyrene	RS294	-	-	-	1.4E-04	2.2E-03	2.2E-03
C08-C11 (Gasoline Range)	RS295	1.10E+01	5.5E+00	U		-	-
C11-C14 (Kerosene Range)	RS295	1.10E+01	5.5E+00	U		-	-
C14-C20 (Diesel Range)	RS295	1.10E+01	5.5E+00	U		-	-

TPH to Petroleum Constituent Extrapolation for Soil (0-2 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration[a] (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
C20-C30 (Lubricant Oil Range)	RS295	1.10E+01	5.5E+00	U		-	-
C11-C30	RS295	-	1.7E+01	-		-	-
Benzene	RS295	-	-	-	1.2E-04	6.6E-04	6.6E-04
Ethylbenzene	RS295	-	-	-	1.2E-04	6.6E-04	6.6E-04
Toluene	RS295	-	-	-	1.2E-04	6.6E-04	6.6E-04
m,p-Xylene	RS295	-	-	-	3.6E-04	2.0E-03	2.0E-03
o-Xylene	RS295	-	-	-	8.0E-05	4.4E-04	4.4E-04
Xylene (total)	RS295	-	-	-	4.4E-04	2.4E-03	2.4E-03
2-Methylnaphthalene	RS295	-	-	-	2.8E-02	1.5E-01	1.5E-01
Acenaphthene	RS295	-	-	-	5.7E-04	9.5E-03	9.5E-03
Acenaphthylene	RS295	-	-	-	7.0E-05	1.2E-03	1.2E-03
Anthracene	RS295	-	-	-	3.7E-04	6.2E-03	6.2E-03
Benzo(a)anthracene	RS295	-	-	-	2.7E-05	4.4E-04	4.4E-04
Benzo(a)pyrene	RS295	-	-	-	2.7E-05	4.5E-04	4.5E-04
Benzo(b)fluoranthene	RS295	-	-	-	4.3E-05	7.1E-04	7.1E-04
Benzo(e)pyrene	RS295	-	-	-	2.1E-04	3.4E-03	3.4E-03
Benzo(g,h,i)perylene	RS295	-	-	-	2.2E-04	3.6E-03	3.6E-03
Benzo(k)fluoranthene	RS295	-	-	-	2.1E-05	3.4E-04	3.4E-04
Chrysene	RS295	-	-	-	5.9E-05	9.7E-04	9.7E-04
Dibenz(a,h)anthracene	RS295	-	-	-	1.1E-05	1.8E-04	1.8E-04
Fluoranthene	RS295	-	-	-	7.5E-05	1.2E-03	1.2E-03
Fluorene	RS295	-	-	-	5.7E-04	9.4E-03	9.4E-03
Indeno(1,2,3-cd)pyrene	RS295	-	-	-	2.4E-05	4.0E-04	4.0E-04
Naphthalene	RS295	-	-	-	6.9E-03	3.8E-02	3.8E-02
Perylene	RS295	-	-	-	1.2E-04	1.9E-03	1.9E-03
Phenanthrene	RS295	-	-	-	1.5E-03	2.5E-02	2.5E-02
Pyrene	RS295	-	-	-	1.4E-04	2.2E-03	2.2E-03
C08-C11 (Gasoline Range)	RS296	1.10E+01	5.5E+00	U		-	-
C11-C14 (Kerosene Range)	RS296	1.10E+01	5.5E+00	U		-	-
C14-C20 (Diesel Range)	RS296	1.10E+01	5.5E+00	U		-	-
C20-C30 (Lubricant Oil Range)	RS296	1.10E+01	5.5E+00	U		-	-
C11-C30	RS296	-	1.7E+01	-		-	-
Benzene	RS296	-	-	-	1.2E-04	6.6E-04	6.6E-04
Ethylbenzene	RS296	-	-	-	1.2E-04	6.6E-04	6.6E-04
Toluene	RS296	-	-	-	1.2E-04	6.6E-04	6.6E-04
m,p-Xylene	RS296	-	-	-	3.6E-04	2.0E-03	2.0E-03
o-Xylene	RS296	-	-	-	8.0E-05	4.4E-04	4.4E-04
Xylene (total)	RS296	-	-	-	4.4E-04	2.4E-03	2.4E-03
2-Methylnaphthalene	RS296	-	-	-	2.8E-02	1.5E-01	1.5E-01
Acenaphthene	RS296	-	-	-	5.7E-04	9.5E-03	9.5E-03
Acenaphthylene	RS296	-	-	-	7.0E-05	1.2E-03	1.2E-03
Anthracene	RS296	-	-	-	3.7E-04	6.2E-03	6.2E-03
Benzo(a)anthracene	RS296	-	-	-	2.7E-05	4.4E-04	4.4E-04
Benzo(a)pyrene	RS296	-	-	-	2.7E-05	4.5E-04	4.5E-04
Benzo(b)fluoranthene	RS296	-	-	-	4.3E-05	7.1E-04	7.1E-04
Benzo(e)pyrene	RS296	-	-	-	2.1E-04	3.4E-03	3.4E-03
Benzo(g,h,i)perylene	RS296	-	-	-	2.2E-04	3.6E-03	3.6E-03
Benzo(k)fluoranthene	RS296	-	-	-	2.1E-05	3.4E-04	3.4E-04
Chrysene	RS296	-	-	-	5.9E-05	9.7E-04	9.7E-04
Dibenz(a,h)anthracene	RS296	-	-	-	1.1E-05	1.8E-04	1.8E-04
Fluoranthene	RS296	-	-	-	7.5E-05	1.2E-03	1.2E-03
Fluorene	RS296	-	-	-	5.7E-04	9.4E-03	9.4E-03
Indeno(1,2,3-cd)pyrene	RS296	-	-	-	2.4E-05	4.0E-04	4.0E-04
Naphthalene	RS296	-	-	-	6.9E-03	3.8E-02	3.8E-02
Perylene	RS296	-	-	-	1.2E-04	1.9E-03	1.9E-03
Phenanthrene	RS296	-	-	-	1.5E-03	2.5E-02	2.5E-02

TPH to Petroleum Constituent Extrapolation for Soil (0-2 feet bgs)
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Chemical	EPA ID	Measured Concentration[a] (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Pyrene	RS296	-	-	-	1.4E-04	2.2E-03	2.2E-03
C08-C11 (Gasoline Range)	RS302	1.20E+01	6.0E+00	U		-	-
C11-C14 (Kerosene Range)	RS302	1.20E+01	6.0E+00	U		-	-
C14-C20 (Diesel Range)	RS302	1.20E+01	6.0E+00	U		-	-
C20-C30 (Lubricant Oil Range)	RS302	1.20E+01	6.0E+00	U		-	-
C11-C30	RS302	-	1.8E+01	-		-	-
Benzene	RS302	6.00E-03	3.0E-03	U	1.2E-04	7.2E-04	7.2E-04
Ethylbenzene	RS302	6.00E-03	3.0E-03	U	1.2E-04	7.2E-04	7.2E-04
Toluene	RS302	6.00E-03	3.0E-03	U	1.2E-04	7.2E-04	7.2E-04
m,p-Xylene	RS302	6.00E-03	3.0E-03	U	3.6E-04	2.2E-03	2.2E-03
o-Xylene	RS302	6.00E-03	3.0E-03	U	8.0E-05	4.8E-04	4.8E-04
Xylene (total)	RS302	-	-	-	4.4E-04	2.6E-03	2.6E-03
2-Methylnaphthalene	RS302	-	-	-	2.8E-02	1.7E-01	1.7E-01
Acenaphthene	RS302	3.60E-02	1.8E-02	U	5.7E-04	1.0E-02	1.0E-02
Acenaphthylene	RS302	3.60E-02	1.8E-02	U	7.0E-05	1.3E-03	1.3E-03
Anthracene	RS302	3.60E-02	1.8E-02	U	3.7E-04	6.7E-03	6.7E-03
Benzo(a)anthracene	RS302	3.60E-02	1.8E-02	U	2.7E-05	4.9E-04	4.9E-04
Benzo(a)pyrene	RS302	3.60E-02	1.8E-02	U	2.7E-05	4.9E-04	4.9E-04
Benzo(b)fluoranthene	RS302	3.60E-02	1.8E-02	U	4.3E-05	7.8E-04	7.8E-04
Benzo(e)pyrene	RS302	-	-	-	2.1E-04	3.7E-03	3.7E-03
Benzo(g,h,i)perylene	RS302	3.60E-02	1.8E-02	U	2.2E-04	4.0E-03	4.0E-03
Benzo(k)fluoranthene	RS302	3.60E-02	1.8E-02	U	2.1E-05	3.7E-04	3.7E-04
Chrysene	RS302	3.60E-02	1.8E-02	U	5.9E-05	1.1E-03	1.1E-03
Dibenz(a,h)anthracene	RS302	3.60E-02	1.8E-02	U	1.1E-05	2.0E-04	2.0E-04
Fluoranthene	RS302	3.60E-02	1.8E-02	U	7.5E-05	1.3E-03	1.3E-03
Fluorene	RS302	3.60E-02	1.8E-02	U	5.7E-04	1.0E-02	1.0E-02
Indeno(1,2,3-cd)pyrene	RS302	3.60E-02	1.8E-02	U	2.4E-05	4.3E-04	4.3E-04
Naphthalene	RS302	3.60E-02	1.8E-02	U	6.9E-03	4.2E-02	1.8E-02
Perylene	RS302	-	-	-	1.2E-04	2.1E-03	2.1E-03
Phenanthrene	RS302	3.60E-02	1.8E-02	U	1.5E-03	2.8E-02	1.8E-02
Pyrene	RS302	3.60E-02	1.8E-02	U	1.4E-04	2.5E-03	2.5E-03
C08-C11 (Gasoline Range)	RS581	1.40E+01	7.0E+00	UJ		-	-
C11-C14 (Kerosene Range)	RS581	1.40E+01	7.0E+00	UJ		-	-
C14-C20 (Diesel Range)	RS581	1.40E+01	7.0E+00	UJ		-	-
C20-C30 (Lubricant Oil Range)	RS581	1.40E+01	7.0E+00	UJ		-	-
C11-C30	RS581	-	2.1E+01	-		-	-
Benzene	RS581	-	-	-	1.2E-04	8.4E-04	8.4E-04
Ethylbenzene	RS581	-	-	-	1.2E-04	8.4E-04	8.4E-04
Toluene	RS581	-	-	-	1.2E-04	8.4E-04	8.4E-04
m,p-Xylene	RS581	-	-	-	3.6E-04	2.5E-03	2.5E-03
o-Xylene	RS581	-	-	-	8.0E-05	5.6E-04	5.6E-04
Xylene (total)	RS581	-	-	-	4.4E-04	3.1E-03	3.1E-03
2-Methylnaphthalene	RS581	-	-	-	2.8E-02	1.9E-01	1.9E-01
Acenaphthene	RS581	-	-	-	5.7E-04	1.2E-02	1.2E-02
Acenaphthylene	RS581	-	-	-	7.0E-05	1.5E-03	1.5E-03
Anthracene	RS581	-	-	-	3.7E-04	7.8E-03	7.8E-03
Benzo(a)anthracene	RS581	-	-	-	2.7E-05	5.7E-04	5.7E-04
Benzo(a)pyrene	RS581	-	-	-	2.7E-05	5.7E-04	5.7E-04
Benzo(b)fluoranthene	RS581	-	-	-	4.3E-05	9.1E-04	9.1E-04
Benzo(e)pyrene	RS581	-	-	-	2.1E-04	4.3E-03	4.3E-03
Benzo(g,h,i)perylene	RS581	-	-	-	2.2E-04	4.6E-03	4.6E-03
Benzo(k)fluoranthene	RS581	-	-	-	2.1E-05	4.3E-04	4.3E-04
Chrysene	RS581	-	-	-	5.9E-05	1.2E-03	1.2E-03
Dibenz(a,h)anthracene	RS581	-	-	-	1.1E-05	2.3E-04	2.3E-04
Fluoranthene	RS581	-	-	-	7.5E-05	1.6E-03	1.6E-03
Fluorene	RS581	-	-	-	5.7E-04	1.2E-02	1.2E-02

TPH to Petroleum Constituent Extrapolation for Soil (0-2 feet bgs)
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Chemical	EPA ID	Measured Concentration[a] (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Indeno(1,2,3-cd)pyrene	RS581	-	-	-	2.4E-05	5.1E-04	5.1E-04
Naphthalene	RS581	-	-	-	6.9E-03	4.9E-02	4.9E-02
Perylene	RS581	-	-	-	1.2E-04	2.5E-03	2.5E-03
Phenanthrene	RS581	-	-	-	1.5E-03	3.2E-02	3.2E-02
Pyrene	RS581	-	-	-	1.4E-04	2.9E-03	2.9E-03
C08-C11 (Gasoline Range)	RS668	1.30E+01	6.5E+00	UJ		-	-
C11-C14 (Kerosene Range)	RS668	1.30E+01	6.5E+00	UJ		-	-
C14-C20 (Diesel Range)	RS668	1.30E+01	6.5E+00	UJ		-	-
C20-C30 (Lubricant Oil Range)	RS668	1.30E+01	6.5E+00	UJ		-	-
C11-C30	RS668	-	2.0E+01	-		-	-
Benzene	RS668	-	-	-	1.2E-04	7.8E-04	7.8E-04
Ethylbenzene	RS668	-	-	-	1.2E-04	7.8E-04	7.8E-04
Toluene	RS668	-	-	-	1.2E-04	7.8E-04	7.8E-04
m,p-Xylene	RS668	-	-	-	3.6E-04	2.3E-03	2.3E-03
o-Xylene	RS668	-	-	-	8.0E-05	5.2E-04	5.2E-04
Xylene (total)	RS668	-	-	-	4.4E-04	2.9E-03	2.9E-03
2-Methylnaphthalene	RS668	-	-	-	2.8E-02	1.8E-01	1.8E-01
Acenaphthene	RS668	-	-	-	5.7E-04	1.1E-02	1.1E-02
Acenaphthylene	RS668	-	-	-	7.0E-05	1.4E-03	1.4E-03
Anthracene	RS668	-	-	-	3.7E-04	7.3E-03	7.3E-03
Benzo(a)anthracene	RS668	-	-	-	2.7E-05	5.3E-04	5.3E-04
Benzo(a)pyrene	RS668	-	-	-	2.7E-05	5.3E-04	5.3E-04
Benzo(b)fluoranthene	RS668	-	-	-	4.3E-05	8.4E-04	8.4E-04
Benzo(e)pyrene	RS668	-	-	-	2.1E-04	4.0E-03	4.0E-03
Benzo(g,h,i)perylene	RS668	-	-	-	2.2E-04	4.3E-03	4.3E-03
Benzo(k)fluoranthene	RS668	-	-	-	2.1E-05	4.0E-04	4.0E-04
Chrysene	RS668	-	-	-	5.9E-05	1.1E-03	1.1E-03
Dibenz(a,h)anthracene	RS668	-	-	-	1.1E-05	2.2E-04	2.2E-04
Fluoranthene	RS668	-	-	-	7.5E-05	1.5E-03	1.5E-03
Fluorene	RS668	-	-	-	5.7E-04	1.1E-02	1.1E-02
Indeno(1,2,3-cd)pyrene	RS668	-	-	-	2.4E-05	4.7E-04	4.7E-04
Naphthalene	RS668	-	-	-	6.9E-03	4.5E-02	4.5E-02
Perylene	RS668	-	-	-	1.2E-04	2.3E-03	2.3E-03
Phenanthrene	RS668	-	-	-	1.5E-03	3.0E-02	3.0E-02
Pyrene	RS668	-	-	-	1.4E-04	2.7E-03	2.7E-03
C08-C11 (Gasoline Range)	RS670	1.10E+01	5.5E+00	UJ		-	-
C11-C14 (Kerosene Range)	RS670	1.10E+01	5.5E+00	UJ		-	-
C14-C20 (Diesel Range)	RS670	1.10E+01	5.5E+00	UJ		-	-
C20-C30 (Lubricant Oil Range)	RS670	1.10E+01	5.5E+00	UJ		-	-
C11-C30	RS670	-	1.7E+01	-		-	-
Benzene	RS670	-	-	-	1.2E-04	6.6E-04	6.6E-04
Ethylbenzene	RS670	-	-	-	1.2E-04	6.6E-04	6.6E-04
Toluene	RS670	-	-	-	1.2E-04	6.6E-04	6.6E-04
m,p-Xylene	RS670	-	-	-	3.6E-04	2.0E-03	2.0E-03
o-Xylene	RS670	-	-	-	8.0E-05	4.4E-04	4.4E-04
Xylene (total)	RS670	-	-	-	4.4E-04	2.4E-03	2.4E-03
2-Methylnaphthalene	RS670	-	-	-	2.8E-02	1.5E-01	1.5E-01
Acenaphthene	RS670	-	-	-	5.7E-04	9.5E-03	9.5E-03
Acenaphthylene	RS670	-	-	-	7.0E-05	1.2E-03	1.2E-03
Anthracene	RS670	-	-	-	3.7E-04	6.2E-03	6.2E-03
Benzo(a)anthracene	RS670	-	-	-	2.7E-05	4.4E-04	4.4E-04
Benzo(a)pyrene	RS670	-	-	-	2.7E-05	4.5E-04	4.5E-04
Benzo(b)fluoranthene	RS670	-	-	-	4.3E-05	7.1E-04	7.1E-04
Benzo(e)pyrene	RS670	-	-	-	2.1E-04	3.4E-03	3.4E-03
Benzo(g,h,i)perylene	RS670	-	-	-	2.2E-04	3.6E-03	3.6E-03
Benzo(k)fluoranthene	RS670	-	-	-	2.1E-05	3.4E-04	3.4E-04

TPH to Petroleum Constituent Extrapolation for Soil (0-2 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration[a] (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Chrysene	RS670	-	-	-	5.9E-05	9.7E-04	9.7E-04
Dibenz(a,h)anthracene	RS670	-	-	-	1.1E-05	1.8E-04	1.8E-04
Fluoranthene	RS670	-	-	-	7.5E-05	1.2E-03	1.2E-03
Fluorene	RS670	-	-	-	5.7E-04	9.4E-03	9.4E-03
Indeno(1,2,3-cd)pyrene	RS670	-	-	-	2.4E-05	4.0E-04	4.0E-04
Naphthalene	RS670	-	-	-	6.9E-03	3.8E-02	3.8E-02
Perylene	RS670	-	-	-	1.2E-04	1.9E-03	1.9E-03
Phenanthrene	RS670	-	-	-	1.5E-03	2.5E-02	2.5E-02
Pyrene	RS670	-	-	-	1.4E-04	2.2E-03	2.2E-03
C08-C11 (Gasoline Range)	RS671DL	1.09E+02	5.5E+01	UJ		-	-
C11-C14 (Kerosene Range)	RS671DL	1.09E+02	5.5E+01	UJ		-	-
C14-C20 (Diesel Range)	RS671DL	1.10E+03	1.1E+03	J		-	-
C20-C30 (Lubricant Oil Range)	RS671DL	8.30E+03	8.3E+03	J		-	-
C11-C30	RS671DL	-	9.5E+03	-		-	-
Benzene	RS671DL	-	-	-	1.2E-04	6.5E-03	6.5E-03
Ethylbenzene	RS671DL	-	-	-	1.2E-04	6.5E-03	6.5E-03
Toluene	RS671DL	-	-	-	1.2E-04	6.5E-03	6.5E-03
m,p-Xylene	RS671DL	-	-	-	3.6E-04	2.0E-02	2.0E-02
o-Xylene	RS671DL	-	-	-	8.0E-05	4.4E-03	4.4E-03
Xylene (total)	RS671DL	-	-	-	4.4E-04	2.4E-02	2.4E-02
2-Methylnaphthalene	RS671DL	-	-	-	2.8E-02	1.5E+00	1.5E+00
Acenaphthene	RS671DL	-	-	-	5.7E-04	5.4E+00	5.4E+00
Acenaphthylene	RS671DL	-	-	-	7.0E-05	6.6E-01	6.6E-01
Anthracene	RS671DL	-	-	-	3.7E-04	3.5E+00	3.5E+00
Benzo(a)anthracene	RS671DL	-	-	-	2.7E-05	2.5E-01	2.5E-01
Benzo(a)pyrene	RS671DL	-	-	-	2.7E-05	2.6E-01	2.6E-01
Benzo(b)fluoranthene	RS671DL	-	-	-	4.3E-05	4.1E-01	4.1E-01
Benzo(e)pyrene	RS671DL	-	-	-	2.1E-04	2.0E+00	2.0E+00
Benzo(g,h,i)perylene	RS671DL	-	-	-	2.2E-04	2.1E+00	2.1E+00
Benzo(k)fluoranthene	RS671DL	-	-	-	2.1E-05	1.9E-01	1.9E-01
Chrysene	RS671DL	-	-	-	5.9E-05	5.5E-01	5.5E-01
Dibenz(a,h)anthracene	RS671DL	-	-	-	1.1E-05	1.0E-01	1.0E-01
Fluoranthene	RS671DL	-	-	-	7.5E-05	7.1E-01	7.1E-01
Fluorene	RS671DL	-	-	-	5.7E-04	5.4E+00	5.4E+00
Indeno(1,2,3-cd)pyrene	RS671DL	-	-	-	2.4E-05	2.3E-01	2.3E-01
Naphthalene	RS671DL	-	-	-	6.9E-03	3.8E-01	3.8E-01
Perylene	RS671DL	-	-	-	1.2E-04	1.1E+00	1.1E+00
Phenanthrene	RS671DL	-	-	-	1.5E-03	1.4E+01	1.4E+01
Pyrene	RS671DL	-	-	-	1.4E-04	1.3E+00	1.3E+00
C08-C11 (Gasoline Range)	RS878	1.00E+01	5.0E+00	UJ		-	-
C11-C14 (Kerosene Range)	RS878	1.00E+01	5.0E+00	UJ		-	-
C14-C20 (Diesel Range)	RS878	1.00E+01	5.0E+00	UJ		-	-
C20-C30 (Lubricant Oil Range)	RS878	1.00E+01	5.0E+00	UJ		-	-
C11-C30	RS878	-	1.5E+01	-		-	-
Benzene	RS878	-	-	-	1.2E-04	6.0E-04	6.0E-04
Ethylbenzene	RS878	-	-	-	1.2E-04	6.0E-04	6.0E-04
Toluene	RS878	-	-	-	1.2E-04	6.0E-04	6.0E-04
m,p-Xylene	RS878	-	-	-	3.6E-04	1.8E-03	1.8E-03
o-Xylene	RS878	-	-	-	8.0E-05	4.0E-04	4.0E-04
Xylene (total)	RS878	-	-	-	4.4E-04	2.2E-03	2.2E-03
2-Methylnaphthalene	RS878	-	-	-	2.8E-02	1.4E-01	1.4E-01
Acenaphthene	RS878	3.10E-02	1.6E-02	U	5.7E-04	8.6E-03	8.6E-03
Acenaphthylene	RS878	3.10E-02	1.6E-02	U	7.0E-05	1.1E-03	1.1E-03
Anthracene	RS878	3.10E-02	1.6E-02	U	3.7E-04	5.6E-03	5.6E-03
Benzo(a)anthracene	RS878	3.10E-02	1.6E-02	U	2.7E-05	4.0E-04	4.0E-04
Benzo(a)pyrene	RS878	3.10E-02	1.6E-02	U	2.7E-05	4.1E-04	4.1E-04

TPH to Petroleum Constituent Extrapolation for Soil (0-2 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration[a] (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Benzo(b)fluoranthene	RS878	3.10E-02	1.6E-02	U	4.3E-05	6.5E-04	6.5E-04
Benzo(e)pyrene	RS878	-	-	-	2.1E-04	3.1E-03	3.1E-03
Benzo(g,h,i)perylene	RS878	3.10E-02	1.6E-02	U	2.2E-04	3.3E-03	3.3E-03
Benzo(k)fluoranthene	RS878	3.10E-02	1.6E-02	U	2.1E-05	3.1E-04	3.1E-04
Chrysene	RS878	3.10E-02	1.6E-02	U	5.9E-05	8.8E-04	8.8E-04
Dibenz(a,h)anthracene	RS878	3.10E-02	1.6E-02	U	1.1E-05	1.7E-04	1.7E-04
Fluoranthene	RS878	3.10E-02	1.6E-02	U	7.5E-05	1.1E-03	1.1E-03
Fluorene	RS878	3.10E-02	1.6E-02	U	5.7E-04	8.5E-03	8.5E-03
Indeno(1,2,3-cd)pyrene	RS878	3.10E-02	1.6E-02	U	2.4E-05	3.6E-04	3.6E-04
Naphthalene	RS878	3.10E-02	1.6E-02	U	6.9E-03	3.5E-02	1.6E-02
Perylene	RS878	-	-	-	1.2E-04	1.8E-03	1.8E-03
Phenanthrene	RS878	3.10E-02	1.6E-02	U	1.5E-03	2.3E-02	1.6E-02
Pyrene	RS878	3.10E-02	1.6E-02	U	1.4E-04	2.0E-03	2.0E-03
C08-C11 (Gasoline Range)	RS879	1.00E+01	5.0E+00	UJ		-	-
C11-C14 (Kerosene Range)	RS879	1.00E+01	5.0E+00	UJ		-	-
C14-C20 (Diesel Range)	RS879	1.00E+01	5.0E+00	UJ		-	-
C20-C30 (Lubricant Oil Range)	RS879	1.00E+01	5.0E+00	UJ		-	-
C11-C30	RS879	-	1.5E+01	-		-	-
Benzene	RS879	1.00E-02	5.0E-03	U	1.2E-04	6.0E-04	6.0E-04
Ethylbenzene	RS879	1.00E-02	5.0E-03	U	1.2E-04	6.0E-04	6.0E-04
Toluene	RS879	1.00E-02	5.0E-03	U	1.2E-04	6.0E-04	6.0E-04
m,p-Xylene	RS879	1.00E-02	5.0E-03	U	3.6E-04	1.8E-03	1.8E-03
o-Xylene	RS879	1.00E-02	5.0E-03	U	8.0E-05	4.0E-04	4.0E-04
Xylene (total)	RS879	-	-	-	4.4E-04	2.2E-03	2.2E-03
2-Methylnaphthalene	RS879	-	-	-	2.8E-02	1.4E-01	1.4E-01
Acenaphthene	RS879	3.10E-02	1.6E-02	U	5.7E-04	8.6E-03	8.6E-03
Acenaphthylene	RS879	3.10E-02	1.6E-02	U	7.0E-05	1.1E-03	1.1E-03
Anthracene	RS879	3.10E-02	1.6E-02	U	3.7E-04	5.6E-03	5.6E-03
Benzo(a)anthracene	RS879	3.10E-02	1.6E-02	U	2.7E-05	4.0E-04	4.0E-04
Benzo(a)pyrene	RS879	3.10E-02	1.6E-02	U	2.7E-05	4.1E-04	4.1E-04
Benzo(b)fluoranthene	RS879	3.10E-02	1.6E-02	U	4.3E-05	6.5E-04	6.5E-04
Benzo(e)pyrene	RS879	-	-	-	2.1E-04	3.1E-03	3.1E-03
Benzo(g,h,i)perylene	RS879	3.10E-02	1.6E-02	U	2.2E-04	3.3E-03	3.3E-03
Benzo(k)fluoranthene	RS879	3.10E-02	1.6E-02	U	2.1E-05	3.1E-04	3.1E-04
Chrysene	RS879	3.10E-02	1.6E-02	U	5.9E-05	8.8E-04	8.8E-04
Dibenz(a,h)anthracene	RS879	3.10E-02	1.6E-02	U	1.1E-05	1.7E-04	1.7E-04
Fluoranthene	RS879	3.10E-02	1.6E-02	U	7.5E-05	1.1E-03	1.1E-03
Fluorene	RS879	3.10E-02	1.6E-02	U	5.7E-04	8.5E-03	8.5E-03
Indeno(1,2,3-cd)pyrene	RS879	3.10E-02	1.6E-02	U	2.4E-05	3.6E-04	3.6E-04
Naphthalene	RS879	3.10E-02	1.6E-02	U	6.9E-03	3.5E-02	1.6E-02
Perylene	RS879	-	-	-	1.2E-04	1.8E-03	1.8E-03
Phenanthrene	RS879	3.10E-02	1.6E-02	U	1.5E-03	2.3E-02	1.6E-02
Pyrene	RS879	3.10E-02	1.6E-02	U	1.4E-04	2.0E-03	2.0E-03
C08-C11 (Gasoline Range)	RS880	1.10E+01	5.5E+00	UJ		-	-
C11-C14 (Kerosene Range)	RS880	1.10E+01	5.5E+00	UJ		-	-
C14-C20 (Diesel Range)	RS880	1.10E+01	5.5E+00	UJ		-	-
C20-C30 (Lubricant Oil Range)	RS880	1.10E+01	5.5E+00	UJ		-	-
C11-C30	RS880	-	1.7E+01	-		-	-
Benzene	RS880	6.00E-03	3.0E-03	U	1.2E-04	6.6E-04	6.6E-04
Ethylbenzene	RS880	6.00E-03	3.0E-03	U	1.2E-04	6.6E-04	6.6E-04
Toluene	RS880	6.00E-03	3.0E-03	U	1.2E-04	6.6E-04	6.6E-04
m,p-Xylene	RS880	6.00E-03	3.0E-03	U	3.6E-04	2.0E-03	2.0E-03
o-Xylene	RS880	6.00E-03	3.0E-03	U	8.0E-05	4.4E-04	4.4E-04
Xylene (total)	RS880	-	-	-	4.4E-04	2.4E-03	2.4E-03
2-Methylnaphthalene	RS880	-	-	-	2.8E-02	1.5E-01	1.5E-01
Acenaphthene	RS880	3.40E-02	1.7E-02	U	5.7E-04	9.5E-03	9.5E-03

TPH to Petroleum Constituent Extrapolation for Soil (0-2 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration[a] (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Acenaphthylene	RS880	3.40E-02	1.7E-02	U	7.0E-05	1.2E-03	1.2E-03
Anthracene	RS880	3.40E-02	1.7E-02	U	3.7E-04	6.2E-03	6.2E-03
Benzo(a)anthracene	RS880	3.40E-02	1.7E-02	U	2.7E-05	4.4E-04	4.4E-04
Benzo(a)pyrene	RS880	3.40E-02	1.7E-02	U	2.7E-05	4.5E-04	4.5E-04
Benzo(b)fluoranthene	RS880	3.40E-02	1.7E-02	U	4.3E-05	7.1E-04	7.1E-04
Benzo(e)pyrene	RS880	-	-	-	2.1E-04	3.4E-03	3.4E-03
Benzo(g,h,i)perylene	RS880	3.40E-02	1.7E-02	U	2.2E-04	3.6E-03	3.6E-03
Benzo(k)fluoranthene	RS880	3.40E-02	1.7E-02	U	2.1E-05	3.4E-04	3.4E-04
Chrysene	RS880	3.40E-02	1.7E-02	U	5.9E-05	9.7E-04	9.7E-04
Dibenz(a,h)anthracene	RS880	3.40E-02	1.7E-02	U	1.1E-05	1.8E-04	1.8E-04
Fluoranthene	RS880	3.40E-02	1.7E-02	U	7.5E-05	1.2E-03	1.2E-03
Fluorene	RS880	3.40E-02	1.7E-02	U	5.7E-04	9.4E-03	9.4E-03
Indeno(1,2,3-cd)pyrene	RS880	3.40E-02	1.7E-02	U	2.4E-05	4.0E-04	4.0E-04
Naphthalene	RS880	3.40E-02	1.7E-02	U	6.9E-03	3.8E-02	1.7E-02
Perylene	RS880	-	-	-	1.2E-04	1.9E-03	1.9E-03
Phenanthrene	RS880	3.40E-02	1.7E-02	U	1.5E-03	2.5E-02	1.7E-02
Pyrene	RS880	3.40E-02	1.7E-02	U	1.4E-04	2.2E-03	2.2E-03
C08-C11 (Gasoline Range)	RS881	5.30E+01	2.7E+01	UJ		-	-
C11-C14 (Kerosene Range)	RS881	5.30E+01	2.7E+01	UJ		-	-
C14-C20 (Diesel Range)	RS881	5.30E+01	2.7E+01	UJ		-	-
C20-C30 (Lubricant Oil Range)	RS881	9.50E+01	9.5E+01			-	-
C11-C30	RS881	-	1.5E+02	-		-	-
Benzene	RS881	-	-	-	1.2E-04	3.2E-03	3.2E-03
Ethylbenzene	RS881	-	-	-	1.2E-04	3.2E-03	3.2E-03
Toluene	RS881	-	-	-	1.2E-04	3.2E-03	3.2E-03
m,p-Xylene	RS881	-	-	-	3.6E-04	9.5E-03	9.5E-03
o-Xylene	RS881	-	-	-	8.0E-05	2.1E-03	2.1E-03
Xylene (total)	RS881	-	-	-	4.4E-04	1.2E-02	1.2E-02
2-Methylnaphthalene	RS881	-	-	-	2.8E-02	7.3E-01	7.3E-01
Acenaphthene	RS881	-	-	-	5.7E-04	8.5E-02	8.5E-02
Acenaphthylene	RS881	-	-	-	7.0E-05	1.0E-02	1.0E-02
Anthracene	RS881	-	-	-	3.7E-04	5.5E-02	5.5E-02
Benzo(a)anthracene	RS881	-	-	-	2.7E-05	4.0E-03	4.0E-03
Benzo(a)pyrene	RS881	-	-	-	2.7E-05	4.0E-03	4.0E-03
Benzo(b)fluoranthene	RS881	-	-	-	4.3E-05	6.4E-03	6.4E-03
Benzo(e)pyrene	RS881	-	-	-	2.1E-04	3.1E-02	3.1E-02
Benzo(g,h,i)perylene	RS881	-	-	-	2.2E-04	3.3E-02	3.3E-02
Benzo(k)fluoranthene	RS881	-	-	-	2.1E-05	3.0E-03	3.0E-03
Chrysene	RS881	-	-	-	5.9E-05	8.7E-03	8.7E-03
Dibenz(a,h)anthracene	RS881	-	-	-	1.1E-05	1.6E-03	1.6E-03
Fluoranthene	RS881	-	-	-	7.5E-05	1.1E-02	1.1E-02
Fluorene	RS881	-	-	-	5.7E-04	8.4E-02	8.4E-02
Indeno(1,2,3-cd)pyrene	RS881	-	-	-	2.4E-05	3.6E-03	3.6E-03
Naphthalene	RS881	-	-	-	6.9E-03	1.8E-01	1.8E-01
Perylene	RS881	-	-	-	1.2E-04	1.7E-02	1.7E-02
Phenanthrene	RS881	-	-	-	1.5E-03	2.3E-01	2.3E-01
Pyrene	RS881	-	-	-	1.4E-04	2.0E-02	2.0E-02
C08-C11 (Gasoline Range)	MJ683	1.10E+01	5.5E+00	U		-	-
C11-C14 (Kerosene Range)	MJ683	1.10E+01	5.5E+00	U		-	-
C14-C20 (Diesel Range)	MJ683	8.80E+00	8.8E+00	J		-	-
C20-C30 (Lubricant Oil Range)	MJ683	5.20E+01	5.2E+01			-	-
C11-C30	MJ683	-	6.6E+01	-		-	-
Benzene	MJ683	-	-	-	1.2E-04	6.6E-04	6.6E-04
Ethylbenzene	MJ683	-	-	-	1.2E-04	6.6E-04	6.6E-04
Toluene	MJ683	-	-	-	1.2E-04	6.6E-04	6.6E-04
m,p-Xylene	MJ683	-	-	-	3.6E-04	2.0E-03	2.0E-03

TPH to Petroleum Constituent Extrapolation for Soil (0-2 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration[a] (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
o-Xylene	MJ683	-	-	-	8.0E-05	4.4E-04	4.4E-04
Xylene (total)	MJ683	-	-	-	4.4E-04	2.4E-03	2.4E-03
2-Methylnaphthalene	MJ683	4.00E-02	4.0E-02		2.8E-02	1.5E-01	4.0E-02
Acenaphthene	MJ683	2.40E-02	1.2E-02	U	5.7E-04	3.8E-02	1.2E-02
Acenaphthylene	MJ683	2.40E-02	1.2E-02	U	7.0E-05	4.6E-03	4.6E-03
Anthracene	MJ683	3.80E-02	3.8E-02		3.7E-04	2.5E-02	3.8E-02
Benzo(a)anthracene	MJ683	2.70E-01	2.7E-01		2.7E-05	1.8E-03	2.7E-01
Benzo(a)pyrene	MJ683	2.60E-01	2.6E-01		2.7E-05	1.8E-03	2.6E-01
Benzo(b)fluoranthene	MJ683	4.20E-01	4.2E-01		4.3E-05	2.9E-03	4.2E-01
Benzo(e)pyrene	MJ683	-	-	-	2.1E-04	1.4E-02	1.4E-02
Benzo(g,h,i)perylene	MJ683	7.30E-02	7.3E-02		2.2E-04	1.5E-02	7.3E-02
Benzo(k)fluoranthene	MJ683	3.00E-01	3.0E-01		2.1E-05	1.4E-03	3.0E-01
Chrysene	MJ683	4.40E-01	4.4E-01		5.9E-05	3.9E-03	4.4E-01
Dibenz(a,h)anthracene	MJ683	2.50E-02	2.5E-02		1.1E-05	7.3E-04	2.5E-02
Fluoranthene	MJ683	5.80E-01	5.8E-01		7.5E-05	5.0E-03	5.8E-01
Fluorene	MJ683	2.40E-02	1.2E-02	U	5.7E-04	3.8E-02	1.2E-02
Indeno(1,2,3-cd)pyrene	MJ683	1.00E-01	1.0E-01		2.4E-05	1.6E-03	1.0E-01
Naphthalene	MJ683	3.10E-02	3.1E-02		6.9E-03	3.8E-02	3.1E-02
Perylene	MJ683	-	-	-	1.2E-04	7.8E-03	7.8E-03
Phenanthrene	MJ683	2.50E-01	2.5E-01		1.5E-03	1.0E-01	2.5E-01
Pyrene	MJ683	6.00E-01	6.0E-01		1.4E-04	9.0E-03	6.0E-01
C08-C11 (Gasoline Range)	MJ704	5.20E+00	2.6E+00	U		-	-
C11-C14 (Kerosene Range)	MJ704	5.20E+00	2.6E+00	U		-	-
C14-C20 (Diesel Range)	MJ704	5.20E+00	2.6E+00	U		-	-
C20-C30 (Lubricant Oil Range)	MJ704	5.20E+00	2.6E+00	U		-	-
C11-C30	MJ704	-	7.8E+00	-		-	-
Benzene	MJ704	-	-	-	1.2E-04	3.1E-04	3.1E-04
Ethylbenzene	MJ704	-	-	-	1.2E-04	3.1E-04	3.1E-04
Toluene	MJ704	-	-	-	1.2E-04	3.1E-04	3.1E-04
m,p-Xylene	MJ704	-	-	-	3.6E-04	9.4E-04	9.4E-04
o-Xylene	MJ704	-	-	-	8.0E-05	2.1E-04	2.1E-04
Xylene (total)	MJ704	-	-	-	4.4E-04	1.1E-03	1.1E-03
2-Methylnaphthalene	MJ704	2.10E-02	1.1E-02	U	2.8E-02	7.2E-02	1.1E-02
Acenaphthene	MJ704	2.10E-02	1.1E-02	U	5.7E-04	4.5E-03	4.5E-03
Acenaphthylene	MJ704	2.10E-02	1.1E-02	U	7.0E-05	5.5E-04	5.5E-04
Anthracene	MJ704	3.90E-02	3.9E-02		3.7E-04	2.9E-03	3.9E-02
Benzo(a)anthracene	MJ704	3.30E-01	3.3E-01		2.7E-05	2.1E-04	3.3E-01
Benzo(a)pyrene	MJ704	1.90E-01	1.9E-01		2.7E-05	2.1E-04	1.9E-01
Benzo(b)fluoranthene	MJ704	2.50E-01	2.5E-01		4.3E-05	3.4E-04	2.5E-01
Benzo(e)pyrene	MJ704	-	-	-	2.1E-04	1.6E-03	1.6E-03
Benzo(g,h,i)perylene	MJ704	8.70E-02	8.7E-02		2.2E-04	1.7E-03	8.7E-02
Benzo(k)fluoranthene	MJ704	2.10E-01	2.1E-01		2.1E-05	1.6E-04	2.1E-01
Chrysene	MJ704	4.00E-01	4.0E-01		5.9E-05	4.6E-04	4.0E-01
Dibenz(a,h)anthracene	MJ704	3.30E-02	3.3E-02		1.1E-05	8.6E-05	3.3E-02
Fluoranthene	MJ704	5.90E-01	5.9E-01		7.5E-05	5.8E-04	5.9E-01
Fluorene	MJ704	2.10E-02	1.1E-02	U	5.7E-04	4.4E-03	4.4E-03
Indeno(1,2,3-cd)pyrene	MJ704	1.10E-01	1.1E-01		2.4E-05	1.9E-04	1.1E-01
Naphthalene	MJ704	2.10E-02	1.1E-02	U	6.9E-03	1.8E-02	1.1E-02
Perylene	MJ704	-	-	-	1.2E-04	9.2E-04	9.2E-04
Phenanthrene	MJ704	3.30E-01	3.3E-01		1.5E-03	1.2E-02	3.3E-01
Pyrene	MJ704	4.80E-01	4.8E-01		1.4E-04	1.1E-03	4.8E-01
C08-C11 (Gasoline Range)	MJ705	5.40E+00	2.7E+00	U		-	-
C11-C14 (Kerosene Range)	MJ705	5.40E+00	2.7E+00	U		-	-
C14-C20 (Diesel Range)	MJ705	5.40E+00	2.7E+00	U		-	-
C20-C30 (Lubricant Oil Range)	MJ705	5.40E+00	2.7E+00	U		-	-
C11-C30	MJ705	-	8.1E+00	-		-	-

TPH to Petroleum Constituent Extrapolation for Soil (0-2 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration[a] (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Benzene	MJ705	-	-	-	1.2E-04	3.2E-04	3.2E-04
Ethylbenzene	MJ705	-	-	-	1.2E-04	3.2E-04	3.2E-04
Toluene	MJ705	-	-	-	1.2E-04	3.2E-04	3.2E-04
m,p-Xylene	MJ705	-	-	-	3.6E-04	9.7E-04	9.7E-04
o-Xylene	MJ705	-	-	-	8.0E-05	2.2E-04	2.2E-04
Xylene (total)	MJ705	-	-	-	4.4E-04	1.2E-03	1.2E-03
2-Methylnaphthalene	MJ705	2.20E-02	1.1E-02	U	2.8E-02	7.4E-02	1.1E-02
Acenaphthene	MJ705	2.20E-02	1.1E-02	U	5.7E-04	4.6E-03	4.6E-03
Acenaphthylene	MJ705	2.20E-02	1.1E-02	U	7.0E-05	5.7E-04	5.7E-04
Anthracene	MJ705	2.20E-02	1.1E-02	U	3.7E-04	3.0E-03	3.0E-03
Benzo(a)anthracene	MJ705	2.20E-02	1.1E-02	U	2.7E-05	2.2E-04	2.2E-04
Benzo(a)pyrene	MJ705	2.20E-02	1.1E-02	U	2.7E-05	2.2E-04	2.2E-04
Benzo(b)fluoranthene	MJ705	2.20E-02	1.1E-02	U	4.3E-05	3.5E-04	3.5E-04
Benzo(e)pyrene	MJ705	-	-	-	2.1E-04	1.7E-03	1.7E-03
Benzo(g,h,i)perylene	MJ705	2.20E-02	1.1E-02	U	2.2E-04	1.8E-03	1.8E-03
Benzo(k)fluoranthene	MJ705	2.20E-02	1.1E-02	U	2.1E-05	1.7E-04	1.7E-04
Chrysene	MJ705	2.20E-02	1.1E-02	U	5.9E-05	4.8E-04	4.8E-04
Dibenz(a,h)anthracene	MJ705	2.20E-02	1.1E-02	U	1.1E-05	9.0E-05	9.0E-05
Fluoranthene	MJ705	2.20E-02	1.1E-02	U	7.5E-05	6.1E-04	6.1E-04
Fluorene	MJ705	2.20E-02	1.1E-02	U	5.7E-04	4.6E-03	4.6E-03
Indeno(1,2,3-cd)pyrene	MJ705	2.20E-02	1.1E-02	U	2.4E-05	1.9E-04	1.9E-04
Naphthalene	MJ705	2.20E-02	1.1E-02	U	6.9E-03	1.9E-02	1.1E-02
Perylene	MJ705	-	-	-	1.2E-04	9.6E-04	9.6E-04
Phenanthrene	MJ705	2.20E-02	1.1E-02	U	1.5E-03	1.2E-02	1.1E-02
Pyrene	MJ705	2.20E-02	1.1E-02	U	1.4E-04	1.1E-03	1.1E-03
C08-C11 (Gasoline Range)	MJ707	1.00E+01	5.0E+00	U		-	-
C11-C14 (Kerosene Range)	MJ707	1.00E+01	5.0E+00	U		-	-
C14-C20 (Diesel Range)	MJ707	1.00E+01	5.0E+00	U		-	-
C20-C30 (Lubricant Oil Range)	MJ707	1.00E+01	5.0E+00	U		-	-
C11-C30	MJ707	-	1.5E+01	-		-	-
Benzene	MJ707	-	-	-	1.2E-04	6.0E-04	6.0E-04
Ethylbenzene	MJ707	-	-	-	1.2E-04	6.0E-04	6.0E-04
Toluene	MJ707	-	-	-	1.2E-04	6.0E-04	6.0E-04
m,p-Xylene	MJ707	-	-	-	3.6E-04	1.8E-03	1.8E-03
o-Xylene	MJ707	-	-	-	8.0E-05	4.0E-04	4.0E-04
Xylene (total)	MJ707	-	-	-	4.4E-04	2.2E-03	2.2E-03
2-Methylnaphthalene	MJ707	2.00E-02	1.0E-02	U	2.8E-02	1.4E-01	1.0E-02
Acenaphthene	MJ707	2.00E-02	1.0E-02	U	5.7E-04	8.6E-03	8.6E-03
Acenaphthylene	MJ707	2.00E-02	1.0E-02	U	7.0E-05	1.1E-03	1.1E-03
Anthracene	MJ707	2.00E-02	1.0E-02	U	3.7E-04	5.6E-03	5.6E-03
Benzo(a)anthracene	MJ707	2.00E-02	1.0E-02	U	2.7E-05	4.0E-04	4.0E-04
Benzo(a)pyrene	MJ707	2.00E-02	1.0E-02	U	2.7E-05	4.1E-04	4.1E-04
Benzo(b)fluoranthene	MJ707	2.00E-02	1.0E-02	U	4.3E-05	6.5E-04	6.5E-04
Benzo(e)pyrene	MJ707	-	-	-	2.1E-04	3.1E-03	3.1E-03
Benzo(g,h,i)perylene	MJ707	2.00E-02	1.0E-02	U	2.2E-04	3.3E-03	3.3E-03
Benzo(k)fluoranthene	MJ707	2.00E-02	1.0E-02	U	2.1E-05	3.1E-04	3.1E-04
Chrysene	MJ707	2.00E-02	1.0E-02	U	5.9E-05	8.8E-04	8.8E-04
Dibenz(a,h)anthracene	MJ707	2.00E-02	1.0E-02	U	1.1E-05	1.7E-04	1.7E-04
Fluoranthene	MJ707	2.00E-02	1.0E-02	U	7.5E-05	1.1E-03	1.1E-03
Fluorene	MJ707	2.00E-02	1.0E-02	U	5.7E-04	8.5E-03	8.5E-03
Indeno(1,2,3-cd)pyrene	MJ707	2.00E-02	1.0E-02	U	2.4E-05	3.6E-04	3.6E-04
Naphthalene	MJ707	2.00E-02	1.0E-02	U	6.9E-03	3.5E-02	1.0E-02
Perylene	MJ707	-	-	-	1.2E-04	1.8E-03	1.8E-03
Phenanthrene	MJ707	2.00E-02	1.0E-02	U	1.5E-03	2.3E-02	1.0E-02
Pyrene	MJ707	2.00E-02	1.0E-02	U	1.4E-04	2.0E-03	2.0E-03
C08-C11 (Gasoline Range)	MJ708	1.10E+01	5.5E+00	U		-	-

TPH to Petroleum Constituent Extrapolation for Soil (0-2 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration[a] (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
C11-C14 (Kerosene Range)	MJ708	1.10E+01	5.5E+00	U		-	-
C14-C20 (Diesel Range)	MJ708	1.10E+01	5.5E+00	U		-	-
C20-C30 (Lubricant Oil Range)	MJ708	4.50E+00	4.5E+00	J		-	-
C11-C30	MJ708	-	1.6E+01	-		-	-
Benzene	MJ708	-	-	-	1.2E-04	6.6E-04	6.6E-04
Ethylbenzene	MJ708	-	-	-	1.2E-04	6.6E-04	6.6E-04
Toluene	MJ708	-	-	-	1.2E-04	6.6E-04	6.6E-04
m,p-Xylene	MJ708	-	-	-	3.6E-04	2.0E-03	2.0E-03
o-Xylene	MJ708	-	-	-	8.0E-05	4.4E-04	4.4E-04
Xylene (total)	MJ708	-	-	-	4.4E-04	2.4E-03	2.4E-03
2-Methylnaphthalene	MJ708	2.10E-02	1.1E-02	U	2.8E-02	1.5E-01	1.1E-02
Acenaphthene	MJ708	2.10E-02	1.1E-02	U	5.7E-04	8.9E-03	8.9E-03
Acenaphthylene	MJ708	2.10E-02	1.1E-02	U	7.0E-05	1.1E-03	1.1E-03
Anthracene	MJ708	2.10E-02	1.1E-02	U	3.7E-04	5.8E-03	5.8E-03
Benzo(a)anthracene	MJ708	2.10E-02	1.1E-02	U	2.7E-05	4.2E-04	4.2E-04
Benzo(a)pyrene	MJ708	2.10E-02	1.1E-02	U	2.7E-05	4.2E-04	4.2E-04
Benzo(b)fluoranthene	MJ708	2.10E-02	1.1E-02	U	4.3E-05	6.7E-04	6.7E-04
Benzo(e)pyrene	MJ708	-	-	-	2.1E-04	3.2E-03	3.2E-03
Benzo(g,h,i)perylene	MJ708	2.10E-02	1.1E-02	U	2.2E-04	3.4E-03	3.4E-03
Benzo(k)fluoranthene	MJ708	2.10E-02	1.1E-02	U	2.1E-05	3.2E-04	3.2E-04
Chrysene	MJ708	2.10E-02	1.1E-02	U	5.9E-05	9.1E-04	9.1E-04
Dibenz(a,h)anthracene	MJ708	2.10E-02	1.1E-02	U	1.1E-05	1.7E-04	1.7E-04
Fluoranthene	MJ708	2.10E-02	1.1E-02	U	7.5E-05	1.2E-03	1.2E-03
Fluorene	MJ708	2.10E-02	1.1E-02	U	5.7E-04	8.8E-03	8.8E-03
Indeno(1,2,3-cd)pyrene	MJ708	2.10E-02	1.1E-02	U	2.4E-05	3.7E-04	3.7E-04
Naphthalene	MJ708	2.10E-02	1.1E-02	U	6.9E-03	3.8E-02	1.1E-02
Perylene	MJ708	-	-	-	1.2E-04	1.8E-03	1.8E-03
Phenanthrene	MJ708	2.10E-02	1.1E-02	U	1.5E-03	2.4E-02	1.1E-02
Pyrene	MJ708	2.10E-02	1.1E-02	U	1.4E-04	2.1E-03	2.1E-03
C08-C11 (Gasoline Range)	MJ710	5.30E+00	2.7E+00	U		-	-
C11-C14 (Kerosene Range)	MJ710	5.30E+00	2.7E+00	U		-	-
C14-C20 (Diesel Range)	MJ710	5.30E+00	2.7E+00	U		-	-
C20-C30 (Lubricant Oil Range)	MJ710	2.20E+00	2.2E+00	J		-	-
C11-C30	MJ710	-	7.5E+00	-		-	-
Benzene	MJ710	-	-	-	1.2E-04	3.2E-04	3.2E-04
Ethylbenzene	MJ710	-	-	-	1.2E-04	3.2E-04	3.2E-04
Toluene	MJ710	-	-	-	1.2E-04	3.2E-04	3.2E-04
m,p-Xylene	MJ710	-	-	-	3.6E-04	9.5E-04	9.5E-04
o-Xylene	MJ710	-	-	-	8.0E-05	2.1E-04	2.1E-04
Xylene (total)	MJ710	-	-	-	4.4E-04	1.2E-03	1.2E-03
2-Methylnaphthalene	MJ710	2.10E-02	1.1E-02	U	2.8E-02	7.3E-02	1.1E-02
Acenaphthene	MJ710	2.10E-02	1.1E-02	U	5.7E-04	4.3E-03	4.3E-03
Acenaphthylene	MJ710	2.10E-02	1.1E-02	U	7.0E-05	5.3E-04	5.3E-04
Anthracene	MJ710	2.10E-02	1.1E-02	U	3.7E-04	2.8E-03	2.8E-03
Benzo(a)anthracene	MJ710	2.10E-02	1.1E-02	U	2.7E-05	2.0E-04	2.0E-04
Benzo(a)pyrene	MJ710	2.10E-02	1.1E-02	U	2.7E-05	2.0E-04	2.0E-04
Benzo(b)fluoranthene	MJ710	2.10E-02	1.1E-02	U	4.3E-05	3.2E-04	3.2E-04
Benzo(e)pyrene	MJ710	-	-	-	2.1E-04	1.6E-03	1.6E-03
Benzo(g,h,i)perylene	MJ710	2.10E-02	1.1E-02	U	2.2E-04	1.7E-03	1.7E-03
Benzo(k)fluoranthene	MJ710	2.10E-02	1.1E-02	U	2.1E-05	1.5E-04	1.5E-04
Chrysene	MJ710	2.10E-02	1.1E-02	U	5.9E-05	4.4E-04	4.4E-04
Dibenz(a,h)anthracene	MJ710	2.10E-02	1.1E-02	U	1.1E-05	8.3E-05	8.3E-05
Fluoranthene	MJ710	2.10E-02	1.1E-02	U	7.5E-05	5.6E-04	5.6E-04
Fluorene	MJ710	2.10E-02	1.1E-02	U	5.7E-04	4.3E-03	4.3E-03
Indeno(1,2,3-cd)pyrene	MJ710	2.10E-02	1.1E-02	U	2.4E-05	1.8E-04	1.8E-04
Naphthalene	MJ710	2.10E-02	1.1E-02	U	6.9E-03	1.8E-02	1.1E-02

TPH to Petroleum Constituent Extrapolation for Soil (0-2 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration[a] (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Perylene	MJ710	-	-	-	1.2E-04	8.8E-04	8.8E-04
Phenanthrene	MJ710	2.10E-02	1.1E-02	U	1.5E-03	1.1E-02	1.1E-02
Pyrene	MJ710	2.10E-02	1.1E-02	U	1.4E-04	1.0E-03	1.0E-03
C08-C11 (Gasoline Range)	MJ739	5.60E+00	2.8E+00	U		-	-
C11-C14 (Kerosene Range)	MJ739	5.60E+00	2.8E+00	U		-	-
C14-C20 (Diesel Range)	MJ739	5.60E+00	2.8E+00	U		-	-
C20-C30 (Lubricant Oil Range)	MJ739	5.60E+00	2.8E+00	U		-	-
C11-C30	MJ739	-	8.4E+00	-		-	-
Benzene	MJ739	-	-	-	1.2E-04	3.4E-04	3.4E-04
Ethylbenzene	MJ739	-	-	-	1.2E-04	3.4E-04	3.4E-04
Toluene	MJ739	-	-	-	1.2E-04	3.4E-04	3.4E-04
m,p-Xylene	MJ739	-	-	-	3.6E-04	1.0E-03	1.0E-03
o-Xylene	MJ739	-	-	-	8.0E-05	2.2E-04	2.2E-04
Xylene (total)	MJ739	-	-	-	4.4E-04	1.2E-03	1.2E-03
2-Methylnaphthalene	MJ739	-	-	-	2.8E-02	7.7E-02	7.7E-02
Acenaphthene	MJ739	-	-	-	5.7E-04	4.8E-03	4.8E-03
Acenaphthylene	MJ739	-	-	-	7.0E-05	5.9E-04	5.9E-04
Anthracene	MJ739	-	-	-	3.7E-04	3.1E-03	3.1E-03
Benzo(a)anthracene	MJ739	-	-	-	2.7E-05	2.3E-04	2.3E-04
Benzo(a)pyrene	MJ739	-	-	-	2.7E-05	2.3E-04	2.3E-04
Benzo(b)fluoranthene	MJ739	-	-	-	4.3E-05	3.6E-04	3.6E-04
Benzo(e)pyrene	MJ739	-	-	-	2.1E-04	1.7E-03	1.7E-03
Benzo(g,h,i)perylene	MJ739	-	-	-	2.2E-04	1.9E-03	1.9E-03
Benzo(k)fluoranthene	MJ739	-	-	-	2.1E-05	1.7E-04	1.7E-04
Chrysene	MJ739	-	-	-	5.9E-05	4.9E-04	4.9E-04
Dibenz(a,h)anthracene	MJ739	-	-	-	1.1E-05	9.3E-05	9.3E-05
Fluoranthene	MJ739	-	-	-	7.5E-05	6.3E-04	6.3E-04
Fluorene	MJ739	-	-	-	5.7E-04	4.8E-03	4.8E-03
Indeno(1,2,3-cd)pyrene	MJ739	-	-	-	2.4E-05	2.0E-04	2.0E-04
Naphthalene	MJ739	-	-	-	6.9E-03	1.9E-02	1.9E-02
Perylene	MJ739	-	-	-	1.2E-04	9.9E-04	9.9E-04
Phenanthrene	MJ739	-	-	-	1.5E-03	1.3E-02	1.3E-02
Pyrene	MJ739	-	-	-	1.4E-04	1.1E-03	1.1E-03
C08-C11 (Gasoline Range)	MJ787	3.00E+00	3.0E+00	J		-	-
C11-C14 (Kerosene Range)	MJ787	6.40E+00	3.2E+00	U		-	-
C14-C20 (Diesel Range)	MJ787	6.00E+00	6.0E+00	J		-	-
C20-C30 (Lubricant Oil Range)	MJ787	2.20E+01	2.2E+01	J		-	-
C11-C30	MJ787	-	3.1E+01	-		-	-
Benzene	MJ787	-	-	-	1.2E-04	3.6E-04	3.6E-04
Ethylbenzene	MJ787	-	-	-	1.2E-04	3.6E-04	3.6E-04
Toluene	MJ787	-	-	-	1.2E-04	3.6E-04	3.6E-04
m,p-Xylene	MJ787	-	-	-	3.6E-04	1.1E-03	1.1E-03
o-Xylene	MJ787	-	-	-	8.0E-05	2.4E-04	2.4E-04
Xylene (total)	MJ787	-	-	-	4.4E-04	1.3E-03	1.3E-03
2-Methylnaphthalene	MJ787	5.20E-03	5.2E-03	J	2.8E-02	8.3E-02	5.2E-03
Acenaphthene	MJ787	2.70E-02	1.4E-02	U	5.7E-04	1.8E-02	1.4E-02
Acenaphthylene	MJ787	2.70E-02	1.4E-02	U	7.0E-05	2.2E-03	2.2E-03
Anthracene	MJ787	2.70E-02	1.4E-02	U	3.7E-04	1.2E-02	1.2E-02
Benzo(a)anthracene	MJ787	9.00E-03	9.0E-03	J	2.7E-05	8.4E-04	9.0E-03
Benzo(a)pyrene	MJ787	3.60E-03	3.6E-03	J	2.7E-05	8.5E-04	3.6E-03
Benzo(b)fluoranthene	MJ787	3.90E-03	3.9E-03	J	4.3E-05	1.4E-03	3.9E-03
Benzo(e)pyrene	MJ787	-	-	-	2.1E-04	6.5E-03	6.5E-03
Benzo(g,h,i)perylene	MJ787	4.80E-03	4.8E-03	J	2.2E-04	6.9E-03	4.8E-03
Benzo(k)fluoranthene	MJ787	2.70E-02	1.4E-02	U	2.1E-05	6.4E-04	6.4E-04
Chrysene	MJ787	2.80E-02	2.8E-02		5.9E-05	1.8E-03	2.8E-02
Dibenz(a,h)anthracene	MJ787	2.70E-02	1.4E-02	U	1.1E-05	3.5E-04	3.5E-04

TPH to Petroleum Constituent Extrapolation for Soil (0-2 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration[a] (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Fluoranthene	MJ787	1.20E-02	1.2E-02	J	7.5E-05	2.3E-03	1.2E-02
Fluorene	MJ787	2.70E-02	1.4E-02	U	5.7E-04	1.8E-02	1.4E-02
Indeno(1,2,3-cd)pyrene	MJ787	2.70E-02	1.4E-02	U	2.4E-05	7.5E-04	7.5E-04
Naphthalene	MJ787	1.10E-02	1.1E-02	J	6.9E-03	2.1E-02	1.1E-02
Perylene	MJ787	-	-	-	1.2E-04	3.7E-03	3.7E-03
Phenanthrene	MJ787	1.00E-02	1.0E-02	J	1.5E-03	4.8E-02	1.0E-02
Pyrene	MJ787	1.20E-02	1.2E-02	J	1.4E-04	4.3E-03	1.2E-02
C08-C11 (Gasoline Range)	MJ788	6.10E+00	3.1E+00	U		-	-
C11-C14 (Kerosene Range)	MJ788	6.10E+00	3.1E+00	U		-	-
C14-C20 (Diesel Range)	MJ788	6.10E+00	3.1E+00	U		-	-
C20-C30 (Lubricant Oil Range)	MJ788	2.50E+00	2.5E+00	J		-	-
C11-C30	MJ788	-	8.6E+00	-		-	-
Benzene	MJ788	-	-	-	1.2E-04	3.7E-04	3.7E-04
Ethylbenzene	MJ788	-	-	-	1.2E-04	3.7E-04	3.7E-04
Toluene	MJ788	-	-	-	1.2E-04	3.7E-04	3.7E-04
m,p-Xylene	MJ788	-	-	-	3.6E-04	1.1E-03	1.1E-03
o-Xylene	MJ788	-	-	-	8.0E-05	2.4E-04	2.4E-04
Xylene (total)	MJ788	-	-	-	4.4E-04	1.3E-03	1.3E-03
2-Methylnaphthalene	MJ788	2.40E-02	1.2E-02	U	2.8E-02	8.4E-02	1.2E-02
Acenaphthene	MJ788	2.40E-02	1.2E-02	U	5.7E-04	4.9E-03	4.9E-03
Acenaphthylene	MJ788	2.40E-02	1.2E-02	U	7.0E-05	6.0E-04	6.0E-04
Anthracene	MJ788	2.40E-02	1.2E-02	U	3.7E-04	3.2E-03	3.2E-03
Benzo(a)anthracene	MJ788	4.10E-03	4.1E-03	J	2.7E-05	2.3E-04	4.1E-03
Benzo(a)pyrene	MJ788	2.40E-02	1.2E-02	U	2.7E-05	2.3E-04	2.3E-04
Benzo(b)fluoranthene	MJ788	2.40E-02	1.2E-02	U	4.3E-05	3.7E-04	3.7E-04
Benzo(e)pyrene	MJ788	-	-	-	2.1E-04	1.8E-03	1.8E-03
Benzo(g,h,i)perylene	MJ788	2.40E-02	1.2E-02	U	2.2E-04	1.9E-03	1.9E-03
Benzo(k)fluoranthene	MJ788	2.40E-02	1.2E-02	U	2.1E-05	1.8E-04	1.8E-04
Chrysene	MJ788	2.40E-02	1.2E-02	U	5.9E-05	5.0E-04	5.0E-04
Dibenz(a,h)anthracene	MJ788	2.40E-02	1.2E-02	U	1.1E-05	9.5E-05	9.5E-05
Fluoranthene	MJ788	2.40E-02	1.2E-02	U	7.5E-05	6.4E-04	6.4E-04
Fluorene	MJ788	2.40E-02	1.2E-02	U	5.7E-04	4.9E-03	4.9E-03
Indeno(1,2,3-cd)pyrene	MJ788	2.40E-02	1.2E-02	U	2.4E-05	2.1E-04	2.1E-04
Naphthalene	MJ788	2.40E-02	1.2E-02	U	6.9E-03	2.1E-02	1.2E-02
Perylene	MJ788	-	-	-	1.2E-04	1.0E-03	1.0E-03
Phenanthrene	MJ788	2.40E-02	1.2E-02	U	1.5E-03	1.3E-02	1.2E-02
Pyrene	MJ788	2.40E-02	1.2E-02	U	1.4E-04	1.2E-03	1.2E-03
C08-C11 (Gasoline Range)	MJ789	2.30E+00	2.3E+00	J		-	-
C11-C14 (Kerosene Range)	MJ789	5.60E+00	2.8E+00	U		-	-
C14-C20 (Diesel Range)	MJ789	3.30E+00	3.3E+00	J		-	-
C20-C30 (Lubricant Oil Range)	MJ789	1.40E+01	1.4E+01	J		-	-
C11-C30	MJ789	-	2.0E+01	-		-	-
Benzene	MJ789	-	-	-	1.2E-04	2.8E-04	2.8E-04
Ethylbenzene	MJ789	-	-	-	1.2E-04	2.8E-04	2.8E-04
Toluene	MJ789	-	-	-	1.2E-04	2.8E-04	2.8E-04
m,p-Xylene	MJ789	-	-	-	3.6E-04	8.3E-04	8.3E-04
o-Xylene	MJ789	-	-	-	8.0E-05	1.8E-04	1.8E-04
Xylene (total)	MJ789	-	-	-	4.4E-04	1.0E-03	1.0E-03
2-Methylnaphthalene	MJ789	2.20E-02	1.1E-02	U	2.8E-02	6.3E-02	1.1E-02
Acenaphthene	MJ789	2.20E-02	1.1E-02	U	5.7E-04	1.2E-02	1.1E-02
Acenaphthylene	MJ789	2.20E-02	1.1E-02	U	7.0E-05	1.4E-03	1.4E-03
Anthracene	MJ789	2.20E-02	1.1E-02	U	3.7E-04	7.5E-03	7.5E-03
Benzo(a)anthracene	MJ789	2.20E-02	1.1E-02	U	2.7E-05	5.4E-04	5.4E-04
Benzo(a)pyrene	MJ789	2.20E-02	1.1E-02	U	2.7E-05	5.5E-04	5.5E-04
Benzo(b)fluoranthene	MJ789	2.20E-02	1.1E-02	U	4.3E-05	8.7E-04	8.7E-04
Benzo(e)pyrene	MJ789	-	-	-	2.1E-04	4.2E-03	4.2E-03

TPH to Petroleum Constituent Extrapolation for Soil (0-2 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration[a] (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Benzo(g,h,i)perylene	MJ789	2.20E-02	1.1E-02	U	2.2E-04	4.4E-03	4.4E-03
Benzo(k)fluoranthene	MJ789	2.20E-02	1.1E-02	U	2.1E-05	4.1E-04	4.1E-04
Chrysene	MJ789	2.20E-02	1.1E-02	U	5.9E-05	1.2E-03	1.2E-03
Dibenz(a,h)anthracene	MJ789	2.20E-02	1.1E-02	U	1.1E-05	2.2E-04	2.2E-04
Fluoranthene	MJ789	2.20E-02	1.1E-02	U	7.5E-05	1.5E-03	1.5E-03
Fluorene	MJ789	2.20E-02	1.1E-02	U	5.7E-04	1.1E-02	1.1E-02
Indeno(1,2,3-cd)pyrene	MJ789	2.20E-02	1.1E-02	U	2.4E-05	4.8E-04	4.8E-04
Naphthalene	MJ789	2.20E-02	1.1E-02	U	6.9E-03	1.6E-02	1.1E-02
Perylene	MJ789	2.20E-02	1.1E-02	U	1.2E-04	2.4E-03	2.4E-03
Phenanthrene	MJ789	2.20E-02	1.1E-02	U	1.5E-03	3.1E-02	1.1E-02
Pyrene	MJ789	2.20E-02	1.1E-02	U	1.4E-04	2.7E-03	2.7E-03
C08-C11 (Gasoline Range)	MJ790	2.70E+00	2.7E+00	J		-	-
C11-C14 (Kerosene Range)	MJ790	6.10E+00	3.1E+00	U		-	-
C14-C20 (Diesel Range)	MJ790	3.10E+00	3.1E+00	J		-	-
C20-C30 (Lubricant Oil Range)	MJ790	1.00E+01	1.0E+01	J		-	-
C11-C30	MJ790	-	1.6E+01	-		-	-
Benzene	MJ790	-	-	-	1.2E-04	3.2E-04	3.2E-04
Ethylbenzene	MJ790	-	-	-	1.2E-04	3.2E-04	3.2E-04
Toluene	MJ790	-	-	-	1.2E-04	3.2E-04	3.2E-04
m,p-Xylene	MJ790	-	-	-	3.6E-04	9.7E-04	9.7E-04
o-Xylene	MJ790	-	-	-	8.0E-05	2.2E-04	2.2E-04
Xylene (total)	MJ790	-	-	-	4.4E-04	1.2E-03	1.2E-03
2-Methylnaphthalene	MJ790	2.40E-02	1.2E-02	U	2.8E-02	7.4E-02	1.2E-02
Acenaphthene	MJ790	2.40E-02	1.2E-02	U	5.7E-04	9.3E-03	9.3E-03
Acenaphthylene	MJ790	2.40E-02	1.2E-02	U	7.0E-05	1.1E-03	1.1E-03
Anthracene	MJ790	2.40E-02	1.2E-02	U	3.7E-04	6.0E-03	6.0E-03
Benzo(a)anthracene	MJ790	2.40E-02	1.2E-02	U	2.7E-05	4.4E-04	4.4E-04
Benzo(a)pyrene	MJ790	2.40E-02	1.2E-02	U	2.7E-05	4.4E-04	4.4E-04
Benzo(b)fluoranthene	MJ790	2.40E-02	1.2E-02	U	4.3E-05	7.0E-04	7.0E-04
Benzo(e)pyrene	MJ790	-	-	-	2.1E-04	3.3E-03	3.3E-03
Benzo(g,h,i)perylene	MJ790	2.40E-02	1.2E-02	U	2.2E-04	3.6E-03	3.6E-03
Benzo(k)fluoranthene	MJ790	2.40E-02	1.2E-02	U	2.1E-05	3.3E-04	3.3E-04
Chrysene	MJ790	2.40E-02	1.2E-02	U	5.9E-05	9.5E-04	9.5E-04
Dibenz(a,h)anthracene	MJ790	2.40E-02	1.2E-02	U	1.1E-05	1.8E-04	1.8E-04
Fluoranthene	MJ790	2.40E-02	1.2E-02	U	7.5E-05	1.2E-03	1.2E-03
Fluorene	MJ790	2.40E-02	1.2E-02	U	5.7E-04	9.2E-03	9.2E-03
Indeno(1,2,3-cd)pyrene	MJ790	2.40E-02	1.2E-02	U	2.4E-05	3.9E-04	3.9E-04
Naphthalene	MJ790	2.40E-02	1.2E-02	U	6.9E-03	1.9E-02	1.2E-02
Perylene	MJ790	-	-	-	1.2E-04	1.9E-03	1.9E-03
Phenanthrene	MJ790	2.40E-02	1.2E-02	U	1.5E-03	2.5E-02	1.2E-02
Pyrene	MJ790	2.40E-02	1.2E-02	U	1.4E-04	2.2E-03	2.2E-03
C08-C11 (Gasoline Range)	MJ791	5.80E+00	2.9E+00	U		-	-
C11-C14 (Kerosene Range)	MJ791	5.80E+00	2.9E+00	U		-	-
C14-C20 (Diesel Range)	MJ791	5.80E+00	2.9E+00	U		-	-
C20-C30 (Lubricant Oil Range)	MJ791	5.80E+00	2.9E+00	U		-	-
C11-C30	MJ791	-	8.7E+00	-		-	-
Benzene	MJ791	-	-	-	1.2E-04	3.5E-04	3.5E-04
Ethylbenzene	MJ791	-	-	-	1.2E-04	3.5E-04	3.5E-04
Toluene	MJ791	-	-	-	1.2E-04	3.5E-04	3.5E-04
m,p-Xylene	MJ791	-	-	-	3.6E-04	1.0E-03	1.0E-03
o-Xylene	MJ791	-	-	-	8.0E-05	2.3E-04	2.3E-04
Xylene (total)	MJ791	-	-	-	4.4E-04	1.3E-03	1.3E-03
2-Methylnaphthalene	MJ791	2.30E-02	1.2E-02	U	2.8E-02	8.0E-02	1.2E-02
Acenaphthene	MJ791	2.30E-02	1.2E-02	U	5.7E-04	5.0E-03	5.0E-03
Acenaphthylene	MJ791	2.30E-02	1.2E-02	U	7.0E-05	6.1E-04	6.1E-04
Anthracene	MJ791	2.30E-02	1.2E-02	U	3.7E-04	3.2E-03	3.2E-03

TPH to Petroleum Constituent Extrapolation for Soil (0-2 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration[a] (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Benzo(a)anthracene	MJ791	3.30E-03	3.3E-03	J	2.7E-05	2.3E-04	3.3E-03
Benzo(a)pyrene	MJ791	2.30E-02	1.2E-02	U	2.7E-05	2.4E-04	2.4E-04
Benzo(b)fluoranthene	MJ791	2.30E-02	1.2E-02	U	4.3E-05	3.8E-04	3.8E-04
Benzo(e)pyrene	MJ791	-	-	-	2.1E-04	1.8E-03	1.8E-03
Benzo(g,h,i)perylene	MJ791	2.30E-02	1.2E-02	U	2.2E-04	1.9E-03	1.9E-03
Benzo(k)fluoranthene	MJ791	2.30E-02	1.2E-02	U	2.1E-05	1.8E-04	1.8E-04
Chrysene	MJ791	2.30E-02	1.2E-02	U	5.9E-05	5.1E-04	5.1E-04
Dibenz(a,h)anthracene	MJ791	2.30E-02	1.2E-02	U	1.1E-05	9.6E-05	9.6E-05
Fluoranthene	MJ791	2.30E-02	1.2E-02	U	7.5E-05	6.5E-04	6.5E-04
Fluorene	MJ791	2.30E-02	1.2E-02	U	5.7E-04	4.9E-03	4.9E-03
Indeno(1,2,3-cd)pyrene	MJ791	2.30E-02	1.2E-02	U	2.4E-05	2.1E-04	2.1E-04
Naphthalene	MJ791	2.30E-02	1.2E-02	U	6.9E-03	2.0E-02	1.2E-02
Perylene	MJ791	-	-	-	1.2E-04	1.0E-03	1.0E-03
Phenanthrene	MJ791	2.30E-02	1.2E-02	U	1.5E-03	1.3E-02	1.2E-02
Pyrene	MJ791	2.30E-02	1.2E-02	U	1.4E-04	1.2E-03	1.2E-03
C08-C11 (Gasoline Range)	MJ794	6.00E+00	3.0E+00	U		-	-
C11-C14 (Kerosene Range)	MJ794	6.00E+00	3.0E+00	U		-	-
C14-C20 (Diesel Range)	MJ794	6.00E+00	3.0E+00	U		-	-
C20-C30 (Lubricant Oil Range)	MJ794	7.70E+00	7.7E+00	J		-	-
C11-C30	MJ794	-	1.4E+01	-		-	-
Benzene	MJ794	-	-	-	1.2E-04	3.6E-04	3.6E-04
Ethylbenzene	MJ794	-	-	-	1.2E-04	3.6E-04	3.6E-04
Toluene	MJ794	-	-	-	1.2E-04	3.6E-04	3.6E-04
m,p-Xylene	MJ794	-	-	-	3.6E-04	1.1E-03	1.1E-03
o-Xylene	MJ794	-	-	-	8.0E-05	2.4E-04	2.4E-04
Xylene (total)	MJ794	-	-	-	4.4E-04	1.3E-03	1.3E-03
2-Methylnaphthalene	MJ794	2.40E-02	1.2E-02	U	2.8E-02	8.3E-02	1.2E-02
Acenaphthene	MJ794	2.40E-02	1.2E-02	U	5.7E-04	7.8E-03	7.8E-03
Acenaphthylene	MJ794	2.40E-02	1.2E-02	U	7.0E-05	9.6E-04	9.6E-04
Anthracene	MJ794	2.40E-02	1.2E-02	U	3.7E-04	5.1E-03	5.1E-03
Benzo(a)anthracene	MJ794	4.40E-03	4.4E-03	J	2.7E-05	3.7E-04	4.4E-03
Benzo(a)pyrene	MJ794	2.40E-02	1.2E-02	U	2.7E-05	3.7E-04	3.7E-04
Benzo(b)fluoranthene	MJ794	2.40E-02	1.2E-02	U	4.3E-05	5.9E-04	5.9E-04
Benzo(e)pyrene	MJ794	-	-	-	2.1E-04	2.8E-03	2.8E-03
Benzo(g,h,i)perylene	MJ794	2.40E-02	1.2E-02	U	2.2E-04	3.0E-03	3.0E-03
Benzo(k)fluoranthene	MJ794	2.40E-02	1.2E-02	U	2.1E-05	2.8E-04	2.8E-04
Chrysene	MJ794	2.40E-02	1.2E-02	U	5.9E-05	8.0E-04	8.0E-04
Dibenz(a,h)anthracene	MJ794	2.40E-02	1.2E-02	U	1.1E-05	1.5E-04	1.5E-04
Fluoranthene	MJ794	2.40E-02	1.2E-02	U	7.5E-05	1.0E-03	1.0E-03
Fluorene	MJ794	2.40E-02	1.2E-02	U	5.7E-04	7.8E-03	7.8E-03
Indeno(1,2,3-cd)pyrene	MJ794	2.40E-02	1.2E-02	U	2.4E-05	3.3E-04	3.3E-04
Naphthalene	MJ794	2.40E-02	1.2E-02	U	6.9E-03	2.1E-02	1.2E-02
Perylene	MJ794	-	-	-	1.2E-04	1.6E-03	1.6E-03
Phenanthrene	MJ794	2.40E-02	1.2E-02	U	1.5E-03	2.1E-02	1.2E-02
Pyrene	MJ794	2.40E-02	1.2E-02	U	1.4E-04	1.9E-03	1.9E-03
C08-C11 (Gasoline Range)	MJ795	2.10E+01	1.1E+01	U		-	-
C11-C14 (Kerosene Range)	MJ795	2.10E+01	1.1E+01	U		-	-
C14-C20 (Diesel Range)	MJ795	2.10E+01	1.1E+01	U		-	-
C20-C30 (Lubricant Oil Range)	MJ795	2.80E+01	2.8E+01	J		-	-
C11-C30	MJ795	-	4.9E+01	-		-	-
Benzene	MJ795	-	-	-	1.2E-04	1.3E-03	1.3E-03
Ethylbenzene	MJ795	-	-	-	1.2E-04	1.3E-03	1.3E-03
Toluene	MJ795	-	-	-	1.2E-04	1.3E-03	1.3E-03
m,p-Xylene	MJ795	-	-	-	3.6E-04	3.8E-03	3.8E-03
o-Xylene	MJ795	-	-	-	8.0E-05	8.4E-04	8.4E-04
Xylene (total)	MJ795	-	-	-	4.4E-04	4.6E-03	4.6E-03

TPH to Petroleum Constituent Extrapolation for Soil (0-2 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration[a] (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
2-Methylnaphthalene	MJ795	1.10E-02	1.1E-02	J	2.8E-02	2.9E-01	1.1E-02
Acenaphthene	MJ795	1.50E-02	1.5E-02	J	5.7E-04	2.8E-02	1.5E-02
Acenaphthylene	MJ795	2.80E-02	1.4E-02	U	7.0E-05	3.4E-03	3.4E-03
Anthracene	MJ795	2.80E-02	1.4E-02	U	3.7E-04	1.8E-02	1.4E-02
Benzo(a)anthracene	MJ795	6.30E-03	6.3E-03	J	2.7E-05	1.3E-03	6.3E-03
Benzo(a)pyrene	MJ795	2.80E-02	1.4E-02	U	2.7E-05	1.3E-03	1.3E-03
Benzo(b)fluoranthene	MJ795	2.80E-02	1.4E-02	U	4.3E-05	2.1E-03	2.1E-03
Benzo(e)pyrene	MJ795	-	-	-	2.1E-04	1.0E-02	1.0E-02
Benzo(g,h,i)perylene	MJ795	2.80E-02	1.4E-02	U	2.2E-04	1.1E-02	1.1E-02
Benzo(k)fluoranthene	MJ795	2.80E-02	1.4E-02	U	2.1E-05	1.0E-03	1.0E-03
Chrysene	MJ795	2.80E-02	1.4E-02	U	5.9E-05	2.9E-03	2.9E-03
Dibenz(a,h)anthracene	MJ795	2.80E-02	1.4E-02	U	1.1E-05	5.4E-04	5.4E-04
Fluoranthene	MJ795	5.80E-03	5.8E-03	J	7.5E-05	3.7E-03	5.8E-03
Fluorene	MJ795	2.80E-02	1.4E-02	U	5.7E-04	2.8E-02	1.4E-02
Indeno(1,2,3-cd)pyrene	MJ795	2.80E-02	1.4E-02	U	2.4E-05	1.2E-03	1.2E-03
Naphthalene	MJ795	2.20E-02	2.2E-02	J	6.9E-03	7.3E-02	2.2E-02
Perylene	MJ795	-	-	-	1.2E-04	5.8E-03	5.8E-03
Phenanthrene	MJ795	9.40E-03	9.4E-03	J	1.5E-03	7.5E-02	9.4E-03
Pyrene	MJ795	1.90E-02	1.9E-02	J	1.4E-04	6.7E-03	1.9E-02
C08-C11 (Gasoline Range)	MJ796	1.30E+01	6.5E+00	U		-	-
C11-C14 (Kerosene Range)	MJ796	1.30E+01	6.5E+00	U		-	-
C14-C20 (Diesel Range)	MJ796	8.50E+00	8.5E+00	J		-	-
C20-C30 (Lubricant Oil Range)	MJ796	2.10E+01	2.1E+01	J		-	-
C11-C30	MJ796	-	3.6E+01	-		-	-
Benzene	MJ796	-	-	-	1.2E-04	7.8E-04	7.8E-04
Ethylbenzene	MJ796	-	-	-	1.2E-04	7.8E-04	7.8E-04
Toluene	MJ796	-	-	-	1.2E-04	7.8E-04	7.8E-04
m,p-Xylene	MJ796	-	-	-	3.6E-04	2.3E-03	2.3E-03
o-Xylene	MJ796	-	-	-	8.0E-05	5.2E-04	5.2E-04
Xylene (total)	MJ796	-	-	-	4.4E-04	2.9E-03	2.9E-03
2-Methylnaphthalene	MJ796	2.60E-02	1.3E-02	U	2.8E-02	1.8E-01	1.3E-02
Acenaphthene	MJ796	2.60E-02	1.3E-02	U	5.7E-04	2.1E-02	1.3E-02
Acenaphthylene	MJ796	2.60E-02	1.3E-02	U	7.0E-05	2.5E-03	2.5E-03
Anthracene	MJ796	2.60E-02	1.3E-02	U	3.7E-04	1.3E-02	1.3E-02
Benzo(a)anthracene	MJ796	5.70E-03	5.7E-03	J	2.7E-05	9.7E-04	5.7E-03
Benzo(a)pyrene	MJ796	2.60E-02	1.3E-02	U	2.7E-05	9.8E-04	9.8E-04
Benzo(b)fluoranthene	MJ796	2.60E-02	1.3E-02	U	4.3E-05	1.6E-03	1.6E-03
Benzo(e)pyrene	MJ796	-	-	-	2.1E-04	7.4E-03	7.4E-03
Benzo(g,h,i)perylene	MJ796	2.60E-02	1.3E-02	U	2.2E-04	8.0E-03	8.0E-03
Benzo(k)fluoranthene	MJ796	2.60E-02	1.3E-02	U	2.1E-05	7.4E-04	7.4E-04
Chrysene	MJ796	7.20E-03	7.2E-03	J	5.9E-05	2.1E-03	7.2E-03
Dibenz(a,h)anthracene	MJ796	2.60E-02	1.3E-02	U	1.1E-05	4.0E-04	4.0E-04
Fluoranthene	MJ796	5.50E-03	5.5E-03	J	7.5E-05	2.7E-03	5.5E-03
Fluorene	MJ796	2.60E-02	1.3E-02	U	5.7E-04	2.0E-02	1.3E-02
Indeno(1,2,3-cd)pyrene	MJ796	2.60E-02	1.3E-02	U	2.4E-05	8.7E-04	8.7E-04
Naphthalene	MJ796	6.20E-03	6.2E-03	J	6.9E-03	4.5E-02	6.2E-03
Perylene	MJ796	-	-	-	1.2E-04	4.2E-03	4.2E-03
Phenanthrene	MJ796	2.60E-02	1.3E-02	U	1.5E-03	5.5E-02	1.3E-02
Pyrene	MJ796	5.90E-03	5.9E-03	J	1.4E-04	4.9E-03	5.9E-03
C08-C11 (Gasoline Range)	MJ798	7.30E+00	7.3E+00	J		-	-
C11-C14 (Kerosene Range)	MJ798	3.30E+00	3.3E+00	J		-	-
C14-C20 (Diesel Range)	MJ798	1.10E+01	1.1E+01	J		-	-
C20-C30 (Lubricant Oil Range)	MJ798	6.40E+01	6.4E+01			-	-
C11-C30	MJ798	-	7.8E+01	-		-	-
Benzene	MJ798	-	-	-	1.2E-04	8.8E-04	8.8E-04
Ethylbenzene	MJ798	-	-	-	1.2E-04	8.8E-04	8.8E-04

TPH to Petroleum Constituent Extrapolation for Soil (0-2 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration[a] (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Toluene	MJ798	-	-	-	1.2E-04	8.8E-04	8.8E-04
m,p-Xylene	MJ798	-	-	-	3.6E-04	2.6E-03	2.6E-03
o-Xylene	MJ798	-	-	-	8.0E-05	5.8E-04	5.8E-04
Xylene (total)	MJ798	-	-	-	4.4E-04	3.2E-03	3.2E-03
2-Methylnaphthalene	MJ798	7.10E-03	7.1E-03	J	2.8E-02	2.0E-01	7.1E-03
Acenaphthene	MJ798	1.30E-02	1.3E-02	J	5.7E-04	4.5E-02	1.3E-02
Acenaphthylene	MJ798	2.20E-02	1.1E-02	U	7.0E-05	5.5E-03	5.5E-03
Anthracene	MJ798	2.20E-02	1.1E-02	U	3.7E-04	2.9E-02	1.1E-02
Benzo(a)anthracene	MJ798	2.20E-02	1.1E-02	U	2.7E-05	2.1E-03	2.1E-03
Benzo(a)pyrene	MJ798	5.90E-03	5.9E-03	J	2.7E-05	2.1E-03	5.9E-03
Benzo(b)fluoranthene	MJ798	2.20E-02	1.1E-02	U	4.3E-05	3.4E-03	3.4E-03
Benzo(e)pyrene	MJ798	-	-	-	2.1E-04	1.6E-02	1.6E-02
Benzo(g,h,i)perylene	MJ798	4.90E-03	4.9E-03	J	2.2E-04	1.7E-02	4.9E-03
Benzo(k)fluoranthene	MJ798	1.40E-02	1.4E-02	J	2.1E-05	1.6E-03	1.4E-02
Chrysene	MJ798	5.30E-02	5.3E-02		5.9E-05	4.6E-03	5.3E-02
Dibenz(a,h)anthracene	MJ798	2.20E-02	1.1E-02	U	1.1E-05	8.7E-04	8.7E-04
Fluoranthene	MJ798	2.10E-02	2.1E-02	J	7.5E-05	5.9E-03	2.1E-02
Fluorene	MJ798	2.20E-02	1.1E-02	U	5.7E-04	4.4E-02	1.1E-02
Indeno(1,2,3-cd)pyrene	MJ798	2.20E-02	1.1E-02	U	2.4E-05	1.9E-03	1.9E-03
Naphthalene	MJ798	9.10E-03	9.1E-03	J	6.9E-03	5.1E-02	9.1E-03
Perylene	MJ798	-	-	-	1.2E-04	9.2E-03	9.2E-03
Phenanthrene	MJ798	1.10E-02	1.1E-02	J	1.5E-03	1.2E-01	1.1E-02
Pyrene	MJ798	1.80E-02	1.8E-02	J	1.4E-04	1.1E-02	1.8E-02
C08-C11 (Gasoline Range)	MJ799	5.40E+00	2.7E+00	U		-	-
C11-C14 (Kerosene Range)	MJ799	5.40E+00	2.7E+00	U		-	-
C14-C20 (Diesel Range)	MJ799	2.70E+00	2.7E+00	J		-	-
C20-C30 (Lubricant Oil Range)	MJ799	1.60E+01	1.6E+01	J		-	-
C11-C30	MJ799	-	2.1E+01	-		-	-
Benzene	MJ799	-	-	-	1.2E-04	3.2E-04	3.2E-04
Ethylbenzene	MJ799	-	-	-	1.2E-04	3.2E-04	3.2E-04
Toluene	MJ799	-	-	-	1.2E-04	3.2E-04	3.2E-04
m,p-Xylene	MJ799	-	-	-	3.6E-04	9.7E-04	9.7E-04
o-Xylene	MJ799	-	-	-	8.0E-05	2.2E-04	2.2E-04
Xylene (total)	MJ799	-	-	-	4.4E-04	1.2E-03	1.2E-03
2-Methylnaphthalene	MJ799	2.20E-02	1.1E-02	U	2.8E-02	7.4E-02	1.1E-02
Acenaphthene	MJ799	2.20E-02	1.1E-02	U	5.7E-04	1.2E-02	1.1E-02
Acenaphthylene	MJ799	2.20E-02	1.1E-02	U	7.0E-05	1.5E-03	1.5E-03
Anthracene	MJ799	2.20E-02	1.1E-02	U	3.7E-04	8.0E-03	8.0E-03
Benzo(a)anthracene	MJ799	3.40E-03	3.4E-03	J	2.7E-05	5.8E-04	3.4E-03
Benzo(a)pyrene	MJ799	2.20E-02	1.1E-02	U	2.7E-05	5.8E-04	5.8E-04
Benzo(b)fluoranthene	MJ799	2.20E-02	1.1E-02	U	4.3E-05	9.3E-04	9.3E-04
Benzo(e)pyrene	MJ799	-	-	-	2.1E-04	4.4E-03	4.4E-03
Benzo(g,h,i)perylene	MJ799	2.20E-02	1.1E-02	U	2.2E-04	4.7E-03	4.7E-03
Benzo(k)fluoranthene	MJ799	2.20E-02	1.1E-02	U	2.1E-05	4.4E-04	4.4E-04
Chrysene	MJ799	2.20E-02	1.1E-02	U	5.9E-05	1.3E-03	1.3E-03
Dibenz(a,h)anthracene	MJ799	2.20E-02	1.1E-02	U	1.1E-05	2.4E-04	2.4E-04
Fluoranthene	MJ799	2.20E-02	1.1E-02	U	7.5E-05	1.6E-03	1.6E-03
Fluorene	MJ799	2.20E-02	1.1E-02	U	5.7E-04	1.2E-02	1.1E-02
Indeno(1,2,3-cd)pyrene	MJ799	2.20E-02	1.1E-02	U	2.4E-05	5.1E-04	5.1E-04
Naphthalene	MJ799	2.20E-02	1.1E-02	U	6.9E-03	1.9E-02	1.1E-02
Perylene	MJ799	-	-	-	1.2E-04	2.5E-03	2.5E-03
Phenanthrene	MJ799	2.20E-02	1.1E-02	U	1.5E-03	3.3E-02	1.1E-02
Pyrene	MJ799	2.20E-02	1.1E-02	U	1.4E-04	2.9E-03	2.9E-03
C08-C11 (Gasoline Range)	MJ800	1.10E+01	5.5E+00	U		-	-
C11-C14 (Kerosene Range)	MJ800	1.10E+01	5.5E+00	U		-	-
C14-C20 (Diesel Range)	MJ800	1.10E+01	5.5E+00	U		-	-

TPH to Petroleum Constituent Extrapolation for Soil (0-2 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration[a] (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
C20-C30 (Lubricant Oil Range)	MJ800	5.20E+00	5.2E+00	J		-	-
C11-C30	MJ800	-	1.6E+01	-		-	-
Benzene	MJ800	-	-	-	1.2E-04	6.6E-04	6.6E-04
Ethylbenzene	MJ800	-	-	-	1.2E-04	6.6E-04	6.6E-04
Toluene	MJ800	-	-	-	1.2E-04	6.6E-04	6.6E-04
m,p-Xylene	MJ800	-	-	-	3.6E-04	2.0E-03	2.0E-03
o-Xylene	MJ800	-	-	-	8.0E-05	4.4E-04	4.4E-04
Xylene (total)	MJ800	-	-	-	4.4E-04	2.4E-03	2.4E-03
2-Methylnaphthalene	MJ800	2.20E-02	1.1E-02	U	2.8E-02	1.5E-01	1.1E-02
Acenaphthene	MJ800	2.20E-02	1.1E-02	U	5.7E-04	9.3E-03	9.3E-03
Acenaphthylene	MJ800	2.20E-02	1.1E-02	U	7.0E-05	1.1E-03	1.1E-03
Anthracene	MJ800	2.20E-02	1.1E-02	U	3.7E-04	6.0E-03	6.0E-03
Benzo(a)anthracene	MJ800	2.20E-02	1.1E-02	U	2.7E-05	4.4E-04	4.4E-04
Benzo(a)pyrene	MJ800	2.20E-02	1.1E-02	U	2.7E-05	4.4E-04	4.4E-04
Benzo(b)fluoranthene	MJ800	2.20E-02	1.1E-02	U	4.3E-05	7.0E-04	7.0E-04
Benzo(e)pyrene	MJ800	-	-	-	2.1E-04	3.3E-03	3.3E-03
Benzo(g,h,i)perylene	MJ800	2.20E-02	1.1E-02	U	2.2E-04	3.6E-03	3.6E-03
Benzo(k)fluoranthene	MJ800	2.20E-02	1.1E-02	U	2.1E-05	3.3E-04	3.3E-04
Chrysene	MJ800	2.20E-02	1.1E-02	U	5.9E-05	9.5E-04	9.5E-04
Dibenz(a,h)anthracene	MJ800	2.20E-02	1.1E-02	U	1.1E-05	1.8E-04	1.8E-04
Fluoranthene	MJ800	2.20E-02	1.1E-02	U	7.5E-05	1.2E-03	1.2E-03
Fluorene	MJ800	2.20E-02	1.1E-02	U	5.7E-04	9.2E-03	9.2E-03
Indeno(1,2,3-cd)pyrene	MJ800	2.20E-02	1.1E-02	U	2.4E-05	3.9E-04	3.9E-04
Naphthalene	MJ800	2.20E-02	1.1E-02	U	6.9E-03	3.8E-02	1.1E-02
Perylene	MJ800	-	-	-	1.2E-04	1.9E-03	1.9E-03
Phenanthrene	MJ800	2.20E-02	1.1E-02	U	1.5E-03	2.5E-02	1.1E-02
Pyrene	MJ800	2.20E-02	1.1E-02	U	1.4E-04	2.2E-03	2.2E-03
C08-C11 (Gasoline Range)	MJ806	5.70E+00	2.9E+00	U		-	-
C11-C14 (Kerosene Range)	MJ806	5.70E+00	2.9E+00	U		-	-
C14-C20 (Diesel Range)	MJ806	5.70E+00	2.9E+00	U		-	-
C20-C30 (Lubricant Oil Range)	MJ806	1.80E+01	1.8E+01	J		-	-
C11-C30	MJ806	-	2.4E+01	-		-	-
Benzene	MJ806	-	-	-	1.2E-04	3.4E-04	3.4E-04
Ethylbenzene	MJ806	-	-	-	1.2E-04	3.4E-04	3.4E-04
Toluene	MJ806	-	-	-	1.2E-04	3.4E-04	3.4E-04
m,p-Xylene	MJ806	-	-	-	3.6E-04	1.0E-03	1.0E-03
o-Xylene	MJ806	-	-	-	8.0E-05	2.3E-04	2.3E-04
Xylene (total)	MJ806	-	-	-	4.4E-04	1.3E-03	1.3E-03
2-Methylnaphthalene	MJ806	7.50E-03	7.5E-03	J	2.8E-02	7.9E-02	7.5E-03
Acenaphthene	MJ806	2.30E-02	1.2E-02	U	5.7E-04	1.4E-02	1.2E-02
Acenaphthylene	MJ806	2.30E-02	1.2E-02	U	7.0E-05	1.7E-03	1.7E-03
Anthracene	MJ806	2.30E-02	1.2E-02	U	3.7E-04	8.8E-03	8.8E-03
Benzo(a)anthracene	MJ806	2.30E-02	1.2E-02	U	2.7E-05	6.4E-04	6.4E-04
Benzo(a)pyrene	MJ806	2.60E-03	2.6E-03	J	2.7E-05	6.4E-04	2.6E-03
Benzo(b)fluoranthene	MJ806	2.20E-03	2.2E-03	J	4.3E-05	1.0E-03	2.2E-03
Benzo(e)pyrene	MJ806	-	-	-	2.1E-04	4.9E-03	4.9E-03
Benzo(g,h,i)perylene	MJ806	2.30E-02	1.2E-02	U	2.2E-04	5.2E-03	5.2E-03
Benzo(k)fluoranthene	MJ806	2.30E-02	1.2E-02	U	2.1E-05	4.9E-04	4.9E-04
Chrysene	MJ806	1.00E-02	1.0E-02	J	5.9E-05	1.4E-03	1.0E-02
Dibenz(a,h)anthracene	MJ806	2.30E-02	1.2E-02	U	1.1E-05	2.6E-04	2.6E-04
Fluoranthene	MJ806	3.90E-03	3.9E-03	J	7.5E-05	1.8E-03	3.9E-03
Fluorene	MJ806	2.30E-02	1.2E-02	U	5.7E-04	1.3E-02	1.2E-02
Indeno(1,2,3-cd)pyrene	MJ806	2.30E-02	1.2E-02	U	2.4E-05	5.7E-04	5.7E-04
Naphthalene	MJ806	7.90E-03	7.9E-03	J	6.9E-03	2.0E-02	7.9E-03
Perylene	MJ806	-	-	-	1.2E-04	2.8E-03	2.8E-03
Phenanthrene	MJ806	2.30E-02	1.2E-02	U	1.5E-03	3.6E-02	1.2E-02

TPH to Petroleum Constituent Extrapolation for Soil (0-2 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentration[a] (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Pyrene	MJ806	9.30E-03	9.3E-03	J	1.4E-04	3.2E-03	9.3E-03
C08-C11 (Gasoline Range)	MJ808	5.90E+00	3.0E+00	U		-	-
C11-C14 (Kerosene Range)	MJ808	5.90E+00	3.0E+00	U		-	-
C14-C20 (Diesel Range)	MJ808	7.00E+00	7.0E+00	J		-	-
C20-C30 (Lubricant Oil Range)	MJ808	8.80E+00	8.8E+00	J		-	-
C11-C30	MJ808	-	1.9E+01	-		-	-
Benzene	MJ808	-	-	-	1.2E-04	3.5E-04	3.5E-04
Ethylbenzene	MJ808	-	-	-	1.2E-04	3.5E-04	3.5E-04
Toluene	MJ808	-	-	-	1.2E-04	3.5E-04	3.5E-04
m,p-Xylene	MJ808	-	-	-	3.6E-04	1.1E-03	1.1E-03
o-Xylene	MJ808	-	-	-	8.0E-05	2.4E-04	2.4E-04
Xylene (total)	MJ808	-	-	-	4.4E-04	1.3E-03	1.3E-03
2-Methylnaphthalene	MJ808	2.50E-02	1.3E-02	U	2.8E-02	8.1E-02	1.3E-02
Acenaphthene	MJ808	2.50E-02	1.3E-02	U	5.7E-04	1.1E-02	1.1E-02
Acenaphthylene	MJ808	2.50E-02	1.3E-02	U	7.0E-05	1.3E-03	1.3E-03
Anthracene	MJ808	2.50E-02	1.3E-02	U	3.7E-04	7.0E-03	7.0E-03
Benzo(a)anthracene	MJ808	5.50E-03	5.5E-03	J	2.7E-05	5.1E-04	5.5E-03
Benzo(a)pyrene	MJ808	2.50E-02	1.3E-02	U	2.7E-05	5.1E-04	5.1E-04
Benzo(b)fluoranthene	MJ808	2.30E-03	2.3E-03	J	4.3E-05	8.1E-04	2.3E-03
Benzo(e)pyrene	MJ808	-	-	-	2.1E-04	3.9E-03	3.9E-03
Benzo(g,h,i)perylene	MJ808	2.50E-02	1.3E-02	U	2.2E-04	4.1E-03	4.1E-03
Benzo(k)fluoranthene	MJ808	2.50E-02	1.3E-02	U	2.1E-05	3.8E-04	3.8E-04
Chrysene	MJ808	7.80E-03	7.8E-03	J	5.9E-05	1.1E-03	7.8E-03
Dibenz(a,h)anthracene	MJ808	2.50E-02	1.3E-02	U	1.1E-05	2.1E-04	2.1E-04
Fluoranthene	MJ808	6.10E-03	6.1E-03	J	7.5E-05	1.4E-03	6.1E-03
Fluorene	MJ808	2.50E-02	1.3E-02	U	5.7E-04	1.1E-02	1.1E-02
Indeno(1,2,3-cd)pyrene	MJ808	2.50E-02	1.3E-02	U	2.4E-05	4.5E-04	4.5E-04
Naphthalene	MJ808	2.50E-02	1.3E-02	U	6.9E-03	2.0E-02	1.3E-02
Perylene	MJ808	-	-	-	1.2E-04	2.2E-03	2.2E-03
Phenanthrene	MJ808	2.50E-02	1.3E-02	U	1.5E-03	2.9E-02	1.3E-02
Pyrene	MJ808	5.10E-03	5.1E-03	J	1.4E-04	2.6E-03	5.1E-03

Notes:
a. Petroleum constituent concentrations estimated and selected as described in Section 2.8 of the SRAM.
"-" not applicable
EF - extrapolation factor
mg/kg - milligrams per kilogram

Aroclor to PCB Congener Extrapolation for Soil (0-2 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentrations (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF_{1254}	EF_{1260}	Estimated Concentrations Aroclor-1254 (mg/kg)	Estimated Concentrations Aroclor-1260 (mg/kg)	Estimated Concentrations PCB_{MAX} (mg/kg)
Aroclor-1254	MJ669	7.5E-02	7.5E-02	J	-	-	-	-	-
Aroclor-1260	MJ669	4.3E-02	4.3E-02	J	-	-	-	-	-
PCB-105	MJ669	-	-	-	1.2E-01	8.2E-02	9.3E-06	3.5E-06	9.3E-06
PCB-114	MJ669	-	-	-	4.5E-03	1.5E-03	3.4E-07	6.3E-08	3.4E-07
PCB-118	MJ669	-	-	-	2.7E-01	1.6E-01	2.0E-05	7.0E-06	2.0E-05
PCB-123	MJ669	-	-	-	3.0E-03	2.3E-03	2.2E-07	1.0E-07	2.2E-07
PCB-126	MJ669	-	-	-	7.5E-03	6.4E-03	5.6E-07	2.7E-07	5.6E-07
PCB-156	MJ669	-	-	-	6.3E-02	5.5E-02	4.7E-06	2.3E-06	4.7E-06
PCB-157	MJ669	-	-	-	1.2E-02	2.5E-02	9.3E-07	1.1E-06	1.1E-06
PCB-167	MJ669	-	-	-	2.1E-02	4.3E-02	1.5E-06	1.8E-06	1.8E-06
PCB-169	MJ669	-	-	-	3.7E-04	6.4E-04	2.7E-08	2.7E-08	2.7E-08
PCB-189	MJ669	-	-	-	3.0E-03	6.4E-03	2.2E-07	2.7E-07	2.7E-07
PCB-77	MJ669	-	-	-	1.5E-02	1.3E-02	1.2E-06	5.5E-07	1.2E-06
PCB-81	MJ669	-	-	-	3.0E-03	2.3E-03	2.2E-07	9.7E-08	2.2E-07
Aroclor-1254	MJ670	3.7E-02	3.7E-02	J	-	-	-	-	-
Aroclor-1260	MJ670	4.6E-02	4.6E-02	J	-	-	-	-	-
PCB-105	MJ670	-	-	-	1.2E-01	8.2E-02	4.6E-06	3.8E-06	4.6E-06
PCB-114	MJ670	-	-	-	4.5E-03	1.5E-03	1.7E-07	6.7E-08	1.7E-07
PCB-118	MJ670	-	-	-	2.7E-01	1.6E-01	9.9E-06	7.5E-06	9.9E-06
PCB-123	MJ670	-	-	-	3.0E-03	2.3E-03	1.1E-07	1.1E-07	1.1E-07
PCB-126	MJ670	-	-	-	7.5E-03	6.4E-03	2.8E-07	2.9E-07	2.9E-07
PCB-156	MJ670	-	-	-	6.3E-02	5.5E-02	2.3E-06	2.5E-06	2.5E-06
PCB-157	MJ670	-	-	-	1.2E-02	2.5E-02	4.6E-07	1.1E-06	1.1E-06
PCB-167	MJ670	-	-	-	2.1E-02	4.3E-02	7.6E-07	2.0E-06	2.0E-06
PCB-169	MJ670	-	-	-	3.7E-04	6.4E-04	1.4E-08	2.9E-08	2.9E-08
PCB-189	MJ670	-	-	-	3.0E-03	6.4E-03	1.1E-07	2.9E-07	2.9E-07
PCB-77	MJ670	-	-	-	1.5E-02	1.3E-02	5.7E-07	5.9E-07	5.9E-07
PCB-81	MJ670	-	-	-	3.0E-03	2.3E-03	1.1E-07	1.0E-07	1.1E-07
Aroclor-1254	MJ671	1.2E-01	1.2E-01	J	-	-	-	-	-
Aroclor-1260	MJ671	8.5E-02	8.5E-02	J	-	-	-	-	-
PCB-105	MJ671	-	-	-	1.2E-01	8.2E-02	1.5E-05	7.0E-06	1.5E-05
PCB-114	MJ671	-	-	-	4.5E-03	1.5E-03	5.4E-07	1.2E-07	5.4E-07
PCB-118	MJ671	-	-	-	2.7E-01	1.6E-01	3.2E-05	1.4E-05	3.2E-05
PCB-123	MJ671	-	-	-	3.0E-03	2.3E-03	3.6E-07	2.0E-07	3.6E-07
PCB-126	MJ671	-	-	-	7.5E-03	6.4E-03	9.0E-07	5.4E-07	9.0E-07
PCB-156	MJ671	-	-	-	6.3E-02	5.5E-02	7.5E-06	4.6E-06	7.5E-06
PCB-157	MJ671	-	-	-	1.2E-02	2.5E-02	1.5E-06	2.1E-06	2.1E-06
PCB-167	MJ671	-	-	-	2.1E-02	4.3E-02	2.5E-06	3.6E-06	3.6E-06
PCB-169	MJ671	-	-	-	3.7E-04	6.4E-04	4.4E-08	5.4E-08	5.4E-08
PCB-189	MJ671	-	-	-	3.0E-03	6.4E-03	3.6E-07	5.4E-07	5.4E-07
PCB-77	MJ671	-	-	-	1.5E-02	1.3E-02	1.9E-06	1.1E-06	1.9E-06
PCB-81	MJ671	-	-	-	3.0E-03	2.3E-03	3.6E-07	1.9E-07	3.6E-07
Aroclor-1254	MJ683	4.0E-01	2.0E-01	U	-	-	-	-	-
Aroclor-1260	MJ683	9.5E-02	9.5E-02		-	-	-	-	-
PCB-105	MJ683	-	-	-	1.2E-01	8.2E-02	2.5E-05	7.8E-06	2.5E-05
PCB-114	MJ683	-	-	-	4.5E-03	1.5E-03	9.1E-07	1.4E-07	9.1E-07
PCB-118	MJ683	-	-	-	2.7E-01	1.6E-01	5.4E-05	1.6E-05	5.4E-05
PCB-123	MJ683	-	-	-	3.0E-03	2.3E-03	6.0E-07	2.2E-07	6.0E-07
PCB-126	MJ683	-	-	-	7.5E-03	6.4E-03	1.5E-06	6.0E-07	1.5E-06
PCB-156	MJ683	-	-	-	6.3E-02	5.5E-02	1.3E-05	5.2E-06	1.3E-05
PCB-157	MJ683	-	-	-	1.2E-02	2.5E-02	2.5E-06	2.3E-06	2.5E-06
PCB-167	MJ683	-	-	-	2.1E-02	4.3E-02	4.1E-06	4.1E-06	4.1E-06
PCB-169	MJ683	-	-	-	3.7E-04	6.4E-04	7.3E-08	6.0E-08	7.3E-08
PCB-189	MJ683	-	-	-	3.0E-03	6.4E-03	6.0E-07	6.0E-07	6.0E-07
PCB-77	MJ683	-	-	-	1.5E-02	1.3E-02	3.1E-06	1.2E-06	3.1E-06
PCB-81	MJ683	-	-	-	3.0E-03	2.3E-03	6.0E-07	2.1E-07	6.0E-07

Aroclor to PCB Congener Extrapolation for Soil (0-2 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentrations (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF_{1254}	EF_{1260}	Estimated Concentrations Aroclor-1254 (mg/kg)	Estimated Concentrations Aroclor-1260 (mg/kg)	Estimated Concentrations PCB_{MAX} (mg/kg)
Aroclor-1254	MJ704	5.2E-02	2.6E-02	U	-	-	-	-	-
Aroclor-1260	MJ704	5.2E-02	2.6E-02	U	-	-	-	-	-
PCB-105	MJ704	-	-	-	1.2E-01	8.2E-02	3.2E-06	2.1E-06	3.2E-06
PCB-114	MJ704	-	-	-	4.5E-03	1.5E-03	1.2E-07	3.8E-08	1.2E-07
PCB-118	MJ704	-	-	-	2.7E-01	1.6E-01	7.0E-06	4.3E-06	7.0E-06
PCB-123	MJ704	-	-	-	3.0E-03	2.3E-03	7.8E-08	6.0E-08	7.8E-08
PCB-126	MJ704	-	-	-	7.5E-03	6.4E-03	2.0E-07	1.7E-07	2.0E-07
PCB-156	MJ704	-	-	-	6.3E-02	5.5E-02	1.6E-06	1.4E-06	1.6E-06
PCB-157	MJ704	-	-	-	1.2E-02	2.5E-02	3.2E-07	6.4E-07	6.4E-07
PCB-167	MJ704	-	-	-	2.1E-02	4.3E-02	5.4E-07	1.1E-06	1.1E-06
PCB-169	MJ704	-	-	-	3.7E-04	6.4E-04	9.5E-09	1.7E-08	1.7E-08
PCB-189	MJ704	-	-	-	3.0E-03	6.4E-03	7.8E-08	1.7E-07	1.7E-07
PCB-77	MJ704	-	-	-	1.5E-02	1.3E-02	4.0E-07	3.3E-07	4.0E-07
PCB-81	MJ704	-	-	-	3.0E-03	2.3E-03	7.8E-08	5.9E-08	7.8E-08
Aroclor-1254	MJ705	8.1E-02	4.1E-02	U	-	-	-	-	-
Aroclor-1260	MJ705	8.1E-02	4.1E-02	U	-	-	-	-	-
PCB-105	MJ705	-	-	-	1.2E-01	8.2E-02	5.0E-06	3.3E-06	5.0E-06
PCB-114	MJ705	-	-	-	4.5E-03	1.5E-03	1.8E-07	5.9E-08	1.8E-07
PCB-118	MJ705	-	-	-	2.7E-01	1.6E-01	1.1E-05	6.6E-06	1.1E-05
PCB-123	MJ705	-	-	-	3.0E-03	2.3E-03	1.2E-07	9.4E-08	1.2E-07
PCB-126	MJ705	-	-	-	7.5E-03	6.4E-03	3.0E-07	2.6E-07	3.0E-07
PCB-156	MJ705	-	-	-	6.3E-02	5.5E-02	2.5E-06	2.2E-06	2.5E-06
PCB-157	MJ705	-	-	-	1.2E-02	2.5E-02	5.0E-07	9.9E-07	9.9E-07
PCB-167	MJ705	-	-	-	2.1E-02	4.3E-02	8.4E-07	1.7E-06	1.7E-06
PCB-169	MJ705	-	-	-	3.7E-04	6.4E-04	1.5E-08	2.6E-08	2.6E-08
PCB-189	MJ705	-	-	-	3.0E-03	6.4E-03	1.2E-07	2.6E-07	2.6E-07
PCB-77	MJ705	-	-	-	1.5E-02	1.3E-02	6.3E-07	5.2E-07	6.3E-07
PCB-81	MJ705	-	-	-	3.0E-03	2.3E-03	1.2E-07	9.1E-08	1.2E-07
Aroclor-1254	MJ707	5.1E-02	2.6E-02	U	-	-	-	-	-
Aroclor-1260	MJ707	5.1E-02	2.6E-02	U	-	-	-	-	-
PCB-105	MJ707	-	-	-	1.2E-01	8.2E-02	3.2E-06	2.1E-06	3.2E-06
PCB-114	MJ707	-	-	-	4.5E-03	1.5E-03	1.2E-07	3.7E-08	1.2E-07
PCB-118	MJ707	-	-	-	2.7E-01	1.6E-01	6.8E-06	4.2E-06	6.8E-06
PCB-123	MJ707	-	-	-	3.0E-03	2.3E-03	7.6E-08	5.9E-08	7.6E-08
PCB-126	MJ707	-	-	-	7.5E-03	6.4E-03	1.9E-07	1.6E-07	1.9E-07
PCB-156	MJ707	-	-	-	6.3E-02	5.5E-02	1.6E-06	1.4E-06	1.6E-06
PCB-157	MJ707	-	-	-	1.2E-02	2.5E-02	3.2E-07	6.3E-07	6.3E-07
PCB-167	MJ707	-	-	-	2.1E-02	4.3E-02	5.3E-07	1.1E-06	1.1E-06
PCB-169	MJ707	-	-	-	3.7E-04	6.4E-04	9.3E-09	1.6E-08	1.6E-08
PCB-189	MJ707	-	-	-	3.0E-03	6.4E-03	7.6E-08	1.6E-07	1.6E-07
PCB-77	MJ707	-	-	-	1.5E-02	1.3E-02	3.9E-07	3.2E-07	3.9E-07
PCB-81	MJ707	-	-	-	3.0E-03	2.3E-03	7.6E-08	5.7E-08	7.6E-08
Aroclor-1254	MJ708	7.9E-02	4.0E-02	U	-	-	-	-	-
Aroclor-1260	MJ708	7.9E-02	4.0E-02	U	-	-	-	-	-
PCB-105	MJ708	-	-	-	1.2E-01	8.2E-02	4.9E-06	3.2E-06	4.9E-06
PCB-114	MJ708	-	-	-	4.5E-03	1.5E-03	1.8E-07	5.7E-08	1.8E-07
PCB-118	MJ708	-	-	-	2.7E-01	1.6E-01	1.1E-05	6.5E-06	1.1E-05
PCB-123	MJ708	-	-	-	3.0E-03	2.3E-03	1.2E-07	9.2E-08	1.2E-07
PCB-126	MJ708	-	-	-	7.5E-03	6.4E-03	3.0E-07	2.5E-07	3.0E-07
PCB-156	MJ708	-	-	-	6.3E-02	5.5E-02	2.5E-06	2.2E-06	2.5E-06
PCB-157	MJ708	-	-	-	1.2E-02	2.5E-02	4.9E-07	9.7E-07	9.7E-07
PCB-167	MJ708	-	-	-	2.1E-02	4.3E-02	8.1E-07	1.7E-06	1.7E-06
PCB-169	MJ708	-	-	-	3.7E-04	6.4E-04	1.4E-08	2.5E-08	2.5E-08
PCB-189	MJ708	-	-	-	3.0E-03	6.4E-03	1.2E-07	2.5E-07	2.5E-07
PCB-77	MJ708	-	-	-	1.5E-02	1.3E-02	6.1E-07	5.0E-07	6.1E-07
PCB-81	MJ708	-	-	-	3.0E-03	2.3E-03	1.2E-07	8.9E-08	1.2E-07
Aroclor-1254	MJ709	5.4E-02	2.7E-02	UJ	-	-	-	-	-
Aroclor-1260	MJ709	5.4E-02	2.7E-02	UJ	-	-	-	-	-

Aroclor to PCB Congener Extrapolation for Soil (0-2 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentrations (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF_{1254}	EF_{1260}	Estimated Concentrations Aroclor-1254 (mg/kg)	Estimated Concentrations Aroclor-1260 (mg/kg)	Estimated Concentrations PCB_{MAX} (mg/kg)
PCB-105	MJ709	-	-	-	1.2E-01	8.2E-02	3.3E-06	2.2E-06	3.3E-06
PCB-114	MJ709	-	-	-	4.5E-03	1.5E-03	1.2E-07	3.9E-08	1.2E-07
PCB-118	MJ709	-	-	-	2.7E-01	1.6E-01	7.2E-06	4.4E-06	7.2E-06
PCB-123	MJ709	-	-	-	3.0E-03	2.3E-03	8.1E-08	6.3E-08	8.1E-08
PCB-126	MJ709	-	-	-	7.5E-03	6.4E-03	2.0E-07	1.7E-07	2.0E-07
PCB-156	MJ709	-	-	-	6.3E-02	5.5E-02	1.7E-06	1.5E-06	1.7E-06
PCB-157	MJ709	-	-	-	1.2E-02	2.5E-02	3.3E-07	6.6E-07	6.6E-07
PCB-167	MJ709	-	-	-	2.1E-02	4.3E-02	5.6E-07	1.2E-06	1.2E-06
PCB-169	MJ709	-	-	-	3.7E-04	6.4E-04	9.9E-09	1.7E-08	1.7E-08
PCB-189	MJ709	-	-	-	3.0E-03	6.4E-03	8.1E-08	1.7E-07	1.7E-07
PCB-77	MJ709	-	-	-	1.5E-02	1.3E-02	4.2E-07	3.4E-07	4.2E-07
PCB-81	MJ709	-	-	-	3.0E-03	2.3E-03	8.1E-08	6.1E-08	8.1E-08
Aroclor-1254	MJ710	7.9E-02	4.0E-02	U	-	-	-	-	-
Aroclor-1260	MJ710	2.3E-01	2.3E-01		-	-	-	-	-
PCB-105	MJ710	-	-	-	1.2E-01	8.2E-02	4.9E-06	1.9E-05	1.9E-05
PCB-114	MJ710	-	-	-	4.5E-03	1.5E-03	1.8E-07	3.3E-07	3.3E-07
PCB-118	MJ710	-	-	-	2.7E-01	1.6E-01	1.1E-05	3.8E-05	3.8E-05
PCB-123	MJ710	-	-	-	3.0E-03	2.3E-03	1.2E-07	5.3E-07	5.3E-07
PCB-126	MJ710	-	-	-	7.5E-03	6.4E-03	3.0E-07	1.5E-06	1.5E-06
PCB-156	MJ710	-	-	-	6.3E-02	5.5E-02	2.5E-06	1.3E-05	1.3E-05
PCB-157	MJ710	-	-	-	1.2E-02	2.5E-02	4.9E-07	5.6E-06	5.6E-06
PCB-167	MJ710	-	-	-	2.1E-02	4.3E-02	8.1E-07	9.8E-06	9.8E-06
PCB-169	MJ710	-	-	-	3.7E-04	6.4E-04	1.4E-08	1.5E-07	1.5E-07
PCB-189	MJ710	-	-	-	3.0E-03	6.4E-03	1.2E-07	1.5E-06	1.5E-06
PCB-77	MJ710	-	-	-	1.5E-02	1.3E-02	6.1E-07	2.9E-06	2.9E-06
PCB-81	MJ710	-	-	-	3.0E-03	2.3E-03	1.2E-07	5.2E-07	5.2E-07
Aroclor-1254	MJ739	8.4E-02	4.2E-02	U	-	-	-	-	-
Aroclor-1260	MJ739	8.4E-02	4.2E-02	U	-	-	-	-	-
PCB-105	MJ739	-	-	-	1.2E-01	8.2E-02	5.2E-06	3.4E-06	5.2E-06
PCB-114	MJ739	-	-	-	4.5E-03	1.5E-03	1.9E-07	6.1E-08	1.9E-07
PCB-118	MJ739	-	-	-	2.7E-01	1.6E-01	1.1E-05	6.9E-06	1.1E-05
PCB-123	MJ739	-	-	-	3.0E-03	2.3E-03	1.3E-07	9.7E-08	1.3E-07
PCB-126	MJ739	-	-	-	7.5E-03	6.4E-03	3.2E-07	2.7E-07	3.2E-07
PCB-156	MJ739	-	-	-	6.3E-02	5.5E-02	2.6E-06	2.3E-06	2.6E-06
PCB-157	MJ739	-	-	-	1.2E-02	2.5E-02	5.2E-07	1.0E-06	1.0E-06
PCB-167	MJ739	-	-	-	2.1E-02	4.3E-02	8.7E-07	1.8E-06	1.8E-06
PCB-169	MJ739	-	-	-	3.7E-04	6.4E-04	1.5E-08	2.7E-08	2.7E-08
PCB-189	MJ739	-	-	-	3.0E-03	6.4E-03	1.3E-07	2.7E-07	2.7E-07
PCB-77	MJ739	-	-	-	1.5E-02	1.3E-02	6.5E-07	5.3E-07	6.5E-07
PCB-81	MJ739	-	-	-	3.0E-03	2.3E-03	1.3E-07	9.5E-08	1.3E-07
Aroclor-1254	MJ744	2.6E-01	2.6E-01		-	-	-	-	-
Aroclor-1260	MJ744	9.2E-02	4.6E-02	U	-	-	-	-	-
PCB-105	MJ744	-	-	-	1.2E-01	8.2E-02	3.2E-05	3.8E-06	3.2E-05
PCB-114	MJ744	-	-	-	4.5E-03	1.5E-03	1.2E-06	6.7E-08	1.2E-06
PCB-118	MJ744	-	-	-	2.7E-01	1.6E-01	7.0E-05	7.5E-06	7.0E-05
PCB-123	MJ744	-	-	-	3.0E-03	2.3E-03	7.8E-07	1.1E-07	7.8E-07
PCB-126	MJ744	-	-	-	7.5E-03	6.4E-03	2.0E-06	2.9E-07	2.0E-06
PCB-156	MJ744	-	-	-	6.3E-02	5.5E-02	1.6E-05	2.5E-06	1.6E-05
PCB-157	MJ744	-	-	-	1.2E-02	2.5E-02	3.2E-06	1.1E-06	3.2E-06
PCB-167	MJ744	-	-	-	2.1E-02	4.3E-02	5.4E-06	2.0E-06	5.4E-06
PCB-169	MJ744	-	-	-	3.7E-04	6.4E-04	9.5E-08	2.9E-08	9.5E-08
PCB-189	MJ744	-	-	-	3.0E-03	6.4E-03	7.8E-07	2.9E-07	7.8E-07
PCB-77	MJ744	-	-	-	1.5E-02	1.3E-02	4.0E-06	5.9E-07	4.0E-06
PCB-81	MJ744	-	-	-	3.0E-03	2.3E-03	7.8E-07	1.0E-07	7.8E-07
Aroclor-1254	MJ745	3.5E-01	3.5E-01		-	-	-	-	-
Aroclor-1260	MJ745	1.0E-01	5.0E-02	U	-	-	-	-	-
PCB-105	MJ745	-	-	-	1.2E-01	8.2E-02	4.3E-05	4.1E-06	4.3E-05
PCB-114	MJ745	-	-	-	4.5E-03	1.5E-03	1.6E-06	7.3E-08	1.6E-06

Aroclor to PCB Congener Extrapolation for Soil (0-2 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentrations (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF_{1254}	EF_{1260}	Estimated Concentrations Aroclor-1254 (mg/kg)	Estimated Concentrations Aroclor-1260 (mg/kg)	Estimated Concentrations PCB_{MAX} (mg/kg)
PCB-118	MJ745	-	-	-	2.7E-01	1.6E-01	9.4E-05	8.2E-06	9.4E-05
PCB-123	MJ745	-	-	-	3.0E-03	2.3E-03	1.0E-06	1.2E-07	1.0E-06
PCB-126	MJ745	-	-	-	7.5E-03	6.4E-03	2.6E-06	3.2E-07	2.6E-06
PCB-156	MJ745	-	-	-	6.3E-02	5.5E-02	2.2E-05	2.7E-06	2.2E-05
PCB-157	MJ745	-	-	-	1.2E-02	2.5E-02	4.3E-06	1.2E-06	4.3E-06
PCB-167	MJ745	-	-	-	2.1E-02	4.3E-02	7.2E-06	2.1E-06	7.2E-06
PCB-169	MJ745	-	-	-	3.7E-04	6.4E-04	1.3E-07	3.2E-08	1.3E-07
PCB-189	MJ745	-	-	-	3.0E-03	6.4E-03	1.0E-06	3.2E-07	1.0E-06
PCB-77	MJ745	-	-	-	1.5E-02	1.3E-02	5.4E-06	6.4E-07	5.4E-06
PCB-81	MJ745	-	-	-	3.0E-03	2.3E-03	1.0E-06	1.1E-07	1.0E-06
Aroclor-1254	MJ748	2.2E-01	2.2E-01	J	-	-	-	-	-
Aroclor-1260	MJ748	2.0E-01	2.0E-01	J	-	-	-	-	-
PCB-105	MJ748	-	-	-	1.2E-01	8.2E-02	2.7E-05	1.6E-05	2.7E-05
PCB-114	MJ748	-	-	-	4.5E-03	1.5E-03	1.0E-06	2.9E-07	1.0E-06
PCB-118	MJ748	-	-	-	2.7E-01	1.6E-01	5.9E-05	3.3E-05	5.9E-05
PCB-123	MJ748	-	-	-	3.0E-03	2.3E-03	6.6E-07	4.6E-07	6.6E-07
PCB-126	MJ748	-	-	-	7.5E-03	6.4E-03	1.7E-06	1.3E-06	1.7E-06
PCB-156	MJ748	-	-	-	6.3E-02	5.5E-02	1.4E-05	1.1E-05	1.4E-05
PCB-157	MJ748	-	-	-	1.2E-02	2.5E-02	2.7E-06	4.9E-06	4.9E-06
PCB-167	MJ748	-	-	-	2.1E-02	4.3E-02	4.5E-06	8.5E-06	8.5E-06
PCB-169	MJ748	-	-	-	3.7E-04	6.4E-04	8.1E-08	1.3E-07	1.3E-07
PCB-189	MJ748	-	-	-	3.0E-03	6.4E-03	6.6E-07	1.3E-06	1.3E-06
PCB-77	MJ748	-	-	-	1.5E-02	1.3E-02	3.4E-06	2.5E-06	3.4E-06
PCB-81	MJ748	-	-	-	3.0E-03	2.3E-03	6.6E-07	4.5E-07	6.6E-07
Aroclor-1254	MJ750	4.6E-01	4.6E-01	J	-	-	-	-	-
Aroclor-1260	MJ750	2.0E-01	1.0E-01	UJ	-	-	-	-	-
PCB-105	MJ750	-	-	-	1.2E-01	8.2E-02	5.7E-05	8.2E-06	5.7E-05
PCB-114	MJ750	-	-	-	4.5E-03	1.5E-03	2.1E-06	1.5E-07	2.1E-06
PCB-118	MJ750	-	-	-	2.7E-01	1.6E-01	1.2E-04	1.6E-05	1.2E-04
PCB-123	MJ750	-	-	-	3.0E-03	2.3E-03	1.4E-06	2.3E-07	1.4E-06
PCB-126	MJ750	-	-	-	7.5E-03	6.4E-03	3.5E-06	6.4E-07	3.5E-06
PCB-156	MJ750	-	-	-	6.3E-02	5.5E-02	2.9E-05	5.5E-06	2.9E-05
PCB-157	MJ750	-	-	-	1.2E-02	2.5E-02	5.7E-06	2.5E-06	5.7E-06
PCB-167	MJ750	-	-	-	2.1E-02	4.3E-02	9.5E-06	4.3E-06	9.5E-06
PCB-169	MJ750	-	-	-	3.7E-04	6.4E-04	1.7E-07	6.4E-08	1.7E-07
PCB-189	MJ750	-	-	-	3.0E-03	6.4E-03	1.4E-06	6.4E-07	1.4E-06
PCB-77	MJ750	-	-	-	1.5E-02	1.3E-02	7.1E-06	1.3E-06	7.1E-06
PCB-81	MJ750	-	-	-	3.0E-03	2.3E-03	1.4E-06	2.3E-07	1.4E-06
Aroclor-1254	MJ752	8.9E-02	4.5E-02	UJ	-	-	-	-	-
Aroclor-1260	MJ752	8.9E-02	4.5E-02	UJ	-	-	-	-	-
PCB-105	MJ752	-	-	-	1.2E-01	8.2E-02	5.5E-06	3.6E-06	5.5E-06
PCB-114	MJ752	-	-	-	4.5E-03	1.5E-03	2.0E-07	6.5E-08	2.0E-07
PCB-118	MJ752	-	-	-	2.7E-01	1.6E-01	1.2E-05	7.3E-06	1.2E-05
PCB-123	MJ752	-	-	-	3.0E-03	2.3E-03	1.3E-07	1.0E-07	1.3E-07
PCB-126	MJ752	-	-	-	7.5E-03	6.4E-03	3.3E-07	2.8E-07	3.3E-07
PCB-156	MJ752	-	-	-	6.3E-02	5.5E-02	2.8E-06	2.4E-06	2.8E-06
PCB-157	MJ752	-	-	-	1.2E-02	2.5E-02	5.5E-07	1.1E-06	1.1E-06
PCB-167	MJ752	-	-	-	2.1E-02	4.3E-02	9.2E-07	1.9E-06	1.9E-06
PCB-169	MJ752	-	-	-	3.7E-04	6.4E-04	1.6E-08	2.8E-08	2.8E-08
PCB-189	MJ752	-	-	-	3.0E-03	6.4E-03	1.3E-07	2.8E-07	2.8E-07
PCB-77	MJ752	-	-	-	1.5E-02	1.3E-02	6.9E-07	5.7E-07	6.9E-07
PCB-81	MJ752	-	-	-	3.0E-03	2.3E-03	1.3E-07	1.0E-07	1.3E-07
Aroclor-1254	MJ754	2.4E-01	2.4E-01	J	-	-	-	-	-
Aroclor-1260	MJ754	1.1E-01	1.1E-01	J	-	-	-	-	-
PCB-105	MJ754	-	-	-	1.2E-01	8.2E-02	3.0E-05	9.0E-06	3.0E-05
PCB-114	MJ754	-	-	-	4.5E-03	1.5E-03	1.1E-06	1.6E-07	1.1E-06
PCB-118	MJ754	-	-	-	2.7E-01	1.6E-01	6.4E-05	1.8E-05	6.4E-05
PCB-123	MJ754	-	-	-	3.0E-03	2.3E-03	7.2E-07	2.6E-07	7.2E-07

Aroclor to PCB Congener Extrapolation for Soil (0-2 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentrations (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF_{1254}	EF_{1260}	Estimated Concentrations Aroclor-1254 (mg/kg)	Estimated Concentrations Aroclor-1260 (mg/kg)	Estimated Concentrations PCB_{MAX} (mg/kg)
PCB-126	MJ754	-	-	-	7.5E-03	6.4E-03	1.8E-06	7.0E-07	1.8E-06
PCB-156	MJ754	-	-	-	6.3E-02	5.5E-02	1.5E-05	6.0E-06	1.5E-05
PCB-157	MJ754	-	-	-	1.2E-02	2.5E-02	3.0E-06	2.7E-06	3.0E-06
PCB-167	MJ754	-	-	-	2.1E-02	4.3E-02	4.9E-06	4.7E-06	4.9E-06
PCB-169	MJ754	-	-	-	3.7E-04	6.4E-04	8.8E-08	7.0E-08	8.8E-08
PCB-189	MJ754	-	-	-	3.0E-03	6.4E-03	7.2E-07	7.0E-07	7.2E-07
PCB-77	MJ754	-	-	-	1.5E-02	1.3E-02	3.7E-06	1.4E-06	3.7E-06
PCB-81	MJ754	-	-	-	3.0E-03	2.3E-03	7.2E-07	2.5E-07	7.2E-07
Aroclor-1254	MJ756	6.0E-02	6.0E-02	J	-	-	-	-	-
Aroclor-1260	MJ756	8.4E-02	4.2E-02	UJ	-	-	-	-	-
PCB-105	MJ756	-	-	-	1.2E-01	8.2E-02	7.4E-06	3.4E-06	7.4E-06
PCB-114	MJ756	-	-	-	4.5E-03	1.5E-03	2.7E-07	6.1E-08	2.7E-07
PCB-118	MJ756	-	-	-	2.7E-01	1.6E-01	1.6E-05	6.9E-06	1.6E-05
PCB-123	MJ756	-	-	-	3.0E-03	2.3E-03	1.8E-07	9.7E-08	1.8E-07
PCB-126	MJ756	-	-	-	7.5E-03	6.4E-03	4.5E-07	2.7E-07	4.5E-07
PCB-156	MJ756	-	-	-	6.3E-02	5.5E-02	3.8E-06	2.3E-06	3.8E-06
PCB-157	MJ756	-	-	-	1.2E-02	2.5E-02	7.4E-07	1.0E-06	1.0E-06
PCB-167	MJ756	-	-	-	2.1E-02	4.3E-02	1.2E-06	1.8E-06	1.8E-06
PCB-169	MJ756	-	-	-	3.7E-04	6.4E-04	2.2E-08	2.7E-08	2.7E-08
PCB-189	MJ756	-	-	-	3.0E-03	6.4E-03	1.8E-07	2.7E-07	2.7E-07
PCB-77	MJ756	-	-	-	1.5E-02	1.3E-02	9.3E-07	5.3E-07	9.3E-07
PCB-81	MJ756	-	-	-	3.0E-03	2.3E-03	1.8E-07	9.5E-08	1.8E-07
Aroclor-1254	MJ781	8.9E-02	4.5E-02	U	-	-	-	-	-
Aroclor-1260	MJ781	8.9E-02	4.5E-02	U	-	-	-	-	-
PCB-105	MJ781	-	-	-	1.2E-01	8.2E-02	5.5E-06	3.6E-06	5.5E-06
PCB-114	MJ781	-	-	-	4.5E-03	1.5E-03	2.0E-07	6.5E-08	2.0E-07
PCB-118	MJ781	-	-	-	2.7E-01	1.6E-01	1.2E-05	7.3E-06	1.2E-05
PCB-123	MJ781	-	-	-	3.0E-03	2.3E-03	1.3E-07	1.0E-07	1.3E-07
PCB-126	MJ781	-	-	-	7.5E-03	6.4E-03	3.3E-07	2.8E-07	3.3E-07
PCB-156	MJ781	-	-	-	6.3E-02	5.5E-02	2.8E-06	2.4E-06	2.8E-06
PCB-157	MJ781	-	-	-	1.2E-02	2.5E-02	5.5E-07	1.1E-06	1.1E-06
PCB-167	MJ781	-	-	-	2.1E-02	4.3E-02	9.2E-07	1.9E-06	1.9E-06
PCB-169	MJ781	-	-	-	3.7E-04	6.4E-04	1.6E-08	2.8E-08	2.8E-08
PCB-189	MJ781	-	-	-	3.0E-03	6.4E-03	1.3E-07	2.8E-07	2.8E-07
PCB-77	MJ781	-	-	-	1.5E-02	1.3E-02	6.9E-07	5.7E-07	6.9E-07
PCB-81	MJ781	-	-	-	3.0E-03	2.3E-03	1.3E-07	1.0E-07	1.3E-07
Aroclor-1254	MJ782RE	5.4E+00	5.4E+00	J	-	-	-	-	-
Aroclor-1260	MJ782RE	4.3E-01	4.3E-01	J	-	-	-	-	-
PCB-105	MJ782RE	-	-	-	1.2E-01	8.2E-02	6.7E-04	3.5E-05	6.7E-04
PCB-114	MJ782RE	-	-	-	4.5E-03	1.5E-03	2.4E-05	6.3E-07	2.4E-05
PCB-118	MJ782RE	-	-	-	2.7E-01	1.6E-01	1.4E-03	7.0E-05	1.4E-03
PCB-123	MJ782RE	-	-	-	3.0E-03	2.3E-03	1.6E-05	1.0E-06	1.6E-05
PCB-126	MJ782RE	-	-	-	7.5E-03	6.4E-03	4.1E-05	2.7E-06	4.1E-05
PCB-156	MJ782RE	-	-	-	6.3E-02	5.5E-02	3.4E-04	2.3E-05	3.4E-04
PCB-157	MJ782RE	-	-	-	1.2E-02	2.5E-02	6.7E-05	1.1E-05	6.7E-05
PCB-167	MJ782RE	-	-	-	2.1E-02	4.3E-02	1.1E-04	1.8E-05	1.1E-04
PCB-169	MJ782RE	-	-	-	3.7E-04	6.4E-04	2.0E-06	2.7E-07	2.0E-06
PCB-189	MJ782RE	-	-	-	3.0E-03	6.4E-03	1.6E-05	2.7E-06	1.6E-05
PCB-77	MJ782RE	-	-	-	1.5E-02	1.3E-02	8.4E-05	5.5E-06	8.4E-05
PCB-81	MJ782RE	-	-	-	3.0E-03	2.3E-03	1.6E-05	9.7E-07	1.6E-05
Aroclor-1254	MJ783	8.9E-02	4.5E-02	U	-	-	-	-	-
Aroclor-1260	MJ783	8.9E-02	4.5E-02	U	-	-	-	-	-
PCB-105	MJ783	-	-	-	1.2E-01	8.2E-02	5.5E-06	3.6E-06	5.5E-06
PCB-114	MJ783	-	-	-	4.5E-03	1.5E-03	2.0E-07	6.5E-08	2.0E-07
PCB-118	MJ783	-	-	-	2.7E-01	1.6E-01	1.2E-05	7.3E-06	1.2E-05
PCB-123	MJ783	-	-	-	3.0E-03	2.3E-03	1.3E-07	1.0E-07	1.3E-07
PCB-126	MJ783	-	-	-	7.5E-03	6.4E-03	3.3E-07	2.8E-07	3.3E-07
PCB-156	MJ783	-	-	-	6.3E-02	5.5E-02	2.8E-06	2.4E-06	2.8E-06

Aroclor to PCB Congener Extrapolation for Soil (0-2 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentrations (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF_{1254}	EF_{1260}	Estimated Concentrations Aroclor-1254 (mg/kg)	Estimated Concentrations Aroclor-1260 (mg/kg)	Estimated Concentrations PCB_{MAX} (mg/kg)
PCB-157	MJ783	-	-	-	1.2E-02	2.5E-02	5.5E-07	1.1E-06	1.1E-06
PCB-167	MJ783	-	-	-	2.1E-02	4.3E-02	9.2E-07	1.9E-06	1.9E-06
PCB-169	MJ783	-	-	-	3.7E-04	6.4E-04	1.6E-08	2.8E-08	2.8E-08
PCB-189	MJ783	-	-	-	3.0E-03	6.4E-03	1.3E-07	2.8E-07	2.8E-07
PCB-77	MJ783	-	-	-	1.5E-02	1.3E-02	6.9E-07	5.7E-07	6.9E-07
PCB-81	MJ783	-	-	-	3.0E-03	2.3E-03	1.3E-07	1.0E-07	1.3E-07
Aroclor-1254	MJ784	8.6E+01	4.3E+01	U	-	-	-	-	-
Aroclor-1260	MJ784	6.3E+02	6.3E+02	J	-	-	-	-	-
PCB-105	MJ784	-	-	-	1.2E-01	8.2E-02	5.3E-03	5.2E-02	5.2E-02
PCB-114	MJ784	-	-	-	4.5E-03	1.5E-03	2.0E-04	9.2E-04	9.2E-04
PCB-118	MJ784	-	-	-	2.7E-01	1.6E-01	1.2E-02	1.0E-01	1.0E-01
PCB-123	MJ784	-	-	-	3.0E-03	2.3E-03	1.3E-04	1.5E-03	1.5E-03
PCB-126	MJ784	-	-	-	7.5E-03	6.4E-03	3.2E-04	4.0E-03	4.0E-03
PCB-156	MJ784	-	-	-	6.3E-02	5.5E-02	2.7E-03	3.4E-02	3.4E-02
PCB-157	MJ784	-	-	-	1.2E-02	2.5E-02	5.3E-04	1.5E-02	1.5E-02
PCB-167	MJ784	-	-	-	2.1E-02	4.3E-02	8.9E-04	2.7E-02	2.7E-02
PCB-169	MJ784	-	-	-	3.7E-04	6.4E-04	1.6E-05	4.0E-04	4.0E-04
PCB-189	MJ784	-	-	-	3.0E-03	6.4E-03	1.3E-04	4.0E-03	4.0E-03
PCB-77	MJ784	-	-	-	1.5E-02	1.3E-02	6.6E-04	8.0E-03	8.0E-03
PCB-81	MJ784	-	-	-	3.0E-03	2.3E-03	1.3E-04	1.4E-03	1.4E-03
Aroclor-1254	MJ786	9.4E-02	4.7E-02	U	-	-	-	-	-
Aroclor-1260	MJ786	9.4E-02	4.7E-02	U	-	-	-	-	-
PCB-105	MJ786	-	-	-	1.2E-01	8.2E-02	5.8E-06	3.8E-06	5.8E-06
PCB-114	MJ786	-	-	-	4.5E-03	1.5E-03	2.1E-07	6.8E-08	2.1E-07
PCB-118	MJ786	-	-	-	2.7E-01	1.6E-01	1.3E-05	7.7E-06	1.3E-05
PCB-123	MJ786	-	-	-	3.0E-03	2.3E-03	1.4E-07	1.1E-07	1.4E-07
PCB-126	MJ786	-	-	-	7.5E-03	6.4E-03	3.5E-07	3.0E-07	3.5E-07
PCB-156	MJ786	-	-	-	6.3E-02	5.5E-02	3.0E-06	2.6E-06	3.0E-06
PCB-157	MJ786	-	-	-	1.2E-02	2.5E-02	5.8E-07	1.2E-06	1.2E-06
PCB-167	MJ786	-	-	-	2.1E-02	4.3E-02	9.7E-07	2.0E-06	2.0E-06
PCB-169	MJ786	-	-	-	3.7E-04	6.4E-04	1.7E-08	3.0E-08	3.0E-08
PCB-189	MJ786	-	-	-	3.0E-03	6.4E-03	1.4E-07	3.0E-07	3.0E-07
PCB-77	MJ786	-	-	-	1.5E-02	1.3E-02	7.3E-07	6.0E-07	7.3E-07
PCB-81	MJ786	-	-	-	3.0E-03	2.3E-03	1.4E-07	1.1E-07	1.4E-07
Aroclor-1254	MJ787	2.5E-01	2.5E-01	J	-	-	-	-	-
Aroclor-1260	MJ787	9.6E-02	4.8E-02	U	-	-	-	-	-
PCB-105	MJ787	-	-	-	1.2E-01	8.2E-02	3.1E-05	3.9E-06	3.1E-05
PCB-114	MJ787	-	-	-	4.5E-03	1.5E-03	1.1E-06	7.0E-08	1.1E-06
PCB-118	MJ787	-	-	-	2.7E-01	1.6E-01	6.7E-05	7.9E-06	6.7E-05
PCB-123	MJ787	-	-	-	3.0E-03	2.3E-03	7.5E-07	1.1E-07	7.5E-07
PCB-126	MJ787	-	-	-	7.5E-03	6.4E-03	1.9E-06	3.1E-07	1.9E-06
PCB-156	MJ787	-	-	-	6.3E-02	5.5E-02	1.6E-05	2.6E-06	1.6E-05
PCB-157	MJ787	-	-	-	1.2E-02	2.5E-02	3.1E-06	1.2E-06	3.1E-06
PCB-167	MJ787	-	-	-	2.1E-02	4.3E-02	5.2E-06	2.1E-06	5.2E-06
PCB-169	MJ787	-	-	-	3.7E-04	6.4E-04	9.1E-08	3.1E-08	9.1E-08
PCB-189	MJ787	-	-	-	3.0E-03	6.4E-03	7.5E-07	3.1E-07	7.5E-07
PCB-77	MJ787	-	-	-	1.5E-02	1.3E-02	3.9E-06	6.1E-07	3.9E-06
PCB-81	MJ787	-	-	-	3.0E-03	2.3E-03	7.5E-07	1.1E-07	7.5E-07
Aroclor-1254	MJ788	9.1E-02	4.6E-02	U	-	-	-	-	-
Aroclor-1260	MJ788	9.1E-02	4.6E-02	U	-	-	-	-	-
PCB-105	MJ788	-	-	-	1.2E-01	8.2E-02	5.6E-06	3.7E-06	5.6E-06
PCB-114	MJ788	-	-	-	4.5E-03	1.5E-03	2.1E-07	6.6E-08	2.1E-07
PCB-118	MJ788	-	-	-	2.7E-01	1.6E-01	1.2E-05	7.4E-06	1.2E-05
PCB-123	MJ788	-	-	-	3.0E-03	2.3E-03	1.4E-07	1.1E-07	1.4E-07
PCB-126	MJ788	-	-	-	7.5E-03	6.4E-03	3.4E-07	2.9E-07	3.4E-07
PCB-156	MJ788	-	-	-	6.3E-02	5.5E-02	2.9E-06	2.5E-06	2.9E-06
PCB-157	MJ788	-	-	-	1.2E-02	2.5E-02	5.6E-07	1.1E-06	1.1E-06
PCB-167	MJ788	-	-	-	2.1E-02	4.3E-02	9.4E-07	1.9E-06	1.9E-06

Aroclor to PCB Congener Extrapolation for Soil (0-2 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentrations (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF_{1254}	EF_{1260}	Estimated Concentrations Aroclor-1254 (mg/kg)	Estimated Concentrations Aroclor-1260 (mg/kg)	Estimated Concentrations PCB_{MAX} (mg/kg)
PCB-169	MJ788	-	-	-	3.7E-04	6.4E-04	1.7E-08	2.9E-08	2.9E-08
PCB-189	MJ788	-	-	-	3.0E-03	6.4E-03	1.4E-07	2.9E-07	2.9E-07
PCB-77	MJ788	-	-	-	1.5E-02	1.3E-02	7.0E-07	5.8E-07	7.0E-07
PCB-81	MJ788	-	-	-	3.0E-03	2.3E-03	1.4E-07	1.0E-07	1.4E-07
Aroclor-1254	MJ789	5.6E-02	2.8E-02	U	-	-	-	-	-
Aroclor-1260	MJ789	5.6E-02	2.8E-02	U	-	-	-	-	-
PCB-105	MJ789	-	-	-	1.2E-01	8.2E-02	3.5E-06	2.3E-06	3.5E-06
PCB-114	MJ789	-	-	-	4.5E-03	1.5E-03	1.3E-07	4.1E-08	1.3E-07
PCB-118	MJ789	-	-	-	2.7E-01	1.6E-01	7.5E-06	4.6E-06	7.5E-06
PCB-123	MJ789	-	-	-	3.0E-03	2.3E-03	8.4E-08	6.5E-08	8.4E-08
PCB-126	MJ789	-	-	-	7.5E-03	6.4E-03	2.1E-07	1.8E-07	2.1E-07
PCB-156	MJ789	-	-	-	6.3E-02	5.5E-02	1.8E-06	1.5E-06	1.8E-06
PCB-157	MJ789	-	-	-	1.2E-02	2.5E-02	3.5E-07	6.9E-07	6.9E-07
PCB-167	MJ789	-	-	-	2.1E-02	4.3E-02	5.8E-07	1.2E-06	1.2E-06
PCB-169	MJ789	-	-	-	3.7E-04	6.4E-04	1.0E-08	1.8E-08	1.8E-08
PCB-189	MJ789	-	-	-	3.0E-03	6.4E-03	8.4E-08	1.8E-07	1.8E-07
PCB-77	MJ789	-	-	-	1.5E-02	1.3E-02	4.3E-07	3.6E-07	4.3E-07
PCB-81	MJ789	-	-	-	3.0E-03	2.3E-03	8.4E-08	6.3E-08	8.4E-08
Aroclor-1254	MJ790	9.1E-02	4.6E-02	U	-	-	-	-	-
Aroclor-1260	MJ790	9.1E-02	4.6E-02	U	-	-	-	-	-
PCB-105	MJ790	-	-	-	1.2E-01	8.2E-02	5.6E-06	3.7E-06	5.6E-06
PCB-114	MJ790	-	-	-	4.5E-03	1.5E-03	2.1E-07	6.6E-08	2.1E-07
PCB-118	MJ790	-	-	-	2.7E-01	1.6E-01	1.2E-05	7.4E-06	1.2E-05
PCB-123	MJ790	-	-	-	3.0E-03	2.3E-03	1.4E-07	1.1E-07	1.4E-07
PCB-126	MJ790	-	-	-	7.5E-03	6.4E-03	3.4E-07	2.9E-07	3.4E-07
PCB-156	MJ790	-	-	-	6.3E-02	5.5E-02	2.9E-06	2.5E-06	2.9E-06
PCB-157	MJ790	-	-	-	1.2E-02	2.5E-02	5.6E-07	1.1E-06	1.1E-06
PCB-167	MJ790	-	-	-	2.1E-02	4.3E-02	9.4E-07	1.9E-06	1.9E-06
PCB-169	MJ790	-	-	-	3.7E-04	6.4E-04	1.7E-08	2.9E-08	2.9E-08
PCB-189	MJ790	-	-	-	3.0E-03	6.4E-03	1.4E-07	2.9E-07	2.9E-07
PCB-77	MJ790	-	-	-	1.5E-02	1.3E-02	7.0E-07	5.8E-07	7.0E-07
PCB-81	MJ790	-	-	-	3.0E-03	2.3E-03	1.4E-07	1.0E-07	1.4E-07
Aroclor-1254	MJ791	8.6E-02	4.3E-02	U	-	-	-	-	-
Aroclor-1260	MJ791	8.6E-02	4.3E-02	U	-	-	-	-	-
PCB-105	MJ791	-	-	-	1.2E-01	8.2E-02	5.3E-06	3.5E-06	5.3E-06
PCB-114	MJ791	-	-	-	4.5E-03	1.5E-03	2.0E-07	6.3E-08	2.0E-07
PCB-118	MJ791	-	-	-	2.7E-01	1.6E-01	1.2E-05	7.0E-06	1.2E-05
PCB-123	MJ791	-	-	-	3.0E-03	2.3E-03	1.3E-07	1.0E-07	1.3E-07
PCB-126	MJ791	-	-	-	7.5E-03	6.4E-03	3.2E-07	2.7E-07	3.2E-07
PCB-156	MJ791	-	-	-	6.3E-02	5.5E-02	2.7E-06	2.3E-06	2.7E-06
PCB-157	MJ791	-	-	-	1.2E-02	2.5E-02	5.3E-07	1.1E-06	1.1E-06
PCB-167	MJ791	-	-	-	2.1E-02	4.3E-02	8.9E-07	1.8E-06	1.8E-06
PCB-169	MJ791	-	-	-	3.7E-04	6.4E-04	1.6E-08	2.7E-08	2.7E-08
PCB-189	MJ791	-	-	-	3.0E-03	6.4E-03	1.3E-07	2.7E-07	2.7E-07
PCB-77	MJ791	-	-	-	1.5E-02	1.3E-02	6.6E-07	5.5E-07	6.6E-07
PCB-81	MJ791	-	-	-	3.0E-03	2.3E-03	1.3E-07	9.7E-08	1.3E-07
Aroclor-1254	MJ794	9.0E-02	4.5E-02	U	-	-	-	-	-
Aroclor-1260	MJ794	9.0E-02	4.5E-02	U	-	-	-	-	-
PCB-105	MJ794	-	-	-	1.2E-01	8.2E-02	5.6E-06	3.7E-06	5.6E-06
PCB-114	MJ794	-	-	-	4.5E-03	1.5E-03	2.0E-07	6.5E-08	2.0E-07
PCB-118	MJ794	-	-	-	2.7E-01	1.6E-01	1.2E-05	7.4E-06	1.2E-05
PCB-123	MJ794	-	-	-	3.0E-03	2.3E-03	1.3E-07	1.0E-07	1.3E-07
PCB-126	MJ794	-	-	-	7.5E-03	6.4E-03	3.4E-07	2.9E-07	3.4E-07
PCB-156	MJ794	-	-	-	6.3E-02	5.5E-02	2.8E-06	2.5E-06	2.8E-06
PCB-157	MJ794	-	-	-	1.2E-02	2.5E-02	5.6E-07	1.1E-06	1.1E-06
PCB-167	MJ794	-	-	-	2.1E-02	4.3E-02	9.3E-07	1.9E-06	1.9E-06
PCB-169	MJ794	-	-	-	3.7E-04	6.4E-04	1.6E-08	2.9E-08	2.9E-08
PCB-189	MJ794	-	-	-	3.0E-03	6.4E-03	1.3E-07	2.9E-07	2.9E-07

Aroclor to PCB Congener Extrapolation for Soil (0-2 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentrations (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF_{1254}	EF_{1260}	Estimated Concentrations Aroclor-1254 (mg/kg)	Estimated Concentrations Aroclor-1260 (mg/kg)	Estimated Concentrations PCB_{MAX} (mg/kg)
PCB-77	MJ794	-	-	-	1.5E-02	1.3E-02	7.0E-07	5.7E-07	7.0E-07
PCB-81	MJ794	-	-	-	3.0E-03	2.3E-03	1.3E-07	1.0E-07	1.3E-07
Aroclor-1254	MJ795	1.0E-01	5.0E-02	U	-	-	-	-	-
Aroclor-1260	MJ795	1.0E-01	5.0E-02	U	-	-	-	-	-
PCB-105	MJ795	-	-	-	1.2E-01	8.2E-02	6.2E-06	4.1E-06	6.2E-06
PCB-114	MJ795	-	-	-	4.5E-03	1.5E-03	2.3E-07	7.3E-08	2.3E-07
PCB-118	MJ795	-	-	-	2.7E-01	1.6E-01	1.3E-05	8.2E-06	1.3E-05
PCB-123	MJ795	-	-	-	3.0E-03	2.3E-03	1.5E-07	1.2E-07	1.5E-07
PCB-126	MJ795	-	-	-	7.5E-03	6.4E-03	3.8E-07	3.2E-07	3.8E-07
PCB-156	MJ795	-	-	-	6.3E-02	5.5E-02	3.1E-06	2.7E-06	3.1E-06
PCB-157	MJ795	-	-	-	1.2E-02	2.5E-02	6.2E-07	1.2E-06	1.2E-06
PCB-167	MJ795	-	-	-	2.1E-02	4.3E-02	1.0E-06	2.1E-06	2.1E-06
PCB-169	MJ795	-	-	-	3.7E-04	6.4E-04	1.8E-08	3.2E-08	3.2E-08
PCB-189	MJ795	-	-	-	3.0E-03	6.4E-03	1.5E-07	3.2E-07	3.2E-07
PCB-77	MJ795	-	-	-	1.5E-02	1.3E-02	7.7E-07	6.4E-07	7.7E-07
PCB-81	MJ795	-	-	-	3.0E-03	2.3E-03	1.5E-07	1.1E-07	1.5E-07
Aroclor-1254	MJ796	1.9E-01	9.5E-02	U	-	-	-	-	-
Aroclor-1260	MJ796	1.9E-01	9.5E-02	U	-	-	-	-	-
PCB-105	MJ796	-	-	-	1.2E-01	8.2E-02	1.2E-05	7.8E-06	1.2E-05
PCB-114	MJ796	-	-	-	4.5E-03	1.5E-03	4.3E-07	1.4E-07	4.3E-07
PCB-118	MJ796	-	-	-	2.7E-01	1.6E-01	2.5E-05	1.6E-05	2.5E-05
PCB-123	MJ796	-	-	-	3.0E-03	2.3E-03	2.8E-07	2.2E-07	2.8E-07
PCB-126	MJ796	-	-	-	7.5E-03	6.4E-03	7.1E-07	6.0E-07	7.1E-07
PCB-156	MJ796	-	-	-	6.3E-02	5.5E-02	6.0E-06	5.2E-06	6.0E-06
PCB-157	MJ796	-	-	-	1.2E-02	2.5E-02	1.2E-06	2.3E-06	2.3E-06
PCB-167	MJ796	-	-	-	2.1E-02	4.3E-02	2.0E-06	4.1E-06	4.1E-06
PCB-169	MJ796	-	-	-	3.7E-04	6.4E-04	3.5E-08	6.0E-08	6.0E-08
PCB-189	MJ796	-	-	-	3.0E-03	6.4E-03	2.8E-07	6.0E-07	6.0E-07
PCB-77	MJ796	-	-	-	1.5E-02	1.3E-02	1.5E-06	1.2E-06	1.5E-06
PCB-81	MJ796	-	-	-	3.0E-03	2.3E-03	2.8E-07	2.1E-07	2.8E-07
Aroclor-1254	MJ798	8.4E-02	4.2E-02	U	-	-	-	-	-
Aroclor-1260	MJ798	8.4E-02	4.2E-02	U	-	-	-	-	-
PCB-105	MJ798	-	-	-	1.2E-01	8.2E-02	5.2E-06	3.4E-06	5.2E-06
PCB-114	MJ798	-	-	-	4.5E-03	1.5E-03	1.9E-07	6.1E-08	1.9E-07
PCB-118	MJ798	-	-	-	2.7E-01	1.6E-01	1.1E-05	6.9E-06	1.1E-05
PCB-123	MJ798	-	-	-	3.0E-03	2.3E-03	1.3E-07	9.7E-08	1.3E-07
PCB-126	MJ798	-	-	-	7.5E-03	6.4E-03	3.2E-07	2.7E-07	3.2E-07
PCB-156	MJ798	-	-	-	6.3E-02	5.5E-02	2.6E-06	2.3E-06	2.6E-06
PCB-157	MJ798	-	-	-	1.2E-02	2.5E-02	5.2E-07	1.0E-06	1.0E-06
PCB-167	MJ798	-	-	-	2.1E-02	4.3E-02	8.7E-07	1.8E-06	1.8E-06
PCB-169	MJ798	-	-	-	3.7E-04	6.4E-04	1.5E-08	2.7E-08	2.7E-08
PCB-189	MJ798	-	-	-	3.0E-03	6.4E-03	1.3E-07	2.7E-07	2.7E-07
PCB-77	MJ798	-	-	-	1.5E-02	1.3E-02	6.5E-07	5.3E-07	6.5E-07
PCB-81	MJ798	-	-	-	3.0E-03	2.3E-03	1.3E-07	9.5E-08	1.3E-07
Aroclor-1254	MJ799	8.2E-02	4.1E-02	U	-	-	-	-	-
Aroclor-1260	MJ799	8.2E-02	4.1E-02	U	-	-	-	-	-
PCB-105	MJ799	-	-	-	1.2E-01	8.2E-02	5.1E-06	3.4E-06	5.1E-06
PCB-114	MJ799	-	-	-	4.5E-03	1.5E-03	1.9E-07	6.0E-08	1.9E-07
PCB-118	MJ799	-	-	-	2.7E-01	1.6E-01	1.1E-05	6.7E-06	1.1E-05
PCB-123	MJ799	-	-	-	3.0E-03	2.3E-03	1.2E-07	9.5E-08	1.2E-07
PCB-126	MJ799	-	-	-	7.5E-03	6.4E-03	3.1E-07	2.6E-07	3.1E-07
PCB-156	MJ799	-	-	-	6.3E-02	5.5E-02	2.6E-06	2.2E-06	2.6E-06
PCB-157	MJ799	-	-	-	1.2E-02	2.5E-02	5.1E-07	1.0E-06	1.0E-06
PCB-167	MJ799	-	-	-	2.1E-02	4.3E-02	8.5E-07	1.8E-06	1.8E-06
PCB-169	MJ799	-	-	-	3.7E-04	6.4E-04	1.5E-08	2.6E-08	2.6E-08
PCB-189	MJ799	-	-	-	3.0E-03	6.4E-03	1.2E-07	2.6E-07	2.6E-07
PCB-77	MJ799	-	-	-	1.5E-02	1.3E-02	6.3E-07	5.2E-07	6.3E-07
PCB-81	MJ799	-	-	-	3.0E-03	2.3E-03	1.2E-07	9.2E-08	1.2E-07

Aroclor to PCB Congener Extrapolation for Soil (0-2 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentrations (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF_{1254}	EF_{1260}	Estimated Concentrations Aroclor-1254 (mg/kg)	Estimated Concentrations Aroclor-1260 (mg/kg)	Estimated Concentrations PCB_{MAX} (mg/kg)
Aroclor-1254	MJ800	8.1E-02	4.1E-02	U	-	-	-	-	-
Aroclor-1260	MJ800	8.1E-02	4.1E-02	U	-	-	-	-	-
PCB-105	MJ800	-	-	-	1.2E-01	8.2E-02	5.0E-06	3.3E-06	5.0E-06
PCB-114	MJ800	-	-	-	4.5E-03	1.5E-03	1.8E-07	5.9E-08	1.8E-07
PCB-118	MJ800	-	-	-	2.7E-01	1.6E-01	1.1E-05	6.6E-06	1.1E-05
PCB-123	MJ800	-	-	-	3.0E-03	2.3E-03	1.2E-07	9.4E-08	1.2E-07
PCB-126	MJ800	-	-	-	7.5E-03	6.4E-03	3.0E-07	2.6E-07	3.0E-07
PCB-156	MJ800	-	-	-	6.3E-02	5.5E-02	2.5E-06	2.2E-06	2.5E-06
PCB-157	MJ800	-	-	-	1.2E-02	2.5E-02	5.0E-07	9.9E-07	9.9E-07
PCB-167	MJ800	-	-	-	2.1E-02	4.3E-02	8.4E-07	1.7E-06	1.7E-06
PCB-169	MJ800	-	-	-	3.7E-04	6.4E-04	1.5E-08	2.6E-08	2.6E-08
PCB-189	MJ800	-	-	-	3.0E-03	6.4E-03	1.2E-07	2.6E-07	2.6E-07
PCB-77	MJ800	-	-	-	1.5E-02	1.3E-02	6.3E-07	5.2E-07	6.3E-07
PCB-81	MJ800	-	-	-	3.0E-03	2.3E-03	1.2E-07	9.1E-08	1.2E-07
Aroclor-1254	MJ803	9.6E-02	4.8E-02	U	-	-	-	-	-
Aroclor-1260	MJ803	9.6E-02	4.8E-02	U	-	-	-	-	-
PCB-105	MJ803	-	-	-	1.2E-01	8.2E-02	5.9E-06	3.9E-06	5.9E-06
PCB-114	MJ803	-	-	-	4.5E-03	1.5E-03	2.2E-07	7.0E-08	2.2E-07
PCB-118	MJ803	-	-	-	2.7E-01	1.6E-01	1.3E-05	7.9E-06	1.3E-05
PCB-123	MJ803	-	-	-	3.0E-03	2.3E-03	1.4E-07	1.1E-07	1.4E-07
PCB-126	MJ803	-	-	-	7.5E-03	6.4E-03	3.6E-07	3.1E-07	3.6E-07
PCB-156	MJ803	-	-	-	6.3E-02	5.5E-02	3.0E-06	2.6E-06	3.0E-06
PCB-157	MJ803	-	-	-	1.2E-02	2.5E-02	5.9E-07	1.2E-06	1.2E-06
PCB-167	MJ803	-	-	-	2.1E-02	4.3E-02	9.9E-07	2.1E-06	2.1E-06
PCB-169	MJ803	-	-	-	3.7E-04	6.4E-04	1.8E-08	3.1E-08	3.1E-08
PCB-189	MJ803	-	-	-	3.0E-03	6.4E-03	1.4E-07	3.1E-07	3.1E-07
PCB-77	MJ803	-	-	-	1.5E-02	1.3E-02	7.4E-07	6.1E-07	7.4E-07
PCB-81	MJ803	-	-	-	3.0E-03	2.3E-03	1.4E-07	1.1E-07	1.4E-07
Aroclor-1254	MJ805	9.4E-02	4.7E-02	U	-	-	-	-	-
Aroclor-1260	MJ805	9.4E-02	4.7E-02	U	-	-	-	-	-
PCB-105	MJ805	-	-	-	1.2E-01	8.2E-02	5.8E-06	3.8E-06	5.8E-06
PCB-114	MJ805	-	-	-	4.5E-03	1.5E-03	2.1E-07	6.8E-08	2.1E-07
PCB-118	MJ805	-	-	-	2.7E-01	1.6E-01	1.3E-05	7.7E-06	1.3E-05
PCB-123	MJ805	-	-	-	3.0E-03	2.3E-03	1.4E-07	1.1E-07	1.4E-07
PCB-126	MJ805	-	-	-	7.5E-03	6.4E-03	3.5E-07	3.0E-07	3.5E-07
PCB-156	MJ805	-	-	-	6.3E-02	5.5E-02	3.0E-06	2.6E-06	3.0E-06
PCB-157	MJ805	-	-	-	1.2E-02	2.5E-02	5.8E-07	1.2E-06	1.2E-06
PCB-167	MJ805	-	-	-	2.1E-02	4.3E-02	9.7E-07	2.0E-06	2.0E-06
PCB-169	MJ805	-	-	-	3.7E-04	6.4E-04	1.7E-08	3.0E-08	3.0E-08
PCB-189	MJ805	-	-	-	3.0E-03	6.4E-03	1.4E-07	3.0E-07	3.0E-07
PCB-77	MJ805	-	-	-	1.5E-02	1.3E-02	7.3E-07	6.0E-07	7.3E-07
PCB-81	MJ805	-	-	-	3.0E-03	2.3E-03	1.4E-07	1.1E-07	1.4E-07
Aroclor-1254	MJ806	8.6E-02	4.3E-02	U	-	-	-	-	-
Aroclor-1260	MJ806	8.6E-02	4.3E-02	U	-	-	-	-	-
PCB-105	MJ806	-	-	-	1.2E-01	8.2E-02	5.3E-06	3.5E-06	5.3E-06
PCB-114	MJ806	-	-	-	4.5E-03	1.5E-03	2.0E-07	6.3E-08	2.0E-07
PCB-118	MJ806	-	-	-	2.7E-01	1.6E-01	1.2E-05	7.0E-06	1.2E-05
PCB-123	MJ806	-	-	-	3.0E-03	2.3E-03	1.3E-07	1.0E-07	1.3E-07
PCB-126	MJ806	-	-	-	7.5E-03	6.4E-03	3.2E-07	2.7E-07	3.2E-07
PCB-156	MJ806	-	-	-	6.3E-02	5.5E-02	2.7E-06	2.3E-06	2.7E-06
PCB-157	MJ806	-	-	-	1.2E-02	2.5E-02	5.3E-07	1.1E-06	1.1E-06
PCB-167	MJ806	-	-	-	2.1E-02	4.3E-02	8.9E-07	1.8E-06	1.8E-06
PCB-169	MJ806	-	-	-	3.7E-04	6.4E-04	1.6E-08	2.7E-08	2.7E-08
PCB-189	MJ806	-	-	-	3.0E-03	6.4E-03	1.3E-07	2.7E-07	2.7E-07
PCB-77	MJ806	-	-	-	1.5E-02	1.3E-02	6.6E-07	5.5E-07	6.6E-07
PCB-81	MJ806	-	-	-	3.0E-03	2.3E-03	1.3E-07	9.7E-08	1.3E-07
Aroclor-1254	MJ808	8.9E+00	4.5E+00	U	-	-	-	-	-
Aroclor-1260	MJ808	8.9E+00	4.5E+00	U	-	-	-	-	-

Aroclor to PCB Congener Extrapolation for Soil (0-2 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentrations (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF_{1254}	EF_{1260}	Estimated Concentrations Aroclor-1254 (mg/kg)	Estimated Concentrations Aroclor-1260 (mg/kg)	Estimated Concentrations PCB_{MAX} (mg/kg)
PCB-105	MJ808	-	-	-	1.2E-01	8.2E-02	5.5E-04	3.6E-04	5.5E-04
PCB-114	MJ808	-	-	-	4.5E-03	1.5E-03	2.0E-05	6.5E-06	2.0E-05
PCB-118	MJ808	-	-	-	2.7E-01	1.6E-01	1.2E-03	7.3E-04	1.2E-03
PCB-123	MJ808	-	-	-	3.0E-03	2.3E-03	1.3E-05	1.0E-05	1.3E-05
PCB-126	MJ808	-	-	-	7.5E-03	6.4E-03	3.3E-05	2.8E-05	3.3E-05
PCB-156	MJ808	-	-	-	6.3E-02	5.5E-02	2.8E-04	2.4E-04	2.8E-04
PCB-157	MJ808	-	-	-	1.2E-02	2.5E-02	5.5E-05	1.1E-04	1.1E-04
PCB-167	MJ808	-	-	-	2.1E-02	4.3E-02	9.2E-05	1.9E-04	1.9E-04
PCB-169	MJ808	-	-	-	3.7E-04	6.4E-04	1.6E-06	2.8E-06	2.8E-06
PCB-189	MJ808	-	-	-	3.0E-03	6.4E-03	1.3E-05	2.8E-05	2.8E-05
PCB-77	MJ808	-	-	-	1.5E-02	1.3E-02	6.9E-05	5.7E-05	6.9E-05
PCB-81	MJ808	-	-	-	3.0E-03	2.3E-03	1.3E-05	1.0E-05	1.3E-05
Aroclor-1254	MJ814	5.6E-02	2.8E-02	U	-	-	-	-	-
Aroclor-1260	MJ814	5.6E-02	2.8E-02	U	-	-	-	-	-
PCB-105	MJ814	-	-	-	1.2E-01	8.2E-02	3.5E-06	2.3E-06	3.5E-06
PCB-114	MJ814	-	-	-	4.5E-03	1.5E-03	1.3E-07	4.1E-08	1.3E-07
PCB-118	MJ814	-	-	-	2.7E-01	1.6E-01	7.5E-06	4.6E-06	7.5E-06
PCB-123	MJ814	-	-	-	3.0E-03	2.3E-03	8.4E-08	6.5E-08	8.4E-08
PCB-126	MJ814	-	-	-	7.5E-03	6.4E-03	2.1E-07	1.8E-07	2.1E-07
PCB-156	MJ814	-	-	-	6.3E-02	5.5E-02	1.8E-06	1.5E-06	1.8E-06
PCB-157	MJ814	-	-	-	1.2E-02	2.5E-02	3.5E-07	6.9E-07	6.9E-07
PCB-167	MJ814	-	-	-	2.1E-02	4.3E-02	5.8E-07	1.2E-06	1.2E-06
PCB-169	MJ814	-	-	-	3.7E-04	6.4E-04	1.0E-08	1.8E-08	1.8E-08
PCB-189	MJ814	-	-	-	3.0E-03	6.4E-03	8.4E-08	1.8E-07	1.8E-07
PCB-77	MJ814	-	-	-	1.5E-02	1.3E-02	4.3E-07	3.6E-07	4.3E-07
PCB-81	MJ814	-	-	-	3.0E-03	2.3E-03	8.4E-08	6.3E-08	8.4E-08
Aroclor-1254	MT801	5.1E-02	2.6E-02	U	-	-	-	-	-
Aroclor-1260	MT801	5.1E-02	2.6E-02	U	-	-	-	-	-
PCB-105	MT801	-	-	-	1.2E-01	8.2E-02	3.2E-06	2.1E-06	3.2E-06
PCB-114	MT801	-	-	-	4.5E-03	1.5E-03	1.2E-07	3.7E-08	1.2E-07
PCB-118	MT801	-	-	-	2.7E-01	1.6E-01	6.8E-06	4.2E-06	6.8E-06
PCB-123	MT801	-	-	-	3.0E-03	2.3E-03	7.6E-08	5.9E-08	7.6E-08
PCB-126	MT801	-	-	-	7.5E-03	6.4E-03	1.9E-07	1.6E-07	1.9E-07
PCB-156	MT801	-	-	-	6.3E-02	5.5E-02	1.6E-06	1.4E-06	1.6E-06
PCB-157	MT801	-	-	-	1.2E-02	2.5E-02	3.2E-07	6.3E-07	6.3E-07
PCB-167	MT801	-	-	-	2.1E-02	4.3E-02	5.3E-07	1.1E-06	1.1E-06
PCB-169	MT801	-	-	-	3.7E-04	6.4E-04	9.3E-09	1.6E-08	1.6E-08
PCB-189	MT801	-	-	-	3.0E-03	6.4E-03	7.6E-08	1.6E-07	1.6E-07
PCB-77	MT801	-	-	-	1.5E-02	1.3E-02	3.9E-07	3.2E-07	3.9E-07
PCB-81	MT801	-	-	-	3.0E-03	2.3E-03	7.6E-08	5.7E-08	7.6E-08
Aroclor-1254	MT802	5.1E-02	2.6E-02	U	-	-	-	-	-
Aroclor-1260	MT802	5.1E-02	2.6E-02	U	-	-	-	-	-
PCB-105	MT802	-	-	-	1.2E-01	8.2E-02	3.2E-06	2.1E-06	3.2E-06
PCB-114	MT802	-	-	-	4.5E-03	1.5E-03	1.2E-07	3.7E-08	1.2E-07
PCB-118	MT802	-	-	-	2.7E-01	1.6E-01	6.8E-06	4.2E-06	6.8E-06
PCB-123	MT802	-	-	-	3.0E-03	2.3E-03	7.6E-08	5.9E-08	7.6E-08
PCB-126	MT802	-	-	-	7.5E-03	6.4E-03	1.9E-07	1.6E-07	1.9E-07
PCB-156	MT802	-	-	-	6.3E-02	5.5E-02	1.6E-06	1.4E-06	1.6E-06
PCB-157	MT802	-	-	-	1.2E-02	2.5E-02	3.2E-07	6.3E-07	6.3E-07
PCB-167	MT802	-	-	-	2.1E-02	4.3E-02	5.3E-07	1.1E-06	1.1E-06
PCB-169	MT802	-	-	-	3.7E-04	6.4E-04	9.3E-09	1.6E-08	1.6E-08
PCB-189	MT802	-	-	-	3.0E-03	6.4E-03	7.6E-08	1.6E-07	1.6E-07
PCB-77	MT802	-	-	-	1.5E-02	1.3E-02	3.9E-07	3.2E-07	3.9E-07
PCB-81	MT802	-	-	-	3.0E-03	2.3E-03	7.6E-08	5.7E-08	7.6E-08
Aroclor-1254	RJ777	3.5E-02	1.8E-02	U	-	-	-	-	-
Aroclor-1260	RJ777	3.5E-02	1.8E-02	U	-	-	-	-	-
PCB-105	RJ777	-	-	-	1.2E-01	8.2E-02	2.2E-06	1.4E-06	2.2E-06
PCB-114	RJ777	-	-	-	4.5E-03	1.5E-03	7.9E-08	2.5E-08	7.9E-08

Aroclor to PCB Congener Extrapolation for Soil (0-2 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentrations (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF_{1254}	EF_{1260}	Estimated Concentrations Aroclor-1254 (mg/kg)	Estimated Concentrations Aroclor-1260 (mg/kg)	Estimated Concentrations PCB_{MAX} (mg/kg)
PCB-118	RJ777	-	-	-	2.7E-01	1.6E-01	4.7E-06	2.9E-06	4.7E-06
PCB-123	RJ777	-	-	-	3.0E-03	2.3E-03	5.2E-08	4.1E-08	5.2E-08
PCB-126	RJ777	-	-	-	7.5E-03	6.4E-03	1.3E-07	1.1E-07	1.3E-07
PCB-156	RJ777	-	-	-	6.3E-02	5.5E-02	1.1E-06	9.5E-07	1.1E-06
PCB-157	RJ777	-	-	-	1.2E-02	2.5E-02	2.2E-07	4.3E-07	4.3E-07
PCB-167	RJ777	-	-	-	2.1E-02	4.3E-02	3.6E-07	7.5E-07	7.5E-07
PCB-169	RJ777	-	-	-	3.7E-04	6.4E-04	6.4E-09	1.1E-08	1.1E-08
PCB-189	RJ777	-	-	-	3.0E-03	6.4E-03	5.2E-08	1.1E-07	1.1E-07
PCB-77	RJ777	-	-	-	1.5E-02	1.3E-02	2.7E-07	2.2E-07	2.7E-07
PCB-81	RJ777	-	-	-	3.0E-03	2.3E-03	5.2E-08	3.9E-08	5.2E-08
Aroclor-1254	RJ782	6.7E-02	3.4E-02	U	-	-	-	-	-
Aroclor-1260	RJ782	6.7E-02	3.4E-02	U	-	-	-	-	-
PCB-105	RJ782	-	-	-	1.2E-01	8.2E-02	4.1E-06	2.7E-06	4.1E-06
PCB-114	RJ782	-	-	-	4.5E-03	1.5E-03	1.5E-07	4.9E-08	1.5E-07
PCB-118	RJ782	-	-	-	2.7E-01	1.6E-01	9.0E-06	5.5E-06	9.0E-06
PCB-123	RJ782	-	-	-	3.0E-03	2.3E-03	1.0E-07	7.8E-08	1.0E-07
PCB-126	RJ782	-	-	-	7.5E-03	6.4E-03	2.5E-07	2.1E-07	2.5E-07
PCB-156	RJ782	-	-	-	6.3E-02	5.5E-02	2.1E-06	1.8E-06	2.1E-06
PCB-157	RJ782	-	-	-	1.2E-02	2.5E-02	4.1E-07	8.2E-07	8.2E-07
PCB-167	RJ782	-	-	-	2.1E-02	4.3E-02	6.9E-07	1.4E-06	1.4E-06
PCB-169	RJ782	-	-	-	3.7E-04	6.4E-04	1.2E-08	2.1E-08	2.1E-08
PCB-189	RJ782	-	-	-	3.0E-03	6.4E-03	1.0E-07	2.1E-07	2.1E-07
PCB-77	RJ782	-	-	-	1.5E-02	1.3E-02	5.2E-07	4.3E-07	5.2E-07
PCB-81	RJ782	-	-	-	3.0E-03	2.3E-03	1.0E-07	7.5E-08	1.0E-07
Aroclor-1254	RS288	1.1E-01	5.5E-02	U	-	-	-	-	-
Aroclor-1260	RS288	1.1E-01	5.5E-02	U	-	-	-	-	-
PCB-105	RS288	-	-	-	1.2E-01	8.2E-02	6.8E-06	4.5E-06	6.8E-06
PCB-114	RS288	-	-	-	4.5E-03	1.5E-03	2.5E-07	8.0E-08	2.5E-07
PCB-118	RS288	-	-	-	2.7E-01	1.6E-01	1.5E-05	9.0E-06	1.5E-05
PCB-123	RS288	-	-	-	3.0E-03	2.3E-03	1.6E-07	1.3E-07	1.6E-07
PCB-126	RS288	-	-	-	7.5E-03	6.4E-03	4.1E-07	3.5E-07	4.1E-07
PCB-156	RS288	-	-	-	6.3E-02	5.5E-02	3.5E-06	3.0E-06	3.5E-06
PCB-157	RS288	-	-	-	1.2E-02	2.5E-02	6.8E-07	1.4E-06	1.4E-06
PCB-167	RS288	-	-	-	2.1E-02	4.3E-02	1.1E-06	2.4E-06	2.4E-06
PCB-169	RS288	-	-	-	3.7E-04	6.4E-04	2.0E-08	3.5E-08	3.5E-08
PCB-189	RS288	-	-	-	3.0E-03	6.4E-03	1.6E-07	3.5E-07	3.5E-07
PCB-77	RS288	-	-	-	1.5E-02	1.3E-02	8.5E-07	7.0E-07	8.5E-07
PCB-81	RS288	-	-	-	3.0E-03	2.3E-03	1.6E-07	1.2E-07	1.6E-07
Aroclor-1254	RS293	1.1E-01	5.5E-02	U	-	-	-	-	-
Aroclor-1260	RS293	1.1E-01	5.5E-02	U	-	-	-	-	-
PCB-105	RS293	-	-	-	1.2E-01	8.2E-02	6.8E-06	4.5E-06	6.8E-06
PCB-114	RS293	-	-	-	4.5E-03	1.5E-03	2.5E-07	8.0E-08	2.5E-07
PCB-118	RS293	-	-	-	2.7E-01	1.6E-01	1.5E-05	9.0E-06	1.5E-05
PCB-123	RS293	-	-	-	3.0E-03	2.3E-03	1.6E-07	1.3E-07	1.6E-07
PCB-126	RS293	-	-	-	7.5E-03	6.4E-03	4.1E-07	3.5E-07	4.1E-07
PCB-156	RS293	-	-	-	6.3E-02	5.5E-02	3.5E-06	3.0E-06	3.5E-06
PCB-157	RS293	-	-	-	1.2E-02	2.5E-02	6.8E-07	1.4E-06	1.4E-06
PCB-167	RS293	-	-	-	2.1E-02	4.3E-02	1.1E-06	2.4E-06	2.4E-06
PCB-169	RS293	-	-	-	3.7E-04	6.4E-04	2.0E-08	3.5E-08	3.5E-08
PCB-189	RS293	-	-	-	3.0E-03	6.4E-03	1.6E-07	3.5E-07	3.5E-07
PCB-77	RS293	-	-	-	1.5E-02	1.3E-02	8.5E-07	7.0E-07	8.5E-07
PCB-81	RS293	-	-	-	3.0E-03	2.3E-03	1.6E-07	1.2E-07	1.6E-07
Aroclor-1254	RS294	1.1E-01	5.5E-02	U	-	-	-	-	-
Aroclor-1260	RS294	1.1E-01	5.5E-02	U	-	-	-	-	-
PCB-105	RS294	-	-	-	1.2E-01	8.2E-02	6.8E-06	4.5E-06	6.8E-06
PCB-114	RS294	-	-	-	4.5E-03	1.5E-03	2.5E-07	8.0E-08	2.5E-07
PCB-118	RS294	-	-	-	2.7E-01	1.6E-01	1.5E-05	9.0E-06	1.5E-05
PCB-123	RS294	-	-	-	3.0E-03	2.3E-03	1.6E-07	1.3E-07	1.6E-07

Aroclor to PCB Congener Extrapolation for Soil (0-2 feet bgs)
Old Conservation Yard RFI Site

Chemical	EPA ID	Measured Concentrations (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF_{1254}	EF_{1260}	Estimated Concentrations Aroclor-1254 (mg/kg)	Estimated Concentrations Aroclor-1260 (mg/kg)	Estimated Concentrations PCB_{MAX} (mg/kg)
PCB-126	RS294	-	-	-	7.5E-03	6.4E-03	4.1E-07	3.5E-07	4.1E-07
PCB-156	RS294	-	-	-	6.3E-02	5.5E-02	3.5E-06	3.0E-06	3.5E-06
PCB-157	RS294	-	-	-	1.2E-02	2.5E-02	6.8E-07	1.4E-06	1.4E-06
PCB-167	RS294	-	-	-	2.1E-02	4.3E-02	1.1E-06	2.4E-06	2.4E-06
PCB-169	RS294	-	-	-	3.7E-04	6.4E-04	2.0E-08	3.5E-08	3.5E-08
PCB-189	RS294	-	-	-	3.0E-03	6.4E-03	1.6E-07	3.5E-07	3.5E-07
PCB-77	RS294	-	-	-	1.5E-02	1.3E-02	8.5E-07	7.0E-07	8.5E-07
PCB-81	RS294	-	-	-	3.0E-03	2.3E-03	1.6E-07	1.2E-07	1.6E-07
Aroclor-1254	RS320	1.1E-01	5.5E-02	U	-	-	-	-	-
Aroclor-1260	RS320	1.1E-01	5.5E-02	U	-	-	-	-	-
PCB-105	RS320	-	-	-	1.2E-01	8.2E-02	6.8E-06	4.5E-06	6.8E-06
PCB-114	RS320	-	-	-	4.5E-03	1.5E-03	2.5E-07	8.0E-08	2.5E-07
PCB-118	RS320	-	-	-	2.7E-01	1.6E-01	1.5E-05	9.0E-06	1.5E-05
PCB-123	RS320	-	-	-	3.0E-03	2.3E-03	1.6E-07	1.3E-07	1.6E-07
PCB-126	RS320	-	-	-	7.5E-03	6.4E-03	4.1E-07	3.5E-07	4.1E-07
PCB-156	RS320	-	-	-	6.3E-02	5.5E-02	3.5E-06	3.0E-06	3.5E-06
PCB-157	RS320	-	-	-	1.2E-02	2.5E-02	6.8E-07	1.4E-06	1.4E-06
PCB-167	RS320	-	-	-	2.1E-02	4.3E-02	1.1E-06	2.4E-06	2.4E-06
PCB-169	RS320	-	-	-	3.7E-04	6.4E-04	2.0E-08	3.5E-08	3.5E-08
PCB-189	RS320	-	-	-	3.0E-03	6.4E-03	1.6E-07	3.5E-07	3.5E-07
PCB-77	RS320	-	-	-	1.5E-02	1.3E-02	8.5E-07	7.0E-07	8.5E-07
PCB-81	RS320	-	-	-	3.0E-03	2.3E-03	1.6E-07	1.2E-07	1.6E-07
Aroclor-1254	RS323	2.2E+00	2.2E+00		-	-	-	-	-
Aroclor-1260	RS323	1.0E+00	5.0E-01	U	-	-	-	-	-
PCB-105	RS323	-	-	-	1.2E-01	8.2E-02	2.7E-04	4.1E-05	2.7E-04
PCB-114	RS323	-	-	-	4.5E-03	1.5E-03	1.0E-05	7.3E-07	1.0E-05
PCB-118	RS323	-	-	-	2.7E-01	1.6E-01	5.9E-04	8.2E-05	5.9E-04
PCB-123	RS323	-	-	-	3.0E-03	2.3E-03	6.6E-06	1.2E-06	6.6E-06
PCB-126	RS323	-	-	-	7.5E-03	6.4E-03	1.7E-05	3.2E-06	1.7E-05
PCB-156	RS323	-	-	-	6.3E-02	5.5E-02	1.4E-04	2.7E-05	1.4E-04
PCB-157	RS323	-	-	-	1.2E-02	2.5E-02	2.7E-05	1.2E-05	2.7E-05
PCB-167	RS323	-	-	-	2.1E-02	4.3E-02	4.5E-05	2.1E-05	4.5E-05
PCB-169	RS323	-	-	-	3.7E-04	6.4E-04	8.1E-07	3.2E-07	8.1E-07
PCB-189	RS323	-	-	-	3.0E-03	6.4E-03	6.6E-06	3.2E-06	6.6E-06
PCB-77	RS323	-	-	-	1.5E-02	1.3E-02	3.4E-05	6.4E-06	3.4E-05
PCB-81	RS323	-	-	-	3.0E-03	2.3E-03	6.6E-06	1.1E-06	6.6E-06

Notes:
PCBs - polychlorinated biphenyls
EF- Extrapolation Factor (ng congener/kg soil)/(µg Aroclor/kg soil)
"-" not applicable
mg/kg - milligrams per kilogram
ug/kg - micrograms per kilogram
ng/kg - nanograms per kilogram
bgs- below ground surface
PCB_{MAX} = the maximum of the extrapolated 1254 and 1260 concentrations

Exposure Point Concentrations for COPCs in Chatsworth Formation
Old Conservation Yard RFI Site

Chemical	Distribution Type	EPCs	
		CTE[a] (mg/L)	RME[a] (mg/L)
VOCs			
Chloromethane	NT	3.2E-04	3.2E-04
cis-1,2-Dichloroethene	NT	3.5E-04	3.5E-04
Trichloroethene	NT	4.3E-03	4.3E-03

Notes:

a. The maximum detected concentration.

COPC - chemical of potential concern

EPC - exposure point concentration

CTE - Central Tendency Exposure

RME - Reasonable Maximum Exposure

VOC - volatile organic compound

NT - data not tested for distribution due to sample size

"-" not applicable

mg/L - milligrams per liter

bgs - below ground surface

Spreadsheet C2-13a (1 of 1)

Exposure Point Concentrations for COPCs in Chatsworth Formation
Group 6 Reporting Area

Chemical	Distribution Type	EPCs	
		CTE[a] (mg/L)	RME[a] (mg/L)
Inorganic Compounds			
Copper	NT	1.8E-02	1.8E-02
Fluoride	NT	5.6E-01	5.6E-01
Nitrate	NT	1.4E+01	1.4E+01
Thallium	NT	5.4E-04	5.4E-04
VOCs			
1,1-Dichloroethane	NT	2.6E-03	2.6E-03
1,2-Dichloroethane	NT	9.0E-04	9.0E-04
Acetone	NT	1.6E-02	1.6E-02
Benzene	NT	5.8E-04	5.8E-04
Carbon disulfide	NT	2.6E-03	2.6E-03
Chloromethane	NT	3.2E-04	3.2E-04
cis-1,2-Dichloroethene	NT	5.1E-02	5.1E-02
Methylene chloride	NT	6.4E-04	6.4E-04
Toluene	NT	1.8E-03	1.8E-03
Trichloroethene	NT	1.0E-02	1.0E-02
Total Petroleum Hydrocarbons			
C14-C20(Diesel Range)	NT	5.0E-02	5.0E-02

Notes:
a. The maximum detected concentration.
COPC - chemical of potential concern
EPC - exposure point concentration
CTE - Central Tendency Exposure
RME - Reasonable Maximum Exposure
VOC - volatile organic compound
NT - data not tested for distribution due to sample size
"-" not applicable
mg/L - milligrams per liter
bgs - below ground surface

Exposure Point Concentrations for COPCs in Soil Vapor (0-10 feet bgs)
Old Conservation Yard RFI Site

Chemical	Distribution Type	CTE [a] (µg/L)	RME [b] (µg/L)	
1,1,1-Trichloroethane	NP	5.8E-01	7.3E-01	
1,1,2-Trichloro-1,2,2-trifluoroethane	NP	1.0E+00	1.9E+00	
1,1-Dichloroethene	NP	5.7E-01	7.0E-01	
Benzene	NT	5.0E-01	5.0E-01	d
Ethylbenzene	NT	2.2E-01	4.4E-01	c
p-Isopropyltoluene	NT	3.8E-01	3.8E-01	c
Methylene chloride	NT	5.0E-01	2.5E+01	d
Toluene	NT	4.6E-01	5.0E-01	d
Trichloroethene	NP	1.1E+00	3.6E+00	
m,p-Xylene	NT	5.0E-01	1.0E+00	d
o-Xylene	NT	1.0E-01	2.0E-01	c
Xylenes (Total)	NT	5.0E-01	1.0E+00	d

Notes:

a. Either the arithmetic mean concentration for two or more samples or the reported concentration for a single sample.

b. Either the 95% upper confidence limit (95% UCL) on the arithmetic mean for three or more samples, or the maximum concentration for less than three samples, or the maximum concentration in cases where the 95% UCL exceeds the maximum concentration.

c. Exposure point concentrations estimated using the soil to soil vapor partitioning component of the Johnson & Ettinger model

d. Exposure point concentrations estimated at one-half the soil vapor sample quantitation limit

µg/L - micrograms per liter volume

CTE- Central Tendency Exposure

RME- Reasonable Maximum Exposure

bgs- below ground surface

Exposure Point Concentrations for COPCs in Soil (0-10 feet bgs)
Old Conservation Yard RFI Site

Chemical	Distribution Type	EPCs		
		CTE[a] (mg/kg)	RME[b] (mg/kg)	
Inorganic Compounds				
Antimony	NP	2.3E+00	5.4E+00	
Barium	G	8.3E+01	8.9E+01	
Boron	N	4.4E+00	5.0E+00	
Cadmium	NP	5.2E-01	9.9E-01	
Copper	NP	1.3E+01	1.7E+01	
Lead	NP	1.7E+01	3.0E+01	
Mercury	NP	4.2E-01	2.7E+00	
Silver	NP	1.2E+00	2.5E+00	
Thallium	NP	9.8E-01	1.8E+00	
Zinc	NP	7.6E+01	1.2E+02	
VOCs				
1,1,1-Trichloroethane	NT	3.5E-03	3.5E-03	c
1,1,2-Trichloro-1,2,2-trifluoroethane	NT	1.5E-02	1.5E-02	c
1,1-Dichloroethene	NT	3.6E-03	3.6E-03	c
2-Butanone	NP	2.8E-02	1.1E-02	
Acetone	NP	3.0E-01	2.7E+00	
Benzene	NP	9.5E-04	1.9E-03	d
Ethylbenzene	NP	9.5E-04	1.9E-03	d
m,p-Xylene	NP	2.7E-03	5.6E-03	d
Methylene chloride	NP	3.8E-02	1.9E-01	
o-Xylene	NP	6.5E-04	1.3E-03	d
p-Isopropyltoluene	NT	1.9E-03	1.9E-03	
Toluene	NP	1.2E-03	2.7E-03	d
Trichloroethene	NT	3.5E-03	3.5E-03	c
Xylenes (total)	NP	3.9E-03	7.6E-03	d
SVOCs				
1-Methylnaphthalene	NP	1.2E-02	1.3E-02	
2-Methylnaphthalene	NP	1.5E-01	3.2E-01	d
Acenaphthene	NP	1.4E-01	5.2E-01	d
Acenaphthylene	NP	3.5E-02	1.1E-01	d
Anthracene	NP	1.0E-01	3.6E-01	d
Benzo(a)anthracene	NP	2.8E-02	1.4E-01	d
Benzo(a)pyrene	NP	2.8E-02	1.3E-01	d
Benzo(b)fluoranthene	NP	3.4E-02	1.5E-01	d
Benzo(e)pyrene	NP	6.3E-02	2.4E-01	d
Benzo(g,h,i)perylene	NP	7.1E-02	2.3E-01	d
Benzo(k)fluoranthene	NP	2.8E-02	1.3E-01	d
Chrysene	NP	4.4E-02	1.8E-01	d
Dibenz(a,h)anthracene	NP	2.2E-02	1.0E-01	d
Fluoranthene	NP	6.4E-02	3.1E-01	d
Fluorene	NP	1.4E-01	5.2E-01	d
Indeno(1,2,3-cd)pyrene	NP	2.6E-02	1.2E-01	d
Naphthalene	NP	5.4E-02	1.2E-01	d
Perylene	NP	3.6E-02	1.4E-01	d
Phenanthrene	NP	3.3E-01	1.3E+00	d
Pyrene	NP	6.7E-02	2.0E-01	d

Exposure Point Concentrations for COPCs in Soil (0-10 feet bgs)
Old Conservation Yard RFI Site

Chemical	Distribution Type	EPCs	
		CTE[a] (mg/kg)	RME[b] (mg/kg)
Total Petroleum Hydrocarbons			
C08-C11(Gasoline Range)	NP	8.1E+00	1.6E+01
C11-C14(Kerosene Range)	NP	9.1E+00	1.6E+01
C14-C20(Diesel Range)	NP	4.9E+01	1.8E+02
C20-C30(Lubricant Oil Range)	NP	2.1E+02	9.4E+02
C22-C40 (Heavy Oil)	NT	1.3E+03	4.0E+03
PCDD/PCDFs			
2,3,7,8-TCDD	LN	9.9E-07	2.0E-06
1,2,3,7,8-PeCDD	NP	5.7E-06	3.7E-05
1,2,3,4,7,8-HxCDD	LN	1.3E-05	5.4E-05
1,2,3,6,7,8-HxCDD	G	1.9E-05	4.1E-05
1,2,3,7,8,9-HxCDD	LN	1.6E-05	9.3E-05
1,2,3,4,6,7,8-HpCDD	LN	4.2E-04	2.6E-03
OCDD	G	3.2E-03	6.7E-03
2,3,7,8-TCDF	NP	2.2E-06	1.0E-05
1,2,3,7,8-PeCDF	LN	2.0E-06	9.4E-06
2,3,4,7,8-PeCDF	NT	4.9E-06	3.0E-05
1,2,3,4,7,8-HxCDF	LN	1.1E-05	6.0E-05
1,2,3,6,7,8-HxCDF	LN	4.8E-06	2.0E-05
2,3,4,6,7,8-HxCDF	NT	5.3E-06	3.0E-05
1,2,3,7,8,9-HxCDF	LN	2.4E-06	1.0E-05
1,2,3,4,6,7,8-HpCDF	G	4.9E-05	9.2E-05
1,2,3,4,7,8,9-HpCDF	LN	5.9E-06	1.2E-05
OCDF	G	1.5E-04	3.1E-04
PCBs			
Aroclor-1248	NP	3.9E+02	4.3E+03
Aroclor-1254	NP	9.9E-01	5.4E+00
Aroclor-1260	NP	1.0E+01	7.5E+01
PCB-105	NP	8.8E-04	6.2E-03
PCB-114	NP	1.6E-05	1.1E-04
PCB-118	NP	1.8E-03	1.2E-02
PCB-123	NP	2.5E-05	1.7E-04
PCB-126	NP	6.8E-05	4.8E-04
PCB-156	NP	5.8E-04	4.1E-03
PCB-157	NP	2.6E-04	1.8E-03
PCB-167	NP	4.5E-04	3.2E-03
PCB-169	NP	6.7E-06	4.8E-05
PCB-189	NP	6.7E-05	4.8E-04
PCB-77	NP	1.4E-04	9.6E-04
PCB-81	NP	2.4E-05	1.7E-04

Notes:

a. Either the arithmetic mean concentration for two or more samples or the reported concentration for a single sample.

b. Either the 95% upper confidence limit (95% UCL) on the arithmetic mean for three or more samples, or the maximum concentration for less than three samples, or the maximum concentration in cases where the 95% UCL exceeds the maximum concentration.

c. Exposure point concentrations estimated at one-half the sample quantitation limit

Exposure Point Concentrations for COPCs in Soil (0-10 feet bgs)
Old Conservation Yard RFI Site

Chemical	Distribution Type	EPCs	
		CTE[a] (mg/kg)	RME[b] (mg/kg)

for soil at 0 to 10 feet bgs.

d. Exposure point concentrations estimated in part following the methods for extrapolation of total petroleum hydrocarbons to petroleum constituents as described in Section 2.8 of the SRAM and as presented in Spreadsheet C2-17.

COPC - chemical of potential concern
EPC - exposure point concentration
CTE - Central Tendency Exposure
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCDD/PCDF - polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.
Type - distribution based on Omnibus test
N - normal distribution
LN - lognormal distribution
G - gamma distribution
NT - data not tested for distribution due to sample size
mg/kg - milligrams per kilogram
bgs - below ground surface

Exposure Point Concentrations for COPCs in Soil (0-2 feet bgs)
Old Conservation Yard RFI Site

Chemical	Distribution Type	EPCs CTE[a] (mg/kg)	EPCs RME[b] (mg/kg)	
Inorganic Compounds				
Boron	G	4.3E+00	5.2E+00	
Cadmium	NP	5.2E-01	9.9E-01	
Lead	LN	1.7E+01	2.1E+01	
Mercury	LN	5.0E-01	3.3E+00	
Silver	NP	8.6E-01	1.8E+00	
Thallium	NP	8.6E-01	1.7E+00	
Zinc	LN	6.6E+01	7.4E+01	
VOCs				
1,1,1-Trichloroethane	NT	3.0E-03	5.5E-03	c
1,1,2-Trichloro-1,2,2-trifluoroethane	NT	1.2E-02	2.1E-02	
1,1-Dichloroethene	NT	3.2E-03	5.5E-03	c
2-Butanone	NP	2.2E-02	1.1E-02	
Acetone	NP	3.5E-01	3.5E+00	
Benzene	NP	1.1E-03	2.5E-03	c
Ethylbenzene	NP	1.1E-03	2.5E-03	d
m,p-Xylene	NP	3.2E-03	7.2E-03	d
Methylene chloride	NP	4.1E-02	2.4E-01	
o-Xylene	NP	7.8E-04	1.7E-03	d
p-Isopropyltoluene	NT	1.9E-03	1.9E-03	
Toluene	NP	1.5E-03	3.6E-03	d
Trichloroethene	NP	3.0E-03	5.5E-03	c
Xylenes (total)	NP	4.7E-03	9.9E-03	d
SVOCs				
1-Methylnaphthalene	NP	1.2E-02	1.3E-02	
2-Methylnaphthalene	NP	1.7E-01	5.6E-01	d
Acenaphthene	NP	1.7E-01	7.0E-01	d
Acenaphthylene	NP	4.0E-02	1.4E-01	d
Anthracene	NP	1.2E-01	4.7E-01	d
Benzo(a)anthracene	NP	3.4E-02	1.8E-01	d
Benzo(a)pyrene	NP	3.4E-02	1.8E-01	d
Benzo(b)fluoranthene	NP	4.0E-02	2.0E-01	d
Benzo(e)pyrene	NP	7.1E-02	3.1E-01	d
Benzo(g,h,i)perylene	NP	8.3E-02	3.0E-01	d
Benzo(k)fluoranthene	NP	3.3E-02	1.8E-01	d
Chrysene	NP	5.4E-02	2.4E-01	d
Dibenz(a,h)anthracene	NP	2.5E-02	1.0E-01	d
Fluoranthene	NP	8.2E-02	4.3E-01	d
Fluorene	NP	1.7E-01	6.9E-01	d
Indeno(1,2,3-cd)pyrene	NP	3.0E-02	1.7E-01	d
Naphthalene	NP	6.3E-02	1.6E-01	d
Perylene	NP	4.0E-02	1.8E-01	d
Phenanthrene	NP	4.3E-01	1.9E+00	d
Pyrene	NP	8.2E-02	3.7E-01	d
Total Petroleum Hydrocarbons				
C08-C11(Gasoline Range)	NP	9.7E+00	2.2E+01	
C11-C14(Kerosene Range)	NP	1.1E+01	2.2E+01	
C14-C20(Diesel Range)	NP	6.5E+01	2.6E+02	
C20-C30(Lubricant Oil Range)	NP	2.9E+02	1.4E+03	
C22-C40 (Heavy Oil)	NT	2.5E+00	5.0E+00	

Exposure Point Concentrations for COPCs in Soil (0-2 feet bgs)
Old Conservation Yard RFI Site

Chemical	Distribution Type	EPCs	
		CTE[a] (mg/kg)	RME[b] (mg/kg)
PCDD/PCDFs			
2,3,7,8-TCDD	LN	1.0E-06	1.8E-06
1,2,3,7,8-PeCDD	NP	6.6E-06	5.2E-05
1,2,3,4,7,8-HxCDD	LN	1.4E-05	5.3E-05
1,2,3,6,7,8-HxCDD	LN	2.0E-05	1.0E-04
1,2,3,7,8,9-HxCDD	LN	1.8E-05	8.6E-05
1,2,3,4,6,7,8-HpCDD	LN	4.9E-04	2.9E-03
OCDD	G	3.7E-03	8.2E-03
2,3,7,8-TCDF	NP	2.2E-06	1.0E-05
1,2,3,7,8-PeCDF	LN	1.8E-06	9.5E-06
2,3,4,7,8-PeCDF	LN	5.1E-06	3.0E-05
1,2,3,4,7,8-HxCDF	LN	1.3E-05	6.2E-05
1,2,3,6,7,8-HxCDF	G	4.9E-06	1.0E-05
2,3,4,6,7,8-HxCDF	LN	5.2E-06	2.9E-05
1,2,3,7,8,9-HxCDF	LN	2.3E-06	1.0E-05
1,2,3,4,6,7,8-HpCDF	G	5.5E-05	1.2E-04
1,2,3,4,7,8,9-HpCDF	LN	7.2E-06	3.0E-05
OCDF	G	1.8E-04	4.1E-04
PCBs			
Aroclor-1248	NP	5.0E+02	5.5E+03
Aroclor-1254	NP	1.2E+00	5.4E+00
Aroclor-1260	NP	1.3E+01	1.4E+02
PCB-105	NP	1.1E-03	1.2E-02
PCB-114	NP	2.1E-05	2.1E-04
PCB-118	NP	2.2E-03	2.4E-02
PCB-123	NP	3.1E-05	3.3E-04
PCB-126	NP	8.6E-05	9.2E-04
PCB-156	NP	7.4E-04	7.9E-03
PCB-157	NP	3.3E-04	3.5E-03
PCB-167	NP	5.7E-04	6.1E-03
PCB-169	NP	8.5E-06	9.2E-05
PCB-189	NP	8.5E-05	9.2E-04
PCB-77	NP	1.7E-04	1.8E-03
PCB-81	NP	3.1E-05	3.2E-04

Notes:

a. Either the arithmetic mean concentration for two or more samples or the reported concentration for a single sample.

b. Either the 95% upper confidence limit (95% UCL) on the arithmetic mean for three or more samples, or the maximum concentration for less than three samples, or the maximum concentration in cases where the 95% UCL exceeds the maximum concentration.

c. Exposure point concentrations estimated at one-half the sample quantitation limit for soil at 0 to 2 feet bgs.

d. Exposure point concentrations estimated in part following the methods for extrapolation of total petroleum hydrocarbons to petroleum constituents as described in Section 2.8 of the SRAM and as presented in Spreadsheet C2-15.

COPC - chemical of potential concern
EPC - exposure point concentration
CTE - central tendency exposure
RME - reasonable maximum exposure
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCDD/PCDF - polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.
N - normal distribution
LN - lognormal distribution

Exposure Point Concentrations for COPCs in Soil (0-2 feet bgs)
Old Conservation Yard RFI Site

Chemical	Distribution Type	EPCs	
		CTE[a] (mg/kg)	RME[b] (mg/kg)

NP - nonparametric
G - gamma
NT - data not tested for distribution due to sample size
mg/kg - milligrams per kilogram
bgs - below ground surface

PCDD/PCDF Congener Group Summation for Soil (0-10 feet bgs)
Old Conservation Yard RFI Site

EPA ID	PCDD/PCDF Congener	Measured Concentration [a] (mg/kg)	Data Qualifier	Adjusted Concentration [b] (mg/kg)	Sum of PCDD/PCDF Congener Concentrations				
					Total Tetra (mg/kg)	Total Penta (mg/kg)	Total Hexa (mg/kg)	Total Hepta (mg/kg)	Total Octa (mg/kg)
MJ031	1,2,3,4,6,7,8-HpCDD	5.6E-04		5.6E-04	2.2E-06	1.6E-05	1.3E-04	6.2E-04	2.7E-03
MJ031	1,2,3,4,6,7,8-HpCDF	5.0E-05		5.0E-05					
MJ031	1,2,3,4,7,8,9-HpCDF	1.0E-05		1.0E-05					
MJ031	1,2,3,4,7,8-HxCDD	3.0E-05		3.0E-05					
MJ031	1,2,3,4,7,8-HxCDF	2.0E-05		2.0E-05					
MJ031	1,2,3,6,7,8-HxCDD	3.0E-05		3.0E-05					
MJ031	1,2,3,6,7,8-HxCDF	1.0E-05	UJ	5.0E-06					
MJ031	1,2,3,7,8,9-HxCDD	3.0E-05		3.0E-05					
MJ031	1,2,3,7,8,9-HxCDF	3.4E-06	J	3.4E-06					
MJ031	1,2,3,7,8-PeCDD	1.0E-05		1.0E-05					
MJ031	1,2,3,7,8-PeCDF	1.4E-06	J	1.4E-06					
MJ031	2,3,4,6,7,8-HxCDF	1.0E-05		1.0E-05					
MJ031	2,3,4,7,8-PeCDF	4.9E-06		4.9E-06					
MJ031	2,3,7,8-TCDD	1.4E-06		1.4E-06					
MJ031	2,3,7,8-TCDF	7.6E-07	J	7.6E-07					
MJ031	OCDD	2.5E-03		2.5E-03					
MJ031	OCDF	1.6E-04		1.6E-04					
MJ031	Total HpCDD	1.4E-03		1.4E-03					
MJ031	Total HpCDF	1.7E-04		1.7E-04					
MJ031	Total HxCDD	5.6E-04		5.6E-04					
MJ031	Total HxCDF	1.1E-04		1.1E-04					
MJ031	Total PeCDD	1.1E-04		1.1E-04					
MJ031	Total PeCDF	3.0E-05		3.0E-05					
MJ031	Total TCDD	2.0E-05		2.0E-05					
MJ031	Total TCDF	1.0E-05		1.0E-05					
MJ032	1,2,3,4,6,7,8-HpCDD	4.1E-04		4.1E-04	5.4E-07	3.6E-06	4.7E-05	4.5E-04	2.9E-03
MJ032	1,2,3,4,6,7,8-HpCDF	4.0E-05		4.0E-05					
MJ032	1,2,3,4,7,8,9-HpCDF	4.9E-06		4.9E-06					
MJ032	1,2,3,4,7,8-HxCDD	1.0E-05		1.0E-05					
MJ032	1,2,3,4,7,8-HxCDF	1.0E-05		1.0E-05					
MJ032	1,2,3,6,7,8-HxCDD	1.0E-05		1.0E-05					
MJ032	1,2,3,6,7,8-HxCDF	3.0E-06	J	3.0E-06					
MJ032	1,2,3,7,8,9-HxCDD	1.0E-05		1.0E-05					
MJ032	1,2,3,7,8,9-HxCDF	1.3E-06	J	1.3E-06					
MJ032	1,2,3,7,8-PeCDD	1.7E-06	J	1.7E-06					
MJ032	1,2,3,7,8-PeCDF	9.7E-07	U	4.9E-07					
MJ032	2,3,4,6,7,8-HxCDF	2.3E-06	J	2.3E-06					
MJ032	2,3,4,7,8-PeCDF	1.4E-06	J	1.4E-06					
MJ032	2,3,7,8-TCDD	2.6E-07	J	2.6E-07					
MJ032	2,3,7,8-TCDF	2.8E-07	J	2.8E-07					
MJ032	OCDD	2.7E-03	J	2.7E-03					
MJ032	OCDF	1.9E-04		1.9E-04					
MJ032	Total HpCDD	9.5E-04		9.5E-04					
MJ032	Total HpCDF	1.4E-04		1.4E-04					
MJ032	Total HxCDD	2.1E-04		2.1E-04					
MJ032	Total HxCDF	6.0E-05		6.0E-05					
MJ032	Total PeCDD	2.0E-05		2.0E-05					
MJ032	Total PeCDF	1.0E-05		1.0E-05					
MJ032	Total TCDD	3.6E-06		3.6E-06					
MJ032	Total TCDF	1.9E-06		1.9E-06					
RJ772	1,2,3,4,6,7,8-HpCDD	8.7E-04	J	8.7E-04	1.3E-05	4.0E-05	1.6E-04	1.0E-03	1.0E-02
RJ772	1,2,3,4,6,7,8-HpCDF	1.4E-04	J	1.4E-04					
RJ772	1,2,3,4,7,8,9-HpCDF	1.0E-05	UJ	5.0E-06					
RJ772	1,2,3,4,7,8-HxCDD	2.0E-05		2.0E-05					
RJ772	1,2,3,4,7,8-HxCDF	2.0E-05		2.0E-05					
RJ772	1,2,3,6,7,8-HxCDD	4.0E-05		4.0E-05					
RJ772	1,2,3,6,7,8-HxCDF	2.0E-05		2.0E-05					
RJ772	1,2,3,7,8,9-HxCDD	3.0E-05		3.0E-05					
RJ772	1,2,3,7,8,9-HxCDF	1.0E-05		1.0E-05					
RJ772	1,2,3,7,8-PeCDD	1.0E-05		1.0E-05					
RJ772	1,2,3,7,8-PeCDF	1.0E-05		1.0E-05					

PCDD/PCDF Congener Group Summation for Soil (0-10 feet bgs)
Old Conservation Yard RFI Site

EPA ID	PCDD/PCDF Congener	Measured Concentration [a] (mg/kg)	Data Qualifier	Adjusted Concentration [b] (mg/kg)	Sum of PCDD/PCDF Congener Concentrations				
					Total Tetra (mg/kg)	Total Penta (mg/kg)	Total Hexa (mg/kg)	Total Hepta (mg/kg)	Total Octa (mg/kg)
RJ772	2,3,4,6,7,8-HxCDF	2.0E-05		2.0E-05					
RJ772	2,3,4,7,8-PeCDF	2.0E-05		2.0E-05					
RJ772	2,3,7,8-TCDD	2.5E-06		2.5E-06					
RJ772	2,3,7,8-TCDF	1.0E-05	J	1.0E-05					
RJ772	OCDD	9.9E-03	J	9.9E-03					
RJ772	OCDF	2.3E-04	J	2.3E-04					
RJ772	Total HpCDD	2.9E-03	J	2.9E-03					
RJ772	Total HpCDF	3.8E-04	J	3.8E-04					
RJ772	Total HxCDD	5.3E-04		5.3E-04					
RJ772	Total HxCDF	3.1E-04		3.1E-04					
RJ772	Total PeCDD	1.2E-04		1.2E-04					
RJ772	Total PeCDF	2.0E-04		2.0E-04					
RJ772	Total TCDD	9.0E-05		9.0E-05					
RJ772	Total TCDF	2.5E-04	J	2.5E-04					
RJ774	1,2,3,4,6,7,8-HpCDD	1.0E-04	J	1.0E-04	2.7E-06	5.6E-06	3.7E-05	1.1E-04	8.1E-04
RJ774	1,2,3,4,6,7,8-HpCDF	1.0E-05		1.0E-05					
RJ774	1,2,3,4,7,8,9-HpCDF	4.9E-07	J	4.9E-07					
RJ774	1,2,3,4,7,8-HxCDD	2.5E-06	J	2.5E-06					
RJ774	1,2,3,4,7,8-HxCDF	1.7E-06	J	1.7E-06					
RJ774	1,2,3,6,7,8-HxCDD	2.0E-05		2.0E-05					
RJ774	1,2,3,6,7,8-HxCDF	2.2E-06	UJ	1.1E-06					
RJ774	1,2,3,7,8,9-HxCDD	1.0E-05		1.0E-05					
RJ774	1,2,3,7,8,9-HxCDF	4.6E-07	J	4.6E-07					
RJ774	1,2,3,7,8-PeCDD	2.3E-06	J	2.3E-06					
RJ774	1,2,3,7,8-PeCDF	1.5E-06	J	1.5E-06					
RJ774	2,3,4,6,7,8-HxCDF	1.5E-06	J	1.5E-06					
RJ774	2,3,4,7,8-PeCDF	1.8E-06	J	1.8E-06					
RJ774	2,3,7,8-TCDD	6.6E-07	J	6.6E-07					
RJ774	2,3,7,8-TCDF	2.0E-06	J	2.0E-06					
RJ774	OCDD	8.0E-04		8.0E-04					
RJ774	OCDF	1.0E-05		1.0E-05					
RJ774	Total HpCDD	3.8E-04	J	3.8E-04					
RJ774	Total HpCDF	2.0E-05		2.0E-05					
RJ774	Total HxCDD	1.4E-04		1.4E-04					
RJ774	Total HxCDF	1.0E-05		1.0E-05					
RJ774	Total PeCDD	3.0E-05		3.0E-05					
RJ774	Total PeCDF	1.0E-05		1.0E-05					
RJ774	Total TCDD	1.0E-05		1.0E-05					
RJ774	Total TCDF	3.0E-05	J	3.0E-05					
RJ776	1,2,3,4,6,7,8-HpCDD	1.0E-05		1.0E-05	5.2E-07	1.0E-06	3.0E-06	1.2E-05	1.0E-04
RJ776	1,2,3,4,6,7,8-HpCDF	1.7E-06	J	1.7E-06					
RJ776	1,2,3,4,7,8,9-HpCDF	9.7E-07	U	4.9E-07					
RJ776	1,2,3,4,7,8-HxCDD	6.0E-07	U	3.0E-07					
RJ776	1,2,3,4,7,8-HxCDF	5.8E-07	UJ	2.9E-07					
RJ776	1,2,3,6,7,8-HxCDD	9.0E-07	UJ	4.5E-07					
RJ776	1,2,3,6,7,8-HxCDF	9.5E-07	J	9.5E-07					
RJ776	1,2,3,7,8,9-HxCDD	9.3E-07	U	4.7E-07					
RJ776	1,2,3,7,8,9-HxCDF	4.9E-07	U	2.5E-07					
RJ776	1,2,3,7,8-PeCDD	5.2E-07	U	2.6E-07					
RJ776	1,2,3,7,8-PeCDF	7.5E-07	U	3.8E-07					
RJ776	2,3,4,6,7,8-HxCDF	6.3E-07	U	3.2E-07					
RJ776	2,3,4,7,8-PeCDF	3.7E-07	J	3.7E-07					
RJ776	2,3,7,8-TCDD	6.1E-07	U	3.1E-07					
RJ776	2,3,7,8-TCDF	4.3E-07	U	2.2E-07					
RJ776	OCDD	1.0E-04		1.0E-04					
RJ776	OCDF	4.3E-06	J	4.3E-06					
RJ776	Total HpCDD	2.0E-05		2.0E-05					
RJ776	Total HpCDF	4.7E-06	J	4.7E-06					
RJ776	Total HxCDD	1.0E-05		1.0E-05					
RJ776	Total HxCDF	3.8E-06	J	3.8E-06					
RJ776	Total PeCDD	5.2E-07	U	2.6E-07					

PCDD/PCDF Congener Group Summation for Soil (0-10 feet bgs)
Old Conservation Yard RFI Site

EPA ID	PCDD/PCDF Congener	Measured Concentration [a] (mg/kg)	Data Qualifier	Adjusted Concentration [b] (mg/kg)	Sum of PCDD/PCDF Congener Concentrations				
					Total Tetra (mg/kg)	Total Penta (mg/kg)	Total Hexa (mg/kg)	Total Hepta (mg/kg)	Total Octa (mg/kg)
RJ776	Total PeCDF	1.0E-06	J	1.0E-06					
RJ776	Total TCDD	6.1E-07	U	3.1E-07					
RJ776	Total TCDF	4.3E-07	U	2.2E-07					
RJ777	1,2,3,4,6,7,8-HpCDD	9.0E-05		9.0E-05	7.9E-07	1.3E-06	1.2E-05	1.1E-04	1.2E-03
RJ777	1,2,3,4,6,7,8-HpCDF	2.0E-05		2.0E-05					
RJ777	1,2,3,4,7,8,9-HpCDF	1.1E-06	J	1.1E-06					
RJ777	1,2,3,4,7,8-HxCDD	1.6E-06	J	1.6E-06					
RJ777	1,2,3,4,7,8-HxCDF	1.3E-06	J	1.3E-06					
RJ777	1,2,3,6,7,8-HxCDD	4.0E-06	J	4.0E-06					
RJ777	1,2,3,6,7,8-HxCDF	2.3E-06	UJ	1.2E-06					
RJ777	1,2,3,7,8,9-HxCDD	2.0E-06	J	2.0E-06					
RJ777	1,2,3,7,8,9-HxCDF	4.5E-07	U	2.3E-07					
RJ777	1,2,3,7,8-PeCDD	8.1E-07	UJ	4.1E-07					
RJ777	1,2,3,7,8-PeCDF	3.2E-07	U	1.6E-07					
RJ777	2,3,4,6,7,8-HxCDF	1.3E-06	J	1.3E-06					
RJ777	2,3,4,7,8-PeCDF	7.5E-07	J	7.5E-07					
RJ777	2,3,7,8-TCDD	4.7E-07	U	2.4E-07					
RJ777	2,3,7,8-TCDF	5.5E-07	J	5.5E-07					
RJ777	OCDD	1.2E-03		1.2E-03					
RJ777	OCDF	3.0E-05		3.0E-05					
RJ777	Total HpCDD	2.1E-04		2.1E-04					
RJ777	Total HpCDF	4.0E-05		4.0E-05					
RJ777	Total HxCDD	3.0E-05		3.0E-05					
RJ777	Total HxCDF	2.0E-05		2.0E-05					
RJ777	Total PeCDD	4.0E-07	U	2.0E-07					
RJ777	Total PeCDF	1.0E-05		1.0E-05					
RJ777	Total TCDD	4.7E-07	U	2.4E-07					
RJ777	Total TCDF	2.5E-06	J	2.5E-06					
RJ778	1,2,3,4,6,7,8-HpCDD	1.0E-05		1.0E-05	7.4E-07	6.5E-07	2.1E-06	1.3E-05	1.0E-04
RJ778	1,2,3,4,6,7,8-HpCDF	2.5E-06	J	2.5E-06					
RJ778	1,2,3,4,7,8,9-HpCDF	8.3E-07	U	4.2E-07					
RJ778	1,2,3,4,7,8-HxCDD	8.3E-07	U	4.2E-07					
RJ778	1,2,3,4,7,8-HxCDF	4.5E-07	U	2.3E-07					
RJ778	1,2,3,6,7,8-HxCDD	6.1E-07	U	3.1E-07					
RJ778	1,2,3,6,7,8-HxCDF	5.2E-07	UJ	2.6E-07					
RJ778	1,2,3,7,8,9-HxCDD	6.0E-07	U	3.0E-07					
RJ778	1,2,3,7,8,9-HxCDF	5.6E-07	U	2.8E-07					
RJ778	1,2,3,7,8-PeCDD	4.6E-07	U	2.3E-07					
RJ778	1,2,3,7,8-PeCDF	4.0E-07	U	2.0E-07					
RJ778	2,3,4,6,7,8-HxCDF	5.3E-07	U	2.7E-07					
RJ778	2,3,4,7,8-PeCDF	4.3E-07	U	2.2E-07					
RJ778	2,3,7,8-TCDD	6.7E-07	U	3.4E-07					
RJ778	2,3,7,8-TCDF	8.0E-07	U	4.0E-07					
RJ778	OCDD	1.0E-04		1.0E-04					
RJ778	OCDF	3.2E-06	J	3.2E-06					
RJ778	Total HpCDD	3.0E-05		3.0E-05					
RJ778	Total HpCDF	2.5E-06	J	2.5E-06					
RJ778	Total HxCDD	3.2E-06	J	3.2E-06					
RJ778	Total HxCDF	1.8E-06	J	1.8E-06					
RJ778	Total PeCDD	4.6E-07	U	2.3E-07					
RJ778	Total PeCDF	4.2E-07	U	2.1E-07					
RJ778	Total TCDD	6.7E-07	U	3.4E-07					
RJ778	Total TCDF	8.0E-07	U	4.0E-07					
RJ779	1,2,3,4,6,7,8-HpCDD	1.0E-05		1.0E-05	4.3E-07	4.5E-07	2.3E-06	1.3E-05	1.5E-04
RJ779	1,2,3,4,6,7,8-HpCDF	2.7E-06	J	2.7E-06					
RJ779	1,2,3,4,7,8,9-HpCDF	8.7E-07	U	4.4E-07					
RJ779	1,2,3,4,7,8-HxCDD	5.0E-07	U	2.5E-07					
RJ779	1,2,3,4,7,8-HxCDF	4.5E-07	J	4.5E-07					
RJ779	1,2,3,6,7,8-HxCDD	7.1E-07	J	7.1E-07					
RJ779	1,2,3,6,7,8-HxCDF	7.0E-07	UJ	3.5E-07					
RJ779	1,2,3,7,8,9-HxCDD	4.0E-07	UJ	2.0E-07					

PCDD/PCDF Congener Group Summation for Soil (0-10 feet bgs)
Old Conservation Yard RFI Site

EPA ID	PCDD/PCDF Congener	Measured Concentration [a] (mg/kg)	Data Qualifier	Adjusted Concentration [b] (mg/kg)	Sum of PCDD/PCDF Congener Concentrations				
					Total Tetra (mg/kg)	Total Penta (mg/kg)	Total Hexa (mg/kg)	Total Hepta (mg/kg)	Total Octa (mg/kg)
RJ779	1,2,3,7,8,9-HxCDF	2.5E-07	U	1.3E-07					
RJ779	1,2,3,7,8-PeCDD	3.5E-07	U	1.8E-07					
RJ779	1,2,3,7,8-PeCDF	2.6E-07	UJ	1.3E-07					
RJ779	2,3,4,6,7,8-HxCDF	2.6E-07	J	2.6E-07					
RJ779	2,3,4,7,8-PeCDF	2.9E-07	UJ	1.5E-07					
RJ779	2,3,7,8-TCDD	3.6E-07	U	1.8E-07					
RJ779	2,3,7,8-TCDF	4.9E-07	U	2.5E-07					
RJ779	OCDD	1.4E-04		1.4E-04					
RJ779	OCDF	1.0E-05	UJ	5.0E-06					
RJ779	Total HpCDD	3.0E-05		3.0E-05					
RJ779	Total HpCDF	1.0E-05		1.0E-05					
RJ779	Total HxCDD	4.5E-06	J	4.5E-06					
RJ779	Total HxCDF	3.0E-06	J	3.0E-06					
RJ779	Total PeCDD	3.5E-07	U	1.8E-07					
RJ779	Total PeCDF	8.0E-07	J	8.0E-07					
RJ779	Total TCDD	3.6E-07	U	1.8E-07					
RJ779	Total TCDF	4.9E-07	U	2.5E-07					
RJ780	1,2,3,4,6,7,8-HpCDD	1.0E-05		1.0E-05	3.9E-07	4.6E-07	1.6E-06	1.1E-05	5.2E-05
RJ780	1,2,3,4,6,7,8-HpCDF	4.1E-07	J	4.1E-07					
RJ780	1,2,3,4,7,8,9-HpCDF	1.1E-06	U	5.5E-07					
RJ780	1,2,3,4,7,8-HxCDD	6.6E-07	U	3.3E-07					
RJ780	1,2,3,4,7,8-HxCDF	3.1E-07	U	1.6E-07					
RJ780	1,2,3,6,7,8-HxCDD	4.8E-07	U	2.4E-07					
RJ780	1,2,3,6,7,8-HxCDF	3.2E-07	J	3.2E-07					
RJ780	1,2,3,7,8,9-HxCDD	5.7E-07	U	2.9E-07					
RJ780	1,2,3,7,8,9-HxCDF	3.0E-07	U	1.5E-07					
RJ780	1,2,3,7,8-PeCDD	4.7E-07	U	2.4E-07					
RJ780	1,2,3,7,8-PeCDF	2.1E-07	U	1.1E-07					
RJ780	2,3,4,6,7,8-HxCDF	2.6E-07	U	1.3E-07					
RJ780	2,3,4,7,8-PeCDF	2.4E-07	U	1.2E-07					
RJ780	2,3,7,8-TCDD	5.0E-07	U	2.5E-07					
RJ780	2,3,7,8-TCDF	2.8E-07	U	1.4E-07					
RJ780	OCDD	5.0E-05		5.0E-05					
RJ780	OCDF	1.5E-06	J	1.5E-06					
RJ780	Total HpCDD	1.0E-05		1.0E-05					
RJ780	Total HpCDF	4.1E-07	J	4.1E-07					
RJ780	Total HxCDD	6.6E-07	J	6.6E-07					
RJ780	Total HxCDF	9.5E-07	J	9.5E-07					
RJ780	Total PeCDD	4.7E-07	U	2.4E-07					
RJ780	Total PeCDF	2.2E-07	U	1.1E-07					
RJ780	Total TCDD	5.0E-07	U	2.5E-07					
RJ780	Total TCDF	2.8E-07	U	1.4E-07					
RJ781	1,2,3,4,6,7,8-HpCDD	2.0E-05		2.0E-05	9.5E-07	1.2E-06	4.1E-06	2.5E-05	9.2E-05
RJ781	1,2,3,4,6,7,8-HpCDF	3.2E-06	J	3.2E-06					
RJ781	1,2,3,4,7,8,9-HpCDF	3.0E-06	U	1.5E-06					
RJ781	1,2,3,4,7,8-HxCDD	1.4E-06	U	7.0E-07					
RJ781	1,2,3,4,7,8-HxCDF	1.0E-06	U	5.0E-07					
RJ781	1,2,3,6,7,8-HxCDD	1.1E-06	U	5.5E-07					
RJ781	1,2,3,6,7,8-HxCDF	1.1E-06	U	5.5E-07					
RJ781	1,2,3,7,8,9-HxCDD	1.1E-06	U	5.5E-07					
RJ781	1,2,3,7,8,9-HxCDF	1.3E-06	U	6.5E-07					
RJ781	1,2,3,7,8-PeCDD	1.1E-06	U	5.5E-07					
RJ781	1,2,3,7,8-PeCDF	6.5E-07	U	3.3E-07					
RJ781	2,3,4,6,7,8-HxCDF	1.1E-06	U	5.5E-07					
RJ781	2,3,4,7,8-PeCDF	6.2E-07	U	3.1E-07					
RJ781	2,3,7,8-TCDD	1.0E-06	U	5.0E-07					
RJ781	2,3,7,8-TCDF	8.9E-07	U	4.5E-07					
RJ781	OCDD	9.0E-05	J	9.0E-05					
RJ781	OCDF	4.6E-06	UJ	2.3E-06					
RJ781	Total HpCDD	4.0E-05		4.0E-05					
RJ781	Total HpCDF	3.2E-06	J	3.2E-06					

PCDD/PCDF Congener Group Summation for Soil (0-10 feet bgs)
Old Conservation Yard RFI Site

EPA ID	PCDD/PCDF Congener	Measured Concentration [a] (mg/kg)	Data Qualifier	Adjusted Concentration [b] (mg/kg)	Sum of PCDD/PCDF Congener Concentrations				
					Total Tetra (mg/kg)	Total Penta (mg/kg)	Total Hexa (mg/kg)	Total Hepta (mg/kg)	Total Octa (mg/kg)
RJ781	Total HxCDD	2.8E-06	J	2.8E-06					
RJ781	Total HxCDF	1.9E-06	J	1.9E-06					
RJ781	Total PeCDD	1.4E-06	J	1.4E-06					
RJ781	Total PeCDF	6.3E-07	U	3.2E-07					
RJ781	Total TCDD	1.0E-06	U	5.0E-07					
RJ781	Total TCDF	8.9E-07	U	4.5E-07					
RJ782	1,2,3,4,6,7,8-HpCDD	7.0E-05		7.0E-05	7.1E-07	9.8E-07	8.7E-06	9.1E-05	6.7E-04
RJ782	1,2,3,4,6,7,8-HpCDF	2.0E-05		2.0E-05					
RJ782	1,2,3,4,7,8,9-HpCDF	1.4E-06	U	7.0E-07					
RJ782	1,2,3,4,7,8-HxCDD	1.2E-06	J	1.2E-06					
RJ782	1,2,3,4,7,8-HxCDF	9.3E-07	J	9.3E-07					
RJ782	1,2,3,6,7,8-HxCDD	2.6E-06	J	2.6E-06					
RJ782	1,2,3,6,7,8-HxCDF	2.8E-06	UJ	1.4E-06					
RJ782	1,2,3,7,8,9-HxCDD	1.7E-06	J	1.7E-06					
RJ782	1,2,3,7,8,9-HxCDF	3.4E-07	U	1.7E-07					
RJ782	1,2,3,7,8-PeCDD	4.9E-07	U	2.5E-07					
RJ782	1,2,3,7,8-PeCDF	2.8E-07	U	1.4E-07					
RJ782	2,3,4,6,7,8-HxCDF	7.1E-07	J	7.1E-07					
RJ782	2,3,4,7,8-PeCDF	5.9E-07	J	5.9E-07					
RJ782	2,3,7,8-TCDD	5.6E-07	U	2.8E-07					
RJ782	2,3,7,8-TCDF	4.3E-07	J	4.3E-07					
RJ782	OCDD	6.3E-04	J	6.3E-04					
RJ782	OCDF	4.0E-05	J	4.0E-05					
RJ782	Total HpCDD	1.3E-04		1.3E-04					
RJ782	Total HpCDF	2.0E-05		2.0E-05					
RJ782	Total HxCDD	2.0E-05		2.0E-05					
RJ782	Total HxCDF	1.0E-05		1.0E-05					
RJ782	Total PeCDD	4.9E-07	U	2.5E-07					
RJ782	Total PeCDF	3.6E-06	J	3.6E-06					
RJ782	Total TCDD	5.6E-07	U	2.8E-07					
RJ782	Total TCDF	2.0E-06	J	2.0E-06					
RJ783	1,2,3,4,6,7,8-HpCDD	3.3E-03		3.3E-03	1.3E-05	1.0E-04	6.8E-04	3.6E-03	1.6E-02
RJ783	1,2,3,4,6,7,8-HpCDF	2.3E-04		2.3E-04					
RJ783	1,2,3,4,7,8,9-HpCDF	6.0E-05		6.0E-05					
RJ783	1,2,3,4,7,8-HxCDD	1.5E-04		1.5E-04					
RJ783	1,2,3,4,7,8-HxCDF	1.2E-04		1.2E-04					
RJ783	1,2,3,6,7,8-HxCDD	1.6E-04		1.6E-04					
RJ783	1,2,3,6,7,8-HxCDF	5.0E-05	UJ	2.5E-05					
RJ783	1,2,3,7,8,9-HxCDD	1.7E-04		1.7E-04					
RJ783	1,2,3,7,8,9-HxCDF	2.0E-05		2.0E-05					
RJ783	1,2,3,7,8-PeCDD	6.0E-05		6.0E-05					
RJ783	1,2,3,7,8-PeCDF	1.0E-05		1.0E-05					
RJ783	2,3,4,6,7,8-HxCDF	3.0E-05		3.0E-05					
RJ783	2,3,4,7,8-PeCDF	3.0E-05		3.0E-05					
RJ783	2,3,7,8-TCDD	1.0E-05		1.0E-05					
RJ783	2,3,7,8-TCDF	2.9E-06	J	2.9E-06					
RJ783	OCDD	1.5E-02	J	1.5E-02					
RJ783	OCDF	7.0E-04		7.0E-04					
RJ783	Total HpCDD	9.3E-03		9.3E-03					
RJ783	Total HpCDF	8.8E-04		8.8E-04					
RJ783	Total HxCDD	2.9E-03		2.9E-03					
RJ783	Total HxCDF	5.4E-04		5.4E-04					
RJ783	Total PeCDD	5.5E-04		5.5E-04					
RJ783	Total PeCDF	1.8E-04		1.8E-04					
RJ783	Total TCDD	1.4E-04		1.4E-04					
RJ783	Total TCDF	9.0E-05	J	9.0E-05					
MJ665	1,2,3,4,6,7,8-HpCDD	9.0E-05		9.0E-05	9.9E-07	2.5E-06	1.1E-05	1.0E-04	1.7E-03
MJ665	1,2,3,4,6,7,8-HpCDF	1.0E-05		1.0E-05					
MJ665	1,2,3,4,7,8,9-HpCDF	1.3E-06	J	1.3E-06					
MJ665	1,2,3,4,7,8-HxCDD	1.1E-06	J	1.1E-06					
MJ665	1,2,3,4,7,8-HxCDF	1.9E-06	J	1.9E-06					

PCDD/PCDF Congener Group Summation for Soil (0-10 feet bgs)
Old Conservation Yard RFI Site

EPA ID	PCDD/PCDF Congener	Measured Concentration [a] (mg/kg)	Data Qualifier	Adjusted Concentration [b] (mg/kg)	Sum of PCDD/PCDF Congener Concentrations				
					Total Tetra (mg/kg)	Total Penta (mg/kg)	Total Hexa (mg/kg)	Total Hepta (mg/kg)	Total Octa (mg/kg)
MJ665	1,2,3,6,7,8-HxCDD	3.5E-06		3.5E-06					
MJ665	1,2,3,6,7,8-HxCDF	9.9E-07	J	9.9E-07					
MJ665	1,2,3,7,8,9-HxCDD	2.3E-06	J	2.3E-06					
MJ665	1,2,3,7,8,9-HxCDF	4.2E-07	J	4.2E-07					
MJ665	1,2,3,7,8-PeCDD	6.6E-07	J	6.6E-07					
MJ665	1,2,3,7,8-PeCDF	6.9E-07	J	6.9E-07					
MJ665	2,3,4,6,7,8-HxCDF	1.1E-06	J	1.1E-06					
MJ665	2,3,4,7,8-PeCDF	1.2E-06	J	1.2E-06					
MJ665	2,3,7,8-TCDD	1.2E-07	U	6.0E-08					
MJ665	2,3,7,8-TCDF	9.3E-07		9.3E-07					
MJ665	OCDD	1.7E-03		1.7E-03					
MJ665	OCDF	5.0E-05		5.0E-05					
MJ665	Total HpCDD	3.1E-04		3.1E-04					
MJ665	Total HpCDF	4.0E-05		4.0E-05					
MJ665	Total HxCDD	3.0E-05		3.0E-05					
MJ665	Total HxCDF	2.0E-05		2.0E-05					
MJ665	Total PeCDD	1.0E-05		1.0E-05					
MJ665	Total PeCDF	1.0E-05		1.0E-05					
MJ665	Total TCDD	1.5E-06		1.5E-06					
MJ665	Total TCDF	1.0E-05		1.0E-05					
MJ677	1,2,3,4,6,7,8-HpCDD	9.0E-05		9.0E-05	5.3E-07	1.3E-06	7.8E-06	1.1E-04	1.0E-03
MJ677	1,2,3,4,6,7,8-HpCDF	2.0E-05		2.0E-05					
MJ677	1,2,3,4,7,8,9-HpCDF	1.3E-06	J	1.3E-06					
MJ677	1,2,3,4,7,8-HxCDD	1.1E-06	J	1.1E-06					
MJ677	1,2,3,4,7,8-HxCDF	9.7E-07	J	9.7E-07					
MJ677	1,2,3,6,7,8-HxCDD	2.5E-06	J	2.5E-06					
MJ677	1,2,3,6,7,8-HxCDF	6.5E-07	J	6.5E-07					
MJ677	1,2,3,7,8,9-HxCDD	1.7E-06	J	1.7E-06					
MJ677	1,2,3,7,8,9-HxCDF	2.9E-07	U	1.4E-07					
MJ677	1,2,3,7,8-PeCDD	4.3E-07	J	4.3E-07					
MJ677	1,2,3,7,8-PeCDF	2.6E-07	J	2.6E-07					
MJ677	2,3,4,6,7,8-HxCDF	8.2E-07	J	8.2E-07					
MJ677	2,3,4,7,8-PeCDF	5.8E-07	J	5.8E-07					
MJ677	2,3,7,8-TCDD	9.1E-08	U	4.5E-08					
MJ677	2,3,7,8-TCDF	4.8E-07	J	4.8E-07					
MJ677	OCDD	9.3E-04		9.3E-04					
MJ677	OCDF	7.0E-05		7.0E-05					
MJ677	Total HpCDD	3.2E-04		3.2E-04					
MJ677	Total HpCDF	6.0E-05		6.0E-05					
MJ677	Total HxCDD	3.0E-05		3.0E-05					
MJ677	Total HxCDF	2.0E-05		2.0E-05					
MJ677	Total PeCDD	2.7E-06		2.7E-06					
MJ677	Total PeCDF	1.0E-05		1.0E-05					
MJ677	Total TCDD	1.9E-07		1.9E-07					
MJ677	Total TCDF	4.0E-06		4.0E-06					
MJ678	1,2,3,4,6,7,8-HpCDD	6.0E-05		6.0E-05	9.4E-07	2.4E-06	8.7E-06	7.1E-05	6.4E-04
MJ678	1,2,3,4,6,7,8-HpCDF	1.0E-05		1.0E-05					
MJ678	1,2,3,4,7,8,9-HpCDF	8.4E-07	J	8.4E-07					
MJ678	1,2,3,4,7,8-HxCDD	8.5E-07	J	8.5E-07					
MJ678	1,2,3,4,7,8-HxCDF	1.5E-06	J	1.5E-06					
MJ678	1,2,3,6,7,8-HxCDD	2.3E-06	J	2.3E-06					
MJ678	1,2,3,6,7,8-HxCDF	9.6E-07	J	9.6E-07					
MJ678	1,2,3,7,8,9-HxCDD	1.8E-06	J	1.8E-06					
MJ678	1,2,3,7,8,9-HxCDF	2.7E-07	J	2.7E-07					
MJ678	1,2,3,7,8-PeCDD	5.2E-07	J	5.2E-07					
MJ678	1,2,3,7,8-PeCDF	6.6E-07	J	6.6E-07					
MJ678	2,3,4,6,7,8-HxCDF	1.0E-06	J	1.0E-06					
MJ678	2,3,4,7,8-PeCDF	1.2E-06	J	1.2E-06					
MJ678	2,3,7,8-TCDD	1.5E-07	U	7.5E-08					
MJ678	2,3,7,8-TCDF	8.6E-07	J	8.6E-07					
MJ678	OCDD	6.1E-04		6.1E-04					

PCDD/PCDF Congener Group Summation for Soil (0-10 feet bgs)
Old Conservation Yard RFI Site

EPA ID	PCDD/PCDF Congener	Measured Concentration [a] (mg/kg)	Data Qualifier	Adjusted Concentration [b] (mg/kg)	Sum of PCDD/PCDF Congener Concentrations				
					Total Tetra (mg/kg)	Total Penta (mg/kg)	Total Hexa (mg/kg)	Total Hepta (mg/kg)	Total Octa (mg/kg)
MJ678	OCDF	3.0E-05		3.0E-05					
MJ678	Total HpCDD	1.4E-04		1.4E-04					
MJ678	Total HpCDF	3.0E-05		3.0E-05					
MJ678	Total HxCDD	2.0E-05		2.0E-05					
MJ678	Total HxCDF	2.0E-05		2.0E-05					
MJ678	Total PeCDD	1.0E-05		1.0E-05					
MJ678	Total PeCDF	1.0E-05		1.0E-05					
MJ678	Total TCDD	1.3E-06		1.3E-06					
MJ678	Total TCDF	1.0E-05		1.0E-05					
MJ679	1,2,3,4,6,7,8-HpCDD	9.0E-05		9.0E-05	1.3E-06	1.3E-05	4.0E-05	1.2E-04	8.3E-04
MJ679	1,2,3,4,6,7,8-HpCDF	3.0E-05		3.0E-05					
MJ679	1,2,3,4,7,8,9-HpCDF	2.4E-06	J	2.4E-06					
MJ679	1,2,3,4,7,8-HxCDD	1.6E-06	J	1.6E-06					
MJ679	1,2,3,4,7,8-HxCDF	1.0E-05		1.0E-05					
MJ679	1,2,3,6,7,8-HxCDD	4.0E-06		4.0E-06					
MJ679	1,2,3,6,7,8-HxCDF	1.0E-05		1.0E-05					
MJ679	1,2,3,7,8,9-HxCDD	2.8E-06		2.8E-06					
MJ679	1,2,3,7,8,9-HxCDF	1.6E-06	J	1.6E-06					
MJ679	1,2,3,7,8-PeCDD	9.5E-07	J	9.5E-07					
MJ679	1,2,3,7,8-PeCDF	2.1E-06	J	2.1E-06					
MJ679	2,3,4,6,7,8-HxCDF	1.0E-05		1.0E-05					
MJ679	2,3,4,7,8-PeCDF	1.0E-05		1.0E-05					
MJ679	2,3,7,8-TCDD	1.6E-07	UJ	7.9E-08					
MJ679	2,3,7,8-TCDF	1.3E-06		1.3E-06					
MJ679	OCDD	7.7E-04		7.7E-04					
MJ679	OCDF	6.0E-05		6.0E-05					
MJ679	Total HpCDD	2.3E-04		2.3E-04					
MJ679	Total HpCDF	8.0E-05		8.0E-05					
MJ679	Total HxCDD	4.0E-05		4.0E-05					
MJ679	Total HxCDF	7.0E-05		7.0E-05					
MJ679	Total PeCDD	2.0E-05		2.0E-05					
MJ679	Total PeCDF	6.0E-05		6.0E-05					
MJ679	Total TCDD	1.0E-05		1.0E-05					
MJ679	Total TCDF	4.0E-05		4.0E-05					
MJ680	1,2,3,4,6,7,8-HpCDD	3.0E-05		3.0E-05	3.1E-07	6.4E-07	2.7E-06	3.5E-05	3.7E-04
MJ680	1,2,3,4,6,7,8-HpCDF	4.7E-06		4.7E-06					
MJ680	1,2,3,4,7,8,9-HpCDF	3.1E-07	J	3.1E-07					
MJ680	1,2,3,4,7,8-HxCDD	3.1E-07	J	3.1E-07					
MJ680	1,2,3,4,7,8-HxCDF	3.1E-07	J	3.1E-07					
MJ680	1,2,3,6,7,8-HxCDD	9.4E-07	J	9.4E-07					
MJ680	1,2,3,6,7,8-HxCDF	2.2E-07	J	2.2E-07					
MJ680	1,2,3,7,8,9-HxCDD	5.2E-07	J	5.2E-07					
MJ680	1,2,3,7,8,9-HxCDF	1.2E-07	U	6.0E-08					
MJ680	1,2,3,7,8-PeCDD	1.5E-07	J	1.5E-07					
MJ680	1,2,3,7,8-PeCDF	1.2E-07	J	1.2E-07					
MJ680	2,3,4,6,7,8-HxCDF	3.1E-07	J	3.1E-07					
MJ680	2,3,4,7,8-PeCDF	3.7E-07	J	3.7E-07					
MJ680	2,3,7,8-TCDD	1.2E-07	U	6.0E-08					
MJ680	2,3,7,8-TCDF	2.5E-07	J	2.5E-07					
MJ680	OCDD	3.5E-04		3.5E-04					
MJ680	OCDF	2.0E-05		2.0E-05					
MJ680	Total HpCDD	8.0E-05		8.0E-05					
MJ680	Total HpCDF	2.0E-05		2.0E-05					
MJ680	Total HxCDD	1.0E-05		1.0E-05					
MJ680	Total HxCDF	1.0E-05		1.0E-05					
MJ680	Total PeCDD	1.4E-06		1.4E-06					
MJ680	Total PeCDF	3.2E-06		3.2E-06					
MJ680	Total TCDD	2.1E-07		2.1E-07					
MJ680	Total TCDF	9.2E-07		9.2E-07					
MJ735	1,2,3,4,6,7,8-HpCDD	1.1E-03		1.1E-03	1.1E-05	2.4E-05	9.2E-05	1.3E-03	1.4E-02
MJ735	1,2,3,4,6,7,8-HpCDF	1.8E-04		1.8E-04					

PCDD/PCDF Congener Group Summation for Soil (0-10 feet bgs)
Old Conservation Yard RFI Site

EPA ID	PCDD/PCDF Congener	Measured Concentration [a] (mg/kg)	Data Qualifier	Adjusted Concentration [b] (mg/kg)	Sum of PCDD/PCDF Congener Concentrations				
					Total Tetra (mg/kg)	Total Penta (mg/kg)	Total Hexa (mg/kg)	Total Hepta (mg/kg)	Total Octa (mg/kg)
MJ735	1,2,3,4,7,8,9-HpCDF	1.0E-05		1.0E-05					
MJ735	1,2,3,4,7,8-HxCDD	1.0E-05		1.0E-05					
MJ735	1,2,3,4,7,8-HxCDF	1.0E-05		1.0E-05					
MJ735	1,2,3,6,7,8-HxCDD	3.0E-05		3.0E-05					
MJ735	1,2,3,6,7,8-HxCDF	1.0E-05	J	1.0E-05					
MJ735	1,2,3,7,8,9-HxCDD	2.0E-05		2.0E-05					
MJ735	1,2,3,7,8,9-HxCDF	2.3E-06	J	2.3E-06					
MJ735	1,2,3,7,8-PeCDD	1.0E-05		1.0E-05					
MJ735	1,2,3,7,8-PeCDF	3.7E-06		3.7E-06					
MJ735	2,3,4,6,7,8-HxCDF	1.0E-05		1.0E-05					
MJ735	2,3,4,7,8-PeCDF	1.0E-05		1.0E-05					
MJ735	2,3,7,8-TCDD	5.5E-07		5.5E-07					
MJ735	2,3,7,8-TCDF	1.0E-05		1.0E-05					
MJ735	OCDD	1.3E-02		1.3E-02					
MJ735	OCDF	8.0E-04		8.0E-04					
MJ735	Total HpCDD	2.4E-03		2.4E-03					
MJ735	Total HpCDF	6.4E-04		6.4E-04					
MJ735	Total HxCDD	2.7E-04		2.7E-04					
MJ735	Total HxCDF	2.1E-04		2.1E-04					
MJ735	Total PeCDD	3.0E-05		3.0E-05					
MJ735	Total PeCDF	1.0E-04		1.0E-04					
MJ735	Total TCDD	1.0E-05		1.0E-05					
MJ735	Total TCDF	1.2E-04		1.2E-04					
MJ736	1,2,3,4,6,7,8-HpCDD	1.0E-03		1.0E-03	1.1E-05	2.5E-05	1.0E-04	1.2E-03	1.1E-02
MJ736	1,2,3,4,6,7,8-HpCDF	1.5E-04		1.5E-04					
MJ736	1,2,3,4,7,8,9-HpCDF	1.0E-05		1.0E-05					
MJ736	1,2,3,4,7,8-HxCDD	1.0E-05		1.0E-05					
MJ736	1,2,3,4,7,8-HxCDF	1.0E-05		1.0E-05					
MJ736	1,2,3,6,7,8-HxCDD	4.0E-05		4.0E-05					
MJ736	1,2,3,6,7,8-HxCDF	1.0E-05		1.0E-05					
MJ736	1,2,3,7,8,9-HxCDD	2.0E-05		2.0E-05					
MJ736	1,2,3,7,8,9-HxCDF	3.0E-06		3.0E-06					
MJ736	1,2,3,7,8-PeCDD	1.0E-05		1.0E-05					
MJ736	1,2,3,7,8-PeCDF	5.0E-06		5.0E-06					
MJ736	2,3,4,6,7,8-HxCDF	1.0E-05		1.0E-05					
MJ736	2,3,4,7,8-PeCDF	1.0E-05		1.0E-05					
MJ736	2,3,7,8-TCDD	1.0E-06		1.0E-06					
MJ736	2,3,7,8-TCDF	1.0E-05		1.0E-05					
MJ736	OCDD	1.1E-02		1.1E-02					
MJ736	OCDF	3.6E-04		3.6E-04					
MJ736	Total HpCDD	2.2E-03		2.2E-03					
MJ736	Total HpCDF	6.1E-04		6.1E-04					
MJ736	Total HxCDD	3.1E-04		3.1E-04					
MJ736	Total HxCDF	2.8E-04		2.8E-04					
MJ736	Total PeCDD	6.0E-05		6.0E-05					
MJ736	Total PeCDF	1.0E-04		1.0E-04					
MJ736	Total TCDD	2.0E-05		2.0E-05					
MJ736	Total TCDF	1.0E-04		1.0E-04					
				MAX	1.3E-05	1.0E-04	6.8E-04	3.6E-03	1.6E-02

Maximum of Total Summed Congener Concentrations

Total Tetra	1.3E-05
Total Penta	1.0E-04
Total Hexa	6.8E-04
Total Hepta	3.6E-03
Total Octa	1.6E-02

PCDD/PCDF Congener Group Summation for Soil (0-10 feet bgs)
Old Conservation Yard RFI Site

EPA ID	PCDD/PCDF Congener	Measured Concentration [a] (mg/kg)	Data Qualifier	Adjusted Concentration [b] (mg/kg)	Sum of PCDD/PCDF Congener Concentrations				
					Total Tetra (mg/kg)	Total Penta (mg/kg)	Total Hexa (mg/kg)	Total Hepta (mg/kg)	Total Octa (mg/kg)

Notes:

a. Measured concentration - concentration reported by the analytial laboratory

b. Adjusted concentration - concentration reported by the analytical laboratory if the chemical was detected, or estimated at one-half the sample quantitation limit (SQL) limit if not detected.

PCDD/PCDF - polychlorinated dibenzo-p-dioxins and dibenzofurans

Total Tetra - sum of the 2,3,7,8-substituted tetraclorinated dibenzo-p-dioxin and dibenzofuran congeners.

Total Penta - sum of the 2,3,7,8-substituted pentaclorinated dibenzo-p-dioxin and dibenzofuran congeners.

Total Hexa - sum of the 2,3,7,8-substituted hexaclorinated dibenzo-p-dioxin and dibenzofuran congeners.

Total Hepta - sum of the 2,3,7,8-substituted heptaclorinated dibenzo-p-dioxin and dibenzofuran congeners.

Total Octa - sum of the 2,3,7,8-substituted Octaclorinated dibenzo-p-dioxin and dibenzofuran congeners.

J - concentration estimated

U - not detected. Concentration shown is the SQL.

UJ - not detected. Concentration shown is the estimated SQL.

mg/kg - milligrams per kilogram

bgs- below ground surface

PCDD/PCDF Congener Group Summation for Soil (0-2 feet bgs)
Old Conservation Yard RFI Site

EPA ID	PCDD/PCDF Congener	Measured Concentration [a] (mg/kg)	Data Qualifier	Adjusted Concentration [b] (mg/kg)	Sum of PCDD/PCDF Congener Concentrations				
					Total Tetra (mg/kg)	Total Penta (mg/kg)	Total Hexa (mg/kg)	Total Hepta (mg/kg)	Total Octa (mg/kg)
MJ032	1,2,3,4,6,7,8-HpCDD	4.1E-04		4.1E-04	5.4E-07	3.6E-06	4.7E-05	4.5E-04	2.9E-03
MJ032	1,2,3,4,6,7,8-HpCDF	4.0E-05		4.0E-05					
MJ032	1,2,3,4,7,8,9-HpCDF	4.9E-06		4.9E-06					
MJ032	1,2,3,4,7,8-HxCDD	1.0E-05		1.0E-05					
MJ032	1,2,3,4,7,8-HxCDF	1.0E-05		1.0E-05					
MJ032	1,2,3,6,7,8-HxCDD	1.0E-05		1.0E-05					
MJ032	1,2,3,6,7,8-HxCDF	3.0E-06	J	3.0E-06					
MJ032	1,2,3,7,8,9-HxCDD	1.0E-05		1.0E-05					
MJ032	1,2,3,7,8,9-HxCDF	1.3E-06	J	1.3E-06					
MJ032	1,2,3,7,8-PeCDD	1.7E-06	J	1.7E-06					
MJ032	1,2,3,7,8-PeCDF	9.7E-07	U	4.9E-07					
MJ032	2,3,4,6,7,8-HxCDF	2.3E-06	J	2.3E-06					
MJ032	2,3,4,7,8-PeCDF	1.4E-06	J	1.4E-06					
MJ032	2,3,7,8-TCDD	2.6E-07	J	2.6E-07					
MJ032	2,3,7,8-TCDF	2.8E-07	J	2.8E-07					
MJ032	OCDD	2.7E-03	J	2.7E-03					
MJ032	OCDF	1.9E-04		1.9E-04					
MJ032	Total HpCDD	9.5E-04		9.5E-04					
MJ032	Total HpCDF	1.4E-04		1.4E-04					
MJ032	Total HxCDD	2.1E-04		2.1E-04					
MJ032	Total HxCDF	6.0E-05		6.0E-05					
MJ032	Total PeCDD	2.0E-05		2.0E-05					
MJ032	Total PeCDF	1.0E-05		1.0E-05					
MJ032	Total TCDD	3.6E-06		3.6E-06					
MJ032	Total TCDF	1.9E-06		1.9E-06					
RJ777	1,2,3,4,6,7,8-HpCDD	9.0E-05		9.0E-05	7.9E-07	1.3E-06	1.2E-05	1.1E-04	1.2E-03
RJ777	1,2,3,4,6,7,8-HpCDF	2.0E-05		2.0E-05					
RJ777	1,2,3,4,7,8,9-HpCDF	1.1E-06	J	1.1E-06					
RJ777	1,2,3,4,7,8-HxCDD	1.6E-06	J	1.6E-06					
RJ777	1,2,3,4,7,8-HxCDF	1.3E-06	J	1.3E-06					
RJ777	1,2,3,6,7,8-HxCDD	4.0E-06	J	4.0E-06					
RJ777	1,2,3,6,7,8-HxCDF	2.3E-06	UJ	1.2E-06					
RJ777	1,2,3,7,8,9-HxCDD	2.0E-06	J	2.0E-06					
RJ777	1,2,3,7,8,9-HxCDF	4.5E-07	U	2.3E-07					
RJ777	1,2,3,7,8-PeCDD	8.1E-07	UJ	4.1E-07					
RJ777	1,2,3,7,8-PeCDF	3.2E-07	U	1.6E-07					
RJ777	2,3,4,6,7,8-HxCDF	1.3E-06	J	1.3E-06					
RJ777	2,3,4,7,8-PeCDF	7.5E-07	J	7.5E-07					
RJ777	2,3,7,8-TCDD	4.7E-07	U	2.4E-07					
RJ777	2,3,7,8-TCDF	5.5E-07	J	5.5E-07					
RJ777	OCDD	1.2E-03		1.2E-03					
RJ777	OCDF	3.0E-05		3.0E-05					
RJ777	Total HpCDD	2.1E-04		2.1E-04					
RJ777	Total HpCDF	4.0E-05		4.0E-05					
RJ777	Total HxCDD	3.0E-05		3.0E-05					
RJ777	Total HxCDF	2.0E-05		2.0E-05					
RJ777	Total PeCDD	4.0E-07	U	2.0E-07					
RJ777	Total PeCDF	1.0E-05		1.0E-05					
RJ777	Total TCDD	4.7E-07	U	2.4E-07					
RJ777	Total TCDF	2.5E-06	J	2.5E-06					
RJ778	1,2,3,4,6,7,8-HpCDD	1.0E-05		1.0E-05	7.4E-07	6.5E-07	2.1E-06	1.3E-05	1.0E-04
RJ778	1,2,3,4,6,7,8-HpCDF	2.5E-06	J	2.5E-06					
RJ778	1,2,3,4,7,8,9-HpCDF	8.3E-07	U	4.2E-07					
RJ778	1,2,3,4,7,8-HxCDD	8.3E-07	U	4.2E-07					
RJ778	1,2,3,4,7,8-HxCDF	4.5E-07	U	2.3E-07					
RJ778	1,2,3,6,7,8-HxCDD	6.1E-07	U	3.1E-07					
RJ778	1,2,3,6,7,8-HxCDF	5.2E-07	UJ	2.6E-07					
RJ778	1,2,3,7,8,9-HxCDD	6.0E-07	U	3.0E-07					
RJ778	1,2,3,7,8,9-HxCDF	5.6E-07	U	2.8E-07					
RJ778	1,2,3,7,8-PeCDD	4.6E-07	U	2.3E-07					
RJ778	1,2,3,7,8-PeCDF	4.0E-07	U	2.0E-07					

PCDD/PCDF Congener Group Summation for Soil (0-2 feet bgs)
Old Conservation Yard RFI Site

EPA ID	PCDD/PCDF Congener	Measured Concentration [a] (mg/kg)	Data Qualifier	Adjusted Concentration [b] (mg/kg)	Sum of PCDD/PCDF Congener Concentrations				
					Total Tetra (mg/kg)	Total Penta (mg/kg)	Total Hexa (mg/kg)	Total Hepta (mg/kg)	Total Octa (mg/kg)
RJ778	2,3,4,6,7,8-HxCDF	5.3E-07	U	2.7E-07					
RJ778	2,3,4,7,8-PeCDF	4.3E-07	U	2.2E-07					
RJ778	2,3,7,8-TCDD	6.7E-07	U	3.4E-07					
RJ778	2,3,7,8-TCDF	8.0E-07	U	4.0E-07					
RJ778	OCDD	1.0E-04		1.0E-04					
RJ778	OCDF	3.2E-06	J	3.2E-06					
RJ778	Total HpCDD	3.0E-05		3.0E-05					
RJ778	Total HpCDF	2.5E-06	J	2.5E-06					
RJ778	Total HxCDD	3.2E-06	J	3.2E-06					
RJ778	Total HxCDF	1.8E-06	J	1.8E-06					
RJ778	Total PeCDD	4.6E-07	U	2.3E-07					
RJ778	Total PeCDF	4.2E-07	U	2.1E-07					
RJ778	Total TCDD	6.7E-07	U	3.4E-07					
RJ778	Total TCDF	8.0E-07	U	4.0E-07					
RJ779	1,2,3,4,6,7,8-HpCDD	1.0E-05		1.0E-05	4.3E-07	4.5E-07	2.3E-06	1.3E-05	1.5E-04
RJ779	1,2,3,4,6,7,8-HpCDF	2.7E-06	J	2.7E-06					
RJ779	1,2,3,4,7,8,9-HpCDF	8.7E-07	U	4.4E-07					
RJ779	1,2,3,4,7,8-HxCDD	5.0E-07	U	2.5E-07					
RJ779	1,2,3,4,7,8-HxCDF	4.5E-07	J	4.5E-07					
RJ779	1,2,3,6,7,8-HxCDD	7.1E-07	J	7.1E-07					
RJ779	1,2,3,6,7,8-HxCDF	7.0E-07	UJ	3.5E-07					
RJ779	1,2,3,7,8,9-HxCDD	4.0E-07	UJ	2.0E-07					
RJ779	1,2,3,7,8,9-HxCDF	2.5E-07	U	1.3E-07					
RJ779	1,2,3,7,8-PeCDD	3.5E-07	U	1.8E-07					
RJ779	1,2,3,7,8-PeCDF	2.6E-07	UJ	1.3E-07					
RJ779	2,3,4,6,7,8-HxCDF	2.6E-07	J	2.6E-07					
RJ779	2,3,4,7,8-PeCDF	2.9E-07	UJ	1.5E-07					
RJ779	2,3,7,8-TCDD	3.6E-07	U	1.8E-07					
RJ779	2,3,7,8-TCDF	4.9E-07	U	2.5E-07					
RJ779	OCDD	1.4E-04		1.4E-04					
RJ779	OCDF	1.0E-05	UJ	5.0E-06					
RJ779	Total HpCDD	3.0E-05		3.0E-05					
RJ779	Total HpCDF	1.0E-05		1.0E-05					
RJ779	Total HxCDD	4.5E-06	J	4.5E-06					
RJ779	Total HxCDF	3.0E-06	J	3.0E-06					
RJ779	Total PeCDD	3.5E-07	U	1.8E-07					
RJ779	Total PeCDF	8.0E-07	J	8.0E-07					
RJ779	Total TCDD	3.6E-07	U	1.8E-07					
RJ779	Total TCDF	4.9E-07	U	2.5E-07					
RJ782	1,2,3,4,6,7,8-HpCDD	7.0E-05		7.0E-05	7.1E-07	9.8E-07	8.7E-06	9.1E-05	6.7E-04
RJ782	1,2,3,4,6,7,8-HpCDF	2.0E-05		2.0E-05					
RJ782	1,2,3,4,7,8,9-HpCDF	1.4E-06	U	7.0E-07					
RJ782	1,2,3,4,7,8-HxCDD	1.2E-06	J	1.2E-06					
RJ782	1,2,3,4,7,8-HxCDF	9.3E-07	J	9.3E-07					
RJ782	1,2,3,6,7,8-HxCDD	2.6E-06	J	2.6E-06					
RJ782	1,2,3,6,7,8-HxCDF	2.8E-06	UJ	1.4E-06					
RJ782	1,2,3,7,8,9-HxCDD	1.7E-06	J	1.7E-06					
RJ782	1,2,3,7,8,9-HxCDF	3.4E-07	U	1.7E-07					
RJ782	1,2,3,7,8-PeCDD	4.9E-07	U	2.5E-07					
RJ782	1,2,3,7,8-PeCDF	2.8E-07	U	1.4E-07					
RJ782	2,3,4,6,7,8-HxCDF	7.1E-07	J	7.1E-07					
RJ782	2,3,4,7,8-PeCDF	5.9E-07	J	5.9E-07					
RJ782	2,3,7,8-TCDD	5.6E-07	U	2.8E-07					
RJ782	2,3,7,8-TCDF	4.3E-07	J	4.3E-07					
RJ782	OCDD	6.3E-04	J	6.3E-04					
RJ782	OCDF	4.0E-05	J	4.0E-05					
RJ782	Total HpCDD	1.3E-04		1.3E-04					
RJ782	Total HpCDF	2.0E-05		2.0E-05					
RJ782	Total HxCDD	2.0E-05		2.0E-05					
RJ782	Total HxCDF	1.0E-05		1.0E-05					
RJ782	Total PeCDD	4.9E-07	U	2.5E-07					

PCDD/PCDF Congener Group Summation for Soil (0-2 feet bgs)
Old Conservation Yard RFI Site

EPA ID	PCDD/PCDF Congener	Measured Concentration [a] (mg/kg)	Data Qualifier	Adjusted Concentration [b] (mg/kg)	Sum of PCDD/PCDF Congener Concentrations				
					Total Tetra (mg/kg)	Total Penta (mg/kg)	Total Hexa (mg/kg)	Total Hepta (mg/kg)	Total Octa (mg/kg)
RJ782	Total PeCDF	3.6E-06	J	3.6E-06					
RJ782	Total TCDD	5.6E-07	U	2.8E-07					
RJ782	Total TCDF	2.0E-06	J	2.0E-06					
RJ783	1,2,3,4,6,7,8-HpCDD	3.3E-03		3.3E-03	1.3E-05	1.0E-04	6.8E-04	3.6E-03	1.6E-02
RJ783	1,2,3,4,6,7,8-HpCDF	2.3E-04		2.3E-04					
RJ783	1,2,3,4,7,8,9-HpCDF	6.0E-05		6.0E-05					
RJ783	1,2,3,4,7,8-HxCDD	1.5E-04		1.5E-04					
RJ783	1,2,3,4,7,8-HxCDF	1.2E-04		1.2E-04					
RJ783	1,2,3,6,7,8-HxCDD	1.6E-04		1.6E-04					
RJ783	1,2,3,6,7,8-HxCDF	5.0E-05	UJ	2.5E-05					
RJ783	1,2,3,7,8,9-HxCDD	1.7E-04		1.7E-04					
RJ783	1,2,3,7,8,9-HxCDF	2.0E-05		2.0E-05					
RJ783	1,2,3,7,8-PeCDD	6.0E-05		6.0E-05					
RJ783	1,2,3,7,8-PeCDF	1.0E-05		1.0E-05					
RJ783	2,3,4,6,7,8-HxCDF	3.0E-05		3.0E-05					
RJ783	2,3,4,7,8-PeCDF	3.0E-05		3.0E-05					
RJ783	2,3,7,8-TCDD	1.0E-05		1.0E-05					
RJ783	2,3,7,8-TCDF	2.9E-06	J	2.9E-06					
RJ783	OCDD	1.5E-02	J	1.5E-02					
RJ783	OCDF	7.0E-04		7.0E-04					
RJ783	Total HpCDD	9.3E-03		9.3E-03					
RJ783	Total HpCDF	8.8E-04		8.8E-04					
RJ783	Total HxCDD	2.9E-03		2.9E-03					
RJ783	Total HxCDF	5.4E-04		5.4E-04					
RJ783	Total PeCDD	5.5E-04		5.5E-04					
RJ783	Total PeCDF	1.8E-04		1.8E-04					
RJ783	Total TCDD	1.4E-04		1.4E-04					
RJ783	Total TCDF	9.0E-05	J	9.0E-05					
MJ665	1,2,3,4,6,7,8-HpCDD	9.0E-05		9.0E-05	9.9E-07	2.5E-06	1.1E-05	1.0E-04	1.7E-03
MJ665	1,2,3,4,6,7,8-HpCDF	1.0E-05		1.0E-05					
MJ665	1,2,3,4,7,8,9-HpCDF	1.3E-06	J	1.3E-06					
MJ665	1,2,3,4,7,8-HxCDD	1.1E-06	J	1.1E-06					
MJ665	1,2,3,4,7,8-HxCDF	1.9E-06	J	1.9E-06					
MJ665	1,2,3,6,7,8-HxCDD	3.5E-06		3.5E-06					
MJ665	1,2,3,6,7,8-HxCDF	9.9E-07	J	9.9E-07					
MJ665	1,2,3,7,8,9-HxCDD	2.3E-06	J	2.3E-06					
MJ665	1,2,3,7,8,9-HxCDF	4.2E-07	J	4.2E-07					
MJ665	1,2,3,7,8-PeCDD	6.6E-07	J	6.6E-07					
MJ665	1,2,3,7,8-PeCDF	6.9E-07	J	6.9E-07					
MJ665	2,3,4,6,7,8-HxCDF	1.1E-06	J	1.1E-06					
MJ665	2,3,4,7,8-PeCDF	1.2E-06	J	1.2E-06					
MJ665	2,3,7,8-TCDD	1.2E-07	U	6.0E-08					
MJ665	2,3,7,8-TCDF	9.3E-07		9.3E-07					
MJ665	OCDD	1.7E-03		1.7E-03					
MJ665	OCDF	5.0E-05		5.0E-05					
MJ665	Total HpCDD	3.1E-04		3.1E-04					
MJ665	Total HpCDF	4.0E-05		4.0E-05					
MJ665	Total HxCDD	3.0E-05		3.0E-05					
MJ665	Total HxCDF	2.0E-05		2.0E-05					
MJ665	Total PeCDD	1.0E-05		1.0E-05					
MJ665	Total PeCDF	1.0E-05		1.0E-05					
MJ665	Total TCDD	1.5E-06		1.5E-06					
MJ665	Total TCDF	1.0E-05		1.0E-05					
MJ677	1,2,3,4,6,7,8-HpCDD	9.0E-05		9.0E-05	5.3E-07	1.3E-06	7.8E-06	1.1E-04	1.0E-03
MJ677	1,2,3,4,6,7,8-HpCDF	2.0E-05		2.0E-05					
MJ677	1,2,3,4,7,8,9-HpCDF	1.3E-06	J	1.3E-06					
MJ677	1,2,3,4,7,8-HxCDD	1.1E-06	J	1.1E-06					
MJ677	1,2,3,4,7,8-HxCDF	9.7E-07	J	9.7E-07					
MJ677	1,2,3,6,7,8-HxCDD	2.5E-06	J	2.5E-06					
MJ677	1,2,3,6,7,8-HxCDF	6.5E-07	J	6.5E-07					
MJ677	1,2,3,7,8,9-HxCDD	1.7E-06	J	1.7E-06					

PCDD/PCDF Congener Group Summation for Soil (0-2 feet bgs)
Old Conservation Yard RFI Site

EPA ID	PCDD/PCDF Congener	Measured Concentration [a] (mg/kg)	Data Qualifier	Adjusted Concentration [b] (mg/kg)	Sum of PCDD/PCDF Congener Concentrations				
					Total Tetra (mg/kg)	Total Penta (mg/kg)	Total Hexa (mg/kg)	Total Hepta (mg/kg)	Total Octa (mg/kg)
MJ677	1,2,3,7,8,9-HxCDF	2.9E-07	U	1.4E-07					
MJ677	1,2,3,7,8-PeCDD	4.3E-07	J	4.3E-07					
MJ677	1,2,3,7,8-PeCDF	2.6E-07	J	2.6E-07					
MJ677	2,3,4,6,7,8-HxCDF	8.2E-07	J	8.2E-07					
MJ677	2,3,4,7,8-PeCDF	5.8E-07	J	5.8E-07					
MJ677	2,3,7,8-TCDD	9.1E-08	U	4.5E-08					
MJ677	2,3,7,8-TCDF	4.8E-07	J	4.8E-07					
MJ677	OCDD	9.3E-04		9.3E-04					
MJ677	OCDF	7.0E-05		7.0E-05					
MJ677	Total HpCDD	3.2E-04		3.2E-04					
MJ677	Total HpCDF	6.0E-05		6.0E-05					
MJ677	Total HxCDD	3.0E-05		3.0E-05					
MJ677	Total HxCDF	2.0E-05		2.0E-05					
MJ677	Total PeCDD	2.7E-06		2.7E-06					
MJ677	Total PeCDF	1.0E-05		1.0E-05					
MJ677	Total TCDD	1.9E-07		1.9E-07					
MJ677	Total TCDF	4.0E-06		4.0E-06					
MJ678	1,2,3,4,6,7,8-HpCDD	6.0E-05		6.0E-05	9.4E-07	2.4E-06	8.7E-06	7.1E-05	6.4E-04
MJ678	1,2,3,4,6,7,8-HpCDF	1.0E-05		1.0E-05					
MJ678	1,2,3,4,7,8,9-HpCDF	8.4E-07	J	8.4E-07					
MJ678	1,2,3,4,7,8-HxCDD	8.5E-07	J	8.5E-07					
MJ678	1,2,3,4,7,8-HxCDF	1.5E-06	J	1.5E-06					
MJ678	1,2,3,6,7,8-HxCDD	2.3E-06	J	2.3E-06					
MJ678	1,2,3,6,7,8-HxCDF	9.6E-07	J	9.6E-07					
MJ678	1,2,3,7,8,9-HxCDD	1.8E-06	J	1.8E-06					
MJ678	1,2,3,7,8,9-HxCDF	2.7E-07	J	2.7E-07					
MJ678	1,2,3,7,8-PeCDD	5.2E-07	J	5.2E-07					
MJ678	1,2,3,7,8-PeCDF	6.6E-07	J	6.6E-07					
MJ678	2,3,4,6,7,8-HxCDF	1.0E-06	J	1.0E-06					
MJ678	2,3,4,7,8-PeCDF	1.2E-06	J	1.2E-06					
MJ678	2,3,7,8-TCDD	1.5E-07	U	7.5E-08					
MJ678	2,3,7,8-TCDF	8.6E-07	J	8.6E-07					
MJ678	OCDD	6.1E-04		6.1E-04					
MJ678	OCDF	3.0E-05		3.0E-05					
MJ678	Total HpCDD	1.4E-04		1.4E-04					
MJ678	Total HpCDF	3.0E-05		3.0E-05					
MJ678	Total HxCDD	2.0E-05		2.0E-05					
MJ678	Total HxCDF	2.0E-05		2.0E-05					
MJ678	Total PeCDD	1.0E-05		1.0E-05					
MJ678	Total PeCDF	1.0E-05		1.0E-05					
MJ678	Total TCDD	1.3E-06		1.3E-06					
MJ678	Total TCDF	1.0E-05		1.0E-05					
MJ679	1,2,3,4,6,7,8-HpCDD	9.0E-05		9.0E-05	1.3E-06	1.3E-05	4.0E-05	1.2E-04	8.3E-04
MJ679	1,2,3,4,6,7,8-HpCDF	3.0E-05		3.0E-05					
MJ679	1,2,3,4,7,8,9-HpCDF	2.4E-06	J	2.4E-06					
MJ679	1,2,3,4,7,8-HxCDD	1.6E-06	J	1.6E-06					
MJ679	1,2,3,4,7,8-HxCDF	1.0E-05		1.0E-05					
MJ679	1,2,3,6,7,8-HxCDD	4.0E-06		4.0E-06					
MJ679	1,2,3,6,7,8-HxCDF	1.0E-05		1.0E-05					
MJ679	1,2,3,7,8,9-HxCDD	2.8E-06		2.8E-06					
MJ679	1,2,3,7,8,9-HxCDF	1.6E-06	J	1.6E-06					
MJ679	1,2,3,7,8-PeCDD	9.5E-07	J	9.5E-07					
MJ679	1,2,3,7,8-PeCDF	2.1E-06	J	2.1E-06					
MJ679	2,3,4,6,7,8-HxCDF	1.0E-05		1.0E-05					
MJ679	2,3,4,7,8-PeCDF	1.0E-05		1.0E-05					
MJ679	2,3,7,8-TCDD	1.6E-07	UJ	7.9E-08					
MJ679	2,3,7,8-TCDF	1.3E-06		1.3E-06					
MJ679	OCDD	7.7E-04		7.7E-04					
MJ679	OCDF	6.0E-05		6.0E-05					
MJ679	Total HpCDD	2.3E-04		2.3E-04					
MJ679	Total HpCDF	8.0E-05		8.0E-05					

PCDD/PCDF Congener Group Summation for Soil (0-2 feet bgs)
Old Conservation Yard RFI Site

EPA ID	PCDD/PCDF Congener	Measured Concentration [a] (mg/kg)	Data Qualifier	Adjusted Concentration [b] (mg/kg)	Sum of PCDD/PCDF Congener Concentrations				
					Total Tetra (mg/kg)	Total Penta (mg/kg)	Total Hexa (mg/kg)	Total Hepta (mg/kg)	Total Octa (mg/kg)
MJ679	Total HxCDD	4.0E-05		4.0E-05					
MJ679	Total HxCDF	7.0E-05		7.0E-05					
MJ679	Total PeCDD	2.0E-05		2.0E-05					
MJ679	Total PeCDF	6.0E-05		6.0E-05					
MJ679	Total TCDD	1.0E-05		1.0E-05					
MJ679	Total TCDF	4.0E-05		4.0E-05					
MJ680	1,2,3,4,6,7,8-HpCDD	3.0E-05		3.0E-05	3.1E-07	6.4E-07	2.7E-06	3.5E-05	3.7E-04
MJ680	1,2,3,4,6,7,8-HpCDF	4.7E-06		4.7E-06					
MJ680	1,2,3,4,7,8,9-HpCDF	3.1E-07	J	3.1E-07					
MJ680	1,2,3,4,7,8-HxCDD	3.1E-07	J	3.1E-07					
MJ680	1,2,3,4,7,8-HxCDF	3.1E-07	J	3.1E-07					
MJ680	1,2,3,6,7,8-HxCDD	9.4E-07	J	9.4E-07					
MJ680	1,2,3,6,7,8-HxCDF	2.2E-07	J	2.2E-07					
MJ680	1,2,3,7,8,9-HxCDD	5.2E-07	J	5.2E-07					
MJ680	1,2,3,7,8,9-HxCDF	1.2E-07	U	6.0E-08					
MJ680	1,2,3,7,8-PeCDD	1.5E-07	J	1.5E-07					
MJ680	1,2,3,7,8-PeCDF	1.2E-07	J	1.2E-07					
MJ680	2,3,4,6,7,8-HxCDF	3.1E-07	J	3.1E-07					
MJ680	2,3,4,7,8-PeCDF	3.7E-07	J	3.7E-07					
MJ680	2,3,7,8-TCDD	1.2E-07	U	6.0E-08					
MJ680	2,3,7,8-TCDF	2.5E-07	J	2.5E-07					
MJ680	OCDD	3.5E-04		3.5E-04					
MJ680	OCDF	2.0E-05		2.0E-05					
MJ680	Total HpCDD	8.0E-05		8.0E-05					
MJ680	Total HpCDF	2.0E-05		2.0E-05					
MJ680	Total HxCDD	1.0E-05		1.0E-05					
MJ680	Total HxCDF	1.0E-05		1.0E-05					
MJ680	Total PeCDD	1.4E-06		1.4E-06					
MJ680	Total PeCDF	3.2E-06		3.2E-06					
MJ680	Total TCDD	2.1E-07		2.1E-07					
MJ680	Total TCDF	9.2E-07		9.2E-07					
MJ735	1,2,3,4,6,7,8-HpCDD	1.1E-03		1.1E-03	1.1E-05	2.4E-05	9.2E-05	1.3E-03	1.4E-02
MJ735	1,2,3,4,6,7,8-HpCDF	1.8E-04		1.8E-04					
MJ735	1,2,3,4,7,8,9-HpCDF	1.0E-05		1.0E-05					
MJ735	1,2,3,4,7,8-HxCDD	1.0E-05		1.0E-05					
MJ735	1,2,3,4,7,8-HxCDF	1.0E-05		1.0E-05					
MJ735	1,2,3,6,7,8-HxCDD	3.0E-05		3.0E-05					
MJ735	1,2,3,6,7,8-HxCDF	1.0E-05	J	1.0E-05					
MJ735	1,2,3,7,8,9-HxCDD	2.0E-05		2.0E-05					
MJ735	1,2,3,7,8,9-HxCDF	2.3E-06	J	2.3E-06					
MJ735	1,2,3,7,8-PeCDD	1.0E-05		1.0E-05					
MJ735	1,2,3,7,8-PeCDF	3.7E-06		3.7E-06					
MJ735	2,3,4,6,7,8-HxCDF	1.0E-05		1.0E-05					
MJ735	2,3,4,7,8-PeCDF	1.0E-05		1.0E-05					
MJ735	2,3,7,8-TCDD	5.5E-07		5.5E-07					
MJ735	2,3,7,8-TCDF	1.0E-05		1.0E-05					
MJ735	OCDD	1.3E-02		1.3E-02					
MJ735	OCDF	8.0E-04		8.0E-04					
MJ735	Total HpCDD	2.4E-03		2.4E-03					
MJ735	Total HpCDF	6.4E-04		6.4E-04					
MJ735	Total HxCDD	2.7E-04		2.7E-04					
MJ735	Total HxCDF	2.1E-04		2.1E-04					
MJ735	Total PeCDD	3.0E-05		3.0E-05					
MJ735	Total PeCDF	1.0E-04		1.0E-04					
MJ735	Total TCDD	1.0E-05		1.0E-05					
MJ735	Total TCDF	1.2E-04		1.2E-04					
MJ736	1,2,3,4,6,7,8-HpCDD	1.0E-03		1.0E-03	1.1E-05	2.5E-05	1.0E-04	1.2E-03	1.1E-02
MJ736	1,2,3,4,6,7,8-HpCDF	1.5E-04		1.5E-04					
MJ736	1,2,3,4,7,8,9-HpCDF	1.0E-05		1.0E-05					
MJ736	1,2,3,4,7,8-HxCDD	1.0E-05		1.0E-05					
MJ736	1,2,3,4,7,8-HxCDF	1.0E-05		1.0E-05					

PCDD/PCDF Congener Group Summation for Soil (0-2 feet bgs)
Old Conservation Yard RFI Site

EPA ID	PCDD/PCDF Congener	Measured Concentration [a] (mg/kg)	Data Qualifier	Adjusted Concentration [b] (mg/kg)	Sum of PCDD/PCDF Congener Concentrations				
					Total Tetra (mg/kg)	Total Penta (mg/kg)	Total Hexa (mg/kg)	Total Hepta (mg/kg)	Total Octa (mg/kg)
MJ736	1,2,3,6,7,8-HxCDD	4.0E-05		4.0E-05					
MJ736	1,2,3,6,7,8-HxCDF	1.0E-05		1.0E-05					
MJ736	1,2,3,7,8,9-HxCDD	2.0E-05		2.0E-05					
MJ736	1,2,3,7,8,9-HxCDF	3.0E-06		3.0E-06					
MJ736	1,2,3,7,8-PeCDD	1.0E-05		1.0E-05					
MJ736	1,2,3,7,8-PeCDF	5.0E-06		5.0E-06					
MJ736	2,3,4,6,7,8-HxCDF	1.0E-05		1.0E-05					
MJ736	2,3,4,7,8-PeCDF	1.0E-05		1.0E-05					
MJ736	2,3,7,8-TCDD	1.0E-06		1.0E-06					
MJ736	2,3,7,8-TCDF	1.0E-05		1.0E-05					
MJ736	OCDD	1.1E-02		1.1E-02					
MJ736	OCDF	3.6E-04		3.6E-04					
MJ736	Total HpCDD	2.2E-03		2.2E-03					
MJ736	Total HpCDF	6.1E-04		6.1E-04					
MJ736	Total HxCDD	3.1E-04		3.1E-04					
MJ736	Total HxCDF	2.8E-04		2.8E-04					
MJ736	Total PeCDD	6.0E-05		6.0E-05					
MJ736	Total PeCDF	1.0E-04		1.0E-04					
MJ736	Total TCDD	2.0E-05		2.0E-05					
MJ736	Total TCDF	1.0E-04		1.0E-04					
				MAX	1.3E-05	1.0E-04	6.8E-04	3.6E-03	1.6E-02

Maximum of Total Summed Congener Concentrations

Total Tetra	1.3E-05
Total Penta	1.0E-04
Total Hexa	6.8E-04
Total Hepta	3.6E-03
Total Octa	1.6E-02

Notes:

a. Measured concentration - concentration reported by the analytial laboratory

b. Adjusted concentration - concentration reported by the analytical laboratory if the chemical was detected, or estimated at one-half the sample quantitation limit (SQL) limit if not detected.

PCDD/PCDF - polychlorinated dibenzo-p-dioxins and dibenzofurans

Total Tetra - sum of the 2,3,7,8-substituted tetraclorinated dibenzo-p-dioxin and dibenzofuran congeners.

Total Penta - sum of the 2,3,7,8-substituted pentaclorinated dibenzo-p-dioxin and dibenzofuran congeners.

Total Hexa - sum of the 2,3,7,8-substituted hexaclorinated dibenzo-p-dioxin and dibenzofuran congeners.

Total Hepta - sum of the 2,3,7,8-substituted heptaclorinated dibenzo-p-dioxin and dibenzofuran congeners.

Total Octa - sum of the 2,3,7,8-substituted Octaclorinated dibenzo-p-dioxin and dibenzofuran congeners.

J - concentration estimated

U - not detected. Concentration shown is the SQL.

UJ - not detected. Concentration shown is the estimated SQL.

mg/kg - milligrams per kilogram

bgs- below ground surface

Comparison of Inorganic Compound and PCDD/PCDF Concentrations in Soil (0-10 feet bgs) Against Background [a]
Old Conservation Yard RFI Site

PCDD/PCDF Congener Groups	Maximum Background (mg/kg)	Maximum RFI Site (mg/kg)	Results of Wilcoxon-Rank Sum Test	RFI Site Ever Detected?	RFI Site Exceeds Background?
Total Tetra	9.5E-07	1.3E-05	Yes	Yes	Yes
Total Penta	8.7E-07	1.0E-04	Yes	Yes	Yes
Total Hexa	5.1E-06	6.8E-04	Yes	Yes	Yes
Total Hepta	1.6E-05	3.6E-03	Yes	Yes	Yes
Total Octa	1.5E-04	1.6E-02	Yes	Yes	Yes

Inorganic Compounds	Maximum Background [a] (mg/kg)	Maximum RFI Site (mg/kg)	Results of Wilcoxon-Rank Sum Test Indicates Exceeds Background?	RFI Site Ever Detected?	RFI Site Exceeds Background?
Aluminum	2.0E+04	2.7E+04	No	Yes	No [b]
Antimony	8.7E+00	1.8E+01	No	Yes	No [b]
Arsenic	1.5E+01	6.5E+00	No	Yes	No [b]
Barium	1.4E+02	1.9E+02	No	Yes	No [b]
Beryllium	1.1E+00	1.0E+00	No	Yes	No [b]
Boron	9.7E+00	1.2E+01	Yes	Yes	Yes [b]
Cadmium	1.0E+00	3.0E+00	Yes	Yes	Yes
Chromium	3.7E+01	4.5E+01	No	Yes	No [b]
Hexavalent chromium	-	0.0E+00	-	No	No
Cobalt	2.1E+01	1.0E+01	No	Yes	No [b]
Copper	2.9E+01	6.0E+01	No	Yes	No [b]
Lead	3.4E+01	1.4E+02	No	Yes	No [b]
Manganese	5.0E+02	3.1E+02	No	Yes	No [b]
Mercury	9.0E-02	2.3E+01	No	Yes	No [b]
Molybdenum	5.3E+00	1.6E+00	No	Yes	No [b]
Nickel	2.9E+01	2.8E+01	No	Yes	No [b]
Selenium	6.6E-01	4.7E-01	No	Yes	No [b]
Silver	7.9E-01	1.1E+01	Yes	Yes	Yes
Thallium	4.6E-01	2.8E+00	No	Yes	No [b]
Vanadium	6.2E+01	5.7E+01	No	Yes	No [b]
Zinc	1.1E+02	7.3E+02	No	Yes	No [b]

Notes:

a. The concentrations of inorganic compounds for which soil background data are not available are considered to be above background concentrations if they are detected and are potentially site-related.

b. Determined be within the range of background since the RFI site sample population for soils at 0 to 10 feet bgs was found to be no different than the background sample population at p=0.05 based on the Wilcoxon Rank Sum Test.

PCDD/PCDF - polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.

Total Tetra - sum of the 2,3,7,8-substituted tetrachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations.

Total Penta - sum of the 2,3,7,8-substituted pentachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations.

Total Hexa - sum of the 2,3,7,8-substituted hexachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations.

Total Hepta - sum of the 2,3,7,8-substituted heptachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations.

Total Octa - sum of the octachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations.

95% UCL - 95 percent upper confidence limit on the mean

mg/kg - milligrams per kilogram

bgs- below ground surface

Comparison of Inorganic Compound and PCDD/PCDF Concentrations in Soil (0-2 feet bgs) Against Background [a]
Old Conservation Yard RFI Site

PCDD/PCDF Congener Groups	Maximum Background (mg/kg)	Maximum RFI Site (mg/kg)	Results of Wilcoxon-Rank Sum Test	RFI Site Ever Detected?	RFI Site Exceeds Background?
Total Tetra	9.5E-07	1.3E-05	Yes	Yes	Yes
Total Penta	8.7E-07	1.0E-04	Yes	Yes	Yes
Total Hexa	5.1E-06	6.8E-04	Yes	Yes	Yes
Total Hepta	1.6E-05	3.6E-03	Yes	Yes	Yes
Total Octa	1.5E-04	1.6E-02	Yes	Yes	Yes

Inorganic Compounds	Maximum Background [a] (mg/kg)	Maximum RFI Site (mg/kg)	Results of Wilcoxon-Rank Sum Test	RFI Site Ever Detected?	RFI Site Exceeds Background?
Aluminum	2.0E+04	2.4E+04	No	Yes	No [b]
Antimony	8.7E+00	9.7E-01	No	Yes	No [b]
Arsenic	1.5E+01	4.7E+00	No	Yes	No [b]
Barium	1.4E+02	1.4E+02	No	Yes	No [b]
Beryllium	1.1E+00	1.0E+00	No	Yes	No [b]
Boron	9.7E+00	1.2E+01	No	Yes	No [b]
Cadmium	1.0E+00	2.2E+00	Yes	Yes	Yes
Chromium	3.7E+01	4.5E+01	No	Yes	No [b]
Hexavalent chromium		0.0E+00	--	No	No
Cobalt	2.1E+01	1.0E+01	No	Yes	No [b]
Copper	2.9E+01	2.9E+01	No	Yes	No [b]
Lead	3.4E+01	9.4E+01	No	Yes	No [b]
Manganese	5.0E+02	2.6E+02	No	Yes	No [b]
Mercury	9.0E-02	2.3E+01	No	Yes	No [b]
Molybdenum	5.3E+00	1.6E+00	No	Yes	No [b]
Nickel	2.9E+01	2.6E+01	No	Yes	No [b]
Selenium	6.6E-01	3.7E-01	No	Yes	No [b]
Silver	7.9E-01	4.0E+00	Yes	Yes	Yes
Thallium	4.6E-01	1.7E+00	No	Yes	No [b]
Vanadium	6.2E+01	5.7E+01	No	Yes	No [b]
Zinc	1.1E+02	1.6E+02	No	Yes	No [b]

Notes:

a. The concentrations of inorganic compounds for which soil background data are not available are considered to be above background concentrations if they are detected and are potentially site-related.

b. Determined be within the range of background since the RFI site sample population for soils at 0 to 2 feet bgs was found to be no different than the background sample population at p=0.05 based on the Wilcoxon Rank Sum Test.

PCDD/PCDF - Polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.

Total Tetra - sum of the 2,3,7,8-substituted tetrachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations.

Total Penta - sum of the 2,3,7,8-substituted pentachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations.

Total Hexa - sum of the 2,3,7,8-substituted hexachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations.

Total Hepta - sum of the 2,3,7,8-substituted heptachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations.

Total Octa - sum of the octachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations.

mg/kg - milligrams per kilogram

bgs- below ground surface

Selection of Chemicals of Potential Concern in Chatsworth Formation Groundwater
Old Conservation Yard RFI Site

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (mg/L)	Potentially Site Related	Chemical Detected in Laboratory Blanks [a]	Maximum Detected Concentration Exceeds Background [b]	COPC
Inorganic Compounds								
Aluminum	-	-	-	-	No	No	No	No
Antimony	-	-	-	-	No	No	No	No
Arsenic	-	-	-	-	No	No	No	No
Barium	-	-	-	-	No	No	No	No
Beryllium	-	-	-	-	No	No	No	No
Boron	-	-	-	-	No	No	No	No
Cadmium	-	-	-	-	No	No	No	No
Chromium	-	-	-	-	No	No	No	No
Hexavalent chromium	-	-	-	-	No	No	No	No
Cobalt	-	-	-	-	No	No	No	No
Copper	-	-	-	-	No	No	No	No
Fluoride	-	-	-	-	No	No	Yes	Yes
Lead	-	-	-	-	No	No	No	No
Manganese	-	-	-	-	No	No	No	No
Mercury	-	-	-	-	No	No	No	No
Molybdenum	-	-	-	-	No	No	No	No
Nickel	-	-	-	-	No	No	No	No
Nitrate	-	-	-	-	No	No	Yes	Yes
Perchlorate	-	-	-	-	No	No	-	No
Selenium	-	-	-	-	No	No	No	No
Silver	-	-	-	-	No	No	No	No
Strontium	-	-	-	-	No	No	No	No
Thallium	-	-	-	-	No	No	No	No
Tin	-	-	-	-	No	No	No	No
Vanadium	-	-	-	-	No	No	No	No
Zinc	-	-	-	-	No	No	No	No
VOCs								
1,1,1,2-Tetrachloroethane	-	-	-	-	No	No	-	No
1,1,1-Trichloroethane	11	0	0	0.0E+00	No	No	-	No
1,1,2,2-Tetrachloroethane	-	-	-	-	No	No	-	No
1,1,2-Trichloro-1,2,2-trifluoroethane	5	0	0	0.0E+00	No	No	-	No
1,1,2-Trichloroethane	-	-	-	-	No	No	-	No
1,1-Dichloroethane	-	-	-	-	No	No	-	No
1,1-Dichloroethene	11	0	0	0.0E+00	No	No	-	No
1,1-Dichloropropene	-	-	-	-	No	No	-	No
1,2,3-Trichlorobenzene	-	-	-	-	No	No	-	No
1,2,3-Trichloropropane	-	-	-	-	No	No	-	No
1,2,4-Trichlorobenzene	-	-	-	-	No	No	-	No
1,2,4-Trimethylbenzene	-	-	-	-	No	No	-	No
1,2-Dibromo-3-chloropropane	-	-	-	-	No	No	-	No
1,2-Dibromoethane	-	-	-	-	No	No	-	No
1,2-Dichlorobenzene	-	-	-	-	No	No	-	No
1,2-Dichloroethane	11	0	0	0.0E+00	No	No	-	No
1,2-Dichloropropane	-	-	-	-	No	No	-	No
1,3,5-Trimethylbenzene	-	-	-	-	No	No	-	No
1,3-Dichlorobenzene	-	-	-	-	No	No	-	No
1,4-Dichlorobenzene	-	-	-	-	No	No	-	No
2-Butanone	4	0	0	0.0E+00	No	No	-	No
2-Chloroethylvinylether	-	-	-	-	No	No	-	No
2-Chlorotoluene	-	-	-	-	No	No	-	No
2-Chloro-1,1,1-trifluoroethane	-	-	-	-	No	No	-	No
2-Hexanone	-	-	-	-	No	No	-	No

Selection of Chemicals of Potential Concern in Chatsworth Formation Groundwater
Old Conservation Yard RFI Site

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (mg/L)	Potentially Site Related	Chemical Detected in Laboratory Blanks [a]	Maximum Detected Concentration Exceeds Background [b]	COPC
4-Bromofluorobenzene	-	-	-	-	No	No	-	No
4-Chlorotoluene	-	-	-	-	No	No	-	No
4-Isopropyltoluene	-	-	-	-	No	No	-	No
4-Methyl-2-pentanone	-	-	-	-	No	No	-	No
Acetone	5	0	0	0.0E+00	No	No	-	No
Acrolein	-	-	-	-	No	No	-	No
Acrylonitrile	-	-	-	-	No	No	-	No
Benzene	6	0	0	0.0E+00	No	No	-	No
Benzidine	-	-	-	-	No	No	-	No
Bromobenzene	-	-	-	-	No	No	-	No
Bromodichloromethane	-	-	-	-	No	No	-	No
Bromoform	-	-	-	-	No	No	-	No
Bromomethane	-	-	-	-	No	No	-	No
Carbon disulfide	-	-	-	-	No	No	-	No
Carbon tetrachloride	-	-	-	-	No	No	-	No
Chlorobenzene	-	-	-	-	No	No	-	No
Chloroethane	-	-	-	-	No	No	-	No
Chloroform	-	-	-	-	No	No	-	No
Chloromethane	11	1	9	3.2E-04	No	No	-	Yes
Chlorotrifluoroethene	-	-	-	-	No	No	-	No
cis-1,2-Dichloroethene	9	4	44	3.5E-04	No	No	-	Yes
cis-1,3-Dichloropropene	-	-	-	-	No	No	-	No
Dibromochloromethane	-	-	-	-	No	No	-	No
Dibromomethane	-	-	-	-	No	No	-	No
Dichlorodifluoromethane	-	-	-	-	No	No	-	No
Ethylbenzene	6	0	0	0.0E+00	No	No	-	No
Formaldehyde	-	-	-	-	No	No	-	No
Isopropylbenzene	-	-	-	-	No	No	-	No
m,p-Xylene	3	0	0	0.0E+00	No	No	-	No
Methyl tert-butyl ether	-	-	-	-	No	No	-	No
Methylene chloride	11	0	0	0.0E+00	No	No	-	No
n-Butylbenzene	-	-	-	-	No	No	-	No
n-Propylbenzene	-	-	-	-	No	No	-	No
o-Xylene	3	0	0	0.0E+00	No	No	-	No
p-Isopropyltoluene	-	-	-	-	No	No	-	No
sec-Butylbenzene	-	-	-	-	No	No	-	No
Styrene	-	-	-	-	No	No	-	No
tert-Butylbenzene	-	-	-	-	No	No	-	No
Tetrachloroethene	-	-	-	-	No	No	-	No
Toluene	6	0	0	0.0E+00	No	No	-	No
trans-1,2-Dichloroethene	11	0	0	0.0E+00	No	No	-	No
trans-1,3-Dichloropropene	-	-	-	-	No	No	-	No
Trichloroethene	11	10	91	4.3E-03	No	No	-	Yes
Trichlorofluoromethane	-	-	-	-	No	No	-	No
Vinyl acetate	-	-	-	-	No	No	-	No
Vinyl chloride	-	-	-	-	No	No	-	No
SVOCs								
1,2-Diphenylhydrazine	-	-	-	-	No	No	-	No
1,4-Dioxane	-	-	-	-	No	No	-	No
2,4,5-Trichlorophenol	-	-	-	-	No	No	-	No
2,4,6-Trichlorophenol	-	-	-	-	No	No	-	No
2,4-Dichlorophenol	-	-	-	-	No	No	-	No
2,4-Dimethylphenol	-	-	-	-	No	No	-	No

Selection of Chemicals of Potential Concern in Chatsworth Formation Groundwater
Old Conservation Yard RFI Site

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (mg/L)	Potentially Site Related	Chemical Detected in Laboratory Blanks [a]	Maximum Detected Concentration Exceeds Background [b]	COPC
2,4-Dinitrophenol	-	-	-	-	No	No	-	No
2,4-Dinitrotoluene	-	-	-	-	No	No	-	No
2,6-Dinitrotoluene	-	-	-	-	No	No	-	No
2-Chloronaphthalene	-	-	-	-	No	No	-	No
2-Chlorophenol	-	-	-	-	No	No	-	No
2-Methylnaphthalene	-	-	-	-	No	No	-	No
2-Methylphenol	-	-	-	-	No	No	-	No
2-Nitroaniline	-	-	-	-	No	No	-	No
2-Nitrophenol	-	-	-	-	No	No	-	No
3- and 4-Methylphenol Coelution	-	-	-	-	No	No	-	No
3-Methylphenol	-	-	-	-	No	No	-	No
4-Methylphenol	-	-	-	-	No	No	-	No
3,3'-Dichlorobenzidine	-	-	-	-	No	No	-	No
3-Nitroaniline	-	-	-	-	No	No	-	No
4,6-Dinitro-2-methylphenol	-	-	-	-	No	No	-	No
4-Bromophenyl phenyl ether	-	-	-	-	No	No	-	No
4-Chloro-3-methylphenol	-	-	-	-	No	No	-	No
4-Chloroaniline	-	-	-	-	No	No	-	No
4-Chlorophenyl phenyl ether	-	-	-	-	No	No	-	No
4-Nitroaniline	-	-	-	-	No	No	-	No
4-Nitrophenol	-	-	-	-	No	No	-	No
Acenaphthene	-	-	-	-	No	No	-	No
Acenaphthylene	-	-	-	-	No	No	-	No
Aniline	-	-	-	-	No	No	-	No
Anthracene	-	-	-	-	No	No	-	No
Benzo(a)anthracene	-	-	-	-	No	No	-	No
Benzo(a)pyrene	-	-	-	-	No	No	-	No
Benzo(b)fluoranthene	-	-	-	-	No	No	-	No
Benzo(g,h,i)perylene	-	-	-	-	No	No	-	No
Benzo(k)fluoranthene	-	-	-	-	No	No	-	No
Benzoic acid	-	-	-	-	No	No	-	No
Benzyl alcohol	-	-	-	-	No	No	-	No
bis(2-Chloroethoxy)methane	-	-	-	-	No	No	-	No
bis(2-Chloroethyl)ether	-	-	-	-	No	No	-	No
bis(2-Chloroisopropyl) ether	-	-	-	-	No	No	-	No
bis(2-Ethylhexyl)phthalate	-	-	-	-	No	No	-	No
Butyl benzyl phthalate	-	-	-	-	No	No	-	No
Carbazole	-	-	-	-	No	No	-	No
Chrysene	-	-	-	-	No	No	-	No
Dibenz(a,h)anthracene	-	-	-	-	No	No	-	No
Dibenzofuran	-	-	-	-	No	No	-	No
Diethylphthalate	-	-	-	-	No	No	-	No
Dimethyl phthalate	-	-	-	-	No	No	-	No
Di-n-butylphthalate	-	-	-	-	No	No	-	No
Di-n-octyl phthalate	-	-	-	-	No	No	-	No
Fluoranthene	-	-	-	-	No	No	-	No
Fluorene	-	-	-	-	No	No	-	No
Hexachlorobenzene	-	-	-	-	No	No	-	No
Hexachlorobutadiene	-	-	-	-	No	No	-	No
Hexachlorocyclopentadiene	-	-	-	-	No	No	-	No
Hexachloroethane	-	-	-	-	No	No	-	No
Indeno(1,2,3-cd)pyrene	-	-	-	-	No	No	-	No
Isophorone	-	-	-	-	No	No	-	No

Selection of Chemicals of Potential Concern in Chatsworth Formation Groundwater
Old Conservation Yard RFI Site

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (mg/L)	Potentially Site Related	Chemical Detected in Laboratory Blanks [a]	Maximum Detected Concentration Exceeds Background [b]	COPC
Naphthalene	-	-	-	-	No	No	-	No
Nitrobenzene	-	-	-	-	No	No	-	No
N-Nitrosodimethylamine	-	-	-	-	No	No	-	No
N-Nitrosodi-n-propylamine	-	-	-	-	No	No	-	No
N-Nitrosodiphenylamine	-	-	-	-	No	No	-	No
Pentachlorophenol	-	-	-	-	No	No	-	No
Phenanthrene	-	-	-	-	No	No	-	No
Phenol	-	-	-	-	No	No	-	No
Pyrene	-	-	-	-	No	No	-	No
Pyridine	-	-	-	-	No	No	-	No
Total Petroleum Hydrocarbons								
C08-C11(Gasoline Range)	-	-	-	-	No	No	-	No
C11-C14(Kerosene Range)	-	-	-	-	No	No	-	No
C14-C20(Diesel Range)	-	-	-	-	No	No	-	No
C20-C30(Lubricant Oil Range)	-	-	-	-	No	No	-	No
PCDD/PCDFs								
2,3,7,8-TCDD	-	-	-	-	No	No	-	No
1,2,3,7,8-PeCDD	-	-	-	-	No	No	-	No
1,2,3,4,7,8-HxCDD	-	-	-	-	No	No	-	No
1,2,3,6,7,8-HxCDD	-	-	-	-	No	No	-	No
1,2,3,7,8,9-HxCDD	-	-	-	-	No	No	-	No
1,2,3,4,6,7,8-HpCDD	-	-	-	-	No	No	-	No
OCDD	-	-	-	-	No	No	-	No
2,3,7,8-TCDF	-	-	-	-	No	No	-	No
1,2,3,7,8-PeCDF	-	-	-	-	No	No	-	No
2,3,4,7,8-PeCDF	-	-	-	-	No	No	-	No
1,2,3,4,7,8-HxCDF	-	-	-	-	No	No	-	No
1,2,3,6,7,8-HxCDF	-	-	-	-	No	No	-	No
2,3,4,6,7,8-HxCDF	-	-	-	-	No	No	-	No
1,2,3,7,8,9-HxCDF	-	-	-	-	No	No	-	No
1,2,3,4,6,7,8-HpCDF	-	-	-	-	No	No	-	No
1,2,3,4,7,8,9-HpCDF	-	-	-	-	No	No	-	No
OCDF	-	-	-	-	No	No	-	No
Total Tetra	-	-	-	-	-	-	-	No
Total Penta	-	-	-	-	-	-	-	No
Total Hexa	-	-	-	-	-	-	-	No
Total Hepta	-	-	-	-	-	-	-	No
Total Octa	-	-	-	-	-	-	-	No
PCDD/PCDF	-	-	-	-	-	-	-	No
PCBs								
Aroclor-1016	-	-	-	-	No	No	-	No
Aroclor-1221	-	-	-	-	No	No	-	No
Aroclor-1232	-	-	-	-	No	No	-	No
Aroclor-1242	-	-	-	-	No	No	-	No
Aroclor-1248	-	-	-	-	No	No	-	No
Aroclor-1254	-	-	-	-	No	No	-	No
Aroclor-1260	-	-	-	-	No	No	-	No
PCB-105	-	-	-	-	No	No	-	No
PCB-114	-	-	-	-	No	No	-	No
PCB-118	-	-	-	-	No	No	-	No
PCB-123	-	-	-	-	No	No	-	No
PCB-126	-	-	-	-	No	No	-	No
PCB-156	-	-	-	-	No	No	-	No

Selection of Chemicals of Potential Concern in Chatsworth Formation Groundwater
Old Conservation Yard RFI Site

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (mg/L)	Potentially Site Related	Chemical Detected in Laboratory Blanks [a]	Maximum Detected Concentration Exceeds Background [b]	COPC
PCB-157	-	-	-	-	No	No	-	No
PCB-167	-	-	-	-	No	No	-	No
PCB-169	-	-	-	-	No	No	-	No
PCB-189	-	-	-	-	No	No	-	No
PCB-77	-	-	-	-	No	No	-	No
PCB-81	-	-	-	-	No	No	-	No

Notes:
a. Any chemical eliminated as COPC due to laboratory blank contamination is discussed in Section 3.0.
COPC - chemical of potential concern
VOC - volatile organic chemicals
SVOC - semivolatile organic chemicals
PCDD/PDDFs - polychlorinated dibenzo-p-dioxins and dibenzofurans
"-" not applicable
mg/L - milligrams per liter
bgs- below ground surface

Selection of Chemicals of Potential Concern in Chatsworth Formation Groundwater
Group 6 Reporting Area

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (mg/L)	Potentially Site Related	Chemical Detected in Laboratory Blanks [a]	Maximum Detected Concentration Exceeds Background [b]	COPC
Inorganic Compounds								
Aluminum	-	-	-	-	No	No	No	No
Antimony	-	-	-	-	No	No	No	No
Arsenic	-	-	-	-	No	No	No	No
Barium	-	-	-	-	No	No	No	No
Beryllium	-	-	-	-	No	No	No	No
Boron	-	-	-	-	No	No	No	No
Cadmium	-	-	-	-	No	No	No	No
Chromium	-	-	-	-	No	No	No	No
Hexavalent chromium	-	-	-	-	No	No	No	No
Cobalt	-	-	-	-	No	No	No	No
Copper	10	9	90	1.8E-02	No	No	Yes	Yes
Fluoride	10	10	100	5.6E-01	No	No	Yes	Yes
Lead	-	-	-	-	No	No	No	No
Manganese	-	-	-	-	No	No	No	No
Mercury	-	-	-	-	No	No	No	No
Molybdenum	-	-	-	-	No	No	No	No
Nickel	-	-	-	-	No	No	No	No
Nitrate	10	5	50	1.4E+01	No	No	Yes	Yes
Perchlorate	-	-	-	-	No	No	-	No
Selenium	-	-	-	-	No	No	No	No
Silver	-	-	-	-	No	No	No	No
Strontium	-	-	-	-	No	No	No	No
Thallium	8	2	25	5.4E-04	No	No	Yes	Yes
Tin	-	-	-	-	No	No	No	No
Vanadium	-	-	-	-	No	No	No	No
Zinc	-	-	-	-	No	No	No	No
VOCs								
1,1,1,2-Tetrachloroethane	-	-	-	-	No	No	-	No
1,1,1-Trichloroethane	34	0	0	0.0E+00	No	No	-	No
1,1,2,2-Tetrachloroethane	-	-	-	-	No	No	-	No
1,1,2-Trichloro-1,2,2-trifluoroethane	28	0	0	0.0E+00	No	No	-	No
1,1,2-Trichloroethane	-	-	-	-	No	No	-	No
1,1-Dichloroethane	34	1	3	2.6E-03	No	No	-	No
1,1-Dichloroethene	34	0	0	0.0E+00	No	No	-	No
1,1-Dichloropropene	-	-	-	-	No	No	-	No
1,2,3-Trichlorobenzene	-	-	-	-	No	No	-	No
1,2,3-Trichloropropane	-	-	-	-	No	No	-	No
1,2,4-Trichlorobenzene	-	-	-	-	No	No	-	No
1,2,4-Trimethylbenzene	-	-	-	-	No	No	-	No
1,2-Dibromo-3-chloropropane	-	-	-	-	No	No	-	No
1,2-Dibromoethane	-	-	-	-	No	No	-	No
1,2-Dichlorobenzene	-	-	-	-	No	No	-	No
1,2-Dichloroethane	34	1	3	9.0E-04	No	No	-	No
1,2-Dichloropropane	-	-	-	-	No	No	-	No
1,3,5-Trimethylbenzene	-	-	-	-	No	No	-	No
1,3-Dichlorobenzene	-	-	-	-	No	No	-	No
1,4-Dichlorobenzene	-	-	-	-	No	No	-	No
2-Butanone	27	0	0	0.0E+00	No	No	-	No
2-Chloroethylvinylether	-	-	-	-	No	No	-	No
2-Chlorotoluene	-	-	-	-	No	No	-	No
2-Chloro-1,1,1-trifluoroethane	-	-	-	-	No	No	-	No
2-Hexanone	26	0	0	0.0E+00	No	No	-	No

Selection of Chemicals of Potential Concern in Chatsworth Formation Groundwater
Group 6 Reporting Area

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (mg/L)	Potentially Site Related	Chemical Detected in Laboratory Blanks [a]	Maximum Detected Concentration Exceeds Background [b]	COPC
4-Bromofluorobenzene	-	-	-	-	No	No	-	No
4-Chlorotoluene	-	-	-	-	No	No	-	No
4-Isopropyltoluene	1	0	0	0.0E+00	No	No	-	No
4-Methyl-2-pentanone	-	-	-	-	No	No	-	No
Acetone	28	7	25	1.6E-02	No	No	-	Yes
Acrolein	-	-	-	-	No	No	-	No
Acrylonitrile	-	-	-	-	No	No	-	No
Benzene	29	1	3	5.8E-04	No	No	-	No
Benzidine	-	-	-	-	No	No	-	No
Bromobenzene	-	-	-	-	No	No	-	No
Bromodichloromethane	-	-	-	-	No	No	-	No
Bromoform	-	-	-	-	No	No	-	No
Bromomethane	-	-	-	-	No	No	-	No
Carbon disulfide	26	1	4	2.6E-03	No	No	-	No
Carbon tetrachloride	-	-	-	-	No	No	-	No
Chlorobenzene	-	-	-	-	No	No	-	No
Chloroethane	-	-	-	-	No	No	-	No
Chloroform	-	-	-	-	No	No	-	No
Chloromethane	34	3	9	3.2E-04	No	No	-	Yes
Chlorotrifluoroethene	-	-	-	-	No	No	-	No
cis-1,2-Dichloroethene	32	5	16	5.1E-02	No	No	-	Yes
cis-1,3-Dichloropropene	-	-	-	-	No	No	-	No
Dibromochloromethane	-	-	-	-	No	No	-	No
Dibromomethane	-	-	-	-	No	No	-	No
Dichlorodifluoromethane	-	-	-	-	No	No	-	No
Ethylbenzene	29	0	0	0.0E+00	No	No	-	No
Formaldehyde	-	-	-	-	No	No	-	No
Isopropylbenzene	-	-	-	-	No	No	-	No
m,p-Xylene	26	0	0	0.0E+00	No	No	-	No
Methyl tert-butyl ether	-	-	-	-	No	No	-	No
Methylene chloride	34	1	3	6.4E-04	No	No	-	No
n-Butylbenzene	-	-	-	-	No	No	-	No
n-Propylbenzene	-	-	-	-	No	No	-	No
o-Xylene	26	0	0	0.0E+00	No	No	-	No
p-Isopropyltoluene	-	-	-	-	No	No	-	No
sec-Butylbenzene	-	-	-	-	No	No	-	No
Styrene	-	-	-	-	No	No	-	No
tert-Butylbenzene	-	-	-	-	No	No	-	No
Tetrachloroethene	34	0	0	0.0E+00	No	No	-	No
Toluene	29	1	3	1.8E-03	No	No	-	No
trans-1,2-Dichloroethene	34	0	0	0.0E+00	No	No	-	No
trans-1,3-Dichloropropene	-	-	-	-	No	No	-	No
Trichloroethene	34	12	35	1.0E-02	No	No	-	Yes
Trichlorofluoromethane	-	-	-	-	No	No	-	No
Vinyl acetate	-	-	-	-	No	No	-	No
Vinyl chloride	-	-	-	-	No	No	-	No
SVOCs								
1,2-Diphenylhydrazine	-	-	-	-	No	No	-	No
1,4-Dioxane	-	-	-	-	No	No	-	No
2,4,5-Trichlorophenol	-	-	-	-	No	No	-	No
2,4,6-Trichlorophenol	-	-	-	-	No	No	-	No
2,4-Dichlorophenol	-	-	-	-	No	No	-	No
2,4-Dimethylphenol	-	-	-	-	No	No	-	No

Selection of Chemicals of Potential Concern in Chatsworth Formation Groundwater
Group 6 Reporting Area

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (mg/L)	Potentially Site Related	Chemical Detected in Laboratory Blanks [a]	Maximum Detected Concentration Exceeds Background [b]	COPC
2,4-Dinitrophenol	11	0	0	0.0E+00	No	No	-	No
2,4-Dinitrotoluene	-	-	-	-	No	No	-	No
2,6-Dinitrotoluene	-	-	-	-	No	No	-	No
2-Chloronaphthalene	-	-	-	-	No	No	-	No
2-Chlorophenol	-	-	-	-	No	No	-	No
2-Methylnaphthalene	1	0	0	0.0E+00	No	No	-	No
2-Methylphenol	-	-	-	-	No	No	-	No
2-Nitroaniline	-	-	-	-	No	No	-	No
2-Nitrophenol	-	-	-	-	No	No	-	No
3- and 4-Methylphenol Coelution	-	-	-	-	No	No	-	No
3-Methylphenol	-	-	-	-	No	No	-	No
4-Methylphenol	-	-	-	-	No	No	-	No
3,3'-Dichlorobenzidine	-	-	-	-	No	No	-	No
3-Nitroaniline	-	-	-	-	No	No	-	No
4,6-Dinitro-2-methylphenol	-	-	-	-	No	No	-	No
4-Bromophenyl phenyl ether	-	-	-	-	No	No	-	No
4-Chloro-3-methylphenol	-	-	-	-	No	No	-	No
4-Chloroaniline	-	-	-	-	No	No	-	No
4-Chlorophenyl phenyl ether	-	-	-	-	No	No	-	No
4-Nitroaniline	-	-	-	-	No	No	-	No
4-Nitrophenol	-	-	-	-	No	No	-	No
Acenaphthene	7	0	0	0.0E+00	No	No	-	No
Acenaphthylene	7	0	0	0.0E+00	No	No	-	No
Aniline	-	-	-	-	No	No	-	No
Anthracene	7	0	0	0.0E+00	No	No	-	No
Benzo(a)anthracene	7	0	0	0.0E+00	No	No	-	No
Benzo(a)pyrene	7	0	0	0.0E+00	No	No	-	No
Benzo(b)fluoranthene	7	0	0	0.0E+00	No	No	-	No
Benzo(g,h,i)perylene	7	0	0	0.0E+00	No	No	-	No
Benzo(k)fluoranthene	7	0	0	0.0E+00	No	No	-	No
Benzoic acid	-	-	-	-	No	No	-	No
Benzyl alcohol	-	-	-	-	No	No	-	No
bis(2-Chloroethoxy)methane	-	-	-	-	No	No	-	No
bis(2-Chloroethyl)ether	-	-	-	-	No	No	-	No
bis(2-Chloroisopropyl) ether	-	-	-	-	No	No	-	No
bis(2-Ethylhexyl)phthalate	-	-	-	-	No	No	-	No
Butyl benzyl phthalate	-	-	-	-	No	No	-	No
Carbazole	-	-	-	-	No	No	-	No
Chrysene	7	0	0	0.0E+00	No	No	-	No
Dibenz(a,h)anthracene	7	0	0	0.0E+00	No	No	-	No
Dibenzofuran	1	0	0	0.0E+00	No	No	-	No
Diethylphthalate	-	-	-	-	No	No	-	No
Dimethyl phthalate	-	-	-	-	No	No	-	No
Di-n-butylphthalate	-	-	-	-	No	No	-	No
Di-n-octyl phthalate	-	-	-	-	No	No	-	No
Fluoranthene	7	0	0	0.0E+00	No	No	-	No
Fluorene	7	0	0	0.0E+00	No	No	-	No
Hexachlorobenzene	-	-	-	-	No	No	-	No
Hexachlorobutadiene	-	-	-	-	No	No	-	No
Hexachlorocyclopentadiene	-	-	-	-	No	No	-	No
Hexachloroethane	-	-	-	-	No	No	-	No
Indeno(1,2,3-cd)pyrene	7	0	0	0.0E+00	No	No	-	No
Isophorone	-	-	-	-	No	No	-	No

Selection of Chemicals of Potential Concern in Chatsworth Formation Groundwater
Group 6 Reporting Area

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (mg/L)	Potentially Site Related	Chemical Detected in Laboratory Blanks [a]	Maximum Detected Concentration Exceeds Background [b]	COPC
Naphthalene	7	0	0	0.0E+00	No	No	-	No
Nitrobenzene	-	-	-	-	No	No	-	No
N-Nitrosodimethylamine	-	-	-	-	No	No	-	No
N-Nitrosodi-n-propylamine	-	-	-	-	No	No	-	No
N-Nitrosodiphenylamine	-	-	-	-	No	No	-	No
Pentachlorophenol	-	-	-	-	No	No	-	No
Phenanthrene	7	0	0	0.0E+00	No	No	-	No
Phenol	-	-	-	-	No	No	-	No
Pyrene	4	0	0	0.0E+00	No	No	-	No
Pyridine	-	-	-	-	No	No	-	No
Total Petroleum Hydrocarbons								
C08-C11(Gasoline Range)	-	-	-	-	No	No	-	No
C11-C14(Kerosene Range)	-	-	-	-	No	No	-	No
C14-C20(Diesel Range)	1	1	100	5.0E-02	No	No	-	Yes
C20-C30(Lubricant Oil Range)	-	-	-	-	No	No	-	No
PCDD/PCDFs								
2,3,7,8-TCDD	1	0	0	0.0E+00	No	No	-	No
1,2,3,7,8-PeCDD	1	0	0	0.0E+00	No	No	-	No
1,2,3,4,7,8-HxCDD	1	0	0	0.0E+00	No	No	-	No
1,2,3,6,7,8-HxCDD	1	0	0	0.0E+00	No	No	-	No
1,2,3,7,8,9-HxCDD	1	0	0	0.0E+00	No	No	-	No
1,2,3,4,6,7,8-HpCDD	1	0	0	0.0E+00	No	No	-	No
OCDD	1	0	0	0.0E+00	No	No	-	No
2,3,7,8-TCDF	1	0	0	0.0E+00	No	No	-	No
1,2,3,7,8-PeCDF	1	0	0	0.0E+00	No	No	-	No
2,3,4,7,8-PeCDF	1	0	0	0.0E+00	No	No	-	No
1,2,3,4,7,8-HxCDF	1	0	0	0.0E+00	No	No	-	No
1,2,3,6,7,8-HxCDF	1	0	0	0.0E+00	No	No	-	No
2,3,4,6,7,8-HxCDF	1	0	0	0.0E+00	No	No	-	No
1,2,3,7,8,9-HxCDF	1	0	0	0.0E+00	No	No	-	No
1,2,3,4,6,7,8-HpCDF	1	0	0	0.0E+00	No	No	-	No
1,2,3,4,7,8,9-HpCDF	1	0	0	0.0E+00	No	No	-	No
OCDF	1	0	0	0.0E+00	No	No	-	No
Total Tetra	-	-	-	-	-	-	-	No
Total Penta	-	-	-	-	-	-	-	No
Total Hexa	-	-	-	-	-	-	-	No
Total Hepta	-	-	-	-	-	-	-	No
Total Octa	-	-	-	-	-	-	-	No
PCDD/PCDF	-	-	-	-	-	-	-	No
PCBs								
Aroclor-1016	-	-	-	-	No	No	-	No
Aroclor-1221	-	-	-	-	No	No	-	No
Aroclor-1232	-	-	-	-	No	No	-	No
Aroclor-1242	-	-	-	-	No	No	-	No
Aroclor-1248	1	0	0	0.0E+00	No	No	-	No
Aroclor-1254	1	0	0	0.0E+00	No	No	-	No
Aroclor-1260	1	0	0	0.0E+00	No	No	-	No
PCB-105	-	-	-	-	No	No	-	No
PCB-114	-	-	-	-	No	No	-	No
PCB-118	-	-	-	-	No	No	-	No
PCB-123	-	-	-	-	No	No	-	No
PCB-126	-	-	-	-	No	No	-	No
PCB-156	-	-	-	-	No	No	-	No

Selection of Chemicals of Potential Concern in Chatsworth Formation Groundwater
Group 6 Reporting Area

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (mg/L)	Potentially Site Related	Chemical Detected in Laboratory Blanks [a]	Maximum Detected Concentration Exceeds Background [b]	COPC
PCB-157	-	-	-	-	No	No	-	No
PCB-167	-	-	-	-	No	No	-	No
PCB-169	-	-	-	-	No	No	-	No
PCB-189	-	-	-	-	No	No	-	No
PCB-77	-	-	-	-	No	No	-	No
PCB-81	-	-	-	-	No	No	-	No

Notes:
a. Any chemical eliminated as COPC due to laboratory blank contamination is discussed in Section 3.0.
COPC - chemical of potential concern
VOC - volatile organic chemicals
SVOC - semivolatile organic chemicals
PCDD/PDDFs - polychlorinated dibenzo-p-dioxins and dibenzofurans
"-" not applicable
mg/L - milligrams per liter
bgs- below ground surface

Spreadsheet C2-3 (1 of 1)

Selection of Chemicals of Potential Concern in Soil Vapor (0-10 feet bgs)
Old Conservation Yard RFI Site

Chemical	Number of Samples	Number of Detects	Precent Frequency of Detection	Maximum Detected Concentration (ug/L)	Chemical Detected in Laboratory Blanks[a]	COPC
1,1,1-Trichloroethane	18	1	6	2	No	Yes
1,1,2-Trichloro-1,2,2-trifluoroethane	18	1	6	1.9	No	Yes
1,1-Dichloroethene	18	1	6	1.8	No	Yes
Benzene	18	0	0	0	No	Yes [c]
Ethylbenzene	18	0	0	0	No	Yes [c]
Methylene chloride	18	0	0	0	No	Yes [b]
Toluene	18	0	0	0	No	Yes [c]
Xylenes (Total)	0	0	0	0	No	Yes [c]
Trichloroethene	18	1	6	11	No	Yes [b]
m,p-Xylene	18	0	0	0	No	Yes [c]
o-Xylene	18	0	0	0	No	Yes [c]

Notes:

a. Any chemical eliminated as COPC due to laboratory blank contamination is discussed in Section 3.0.

b. Selected as a soil vapor COPC since it was detected in soil.

c. Selected as a soil vapor COPC since total petrolum hydrocarbon fraction C08-C11 was detected in soil.

COPC - chemical of potential concern

VOC - volatile organic chemicals

ug/L - micrograms per liter vapor by volume.

"-" not applicable

bgs- below ground surface

Selection of Chemicals of Potential Concern in Soil (0-10 feet bgs)
Old Conservation Yard RFI Site

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (mg/kg)	Potentially Site Related	Chemical Detected in Laboratory Blanks [a]	WRS Indicates Exceeds Background[b]	COPC
Inorganic Compounds								
Aluminum	61	61	100	2.7E+04	Yes	No	No	No [c]
Antimony	50	10	20	1.8E+01	Yes	No	No	Yes [f]
Arsenic	64	47	73	6.5E+00	Yes	No	No	No [c]
Barium	64	64	100	1.9E+02	Yes	No	No	Yes [f]
Beryllium	64	55	86	1.0E+00	Yes	No	No	No [c]
Boron	57	20	35	1.2E+01	Yes	No	Yes	Yes [f]
Cadmium	64	41	64	3.0E+00	Yes	No	Yes	Yes
Chromium	64	64	100	4.5E+01	Yes	No	No	No [c]
Hexavalent chromium	1	0	0	0.0E+00	Yes	No	No	No
Cobalt	64	63	98	1.0E+01	Yes	No	No	No [c]
Copper	64	64	100	6.0E+01	Yes	No	No	Yes [f]
Lead	65	62	95	1.4E+02	Yes	No	No	Yes [f]
Manganese	10	10	100	3.1E+02	Yes	No	No	No [c]
Mercury	64	38	59	2.3E+01	Yes	No	No	Yes [f]
Molybdenum	64	24	38	1.6E+00	Yes	No	No	No [c]
Nickel	64	58	91	2.8E+01	Yes	No	No	No [c]
Selenium	57	5	9	4.7E-01	Yes	No	No	No [c]
Silver	67	45	67	1.1E+01	Yes	No	Yes	Yes
Thallium	69	47	68	2.8E+00	Yes	No	No	Yes [f]
Vanadium	64	64	100	5.7E+01	Yes	No	No	No [c]
Zinc	64	64	100	7.3E+02	Yes	No	No	Yes [f]
VOCs								
1,1,1,2-Tetrachloroethane	14	0	0	-	Yes	No	-	No
1,1,1-Trichloroethane	20	0	0	-	Yes	No	-	Yes [d]
1,1,2,2-Tetrachloroethane	20	0	0	-	Yes	No	-	No
1,1,2-Trichloro-1,2,2-trifluoroethan	14	0	0	-	Yes	No	-	Yes [d]
1,1,2-Trichloroethane	20	0	0	-	Yes	No	-	No
1,1-Dichloroethane	20	0	0	-	Yes	No	-	No
1,1-Dichloroethene	20	0	0	-	Yes	No	-	Yes [d]
1,1-Dichloropropene	1	0	0	-	Yes	No	-	No
1,2,3-Trichlorobenzene	1	0	0	-	Yes	No	-	No
1,2,3-Trichloropropane	1	0	0	-	Yes	No	-	No
1,2,4-Trichlorobenzene	10	0	0	-	Yes	No	-	No
1,2,4-Trimethylbenzene	14	0	0	-	Yes	No	-	No
1,2-Dibromo-3-chloropropane	14	0	0	-	Yes	No	-	No
1,2-Dibromoethane	1	0	0	-	Yes	No	-	No
1,2-Dichlorobenzene	23	0	0	-	Yes	No	-	No
1,2-Dichloroethane	20	0	0	-	Yes	No	-	No
1,2-Dichloroethene (total)	6	0	0	-	Yes	No	-	No
1,2-Dichloropropane	20	0	0	-	Yes	No	-	No
1,3,5-Trimethylbenzene	14	0	0	-	Yes	No	-	No
1,3-Dichlorobenzene	23	0	0	-	Yes	No	-	No
1,3-Dichloropropane	1	0	0	-	Yes	No	-	No
1,4-Dichlorobenzene	23	0	0	-	Yes	No	-	No
2-Butanone	20	1	5	1.1E-02	Yes	No	-	Yes
2-Chloroethylvinylether	14	0	0	-	Yes	No	-	No
2-Chlorotoluene	1	0	0	-	Yes	No	-	No
2-Chloro-1,1,1-trifluoroethane	13	0	0	-	Yes	No	-	No
2,2-Dichloropropane	1	0	0	-	Yes	No	-	No

Spreadsheet C2-2 (2 of 5)

Selection of Chemicals of Potential Concern in Soil (0-10 feet bgs)
Old Conservation Yard RFI Site

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (mg/kg)	Potentially Site Related	Chemical Detected in Laboratory Blanks [a]	WRS Indicates Exceeds Background[b]	COPC
2-Hexanone	7	0	0	-	Yes	No	-	No
4-Chlorotoluene	1	0	0	-	Yes	No	-	No
4-Methyl-2-pentanone	7	0	0	-	Yes	No	-	No
Acetone	20	4	20	4.8E+00	Yes	No	-	Yes
Benzene	20	0	0	-	Yes	No	-	Yes [e]
Bromobenzene	1	0	0	-	Yes	No	-	No
Bromochloromethane	1	0	0	-	Yes	No	-	No
Bromodichloromethane	20	0	0	-	Yes	No	-	No
Bromoform	20	0	0	-	Yes	No	-	No
Bromomethane	20	0	0	-	Yes	No	-	No
Carbon disulfide	6	0	0	-	Yes	No	-	No
Carbon tetrachloride	20	0	0	-	Yes	No	-	No
Chlorobenzene	20	0	0	-	Yes	No	-	No
Chloroethane	20	0	0	-	Yes	No	-	No
Chloroform	20	0	0	-	Yes	No	-	No
Chloromethane	20	0	0	-	Yes	No	-	No
Chlorotrifluoroethene	13	0	0	-	Yes	No	-	No
cis-1,2-Dichloroethene	14	0	0	-	Yes	No	-	No
cis-1,3-Dichloropropene	20	0	0	-	Yes	No	-	No
Dibromochloromethane	7	0	0	-	Yes	No	-	No
Dibromomethane	1	0	0	-	Yes	No	-	No
Dichlorodifluoromethane	14	0	0	-	Yes	No	-	No
Ethylbenzene	20	0	0	-	Yes	No	-	Yes [e]
Isopropylbenzene	1	1	100	1.9E-03	Yes	No	-	Yes
m,p-Xylene	14	0	0	-	Yes	No	-	Yes [e]
Methyl tert-butyl ether	1	0	0	-	Yes	No	-	No
Methylene chloride	20	5	25	2.8E-01	Yes	No	-	Yes
n-Butylbenzene	1	0	0	-	Yes	No	-	No
n-Propylbenzene	1	0	0	-	Yes	No	-	No
o-Xylene	14	0	0	-	Yes	No	-	Yes [e]
p-Isopropyltoluene	1	1	100	1.9E-03	Yes	No	-	Yes
sec-Butylbenzene	1	0	0	-	Yes	No	-	No
Styrene	7	0	0	-	Yes	No	-	No
tert-Butylbenzene	1	0	0	-	Yes	No	-	No
Tetrachloroethene	20	0	0	-	Yes	No	-	No
Toluene	20	3	15	1.4E-02	Yes	No	-	Yes
trans-1,2-Dichloroethene	14	0	0	-	Yes	No	-	No
trans-1,3-Dichloropropene	20	0	0	-	Yes	No	-	No
Trichloroethene	20	0	0	-	Yes	No	-	Yes [d]
Trichlorofluoromethane	14	0	0	-	Yes	No	-	No
Vinyl acetate	6	0	0	-	Yes	No	-	No
Vinyl chloride	20	0	0	-	Yes	No	-	No
Xylenes (total)	6	3	50	1.3E-02	Yes	No	-	Yes [e]
SVOCs								
1-Methylnaphthalene	25	2	8	3.0E-02	Yes	No	-	Yes
2,4,5-Trichlorophenol	9	0	0	-	No	No	-	No
2,4,6-Trichlorophenol	9	0	0	-	No	No	-	No
2,4-Dichlorophenol	9	0	0	-	No	No	-	No
2,4-Dimethylphenol	9	0	0	-	No	No	-	No
2,4-Dinitrophenol	9	0	0	-	No	No	-	No

Spreadsheet C2-2 (3 of 5)

Selection of Chemicals of Potential Concern in Soil (0-10 feet bgs)
Old Conservation Yard RFI Site

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (mg/kg)	Potentially Site Related	Chemical Detected in Laboratory Blanks [a]	WRS Indicates Exceeds Background[b]	COPC
2,4-Dinitrotoluene	9	0	0	-	No	No	-	No
2,6-Dinitrotoluene	9	0	0	-	No	No	-	No
2-Chloronaphthalene	9	0	0	-	No	No	-	No
2-Chlorophenol	9	0	0	-	No	No	-	No
2-Methylnaphthalene	44	8	18	2.1E-01	No	No	-	Yes [e]
2-Methylphenol	9	0	0	-	No	No	-	No
2-Nitroaniline	9	0	0	-	No	No	-	No
2-Nitrophenol	9	0	0	-	No	No	-	No
4-Methylphenol	7	0	0	-	No	No	-	No
3,3'-Dichlorobenzidine	9	0	0	-	No	No	-	No
3-Nitroaniline	9	0	0	-	No	No	-	No
4,6-Dinitro-2-methylphenol	9	0	0	-	No	No	-	No
4-Bromophenyl phenyl ether	9	0	0	-	No	No	-	No
4-Chloro-3-methylphenol	9	0	0	-	No	No	-	No
4-Chloroaniline	9	0	0	-	No	No	-	No
4-Chlorophenyl phenyl ether	9	0	0	-	No	No	-	No
4-Nitroaniline	9	0	0	-	No	No	-	No
4-Nitrophenol	9	0	0	-	No	No	-	No
Acenaphthene	61	3	5	1.5E-02	Yes	No	-	Yes
Acenaphthylene	61	1	2	7.0E-03	Yes	No	-	Yes
Aniline	6	0	0	-	No	No	-	No
Anthracene	61	5	8	3.9E-02	Yes	No	-	Yes
Benzidine	6	0	0	-	No	No	-	No
Benzo(a)anthracene	61	16	26	3.3E-01	Yes	No	-	Yes
Benzo(a)pyrene	61	9	15	2.6E-01	Yes	No	-	Yes
Benzo(b)fluoranthene	61	11	18	4.2E-01	Yes	No	-	Yes
Benzo(e)pyrene	1	1	100	1.7E-01	Yes	No	-	Yes
Benzo(g,h,i)perylene	61	8	13	1.8E-01	Yes	No	-	Yes
Benzo(k)fluoranthene	61	10	16	3.0E-01	Yes	No	-	Yes
Benzoic acid	6	0	0	-	No	No	-	No
Benzyl alcohol	9	0	0	-	No	No	-	No
bis(2-Chloroethoxy)methane	9	0	0	-	No	No	-	No
bis(2-Chloroethyl)ether	9	0	0	-	No	No	-	No
bis(2-Chloroisopropyl) ether	9	0	0	-	No	No	-	No
bis(2-Ethylhexyl)phthalate	27	0	0	-	No	No	-	No
Butyl benzyl phthalate	9	0	0	-	No	No	-	No
Chrysene	61	16	26	5.0E-01	Yes	No	-	Yes
Dibenz(a,h)anthracene	61	5	8	3.3E-02	Yes	No	-	Yes
Dibenzofuran	9	0	0	-	No	No	-	No
Diethylphthalate	27	0	0	-	No	No	-	No
Dimethyl phthalate	9	0	0	-	No	No	-	No
Di-n-butylphthalate	27	0	0	-	No	No	-	No
Di-n-octyl phthalate	9	0	0	-	No	No	-	No
Fluoranthene	61	17	28	2.1E+00	Yes	No	-	Yes
Fluorene	61	1	2	6.0E-03	Yes	No	-	Yes
Hexachlorobenzene	9	0	0	-	No	No	-	No
Hexachlorobutadiene	10	0	0	-	No	No	-	No
Hexachlorocyclopentadiene	9	0	0	-	No	No	-	No
Hexachloroethane	9	0	0	-	No	No	-	No
Indeno(1,2,3-cd)pyrene	61	6	10	1.1E-01	No	No	-	Yes

Selection of Chemicals of Potential Concern in Soil (0-10 feet bgs)
Old Conservation Yard RFI Site

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (mg/kg)	Potentially Site Related	Chemical Detected in Laboratory Blanks [a]	WRS Indicates Exceeds Background[b]	COPC
Isophorone	9	0	0	-	No	No	-	No
Naphthalene	62	9	15	1.5E-01	No	No	-	Yes
Nitrobenzene	9	0	0	-	No	No	-	No
N-Nitrosodimethylamine	27	0	0	-	No	No	-	No
N-Nitrosodi-n-propylamine	9	0	0	-	No	No	-	No
N-Nitrosodiphenylamine	26	0	0	-	No	No	-	No
Pentachlorophenol	9	0	0	-	No	No	-	No
Perylene	1	1	100	9.8E-02	Yes	No	-	Yes
Phenanthrene	61	14	23	1.6E+00	Yes	No	-	Yes
Phenol	9	0	0	-	No	No	-	No
Pyrene	61	17	28	1.0E+00	Yes	No	-	Yes
Total Petroleum Hydrocarbons								
C08-C11(Gasoline Range)	83	5	6	4.2E+01	Yes	No	-	Yes
C11-C14(Kerosene Range)	77	3	4	8.9E+01	Yes	No	-	Yes
C14-C20(Diesel Range)	83	22	27	1.2E+03	Yes	No	-	Yes
C20-C30(Lubricant Oil Range)	77	32	42	8.3E+03	Yes	No	-	Yes
C22-C40 (Heavy Oil)	3	2	67	4.0E+03	Yes	No	-	Yes
PCDD/PCDFs								
2,3,7,8-TCDD	19	7	37	1.0E-05	Yes	No	-	Yes
1,2,3,7,8-PeCDD	19	12	63	6.0E-05	Yes	No	-	Yes
1,2,3,4,7,8-HxCDD	19	14	74	1.5E-04	Yes	No	-	Yes
1,2,3,6,7,8-HxCDD	19	15	79	1.6E-04	Yes	No	-	Yes
1,2,3,7,8,9-HxCDD	19	14	74	1.7E-04	Yes	No	-	Yes
1,2,3,4,6,7,8-HpCDD	19	19	100	3.3E-03	Yes	No	-	Yes
OCDD	19	19	100	1.5E-02	Yes	No	-	Yes
2,3,7,8-TCDF	19	14	74	1.0E-05	Yes	No	-	Yes
1,2,3,7,8-PeCDF	19	11	58	1.0E-05	Yes	No	-	Yes
2,3,4,7,8-PeCDF	19	15	79	3.0E-05	Yes	No	-	Yes
1,2,3,4,7,8-HxCDF	19	15	79	1.2E-04	Yes	No	-	Yes
1,2,3,6,7,8-HxCDF	19	11	58	2.0E-05	Yes	No	-	Yes
2,3,4,6,7,8-HxCDF	19	15	79	3.0E-05	Yes	No	-	Yes
1,2,3,7,8,9-HxCDF	19	10	53	2.0E-05	Yes	No	-	Yes
1,2,3,4,6,7,8-HpCDF	19	19	100	2.3E-04	Yes	No	-	Yes
1,2,3,4,7,8,9-HpCDF	19	12	63	6.0E-05	Yes	No	-	Yes
OCDF	19	17	89	8.0E-04	Yes	No	-	Yes
PCBs								
Aroclor-1016	61	0	0	-	Yes	No	-	No
Aroclor-1221	61	0	0	-	Yes	No	-	No
Aroclor-1232	61	0	0	-	Yes	No	-	No
Aroclor-1242	61	0	0	-	Yes	No	-	No
Aroclor-1248	61	15	25	2.4E+04	Yes	No	-	Yes
Aroclor-1254	61	16	26	5.4E+00	Yes	No	-	Yes
Aroclor-1260	61	11	18	6.3E+02	Yes	No	-	Yes
PCB-105	1	1	100	-	Yes	No	-	Yes
PCB-114	1	1	100	-	Yes	No	-	Yes
PCB-118	1	1	100	-	Yes	No	-	Yes
PCB-123	1	1	100	-	Yes	No	-	Yes
PCB-126	1	1	100	-	Yes	No	-	Yes
PCB-156	1	1	100	-	Yes	No	-	Yes
PCB-157	1	1	100	-	Yes	No	-	Yes

Spreadsheet C2-2 (5 of 5)

Selection of Chemicals of Potential Concern in Soil (0-10 feet bgs)
Old Conservation Yard RFI Site

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (mg/kg)	Potentially Site Related	Chemical Detected in Laboratory Blanks [a]	WRS Indicates Exceeds Background[b]	COPC
PCB-167	1	1	100	-	Yes	No	-	Yes
PCB-169	1	1	100	-	Yes	No	-	Yes
PCB-189	1	1	100	-	Yes	No	-	Yes
PCB-77	1	1	100	-	Yes	No	-	Yes
PCB-81	1	1	100	-	Yes	No	-	Yes

Notes:

a. Any chemical eliminated as COPC due to laboratory blank contamination is discussed in Section 3.0.

b. Background comparision for inorganic compounds presented in Attachment 1 Spreadsheet C2-6.

c. Not selected as COPC since the RFI site sample population for soils at 0 to 10 feet bgs was found to be no different than the background sample population at p=0.05 based on the Wilcoxon Rank Sum Test.

d. Selected as a soil COPC since it was selected as a COPC in soil vapor at 0 to 10 feet bgs.

e. Selected as a soil COPC since either petroleum hydrocarbon fraction C11-C14, C14-C20, or C20-C30 was selected as a COPC.

f. Although Wilcoxon Rank Sum Test indicates comparable to background, metal is present at maximum concentrations significantly larger than maximum background concentrations, and in areas of know metals debris contamination. It is subsequently selected as a COPC.

VOC - volatile organic chemicals
SVOC - semivolatile organic chemicals
PCBs - polychlorinated biphenyls
Total Tetra - sum of the 2,3,7,8-substituted tetrachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations
Total Penta - sum of the 2,3,7,8-substituted pentachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations
Total Hexa - sum of the 2,3,7,8-substituted hexachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations
Total Hepta - sum of the 2,3,7,8-substituted heptachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations
Total Octa - sum of the octachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations concentrations
PCDD/PDDFs - polychlorinated dibenzo-p-dioxins and dibenzofurans
"-" not applicable
mg/kg - milligrams per kilogram
bgs - below ground surface

Selection of Chemicals of Potential Concern in Soil (0-2 feet bgs)
Old Conservation Yard RFI Site

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (mg/kg)	Potentially Site Related	Chemical Detected in Laboratory Blanks [a]	WRS Indicates Exceeds Background[b]	COPC
Inorganic Compounds								
Aluminum	47	47	100	2.4E+04	Yes	No	No	No [c]
Antimony	40	5	13	9.7E-01	Yes	No	No	No [c]
Arsenic	52	40	77	4.7E+00	Yes	No	No	No [c]
Barium	52	52	100	1.4E+02	Yes	No	No	No [c]
Beryllium	52	45	87	1.0E+00	Yes	No	No	No [c]
Boron	47	16	34	1.2E+01	Yes	No	No	Yes [e]
Cadmium	52	36	69	2.2E+00	Yes	No	Yes	Yes
Chromium	52	52	100	4.5E+01	Yes	No	No	No [c]
Hexavalent chromium	1	0	0	0.0E+00	Yes	No	No	No
Cobalt	52	51	98	1.0E+01	Yes	No	No	No [c]
Copper	52	52	100	2.9E+01	Yes	No	No	No [c]
Lead	52	50	96	9.4E+01	Yes	No	No	Yes [e]
Manganese	5	5	100	2.6E+02	Yes	No	No	No [c]
Mercury	52	35	67	2.3E+01	Yes	No	No	Yes [e]
Molybdenum	52	23	44	1.6E+00	Yes	No	No	No [c]
Nickel	52	49	94	2.6E+01	Yes	No	No	No [c]
Selenium	48	3	6	3.7E-01	Yes	No	No	No [c]
Silver	54	39	72	4.0E+00	Yes	No	Yes	Yes
Thallium	55	38	69	1.7E+00	Yes	No	No	Yes [e]
Vanadium	52	52	100	5.7E+01	Yes	No	No	No [c]
Zinc	52	52	100	1.6E+02	Yes	No	No	Yes [e]
VOCs								
1,1,1,2-Tetrachloroethane	10	0	0	-	Yes	No	-	No
1,1,1-Trichloroethane	15	0	0	-	Yes	No	-	Yes [f]
1,1,2,2-Tetrachloroethane	15	0	0	-	Yes	No	-	No
1,1,2-Trichloro-1,2,2-trifluoroethane	10	0	0	-	Yes	No	-	Yes [f]
1,1,2-Trichloroethane	15	0	0	-	Yes	No	-	No
1,1-Dichloroethane	15	0	0	-	Yes	No	-	No
1,1-Dichloroethene	15	0	0	-	Yes	No	-	Yes [f]
1,1-Dichloropropene	1	0	0	-	Yes	No	-	No
1,2,3-Trichlorobenzene	1	0	0	-	Yes	No	-	No
1,2,3-Trichloropropane	1	0	0	-	Yes	No	-	No
1,2,4-Trichlorobenzene	7	0	0	-	Yes	No	-	No
1,2,4-Trimethylbenzene	10	0	0	-	Yes	No	-	No
1,2-Dibromo-3-chloropropane	10	0	0	-	Yes	No	-	No
1,2-Dibromoethane	1	0	0	-	Yes	No	-	No
1,2-Dichlorobenzene	16	0	0	-	Yes	No	-	No
1,2-Dichloroethane	15	0	0	-	Yes	No	-	No
1,2-Dichloroethene (total)	5	0	0	-	Yes	No	-	No
1,2-Dichloropropane	15	0	0	-	Yes	No	-	No
1,3,5-Trimethylbenzene	10	0	0	-	Yes	No	-	No
1,3-Dichlorobenzene	16	0	0	-	Yes	No	-	No
1,4-Dichlorobenzene	16	0	0	-	Yes	No	-	No
2-Butanone	15	1	7	1.1E-02	Yes	No	-	Yes
2-Chloroethylvinylether	10	0	0	-	Yes	No	-	No
2-Chlorotoluene	1	0	0	-	Yes	No	-	No
2-Chloro-1,1,1-trifluoroethane	9	0	0	-	Yes	No	-	No

Selection of Chemicals of Potential Concern in Soil (0-2 feet bgs)
Old Conservation Yard RFI Site

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (mg/kg)	Potentially Site Related	Chemical Detected in Laboratory Blanks [a]	WRS Indicates Exceeds Background[b]	COPC
2-Hexanone	6	0	0	-	Yes	No	-	No
4-Chlorotoluene	1	0	0	-	Yes	No	-	No
4-Methyl-2-pentanone	6	0	0	-	Yes	No	-	No
Acetone	15	2	13	4.8E+00	Yes	No	-	Yes
Benzene	15	0	0	-	Yes	No	-	Yes [d]
Bromobenzene	1	0	0	-	Yes	No	-	No
Bromodichloromethane	15	0	0	-	Yes	No	-	No
Bromoform	15	0	0	-	Yes	No	-	No
Bromomethane	15	0	0	-	Yes	No	-	No
Carbon disulfide	5	0	0	-	Yes	No	-	No
Carbon tetrachloride	15	0	0	-	Yes	No	-	No
Chlorobenzene	15	0	0	-	Yes	No	-	No
Chloroethane	15	0	0	-	Yes	No	-	No
Chloroform	15	0	0	-	Yes	No	-	No
Chloromethane	15	0	0	-	Yes	No	-	No
Chlorotrifluoroethene	9	0	0	-	Yes	No	-	No
cis-1,2-Dichloroethene	10	0	0	-	Yes	No	-	No
cis-1,3-Dichloropropene	15	0	0	-	Yes	No	-	No
Dibromochloromethane	6	0	0	-	Yes	No	-	No
Dibromomethane	1	0	0	-	Yes	No	-	No
Dichlorodifluoromethane	10	0	0	-	Yes	No	-	No
Ethylbenzene	15	0	0	-	Yes	No	-	Yes [a]
Isopropylbenzene	1	0	0	-	Yes	No	-	No
m,p-Xylene	10	0	0	-	Yes	No	-	Yes [d]
Methyl tert-butyl ether	1	0	0	-	Yes	No	-	No
Methylene chloride	15	3	20	2.8E-01	Yes	No	-	Yes
n-Butylbenzene	1	0	0	-	Yes	No	-	No
n-Propylbenzene	1	0	0	-	Yes	No	-	No
o-Xylene	10	0	0	-	Yes	No	-	Yes [d]
p-Isopropyltoluene	1	1	100	-	Yes	No	-	Yes
sec-Butylbenzene	1	0	0	-	Yes	No	-	No
Styrene	6	0	0	-	Yes	No	-	No
tert-Butylbenzene	1	0	0	-	Yes	No	-	No
Tetrachloroethene	15	0	0	-	Yes	No	-	No
Toluene	15	3	20	1.4E-02	Yes	No	-	Yes
trans-1,2-Dichloroethene	10	0	0	-	Yes	No	-	No
trans-1,3-Dichloropropene	15	0	0	-	Yes	No	-	No
Trichloroethene	15	0	0	-	Yes	No	-	Yes [f]
Trichlorofluoromethane	10	0	0	-	Yes	No	-	No
Vinyl acetate	5	0	0	-	Yes	No	-	No
Vinyl chloride	15	0	0	-	Yes	No	-	No
Xylenes (total)	5	2	40	1.3E-02	Yes	No	-	Yes
SVOCs								
1-Methylnaphthalene	24	2	8	3.0E-02	No	No	-	Yes
2,4,5-Trichlorophenol	6	0	0	-	No	No	-	No
2,4,6-Trichlorophenol	6	0	0	-	No	No	-	No
2,4-Dichlorophenol	6	0	0	-	No	No	-	No
2,4-Dimethylphenol	6	0	0	-	No	No	-	No
2,4-Dinitrophenol	6	0	0	-	No	No	-	No

Selection of Chemicals of Potential Concern in Soil (0-2 feet bgs)
Old Conservation Yard RFI Site

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (mg/kg)	Potentially Site Related	Chemical Detected in Laboratory Blanks [a]	WRS Indicates Exceeds Background[b]	COPC
2,4-Dinitrotoluene	6	0	0	-	No	No	-	No
2,6-Dinitrotoluene	6	0	0	-	No	No	-	No
2-Chloronaphthalene	6	0	0	-	No	No	-	No
2-Chlorophenol	6	0	0	-	No	No	-	No
2-Methylnaphthalene	36	7	19	2.1E-01	No	No	-	Yes
2-Methylphenol	6	0	0	-	No	No	-	No
2-Nitroaniline	6	0	0	-	No	No	-	No
2-Nitrophenol	6	0	0	-	No	No	-	No
4-Methylphenol	6	0	0	-	No	No	-	No
3,3'-Dichlorobenzidine	6	0	0	-	No	No	-	No
3-Nitroaniline	6	0	0	-	No	No	-	No
4,6-Dinitro-2-methylphenol	6	0	0	-	No	No	-	No
4-Bromophenyl phenyl ether	6	0	0	-	No	No	-	No
4-Chloro-3-methylphenol	6	0	0	-	No	No	-	No
4-Chloroaniline	6	0	0	-	No	No	-	No
4-Chlorophenyl phenyl ether	6	0	0	-	No	No	-	No
4-Nitroaniline	6	0	0	-	No	No	-	No
4-Nitrophenol	6	0	0	-	No	No	-	No
Acenaphthene	49	3	6	1.5E-02	Yes	No	-	Yes
Acenaphthylene	49	1	2	7.0E-03	Yes	No	-	Yes
Aniline	5	0	0	-	No	No	-	No
Anthracene	49	4	8	3.9E-02	Yes	No	-	Yes
Benzidine	5	0	0	-	No	No	-	No
Benzo(a)anthracene	49	14	29	3.3E-01	Yes	No	-	Yes
Benzo(a)pyrene	49	8	16	2.6E-01	Yes	No	-	Yes
Benzo(b)fluoranthene	49	9	18	4.2E-01	Yes	No	-	Yes
Benzo(e)pyrene	1	1	100	1.7E-01	Yes	No	-	Yes
Benzo(g,h,i)perylene	49	7	14	1.8E-01	Yes	No	-	Yes
Benzo(k)fluoranthene	49	8	16	3.0E-01	Yes	No	-	Yes
Benzoic acid	5	0	0	-	No	No	-	No
Benzyl alcohol	6	0	0	-	No	No	-	No
bis(2-Chloroethoxy)methane	6	0	0	-	No	No	-	No
bis(2-Chloroethyl)ether	6	0	0	-	No	No	-	No
bis(2-Chloroisopropyl) ether	6	0	0	-	No	No	-	No
bis(2-Ethylhexyl)phthalate	19	0	0	-	No	No	-	No
Butyl benzyl phthalate	6	0	0	-	No	No	-	No
Chrysene	49	13	27	5.0E-01	Yes	No	-	Yes
Dibenz(a,h)anthracene	49	5	10	3.3E-02	Yes	No	-	Yes
Dibenzofuran	6	0	0	-	No	No	-	No
Diethylphthalate	19	0	0	-	No	No	-	No
Dimethyl phthalate	6	0	0	-	No	No	-	No
Di-n-butylphthalate	19	0	0	-	No	No	-	No
Di-n-octyl phthalate	6	0	0	-	No	No	-	No
Fluoranthene	49	14	29	2.1E+00	Yes	No	-	Yes
Fluorene	49	1	2	6.0E-03	Yes	No	-	Yes
Hexachlorobenzene	6	0	0	-	No	No	-	No
Hexachlorobutadiene	7	0	0	-	No	No	-	No
Hexachlorocyclopentadiene	6	0	0	-	No	No	-	No
Hexachloroethane	6	0	0	-	No	No	-	No

Selection of Chemicals of Potential Concern in Soil (0-2 feet bgs)
Old Conservation Yard RFI Site

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (mg/kg)	Potentially Site Related	Chemical Detected in Laboratory Blanks [a]	WRS Indicates Exceeds Background[b]	COPC
Indeno(1,2,3-cd)pyrene	49	5	10	1.1E-01	No	No	-	Yes
Isophorone	6	0	0	-	No	No	-	No
Naphthalene	50	8	16	1.5E-01	No	No	-	Yes
Nitrobenzene	6	0	0	-	No	No	-	No
N-Nitrosodimethylamine	21	0	0	-	No	No	-	No
N-Nitrosodi-n-propylamine	6	0	0	-	No	No	-	No
N-Nitrosodiphenylamine	19	0	0	-	No	No	-	No
Pentachlorophenol	6	0	0	-	No	No	-	No
Perylene	1	1	100	9.8E-02	Yes	No	-	Yes
Phenanthrene	49	11	22	1.6E+00	Yes	No	-	Yes
Phenol	6	0	0	-	No	No	-	No
Pyrene	49	14	29	1.0E+00	Yes	No	-	Yes
Total Petroleum Hydrocarbons								
C08-C11(Gasoline Range)	57	5	9	4.2E+01	Yes	No	-	Yes
C11-C14(Kerosene Range)	52	2	4	8.9E+01	Yes	No	-	Yes
C14-C20(Diesel Range)	57	19	33	1.2E+03	Yes	No	-	Yes
C20-C30(Lubricant Oil Range)	52	26	50	8.3E+03	Yes	No	-	Yes
C22-C40 (Heavy Oil)	2	1	50	5.0E+00	Yes	No	-	Yes
PCDD/PCDFs								
2,3,7,8-TCDD	13	4	31	1.0E-05	Yes	No	-	Yes
1,2,3,7,8-PeCDD	13	9	69	6.0E-05	Yes	No	-	Yes
1,2,3,4,7,8-HxCDD	13	11	85	1.5E-04	Yes	No	-	Yes
1,2,3,6,7,8-HxCDD	13	12	92	1.6E-04	Yes	No	-	Yes
1,2,3,7,8,9-HxCDD	13	11	85	1.7E-04	Yes	No	-	Yes
1,2,3,4,6,7,8-HpCDD	13	13	100	3.3E-03	Yes	No	-	Yes
OCDD	13	13	100	1.5E-02	Yes	No	-	Yes
2,3,7,8-TCDF	13	11	85	1.0E-05	Yes	No	-	Yes
1,2,3,7,8-PeCDF	13	8	62	1.0E-05	Yes	No	-	Yes
2,3,4,7,8-PeCDF	13	11	85	3.0E-05	Yes	No	-	Yes
1,2,3,4,7,8-HxCDF	13	12	92	1.2E-04	Yes	No	-	Yes
1,2,3,6,7,8-HxCDF	13	8	62	1.0E-05	Yes	No	-	Yes
2,3,4,6,7,8-HxCDF	13	12	92	3.0E-05	Yes	No	-	Yes
1,2,3,7,8,9-HxCDF	13	7	54	2.0E-05	Yes	No	-	Yes
1,2,3,4,6,7,8-HpCDF	13	13	100	2.3E-04	Yes	No	-	Yes
1,2,3,4,7,8,9-HpCDF	13	10	77	6.0E-05	Yes	No	-	Yes
OCDF	13	12	92	8.0E-04	Yes	No	-	Yes
Total Tetra	-	-	-	-	-	-	Yes	-
Total Penta	-	-	-	-	-	-	Yes	-
Total Hexa	-	-	-	-	-	-	Yes	-
Total Hepta	-	-	-	-	-	-	Yes	-
Total Octa	-	-	-	-	-	-	Yes	-
PCDD/PCDF	-	-	-	-	-	-	-	Yes
PCBs								
Aroclor-1248	48	10	21	2.4E+04	No	No	-	Yes
Aroclor-1254	48	13	27	5.4E+00	Yes	No	-	Yes
Aroclor-1260	48	9	19	6.3E+02	Yes	No	-	Yes
PCB-105	1	1	100	-	Yes	No	-	Yes
PCB-114	1	1	100	-	Yes	No	-	Yes
PCB-118	1	1	100	-	Yes	No	-	Yes

Selection of Chemicals of Potential Concern in Soil (0-2 feet bgs)
Old Conservation Yard RFI Site

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (mg/kg)	Potentially Site Related	Chemical Detected in Laboratory Blanks [a]	WRS Indicates Exceeds Background[b]	COPC
PCB-123	1	1	100	-	Yes	No	-	Yes
PCB-126	1	1	100	-	Yes	No	-	Yes
PCB-156	1	1	100	-	Yes	No	-	Yes
PCB-157	1	1	100	-	Yes	No	-	Yes
PCB-167	1	1	100	-	Yes	No	-	Yes
PCB-169	1	1	100	-	Yes	No	-	Yes
PCB-189	1	1	100	-	Yes	No	-	Yes
PCB-77	1	1	100	-	Yes	No	-	Yes
PCB-81	1	1	100	-	Yes	No	-	Yes

Notes:

a. Any chemical eliminated as COPC due to laboratory blank contamination is discussed in Section 3.0.

b. Background comparision for inorganic compounds presented in Attachment 1 Spreadsheet C2-5.

c. Not selected as COPC since the RFI site sample population for soil/sediment at 0 to 2 feet bgs was found to be no different than the background sample population based on the Wilcoxon Rank Sum Test.

d. Selected as a soil COPC since either petroleum hydrocarbon fraction C11-C14, C14-C20, or C20-C30 was selected as a COPC.

e. Although Wilcoxon Rank Sum Test indicates comparable to background, metal is present at maximum concentrations significantly larger than maximum background concentrations, and in areas of suspected metals debris impacts. It is subsequently selected as a COPC.

f. Selected as a soil COPC was selected as a COPC in soil vapor.

COPC - chemical of potential concern
PAH - polycyclic aromatic hydrocarbon
SVOC - semivolatile organic chemicals
PCBs - polychlorinated biphenyls
Total Tetra - sum of the 2,3,7,8-substituted tetrachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations
Total Penta - sum of the 2,3,7,8-substituted pentachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations
Total Hexa - sum of the 2,3,7,8-substituted hexachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations
Total Hepta - sum of the 2,3,7,8-substituted heptachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations
Total Octa - sum of the octachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations concentrations
PCDD/PDDFs - polychlorinated dibenzo-p-dioxins and dibenzofurans
"-" not applicable
mg/kg - milligrams per kilogram
bgs - below ground surface

APPENDIX C, ATTACHMENT C8

SRE Risk Assessment Calculation Tables

Parameter Values Used for EPV and ADD Calculations
Sodium Reactor Experiment (SRE) Area

Species[a]	Fraction of Prey Item (unitless)					Body Weight	Food Intake Rate	Water Intake Rate	Area Use[e]	Seasonality[e]	Lifespan	Inhalation Rate[f]	Fraction of Time Spent in Burrow[e]
	Plants[b]	Invertebrates[c]	Terrestrial Vertebrate	Fish	Incidental Soil or Sediment	(kg)	(kg/day)	(L/day)	(fraction)	(percent)	(year)	(m^3/day)	(percent)
Earthworm	0	0	0	0	1	NA	NA	NA	NA	NA	NA	NA	NA
Deer mouse	0.70	0.30	0	0	0.020	0.018	0.0038	NA	1	1	1.6	0.024	0.75
Thrush [d]	0.39	0.61	0	0	0.040	0.029	0.0063	NA	1	1	1.4	NA	NA
Hawk	0	0	1	0	0	1.22	0.095	NA	1	1	NA	NA	NA
Bobcat	0	0	1	0	0	10	0.33	NA	1	1	NA	NA	NA
Mule deer[g]	1	0	0	0	0.02	39.1	1.6	NA	1	1	NA	NA	NA
Great Blue Heron	0	0.10	0.15	0.70	0.05	2.204	0.141	0.10	1	1	NA	NA	NA

Notes:

a. Reference receptor species used for food chain model
b. Terrestrial plants for the deer mouse, thrush, and mule deer; aquatic plants for the great blue heron.
c. Terrestrial invertebrates for the deer mouse and thrush; aquatic invertebrates for the great blue heron.
d. Values fraction of prey items and lifespan for the thrush are estimated based on American robin
e. Value based on SRAM or professional judgment
f. Average of male and female values from U.S. EPA Wildlife Exposure Factors Handbook
g. Body weight from Nagy, 2001
kg - kilogram
kg/day - kilograms per day
cm^2 - square centimeters
m^3/day - cubic meters per day
NA - not applicable
EPV- exposure point values
ADD- applied daily dosage

Table C3-123 (1 of 4)

Applied Daily Dose for the Great Blue Heron
Ingestion Exposure Route
Sodium Reactor Experiment (SRE) Area

Chemical	Sediment Exposure Point Concentration [a]		Surface Water Exposure Point Concentration [a]		Aquatic Invertebrate EPV[b]		Terrestrial Vertebrate EPV[b]		Fish EPV[b]		Applied Daily Dose for Surface Water Ingestion		Applied Daily Dose for Sediment/Prey Ingestion	
	CTE	RME	CTE	RME	CTE	RME	CTE	RME	CTE	RME	CTE	RME	CTE	RME
	(mg/kg)		(µg/L)		(mg/kg)		(mg/kg)		(mg/kg)		(mg/kg-day)		(mg/kg-day)	
Inorganic Compounds														
Aluminum	NC	NC	1.0E+03	1.7E+03	NC	NC	NC	NC	NC	NC	4.6E+01	7.7E+01	-	-
Antimony	NC	NC	9.0E-01	1.5E+00	NC	NC	NC	NC	NC	NC	4.0E-02	6.9E-02	-	-
Arsenic	NC	NC	6.8E+00	1.1E+01	NC	NC	NC	NC	NC	NC	3.0E-01	5.0E-01	-	-
Beryllium	NC	NC	1.0E+00	1.0E+00	NC	NC	NC	NC	NC	NC	4.5E-02	4.5E-02	-	-
Cadmium	8.9E-01	4.6E+00	1.5E-01	2.8E-01	8.9E-01	4.6E+00	2.2E-01	3.6E-01	8.9E-01	4.6E+00	6.8E-03	1.3E-02	5.0E-02	2.5E-01
Chromium	NC	NC	2.3E+00	3.4E+00	NC	NC	NC	NC	NC	NC	1.0E-01	1.5E-01	-	-
Copper	3.7E+01	6.6E+01	4.4E+00	5.7E+00	1.1E+02	2.0E+02	8.3E+00	1.5E+01	4.2E+00	7.6E+00	2.0E-01	2.6E-01	1.1E+00	2.0E+00
Lead	2.5E+01	5.1E+01	8.1E-01	1.0E+00	2.5E+01	5.1E+01	9.9E+00	1.3E+01	2.5E+01	5.1E+01	3.6E-02	4.7E-02	1.5E+00	2.9E+00
Mercury	6.0E-01	1.1E+00	1.2E-01	1.4E-01	1.8E-01	3.4E-01	1.9E+00	4.1E+00	7.1E-01	1.3E+00	5.3E-03	6.1E-03	5.3E-02	1.0E-01
Methyl Mercury	NC	NC	NC	NC	NC	NC	1.7E-03	3.6E-03	NC	NC	-	-	-	-
Nickel	NC	NC	4.6E+00	4.1E+00	NC	NC	NC	NC	NC	NC	2.0E-01	1.8E-01	-	-
Selenium	NC	NC	3.8E+00	3.8E+00	NC	NC	NC	NC	NC	NC	1.7E-01	1.7E-01	-	-
Silver	1.4E-01	1.4E-01	5.0E+00	5.0E+00	1.4E-01	1.4E-01	1.5E+00	3.5E+00	1.4E-01	1.4E-01	2.3E-01	2.3E-01	2.2E-02	4.1E-02
Thallium	1.6E-01	1.6E-01	2.1E-01	2.1E-01	4.7E-02	4.7E-02	8.4E-01	2.1E+00	1.6E-01	1.6E-01	9.5E-03	9.5E-03	1.6E-02	2.8E-02
Vanadium	NC	NC	4.0E+00	5.7E+00	NC	NC	NC	NC	NC	NC	1.8E-01	2.6E-01	-	-
Zinc	2.9E+02	6.6E+02	NC	NC	1.9E+02	4.3E+02	2.6E+02	5.3E+02	1.2E+02	2.7E+02	-	-	9.9E+00	2.2E+01
VOCs														
1,1,1-Trichloroethane	NC	NC	7.6E-01	7.6E-01	NC	NC	NC	NC	NC	NC	3.4E-02	3.4E-02	-	-
1,1,2-Trichloro-1,2,2-trifluor	1.2E-02	1.2E-02	NC	NC	1.2E-02	1.2E-02	1.2E-02	1.2E-02	1.2E-02	1.2E-02	-	-	7.7E-04	7.7E-04
1,1-Dichloroethane	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	-	-	-	-
2-Butanone	NC	NC	NC	NC	NC	NC	1.8E-02	2.7E-02	NC	NC	-	-	-	-
Acetone	NC	NC	NC	NC	NC	NC	6.9E-01	2.3E+00	NC	NC	-	-	-	-
Bromomethane	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	-	-	-	-
Ethylbenzene	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	-	-	-	-
m,p-Xylene	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	-	-	-	-
Methylene chloride	NC	NC	NC	NC	NC	NC	1.0E-02	1.2E-02	NC	NC	-	-	-	-
Tetrachloroethene	3.1E-02	7.0E-02	NC	NC	3.1E-02	7.0E-02	NC	NC	3.1E-02	7.0E-02	-	-	1.7E-03	3.8E-03
Toluene	8.6E-02	4.2E-01	NC	NC	8.6E-02	4.2E-01	NC	NC	8.6E-02	4.2E-01	-	-	4.7E-03	2.3E-02
trans-1,3-Dichloropropene	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	-	-	-	-
Trichloroethene	5.6E-02	2.2E-01	6.6E-01	6.6E-01	5.6E-02	2.2E-01	NC	NC	5.6E-02	2.2E-01	3.0E-02	3.0E-02	3.0E-03	1.2E-02
Xylenes (total)	3.2E-02	4.5E-02	NC	NC	3.2E-02	4.5E-02	NC	NC	3.2E-02	4.5E-02	-	-	1.7E-03	2.4E-03

Table C3-123 (2 of 4)

Applied Daily Dose for the Great Blue Heron
Ingestion Exposure Route
Sodium Reactor Experiment (SRE) Area

Chemical	Sediment Exposure Point Concentration [a]		Surface Water Exposure Point Concentration [a]		Aquatic Invertebrate EPV[b]		Terrestrial Vertebrate EPV[b]		Fish EPV[b]		Applied Daily Dose for Surface Water Ingestion		Applied Daily Dose for Sediment/Prey Ingestion	
	CTE	RME	CTE	RME	CTE	RME	CTE	RME	CTE	RME	CTE	RME	CTE	RME
	(mg/kg)		(µg/L)		(mg/kg)		(mg/kg)		(mg/kg)		(mg/kg-day)		(mg/kg-day)	
SVOCs														
Acenaphthene	7.4E-03	7.4E-03	NC	NC	7.4E-03	7.4E-03	8.8E-02	3.3E-01	7.4E-03	7.4E-03	-	-	1.2E-03	3.5E-03
Acenaphthylene	1.5E-03	1.5E-03	NC	NC	1.5E-03	1.5E-03	6.1E-03	1.7E-02	1.5E-03	1.5E-03	-	-	1.4E-04	2.5E-04
Anthracene	4.0E-03	4.0E-03	NC	NC	4.0E-03	4.0E-03	2.5E-01	1.3E+00	4.0E-03	4.0E-03	-	-	2.6E-03	1.2E-02
Benzo(a)anthracene	8.5E-02	1.7E-01	NC	NC	9.4E-02	1.9E-01	1.7E+01	2.3E+02	8.5E-02	1.7E-01	-	-	1.7E-01	2.2E+00
Benzo(a)pyrene	8.5E-02	1.7E-01	NC	NC	4.8E-02	9.6E-02	6.7E+00	8.9E+01	8.5E-02	1.7E-01	-	-	6.9E-02	8.6E-01
Benzo(b)fluoranthene	1.2E-01	3.3E-01	NC	NC	1.6E-01	4.4E-01	5.3E+00	6.8E+01	1.2E-01	3.3E-01	-	-	5.7E-02	6.7E-01
Benzo(e)pyrene	3.4E-03	3.4E-03	NC	NC	3.4E-03	3.4E-03	2.4E-02	6.8E-02	3.4E-03	3.4E-03	-	-	4.2E-04	8.4E-04
Benzo(g,h,i)perylene	8.5E-02	1.7E-01	NC	NC	5.4E-02	1.1E-01	1.6E+00	1.4E+01	8.5E-02	1.7E-01	-	-	1.9E-02	1.4E-01
Benzo(k)fluoranthene	2.7E-05	2.7E-05	NC	NC	2.2E-05	2.2E-05	8.8E+00	1.2E+02	2.7E-05	2.7E-05	-	-	8.4E-02	1.1E+00
bis(2-Ethylhexyl)phthalate	NC	NC	2.5E+01	2.5E+01	NC	NC	NC	NC	NC	NC	1.1E+00	1.1E+00	-	-
Butyl benzyl phthalate	NC	NC	9.8E+00	9.8E+00	NC	NC	NC	NC	NC	NC	4.4E-01	4.4E-01	-	-
Chrysene	1.0E-01	2.6E-01	NC	NC	1.1E-01	2.8E-01	4.9E+00	5.3E+01	1.0E-01	2.6E-01	-	-	5.3E-02	5.3E-01
Dibenz(a,h)anthracene	2.3E-04	2.3E-04	NC	NC	7.2E-04	7.2E-04	2.5E+00	2.4E+01	2.3E-04	2.3E-04	-	-	2.4E-02	2.3E-01
Dibenzofuran	NC	NC	NC	NC	NC	NC	2.8E-01	2.8E-01	NC	NC	-	-	-	-
Diethylphthalate	NC	NC	4.9E+00	4.9E+00	NC	NC	NC	NC	NC	NC	2.2E-01	2.2E-01	-	-
Di-n-butylphthalate	NC	NC	9.8E+00	9.8E+00	NC	NC	NC	NC	NC	NC	4.4E-01	4.4E-01	-	-
Di-n-octyl phthalate	NC	NC	9.8E+00	9.8E+00	NC	NC	NC	NC	NC	NC	4.4E-01	4.4E-01	-	-
Fluoranthene	1.4E-01	4.6E-01	NC	NC	1.2E-01	3.9E-01	4.4E+00	5.9E+01	1.3E-02	4.1E-02	-	-	4.4E-02	5.7E-01
Fluorene	1.0E-02	1.0E-02	NC	NC	1.0E-02	1.0E-02	8.9E-02	3.3E-01	1.0E-02	1.0E-02	-	-	1.4E-03	3.7E-03
Hexachlorobutadiene	NC	NC	4.9E+00	4.9E+00	NC	NC	NC	NC	NC	NC	2.2E-01	2.2E-01	-	-
Hexachlorocyclopentadiene	NC	NC	9.8E+00	9.8E+00	NC	NC	NC	NC	NC	NC	4.4E-01	4.4E-01	-	-
Indeno(1,2,3-cd)pyrene	8.1E-02	1.5E-01	NC	NC	5.1E-02	9.7E-02	3.5E+00	4.6E+01	8.1E-02	1.5E-01	-	-	3.7E-02	4.5E-01
Naphthalene	NC	NC	NC	NC	NC	NC	NC	NC	NC	NC	-	-	-	-
Pentachlorophenol	NC	NC	9.8E+00	9.8E+00	NC	NC	NC	NC	NC	NC	4.4E-01	4.4E-01	-	-
Perylene	1.9E-03	1.9E-03	NC	NC	1.9E-03	1.9E-03	1.4E-02	3.9E-02	1.9E-03	1.9E-03	-	-	2.4E-04	4.8E-04
Phenanthrene	9.2E-02	1.9E-01	NC	NC	1.4E-01	2.9E-01	3.0E+00	2.5E+01	2.4E-02	5.0E-02	-	-	3.1E-02	2.5E-01
Pyrene	1.2E-01	3.5E-01	NC	NC	7.1E-02	2.1E-01	5.7E+00	5.1E+01	1.2E-01	3.5E-01	-	-	6.1E-02	5.1E-01
Pesticides														
4,4'-DDT	NC	NC	5.0E-02	5.0E-02	NC	NC	NC	NC	NC	NC	2.3E-03	2.3E-03	-	-
Chlordane	NC	NC	4.9E-01	4.9E-01	NC	NC	NC	NC	NC	NC	2.2E-02	2.2E-02	-	-

Table C3-123 (3 of 4)

Applied Daily Dose for the Great Blue Heron
Ingestion Exposure Route
Sodium Reactor Experiment (SRE) Area

Chemical	Sediment Exposure Point Concentration [a]		Surface Water Exposure Point Concentration [a]		Aquatic Invertebrate EPV[b]		Terrestrial Vertebrate EPV[b]		Fish EPV[b]		Applied Daily Dose for Surface Water Ingestion		Applied Daily Dose for Sediment/Prey Ingestion	
	CTE	RME	CTE	RME	CTE	RME	CTE	RME	CTE	RME	CTE	RME	CTE	RME
	(mg/kg)		(µg/L)		(mg/kg)		(mg/kg)		(mg/kg)		(mg/kg-day)		(mg/kg-day)	
Dieldrin	NC	NC	5.0E-02	5.0E-02	NC	NC	NC	NC	NC	NC	2.3E-03	2.3E-03	-	-
Endosulfan I	NC	NC	5.0E-02	5.0E-02	NC	NC	NC	NC	NC	NC	2.3E-03	2.3E-03	-	-
Endosulfan II	NC	NC	5.0E-02	5.0E-02	NC	NC	NC	NC	NC	NC	2.3E-03	2.3E-03	-	-
Endrin	NC	NC	5.0E-02	5.0E-02	NC	NC	NC	NC	NC	NC	2.3E-03	2.3E-03	-	-
Heptachlor	NC	NC	5.0E-02	5.0E-02	NC	NC	NC	NC	NC	NC	2.3E-03	2.3E-03	-	-
Heptachlor epoxide	NC	NC	5.0E-02	5.0E-02	NC	NC	NC	NC	NC	NC	2.3E-03	2.3E-03	-	-
Toxaphene	NC	NC	2.5E+00	2.5E+00	NC	NC	NC	NC	NC	NC	1.1E-01	1.1E-01	-	-
PCDD/PCDFs														
2,3,7,8-TCDD	5.3E-07	5.3E-07	NC	NC	4.4E-07	4.4E-07	1.5E-07	3.5E-07	1.3E-06	1.3E-06	-	-	6.6E-08	6.8E-08
1,2,3,7,8-PeCDD	2.2E-06	2.2E-06	1.7E-06	1.7E-06	1.3E-06	1.3E-06	5.6E-07	1.3E-06	3.0E-06	3.0E-06	7.6E-08	7.6E-08	1.6E-07	1.6E-07
1,2,3,4,7,8-HxCDD	1.0E-05	1.0E-05	2.5E-06	2.5E-06	3.6E-06	3.6E-06	3.9E-07	8.9E-07	3.2E-06	3.2E-06	1.1E-07	1.1E-07	2.0E-07	2.0E-07
1,2,3,6,7,8-HxCDD	3.0E-05	3.0E-05	2.7E-05	6.6E-05	1.1E-05	1.1E-05	1.8E-06	4.0E-06	1.5E-05	1.5E-05	1.2E-06	3.0E-06	8.7E-07	8.9E-07
1,2,3,7,8,9-HxCDD	1.0E-05	1.0E-05	1.4E-05	1.4E-05	2.8E-06	2.8E-06	6.1E-07	1.6E-06	1.8E-06	1.8E-06	6.3E-07	6.3E-07	1.4E-07	1.5E-07
1,2,3,4,6,7,8-HpCDD	1.3E-03	1.3E-03	2.2E-04	1.9E-03	1.8E-04	1.8E-04	6.8E-05	1.4E-04	5.1E-05	5.1E-05	9.9E-06	8.6E-05	8.3E-06	9.0E-06
OCDD	1.9E-02	1.9E-02	1.8E-03	2.7E-03	3.2E-03	3.2E-03	7.9E-04	1.6E-03	3.1E-04	3.1E-04	8.0E-05	1.2E-04	1.0E-04	1.1E-04
2,3,7,8-TCDF	7.9E-07	7.9E-07	4.0E-06	4.5E-06	2.0E-06	2.0E-06	6.8E-08	1.4E-07	8.8E-07	8.8E-07	1.8E-07	2.0E-07	5.5E-08	5.6E-08
1,2,3,7,8-PeCDF	5.8E-07	5.8E-07	7.2E-06	7.2E-06	5.9E-07	5.9E-07	1.5E-07	3.9E-07	5.3E-07	5.3E-07	3.3E-07	3.3E-07	3.1E-08	3.3E-08
2,3,4,7,8-PeCDF	1.6E-06	1.6E-06	1.8E-05	2.0E-05	1.1E-06	1.1E-06	1.9E-07	4.0E-07	2.6E-06	2.6E-06	8.1E-07	9.0E-07	1.3E-07	1.3E-07
1,2,3,4,7,8-HxCDF	3.7E-06	3.7E-06	1.9E-05	2.1E-05	1.5E-06	1.5E-06	7.1E-08	1.4E-07	4.6E-07	4.6E-07	8.4E-07	9.6E-07	4.3E-08	4.4E-08
1,2,3,6,7,8-HxCDF	3.4E-06	3.4E-06	1.1E-05	1.1E-05	1.2E-06	1.2E-06	4.7E-07	1.1E-06	1.6E-06	1.6E-06	5.0E-07	5.0E-07	9.6E-08	1.0E-07
1,2,3,4,6,7,8-HpCDF	1.0E-04	1.0E-04	2.7E-05	5.1E-05	1.2E-05	1.2E-05	1.2E-05	2.2E-05	4.3E-06	4.3E-06	1.2E-06	2.3E-06	7.0E-07	8.0E-07
1,2,3,4,7,8,9-HpCDF	1.0E-05	1.0E-05	1.4E-05	1.4E-05	7.3E-07	7.3E-07	2.4E-06	4.2E-06	1.0E-05	1.0E-05	6.3E-07	6.3E-07	5.1E-07	5.3E-07
OCDF	2.4E-04	2.4E-04	7.2E-05	1.3E-04	9.6E-06	9.6E-06	7.0E-05	1.4E-04	4.2E-06	4.2E-06	3.2E-06	6.0E-06	1.7E-06	2.4E-06
PCBs														
Aroclor-1016	NC	NC	4.9E-01	4.9E-01	NC	NC	NC	NC	NC	NC	2.2E-02	2.2E-02	-	-
Aroclor-1221	NC	NC	4.9E-01	4.9E-01	NC	NC	NC	NC	NC	NC	2.2E-02	2.2E-02	-	-
Aroclor-1232	NC	NC	4.9E-01	4.9E-01	NC	NC	NC	NC	NC	NC	2.2E-02	2.2E-02	-	-
Aroclor-1242	NC	NC	4.9E-01	4.9E-01	NC	NC	NC	NC	NC	NC	2.2E-02	2.2E-02	-	-
Aroclor-1248	NC	NC	4.9E-01	4.9E-01	NC	NC	NC	NC	NC	NC	2.2E-02	2.2E-02	-	-
Aroclor-1254	7.8E-02	1.1E-01	4.9E-01	4.9E-01	7.8E-02	1.1E-01	1.6E-01	4.3E-01	7.8E-02	1.1E-01	2.2E-02	2.2E-02	5.8E-03	1.0E-02
Aroclor-1260	1.1E-01	1.8E-01	4.9E-01	4.9E-01	1.1E-01	1.8E-01	1.4E+00	7.7E+00	1.1E-01	1.8E-01	2.2E-02	2.2E-02	2.0E-02	8.3E-02

Table C3-123 (4 of 4)

Applied Daily Dose for the Great Blue Heron
Ingestion Exposure Route
Sodium Reactor Experiment (SRE) Area

Chemical	Sediment Exposure Point Concentration [a]		Surface Water Exposure Point Concentration [a]		Aquatic Invertebrate EPV[b]		Terrestrial Vertebrate EPV[b]		Fish EPV[b]		Applied Daily Dose for Surface Water Ingestion		Applied Daily Dose for Sediment/Prey Ingestion	
	CTE	RME	CTE	RME	CTE	RME	CTE	RME	CTE	RME	CTE	RME	CTE	RME
	(mg/kg)		(µg/L)		(mg/kg)		(mg/kg)		(mg/kg)		(mg/kg-day)		(mg/kg-day)	
PCB-105	1.0E-05	1.5E-05	NC	NC	2.3E-04	3.4E-04	3.2E-04	1.7E-03	2.7E-03	3.9E-03	-	-	1.3E-04	1.9E-04
PCB-114	3.5E-07	5.0E-07	NC	NC	1.2E-05	1.7E-05	1.5E-05	7.3E-05	9.9E-05	1.4E-04	-	-	4.6E-06	7.1E-06
PCB-118	2.1E-05	2.9E-05	NC	NC	5.5E-04	7.8E-04	6.7E-04	3.5E-03	6.7E-03	9.4E-03	-	-	3.1E-04	4.6E-04
PCB-123	2.8E-07	4.2E-07	NC	NC	1.1E-05	1.7E-05	1.1E-05	6.0E-05	1.0E-04	1.5E-04	-	-	4.7E-06	7.5E-06
PCB-126	7.4E-07	1.1E-06	NC	NC	1.1E-05	1.7E-05	1.7E-05	9.0E-05	8.6E-05	1.3E-04	-	-	4.1E-06	6.9E-06
PCB-156	6.3E-06	9.8E-06	NC	NC	1.8E-04	2.8E-04	3.1E-04	1.6E-03	2.3E-03	3.6E-03	-	-	1.1E-04	1.8E-04
PCB-157	2.8E-06	4.4E-06	NC	NC	6.9E-05	1.1E-04	9.2E-04	5.0E-03	7.9E-04	1.3E-03	-	-	4.5E-05	1.0E-04
PCB-167	4.8E-06	7.7E-06	NC	NC	1.6E-04	2.6E-04	2.9E-04	1.6E-03	1.8E-03	2.9E-03	-	-	8.6E-05	1.5E-04
PCB-169	7.2E-08	1.1E-07	NC	NC	7.2E-08	1.1E-07	9.0E-07	4.9E-06	7.2E-08	1.1E-07	-	-	1.3E-08	5.3E-08
PCB-189	7.2E-07	1.1E-06	NC	NC	2.3E-06	3.7E-06	6.3E-05	3.4E-04	1.1E-05	1.8E-05	-	-	1.1E-06	4.1E-06
PCB-77	1.5E-06	2.3E-06	NC	NC	1.7E-05	2.6E-05	1.4E-05	7.5E-05	2.9E-05	4.4E-05	-	-	1.5E-06	2.9E-06
PCB-81	2.7E-07	4.1E-07	NC	NC	4.9E-07	7.3E-07	3.3E-06	1.7E-05	3.5E-05	5.2E-05	-	-	1.6E-06	2.5E-06

Notes:

a. Exposure point concentration (EPC) for soil 0 to 2 feet bgs, from Spreadsheet D-90.

b. Earthworm and terrestrial plant exposure point values were estimated by application of site-specific bioaccumulation factors (BAFs) to soil exposure point concentration when available, or by application of a BAF of 1 when site-specific BAFs were not available.

CTE - central tendancy exposure

RME - reasonable maximum exposure

EPV - exposure point value

NC - not selected as a CPEC in the indicated media, per the SRAM (MWH 2005).

CPEC - chemical of potential ecological concern

VOC - volatile organic compund

SVOC - semi-volatile organic compound

PCB - polychlorinated biphenyls

PCDD/PCDF - polychlorinated dibenzo-p-dioxins and dibenzofurans

"-" not applicable

mg/kg - milligram per kilogram

mg/kg-day - milligram per kilogram per day

Applied Daily Dose for the Mule Deer - Wet Pond Scenario
Ingestion Exposure Route

Sodium Reactor Experiment (SRE) Area

Chemical	Soil Exposure Point Concentration [a]		EPV in Terrestrial Plants[b]		Applied Daily Dose	
	CTE	RME	CTE	RME	CTE	RME
	(mg/kg)		(mg/kg)		(mg/kg-day)	
Inorganic Compounds						
Aluminum	NC	NC	NC	NC	-	-
Antimony	NC	NC	NC	NC	-	-
Arsenic	NC	NC	NC	NC	-	-
Beryllium	NC	NC	NC	NC	-	-
Cadmium	2.4E-01	4.2E-01	2.6E+00	4.5E+00	1.0E-01	1.8E-01
Chromium	NC	NC	NC	NC	-	-
Copper	9.9E+00	2.0E+01	1.9E+01	3.7E+01	7.5E-01	1.5E+00
Lead	9.3E+00	1.3E+01	2.0E+01	2.7E+01	8.0E-01	1.1E+00
Mercury	2.1E+00	5.5E+00	1.7E+00	4.5E+00	7.2E-02	1.8E-01
Methyl Mercury	1.7E-03	3.6E-03	1.7E-03	3.6E-03	7.1E-05	1.5E-04
Nickel	NC	NC	NC	NC	-	-
Selenium	NC	NC	NC	NC	-	-
Silver	1.0E+00	2.7E+00	1.7E+00	4.6E+00	6.9E-02	1.9E-01
Thallium	3.3E-01	3.3E-01	1.7E-01	1.7E-01	7.0E-03	7.0E-03
Vanadium	NC	NC	NC	NC	-	-
Zinc	8.4E+01	1.9E+02	1.4E+02	3.1E+02	5.5E+00	1.2E+01
VOCs						
1,1,1-Trichloroethane	NC	NC	NC	NC	-	-
1,1,2-Trichloro-1,2,2-trifluoroethane	1.2E-02	1.2E-02	1.2E-02	1.2E-02	4.9E-04	4.9E-04
1,1-Dichloroethane	NC	NC	NC	NC	-	-
2-Butanone	2.1E-02	3.5E-02	2.1E-02	3.5E-02	8.7E-04	1.4E-03
Acetone	1.1E+00	5.2E+00	1.1E+00	5.2E+00	4.5E-02	2.1E-01
Bromomethane	NC	NC	NC	NC	-	-
Ethylbenzene	NC	NC	NC	NC	-	-
m,p-Xylene	NC	NC	NC	NC	-	-
Methylene chloride	1.0E-02	1.3E-02	1.0E-02	1.3E-02	4.2E-04	5.3E-04
Tetrachloroethene	NC	NC	NC	NC	-	-
Toluene	NC	NC	NC	NC	-	-
trans-1,3-Dichloropropene	NC	NC	NC	NC	-	-
Trichloroethene	NC	NC	NC	NC	-	-
Xylenes (total)	NC	NC	NC	NC	-	-
SVOCs						
Acenaphthene	2.6E-02	1.1E-01	2.6E-02	1.1E-01	1.1E-03	4.5E-03
Acenaphthylene	4.6E-03	1.6E-02	4.6E-03	1.6E-02	1.9E-04	6.4E-04
Anthracene	1.8E-02	7.3E-02	1.8E-02	7.3E-02	7.2E-04	3.0E-03
Benzo(a)anthracene	2.8E-03	8.8E-03	1.5E-02	4.6E-02	6.0E-04	1.8E-03
Benzo(a)pyrene	3.0E-03	8.9E-03	3.0E-03	8.9E-03	1.2E-04	3.6E-04
Benzo(b)fluoranthene	4.3E-03	1.1E-02	4.3E-03	1.1E-02	1.8E-04	4.5E-04
Benzo(e)pyrene	2.0E-02	6.7E-02	2.0E-02	6.7E-02	8.1E-04	2.7E-03
Benzo(g,h,i)perylene	1.2E-02	4.4E-02	1.2E-02	4.4E-02	4.9E-04	1.8E-03
Benzo(k)fluoranthene	2.8E-03	8.3E-03	2.8E-03	8.3E-03	1.1E-04	3.4E-04
bis(2-Ethylhexyl)phthalate	NC	NC	NC	NC	-	-
Butyl benzyl phthalate	NC	NC	NC	NC	-	-
Chrysene	5.1E-03	1.2E-02	1.4E-02	3.4E-02	5.7E-04	1.4E-03
Dibenz(a,h)anthracene	1.9E-03	6.9E-03	1.9E-03	6.9E-03	7.6E-05	2.8E-04
Dibenzofuran	NC	NC	NC	NC	-	-
Diethylphthalate	NC	NC	NC	NC	-	-
Di-n-butylphthalate	NC	NC	NC	NC	-	-
Di-n-octyl phthalate	NC	NC	NC	NC	-	-
Fluoranthene	5.6E-03	1.2E-02	1.6E-02	3.4E-02	6.5E-04	1.4E-03

Spreadsheet C3-122b (2 of 3)

Applied Daily Dose for the Mule Deer - Wet Pond Scenario
Ingestion Exposure Route

Sodium Reactor Experiment (SRE) Area

Chemical	Soil Exposure Point Concentration [a]		EPV in Terrestrial Plants[b]		Applied Daily Dose	
	CTE	RME	CTE	RME	CTE	RME
	(mg/kg)		(mg/kg)		(mg/kg-day)	
Fluorene	2.6E-02	1.1E-01	2.6E-02	1.1E-01	1.1E-03	4.5E-03
Hexachlorobutadiene	NC	NC	NC	NC	-	-
Hexachlorocyclopentadiene	NC	NC	NC	NC	-	-
Indeno(1,2,3-cd)pyrene	2.7E-03	8.5E-03	2.7E-03	8.5E-03	1.1E-04	3.5E-04
Naphthalene	NC	NC	NC	NC	-	-
Pentachlorophenol	NC	NC	NC	NC	-	-
Perylene	1.1E-02	3.8E-02	1.1E-02	3.8E-02	4.6E-04	1.6E-03
Phenanthrene	7.1E-02	3.0E-01	5.1E-01	2.1E+00	2.0E-02	8.6E-02
Pyrene	8.2E-03	2.8E-02	1.6E-02	5.4E-02	6.3E-04	2.2E-03
Total Petroleum Hydrocarbons						
C11-C14(Kerosene Range)	1.0E+01	4.0E+01	1.0E+01	4.0E+01	4.1E-01	1.6E+00
C14-C20(Diesel Range)	NC	NC	NC	NC	-	-
C20-C30(Lubricant Oil Range)	7.8E+01	4.7E+02	7.8E+01	4.7E+02	3.2E+00	1.9E+01
PCDD/PCDFs						
2,3,7,8-TCDD	1.9E-07	4.0E-07	1.9E-07	4.0E-07	7.6E-09	1.6E-08
1,2,3,7,8-PeCDD	7.3E-07	1.5E-06	7.3E-07	1.5E-06	3.0E-08	6.1E-08
1,2,3,4,7,8-HxCDD	2.1E-06	4.2E-06	2.1E-06	4.2E-06	8.7E-08	1.7E-07
1,2,3,6,7,8-HxCDD	1.1E-05	2.0E-05	1.8E-06	3.3E-06	8.1E-08	1.5E-07
1,2,3,7,8,9-HxCDD	4.5E-06	1.0E-05	4.5E-06	1.0E-05	1.9E-07	4.1E-07
1,2,3,4,6,7,8-HpCDD	3.1E-04	5.0E-04	1.0E-04	1.6E-04	4.3E-06	6.9E-06
OCDD	5.0E-03	7.3E-03	1.2E-03	1.7E-03	5.0E-05	7.4E-05
2,3,7,8-TCDF	4.7E-07	7.9E-07	4.7E-07	7.9E-07	1.9E-08	3.2E-08
1,2,3,7,8-PeCDF	1.8E-07	3.9E-07	1.8E-07	3.9E-07	7.2E-09	1.6E-08
2,3,4,7,8-PeCDF	5.4E-07	9.9E-07	5.4E-07	9.9E-07	2.2E-08	4.0E-08
1,2,3,4,7,8-HxCDF	1.2E-06	1.8E-06	1.2E-06	1.8E-06	4.7E-08	7.4E-08
1,2,3,6,7,8-HxCDF	9.5E-07	1.8E-06	9.5E-07	1.8E-06	3.9E-08	7.5E-08
1,2,3,4,6,7,8-HpCDF	3.7E-05	5.0E-05	8.3E-06	1.1E-05	3.6E-07	4.9E-07
1,2,3,4,7,8,9-HpCDF	3.2E-06	4.2E-06	3.2E-06	4.2E-06	1.3E-07	1.7E-07
OCDF	1.0E-04	1.5E-04	3.3E-05	5.0E-05	1.4E-06	2.1E-06
PCBs						
Aroclor-1016	NC	NC	NC	NC	-	-
Aroclor-1221	NC	NC	NC	NC	-	-
Aroclor-1232	NC	NC	NC	NC	-	-
Aroclor-1242	NC	NC	NC	NC	-	-
Aroclor-1248	NC	NC	NC	NC	-	-
Aroclor-1254	1.7E-01	4.3E-01	1.7E-01	4.3E-01	7.0E-03	1.8E-02
Aroclor-1260	1.5E+00	7.8E+00	1.5E+00	7.8E+00	6.0E-02	3.2E-01
PCB-105	1.3E-04	6.4E-04	4.2E-04	2.1E-03	1.7E-05	8.5E-05
PCB-114	2.4E-06	1.1E-05	8.8E-06	4.2E-05	3.5E-07	1.7E-06
PCB-118	2.5E-04	1.3E-03	8.0E-04	4.0E-03	3.2E-05	1.6E-04
PCB-123	3.5E-06	1.8E-05	1.2E-05	6.2E-05	4.9E-07	2.5E-06
PCB-126	9.6E-06	5.0E-05	2.1E-05	1.1E-04	8.7E-07	4.5E-06
PCB-156	8.3E-05	4.3E-04	2.1E-04	1.1E-03	8.3E-06	4.3E-05
PCB-157	3.6E-05	1.9E-04	9.6E-05	5.0E-04	3.9E-06	2.0E-05
PCB-167	6.3E-05	3.3E-04	1.8E-04	9.2E-04	7.1E-06	3.7E-05
PCB-169	9.4E-07	5.0E-06	9.4E-07	5.0E-06	3.9E-08	2.0E-07
PCB-189	9.4E-06	5.0E-05	2.0E-05	1.1E-04	8.2E-07	4.3E-06
PCB-77	1.9E-05	9.9E-05	4.7E-05	2.4E-04	1.9E-06	9.7E-06
PCB-81	3.4E-06	1.8E-05	1.0E-05	5.3E-05	4.1E-07	2.1E-06

Spreadsheet C3-122b (3 of 3)

Applied Daily Dose for the Mule Deer - Wet Pond Scenario
Ingestion Exposure Route

Sodium Reactor Experiment (SRE) Area

Chemical	Soil Exposure Point Concentration [a]		EPV in Terrestrial Plants[b]		Applied Daily Dose	
	CTE	RME	CTE	RME	CTE	RME
	(mg/kg)		(mg/kg)		(mg/kg-day)	

Notes:

a. Exposure point concentration (EPC) for soil 0 to 2 feet bgs, from Spreadsheet D-90.

b. Terrestrial plant exposure point values were estimated by application of site-specific bioaccumulation factors (BAFs) to soil exposure point concentration when available, or by application of a BAF of 1 when site-specific BAFs were not available.

CTE - central tendancy exposure

RME - reasonable maximum exposure

EPV - exposure point value

NC - not selected as a CPEC in the indicated media, per the SRAM (MWH 2005).

CPEC - chemical of potential ecological concern

VOC - volatile organic compund

SVOC - semi-volatile organic compound

PCB - polychlorinated biphenyls

PCDD/PCDF - polychlorinated dibenzo-p-dioxins and dibenzofurans

"-" not applicable

mg/kg - milligram per kilogram

mg/kg-day - milligram per kilogram per day

Spreadsheet C3-122a (1 of 2)

Applied Daily Dose for the Mule Deer - Dry Pond Scenario
Ingestion Exposure Route

Sodium Reactor Experiment (SRE) Area

Chemical	Soil Exposure Point Concentration [a]		EPV in Terrestrial Plants[b]		Applied Daily Dose	
	CTE	RME	CTE	RME	CTE	RME
	(mg/kg)		(mg/kg)		(mg/kg-day)	
Inorganic Compounds						
Cadmium	5.1E-01	1.1E+00	5.5E+00	1.2E+01	2.2E-01	4.9E-01
Copper	2.1E+01	4.6E+01	4.0E+01	8.6E+01	1.6E+00	3.5E+00
Lead	1.6E+01	3.4E+01	3.4E+01	7.2E+01	1.4E+00	2.9E+00
Mercury	1.9E+00	4.4E+00	1.6E+00	3.6E+00	6.4E-02	1.5E-01
Methyl Mercury	1.7E-03	3.6E-03	1.7E-03	3.6E-03	7.1E-05	1.5E-04
Silver	7.7E-01	2.9E+00	1.3E+00	4.8E+00	5.3E-02	2.0E-01
Thallium	3.3E-01	3.3E-01	1.7E-01	1.7E-01	7.0E-03	7.0E-03
Zinc	1.7E+02	4.4E+02	2.8E+02	7.1E+02	1.1E+01	2.9E+01
VOCs						
1,1,1-Trichloroethane	NC	NC	NC	NC	-	-
1,1,2-Trichloro-1,2,2-trifluoroethane	1.2E-02	1.2E-02	1.2E-02	1.2E-02	4.9E-04	4.9E-04
1,1-Dichloroethane	NC	NC	NC	NC	-	-
1,2-Dichloroethene (total)	2.8E-02	7.0E-02	2.8E-02	7.0E-02	1.2E-03	2.9E-03
2-Butanone	3.7E-02	3.7E-02	3.7E-02	3.7E-02	1.5E-03	1.5E-03
Acetone	6.8E-01	4.2E+00	6.8E-01	4.2E+00	2.8E-02	1.7E-01
Ethylbenzene	NC	NC	NC	NC	-	-
m,p-Xylene	NC	NC	NC	NC	-	-
Methylene chloride	1.3E-02	1.3E-02	1.3E-02	1.3E-02	5.3E-04	5.3E-04
Tetrachloroethene	2.1E-02	8.8E-02	2.1E-02	8.8E-02	8.5E-04	3.6E-03
Toluene	5.6E-02	3.4E-01	5.6E-02	3.4E-01	2.3E-03	1.4E-02
Trichloroethene	3.7E-02	2.0E-01	3.7E-02	2.0E-01	1.5E-03	8.2E-03
Xylenes (total)	2.5E-02	5.1E-02	2.5E-02	5.1E-02	1.0E-03	2.1E-03
SVOCs						
Acenaphthene	4.4E-02	1.0E-01	4.4E-02	1.0E-01	1.8E-03	4.1E-03
Acenaphthylene	3.1E-02	8.5E-02	3.1E-02	8.5E-02	1.3E-03	3.5E-03
Anthracene	3.9E-02	8.2E-02	3.9E-02	8.2E-02	1.6E-03	3.3E-03
Benzo(a)anthracene	3.6E-02	1.5E-01	1.9E-01	7.8E-01	7.6E-03	3.1E-02
Benzo(a)pyrene	3.6E-02	1.5E-01	3.6E-02	1.5E-01	1.5E-03	6.1E-03
Benzo(b)fluoranthene	4.9E-02	2.7E-01	4.9E-02	2.7E-01	2.0E-03	1.1E-02
Benzo(e)pyrene	1.9E-02	6.3E-02	1.9E-02	6.3E-02	7.6E-04	2.6E-03
Benzo(g,h,i)perylene	4.1E-02	9.0E-02	4.1E-02	9.0E-02	1.7E-03	3.7E-03
Benzo(k)fluoranthene	3.0E-02	8.5E-02	3.0E-02	8.5E-02	1.2E-03	3.5E-03
Chrysene	4.4E-02	2.2E-01	1.2E-01	6.0E-01	5.0E-03	2.4E-02
Dibenz(a,h)anthracene	2.9E-02	8.5E-02	2.9E-02	8.5E-02	1.2E-03	3.5E-03
Dibenzofuran	NC	NC	NC	NC	-	-
Fluoranthene	6.0E-02	3.8E-01	1.7E-01	1.1E+00	6.9E-03	4.3E-02
Fluorene	4.4E-02	1.0E-01	4.4E-02	1.0E-01	1.8E-03	4.1E-03
Indeno(1,2,3-cd)pyrene	3.4E-02	1.4E-01	3.4E-02	1.4E-01	1.4E-03	5.5E-03
Naphthalene	NC	NC	NC	NC	-	-
Perylene	1.1E-02	3.6E-02	1.1E-02	3.6E-02	4.3E-04	1.5E-03
Phenanthrene	7.9E-02	2.0E-01	5.7E-01	1.4E+00	2.3E-02	5.8E-02
Pyrene	5.3E-02	1.6E-01	1.0E-01	3.0E-01	4.1E-03	1.2E-02
Total Petroleum Hydrocarbons						
C11-C14(Kerosene Range)	9.7E+00	4.0E+01	9.7E+00	4.0E+01	3.9E-01	1.6E+00
C14-C20(Diesel Range)	NC	NC	NC	NC	-	-
C20-C30(Lubricant Oil Range)	7.3E+01	4.7E+02	7.3E+01	4.7E+02	3.0E+00	1.9E+01

Spreadsheet C3-122a (2 of 2)

Applied Daily Dose for the Mule Deer - Dry Pond Scenario
Ingestion Exposure Route

Sodium Reactor Experiment (SRE) Area

Chemical	Soil Exposure Point Concentration [a]		EPV in Terrestrial Plants[b]		Applied Daily Dose	
	CTE	RME	CTE	RME	CTE	RME
	(mg/kg)		(mg/kg)		(mg/kg-day)	
PCDD/PCDFs						
2,3,7,8-TCDD	2.7E-07	5.3E-07	2.7E-07	5.3E-07	1.1E-08	2.2E-08
1,2,3,7,8-PeCDD	1.1E-06	2.2E-06	1.1E-06	2.2E-06	4.5E-08	8.9E-08
1,2,3,4,7,8-HxCDD	4.1E-06	9.0E-06	4.1E-06	9.0E-06	1.7E-07	3.7E-07
1,2,3,6,7,8-HxCDD	1.6E-05	3.0E-05	2.6E-06	4.8E-06	1.2E-07	2.2E-07
1,2,3,7,8,9-HxCDD	5.9E-06	1.0E-05	5.9E-06	1.0E-05	2.4E-07	4.1E-07
1,2,3,4,6,7,8-HpCDD	5.7E-04	1.2E-03	1.8E-04	3.8E-04	7.8E-06	1.6E-05
OCDD	8.4E-03	1.7E-02	2.0E-03	3.9E-03	8.5E-05	1.7E-04
2,3,7,8-TCDF	5.5E-07	7.9E-07	5.5E-07	7.9E-07	2.2E-08	3.2E-08
1,2,3,7,8-PeCDF	2.8E-07	5.7E-07	2.8E-07	5.7E-07	1.1E-08	2.3E-08
2,3,4,7,8-PeCDF	8.2E-07	1.6E-06	8.2E-07	1.6E-06	3.3E-08	6.4E-08
1,2,3,4,7,8-HxCDF	1.8E-06	3.3E-06	1.8E-06	3.3E-06	7.3E-08	1.4E-07
1,2,3,6,7,8-HxCDF	1.6E-06	3.2E-06	1.6E-06	3.2E-06	6.3E-08	1.3E-07
2,3,4,6,7,8-HxCDF	3.8E-06	8.8E-06	3.8E-06	8.8E-06	1.6E-07	3.6E-07
1,2,3,7,8,9-HxCDF	3.6E-07	9.7E-07	3.6E-07	9.7E-07	1.5E-08	4.0E-08
1,2,3,4,6,7,8-HpCDF	5.3E-05	9.6E-05	1.2E-05	2.2E-05	5.1E-07	9.4E-07
1,2,3,4,7,8,9-HpCDF	4.9E-06	9.2E-06	4.9E-06	9.2E-06	2.0E-07	3.8E-07
OCDF	1.4E-04	2.4E-04	4.5E-05	7.9E-05	1.9E-06	3.3E-06
PCBs						
Aroclor-1254	1.6E-01	4.3E-01	1.6E-01	4.3E-01	6.6E-03	1.8E-02
Aroclor-1260	1.3E+00	7.3E+00	1.3E+00	7.3E+00	5.4E-02	3.0E-01
PCB-105	1.1E-04	5.6E-04	3.8E-04	1.9E-03	1.5E-05	7.5E-05
PCB-114	2.2E-06	1.0E-05	8.0E-06	3.7E-05	3.2E-07	1.5E-06
PCB-118	2.3E-04	1.1E-03	7.2E-04	3.6E-03	2.9E-05	1.4E-04
PCB-123	3.2E-06	1.6E-05	1.1E-05	5.5E-05	4.4E-07	2.2E-06
PCB-126	8.8E-06	4.4E-05	1.9E-05	9.8E-05	7.9E-07	3.9E-06
PCB-156	7.5E-05	3.8E-04	1.9E-04	9.4E-04	7.5E-06	3.8E-05
PCB-157	3.3E-05	1.7E-04	8.7E-05	4.5E-04	3.5E-06	1.8E-05
PCB-167	5.7E-05	2.9E-04	1.6E-04	8.2E-04	6.4E-06	3.3E-05
PCB-169	8.6E-07	4.4E-06	8.6E-07	4.4E-06	3.5E-08	1.8E-07
PCB-189	8.6E-06	4.4E-05	1.9E-05	9.5E-05	7.5E-07	3.8E-06
PCB-77	1.8E-05	8.8E-05	4.2E-05	2.1E-04	1.7E-06	8.5E-06
PCB-81	3.1E-06	1.6E-05	9.3E-06	4.7E-05	3.8E-07	1.9E-06

Notes:

a. Exposure point concentration (EPC) for soil 0 to 2 feet bgs, from Spreadsheet D-90.

b. Terrestrial plant exposure point values were estimated by application of site-specific bioaccumulation factors (BAFs) to soil exposure point concentration when available, or by application of a BAF of 1 when site-specific BAFs were not available.

CTE - central tendancy exposure

RME - reasonable maximum exposure

EPV - exposure point value

NC - not selected as a CPEC in the indicated media, per the SRAM (MWH 2005).

CPEC - chemical of potential ecological concern

VOC - volatile organic compund

SVOC - semi-volatile organic compound

PCB - polychlorinated biphenyls

PCDD/PCDF - polychlorinated dibenzo-p-dioxins and dibenzofurans

"-" not applicable

mg/kg - milligram per kilogram

mg/kg-day - milligram per kilogram per day

Applied Daily Dose for the Bobcat - Wet Pond Scenario
Ingestion Exposure Route
Sodium Reactor Experiment (SRE) Area

Chemical	Soil Exposure Point Concentration [a]		EPV in Deer Mouse[b]		Applied Daily Dose	
	CTE	RME	CTE	RME	CTE	RME
	(mg/kg)		(mg/kg)		(mg/kg-day)	
Inorganic Compounds						
Aluminum	NC	NC	NC	NC	-	-
Antimony	NC	NC	NC	NC	-	-
Arsenic	NC	NC	NC	NC	-	-
Beryllium	NC	NC	NC	NC	-	-
Cadmium	2.2E-01	3.6E-01	2.2E-01	3.6E-01	7.3E-03	1.2E-02
Chromium	NC	NC	NC	NC	-	-
Copper	1.1E+01	2.0E+01	8.3E+00	1.5E+01	2.8E-01	5.0E-01
Lead	9.9E+00	1.3E+01	9.9E+00	1.3E+01	3.3E-01	4.3E-01
Mercury	1.9E+00	4.1E+00	1.9E+00	4.1E+00	6.1E-02	1.3E-01
Methyl Mercury	1.7E-03	3.6E-03	1.7E-03	3.6E-03	5.8E-05	1.2E-04
Nickel	NC	NC	NC	NC	-	-
Selenium	NC	NC	NC	NC	-	-
Silver	1.5E+00	3.5E+00	1.5E+00	3.5E+00	5.0E-02	1.2E-01
Thallium	8.4E-01	2.1E+00	8.4E-01	2.1E+00	2.8E-02	7.0E-02
Vanadium	NC	NC	NC	NC	-	-
Zinc	7.5E+01	1.5E+02	2.6E+02	5.3E+02	8.6E+00	1.8E+01
VOCs						
1,1,1-Trichloroethane	NC	NC	NC	NC	-	-
1,1,2-Trichloro-1,2,2-trifluoroethane	1.2E-02	1.2E-02	1.2E-02	1.2E-02	4.0E-04	4.0E-04
1,1-Dichloroethane	NC	NC	NC	NC	-	-
2-Butanone	1.8E-02	2.7E-02	1.8E-02	2.7E-02	6.1E-04	9.1E-04
Acetone	6.9E-01	2.3E+00	6.9E-01	2.3E+00	2.3E-02	7.6E-02
Bromomethane	NC	NC	NC	NC	-	-
Ethylbenzene	NC	NC	NC	NC	-	-
m,p-Xylene	NC	NC	NC	NC	-	-
Methylene chloride	1.0E-02	1.2E-02	1.0E-02	1.2E-02	3.4E-04	4.0E-04
Tetrachloroethene	NC	NC	NC	NC	-	-
Toluene	NC	NC	NC	NC	-	-
trans-1,3-Dichloropropene	NC	NC	NC	NC	-	-
Trichloroethene	NC	NC	NC	NC	-	-
Xylenes (total)	NC	NC	NC	NC	-	-
SVOCs						
Acenaphthene	8.8E-02	3.3E-01	8.8E-02	3.3E-01	2.9E-03	1.1E-02
Acenaphthylene	6.1E-03	1.7E-02	6.1E-03	1.7E-02	2.0E-04	5.7E-04
Anthracene	2.5E-01	1.3E+00	2.5E-01	1.3E+00	8.3E-03	4.2E-02
Benzo(a)anthracene	1.1E+00	1.4E+01	1.7E+01	2.3E+02	5.6E-01	7.5E+00
Benzo(a)pyrene	1.1E+00	1.5E+01	6.7E+00	8.9E+01	2.2E-01	3.0E+00
Benzo(b)fluoranthene	1.0E+00	1.3E+01	5.3E+00	6.8E+01	1.8E-01	2.3E+00
Benzo(e)pyrene	2.4E-02	6.8E-02	2.4E-02	6.8E-02	8.0E-04	2.3E-03
Benzo(g,h,i)perylene	3.4E-01	3.1E+00	1.6E+00	1.4E+01	5.1E-02	4.7E-01
Benzo(k)fluoranthene	1.1E+00	1.5E+01	8.8E+00	1.2E+02	2.9E-01	3.9E+00
bis(2-Ethylhexyl)phthalate	NC	NC	NC	NC	-	-
Butyl benzyl phthalate	NC	NC	NC	NC	-	-
Chrysene	7.7E-01	8.4E+00	4.9E+00	5.3E+01	1.6E-01	1.8E+00
Dibenz(a,h)anthracene	1.5E-01	1.4E+00	2.5E+00	2.4E+01	8.2E-02	7.9E-01
Dibenzofuran	2.8E-01	2.8E-01	2.8E-01	2.8E-01	9.3E-03	9.3E-03
Diethylphthalate	NC	NC	NC	NC	-	-
Di-n-butylphthalate	NC	NC	NC	NC	-	-
Di-n-octyl phthalate	NC	NC	NC	NC	-	-
Fluoranthene	1.9E+00	2.5E+01	4.4E+00	5.9E+01	1.5E-01	1.9E+00
Fluorene	8.9E-02	3.3E-01	8.9E-02	3.3E-01	3.0E-03	1.1E-02

Applied Daily Dose for the Bobcat - Wet Pond Scenario
Ingestion Exposure Route
Sodium Reactor Experiment (SRE) Area

Chemical	Soil Exposure Point Concentration [a]		EPV in Deer Mouse[b]		Applied Daily Dose	
	CTE	RME	CTE	RME	CTE	RME
	(mg/kg)		(mg/kg)		(mg/kg-day)	
Hexachlorobutadiene	NC	NC	NC	NC	-	-
Hexachlorocyclopentadiene	NC	NC	NC	NC	-	-
Indeno(1,2,3-cd)pyrene	4.8E-01	6.4E+00	3.5E+00	4.6E+01	1.1E-01	1.5E+00
Naphthalene	NC	NC	NC	NC	-	-
Pentachlorophenol	NC	NC	NC	NC	-	-
Perylene	1.4E-02	3.9E-02	1.4E-02	3.9E-02	4.6E-04	1.3E-03
Phenanthrene	9.0E-01	7.5E+00	3.0E+00	2.5E+01	1.0E-01	8.3E-01
Pyrene	1.6E+00	1.4E+01	5.7E+00	5.1E+01	1.9E-01	1.7E+00
Pesticides						
4,4'-DDT	NC	NC	NC	NC	-	-
Chlordane	NC	NC	NC	NC	-	-
Dieldrin	NC	NC	NC	NC	-	-
Endosulfan I	NC	NC	NC	NC	-	-
Endosulfan II	NC	NC	NC	NC	-	-
Endrin	NC	NC	NC	NC	-	-
Heptachlor	NC	NC	NC	NC	-	-
Heptachlor epoxide	NC	NC	NC	NC	-	-
Toxaphene	NC	NC	NC	NC	-	-
PCDD/PCDFs						
2,3,7,8-TCDD	1.5E-07	3.5E-07	1.5E-07	3.5E-07	4.9E-09	1.2E-08
1,2,3,7,8-PeCDD	5.6E-07	1.3E-06	5.6E-07	1.3E-06	1.9E-08	4.4E-08
1,2,3,4,7,8-HxCDD	1.6E-06	3.7E-06	3.9E-07	8.9E-07	1.3E-08	2.9E-08
1,2,3,6,7,8-HxCDD	8.3E-06	1.9E-05	1.8E-06	4.0E-06	5.9E-08	1.3E-07
1,2,3,7,8,9-HxCDD	3.4E-06	8.7E-06	6.1E-07	1.6E-06	2.0E-08	5.1E-08
1,2,3,4,6,7,8-HpCDD	2.4E-04	4.9E-04	6.8E-05	1.4E-04	2.3E-06	4.7E-06
OCDD	3.7E-03	7.3E-03	7.9E-04	1.6E-03	2.6E-05	5.2E-05
2,3,7,8-TCDF	3.6E-07	7.8E-07	6.8E-08	1.4E-07	2.3E-09	4.8E-09
1,2,3,7,8-PeCDF	1.5E-07	3.9E-07	1.5E-07	3.9E-07	4.9E-09	1.3E-08
2,3,4,7,8-PeCDF	4.2E-07	9.0E-07	1.9E-07	4.0E-07	6.2E-09	1.3E-08
1,2,3,4,7,8-HxCDF	8.8E-07	1.7E-06	7.1E-08	1.4E-07	2.4E-09	4.7E-09
1,2,3,6,7,8-HxCDF	7.2E-07	1.6E-06	4.7E-07	1.1E-06	1.6E-08	3.5E-08
1,2,3,4,6,7,8-HpCDF	2.8E-05	5.0E-05	1.2E-05	2.2E-05	4.0E-07	7.2E-07
1,2,3,4,7,8,9-HpCDF	2.4E-06	4.2E-06	2.4E-06	4.2E-06	7.9E-08	1.4E-07
OCDF	7.5E-05	1.5E-04	7.0E-05	1.4E-04	2.3E-06	4.7E-06
PCBs						
Aroclor-1016	NC	NC	NC	NC	-	-
Aroclor-1221	NC	NC	NC	NC	-	-
Aroclor-1232	NC	NC	NC	NC	-	-
Aroclor-1242	NC	NC	NC	NC	-	-
Aroclor-1248	NC	NC	NC	NC	-	-
Aroclor-1254	1.6E-01	4.3E-01	1.6E-01	4.3E-01	5.4E-03	1.4E-02
Aroclor-1260	1.4E+00	7.7E+00	1.4E+00	7.7E+00	4.6E-02	2.5E-01
PCB-105	1.2E-04	6.3E-04	3.2E-04	1.7E-03	1.1E-05	5.6E-05
PCB-114	2.3E-06	1.1E-05	1.5E-05	7.3E-05	5.0E-07	2.4E-06
PCB-118	2.4E-04	1.3E-03	6.7E-04	3.5E-03	2.2E-05	1.2E-04
PCB-123	3.4E-06	1.8E-05	1.1E-05	6.0E-05	3.8E-07	2.0E-06
PCB-126	9.2E-06	4.9E-05	1.7E-05	9.0E-05	5.6E-07	3.0E-06
PCB-156	7.9E-05	4.2E-04	3.1E-04	1.6E-03	1.0E-05	5.5E-05
PCB-157	3.5E-05	1.9E-04	9.2E-04	5.0E-03	3.1E-05	1.7E-04
PCB-167	6.0E-05	3.3E-04	2.9E-04	1.6E-03	9.8E-06	5.3E-05
PCB-169	9.0E-07	4.9E-06	9.0E-07	4.9E-06	3.0E-08	1.6E-07

Spreadsheet C3-121b (3 of 3)

Applied Daily Dose for the Bobcat - Wet Pond Scenario
Ingestion Exposure Route
Sodium Reactor Experiment (SRE) Area

Chemical	Soil Exposure Point Concentration [a]		EPV in Deer Mouse[b]		Applied Daily Dose	
	CTE	RME	CTE	RME	CTE	RME
	(mg/kg)		(mg/kg)		(mg/kg-day)	
PCB-189	9.0E-06	4.9E-05	6.3E-05	3.4E-04	2.1E-06	1.1E-05
PCB-77	1.8E-05	9.7E-05	1.4E-05	7.5E-05	4.7E-07	2.5E-06
PCB-81	3.3E-06	1.7E-05	3.3E-06	1.7E-05	1.1E-07	5.7E-07

Notes:

a. Exposure point concentration (EPC) for soil 0 to 2 feet bgs, from Spreadsheet D-90.

b. Deer mouse exposure point values were estimated by application of site-specific bioaccumulation factors (BAFs) to soil exposure point concentration when available, or by application of a BAF of 1 when site-specific BAFs were not available.

CTE - central tendancy exposure

RME - reasonable maximum exposure

NC - not selected as a CPEC in the indicated media, per the SRAM (MWH 2005).

EPV - exposure point value

CPEC - chemical of potential ecological concern

VOC - volatile organic compund

SVOC - semi-volatile organic compound

PCB - polychlorinated biphenyls

PCDD/PCDF - polychlorinated dibenzo-p-dioxins and dibenzofurans

"-" not applicable

mg/kg - milligram per kilogram

mg/kg-day - milligram per kilogram per day

Spreadsheet C3-121a (1 of 2)

Applied Daily Dose for the Bobcat - Dry Pond Scenario
Ingestion Exposure Route
Sodium Reactor Experiment (SRE) Area

Chemical	Soil Exposure Point Concentration [a]		EPV in Deer Mouse[b]		Applied Daily Dose	
	CTE	RME	CTE	RME	CTE	RME
	(mg/kg)		(mg/kg)		(mg/kg-day)	
Inorganic Compounds						
Cadmium	4.2E-01	1.7E+00	4.2E-01	1.7E+00	1.4E-02	5.6E-02
Copper	1.9E+01	3.5E+01	1.4E+01	2.6E+01	4.7E-01	8.8E-01
Lead	1.4E+01	2.6E+01	1.4E+01	2.6E+01	4.5E-01	8.5E-01
Mercury	1.5E+00	4.8E+00	1.5E+00	4.8E+00	5.1E-02	1.6E-01
Methyl Mercury	1.7E-03	3.6E-03	1.7E-03	3.6E-03	5.8E-05	1.2E-04
Silver	1.0E+00	4.1E+00	1.0E+00	4.1E+00	3.4E-02	1.4E-01
Thallium	9.4E-01	2.1E+00	9.4E-01	2.1E+00	3.1E-02	7.0E-02
Zinc	1.3E+02	3.1E+02	4.6E+02	1.1E+03	1.5E+01	3.5E+01
VOCs						
1,1,1-Trichloroethane	4.7E-02	2.7E-01	4.7E-02	2.7E-01	1.6E-03	8.9E-03
1,1,2-Trichloro-1,2,2-trifluoroethane	1.2E-02	1.2E-02	1.2E-02	1.2E-02	4.0E-04	4.0E-04
1,1-Dichloroethane	2.3E-02	8.3E-02	2.3E-02	8.3E-02	7.5E-04	2.7E-03
1,2-Dichloroethene (total)	2.9E-02	5.6E-02	2.9E-02	5.6E-02	9.5E-04	1.9E-03
2-Butanone	3.7E-02	3.7E-02	3.7E-02	3.7E-02	1.2E-03	1.2E-03
Acetone	5.2E-01	2.6E+00	5.2E-01	2.6E+00	1.7E-02	8.6E-02
Ethylbenzene	NC	NC	NC	NC	-	-
m,p-Xylene	6.0E-04	6.0E-04	6.0E-04	6.0E-04	2.0E-05	2.0E-05
Methylene chloride	4.1E-01	2.6E+00	4.1E-01	2.6E+00	1.4E-02	8.7E-02
Tetrachloroethene	4.1E-02	2.0E-01	4.1E-02	2.0E-01	1.4E-03	6.8E-03
Toluene	3.2E-01	2.2E+00	3.2E-01	2.2E+00	1.0E-02	7.3E-02
Trichloroethene	1.0E-01	6.2E-01	1.0E-01	6.2E-01	3.4E-03	2.0E-02
Xylenes (total)	7.5E-02	4.2E-01	7.5E-02	4.2E-01	2.5E-03	1.4E-02
SVOCs						
Acenaphthene	7.8E-02	1.9E-01	7.8E-02	1.9E-01	2.6E-03	6.4E-03
Acenaphthylene	3.8E-02	8.5E-02	3.8E-02	8.5E-02	1.3E-03	2.8E-03
Anthracene	1.6E-01	6.5E-01	1.6E-01	6.5E-01	5.2E-03	2.2E-02
Benzo(a)anthracene	5.5E-01	4.6E+00	8.9E+00	7.5E+01	2.9E-01	2.5E+00
Benzo(a)pyrene	5.9E-01	5.0E+00	3.5E+00	3.0E+01	1.2E-01	9.8E-01
Benzo(b)fluoranthene	5.4E-01	4.4E+00	2.8E+00	2.3E+01	9.4E-02	7.6E-01
Benzo(e)pyrene	2.2E-02	6.1E-02	2.2E-02	6.1E-02	7.2E-04	2.0E-03
Benzo(g,h,i)perylene	2.1E-01	1.5E+00	9.3E-01	7.0E+00	3.1E-02	2.3E-01
Benzo(k)fluoranthene	5.8E-01	4.9E+00	4.5E+00	3.9E+01	1.5E-01	1.3E+00
Chrysene	4.2E-01	4.1E+00	2.7E+00	2.6E+01	8.9E-02	8.7E-01
Dibenz(a,h)anthracene	1.1E-01	7.3E-01	1.8E+00	1.2E+01	5.9E-02	4.0E-01
Dibenzofuran	9.8E-02	1.2E-01	9.8E-02	1.2E-01	3.3E-03	4.0E-03
Fluoranthene	9.7E-01	8.3E+00	2.3E+00	1.9E+01	7.6E-02	6.4E-01
Fluorene	7.9E-02	2.0E-01	7.9E-02	2.0E-01	2.6E-03	6.5E-03
Indeno(1,2,3-cd)pyrene	2.7E-01	2.1E+00	2.0E+00	1.5E+01	6.5E-02	5.1E-01
Naphthalene	NC	NC	NC	NC	-	-
Perylene	1.2E-02	3.5E-02	1.2E-02	3.5E-02	4.1E-04	1.2E-03
Phenanthrene	4.8E-01	1.9E+00	1.6E+00	6.3E+00	5.4E-02	2.1E-01
Pyrene	8.1E-01	6.9E+00	2.9E+00	2.5E+01	9.8E-02	8.3E-01
Total Petroleum Hydrocarbons						
C11-C14(Kerosene Range)	8.9E+00	4.0E+01	8.9E+00	4.0E+01	2.9E-01	1.3E+00
C14-C20(Diesel Range)	8.3E+00	1.4E+01	8.3E+00	1.4E+01	2.8E-01	4.8E-01
C20-C30(Lubricant Oil Range)	8.8E+01	4.7E+02	8.8E+01	4.7E+02	2.9E+00	1.6E+01

Spreadsheet C3-121a (2 of 2)

Applied Daily Dose for the Bobcat - Dry Pond Scenario
Ingestion Exposure Route
Sodium Reactor Experiment (SRE) Area

Chemical	Soil Exposure Point Concentration [a]		EPV in Deer Mouse[b]		Applied Daily Dose	
	CTE	RME	CTE	RME	CTE	RME
	(mg/kg)		(mg/kg)		(mg/kg-day)	
PCDD/PCDFs						
2,3,7,8-TCDD	2.3E-07	4.4E-07	2.3E-07	4.4E-07	7.5E-09	1.5E-08
1,2,3,7,8-PeCDD	8.9E-07	1.8E-06	8.9E-07	1.8E-06	3.0E-08	5.9E-08
1,2,3,4,7,8-HxCDD	3.3E-06	7.2E-06	7.9E-07	1.7E-06	2.6E-08	5.6E-08
1,2,3,6,7,8-HxCDD	1.3E-05	2.4E-05	2.7E-06	5.3E-06	9.0E-08	1.7E-07
1,2,3,7,8,9-HxCDD	4.7E-06	9.4E-06	8.5E-07	1.7E-06	2.8E-08	5.6E-08
1,2,3,4,6,7,8-HpCDD	4.5E-04	9.5E-04	1.3E-04	2.7E-04	4.3E-06	9.1E-06
OCDD	6.7E-03	1.4E-02	1.4E-03	2.9E-03	4.7E-05	9.7E-05
2,3,7,8-TCDF	4.5E-07	7.9E-07	8.4E-08	1.5E-07	2.8E-09	4.9E-09
1,2,3,7,8-PeCDF	2.3E-07	4.6E-07	2.3E-07	4.6E-07	7.8E-09	1.5E-08
2,3,4,7,8-PeCDF	6.6E-07	1.3E-06	2.9E-07	5.7E-07	9.7E-09	1.9E-08
1,2,3,4,7,8-HxCDF	1.4E-06	2.8E-06	1.2E-07	2.2E-07	3.9E-09	7.5E-09
1,2,3,6,7,8-HxCDF	1.2E-06	2.5E-06	8.2E-07	1.7E-06	2.7E-08	5.5E-08
2,3,4,6,7,8-HxCDF	3.1E-06	6.9E-06	1.7E-06	3.7E-06	5.5E-08	1.2E-07
1,2,3,7,8,9-HxCDF	3.0E-07	9.7E-07	3.0E-07	9.7E-07	1.0E-08	3.2E-08
1,2,3,4,6,7,8-HpCDF	4.2E-05	8.0E-05	1.8E-05	3.5E-05	6.0E-07	1.1E-06
1,2,3,4,7,8,9-HpCDF	3.9E-06	7.6E-06	3.9E-06	7.6E-06	1.3E-07	2.5E-07
OCDF	1.1E-04	2.0E-04	1.0E-04	1.9E-04	3.4E-06	6.2E-06
PCBs						
Aroclor-1254	1.6E-01	4.3E-01	1.6E-01	4.3E-01	5.1E-03	1.4E-02
Aroclor-1260	1.3E+00	7.0E+00	1.3E+00	7.0E+00	4.2E-02	2.3E-01
PCB-105	1.1E-04	5.6E-04	2.9E-04	1.5E-03	9.8E-06	5.1E-05
PCB-114	2.1E-06	1.0E-05	1.4E-05	6.6E-05	4.6E-07	2.2E-06
PCB-118	2.2E-04	1.1E-03	6.1E-04	3.2E-03	2.0E-05	1.0E-04
PCB-123	3.1E-06	1.6E-05	1.0E-05	5.4E-05	3.4E-07	1.8E-06
PCB-126	8.4E-06	4.4E-05	1.5E-05	8.1E-05	5.1E-07	2.7E-06
PCB-156	7.2E-05	3.8E-04	2.8E-04	1.5E-03	9.4E-06	4.9E-05
PCB-157	3.2E-05	1.7E-04	8.4E-04	4.5E-03	2.8E-05	1.5E-04
PCB-167	5.5E-05	2.9E-04	2.7E-04	1.4E-03	8.9E-06	4.8E-05
PCB-169	8.2E-07	4.4E-06	8.2E-07	4.4E-06	2.7E-08	1.5E-07
PCB-189	8.2E-06	4.4E-05	5.8E-05	3.1E-04	1.9E-06	1.0E-05
PCB-77	1.7E-05	8.8E-05	1.3E-05	6.7E-05	4.3E-07	2.2E-06
PCB-81	3.0E-06	1.6E-05	3.0E-06	1.6E-05	9.9E-08	5.1E-07

Notes:

a. Exposure point concentration (EPC) for soil 0 to 2 feet bgs, from Spreadsheet D-90.

b. Deer mouse exposure point values were estimated by application of site-specific bioaccumulation factors (BAFs) to soil exposure point concentration when available, or by application of a BAF of 1 when site-specific BAFs were not available.

CTE - central tendancy exposure

RME - reasonable maximum exposure

NC - not selected as a CPEC in the indicated media, per the SRAM (MWH 2005).

EPV - exposure point value

CPEC - chemical of potential ecological concern

VOC - volatile organic compund

SVOC - semi-volatile organic compound

PCB - polychlorinated biphenyls

PCDD/PCDF - polychlorinated dibenzo-p-dioxins and dibenzofurans

"-" not applicable

mg/kg - milligram per kilogram

mg/kg-day - milligram per kilogram per day

Applied Daily Dose for the Hawk - Wet Pond Scenario
Ingestion Exposure Route
Sodium Reactor Experiment (SRE) Area

Chemical	Soil Exposure Point Concentration [a]		EPV in Deer Mouse[b]		Applied Daily Dose	
	CTE	RME	CTE	RME	CTE	RME
	(mg/kg)		(mg/kg)		(mg/kg-day)	
Inorganic Compounds						
Aluminum	NC	NC	NC	NC	-	-
Antimony	NC	NC	NC	NC	-	-
Arsenic	NC	NC	NC	NC	-	-
Beryllium	NC	NC	NC	NC	-	-
Cadmium	2.2E-01	3.6E-01	2.2E-01	3.6E-01	1.7E-02	2.8E-02
Chromium	NC	NC	NC	NC	-	-
Copper	1.1E+01	2.0E+01	8.3E+00	1.5E+01	6.4E-01	1.2E+00
Lead	9.9E+00	1.3E+01	9.9E+00	1.3E+01	7.7E-01	9.9E-01
Mercury	1.9E+00	4.1E+00	1.9E+00	4.1E+00	1.4E-01	3.1E-01
Methyl Mercury	1.7E-03	3.6E-03	1.7E-03	3.6E-03	1.3E-04	2.8E-04
Nickel	NC	NC	NC	NC	-	-
Selenium	NC	NC	NC	NC	-	-
Silver	1.5E+00	3.5E+00	1.5E+00	3.5E+00	1.2E-01	2.7E-01
Thallium	8.4E-01	2.1E+00	8.4E-01	2.1E+00	6.5E-02	1.6E-01
Vanadium	NC	NC	NC	NC	-	-
Zinc	7.5E+01	1.5E+02	2.6E+02	5.3E+02	2.0E+01	4.1E+01
VOCs						
1,1,1-Trichloroethane	NC	NC	NC	NC	-	-
1,1,2-Trichloro-1,2,2-trifluoroethane	1.2E-02	1.2E-02	1.2E-02	1.2E-02	9.3E-04	9.3E-04
1,1-Dichloroethane	NC	NC	NC	NC	-	-
2-Butanone	1.8E-02	2.7E-02	1.8E-02	2.7E-02	1.4E-03	2.1E-03
Acetone	6.9E-01	2.3E+00	6.9E-01	2.3E+00	5.4E-02	1.8E-01
Bromomethane	NC	NC	NC	NC	-	-
Ethylbenzene	NC	NC	NC	NC	-	-
m,p-Xylene	NC	NC	NC	NC	-	-
Methylene chloride	1.0E-02	1.2E-02	1.0E-02	1.2E-02	8.0E-04	9.4E-04
Tetrachloroethene	NC	NC	NC	NC	-	-
Toluene	NC	NC	NC	NC	-	-
trans-1,3-Dichloropropene	NC	NC	NC	NC	-	-
Trichloroethene	NC	NC	NC	NC	-	-
Xylenes (total)	NC	NC	NC	NC	-	-
SVOCs						
Acenaphthene	8.8E-02	3.3E-01	8.8E-02	3.3E-01	6.8E-03	2.5E-02
Acenaphthylene	6.1E-03	1.7E-02	6.1E-03	1.7E-02	4.7E-04	1.3E-03
Anthracene	2.5E-01	1.3E+00	2.5E-01	1.3E+00	1.9E-02	9.8E-02
Benzo(a)anthracene	1.1E+00	1.4E+01	1.7E+01	2.3E+02	1.3E+00	1.7E+01
Benzo(a)pyrene	1.1E+00	1.5E+01	6.7E+00	8.9E+01	5.2E-01	6.9E+00
Benzo(b)fluoranthene	1.0E+00	1.3E+01	5.3E+00	6.8E+01	4.1E-01	5.3E+00
Benzo(e)pyrene	2.4E-02	6.8E-02	2.4E-02	6.8E-02	1.9E-03	5.3E-03
Benzo(g,h,i)perylene	3.4E-01	3.1E+00	1.6E+00	1.4E+01	1.2E-01	1.1E+00
Benzo(k)fluoranthene	1.1E+00	1.5E+01	8.8E+00	1.2E+02	6.8E-01	9.1E+00
bis(2-Ethylhexyl)phthalate	NC	NC	NC	NC	-	-
Butyl benzyl phthalate	NC	NC	NC	NC	-	-
Chrysene	7.7E-01	8.4E+00	4.9E+00	5.3E+01	3.8E-01	4.1E+00
Dibenz(a,h)anthracene	1.5E-01	1.4E+00	2.5E+00	2.4E+01	1.9E-01	1.8E+00
Dibenzofuran	2.8E-01	2.8E-01	2.8E-01	2.8E-01	2.2E-02	2.2E-02
Diethylphthalate	NC	NC	NC	NC	-	-
Di-n-butylphthalate	NC	NC	NC	NC	-	-
Di-n-octyl phthalate	NC	NC	NC	NC	-	-
Fluoranthene	1.9E+00	2.5E+01	4.4E+00	5.9E+01	3.4E-01	4.5E+00

Spreadsheet C3-120b (2 of 3)

Applied Daily Dose for the Hawk - Wet Pond Scenario
Ingestion Exposure Route
Sodium Reactor Experiment (SRE) Area

Chemical	Soil Exposure Point Concentration [a]		EPV in Deer Mouse[b]		Applied Daily Dose	
	CTE	RME	CTE	RME	CTE	RME
	(mg/kg)		(mg/kg)		(mg/kg-day)	
Fluorene	8.9E-02	3.3E-01	8.9E-02	3.3E-01	6.9E-03	2.6E-02
Hexachlorobutadiene	NC	NC	NC	NC	-	-
Hexachlorocyclopentadiene	NC	NC	NC	NC	-	-
Indeno(1,2,3-cd)pyrene	4.8E-01	6.4E+00	3.5E+00	4.6E+01	2.7E-01	3.6E+00
Naphthalene	NC	NC	NC	NC	-	-
Pentachlorophenol	NC	NC	NC	NC	-	-
Perylene	1.4E-02	3.9E-02	1.4E-02	3.9E-02	1.1E-03	3.0E-03
Phenanthrene	9.0E-01	7.5E+00	3.0E+00	2.5E+01	2.3E-01	1.9E+00
Pyrene	1.6E+00	1.4E+01	5.7E+00	5.1E+01	4.4E-01	3.9E+00
PCDD/PCDFs						
2,3,7,8-TCDD	1.5E-07	3.5E-07	1.5E-07	3.5E-07	1.2E-08	2.7E-08
1,2,3,7,8-PeCDD	5.6E-07	1.3E-06	5.6E-07	1.3E-06	4.3E-08	1.0E-07
1,2,3,4,7,8-HxCDD	1.6E-06	3.7E-06	3.9E-07	8.9E-07	3.0E-08	6.8E-08
1,2,3,6,7,8-HxCDD	8.3E-06	1.9E-05	1.8E-06	4.0E-06	1.4E-07	3.1E-07
1,2,3,7,8,9-HxCDD	3.4E-06	8.7E-06	6.1E-07	1.6E-06	4.7E-08	1.2E-07
1,2,3,4,6,7,8-HpCDD	2.4E-04	4.9E-04	6.8E-05	1.4E-04	5.2E-06	1.1E-05
OCDD	3.7E-03	7.3E-03	7.9E-04	1.6E-03	6.1E-05	1.2E-04
2,3,7,8-TCDF	3.6E-07	7.8E-07	6.8E-08	1.4E-07	5.3E-09	1.1E-08
1,2,3,7,8-PeCDF	1.5E-07	3.9E-07	1.5E-07	3.9E-07	1.1E-08	3.0E-08
2,3,4,7,8-PeCDF	4.2E-07	9.0E-07	1.9E-07	4.0E-07	1.4E-08	3.1E-08
1,2,3,4,7,8-HxCDF	8.8E-07	1.7E-06	7.1E-08	1.4E-07	5.5E-09	1.1E-08
1,2,3,6,7,8-HxCDF	7.2E-07	1.6E-06	4.7E-07	1.1E-06	3.6E-08	8.2E-08
1,2,3,4,6,7,8-HpCDF	2.8E-05	5.0E-05	1.2E-05	2.2E-05	9.2E-07	1.7E-06
1,2,3,4,7,8,9-HpCDF	2.4E-06	4.2E-06	2.4E-06	4.2E-06	1.8E-07	3.3E-07
OCDF	7.5E-05	1.5E-04	7.0E-05	1.4E-04	5.4E-06	1.1E-05
PCBs						
Aroclor-1016	NC	NC	NC	NC	-	-
Aroclor-1221	NC	NC	NC	NC	-	-
Aroclor-1232	NC	NC	NC	NC	-	-
Aroclor-1242	NC	NC	NC	NC	-	-
Aroclor-1248	NC	NC	NC	NC	-	-
Aroclor-1254	1.6E-01	4.3E-01	1.6E-01	4.3E-01	1.3E-02	3.3E-02
Aroclor-1260	1.4E+00	7.7E+00	1.4E+00	7.7E+00	1.1E-01	5.9E-01
PCB-105	1.2E-04	6.3E-04	3.2E-04	1.7E-03	2.5E-05	1.3E-04
PCB-114	2.3E-06	1.1E-05	1.5E-05	7.3E-05	1.2E-06	5.7E-06
PCB-118	2.4E-04	1.3E-03	6.7E-04	3.5E-03	5.2E-05	2.7E-04
PCB-123	3.4E-06	1.8E-05	1.1E-05	6.0E-05	8.8E-07	4.6E-06
PCB-126	9.2E-06	4.9E-05	1.7E-05	9.0E-05	1.3E-06	7.0E-06
PCB-156	7.9E-05	4.2E-04	3.1E-04	1.6E-03	2.4E-05	1.3E-04
PCB-157	3.5E-05	1.9E-04	9.2E-04	5.0E-03	7.1E-05	3.9E-04
PCB-167	6.0E-05	3.3E-04	2.9E-04	1.6E-03	2.3E-05	1.2E-04
PCB-169	9.0E-07	4.9E-06	9.0E-07	4.9E-06	7.0E-08	3.8E-07
PCB-189	9.0E-06	4.9E-05	6.3E-05	3.4E-04	4.9E-06	2.6E-05
PCB-77	1.8E-05	9.7E-05	1.4E-05	7.5E-05	1.1E-06	5.8E-06
PCB-81	3.3E-06	1.7E-05	3.3E-06	1.7E-05	2.5E-07	1.3E-06

Notes:

a. Exposure point concentration (EPC) for soil 0 to 2 feet bgs, from Spreadsheet D-90.

b. Deer mouse exposure point values were estimated by application of site-specific bioaccumulation factors (BAFs) to soil exposure point concentration when available, or by application of a BAF of 1 when site-specific BAFs were not available.

CTE - central tendancy exposure

RME - reasonable maximum exposure

NC - not selected as a CPEC in the indicated media, per the SRAM (MWH 2005).

Spreadsheet C3-120b (3 of 3)

Applied Daily Dose for the Hawk - Wet Pond Scenario
Ingestion Exposure Route
Sodium Reactor Experiment (SRE) Area

Chemical	Soil Exposure Point Concentration [a]		EPV in Deer Mouse[b]		Applied Daily Dose	
	CTE	RME	CTE	RME	CTE	RME
	(mg/kg)		(mg/kg)		(mg/kg-day)	

EPV - exposure point value
VOC - volatile organic compund
SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyls
PCDD/PCDF - polychlorinated dibenzo-p-dioxins and dibenzofurans
"-" not applicable
mg/kg - milligram per kilogram
mg/kg-day - milligram per kilogram per day

Applied Daily Dose for the Hawk - Dry Pond Scenario
Ingestion Exposure Route
Sodium Reactor Experiment (SRE) Area

Chemical	Soil Exposure Point Concentration [a]		EPV in Deer Mouse[b]		Applied Daily Dose	
	CTE	RME	CTE	RME	CTE	RME
	(mg/kg)		(mg/kg)		(mg/kg-day)	
Inorganic Compounds						
Cadmium	4.2E-01	1.7E+00	4.2E-01	1.7E+00	3.2E-02	1.3E-01
Copper	1.9E+01	3.5E+01	1.4E+01	2.6E+01	1.1E+00	2.0E+00
Lead	1.4E+01	2.6E+01	1.4E+01	2.6E+01	1.1E+00	2.0E+00
Mercury	1.5E+00	4.8E+00	1.5E+00	4.8E+00	1.2E-01	3.8E-01
Methyl Mercury	1.7E-03	3.6E-03	1.7E-03	3.6E-03	1.3E-04	2.8E-04
Silver	1.0E+00	4.1E+00	1.0E+00	4.1E+00	7.8E-02	3.2E-01
Thallium	9.4E-01	2.1E+00	9.4E-01	2.1E+00	7.3E-02	1.6E-01
Zinc	1.3E+02	3.1E+02	4.6E+02	1.1E+03	3.5E+01	8.3E+01
VOCs						
1,1,1-Trichloroethane	4.7E-02	2.7E-01	4.7E-02	2.7E-01	3.6E-03	2.1E-02
1,1,2-Trichloro-1,2,2-trifluoroethane	1.2E-02	1.2E-02	1.2E-02	1.2E-02	9.3E-04	9.3E-04
1,1-Dichloroethane	2.3E-02	8.3E-02	2.3E-02	8.3E-02	1.8E-03	6.4E-03
1,2-Dichloroethene (total)	2.9E-02	5.6E-02	2.9E-02	5.6E-02	2.2E-03	4.3E-03
2-Butanone	3.7E-02	3.7E-02	3.7E-02	3.7E-02	2.9E-03	2.9E-03
Acetone	5.2E-01	2.6E+00	5.2E-01	2.6E+00	4.1E-02	2.0E-01
Ethylbenzene	NC	NC	NC	NC	-	-
m,p-Xylene	6.0E-04	6.0E-04	6.0E-04	6.0E-04	4.6E-05	4.6E-05
Methylene chloride	4.1E-01	2.6E+00	4.1E-01	2.6E+00	3.2E-02	2.0E-01
Tetrachloroethene	4.1E-02	2.0E-01	4.1E-02	2.0E-01	3.2E-03	1.6E-02
Toluene	3.2E-01	2.2E+00	3.2E-01	2.2E+00	2.4E-02	1.7E-01
Trichloroethene	1.0E-01	6.2E-01	1.0E-01	6.2E-01	7.8E-03	4.8E-02
Xylenes (total)	7.5E-02	4.2E-01	7.5E-02	4.2E-01	5.8E-03	3.2E-02
SVOCs						
Acenaphthene	7.8E-02	1.9E-01	7.8E-02	1.9E-01	6.1E-03	1.5E-02
Acenaphthylene	3.8E-02	8.5E-02	3.8E-02	8.5E-02	2.9E-03	6.6E-03
Anthracene	1.6E-01	6.5E-01	1.6E-01	6.5E-01	1.2E-02	5.0E-02
Benzo(a)anthracene	5.5E-01	4.6E+00	8.9E+00	7.5E+01	6.9E-01	5.8E+00
Benzo(a)pyrene	5.9E-01	5.0E+00	3.5E+00	3.0E+01	2.7E-01	2.3E+00
Benzo(b)fluoranthene	5.4E-01	4.4E+00	2.8E+00	2.3E+01	2.2E-01	1.8E+00
Benzo(e)pyrene	2.2E-02	6.1E-02	2.2E-02	6.1E-02	1.7E-03	4.7E-03
Benzo(g,h,i)perylene	2.1E-01	1.5E+00	9.3E-01	7.0E+00	7.2E-02	5.4E-01
Benzo(k)fluoranthene	5.8E-01	4.9E+00	4.5E+00	3.9E+01	3.5E-01	3.0E+00
Chrysene	4.2E-01	4.1E+00	2.7E+00	2.6E+01	2.1E-01	2.0E+00
Dibenz(a,h)anthracene	1.1E-01	7.3E-01	1.8E+00	1.2E+01	1.4E-01	9.3E-01
Dibenzofuran	9.8E-02	1.2E-01	9.8E-02	1.2E-01	7.6E-03	9.3E-03
Fluoranthene	9.7E-01	8.3E+00	2.3E+00	1.9E+01	1.8E-01	1.5E+00
Fluorene	7.9E-02	2.0E-01	7.9E-02	2.0E-01	6.1E-03	1.5E-02
Indeno(1,2,3-cd)pyrene	2.7E-01	2.1E+00	2.0E+00	1.5E+01	1.5E-01	1.2E+00
Naphthalene	NC	NC	NC	NC	-	-
Perylene	1.2E-02	3.5E-02	1.2E-02	3.5E-02	9.6E-04	2.7E-03
Phenanthrene	4.8E-01	1.9E+00	1.6E+00	6.3E+00	1.2E-01	4.9E-01
Pyrene	8.1E-01	6.9E+00	2.9E+00	2.5E+01	2.3E-01	1.9E+00
Total Petroleum Hydrocarbons						
C11-C14(Kerosene Range)	8.9E+00	4.0E+01	8.9E+00	4.0E+01	6.9E-01	3.1E+00
C14-C20(Diesel Range)	8.3E+00	1.4E+01	8.3E+00	1.4E+01	6.5E-01	1.1E+00
C20-C30(Lubricant Oil Range)	8.8E+01	4.7E+02	8.8E+01	4.7E+02	6.8E+00	3.6E+01

Spreadsheet C3-120a (2 of 2)

Applied Daily Dose for the Hawk - Dry Pond Scenario
Ingestion Exposure Route
Sodium Reactor Experiment (SRE) Area

Chemical	Soil Exposure Point Concentration [a]		EPV in Deer Mouse[b]		Applied Daily Dose	
	CTE	RME	CTE	RME	CTE	RME
	(mg/kg)		(mg/kg)		(mg/kg-day)	
PCDD/PCDFs						
2,3,7,8-TCDD	2.3E-07	4.4E-07	2.3E-07	4.4E-07	1.7E-08	3.4E-08
1,2,3,7,8-PeCDD	8.9E-07	1.8E-06	8.9E-07	1.8E-06	6.9E-08	1.4E-07
1,2,3,4,7,8-HxCDD	3.3E-06	7.2E-06	7.9E-07	1.7E-06	6.1E-08	1.3E-07
1,2,3,6,7,8-HxCDD	1.3E-05	2.4E-05	2.7E-06	5.3E-06	2.1E-07	4.1E-07
1,2,3,7,8,9-HxCDD	4.7E-06	9.4E-06	8.5E-07	1.7E-06	6.6E-08	1.3E-07
1,2,3,4,6,7,8-HpCDD	4.5E-04	9.5E-04	1.3E-04	2.7E-04	1.0E-05	2.1E-05
OCDD	6.7E-03	1.4E-02	1.4E-03	2.9E-03	1.1E-04	2.3E-04
2,3,7,8-TCDF	4.5E-07	7.9E-07	8.4E-08	1.5E-07	6.5E-09	1.1E-08
1,2,3,7,8-PeCDF	2.3E-07	4.6E-07	2.3E-07	4.6E-07	1.8E-08	3.6E-08
2,3,4,7,8-PeCDF	6.6E-07	1.3E-06	2.9E-07	5.7E-07	2.3E-08	4.4E-08
1,2,3,4,7,8-HxCDF	1.4E-06	2.8E-06	1.2E-07	2.2E-07	9.0E-09	1.7E-08
1,2,3,6,7,8-HxCDF	1.2E-06	2.5E-06	8.2E-07	1.7E-06	6.3E-08	1.3E-07
2,3,4,6,7,8-HxCDF	3.1E-06	6.9E-06	1.7E-06	3.7E-06	1.3E-07	2.9E-07
1,2,3,7,8,9-HxCDF	3.0E-07	9.7E-07	3.0E-07	9.7E-07	2.4E-08	7.5E-08
1,2,3,4,6,7,8-HpCDF	4.2E-05	8.0E-05	1.8E-05	3.5E-05	1.4E-06	2.7E-06
1,2,3,4,7,8,9-HpCDF	3.9E-06	7.6E-06	3.9E-06	7.6E-06	3.0E-07	5.9E-07
OCDF	1.1E-04	2.0E-04	1.0E-04	1.9E-04	7.8E-06	1.5E-05
PCBs						
Aroclor-1254	1.6E-01	4.3E-01	1.6E-01	4.3E-01	1.2E-02	3.3E-02
Aroclor-1260	1.3E+00	7.0E+00	1.3E+00	7.0E+00	9.9E-02	5.4E-01
PCB-105	1.1E-04	5.6E-04	2.9E-04	1.5E-03	2.3E-05	1.2E-04
PCB-114	2.1E-06	1.0E-05	1.4E-05	6.6E-05	1.1E-06	5.1E-06
PCB-118	2.2E-04	1.1E-03	6.1E-04	3.2E-03	4.8E-05	2.4E-04
PCB-123	3.1E-06	1.6E-05	1.0E-05	5.4E-05	8.0E-07	4.2E-06
PCB-126	8.4E-06	4.4E-05	1.5E-05	8.1E-05	1.2E-06	6.3E-06
PCB-156	7.2E-05	3.8E-04	2.8E-04	1.5E-03	2.2E-05	1.1E-04
PCB-157	3.2E-05	1.7E-04	8.4E-04	4.5E-03	6.5E-05	3.5E-04
PCB-167	5.5E-05	2.9E-04	2.7E-04	1.4E-03	2.1E-05	1.1E-04
PCB-169	8.2E-07	4.4E-06	8.2E-07	4.4E-06	6.3E-08	3.4E-07
PCB-189	8.2E-06	4.4E-05	5.8E-05	3.1E-04	4.5E-06	2.4E-05
PCB-77	1.7E-05	8.8E-05	1.3E-05	6.7E-05	1.0E-06	5.2E-06
PCB-81	3.0E-06	1.6E-05	3.0E-06	1.6E-05	2.3E-07	1.2E-06

Notes:

a. Exposure point concentration (EPC) for soil 0 to 2 feet bgs, from Spreadsheet D-90.

b. Deer mouse exposure point values were estimated by application of site-specific bioaccumulation factors (BAFs) to soil exposure point concentration when available, or by application of a BAF of 1 when site-specific BAFs were not available.

CTE - central tendancy exposure
RME - reasonable maximum exposure
EPV - exposure point value
VOC - volatile organic compund
SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyls
PCDD/PCDF - polychlorinated dibenzo-p-dioxins and dibenzofurans
"-" not applicable
mg/kg - milligram per kilogram
mg/kg-day - milligram per kilogram per day

Applied Daily Dose for the Thrush - Wet Pond Scenario
Ingestion Exposure Route
Sodium Reactor Experiment (SRE) Area

Chemical	Soil Exposure Point Concentration [a]		EPV in Earthworms[b]		EPV in Terrestrial Plants[b]		Applied Daily Dose	
	CTE	RME	CTE	RME	CTE	RME	CTE	RME
	(mg/kg)		(mg/kg)		(mg/kg)		(mg/kg-day)	
Inorganic Compounds								
Aluminum	NC	NC	NC	NC	NC	NC	-	-
Antimony	NC	NC	NC	NC	NC	NC	-	-
Arsenic	NC	NC	NC	NC	NC	NC	-	-
Beryllium	NC	NC	NC	NC	NC	NC	-	-
Cadmium	2.4E-01	4.2E-01	4.7E+00	8.2E+00	2.6E+00	4.5E+00	8.4E-01	1.5E+00
Chromium	NC	NC	NC	NC	NC	NC	-	-
Copper	9.9E+00	2.0E+01	1.5E+02	2.9E+02	1.9E+01	3.7E+01	2.1E+01	4.2E+01
Lead	9.3E+00	1.3E+01	2.3E+00	3.1E+00	2.0E+01	2.7E+01	2.1E+00	2.8E+00
Mercury	2.1E+00	5.5E+00	7.0E+00	1.8E+01	1.7E+00	4.5E+00	1.1E+00	2.8E+00
Methyl Mercury	1.7E-03	3.6E-03	1.7E-03	3.6E-03	1.7E-03	3.6E-03	3.9E-04	8.2E-04
Nickel	NC	NC	NC	NC	NC	NC	-	-
Selenium	NC	NC	NC	NC	NC	NC	-	-
Silver	1.0E+00	2.7E+00	6.7E+00	1.8E+01	1.7E+00	4.6E+00	1.0E+00	2.8E+00
Thallium	3.3E-01	3.3E-01	3.6E-01	3.6E-01	1.7E-01	1.7E-01	6.5E-02	6.5E-02
Vanadium	NC	NC	NC	NC	NC	NC	-	-
Zinc	8.4E+01	1.9E+02	2.6E+02	5.9E+02	1.4E+02	3.1E+02	4.7E+01	1.1E+02
VOCs								
1,1,1-Trichloroethane	NC	NC	NC	NC	NC	NC	-	-
1,1,2-Trichloro-1,2,2-trifluoroethane	1.2E-02	1.2E-02	1.2E-02	1.2E-02	1.2E-02	1.2E-02	2.7E-03	2.7E-03
1,1-Dichloroethane	NC	NC	NC	NC	NC	NC	-	-
2-Butanone	2.1E-02	3.5E-02	2.1E-02	3.5E-02	2.1E-02	3.5E-02	4.8E-03	7.8E-03
Acetone	1.1E+00	5.2E+00	1.1E+00	5.2E+00	1.1E+00	5.2E+00	2.5E-01	1.2E+00
Bromomethane	NC	NC	NC	NC	NC	NC	-	-
Ethylbenzene	NC	NC	NC	NC	NC	NC	-	-
m,p-Xylene	NC	NC	NC	NC	NC	NC	-	-
Methylene chloride	1.0E-02	1.3E-02	1.0E-02	1.3E-02	1.0E-02	1.3E-02	2.3E-03	2.9E-03
Tetrachloroethene	NC	NC	NC	NC	NC	NC	-	-
Toluene	NC	NC	NC	NC	NC	NC	-	-
trans-1,3-Dichloropropene	NC	NC	NC	NC	NC	NC	-	-
Trichloroethene	NC	NC	NC	NC	NC	NC	-	-
Xylenes (total)	NC	NC	NC	NC	NC	NC	-	-
SVOCs								
Acenaphthene	2.6E-02	1.1E-01	6.3E-02	2.7E-01	2.6E-02	1.1E-01	1.1E-02	4.6E-02
Acenaphthylene	4.6E-03	1.6E-02	4.6E-03	1.6E-02	4.6E-03	1.6E-02	1.0E-03	3.5E-03
Anthracene	1.8E-02	7.3E-02	5.0E-02	2.0E-01	1.8E-02	7.3E-02	8.2E-03	3.4E-02
Benzo(a)anthracene	2.8E-03	8.8E-03	5.4E-03	1.7E-02	1.5E-02	4.6E-02	2.0E-03	6.2E-03
Benzo(a)pyrene	3.0E-03	8.9E-03	3.0E-03	8.9E-03	3.0E-03	8.9E-03	6.7E-04	2.0E-03
Benzo(b)fluoranthene	4.3E-03	1.1E-02	8.8E-03	2.3E-02	4.3E-03	1.1E-02	1.6E-03	4.0E-03
Benzo(e)pyrene	2.0E-02	6.7E-02	2.2E-02	7.3E-02	2.0E-02	6.7E-02	4.7E-03	1.6E-02
Benzo(g,h,i)perylene	1.2E-02	4.4E-02	6.3E-03	2.4E-02	1.2E-02	4.4E-02	2.0E-03	7.3E-03
Benzo(k)fluoranthene	2.8E-03	8.3E-03	2.5E-03	7.4E-03	2.8E-03	8.3E-03	5.9E-04	1.8E-03
bis(2-Ethylhexyl)phthalate	NC	NC	NC	NC	NC	NC	-	-
Butyl benzyl phthalate	NC	NC	NC	NC	NC	NC	-	-
Chrysene	5.1E-03	1.2E-02	9.5E-03	2.3E-02	1.4E-02	3.4E-02	2.5E-03	6.0E-03
Dibenz(a,h)anthracene	1.9E-03	6.9E-03	1.9E-03	6.9E-03	1.9E-03	6.9E-03	4.2E-04	1.5E-03
Dibenzofuran	NC	NC	NC	NC	NC	NC	-	-
Diethylphthalate	NC	NC	NC	NC	NC	NC	-	-
Di-n-butylphthalate	NC	NC	NC	NC	NC	NC	-	-
Di-n-octyl phthalate	NC	NC	NC	NC	NC	NC	-	-
Fluoranthene	5.6E-03	1.2E-02	5.1E-03	1.1E-02	1.6E-02	3.4E-02	2.1E-03	4.4E-03
Fluorene	2.6E-02	1.1E-01	1.0E-01	4.3E-01	2.6E-02	1.1E-01	1.6E-02	6.7E-02

Spreadsheet C3-119b (2 of 3)

Applied Daily Dose for the Thrush - Wet Pond Scenario
Ingestion Exposure Route
Sodium Reactor Experiment (SRE) Area

Chemical	Soil Exposure Point Concentration [a]		EPV in Earthworms[b]		EPV in Terrestrial Plants[b]		Applied Daily Dose	
	CTE	RME	CTE	RME	CTE	RME	CTE	RME
	(mg/kg)		(mg/kg)		(mg/kg)		(mg/kg-day)	
Hexachlorobutadiene	NC	NC	NC	NC	NC	NC	-	-
Hexachlorocyclopentadiene	NC	NC	NC	NC	NC	NC	-	-
Indeno(1,2,3-cd)pyrene	2.7E-03	8.5E-03	2.3E-03	7.3E-03	2.7E-03	8.5E-03	5.6E-04	1.7E-03
Naphthalene	NC	NC	NC	NC	NC	NC	-	-
Pentachlorophenol	NC	NC	NC	NC	NC	NC	-	-
Perylene	1.1E-02	3.8E-02	1.1E-02	3.8E-02	1.1E-02	3.8E-02	2.5E-03	8.6E-03
Phenanthrene	7.1E-02	3.0E-01	1.3E-01	5.5E-01	5.1E-01	2.1E+00	6.1E-02	2.6E-01
Pyrene	8.2E-03	2.8E-02	2.4E-02	8.2E-02	1.6E-02	5.4E-02	4.6E-03	1.6E-02
Pesticides								
4,4'-DDT	NC	NC	NC	NC	NC	NC	-	-
Chlordane	NC	NC	NC	NC	NC	NC	-	-
Dieldrin	NC	NC	NC	NC	NC	NC	-	-
Endosulfan I	NC	NC	NC	NC	NC	NC	-	-
Endosulfan II	NC	NC	NC	NC	NC	NC	-	-
Endrin	NC	NC	NC	NC	NC	NC	-	-
Heptachlor	NC	NC	NC	NC	NC	NC	-	-
Heptachlor epoxide	NC	NC	NC	NC	NC	NC	-	-
Toxaphene	NC	NC	NC	NC	NC	NC	-	-
PCDD/PCDFs								
2,3,7,8-TCDD	1.9E-07	4.0E-07	1.9E-07	4.0E-07	1.9E-07	4.0E-07	4.2E-08	9.0E-08
1,2,3,7,8-PeCDD	7.3E-07	1.5E-06	6.4E-07	1.3E-06	7.3E-07	1.5E-06	1.5E-07	3.1E-07
1,2,3,4,7,8-HxCDD	2.1E-06	4.2E-06	1.7E-06	3.3E-06	2.1E-06	4.2E-06	4.2E-07	8.2E-07
1,2,3,6,7,8-HxCDD	1.1E-05	2.0E-05	8.5E-06	1.5E-05	1.8E-06	3.3E-06	1.4E-06	2.5E-06
1,2,3,7,8,9-HxCDD	4.5E-06	1.0E-05	4.2E-06	9.3E-06	4.5E-06	1.0E-05	9.9E-07	2.2E-06
1,2,3,4,6,7,8-HpCDD	3.1E-04	5.0E-04	1.7E-04	2.7E-04	1.0E-04	1.6E-04	3.4E-05	5.4E-05
OCDD	5.0E-03	7.3E-03	2.3E-03	3.4E-03	1.2E-03	1.7E-03	4.5E-04	6.6E-04
2,3,7,8-TCDF	4.7E-07	7.9E-07	4.8E-07	8.0E-07	4.7E-07	7.9E-07	1.1E-07	1.8E-07
1,2,3,7,8-PeCDF	1.8E-07	3.9E-07	7.5E-08	1.7E-07	1.8E-07	3.9E-07	2.6E-08	5.8E-08
2,3,4,7,8-PeCDF	5.4E-07	9.9E-07	2.8E-07	5.1E-07	5.4E-07	9.9E-07	8.7E-08	1.6E-07
1,2,3,4,7,8-HxCDF	1.2E-06	1.8E-06	7.5E-07	1.2E-06	1.2E-06	1.8E-06	2.1E-07	3.2E-07
1,2,3,6,7,8-HxCDF	9.5E-07	1.8E-06	2.4E-07	4.7E-07	9.5E-07	1.8E-06	1.2E-07	2.3E-07
1,2,3,4,6,7,8-HpCDF	3.7E-05	5.0E-05	2.0E-05	2.7E-05	8.3E-06	1.1E-05	3.6E-06	5.0E-06
1,2,3,4,7,8,9-HpCDF	3.2E-06	4.2E-06	3.2E-06	4.2E-06	3.2E-06	4.2E-06	7.1E-07	9.6E-07
OCDF	1.0E-04	1.5E-04	5.0E-05	7.6E-05	3.3E-05	5.0E-05	1.0E-05	1.6E-05
PCBs								
Aroclor-1016	NC	NC	NC	NC	NC	NC	-	-
Aroclor-1221	NC	NC	NC	NC	NC	NC	-	-
Aroclor-1232	NC	NC	NC	NC	NC	NC	-	-
Aroclor-1242	NC	NC	NC	NC	NC	NC	-	-
Aroclor-1248	NC	NC	NC	NC	NC	NC	-	-
Aroclor-1254	1.7E-01	4.3E-01	1.7E-01	4.3E-01	1.7E-01	4.3E-01	3.9E-02	9.7E-02
Aroclor-1260	1.5E+00	7.8E+00	1.5E+00	7.8E+00	1.5E+00	7.8E+00	3.3E-01	1.8E+00
PCB-105	1.3E-04	6.4E-04	1.3E-03	6.6E-03	4.2E-04	2.1E-03	2.1E-04	1.1E-03
PCB-114	2.4E-06	1.1E-05	6.3E-05	3.0E-04	8.8E-06	4.2E-05	9.1E-06	4.4E-05
PCB-118	2.5E-04	1.3E-03	2.9E-03	1.5E-02	8.0E-04	4.0E-03	4.5E-04	2.3E-03
PCB-123	3.5E-06	1.8E-05	4.4E-05	2.3E-04	1.2E-05	6.2E-05	6.9E-06	3.5E-05
PCB-126	9.6E-06	5.0E-05	5.1E-05	2.6E-04	2.1E-05	1.1E-04	8.7E-06	4.5E-05
PCB-156	8.3E-05	4.3E-04	4.8E-04	2.5E-03	2.1E-04	1.1E-03	8.1E-05	4.2E-04
PCB-157	3.6E-05	1.9E-04	2.1E-04	1.1E-03	9.6E-05	5.0E-04	3.7E-05	1.9E-04
PCB-167	6.3E-05	3.3E-04	3.7E-04	2.0E-03	1.8E-04	9.2E-04	6.5E-05	3.4E-04
PCB-169	9.4E-07	5.0E-06	9.4E-07	5.0E-06	9.4E-07	5.0E-06	2.1E-07	1.1E-06

Spreadsheet C3-119b (3 of 3)

Applied Daily Dose for the Thrush - Wet Pond Scenario
Ingestion Exposure Route
Sodium Reactor Experiment (SRE) Area

Chemical	Soil Exposure Point Concentration [a]		EPV in Earthworms[b]		EPV in Terrestrial Plants[b]		Applied Daily Dose	
	CTE	RME	CTE	RME	CTE	RME	CTE	RME
	(mg/kg)		(mg/kg)		(mg/kg)		(mg/kg-day)	
PCB-189	9.4E-06	5.0E-05	2.2E-05	1.2E-04	2.0E-05	1.1E-04	4.8E-06	2.5E-05
PCB-77	1.9E-05	9.9E-05	1.2E-04	6.2E-04	4.7E-05	2.4E-04	2.0E-05	1.0E-04
PCB-81	3.4E-06	1.8E-05	2.1E-05	1.0E-04	1.0E-05	5.3E-05	3.6E-06	1.8E-05

Notes:

a. Exposure point concentration (EPC) for soil 0 to 2 feet bgs, from Spreadsheet D-90.

b. Earthworm and terrestrial plant exposure point values were estimated by application of site-specific bioaccumulation factors (BAFs) to soil exposure point concentration when available, or by application of a BAF of 1 when site-specific BAFs were not available.

CTE - central tendancy exposure
RME - reasonable maximum exposure
EPV - exposure point value
NC - not selected as a CPEC in the indicated media, per the SRAM (MWH 2005).
CPEC - chemical of potential ecological concern
VOC - volatile organic compund
SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyls
PCDD/PCDF - polychlorinated dibenzo-p-dioxins and dibenzofurans
"-" not applicable
mg/kg - milligram per kilogram
mg/kg-day - milligram per kilogram per day

Spreadsheet C3-119a (1 of 2)

Applied Daily Dose for the Thrush - Dry Pond Scenario
Ingestion Exposure Route
Sodium Reactor Experiment (SRE) Area

Chemical	Soil Exposure Point Concentration [a]		EPV in Earthworms[b]		EPV in Terrestrial Plants[b]		Applied Daily Dose	
	CTE	RME	CTE	RME	CTE	RME	CTE	RME
	(mg/kg)		(mg/kg)		(mg/kg)		(mg/kg-day)	
Inorganic Compounds								
Cadmium	5.1E-01	1.1E+00	1.0E+01	2.2E+01	5.5E+00	1.2E+01	1.8E+00	4.0E+00
Copper	2.1E+01	4.6E+01	3.1E+02	6.7E+02	4.0E+01	8.6E+01	4.5E+01	9.7E+01
Lead	1.6E+01	3.4E+01	3.9E+00	8.2E+00	3.4E+01	7.2E+01	3.6E+00	7.5E+00
Mercury	1.9E+00	4.4E+00	6.3E+00	1.5E+01	1.6E+00	3.6E+00	9.8E-01	2.3E+00
Methyl Mercury	1.7E-03	3.6E-03	1.7E-03	3.6E-03	1.7E-03	3.6E-03	3.9E-04	8.2E-04
Silver	7.7E-01	2.9E+00	5.1E+00	1.9E+01	1.3E+00	4.8E+00	8.0E-01	2.9E+00
Thallium	3.3E-01	3.3E-01	3.6E-01	3.6E-01	1.7E-01	1.7E-01	6.5E-02	6.5E-02
Zinc	1.7E+02	4.4E+02	5.3E+02	1.4E+03	2.8E+02	7.1E+02	9.5E+01	2.4E+02
VOCs								
1,1,1-Trichloroethane	NC	NC	NC	NC	NC	NC	-	-
1,1,2-Trichloro-1,2,2-trifluoroethane	1.2E-02	1.2E-02	1.2E-02	1.2E-02	1.2E-02	1.2E-02	2.7E-03	2.7E-03
1,1-Dichloroethane	NC	NC	NC	NC	NC	NC	-	-
1,2-Dichloroethene (total)	2.8E-02	7.0E-02	2.8E-02	7.0E-02	2.8E-02	7.0E-02	6.4E-03	1.6E-02
2-Butanone	3.7E-02	3.7E-02	3.7E-02	3.7E-02	3.7E-02	3.7E-02	8.3E-03	8.3E-03
Acetone	6.8E-01	4.2E+00	6.8E-01	4.2E+00	6.8E-01	4.2E+00	1.5E-01	9.4E-01
Ethylbenzene	NC	NC	NC	NC	NC	NC	-	-
m,p-Xylene	NC	NC	NC	NC	NC	NC	-	-
Methylene chloride	1.3E-02	1.3E-02	1.3E-02	1.3E-02	1.3E-02	1.3E-02	2.9E-03	2.9E-03
Tetrachloroethene	2.1E-02	8.8E-02	2.1E-02	8.8E-02	2.1E-02	8.8E-02	4.7E-03	2.0E-02
Toluene	5.6E-02	3.4E-01	5.6E-02	3.4E-01	5.6E-02	3.4E-01	1.3E-02	7.7E-02
Trichloroethene	3.7E-02	2.0E-01	3.7E-02	2.0E-01	3.7E-02	2.0E-01	8.3E-03	4.5E-02
Xylenes (total)	2.5E-02	5.1E-02	2.5E-02	5.1E-02	2.5E-02	5.1E-02	5.7E-03	1.2E-02
SVOCs								
Acenaphthene	4.4E-02	1.0E-01	1.1E-01	2.4E-01	4.4E-02	1.0E-01	1.8E-02	4.1E-02
Acenaphthylene	3.1E-02	8.5E-02	3.1E-02	8.5E-02	3.1E-02	8.5E-02	6.9E-03	1.9E-02
Anthracene	3.9E-02	8.2E-02	1.1E-01	2.3E-01	3.9E-02	8.2E-02	1.8E-02	3.8E-02
Benzo(a)anthracene	3.6E-02	1.5E-01	6.8E-02	2.8E-01	1.9E-01	7.8E-01	2.5E-02	1.0E-01
Benzo(a)pyrene	3.6E-02	1.5E-01	3.6E-02	1.5E-01	3.6E-02	1.5E-01	8.1E-03	3.3E-02
Benzo(b)fluoranthene	4.9E-02	2.7E-01	1.0E-01	5.4E-01	4.9E-02	2.7E-01	1.8E-02	9.6E-02
Benzo(e)pyrene	1.9E-02	6.3E-02	2.0E-02	6.8E-02	1.9E-02	6.3E-02	4.4E-03	1.5E-02
Benzo(g,h,i)perylene	4.1E-02	9.0E-02	2.2E-02	4.8E-02	4.1E-02	9.0E-02	6.7E-03	1.5E-02
Benzo(k)fluoranthene	3.0E-02	8.5E-02	2.6E-02	7.6E-02	3.0E-02	8.5E-02	6.3E-03	1.8E-02
Chrysene	4.4E-02	2.2E-01	8.3E-02	4.0E-01	1.2E-01	6.0E-01	2.2E-02	1.1E-01
Dibenz(a,h)anthracene	2.9E-02	8.5E-02	2.9E-02	8.5E-02	2.9E-02	8.5E-02	6.6E-03	1.9E-02
Dibenzofuran	NC	NC	NC	NC	NC	NC	-	-
Fluoranthene	6.0E-02	3.8E-01	5.4E-02	3.4E-01	1.7E-01	1.1E+00	2.2E-02	1.4E-01
Fluorene	4.4E-02	1.0E-01	1.7E-01	3.9E-01	4.4E-02	1.0E-01	2.7E-02	6.1E-02
Indeno(1,2,3-cd)pyrene	3.4E-02	1.4E-01	2.9E-02	1.2E-01	3.4E-02	1.4E-01	7.1E-03	2.8E-02
Naphthalene	NC	NC	NC	NC	NC	NC	-	-
Perylene	1.1E-02	3.6E-02	1.1E-02	3.6E-02	1.1E-02	3.6E-02	2.4E-03	8.0E-03
Phenanthrene	7.9E-02	2.0E-01	1.5E-01	3.7E-01	5.7E-01	1.4E+00	6.8E-02	1.7E-01
Pyrene	5.3E-02	1.6E-01	1.6E-01	4.6E-01	1.0E-01	3.0E-01	3.0E-02	8.7E-02
Total Petroleum Hydrocarbons								
C11-C14(Kerosene Range)	9.7E+00	4.0E+01	9.7E+00	4.0E+01	9.7E+00	4.0E+01	2.2E+00	9.0E+00
C14-C20(Diesel Range)	NC	NC	NC	NC	NC	NC	-	-
C20-C30(Lubricant Oil Range)	7.3E+01	4.7E+02	7.3E+01	4.7E+02	7.3E+01	4.7E+02	1.6E+01	1.1E+02

Spreadsheet C3-119a (2 of 2)

Applied Daily Dose for the Thrush - Dry Pond Scenario
Ingestion Exposure Route
Sodium Reactor Experiment (SRE) Area

Chemical	Soil Exposure Point Concentration [a]		EPV in Earthworms[b]		EPV in Terrestrial Plants[b]		Applied Daily Dose	
	CTE	RME	CTE	RME	CTE	RME	CTE	RME
	(mg/kg)		(mg/kg)		(mg/kg)		(mg/kg-day)	
PCDD/PCDFs								
2,3,7,8-TCDD	2.7E-07	5.3E-07	2.7E-07	5.3E-07	2.7E-07	5.3E-07	6.1E-08	1.2E-07
1,2,3,7,8-PeCDD	1.1E-06	2.2E-06	9.6E-07	1.9E-06	1.1E-06	2.2E-06	2.3E-07	4.5E-07
1,2,3,4,7,8-HxCDD	4.1E-06	9.0E-06	3.2E-06	7.0E-06	4.1E-06	9.0E-06	8.1E-07	1.8E-06
1,2,3,6,7,8-HxCDD	1.6E-05	3.0E-05	1.2E-05	2.3E-05	2.6E-06	4.8E-06	2.0E-06	3.7E-06
1,2,3,7,8,9-HxCDD	5.9E-06	1.0E-05	5.5E-06	9.3E-06	5.9E-06	1.0E-05	1.3E-06	2.2E-06
1,2,3,4,6,7,8-HpCDD	5.7E-04	1.2E-03	3.1E-04	6.4E-04	1.8E-04	3.8E-04	6.1E-05	1.3E-04
OCDD	8.4E-03	1.7E-02	3.9E-03	7.9E-03	2.0E-03	3.9E-03	7.6E-04	1.5E-03
2,3,7,8-TCDF	5.5E-07	7.9E-07	5.6E-07	8.0E-07	5.5E-07	7.9E-07	1.3E-07	1.8E-07
1,2,3,7,8-PeCDF	2.8E-07	5.7E-07	1.2E-07	2.4E-07	2.8E-07	5.7E-07	4.1E-08	8.6E-08
2,3,4,7,8-PeCDF	8.2E-07	1.6E-06	4.2E-07	8.1E-07	8.2E-07	1.6E-06	1.3E-07	2.5E-07
1,2,3,4,7,8-HxCDF	1.8E-06	3.3E-06	1.2E-06	2.2E-06	1.8E-06	3.3E-06	3.2E-07	6.0E-07
1,2,3,6,7,8-HxCDF	1.6E-06	3.2E-06	4.0E-07	8.2E-07	1.6E-06	3.2E-06	2.0E-07	4.0E-07
2,3,4,6,7,8-HxCDF	3.8E-06	8.8E-06	2.1E-06	4.9E-06	3.8E-06	8.8E-06	6.4E-07	1.5E-06
1,2,3,7,8,9-HxCDF	3.6E-07	9.7E-07	3.6E-07	9.7E-07	3.6E-07	9.7E-07	8.1E-08	2.2E-07
1,2,3,4,6,7,8-HpCDF	5.3E-05	9.6E-05	2.8E-05	5.2E-05	1.2E-05	2.2E-05	5.2E-06	9.5E-06
1,2,3,4,7,8,9-HpCDF	4.9E-06	9.2E-06	4.9E-06	9.2E-06	4.9E-06	9.2E-06	1.1E-06	2.1E-06
OCDF	1.4E-04	2.4E-04	6.8E-05	1.2E-04	4.5E-05	7.9E-05	1.4E-05	2.4E-05
PCBs								
Aroclor-1254	1.6E-01	4.3E-01	1.6E-01	4.3E-01	1.6E-01	4.3E-01	3.6E-02	9.7E-02
Aroclor-1260	1.3E+00	7.3E+00	1.3E+00	7.3E+00	1.3E+00	7.3E+00	3.0E-01	1.6E+00
PCB-105	1.1E-04	5.6E-04	1.2E-03	5.9E-03	3.8E-04	1.9E-03	1.9E-04	9.4E-04
PCB-114	2.2E-06	1.0E-05	5.8E-05	2.7E-04	8.0E-06	3.7E-05	8.4E-06	3.9E-05
PCB-118	2.3E-04	1.1E-03	2.6E-03	1.3E-02	7.2E-04	3.6E-03	4.1E-04	2.0E-03
PCB-123	3.2E-06	1.6E-05	4.0E-05	2.0E-04	1.1E-05	5.5E-05	6.3E-06	3.1E-05
PCB-126	8.8E-06	4.4E-05	4.7E-05	2.3E-04	1.9E-05	9.8E-05	7.9E-06	4.0E-05
PCB-156	7.5E-05	3.8E-04	4.3E-04	2.2E-03	1.9E-04	9.4E-04	7.4E-05	3.7E-04
PCB-157	3.3E-05	1.7E-04	1.9E-04	9.9E-04	8.7E-05	4.5E-04	3.3E-05	1.7E-04
PCB-167	5.7E-05	2.9E-04	3.4E-04	1.7E-03	1.6E-04	8.2E-04	5.9E-05	3.0E-04
PCB-169	8.6E-07	4.4E-06	8.6E-07	4.4E-06	8.6E-07	4.4E-06	1.9E-07	9.9E-07
PCB-189	8.6E-06	4.4E-05	2.0E-05	1.0E-04	1.9E-05	9.5E-05	4.3E-06	2.2E-05
PCB-77	1.8E-05	8.8E-05	1.1E-04	5.5E-04	4.2E-05	2.1E-04	1.8E-05	9.1E-05
PCB-81	3.1E-06	1.6E-05	1.9E-05	9.3E-05	9.3E-06	4.7E-05	3.3E-06	1.6E-05

Notes:

a. Exposure point concentration (EPC) for soil 0 to 2 feet bgs, from Spreadsheet D-90.

b. Earthworm and terrestrial plant exposure point values were estimated by application of site-specific bioaccumulation factors (BAFs) to soil exposure point concentration when available, or by application of a BAF of 1 when site-specific BAFs were not available.

CTE - central tendancy exposure

RME - reasonable maximum exposure

EPV - exposure point value

NC - not selected as a CPEC in the indicated media, per the SRAM (MWH 2005).

CPEC - chemical of potential ecological concern

VOC - volatile organic compund

SVOC - semi-volatile organic compound

PCB - polychlorinated biphenyls

PCDD/PCDF - polychlorinated dibenzo-p-dioxins and dibenzofurans

"-" not applicable

mg/kg - milligram per kilogram

mg/kg-day - milligram per kilogram per day

Spreadsheet C3-118b (1 of 1)

Applied Daily Dose for the Deer Mouse - Wet Pond Scenario
Inhalation Exposure Route
Sodium Reactor Experiment (SRE) Area

Chemical	Burrow Air Concentration [a]		Applied Daily Dose	
	CTE (mg/m^3)	RME (mg/m^3)	CTE (mg/kg-day)	RME (mg/kg-day)
1,1,1-Trichloroethane	5.0E-01	5.0E-01	5.0E-01	5.0E-01
1,1,2-Trichloro-1,2,2-trifluoroethane	2.7E+00	3.1E+00	2.7E+00	3.2E+00
1,1-Dichloroethane	5.0E-01	5.0E-01	5.0E-01	5.0E-01
2-Butanone	NC	NC	-	-
Acetone	NC	NC	-	-
Bromomethane	NC	NC	-	-
Ethylbenzene	5.0E-01	5.0E-01	5.0E-01	5.0E-01
m,p-Xylene	1.0E+00	1.0E+00	1.0E+00	1.0E+00
Methylene chloride	1.3E+01	1.3E+01	1.3E+01	1.3E+01
Tetrachloroethene	5.0E-01	5.0E-01	5.0E-01	5.0E-01
Toluene	5.0E-01	5.0E-01	5.0E-01	5.0E-01
trans-1,3-Dichloropropene	NC	NC	-	-
Trichloroethene	5.0E-01	5.0E-01	5.0E-01	5.0E-01

Notes:
a. Based on exposure point concentrations in soil vapor, from Spreadsheet D-93.
CTE - central tendancy exposure
RME - reasonable maximum exposure
VOC - volatile organic compound
"-" not applicable
mg/m^3 - milligrams per cubic meter
mg/kg-day - milligram per kilogram per day

Spreadsheet C3-118a (1 of 1)

Applied Daily Dose for the Deer Mouse - Dry Pond Scenario
Inhalation Exposure Route
Sodium Reactor Experiment (SRE) Area

Chemical	Burrow Air Concentration [a]		Applied Daily Dose	
	CTE (mg/m^3)	RME (mg/m^3)	CTE (mg/kg-day)	RME (mg/kg-day)
VOCs				
1,1,1-Trichloroethane	5.0E-01	5.0E-01	5.0E-01	5.0E-01
1,1,2-Trichloro-1,2,2-trifluoroethane	2.7E+00	3.1E+00	2.7E+00	3.2E+00
1,1-Dichloroethane	5.0E-01	5.0E-01	5.0E-01	5.0E-01
1,2-Dichloroethene (total)	NC	NC	-	-
2-Butanone	NC	NC	-	-
Acetone	NC	NC	-	-
Ethylbenzene	5.0E-01	5.0E-01	5.0E-01	5.0E-01
m,p-Xylene	1.0E+00	1.0E+00	1.0E+00	1.0E+00
Methylene chloride	1.3E+01	1.3E+01	1.3E+01	1.3E+01
Tetrachloroethene	5.0E-01	5.0E-01	5.0E-01	5.0E-01
Toluene	5.0E-01	5.0E-01	5.0E-01	5.0E-01
Trichloroethene	5.0E-01	5.0E-01	5.0E-01	5.0E-01

Notes:
a. Based on exposure point concentrations in soil vapor, from Spreadsheet D-93.
CTE - central tendancy exposure
RME - reasonable maximum exposure
VOC - volatile organic compound
"-" not applicable
mg/m^3 - milligrams per cubic meter
mg/kg-day - milligram per kilogram per day

Applied Daily Dose for the Deer Mouse - Wet Pond Scenario
Ingestion Exposure Route
Sodium Reactor Experiment (SRE) Area

Chemical	Soil Exposure Point Concentration [a]		EPV in Earthworms[b]		EPV in Terrestrial Plants[b]		Applied Daily Dose	
	CTE	RME	CTE	RME	CTE	RME	CTE	RME
	(mg/kg)		(mg/kg)		(mg/kg)		(mg/kg-day)	
Inorganic Compounds								
Aluminum	NC	NC	NC	NC	NC	NC	-	-
Antimony	NC	NC	NC	NC	NC	NC	-	-
Arsenic	NC	NC	NC	NC	NC	NC	-	-
Beryllium	NC	NC	NC	NC	NC	NC	-	-
Cadmium	2.2E-01	3.6E-01	4.7E+00	8.2E+00	2.6E+00	4.5E+00	6.9E-01	1.2E+00
Chromium	NC	NC	NC	NC	NC	NC	-	-
Copper	1.1E+01	2.0E+01	1.5E+02	2.9E+02	1.9E+01	3.7E+01	1.2E+01	2.4E+01
Lead	9.9E+00	1.3E+01	2.3E+00	3.1E+00	2.0E+01	2.7E+01	3.2E+00	4.3E+00
Mercury	1.9E+00	4.1E+00	7.0E+00	1.8E+01	1.7E+00	4.5E+00	7.1E-01	1.8E+00
Methyl Mercury	1.7E-03	3.6E-03	1.7E-03	3.6E-03	1.7E-03	3.6E-03	3.8E-04	7.9E-04
Nickel	NC	NC	NC	NC	NC	NC	-	-
Selenium	NC	NC	NC	NC	NC	NC	-	-
Silver	1.5E+00	3.5E+00	6.7E+00	1.8E+01	1.7E+00	4.6E+00	6.9E-01	1.9E+00
Thallium	8.4E-01	2.1E+00	3.6E-01	3.6E-01	1.7E-01	1.7E-01	5.2E-02	5.7E-02
Vanadium	NC	NC	NC	NC	NC	NC	-	-
Zinc	7.5E+01	1.5E+02	2.6E+02	5.9E+02	1.4E+02	3.1E+02	3.7E+01	8.4E+01
VOCs								
1,1,1-Trichloroethane	NC	NC *	NC	NC	NC	NC	-	-
1,1,2-Trichloro-1,2,2-trifluoroethane	1.2E-02	1.2E-02 *	1.2E-02	1.2E-02	1.2E-02	1.2E-02	2.6E-03	2.6E-03
1,1-Dichloroethane	NC	NC *	NC	NC	NC	NC	-	-
2-Butanone	1.8E-02	2.7E-02	2.1E-02	3.5E-02	2.1E-02	3.5E-02	4.6E-03	7.5E-03
Acetone	6.9E-01	2.3E+00	1.1E+00	5.2E+00	1.1E+00	5.2E+00	2.4E-01	1.1E+00
Bromomethane	NC	NC	NC	NC	NC	NC	-	-
Ethylbenzene	NC	NC	NC	NC	NC	NC	-	-
m,p-Xylene	NC	NC	NC	NC	NC	NC	-	-
Methylene chloride	1.0E-02	1.2E-02	1.0E-02	1.3E-02	1.0E-02	1.3E-02	2.2E-03	2.8E-03
Tetrachloroethene	NC	NC *	NC	NC	NC	NC	-	-
Toluene	NC	NC	NC	NC	NC	NC	-	-
trans-1,3-Dichloropropene	NC	NC	NC	NC	NC	NC	-	-
Trichloroethene	NC	NC *	NC	NC	NC	NC	-	-
Xylenes (total)	NC	NC	NC	NC	NC	NC	-	-
SVOCs								
Acenaphthene	8.8E-02	3.3E-01	6.3E-02	2.7E-01	2.6E-02	1.1E-01	8.3E-03	3.5E-02
Acenaphthylene	6.1E-03	1.7E-02	4.6E-03	1.6E-02	4.6E-03	1.6E-02	1.0E-03	3.4E-03
Anthracene	2.5E-01	1.3E+00	5.0E-02	2.0E-01	1.8E-02	7.3E-02	6.9E-03	2.9E-02
Benzo(a)anthracene	1.1E+00	1.4E+01	5.4E-03	1.7E-02	1.5E-02	4.6E-02	7.1E-03	6.8E-02
Benzo(a)pyrene	1.1E+00	1.5E+01	3.0E-03	8.9E-03	3.0E-03	8.9E-03	5.5E-03	6.6E-02
Benzo(b)fluoranthene	1.0E+00	1.3E+01	8.8E-03	2.3E-02	4.3E-03	1.1E-02	5.5E-03	5.8E-02
Benzo(e)pyrene	2.4E-02	6.8E-02	2.2E-02	7.3E-02	2.0E-02	6.7E-02	4.4E-03	1.5E-02
Benzo(g,h,i)perylene	3.4E-01	3.1E+00	6.3E-03	2.4E-02	1.2E-02	4.4E-02	3.6E-03	2.1E-02
Benzo(k)fluoranthene	1.1E+00	1.5E+01	2.5E-03	7.4E-03	2.8E-03	8.3E-03	5.3E-03	6.6E-02
bis(2-Ethylhexyl)phthalate	NC	NC	NC	NC	NC	NC	-	-
Butyl benzyl phthalate	NC	NC	NC	NC	NC	NC	-	-
Chrysene	7.7E-01	8.4E+00	9.5E-03	2.3E-02	1.4E-02	3.4E-02	6.0E-03	4.2E-02
Dibenz(a,h)anthracene	1.5E-01	1.4E+00	1.9E-03	6.9E-03	1.9E-03	6.9E-03	1.0E-03	7.6E-03
Dibenzofuran	2.8E-01	2.8E-01	NC	NC	NC	NC	1.2E-03	1.2E-03
Diethylphthalate	NC	NC	NC	NC	NC	NC	-	-
Di-n-butylphthalate	NC	NC	NC	NC	NC	NC	-	-
Di-n-octyl phthalate	NC	NC	NC	NC	NC	NC	-	-
Fluoranthene	1.9E+00	2.5E+01	5.1E-03	1.1E-02	1.6E-02	3.4E-02	1.1E-02	1.1E-01
Fluorene	8.9E-02	3.3E-01	1.0E-01	4.3E-01	2.6E-02	1.1E-01	1.1E-02	4.5E-02
Hexachlorobutadiene	NC	NC	NC	NC	NC	NC	-	-
Hexachlorocyclopentadiene	NC	NC	NC	NC	NC	NC	-	-
Indeno(1,2,3-cd)pyrene	4.8E-01	6.4E+00	2.3E-03	7.3E-03	2.7E-03	8.5E-03	2.6E-03	2.9E-02
Naphthalene	NC	NC	NC	NC	NC	NC	-	-

Spreadsheet C3-117b (2 of 3)

Applied Daily Dose for the Deer Mouse - Wet Pond Scenario
Ingestion Exposure Route
Sodium Reactor Experiment (SRE) Area

Chemical	Soil Exposure Point Concentration [a]		EPV in Earthworms[b]		EPV in Terrestrial Plants[b]		Applied Daily Dose	
	CTE	RME	CTE	RME	CTE	RME	CTE	RME
	(mg/kg)		(mg/kg)		(mg/kg)		(mg/kg-day)	
Pentachlorophenol	NC	NC	NC	NC	NC	NC	-	-
Perylene	1.4E-02	3.9E-02	1.1E-02	3.8E-02	1.1E-02	3.8E-02	2.5E-03	8.3E-03
Phenanthrene	9.0E-01	7.5E+00	1.3E-01	5.5E-01	5.1E-01	2.1E+00	8.8E-02	3.9E-01
Pyrene	1.6E+00	1.4E+01	2.4E-02	8.2E-02	1.6E-02	5.4E-02	1.1E-02	7.3E-02
4,4'-DDT	NC	NC	NC	NC	NC	NC	-	-
Chlordane	NC	NC	NC	NC	NC	NC	-	-
Dieldrin	NC	NC	NC	NC	NC	NC	-	-
Endosulfan I	NC	NC	NC	NC	NC	NC	-	-
Endosulfan II	NC	NC	NC	NC	NC	NC	-	-
Endrin	NC	NC	NC	NC	NC	NC	-	-
Heptachlor	NC	NC	NC	NC	NC	NC	-	-
Heptachlor epoxide	NC	NC	NC	NC	NC	NC	-	-
Toxaphene	NC	NC	NC	NC	NC	NC	-	-
PCDD/PCDFs								
2,3,7,8-TCDD	1.5E-07	3.5E-07	1.9E-07	4.0E-07	1.9E-07	4.0E-07	4.0E-08	8.7E-08
1,2,3,7,8-PeCDD	5.6E-07	1.3E-06	6.4E-07	1.3E-06	7.3E-07	1.5E-06	1.5E-07	3.1E-07
1,2,3,4,7,8-HxCDD	1.6E-06	3.7E-06	1.7E-06	3.3E-06	2.1E-06	4.2E-06	4.3E-07	8.5E-07
1,2,3,6,7,8-HxCDD	8.3E-06	1.9E-05	8.5E-06	1.5E-05	1.8E-06	3.3E-06	8.5E-07	1.5E-06
1,2,3,7,8,9-HxCDD	3.4E-06	8.7E-06	4.2E-06	9.3E-06	4.5E-06	1.0E-05	9.6E-07	2.1E-06
1,2,3,4,6,7,8-HpCDD	2.4E-04	4.9E-04	1.7E-04	2.7E-04	1.0E-04	1.6E-04	2.7E-05	4.4E-05
OCDD	3.7E-03	7.3E-03	2.3E-03	3.4E-03	1.2E-03	1.7E-03	3.4E-04	5.1E-04
2,3,7,8-TCDF	3.6E-07	7.8E-07	4.8E-07	8.0E-07	4.7E-07	7.9E-07	1.0E-07	1.7E-07
1,2,3,7,8-PeCDF	1.5E-07	3.9E-07	7.5E-08	1.7E-07	1.8E-07	3.9E-07	3.2E-08	7.0E-08
2,3,4,7,8-PeCDF	4.2E-07	9.0E-07	2.8E-07	5.1E-07	5.4E-07	9.9E-07	1.0E-07	1.8E-07
1,2,3,4,7,8-HxCDF	8.8E-07	1.7E-06	7.5E-07	1.2E-06	1.2E-06	1.8E-06	2.2E-07	3.5E-07
1,2,3,6,7,8-HxCDF	7.2E-07	1.6E-06	2.4E-07	4.7E-07	9.5E-07	1.8E-06	1.6E-07	3.1E-07
1,2,3,4,6,7,8-HpCDF	2.8E-05	5.0E-05	2.0E-05	2.7E-05	8.3E-06	1.1E-05	2.6E-06	3.6E-06
1,2,3,4,7,8,9-HpCDF	2.4E-06	4.2E-06	3.2E-06	4.2E-06	3.2E-06	4.2E-06	6.8E-07	9.2E-07
OCDF	7.5E-05	1.5E-04	5.0E-05	7.6E-05	3.3E-05	5.0E-05	8.5E-06	1.3E-05
PCBs								
Aroclor-1016	NC	NC	NC	NC	NC	NC	-	-
Aroclor-1221	NC	NC	NC	NC	NC	NC	-	-
Aroclor-1232	NC	NC	NC	NC	NC	NC	-	-
Aroclor-1242	NC	NC	NC	NC	NC	NC	-	-
Aroclor-1248	NC	NC	NC	NC	NC	NC	-	-
Aroclor-1254	1.6E-01	4.3E-01	1.7E-01	4.3E-01	1.7E-01	4.3E-01	3.7E-02	9.3E-02
Aroclor-1260	1.4E+00	7.7E+00	1.5E+00	7.8E+00	1.5E+00	7.8E+00	3.2E-01	1.7E+00
PCB-105	1.2E-04	6.3E-04	1.3E-03	6.6E-03	4.2E-04	2.1E-03	1.5E-04	7.4E-04
PCB-114	2.3E-06	1.1E-05	6.3E-05	3.0E-04	8.8E-06	4.2E-05	5.4E-06	2.5E-05
PCB-118	2.4E-04	1.3E-03	2.9E-03	1.5E-02	8.0E-04	4.0E-03	3.0E-04	1.5E-03
PCB-123	3.4E-06	1.8E-05	4.4E-05	2.3E-04	1.2E-05	6.2E-05	4.6E-06	2.4E-05
PCB-126	9.2E-06	4.9E-05	5.1E-05	2.6E-04	2.1E-05	1.1E-04	6.5E-06	3.4E-05
PCB-156	7.9E-05	4.2E-04	4.8E-04	2.5E-03	2.1E-04	1.1E-03	6.1E-05	3.2E-04
PCB-157	3.5E-05	1.9E-04	2.1E-04	1.1E-03	9.6E-05	5.0E-04	2.8E-05	1.5E-04
PCB-167	6.0E-05	3.3E-04	3.7E-04	2.0E-03	1.8E-04	9.2E-04	5.0E-05	2.6E-04
PCB-169	9.0E-07	4.9E-06	9.4E-07	5.0E-06	9.4E-07	5.0E-06	2.0E-07	1.1E-06
PCB-189	9.0E-06	4.9E-05	2.2E-05	1.2E-04	2.0E-05	1.1E-04	4.5E-06	2.4E-05
PCB-77	1.8E-05	9.7E-05	1.2E-04	6.2E-04	4.7E-05	2.4E-04	1.5E-05	7.5E-05
PCB-81	3.3E-06	1.7E-05	2.1E-05	1.0E-04	1.0E-05	5.3E-05	2.9E-06	1.5E-05

Notes:

a. Exposure point concentration (EPC) for soil 0 to 4 feet bgs, from Spreadsheet D-92.

b. Earthworm and terrestrial plant exposure point values were estimated by application of site-specific bioaccumulation factors (BAFs) to soil exposure point concentration when available, or by application of a BAF of 1 when site-specific BAFs were not available.

* Chemical selected as a CPEC in soil vapor; value is based on one-half the sample quantitation limit for soil at 0 to 6 feet bgs.

CTE - central tendancy exposure

Spreadsheet C3-117b (3 of 3)

Applied Daily Dose for the Deer Mouse - Wet Pond Scenario
Ingestion Exposure Route
Sodium Reactor Experiment (SRE) Area

Chemical	Soil Exposure Point Concentration [a]		EPV in Earthworms[b]		EPV in Terrestrial Plants[b]		Applied Daily Dose	
	CTE	RME	CTE	RME	CTE	RME	CTE	RME
	(mg/kg)		(mg/kg)		(mg/kg)		(mg/kg-day)	

RME - reasonable maximum exposure
EPV - exposure point value
NC - not selected as a CPEC in the indicated media, per the SRAM (MWH 2005).
CPEC - chemical of potential ecological concern
VOC - volatile organic compund
SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyls
PCDD/PCDF - polychlorinated dibenzo-p-dioxins and dibenzofurans
CPEC - chemical of potential ecological concern
"-" not applicable
mg/kg - milligram per kilogram
mg/kg-day - milligram per kilogram per day

Applied Daily Dose for the Deer Mouse - Dry Pond Scenario
Ingestion Exposure Route
Sodium Reactor Experiment (SRE) Area

Chemical	Soil Exposure Point Concentration [a]		EPV in Earthworms[b]		EPV in Terrestrial Plants[b]		Applied Daily Dose	
	CTE	RME	CTE	RME	CTE	RME	CTE	RME
	(mg/kg)		(mg/kg)		(mg/kg)		(mg/kg-day)	
Inorganic Compounds								
Cadmium	4.2E-01	1.7E+00	1.0E+01	2.2E+01	5.5E+00	1.2E+01	1.5E+00	3.3E+00
Copper	1.9E+01	3.5E+01	3.1E+02	6.7E+02	4.0E+01	8.6E+01	2.6E+01	5.6E+01
Lead	1.4E+01	2.6E+01	3.9E+00	8.2E+00	3.4E+01	7.2E+01	5.4E+00	1.1E+01
Mercury	1.5E+00	4.8E+00	6.3E+00	1.5E+01	1.6E+00	3.6E+00	6.4E-01	1.5E+00
Methyl Mercury	1.7E-03	3.6E-03	1.7E-03	3.6E-03	1.7E-03	3.6E-03	3.8E-04	7.9E-04
Silver	1.0E+00	4.1E+00	5.1E+00	1.9E+01	1.3E+00	4.8E+00	5.3E-01	1.9E+00
Thallium	9.4E-01	2.1E+00	3.6E-01	3.6E-01	1.7E-01	1.7E-01	5.2E-02	5.7E-02
Zinc	1.3E+02	3.1E+02	5.3E+02	1.4E+03	2.8E+02	7.1E+02	7.5E+01	1.9E+02
VOCs								
1,1,1-Trichloroethane	4.7E-02	2.7E-01	NC	NC	NC	NC	2.0E-04	1.1E-03
1,1,2-Trichloro-1,2,2-trifluoroethane	1.2E-02	1.2E-02 *	1.2E-02	1.2E-02	1.2E-02	1.2E-02	2.6E-03	2.6E-03
1,1-Dichloroethane	2.3E-02	8.3E-02	NC	NC	NC	NC	9.6E-05	3.5E-04
1,2-Dichloroethene (total)	2.9E-02	5.6E-02	2.8E-02	7.0E-02	2.8E-02	7.0E-02	6.1E-03	1.5E-02
2-Butanone	3.7E-02	3.7E-02	3.7E-02	3.7E-02	3.7E-02	3.7E-02	8.0E-03	8.0E-03
Acetone	5.2E-01	2.6E+00	6.8E-01	4.2E+00	6.8E-01	4.2E+00	1.5E-01	9.0E-01
Ethylbenzene	NC	NC	NC	NC	NC	NC	-	-
m,p-Xylene	6.0E-04	6.0E-04	NC	NC	NC	NC	2.6E-06	2.6E-06
Methylene chloride	4.1E-01	2.6E+00	1.3E-02	1.3E-02	1.3E-02	1.3E-02	4.5E-03	1.4E-02
Tetrachloroethene	4.1E-02	2.0E-01	2.1E-02	8.8E-02	2.1E-02	8.8E-02	4.6E-03	2.0E-02
Toluene	3.2E-01	2.2E+00	5.6E-02	3.4E-01	5.6E-02	3.4E-01	1.3E-02	8.2E-02
Trichloroethene	1.0E-01	6.2E-01	3.7E-02	2.0E-01	3.7E-02	2.0E-01	8.3E-03	4.6E-02
Xylenes (total)	7.5E-02	4.2E-01	2.5E-02	5.1E-02	2.5E-02	5.1E-02	5.7E-03	1.3E-02
SVOCs								
Acenaphthene	7.8E-02	1.9E-01	1.1E-01	2.4E-01	4.4E-02	1.0E-01	1.4E-02	3.1E-02
Acenaphthylene	3.8E-02	8.5E-02	3.1E-02	8.5E-02	3.1E-02	8.5E-02	6.7E-03	1.8E-02
Anthracene	1.6E-01	6.5E-01	1.1E-01	2.3E-01	3.9E-02	8.2E-02	1.3E-02	3.0E-02
Benzo(a)anthracene	5.5E-01	4.6E+00	6.8E-02	2.8E-01	1.9E-01	7.8E-01	3.5E-02	1.5E-01
Benzo(a)pyrene	5.9E-01	5.0E+00	3.6E-02	1.5E-01	3.6E-02	1.5E-01	1.0E-02	5.3E-02
Benzo(b)fluoranthene	5.4E-01	4.4E+00	1.0E-01	5.4E-01	4.9E-02	2.7E-01	1.6E-02	9.3E-02
Benzo(e)pyrene	2.2E-02	6.1E-02	2.0E-02	6.8E-02	1.9E-02	6.3E-02	4.2E-03	1.4E-02
Benzo(g,h,i)perylene	2.1E-01	1.5E+00	2.2E-02	4.8E-02	4.1E-02	9.0E-02	8.4E-03	2.3E-02
Benzo(k)fluoranthene	5.8E-01	4.9E+00	2.6E-02	7.6E-02	3.0E-02	8.5E-02	8.6E-03	3.9E-02
Chrysene	4.2E-01	4.1E+00	8.3E-02	4.0E-01	1.2E-01	6.0E-01	2.6E-02	1.3E-01
Dibenz(a,h)anthracene	1.1E-01	7.3E-01	2.9E-02	8.5E-02	2.9E-02	8.5E-02	6.7E-03	2.1E-02
Dibenzofuran	9.8E-02	1.2E-01	NC	NC	NC	NC	4.2E-04	5.1E-04
Fluoranthene	9.7E-01	8.3E+00	5.4E-02	3.4E-01	1.7E-01	1.1E+00	3.3E-02	2.2E-01
Fluorene	7.9E-02	2.0E-01	1.7E-01	3.9E-01	4.4E-02	1.0E-01	1.8E-02	4.1E-02
Indeno(1,2,3-cd)pyrene	2.7E-01	2.1E+00	2.9E-02	1.2E-01	3.4E-02	1.4E-01	8.1E-03	3.7E-02
Naphthalene	NC	NC	NC	NC	NC	NC	-	-
Perylene	1.2E-02	3.5E-02	1.1E-02	3.6E-02	1.1E-02	3.6E-02	2.3E-03	7.7E-03
Phenanthrene	4.8E-01	1.9E+00	1.5E-01	3.7E-01	5.7E-01	1.4E+00	9.7E-02	2.5E-01
Pyrene	8.1E-01	6.9E+00	1.6E-01	4.6E-01	1.0E-01	3.0E-01	2.8E-02	1.0E-01
Total Petroleum Hydrocarbons								
C11-C14(Kerosene Range)	8.9E+00	4.0E+01	9.7E+00	4.0E+01	9.7E+00	4.0E+01	2.1E+00	8.7E+00
C14-C20(Diesel Range)	8.3E+00	1.4E+01	NC	NC	NC	NC	3.6E-02	6.1E-02
C20-C30(Lubricant Oil Range)	8.8E+01	4.7E+02	7.3E+01	4.7E+02	7.3E+01	4.7E+02	1.6E+01	1.0E+02

Spreadsheet C3-117a (2 of 3)

Applied Daily Dose for the Deer Mouse - Dry Pond Scenario
Ingestion Exposure Route
Sodium Reactor Experiment (SRE) Area

Chemical	Soil Exposure Point Concentration [a]		EPV in Earthworms[b]		EPV in Terrestrial Plants[b]		Applied Daily Dose	
	CTE	RME	CTE	RME	CTE	RME	CTE	RME
	(mg/kg)		(mg/kg)		(mg/kg)		(mg/kg-day)	
PCDD/PCDFs								
2,3,7,8-TCDD	2.3E-07	4.4E-07	2.7E-07	5.3E-07	2.7E-07	5.3E-07	5.9E-08	1.2E-07
1,2,3,7,8-PeCDD	8.9E-07	1.8E-06	9.6E-07	1.9E-06	1.1E-06	2.2E-06	2.3E-07	4.5E-07
1,2,3,4,7,8-HxCDD	3.3E-06	7.2E-06	3.2E-06	7.0E-06	4.1E-06	9.0E-06	8.3E-07	1.8E-06
1,2,3,6,7,8-HxCDD	1.3E-05	2.4E-05	1.2E-05	2.3E-05	2.6E-06	4.8E-06	1.2E-06	2.3E-06
1,2,3,7,8,9-HxCDD	4.7E-06	9.4E-06	5.5E-06	9.3E-06	5.9E-06	1.0E-05	1.3E-06	2.1E-06
1,2,3,4,6,7,8-HpCDD	4.5E-04	9.5E-04	3.1E-04	6.4E-04	1.8E-04	3.8E-04	4.9E-05	1.0E-04
OCDD	6.7E-03	1.4E-02	3.9E-03	7.9E-03	2.0E-03	3.9E-03	5.7E-04	1.2E-03
2,3,7,8-TCDF	4.5E-07	7.9E-07	5.6E-07	8.0E-07	5.5E-07	7.9E-07	1.2E-07	1.7E-07
1,2,3,7,8-PeCDF	2.3E-07	4.6E-07	1.2E-07	2.4E-07	2.8E-07	5.7E-07	5.0E-08	1.0E-07
2,3,4,7,8-PeCDF	6.6E-07	1.3E-06	4.2E-07	8.1E-07	8.2E-07	1.6E-06	1.5E-07	2.9E-07
1,2,3,4,7,8-HxCDF	1.4E-06	2.8E-06	1.2E-06	2.2E-06	1.8E-06	3.3E-06	3.5E-07	6.5E-07
1,2,3,6,7,8-HxCDF	1.2E-06	2.5E-06	4.0E-07	8.2E-07	1.6E-06	3.2E-06	2.6E-07	5.3E-07
2,3,4,6,7,8-HxCDF	3.1E-06	6.9E-06	2.1E-06	4.9E-06	3.8E-06	8.8E-06	7.2E-07	1.7E-06
1,2,3,7,8,9-HxCDF	3.0E-07	9.7E-07	3.6E-07	9.7E-07	3.6E-07	9.7E-07	7.8E-08	2.1E-07
1,2,3,4,6,7,8-HpCDF	4.2E-05	8.0E-05	2.8E-05	5.2E-05	1.2E-05	2.2E-05	3.7E-06	6.9E-06
1,2,3,4,7,8,9-HpCDF	3.9E-06	7.6E-06	4.9E-06	9.2E-06	4.9E-06	9.2E-06	1.1E-06	2.0E-06
OCDF	1.1E-04	2.0E-04	6.8E-05	1.2E-04	4.5E-05	7.9E-05	1.1E-05	2.0E-05
PCBs								
Aroclor-1254	1.6E-01	4.3E-01	1.6E-01	4.3E-01	1.6E-01	4.3E-01	3.5E-02	9.3E-02
Aroclor-1260	1.3E+00	7.0E+00	1.3E+00	7.3E+00	1.3E+00	7.3E+00	2.9E-01	1.6E+00
PCB-105	1.1E-04	5.6E-04	1.2E-03	5.9E-03	3.8E-04	1.9E-03	1.3E-04	6.5E-04
PCB-114	2.1E-06	1.0E-05	5.8E-05	2.7E-04	8.0E-06	3.7E-05	4.9E-06	2.3E-05
PCB-118	2.2E-04	1.1E-03	2.6E-03	1.3E-02	7.2E-04	3.6E-03	2.8E-04	1.4E-03
PCB-123	3.1E-06	1.6E-05	4.0E-05	2.0E-04	1.1E-05	5.5E-05	4.2E-06	2.1E-05
PCB-126	8.4E-06	4.4E-05	4.7E-05	2.3E-04	1.9E-05	9.8E-05	5.9E-06	3.0E-05
PCB-156	7.2E-05	3.8E-04	4.3E-04	2.2E-03	1.9E-04	9.4E-04	5.6E-05	2.8E-04
PCB-157	3.2E-05	1.7E-04	1.9E-04	9.9E-04	8.7E-05	4.5E-04	2.5E-05	1.3E-04
PCB-167	5.5E-05	2.9E-04	3.4E-04	1.7E-03	1.6E-04	8.2E-04	4.5E-05	2.3E-04
PCB-169	8.2E-07	4.4E-06	8.6E-07	4.4E-06	8.6E-07	4.4E-06	1.9E-07	9.5E-07
PCB-189	8.2E-06	4.4E-05	2.0E-05	1.0E-04	1.9E-05	9.5E-05	4.1E-06	2.1E-05
PCB-77	1.7E-05	8.8E-05	1.1E-04	5.5E-04	4.2E-05	2.1E-04	1.3E-05	6.7E-05
PCB-81	3.0E-06	1.6E-05	1.9E-05	9.3E-05	9.3E-06	4.7E-05	2.6E-06	1.3E-05

Notes:

a. Exposure point concentration (EPC) for soil 0 to 4 feet bgs, from Spreadsheet D-92.

b. Earthworm and terrestrial plant exposure point values were estimated by application of site-specific bioaccumulation factors (BAFs) to soil exposure point concentration when available, or by application of a BAF of 1 when site-specific BAFs were not available.

* Chemical selected as a CPEC in soil vapor; value is based on one-half the sample quantitation limit for soil at 0 to 6 feet bgs.

CTE - central tendancy exposure

RME - reasonable maximum exposure

EPV - exposure point value

NC - not selected as a CPEC in the indicated media, per the SRAM (MWH 2005).

CPEC - chemical of potential ecological concern

VOC - volatile organic compund

SVOC - semi-volatile organic compound

PCB - polychlorinated biphenyls

PCDD/PCDF - polychlorinated dibenzo-p-dioxins and dibenzofurans

CPEC - chemical of potential ecological concern

Spreadsheet C3-117a (3 of 3)

Applied Daily Dose for the Deer Mouse - Dry Pond Scenario
Ingestion Exposure Route
Sodium Reactor Experiment (SRE) Area

Chemical	Soil Exposure Point Concentration [a]		EPV in Earthworms[b]		EPV in Terrestrial Plants[b]		Applied Daily Dose	
	CTE	RME	CTE	RME	CTE	RME	CTE	RME
	(mg/kg)		(mg/kg)		(mg/kg)		(mg/kg-day)	

"-" not applicable
mg/kg - milligram per kilogram
mg/kg-day - milligram per kilogram per day

Table C3-116 (1 of 3)

Exposure Point Values for Fish
Sodium Reactor Experiment (SRE) Area

Chemical	Sediment EPC		BAF	Fish EPV	
	CTE (mg/kg)	RME (mg/kg)	(unitless)	CTE (mg/kg)	RME (mg/kg)
Inorganic Compounds					
Aluminum	NC	NC	0.018	NC	NC
Antimony	NC	NC	1.8	NC	NC
Arsenic	NC	NC	1.0	NC	NC
Beryllium	NC	NC	1.0	NC	NC
Cadmium	8.9E-01	4.6E+00	1.0	8.9E-01	4.6E+00
Chromium	NC	NC	0.27	NC	NC
Copper	3.7E+01	6.6E+01	0.12	4.2E+00	7.6E+00
Lead	2.5E+01	5.1E+01	1.0	2.5E+01	5.1E+01
Mercury	6.0E-01	1.1E+00	1.2	7.1E-01	1.3E+00
Methyl Mercury	NC	NC	1.0	NC	NC
Nickel	NC	NC	0.16	NC	NC
Selenium	NC	NC	4.6	NC	NC
Silver	1.4E-01	1.4E-01	1.0	1.4E-01	1.4E-01
Thallium	1.6E-01	1.6E-01	1.0	1.6E-01	1.6E-01
Vanadium	NC	NC	0.021	NC	NC
Zinc	2.9E+02	6.6E+02	0.41	1.2E+02	2.7E+02
VOCs					
1,1,1-Trichloroethane	NC	NC	1.0	NC	NC
1,1,2-Trichloro-1,2,2-trifluoroethane	1.2E-02	1.2E-02	1.0	1.2E-02	1.2E-02
1,1-Dichloroethane	NC	NC	1.0	NC	NC
2-Butanone	NC	NC	1.0	NC	NC
Acetone	NC	NC	1.0	NC	NC
Bromomethane	NC	NC	1.0	NC	NC
Ethylbenzene	NC	NC	1.0	NC	NC
m,p-Xylene	NC	NC	1.0	NC	NC
Methylene chloride	NC	NC	1.0	NC	NC
Tetrachloroethene	3.1E-02	7.0E-02	1.0	3.1E-02	7.0E-02
Toluene	8.6E-02	4.2E-01	1.0	8.6E-02	4.2E-01
trans-1,3-Dichloropropene	NC	NC	1.0	NC	NC
Trichloroethene	5.6E-02	2.2E-01	1.0	5.6E-02	2.2E-01
Xylenes (total)	3.2E-02	4.5E-02	1.0	3.2E-02	4.5E-02
SVOCs					
Acenaphthene	7.4E-03	7.4E-03	1.0	7.4E-03	7.4E-03
Acenaphthylene	1.5E-03	1.5E-03	1.0	1.5E-03	1.5E-03
Anthracene	4.0E-03	4.0E-03	1.0	4.0E-03	4.0E-03
Benzo(a)anthracene	8.5E-02	1.7E-01	1.0	8.5E-02	1.7E-01
Benzo(a)pyrene	8.5E-02	1.7E-01	1.0	8.5E-02	1.7E-01
Benzo(b)fluoranthene	1.2E-01	3.3E-01	1.0	1.2E-01	3.3E-01
Benzo(e)pyrene	3.4E-03	3.4E-03	1.0	3.4E-03	3.4E-03
Benzo(g,h,i)perylene	8.5E-02	1.7E-01	1.0	8.5E-02	1.7E-01
Benzo(k)fluoranthene	2.7E-05	2.7E-05	1.0	2.7E-05	2.7E-05
bis(2-Ethylhexyl)phthalate	NC	NC	1.0	NC	NC
Butyl benzyl phthalate	NC	NC	1.0	NC	NC
Chrysene	1.0E-01	2.6E-01	1.0	1.0E-01	2.6E-01
Dibenz(a,h)anthracene	2.3E-04	2.3E-04	1.0	2.3E-04	2.3E-04
Dibenzofuran	NC	NC	1.0	NC	NC

Table C3-116 (2 of 3)

Exposure Point Values for Fish
Sodium Reactor Experiment (SRE) Area

Chemical	Sediment EPC		BAF	Fish EPV	
	CTE (mg/kg)	RME (mg/kg)	(unitless)	CTE (mg/kg)	RME (mg/kg)
Diethylphthalate	NC	NC	1.0	NC	NC
Di-n-butylphthalate	NC	NC	1.0	NC	NC
Di-n-octyl phthalate	NC	NC	1.0	NC	NC
Fluoranthene	1.4E-01	4.6E-01	0.1	1.3E-02	4.1E-02
Fluorene	1.0E-02	1.0E-02	1.0	1.0E-02	1.0E-02
Hexachlorobutadiene	NC	NC	1.0	NC	NC
Hexachlorocyclopentadiene	NC	NC	1.0	NC	NC
Indeno(1,2,3-cd)pyrene	8.1E-02	1.5E-01	1.0	8.1E-02	1.5E-01
Naphthalene	NC	NC	5.8	NC	NC
Pentachlorophenol	NC	NC	1.0	NC	NC
Perylene	1.9E-03	1.9E-03	1.0	1.9E-03	1.9E-03
Phenanthrene	9.2E-02	1.9E-01	0.26	2.4E-02	5.0E-02
Pyrene	1.2E-01	3.5E-01	1.0	1.2E-01	3.5E-01
Pesticides					
4,4'-DDT	NC	NC	1.0	NC	NC
Chlordane	NC	NC	1.0	NC	NC
Dieldrin	NC	NC	1.0	NC	NC
Endosulfan I	NC	NC	1.0	NC	NC
Endosulfan II	NC	NC	1.0	NC	NC
Endrin	NC	NC	1.0	NC	NC
Heptachlor	NC	NC	1.0	NC	NC
Heptachlor epoxide	NC	NC	1.0	NC	NC
Toxaphene	NC	NC	1.0	NC	NC
PCDD/PCDFs					
2,3,7,8-TCDD	5.3E-07	5.3E-07	2.5	1.3E-06	1.3E-06
1,2,3,7,8-PeCDD	2.2E-06	2.2E-06	1.4	3.0E-06	3.0E-06
1,2,3,4,7,8-HxCDD	1.0E-05	1.0E-05	0.32	3.2E-06	3.2E-06
1,2,3,6,7,8-HxCDD	3.0E-05	3.0E-05	0.51	1.5E-05	1.5E-05
1,2,3,7,8,9-HxCDD	1.0E-05	1.0E-05	0.18	1.8E-06	1.8E-06
1,2,3,4,6,7,8-HpCDD	1.3E-03	1.3E-03	0.039	5.1E-05	5.1E-05
OCDD	1.9E-02	1.9E-02	0.017	3.1E-04	3.1E-04
2,3,7,8-TCDF	7.9E-07	7.9E-07	1.1	8.8E-07	8.8E-07
1,2,3,7,8-PeCDF	5.8E-07	5.8E-07	0.92	5.3E-07	5.3E-07
2,3,4,7,8-PeCDF	1.6E-06	1.6E-06	1.6	2.6E-06	2.6E-06
1,2,3,4,7,8-HxCDF	3.7E-06	3.7E-06	0.13	4.6E-07	4.6E-07
1,2,3,6,7,8-HxCDF	3.4E-06	3.4E-06	0.48	1.6E-06	1.6E-06
1,2,3,4,6,7,8-HpCDF	1.0E-04	1.0E-04	0.043	4.3E-06	4.3E-06
1,2,3,4,7,8,9-HpCDF	1.0E-05	1.0E-05	1.0	1.0E-05	1.0E-05
OCDF	2.4E-04	2.4E-04	0.018	4.2E-06	4.2E-06
PCBs					
Aroclor-1016	NC	NC	1.0	NC	NC
Aroclor-1221	NC	NC	1.0	NC	NC
Aroclor-1232	NC	NC	1.0	NC	NC
Aroclor-1242	NC	NC	1.0	NC	NC
Aroclor-1248	NC	NC	1.0	NC	NC
Aroclor-1254	7.8E-02	1.1E-01	1.0	7.8E-02	1.1E-01

Table C3-116 (3 of 3)

Exposure Point Values for Fish
Sodium Reactor Experiment (SRE) Area

Chemical	Sediment EPC		BAF	Fish EPV	
	CTE (mg/kg)	RME (mg/kg)	(unitless)	CTE (mg/kg)	RME (mg/kg)
Aroclor-1260	1.1E-01	1.8E-01	1.0	1.1E-01	1.8E-01
PCB-105	1.0E-05	1.5E-05	265.709	2.7E-03	3.9E-03
PCB-114	3.5E-07	5.0E-07	279.874	9.9E-05	1.4E-04
PCB-118	2.1E-05	2.9E-05	320.239	6.7E-03	9.4E-03
PCB-123	2.8E-07	4.2E-07	364.817	1.0E-04	1.5E-04
PCB-126	7.4E-07	1.1E-06	115.065	8.6E-05	1.3E-04
PCB-156	6.3E-06	9.8E-06	369.292	2.3E-03	3.6E-03
PCB-157	2.8E-06	4.4E-06	284.772	7.9E-04	1.3E-03
PCB-167	4.8E-06	7.7E-06	382.873	1.8E-03	2.9E-03
PCB-169	7.2E-08	1.1E-07	1.0	7.2E-08	1.1E-07
PCB-189	7.2E-07	1.1E-06	15.329	1.1E-05	1.8E-05
PCB-77	1.5E-06	2.3E-06	19.180	2.9E-05	4.4E-05
PCB-81	2.7E-07	4.1E-07	128.692	3.5E-05	5.2E-05

Notes:
EPC - exposure point concentration (based on 0 to 2 feet bgs data) as presented in Spreadsheet D-90.
EPV - exposure point value
BAF - bioaccumulation factor approximates the 75th percentile of BAFs measured at SSFL;
if no BAF was available a default of 1 is used.
CTE - central tendancy exposure
RME - reasonable maximum exposure
NC - not selected as a CPEC in the indicated media, per the SRAM (MWH 2005).
CPEC - chemical of potential ecological concern
VOC - volatile organic compound
SVOC - semi-volatile organic compounds
PCB - polychlorinated biphenyls
PCDD/PCDF - polychlorinated dibenzo-p-dioxins and dibenzofurans
mg/kg - milligram per kilogram

Table C3-115 (1 of 3)

Exposure Point Values for the Deer Mouse
Sodium Reactor Experiment (SRE) Area

Chemical	Soil EPC		BAF	Terrestrial Vertebrate EPV	
	CTE (mg/kg)	RME (mg/kg)	(unitless)	CTE (mg/kg)	RME (mg/kg)
Inorganic Compounds					
Aluminum	NC	NC	0.12	NC	NC
Antimony	NC	NC	0.58	NC	NC
Arsenic	NC	NC	1.0	NC	NC
Beryllium	NC	NC	1.0	NC	NC
Cadmium	2.2E-01	3.6E-01	1.0	2.2E-01	3.6E-01
Chromium	NC	NC	0.15	NC	NC
Copper	1.1E+01	2.0E+01	0.76	8.3E+00	1.5E+01
Lead	9.9E+00	1.3E+01	1.0	9.9E+00	1.3E+01
Mercury	1.9E+00	4.1E+00	1.0	1.9E+00	4.1E+00
Methyl Mercury	1.7E-03	3.6E-03	1.0	1.7E-03	3.6E-03
Nickel	NC	NC	0.12	NC	NC
Selenium	NC	NC	5.8	NC	NC
Silver	1.5E+00	3.5E+00	1.0	1.5E+00	3.5E+00
Thallium	8.4E-01	2.1E+00	1.0	8.4E-01	2.1E+00
Vanadium	NC	NC	0.17	NC	NC
Zinc	7.5E+01	1.5E+02	3.5	2.6E+02	5.3E+02
VOCs					
1,1,1-Trichloroethane	NC	NC	1.0	NC	NC
1,1,2-Trichloro-1,2,2-trifluoroethane	1.2E-02	1.2E-02	1.0	1.2E-02	1.2E-02
1,1-Dichloroethane	NC	NC	1.0	NC	NC
2-Butanone	1.8E-02	2.7E-02	1.0	1.8E-02	2.7E-02
Acetone	6.9E-01	2.3E+00	1.0	6.9E-01	2.3E+00
Bromomethane	NC	NC	1.0	NC	NC
Ethylbenzene	NC	NC	1.0	NC	NC
m,p-Xylene	NC	NC	1.0	NC	NC
Methylene chloride	1.0E-02	1.2E-02	1.0	1.0E-02	1.2E-02
Tetrachloroethene	NC	NC	1.0	NC	NC
Toluene	NC	NC	1.0	NC	NC
trans-1,3-Dichloropropene	NC	NC	1.0	NC	NC
Trichloroethene	NC	NC	1.0	NC	NC
Xylenes (total)	NC	NC	1.0	NC	NC
SVOCs					
Acenaphthene	8.8E-02	3.3E-01	1.0	8.8E-02	3.3E-01
Acenaphthylene	6.1E-03	1.7E-02	1.0	6.1E-03	1.7E-02
Anthracene	2.5E-01	1.3E+00	1.0	2.5E-01	1.3E+00
Benzo(a)anthracene	1.1E+00	1.4E+01	16	1.7E+01	2.3E+02
Benzo(a)pyrene	1.1E+00	1.5E+01	5.9	6.7E+00	8.9E+01
Benzo(b)fluoranthene	1.0E+00	1.3E+01	5.3	5.3E+00	6.8E+01
Benzo(e)pyrene	2.4E-02	6.8E-02	1.0	2.4E-02	6.8E-02
Benzo(g,h,i)perylene	3.4E-01	3.1E+00	4.5	1.6E+00	1.4E+01
Benzo(k)fluoranthene	1.1E+00	1.5E+01	7.8	8.8E+00	1.2E+02
bis(2-Ethylhexyl)phthalate	NC	NC	1.0	NC	NC
Butyl benzyl phthalate	NC	NC	1.0	NC	NC
Chrysene	7.7E-01	8.4E+00	6.4	4.9E+00	5.3E+01
Dibenz(a,h)anthracene	1.5E-01	1.4E+00	16	2.5E+00	2.4E+01
Dibenzofuran	2.8E-01	2.8E-01	1.0	2.8E-01	2.8E-01

Table C3-115 (2 of 3)

Exposure Point Values for the Deer Mouse
Sodium Reactor Experiment (SRE) Area

Chemical	Soil EPC		BAF	Terrestrial Vertebrate EPV	
	CTE (mg/kg)	RME (mg/kg)	(unitless)	CTE (mg/kg)	RME (mg/kg)
Diethylphthalate	NC	NC	1.0	NC	NC
Di-n-butylphthalate	NC	NC	1.0	NC	NC
Di-n-octyl phthalate	NC	NC	1.0	NC	NC
Fluoranthene	1.9E+00	2.5E+01	2.3	4.4E+00	5.9E+01
Fluorene	8.9E-02	3.3E-01	1.0	8.9E-02	3.3E-01
Hexachlorobutadiene	NC	NC	1.0	NC	NC
Hexachlorocyclopentadiene	NC	NC	1.0	NC	NC
Indeno(1,2,3-cd)pyrene	4.8E-01	6.4E+00	7.2	3.5E+00	4.6E+01
Naphthalene	NC	NC	1.0	NC	NC
Pentachlorophenol	NC	NC	1.0	NC	NC
Perylene	1.4E-02	3.9E-02	1.0	1.4E-02	3.9E-02
Phenanthrene	9.0E-01	7.5E+00	3.4	3.0E+00	2.5E+01
Pyrene	1.6E+00	1.4E+01	3.6	5.7E+00	5.1E+01
Pesticides					
4,4'-DDT	NC	NC	1.0	NC	NC
Chlordane	NC	NC	1.0	NC	NC
Dieldrin	NC	NC	1.0	NC	NC
Endosulfan I	NC	NC	1.0	NC	NC
Endosulfan II	NC	NC	1.0	NC	NC
Endrin	NC	NC	1.0	NC	NC
Heptachlor	NC	NC	1.0	NC	NC
Heptachlor epoxide	NC	NC	1.0	NC	NC
Toxaphene	NC	NC	1.0	NC	NC
Total Petroleum Hydrocarbons					
C11-C14(Kerosene Range)	9.3E+00	4.0E+01	1.00	9.3E+00	4.0E+01
C14-C20(Diesel Range)	8.7E+00	1.7E+01	1.00	8.7E+00	1.7E+01
C20-C30(Lubricant Oil Range)	9.9E+01	4.7E+02	1.00	9.9E+01	4.7E+02
PCDD/PCDFs					
2,3,7,8-TCDD	1.5E-07	3.5E-07	1.0	1.5E-07	3.5E-07
1,2,3,7,8-PeCDD	5.6E-07	1.3E-06	1.0	5.6E-07	1.3E-06
1,2,3,4,7,8-HxCDD	1.6E-06	3.7E-06	0.24	3.9E-07	8.9E-07
1,2,3,6,7,8-HxCDD	8.3E-06	1.9E-05	0.22	1.8E-06	4.0E-06
1,2,3,7,8,9-HxCDD	3.4E-06	8.7E-06	0.18	6.1E-07	1.6E-06
1,2,3,4,6,7,8-HpCDD	2.4E-04	4.9E-04	0.29	6.8E-05	1.4E-04
OCDD	3.7E-03	7.3E-03	0.21	7.9E-04	1.6E-03
2,3,7,8-TCDF	3.6E-07	7.8E-07	0.19	6.8E-08	1.4E-07
1,2,3,7,8-PeCDF	1.5E-07	3.9E-07	1.0	1.5E-07	3.9E-07
2,3,4,7,8-PeCDF	4.2E-07	9.0E-07	0.44	1.9E-07	4.0E-07
1,2,3,4,7,8-HxCDF	8.8E-07	1.7E-06	0.081	7.1E-08	1.4E-07
1,2,3,6,7,8-HxCDF	7.2E-07	1.6E-06	0.65	4.7E-07	1.1E-06
1,2,3,4,6,7,8-HpCDF	2.8E-05	5.0E-05	0.43	1.2E-05	2.2E-05
1,2,3,4,7,8,9-HpCDF	2.4E-06	4.2E-06	1.0	2.4E-06	4.2E-06
OCDF	7.5E-05	1.5E-04	0.94	7.0E-05	1.4E-04

Table C3-115 (3 of 3)

Exposure Point Values for the Deer Mouse
Sodium Reactor Experiment (SRE) Area

Chemical	Soil EPC		BAF	Terrestrial Vertebrate EPV	
	CTE (mg/kg)	RME (mg/kg)	(unitless)	CTE (mg/kg)	RME (mg/kg)
PCBs					
Aroclor-1016	NC	NC	1.0	NC	NC
Aroclor-1221	NC	NC	1.0	NC	NC
Aroclor-1232	NC	NC	1.0	NC	NC
Aroclor-1242	NC	NC	1.0	NC	NC
Aroclor-1248	NC	NC	1.0	NC	NC
Aroclor-1254	1.6E-01	4.3E-01	1.0	1.6E-01	4.3E-01
Aroclor-1260	1.4E+00	7.7E+00	1.0	1.4E+00	7.7E+00
PCB-105	1.2E-04	6.3E-04	2.7	3.2E-04	1.7E-03
PCB-114	2.3E-06	1.1E-05	6.6	1.5E-05	7.3E-05
PCB-118	2.4E-04	1.3E-03	2.8	6.7E-04	3.5E-03
PCB-123	3.4E-06	1.8E-05	3.4	1.1E-05	6.0E-05
PCB-126	9.2E-06	4.9E-05	1.8	1.7E-05	9.0E-05
PCB-156	7.9E-05	4.2E-04	3.9	3.1E-04	1.6E-03
PCB-157	3.5E-05	1.9E-04	27	9.2E-04	5.0E-03
PCB-167	6.0E-05	3.3E-04	4.9	2.9E-04	1.6E-03
PCB-169	9.0E-07	4.9E-06	1.0	9.0E-07	4.9E-06
PCB-189	9.0E-06	4.9E-05	7.0	6.3E-05	3.4E-04
PCB-77	1.8E-05	9.7E-05	0.77	1.4E-05	7.5E-05
PCB-81	3.3E-06	1.7E-05	1.0	3.3E-06	1.7E-05

Notes:
EPC - exposure point concentration (based on 0 to 2 feet bgs data) as presented in Spreadsheet D-90.
EPV - exposure point value
BAF - bioaccumulation factor approximates the 75th percentile of BAFs measured at SSFL;
if no BAF was available a default of 1 is used.
CTE - central tendancy exposure
RME - reasonable maximum exposure
NC - not selected as a CPEC in the indicated media, per the SRAM (MWH 2005).
CPEC - chemical of potential ecological concern
VOC - volatile organic compound
SVOC - semi-volatile organic compounds
PCB - polychlorinated biphenyls
PCDD/PCDF - polychlorinated dibenzo-p-dioxins and dibenzofurans
mg/kg - milligram per kilogram

Table C3-114 (1 of 3)

Exposure Point Values for Aquatic Invertebrates
Sodium Reactor Experiment (SRE) Area

Chemical	Sediment EPC		BAF	Aquatic Invertebrate EPV	
	CTE (mg/kg)	RME (mg/kg)	(unitless)	CTE (mg/kg)	RME (mg/kg)
Inorganic Compounds					
Aluminum	NC	NC	0.025	NC	NC
Antimony	NC	NC	0.26	NC	NC
Arsenic	NC	NC	0.31	NC	NC
Beryllium	NC	NC	0.19	NC	NC
Cadmium	8.9E-01	4.6E+00	1.0	8.9E-01	4.6E+00
Chromium	NC	NC	0.40	NC	NC
Copper	3.7E+01	6.6E+01	3.1	1.1E+02	2.0E+02
Lead	2.5E+01	5.1E+01	1.0	2.5E+01	5.1E+01
Mercury	6.0E-01	1.1E+00	0.30	1.8E-01	3.4E-01
Methyl Mercury	NC	NC	1.00	NC	NC
Nickel	NC	NC	0.34	NC	NC
Selenium	NC	NC	3.6	NC	NC
Silver	1.4E-01	1.4E-01	1.0	1.4E-01	1.4E-01
Thallium	1.6E-01	1.6E-01	0.29	4.7E-02	4.7E-02
Vanadium	NC	NC	0.035	NC	NC
Zinc	2.9E+02	6.6E+02	0.66	1.9E+02	4.3E+02
VOCs					
1,1,1-Trichloroethane	NC	NC	1.0	NC	NC
1,1,2-Trichloro-1,2,2-trifluoroethane	1.2E-02	1.2E-02	1.0	1.2E-02	1.2E-02
1,1-Dichloroethane	NC	NC	1.0	NC	NC
2-Butanone	NC	NC	1.0	NC	NC
Acetone	NC	NC	1.0	NC	NC
Bromomethane	NC	NC	1.0	NC	NC
Ethylbenzene	NC	NC	1.0	NC	NC
m,p-Xylene	NC	NC	1.0	NC	NC
Methylene chloride	NC	NC	1.0	NC	NC
Tetrachloroethene	3.1E-02	7.0E-02	1.0	3.1E-02	7.0E-02
Toluene	8.6E-02	4.2E-01	1.0	8.6E-02	4.2E-01
trans-1,3-Dichloropropene	NC	NC	1.0	NC	NC
Trichloroethene	5.6E-02	2.2E-01	1.0	5.6E-02	2.2E-01
Xylenes (total)	3.2E-02	4.5E-02	1.0	3.2E-02	4.5E-02
SVOCs					
Acenaphthene	7.4E-03	7.4E-03	1.0	7.4E-03	7.4E-03
Acenaphthylene	1.5E-03	1.5E-03	1.0	1.5E-03	1.5E-03
Anthracene	4.0E-03	4.0E-03	1.0	4.0E-03	4.0E-03
Benzo(a)anthracene	8.5E-02	1.7E-01	1.1	9.4E-02	1.9E-01
Benzo(a)pyrene	8.5E-02	1.7E-01	0.56	4.8E-02	9.6E-02
Benzo(b)fluoranthene	1.2E-01	3.3E-01	1.4	1.6E-01	4.4E-01
Benzo(e)pyrene	3.4E-03	3.4E-03	1.0	3.4E-03	3.4E-03
Benzo(g,h,i)perylene	8.5E-02	1.7E-01	0.64	5.4E-02	1.1E-01
Benzo(k)fluoranthene	2.7E-05	2.7E-05	0.79	2.2E-05	2.2E-05
bis(2-Ethylhexyl)phthalate	NC	NC	1.0	NC	NC
Butyl benzyl phthalate	NC	NC	1.0	NC	NC
Chrysene	1.0E-01	2.6E-01	1.1	1.1E-01	2.8E-01
Dibenz(a,h)anthracene	2.3E-04	2.3E-04	3.2	7.2E-04	7.2E-04
Dibenzofuran	NC	NC	1.0	NC	NC

Table C3-114 (2 of 3)

Exposure Point Values for Aquatic Invertebrates
Sodium Reactor Experiment (SRE) Area

Chemical	Sediment EPC		BAF	Aquatic Invertebrate EPV	
	CTE (mg/kg)	RME (mg/kg)	(unitless)	CTE (mg/kg)	RME (mg/kg)
Diethylphthalate	NC	NC	1.0	NC	NC
Di-n-butylphthalate	NC	NC	1.0	NC	NC
Di-n-octyl phthalate	NC	NC	1.0	NC	NC
Fluoranthene	1.4E-01	4.6E-01	0.83	1.2E-01	3.9E-01
Fluorene	1.0E-02	1.0E-02	1.0	1.0E-02	1.0E-02
Hexachlorobutadiene	NC	NC	1.0	NC	NC
Hexachlorocyclopentadiene	NC	NC	1.0	NC	NC
Indeno(1,2,3-cd)pyrene	8.1E-02	1.5E-01	0.63	5.1E-02	9.7E-02
Naphthalene	NC	NC	1.0	NC	NC
Pentachlorophenol	NC	NC	1.0	NC	NC
Perylene	1.9E-03	1.9E-03	1.0	1.9E-03	1.9E-03
Phenanthrene	9.2E-02	1.9E-01	1.5	1.4E-01	2.9E-01
Pyrene	1.2E-01	3.5E-01	0.59	7.1E-02	2.1E-01
Pesticides					
4,4'-DDT	NC	NC	1.0	NC	NC
Chlordane	NC	NC	1.0	NC	NC
Dieldrin	NC	NC	1.0	NC	NC
Endosulfan I	NC	NC	1.0	NC	NC
Endosulfan II	NC	NC	1.0	NC	NC
Endrin	NC	NC	1.0	NC	NC
Heptachlor	NC	NC	1.0	NC	NC
Heptachlor epoxide	NC	NC	1.0	NC	NC
Toxaphene	NC	NC	1.0	NC	NC
PCDD/PCDFs					
2,3,7,8-TCDD	5.3E-07	5.3E-07	0.82	4.4E-07	4.4E-07
1,2,3,7,8-PeCDD	2.2E-06	2.2E-06	0.57	1.3E-06	1.3E-06
1,2,3,4,7,8-HxCDD	1.0E-05	1.0E-05	0.36	3.6E-06	3.6E-06
1,2,3,6,7,8-HxCDD	3.0E-05	3.0E-05	0.36	1.1E-05	1.1E-05
1,2,3,7,8,9-HxCDD	1.0E-05	1.0E-05	0.28	2.8E-06	2.8E-06
1,2,3,4,6,7,8-HpCDD	1.3E-03	1.3E-03	0.14	1.8E-04	1.8E-04
OCDD	1.9E-02	1.9E-02	0.17	3.2E-03	3.2E-03
2,3,7,8-TCDF	7.9E-07	7.9E-07	2.5	2.0E-06	2.0E-06
1,2,3,7,8-PeCDF	5.8E-07	5.8E-07	1.0	5.9E-07	5.9E-07
2,3,4,7,8-PeCDF	1.6E-06	1.6E-06	0.69	1.1E-06	1.1E-06
1,2,3,4,7,8-HxCDF	3.7E-06	3.7E-06	0.42	1.5E-06	1.5E-06
1,2,3,6,7,8-HxCDF	3.4E-06	3.4E-06	0.36	1.2E-06	1.2E-06
1,2,3,4,6,7,8-HpCDF	1.0E-04	1.0E-04	0.12	1.2E-05	1.2E-05
1,2,3,4,7,8,9-HpCDF	1.0E-05	1.0E-05	0.073	7.3E-07	7.3E-07
OCDF	2.4E-04	2.4E-04	0.040	9.6E-06	9.6E-06
PCBs					
Aroclor-1016	NC	NC	1.0	NC	NC
Aroclor-1221	NC	NC	1.0	NC	NC
Aroclor-1232	NC	NC	1.0	NC	NC
Aroclor-1242	NC	NC	1.0	NC	NC
Aroclor-1248	NC	NC	1.0	NC	NC
Aroclor-1254	7.8E-02	1.1E-01	1.0	7.8E-02	1.1E-01

Table C3-114 (3 of 3)

Exposure Point Values for Aquatic Invertebrates
Sodium Reactor Experiment (SRE) Area

Chemical	Sediment EPC		BAF	Aquatic Invertebrate EPV	
	CTE (mg/kg)	RME (mg/kg)	(unitless)	CTE (mg/kg)	RME (mg/kg)
Aroclor-1260	1.1E-01	1.8E-01	1.0	1.1E-01	1.8E-01
PCB-105	1.0E-05	1.5E-05	23	2.3E-04	3.4E-04
PCB-114	3.5E-07	5.0E-07	33	1.2E-05	1.7E-05
PCB-118	2.1E-05	2.9E-05	27	5.5E-04	7.8E-04
PCB-123	2.8E-07	4.2E-07	40	1.1E-05	1.7E-05
PCB-126	7.4E-07	1.1E-06	15	1.1E-05	1.7E-05
PCB-156	6.3E-06	9.8E-06	29	1.8E-04	2.8E-04
PCB-157	2.8E-06	4.4E-06	25	6.9E-05	1.1E-04
PCB-167	4.8E-06	7.7E-06	34	1.6E-04	2.6E-04
PCB-169	7.2E-08	1.1E-07	1.0	7.2E-08	1.1E-07
PCB-189	7.2E-07	1.1E-06	3.2	2.3E-06	3.7E-06
PCB-77	1.5E-06	2.3E-06	11	1.7E-05	2.6E-05
PCB-81	2.7E-07	4.1E-07	1.8	4.9E-07	7.3E-07

Notes:
EPC - exposure point concentration (based on 0 to 2 feet bgs data) as presented in Spreadsheet D-90.
EPV - exposure point value
BAF - bioaccumulation factor approximates the 75th percentile of BAFs measured at SSFL;
if no BAF was available a default of 1 is used.
CTE - central tendancy exposure
RME - reasonable maximum exposure
NC - not selected as a CPEC in the indicated media, per the SRAM (MWH 2005).
CPEC - chemical of potential ecological concern
VOC - volatile organic compound
SVOC - semi-volatile organic compounds
PCB - polychlorinated biphenyls
PCDD/PCDF - polychlorinated dibenzo-p-dioxins and dibenzofurans
mg/kg - milligram per kilogram

Exposure Point Values for Terrestrial Plants - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Chemical	Soil EPC		BAF	Plant EPV	
	CTE (mg/kg)	RME (mg/kg)	(unitless)	CTE (mg/kg)	RME (mg/kg)
Inorganic Compounds					
Aluminum	NC	NC	0.74	NC	NC
Antimony	NC	NC	5.4	NC	NC
Arsenic	NC	NC	0.77	NC	NC
Beryllium	NC	NC	0.61	NC	NC
Cadmium	2.4E-01	4.2E-01	11	2.6E+00	4.5E+00
Chromium	NC	NC	9.4	NC	NC
Copper	9.9E+00	2.0E+01	1.9	1.9E+01	3.7E+01
Lead	9.3E+00	1.3E+01	2.1	2.0E+01	2.7E+01
Mercury	2.1E+00	5.5E+00	0.82	1.7E+00	4.5E+00
Methyl Mercury	1.7E-03	3.6E-03	1.00	1.7E-03	3.6E-03
Nickel	NC	NC	7.7	NC	NC
Selenium	NC	NC	1.0	NC	NC
Silver	1.0E+00	2.7E+00	1.7	1.7E+00	4.6E+00
Thallium	3.3E-01	3.3E-01	0.51	1.7E-01	1.7E-01
Vanadium	NC	NC	0.69	NC	NC
Zinc	8.4E+01	1.9E+02	1.6	1.4E+02	3.1E+02
VOCs					
1,1,1-Trichloroethane	NC	NC	1.0	NC	NC
1,1,2-Trichloro-1,2,2-trifluoroethane	1.2E-02	1.2E-02	1.0	1.2E-02	1.2E-02
1,1-Dichloroethane	NC	NC	1.0	NC	NC
2-Butanone	2.1E-02	3.5E-02	1.0	2.1E-02	3.5E-02
Acetone	1.1E+00	5.2E+00	1.0	1.1E+00	5.2E+00
Bromomethane	NC	NC	1.0	NC	NC
Ethylbenzene	NC	NC	1.0	NC	NC
m,p-Xylene	NC	NC	1.0	NC	NC
Methylene chloride	1.0E-02	1.3E-02	1.0	1.0E-02	1.3E-02
Tetrachloroethene	NC	NC	1.0	NC	NC
Toluene	NC	NC	1.0	NC	NC
trans-1,3-Dichloropropene	NC	NC	1.0	NC	NC
Trichloroethene	NC	NC	1.0	NC	NC
Xylenes (total)	NC	NC	1.0	NC	NC
SVOCs					
Acenaphthene	2.6E-02	1.1E-01	1.0	2.6E-02	1.1E-01
Acenaphthylene	4.6E-03	1.6E-02	1.0	4.6E-03	1.6E-02
Anthracene	1.8E-02	7.3E-02	1.0	1.8E-02	7.3E-02
Benzo(a)anthracene	2.8E-03	8.8E-03	5.2	1.5E-02	4.6E-02
Benzo(a)pyrene	3.0E-03	8.9E-03	1.0	3.0E-03	8.9E-03
Benzo(b)fluoranthene	4.3E-03	1.1E-02	1.0	4.3E-03	1.1E-02
Benzo(e)pyrene	2.0E-02	6.7E-02	1.0	2.0E-02	6.7E-02
Benzo(g,h,i)perylene	1.2E-02	4.4E-02	1.0	1.2E-02	4.4E-02
Benzo(k)fluoranthene	2.8E-03	8.3E-03	1.0	2.8E-03	8.3E-03
bis(2-Ethylhexyl)phthalate	NC	NC	1.0	NC	NC
Butyl benzyl phthalate	NC	NC	1.0	NC	NC
Chrysene	5.1E-03	1.2E-02	2.8	1.4E-02	3.4E-02
Dibenz(a,h)anthracene	1.9E-03	6.9E-03	1.0	1.9E-03	6.9E-03
Dibenzofuran	NC	NC	1.0	NC	NC
Diethylphthalate	NC	NC	1.0	NC	NC
Di-n-butylphthalate	NC	NC	1.0	NC	NC
Di-n-octyl phthalate	NC	NC	1.0	NC	NC
Fluoranthene	5.6E-03	1.2E-02	2.8	1.6E-02	3.4E-02
Fluorene	2.6E-02	1.1E-01	1.0	2.6E-02	1.1E-01
Hexachlorobutadiene	NC	NC	1.0	NC	NC

Exposure Point Values for Terrestrial Plants - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Chemical	Soil EPC		BAF	Plant EPV	
	CTE (mg/kg)	RME (mg/kg)	(unitless)	CTE (mg/kg)	RME (mg/kg)
Hexachlorocyclopentadiene	NC	NC	1.0	NC	NC
Indeno(1,2,3-cd)pyrene	2.7E-03	8.5E-03	1.0	2.7E-03	8.5E-03
Naphthalene	NC	NC	1.0	NC	NC
Pentachlorophenol	NC	NC	1.0	NC	NC
Perylene	1.1E-02	3.8E-02	1.0	1.1E-02	3.8E-02
Phenanthrene	7.1E-02	3.0E-01	7.2	5.1E-01	2.1E+00
Pyrene	8.2E-03	2.8E-02	1.9	1.6E-02	5.4E-02
Pesticides					
4,4'-DDT	NC	NC	1.0	NC	NC
Chlordane	NC	NC	1.0	NC	NC
Dieldrin	NC	NC	1.0	NC	NC
Endosulfan I	NC	NC	1.0	NC	NC
Endosulfan II	NC	NC	1.0	NC	NC
Endrin	NC	NC	1.0	NC	NC
Heptachlor	NC	NC	1.0	NC	NC
Heptachlor epoxide	NC	NC	1.0	NC	NC
Toxaphene	NC	NC	1.0	NC	NC
PCDD/PCDFs					
2,3,7,8-TCDD	1.9E-07	4.0E-07	1.0	1.9E-07	4.0E-07
1,2,3,7,8-PeCDD	7.3E-07	1.5E-06	1.0	7.3E-07	1.5E-06
1,2,3,4,7,8-HxCDD	2.1E-06	4.2E-06	1.0	2.1E-06	4.2E-06
1,2,3,6,7,8-HxCDD	1.1E-05	2.0E-05	0.16	1.8E-06	3.3E-06
1,2,3,7,8,9-HxCDD	4.5E-06	1.0E-05	1.0	4.5E-06	1.0E-05
1,2,3,4,6,7,8-HpCDD	3.1E-04	5.0E-04	0.32	1.0E-04	1.6E-04
OCDD	5.0E-03	7.3E-03	0.23	1.2E-03	1.7E-03
2,3,7,8-TCDF	4.7E-07	7.9E-07	1.0	4.7E-07	7.9E-07
1,2,3,7,8-PeCDF	1.8E-07	3.9E-07	1.0	1.8E-07	3.9E-07
2,3,4,7,8-PeCDF	5.4E-07	9.9E-07	1.0	5.4E-07	9.9E-07
1,2,3,4,7,8-HxCDF	1.2E-06	1.8E-06	1.0	1.2E-06	1.8E-06
1,2,3,6,7,8-HxCDF	9.5E-07	1.8E-06	1.0	9.5E-07	1.8E-06
1,2,3,4,6,7,8-HpCDF	3.7E-05	5.0E-05	0.23	8.3E-06	1.1E-05
1,2,3,4,7,8,9-HpCDF	3.2E-06	4.2E-06	1.0	3.2E-06	4.2E-06
OCDF	1.0E-04	1.5E-04	0.33	3.3E-05	5.0E-05
PCBs					
Aroclor-1016	NC	NC	1.0	NC	NC
Aroclor-1221	NC	NC	1.0	NC	NC
Aroclor-1232	NC	NC	1.0	NC	NC
Aroclor-1242	NC	NC	1.0	NC	NC
Aroclor-1248	NC	NC	1.0	NC	NC
Aroclor-1254	1.7E-01	4.3E-01	1.0	1.7E-01	4.3E-01
Aroclor-1260	1.5E+00	7.8E+00	1.0	1.5E+00	7.8E+00
PCB-105	1.3E-04	6.4E-04	3.3	4.2E-04	2.1E-03
PCB-114	2.4E-06	1.1E-05	3.7	8.8E-06	4.2E-05
PCB-118	2.5E-04	1.3E-03	3.2	8.0E-04	4.0E-03
PCB-123	3.5E-06	1.8E-05	3.4	1.2E-05	6.2E-05
PCB-126	9.6E-06	5.0E-05	2.2	2.1E-05	1.1E-04
PCB-156	8.3E-05	4.3E-04	2.5	2.1E-04	1.1E-03
PCB-157	3.6E-05	1.9E-04	2.6	9.6E-05	5.0E-04
PCB-167	6.3E-05	3.3E-04	2.8	1.8E-04	9.2E-04
PCB-169	9.4E-07	5.0E-06	1.0	9.4E-07	5.0E-06
PCB-189	9.4E-06	5.0E-05	2.2	2.0E-05	1.1E-04
PCB-77	1.9E-05	9.9E-05	2.4	4.7E-05	2.4E-04

Spreadsheet C3-113b (3 of 3)

Exposure Point Values for Terrestrial Plants - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Chemical	Soil EPC		BAF	Plant EPV	
	CTE (mg/kg)	RME (mg/kg)	(unitless)	CTE (mg/kg)	RME (mg/kg)
PCB-81	3.4E-06	1.8E-05	3.0	1.0E-05	5.3E-05

Notes:
EPC - exposure point concentration (based on 0 to 2 feet bgs data) as presented in Spreadsheet D-90.
EPV - exposure point value
BAF - bioaccumulation factor approximates the 75th percentile of BAFs measured at SSFL;
if no BAF was available a default of 1 is used.
CTE - central tendancy exposure
RME - reasonable maximum exposure
NC - not selected as a CPEC in the indicated media, per the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compounds
PCB - polychlorinated biphenyls
PCDD/PCDF - polychlorinated dibenzo-p-dioxins and dibenzofurans
mg/kg - milligram per kilogram

Exposure Point Values for Terrestrial Plants - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Chemical	Soil EPC		BAF	Plant EPV	
	CTE (mg/kg)	RME (mg/kg)	(unitless)	CTE (mg/kg)	RME (mg/kg)
Inorganic Compounds					
Cadmium	5.1E-01	1.1E+00	11	5.5E+00	1.2E+01
Copper	2.1E+01	4.6E+01	2	4.0E+01	8.6E+01
Lead	1.6E+01	3.4E+01	2	3.4E+01	7.2E+01
Mercury	1.9E+00	4.4E+00	1	1.6E+00	3.6E+00
Methyl Mercury	1.7E-03	3.6E-03	1	1.7E-03	3.6E-03
Silver	7.7E-01	2.9E+00	2	1.3E+00	4.8E+00
Thallium	3.3E-01	3.3E-01	1	1.7E-01	1.7E-01
Zinc	1.7E+02	4.4E+02	2	2.8E+02	7.1E+02
VOCs					
1,1,1-Trichloroethane	NC	NC	1	NC	NC
1,1,2-Trichloro-1,2,2-trifluoroethane	1.2E-02	1.2E-02	1	1.2E-02	1.2E-02
1,1-Dichloroethane	NC	NC	1	NC	NC
1,2-Dichloroethene (total)	2.8E-02	7.0E-02	1	2.8E-02	7.0E-02
2-Butanone	3.7E-02	3.7E-02	1	3.7E-02	3.7E-02
Acetone	6.8E-01	4.2E+00	1	6.8E-01	4.2E+00
Ethylbenzene	NC	NC	1	NC	NC
m,p-Xylene	NC	NC	1	NC	NC
Methylene chloride	1.3E-02	1.3E-02	1	1.3E-02	1.3E-02
Tetrachloroethene	2.1E-02	8.8E-02	1	2.1E-02	8.8E-02
Toluene	5.6E-02	3.4E-01	1	5.6E-02	3.4E-01
Trichloroethene	3.7E-02	2.0E-01	1	3.7E-02	2.0E-01
Xylenes (total)	2.5E-02	5.1E-02	1	2.5E-02	5.1E-02
SVOCs					
Acenaphthene	4.4E-02	1.0E-01	1	4.4E-02	1.0E-01
Acenaphthylene	3.1E-02	8.5E-02	1	3.1E-02	8.5E-02
Anthracene	3.9E-02	8.2E-02	1	3.9E-02	8.2E-02
Benzo(a)anthracene	3.6E-02	1.5E-01	5	1.9E-01	7.8E-01
Benzo(a)pyrene	3.6E-02	1.5E-01	1	3.6E-02	1.5E-01
Benzo(b)fluoranthene	4.9E-02	2.7E-01	1	4.9E-02	2.7E-01
Benzo(e)pyrene	1.9E-02	6.3E-02	1	1.9E-02	6.3E-02
Benzo(g,h,i)perylene	4.1E-02	9.0E-02	1	4.1E-02	9.0E-02
Benzo(k)fluoranthene	3.0E-02	8.5E-02	1	3.0E-02	8.5E-02
Chrysene	4.4E-02	2.2E-01	3	1.2E-01	6.0E-01
Dibenz(a,h)anthracene	2.9E-02	8.5E-02	1	2.9E-02	8.5E-02
Dibenzofuran	NC	NC	1	NC	NC
Fluoranthene	6.0E-02	3.8E-01	3	1.7E-01	1.1E+00
Fluorene	4.4E-02	1.0E-01	1	4.4E-02	1.0E-01
Indeno(1,2,3-cd)pyrene	3.4E-02	1.4E-01	1	3.4E-02	1.4E-01
Naphthalene	NC	NC	1	NC	NC
Perylene	1.1E-02	3.6E-02	1	1.1E-02	3.6E-02
Phenanthrene	7.9E-02	2.0E-01	7	5.7E-01	1.4E+00
Pyrene	5.3E-02	1.6E-01	2	1.0E-01	3.0E-01
Total Petroleum Hydrocarbons					
C11-C14(Kerosene Range)	9.7E+00	4.0E+01	1	9.7E+00	4.0E+01
C14-C20(Diesel Range)	NC	NC	1	NC	NC
C20-C30(Lubricant Oil Range)	7.3E+01	4.7E+02	1	7.3E+01	4.7E+02

Spreadsheet C3-113a (2 of 2)

Exposure Point Values for Terrestrial Plants - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Chemical	Soil EPC		BAF	Plant EPV	
	CTE (mg/kg)	RME (mg/kg)	(unitless)	CTE (mg/kg)	RME (mg/kg)
PCDD/PCDFs					
2,3,7,8-TCDD	2.7E-07	5.3E-07	1	2.7E-07	5.3E-07
1,2,3,7,8-PeCDD	1.1E-06	2.2E-06	1	1.1E-06	2.2E-06
1,2,3,4,7,8-HxCDD	4.1E-06	9.0E-06	1	4.1E-06	9.0E-06
1,2,3,6,7,8-HxCDD	1.6E-05	3.0E-05	0	2.6E-06	4.8E-06
1,2,3,7,8,9-HxCDD	5.9E-06	1.0E-05	1	5.9E-06	1.0E-05
1,2,3,4,6,7,8-HpCDD	5.7E-04	1.2E-03	0	1.8E-04	3.8E-04
OCDD	8.4E-03	1.7E-02	0	2.0E-03	3.9E-03
2,3,7,8-TCDF	5.5E-07	7.9E-07	1	5.5E-07	7.9E-07
1,2,3,7,8-PeCDF	2.8E-07	5.7E-07	1	2.8E-07	5.7E-07
2,3,4,7,8-PeCDF	8.2E-07	1.6E-06	1	8.2E-07	1.6E-06
1,2,3,4,7,8-HxCDF	1.8E-06	3.3E-06	1	1.8E-06	3.3E-06
1,2,3,6,7,8-HxCDF	1.6E-06	3.2E-06	1	1.6E-06	3.2E-06
2,3,4,6,7,8-HxCDF	3.8E-06	8.8E-06	1	3.8E-06	8.8E-06
1,2,3,7,8,9-HxCDF	3.6E-07	9.7E-07	1	3.6E-07	9.7E-07
1,2,3,4,6,7,8-HpCDF	5.3E-05	9.6E-05	0	1.2E-05	2.2E-05
1,2,3,4,7,8,9-HpCDF	4.9E-06	9.2E-06	1	4.9E-06	9.2E-06
OCDF	1.4E-04	2.4E-04	0	4.5E-05	7.9E-05
PCBs					
Aroclor-1254	1.6E-01	4.3E-01	1	1.6E-01	4.3E-01
Aroclor-1260	1.3E+00	7.3E+00	1	1.3E+00	7.3E+00
PCB-105	1.1E-04	5.6E-04	3	3.8E-04	1.9E-03
PCB-114	2.2E-06	1.0E-05	4	8.0E-06	3.7E-05
PCB-118	2.3E-04	1.1E-03	3	7.2E-04	3.6E-03
PCB-123	3.2E-06	1.6E-05	3	1.1E-05	5.5E-05
PCB-126	8.8E-06	4.4E-05	2	1.9E-05	9.8E-05
PCB-156	7.5E-05	3.8E-04	2	1.9E-04	9.4E-04
PCB-157	3.3E-05	1.7E-04	3	8.7E-05	4.5E-04
PCB-167	5.7E-05	2.9E-04	3	1.6E-04	8.2E-04
PCB-169	8.6E-07	4.4E-06	1	8.6E-07	4.4E-06
PCB-189	8.6E-06	4.4E-05	2	1.9E-05	9.5E-05
PCB-77	1.8E-05	8.8E-05	2	4.2E-05	2.1E-04
PCB-81	3.1E-06	1.6E-05	3	9.3E-06	4.7E-05

Notes:
EPC - exposure point concentration (based on 0 to 2 feet bgs data) as presented in Spreadsheet D-90.
EPV - exposure point value
BAF - bioaccumulation factor approximates the 75th percentile of BAFs measured at SSFL;
if no BAF was available a default of 1 is used.
CTE - central tendancy exposure
RME - reasonable maximum exposure
NC - not selected as a CPEC in the indicated media, per the SRAM (MWH 2005).
CPEC - chemical of potential ecological concern
VOC - volatile organic compound
SVOC - semi-volatile organic compounds
PCB - polychlorinated biphenyls
PCDD/PCDF - polychlorinated dibenzo-p-dioxins and dibenzofurans
mg/kg - milligram per kilogram

Exposure Point Values for Terrestrial Invertebrates - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Chemical	Soil EPC		BAF	Earthworm EPV	
	CTE (mg/kg)	RME (mg/kg)	(unitless)	CTE (mg/kg)	RME (mg/kg)
Inorganic Compounds					
Aluminum	NC	NC	0.37	NC	NC
Antimony	NC	NC	7.8	NC	NC
Arsenic	NC	NC	0.47	NC	NC
Beryllium	NC	NC	0.28	NC	NC
Cadmium	2.4E-01	4.2E-01	20	4.7E+00	8.2E+00
Chromium	NC	NC	2.4	NC	NC
Copper	9.9E+00	2.0E+01	15	1.5E+02	2.9E+02
Lead	9.3E+00	1.3E+01	0.24	2.3E+00	3.1E+00
Mercury	2.1E+00	5.5E+00	3.3	7.0E+00	1.8E+01
Methyl Mercury	1.7E-03	3.6E-03	1.0	1.7E-03	3.6E-03
Nickel	NC	NC	2.1	NC	NC
Selenium	NC	NC	1.8	NC	NC
Silver	1.0E+00	2.7E+00	6.6	6.7E+00	1.8E+01
Thallium	3.3E-01	3.3E-01	1.1	3.6E-01	3.6E-01
Vanadium	NC	NC	0.32	NC	NC
Zinc	8.4E+01	1.9E+02	3.1	2.6E+02	5.9E+02
VOCs					
1,1,1-Trichloroethane	NC	NC	1.0	NC	NC
1,1,2-Trichloro-1,2,2-trifluoroethane	1.2E-02	1.2E-02	1.0	1.2E-02	1.2E-02
1,1-Dichloroethane	NC	NC	1.0	NC	NC
2-Butanone	2.1E-02	3.5E-02	1.0	2.1E-02	3.5E-02
Acetone	1.1E+00	5.2E+00	1.0	1.1E+00	5.2E+00
Bromomethane	NC	NC	1.0	NC	NC
Ethylbenzene	NC	NC	1.0	NC	NC
m,p-Xylene	NC	NC	1.0	NC	NC
Methylene chloride	1.0E-02	1.3E-02	1.0	1.0E-02	1.3E-02
Tetrachloroethene	NC	NC	1.0	NC	NC
Toluene	NC	NC	1.0	NC	NC
trans-1,3-Dichloropropene	NC	NC	1.0	NC	NC
Trichloroethene	NC	NC	1.0	NC	NC
Xylenes (total)	NC	NC	1.0	NC	NC
SVOCs					
Acenaphthene	2.6E-02	1.1E-01	2.4	6.3E-02	2.7E-01
Acenaphthylene	4.6E-03	1.6E-02	1.0	4.6E-03	1.6E-02
Anthracene	1.8E-02	7.3E-02	2.8	5.0E-02	2.0E-01
Benzo(a)anthracene	2.8E-03	8.8E-03	1.9	5.4E-03	1.7E-02
Benzo(a)pyrene	3.0E-03	8.9E-03	1.0	3.0E-03	8.9E-03
Benzo(b)fluoranthene	4.3E-03	1.1E-02	2.0	8.8E-03	2.3E-02
Benzo(e)pyrene	2.0E-02	6.7E-02	1.1	2.2E-02	7.3E-02
Benzo(g,h,i)perylene	1.2E-02	4.4E-02	0.53	6.3E-03	2.4E-02
Benzo(k)fluoranthene	2.8E-03	8.3E-03	0.89	2.5E-03	7.4E-03
bis(2-Ethylhexyl)phthalate	NC	NC	1.0	NC	NC
Butyl benzyl phthalate	NC	NC	1.0	NC	NC
Chrysene	5.1E-03	1.2E-02	1.9	9.5E-03	2.3E-02
Dibenz(a,h)anthracene	1.9E-03	6.9E-03	1.0	1.9E-03	6.9E-03
Dibenzofuran	NC	NC	1.0	NC	NC
Diethylphthalate	NC	NC	1.0	NC	NC
Di-n-butylphthalate	NC	NC	1.0	NC	NC
Di-n-octyl phthalate	NC	NC	1.0	NC	NC
Fluoranthene	5.6E-03	1.2E-02	0.91	5.1E-03	1.1E-02
Fluorene	2.6E-02	1.1E-01	3.9	1.0E-01	4.3E-01
Hexachlorobutadiene	NC	NC	1.0	NC	NC
Hexachlorocyclopentadiene	NC	NC	1.0	NC	NC
Indeno(1,2,3-cd)pyrene	2.7E-03	8.5E-03	0.86	2.3E-03	7.3E-03

Exposure Point Values for Terrestrial Invertebrates - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Chemical	Soil EPC		BAF	Earthworm EPV	
	CTE (mg/kg)	RME (mg/kg)	(unitless)	CTE (mg/kg)	RME (mg/kg)
Inorganic Compounds					
Naphthalene	NC	NC	1.0	NC	NC
Pentachlorophenol	NC	NC	1.0	NC	NC
Perylene	1.1E-02	3.8E-02	1.0	1.1E-02	3.8E-02
Phenanthrene	7.1E-02	3.0E-01	1.8	1.3E-01	5.5E-01
Pyrene	8.2E-03	2.8E-02	2.9	2.4E-02	8.2E-02
Pesticides					
4,4'-DDT	NC	NC	1.0	NC	NC
Chlordane	NC	NC	1.0	NC	NC
Dieldrin	NC	NC	1.0	NC	NC
Endosulfan I	NC	NC	1.0	NC	NC
Endosulfan II	NC	NC	1.0	NC	NC
Endrin	NC	NC	1.0	NC	NC
Heptachlor	NC	NC	1.0	NC	NC
Heptachlor epoxide	NC	NC	1.0	NC	NC
Toxaphene	NC	NC	1.0	NC	NC
Total Petroleum Hydrocarbons					
C11-C14(Kerosene Range)	1.0E+01	4.0E+01	1	1.0E+01	4.0E+01
C14-C20(Diesel Range)	NC	NC	1	NC	NC
C20-C30(Lubricant Oil Range)	7.8E+01	4.7E+02	1	7.8E+01	4.7E+02
PCDD/PCDFs					
2,3,7,8-TCDD	1.9E-07	4.0E-07	1.0	1.9E-07	4.0E-07
1,2,3,7,8-PeCDD	7.3E-07	1.5E-06	0.88	6.4E-07	1.3E-06
1,2,3,4,7,8-HxCDD	2.1E-06	4.2E-06	0.78	1.7E-06	3.3E-06
1,2,3,6,7,8-HxCDD	1.1E-05	2.0E-05	0.77	8.5E-06	1.5E-05
1,2,3,7,8,9-HxCDD	4.5E-06	1.0E-05	0.93	4.2E-06	9.3E-06
1,2,3,4,6,7,8-HpCDD	3.1E-04	5.0E-04	0.54	1.7E-04	2.7E-04
OCDD	5.0E-03	7.3E-03	0.47	2.3E-03	3.4E-03
2,3,7,8-TCDF	4.7E-07	7.9E-07	1.0	4.8E-07	8.0E-07
1,2,3,7,8-PeCDF	1.8E-07	3.9E-07	0.43	7.5E-08	1.7E-07
2,3,4,7,8-PeCDF	5.4E-07	9.9E-07	0.51	2.8E-07	5.1E-07
1,2,3,4,7,8-HxCDF	1.2E-06	1.8E-06	0.65	7.5E-07	1.2E-06
1,2,3,6,7,8-HxCDF	9.5E-07	1.8E-06	0.26	2.4E-07	4.7E-07
1,2,3,4,6,7,8-HpCDF	3.7E-05	5.0E-05	0.54	2.0E-05	2.7E-05
1,2,3,4,7,8,9-HpCDF	3.2E-06	4.2E-06	1.0	3.2E-06	4.2E-06
OCDF	1.0E-04	1.5E-04	0.50	5.0E-05	7.6E-05
PCBs					
Aroclor-1016	NC	NC	1.0	NC	NC
Aroclor-1221	NC	NC	1.0	NC	NC
Aroclor-1232	NC	NC	1.0	NC	NC
Aroclor-1242	NC	NC	1.0	NC	NC
Aroclor-1248	NC	NC	1.0	NC	NC
Aroclor-1254	1.7E-01	4.3E-01	1.0	1.7E-01	4.3E-01
Aroclor-1260	1.5E+00	7.8E+00	1.0	1.5E+00	7.8E+00
PCB-105	1.3E-04	6.4E-04	10	1.3E-03	6.6E-03
PCB-114	2.4E-06	1.1E-05	27	6.3E-05	3.0E-04
PCB-118	2.5E-04	1.3E-03	11	2.9E-03	1.5E-02
PCB-123	3.5E-06	1.8E-05	13	4.4E-05	2.3E-04
PCB-126	9.6E-06	5.0E-05	5.3	5.1E-05	2.6E-04
PCB-156	8.3E-05	4.3E-04	5.8	4.8E-04	2.5E-03
PCB-157	3.6E-05	1.9E-04	5.9	2.1E-04	1.1E-03
PCB-167	6.3E-05	3.3E-04	5.9	3.7E-04	2.0E-03
PCB-169	9.4E-07	5.0E-06	1.0	9.4E-07	5.0E-06

Spreadsheet C3-112b (3 of 3)

Exposure Point Values for Terrestrial Invertebrates - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Chemical	Soil EPC		BAF	Earthworm EPV	
	CTE (mg/kg)	RME (mg/kg)	(unitless)	CTE (mg/kg)	RME (mg/kg)
Inorganic Compounds					
PCB-189	9.4E-06	5.0E-05	2.4	2.2E-05	1.2E-04
PCB-77	1.9E-05	9.9E-05	6.2	1.2E-04	6.2E-04
PCB-81	3.4E-06	1.8E-05	6.0	2.1E-05	1.0E-04

Notes:
EPC - exposure point concentration (based on 0 to 2 feet bgs data) as presented in Spreadsheet D-90.
EPV - exposure point value
BAF - bioaccumulation factor approximates the 75th percentile of BAFs measured at SSFL;
if no BAF was available a default of 1 is used.
CTE - central tendancy exposure
RME - reasonable maximum exposure
NC - not selected as a CPEC in the indicated media, per the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compounds
PCB - polychlorinated biphenyls
PCDD/PCDF - polychlorinated dibenzo-p-dioxins and dibenzofurans
mg/kg - milligram per kilogram

Spreadsheet C3-112a (1 of 2)

Exposure Point Values for Terrestrial Invertebrates - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Chemical	Soil EPC		BAF	Earthworm EPV	
	CTE (mg/kg)	RME (mg/kg)	(unitless)	CTE (mg/kg)	RME (mg/kg)
Inorganic Compounds					
Cadmium	5.1E-01	1.1E+00	20	1.0E+01	2.2E+01
Copper	2.1E+01	4.6E+01	15	3.1E+02	6.7E+02
Lead	1.6E+01	3.4E+01	0	3.9E+00	8.2E+00
Mercury	1.9E+00	4.4E+00	3	6.3E+00	1.5E+01
Methyl Mercury	1.7E-03	3.6E-03	1	1.7E-03	3.6E-03
Silver	7.7E-01	2.9E+00	7	5.1E+00	1.9E+01
Thallium	3.3E-01	3.3E-01	1	3.6E-01	3.6E-01
Zinc	1.7E+02	4.4E+02	3	5.3E+02	1.4E+03
VOCs					
1,1,1-Trichloroethane	NC	NC	1	NC	NC
1,1,2-Trichloro-1,2,2-trifluoroethane	1.2E-02	1.2E-02	1	1.2E-02	1.2E-02
1,1-Dichloroethane	NC	NC	1	NC	NC
1,2-Dichloroethene (total)	2.8E-02	7.0E-02	1	2.8E-02	7.0E-02
2-Butanone	3.7E-02	3.7E-02	1	3.7E-02	3.7E-02
Acetone	6.8E-01	4.2E+00	1	6.8E-01	4.2E+00
Ethylbenzene	NC	NC	1	NC	NC
Methylene chloride	1.3E-02	1.3E-02	1	1.3E-02	1.3E-02
Tetrachloroethene	2.1E-02	8.8E-02	1	2.1E-02	8.8E-02
Toluene	5.6E-02	3.4E-01	1	5.6E-02	3.4E-01
Trichloroethene	3.7E-02	2.0E-01	1	3.7E-02	2.0E-01
Xylenes (total)	2.5E-02	5.1E-02	1	2.5E-02	5.1E-02
SVOCs					
Acenaphthene	4.4E-02	1.0E-01	2	1.1E-01	2.4E-01
Acenaphthylene	3.1E-02	8.5E-02	1	3.1E-02	8.5E-02
Anthracene	3.9E-02	8.2E-02	3	1.1E-01	2.3E-01
Benzo(a)anthracene	3.6E-02	1.5E-01	2	6.8E-02	2.8E-01
Benzo(a)pyrene	3.6E-02	1.5E-01	1	3.6E-02	1.5E-01
Benzo(b)fluoranthene	4.9E-02	2.7E-01	2	1.0E-01	5.4E-01
Benzo(e)pyrene	1.9E-02	6.3E-02	1	2.0E-02	6.8E-02
Benzo(g,h,i)perylene	4.1E-02	9.0E-02	1	2.2E-02	4.8E-02
Benzo(k)fluoranthene	3.0E-02	8.5E-02	1	2.6E-02	7.6E-02
Chrysene	4.4E-02	2.2E-01	2	8.3E-02	4.0E-01
Dibenz(a,h)anthracene	2.9E-02	8.5E-02	1	2.9E-02	8.5E-02
Dibenzofuran	NC	NC	1	NC	NC
Fluoranthene	6.0E-02	3.8E-01	1	5.4E-02	3.4E-01
Fluorene	4.4E-02	1.0E-01	4	1.7E-01	3.9E-01
Indeno(1,2,3-cd)pyrene	3.4E-02	1.4E-01	1	2.9E-02	1.2E-01
Naphthalene	NC	NC	1	NC	NC
Perylene	1.1E-02	3.6E-02	1	1.1E-02	3.6E-02
Phenanthrene	7.9E-02	2.0E-01	2	1.5E-01	3.7E-01
Pyrene	5.3E-02	1.6E-01	3	1.6E-01	4.6E-01
Total Petroleum Hydrocarbons					
C11-C14(Kerosene Range)	9.7E+00	4.0E+01	1	9.7E+00	4.0E+01
C14-C20(Diesel Range)	NC	NC	1	NC	NC
C20-C30(Lubricant Oil Range)	7.3E+01	4.7E+02	1	7.3E+01	4.7E+02

Spreadsheet C3-112a (2 of 2)

Exposure Point Values for Terrestrial Invertebrates - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Chemical	Soil EPC		BAF	Earthworm EPV	
	CTE (mg/kg)	RME (mg/kg)	(unitless)	CTE (mg/kg)	RME (mg/kg)
Inorganic Compounds					
PCDD/PCDFs					
2,3,7,8-TCDD	2.7E-07	5.3E-07	1	2.7E-07	5.3E-07
1,2,3,7,8-PeCDD	1.1E-06	2.2E-06	1	9.6E-07	1.9E-06
1,2,3,4,7,8-HxCDD	4.1E-06	9.0E-06	1	3.2E-06	7.0E-06
1,2,3,6,7,8-HxCDD	1.6E-05	3.0E-05	1	1.2E-05	2.3E-05
1,2,3,7,8,9-HxCDD	5.9E-06	1.0E-05	1	5.5E-06	9.3E-06
1,2,3,4,6,7,8-HpCDD	5.7E-04	1.2E-03	1	3.1E-04	6.4E-04
OCDD	8.4E-03	1.7E-02	0	3.9E-03	7.9E-03
2,3,7,8-TCDF	5.5E-07	7.9E-07	1	5.6E-07	8.0E-07
1,2,3,7,8-PeCDF	2.8E-07	5.7E-07	0	1.2E-07	2.4E-07
2,3,4,7,8-PeCDF	8.2E-07	1.6E-06	1	4.2E-07	8.1E-07
1,2,3,4,7,8-HxCDF	1.8E-06	3.3E-06	1	1.2E-06	2.2E-06
1,2,3,6,7,8-HxCDF	1.6E-06	3.2E-06	0	4.0E-07	8.2E-07
2,3,4,6,7,8-HxCDF	3.8E-06	8.8E-06	1	2.1E-06	4.9E-06
1,2,3,7,8,9-HxCDF	3.6E-07	9.7E-07	1	3.6E-07	9.7E-07
1,2,3,4,6,7,8-HpCDF	5.3E-05	9.6E-05	1	2.8E-05	5.2E-05
1,2,3,4,7,8,9-HpCDF	4.9E-06	9.2E-06	1	4.9E-06	9.2E-06
OCDF	1.4E-04	2.4E-04	1	6.8E-05	1.2E-04
PCBs					
Aroclor-1254	1.6E-01	4.3E-01	1	1.6E-01	4.3E-01
Aroclor-1260	1.3E+00	7.3E+00	1	1.3E+00	7.3E+00
PCB-105	1.1E-04	5.6E-04	10	1.2E-03	5.9E-03
PCB-114	2.2E-06	1.0E-05	27	5.8E-05	2.7E-04
PCB-118	2.3E-04	1.1E-03	11	2.6E-03	1.3E-02
PCB-123	3.2E-06	1.6E-05	13	4.0E-05	2.0E-04
PCB-126	8.8E-06	4.4E-05	5	4.7E-05	2.3E-04
PCB-156	7.5E-05	3.8E-04	6	4.3E-04	2.2E-03
PCB-157	3.3E-05	1.7E-04	6	1.9E-04	9.9E-04
PCB-167	5.7E-05	2.9E-04	6	3.4E-04	1.7E-03
PCB-169	8.6E-07	4.4E-06	1	8.6E-07	4.4E-06
PCB-189	8.6E-06	4.4E-05	2	2.0E-05	1.0E-04
PCB-77	1.8E-05	8.8E-05	6	1.1E-04	5.5E-04
PCB-81	3.1E-06	1.6E-05	6	1.9E-05	9.3E-05

Notes:
EPC - exposure point concentration (based on 0 to 2 feet bgs data) as presented in Spreadsheet D-90.
EPV - exposure point value
BAF - bioaccumulation factor approximates the 75th percentile of BAFs measured at SSFL;
if no BAF was available a default of 1 is used.
CTE - central tendancy exposure
RME - reasonable maximum exposure
NC - not selected as a CPEC in the indicated media, per the SRAM (MWH 2005).
CPEC - chemical of potential ecological concern
VOC - volatile organic compound
SVOC - semi-volatile organic compounds
PCB - polychlorinated biphenyls
PCDD/PCDF - polychlorinated dibenzo-p-dioxins and dibenzofurans
mg/kg - milligram per kilogram

Ecological Concentration-Toxicity Screen
for Determination of Applicable Soil Depth - Wet Pond Scenario [a]
Sodium Reactor Experiment (SRE) Area

Chemical	Mammalian ESL (mg/kg)	Concentration-Toxicity Screen Values: Soil 0 to 2 feet bgs Normal (mg/kg)	Soil 0 to 4 feet bgs Normal (mg/kg)	Soil 0 to 6 feet bgs Normal (mg/kg)
Inorganic Compounds				
Aluminum	1.2E+01	-	-	-
Antimony	9.5E-02	-	-	-
Arsenic	1.9E+00	-	-	-
Beryllium	5.1E+00	-	-	-
Cadmium	2.1E-02	2.0E+01	1.7E+01	1.5E+01
Chromium	9.3E+02	-	-	-
Copper	2.1E+00	9.3E+00	9.3E+00	8.4E+00
Lead	2.8E+00	4.5E+00	4.6E+00	5.4E+00
Mercury	2.9E+00	1.9E+00	1.4E+00	1.3E+00
Methyl Mercury	1.1E+00	3.4E-03	3.4E-03	3.4E-03
Nickel	1.0E-01	-	-	-
Selenium	1.7E-01	-	-	-
Silver	5.4E-01	5.1E+00	6.5E+00	5.3E+00
Thallium	2.9E+00	1.1E-01	7.3E-01	1.3E+00
Vanadium	1.5E+00	-	-	-
Zinc	2.1E+01	9.1E+00	7.4E+00	1.1E+01
VOCs				
1,1,1-Trichloroethane	4.3E+03	-	-	-
1,1,2-Trichloro-1,2,2-trifluoroethane	2.1E+02	5.7E-05	5.7E-05	5.7E-05
1,1-Dichloroethane	2.1E+02	-	-	-
2-Butanone	7.6E+03	4.6E-06	3.6E-06	3.6E-06
Acetone	4.3E+01	1.2E-01	5.4E-02	5.4E-02
Bromomethane	2.5E+01	-	-	-
Ethylbenzene	2.1E+02	-	-	-
m,p-Xylene	1.3E+02	-	-	-
Methylene chloride	2.5E+01	5.2E-04	4.9E-04	4.9E-04
Tetrachloroethene	2.1E+00	-	-	-
Toluene	2.5E+00	-	-	-
trans-1,3-Dichloropropene	4.4E+00	-	-	-
Trichloroethene	3.0E+00	-	-	-
Xylenes (total)	1.3E+02	-	-	-
SVOCs				
Acenaphthene	2.7E+02	4.1E-04	1.2E-03	1.0E-03
Acenaphthylene	7.5E+02	2.1E-05	2.3E-05	2.0E-05
Anthracene	1.4E+03	5.1E-05	8.9E-04	7.6E-04
Benzo(a)anthracene	1.4E+00	6.2E-03	9.9E+00	9.9E+00
Benzo(a)pyrene	5.6E+00	1.6E-03	2.7E+00	2.7E+00
Benzo(b)fluoranthene	4.4E+00	2.5E-03	3.0E+00	1.7E+00
Benzo(e)pyrene	NA	-	-	-
Benzo(g,h,i)perylene	6.4E+00	6.9E-03	4.8E-01	4.1E-01
Benzo(k)fluoranthene	5.8E+00	1.4E-03	2.6E+00	2.6E+00
bis(2-Ethylhexyl)phthalate	7.8E+01	-	-	-
Butyl benzyl phthalate	3.4E+02	-	-	-
Chrysene	2.4E+00	5.2E-03	3.5E+00	3.0E+00
Dibenz(a,h)anthracene	5.6E+00	1.2E-03	2.6E-01	2.2E-01
Dibenzofuran	4.3E+03	-	6.6E-05	6.6E-05
Diethylphthalate	6.9E+03	-	-	-
Di-n-butylphthalate	5.1E+02	-	-	-
Di-n-octyl phthalate	1.5E+03	-	-	-
Fluoranthene	1.2E+02	9.7E-05	2.0E-01	1.2E-01

Ecological Concentration-Toxicity Screen
for Determination of Applicable Soil Depth - Wet Pond Scenario [a]
Sodium Reactor Experiment (SRE) Area

Chemical	Mammalian ESL (mg/kg)	Concentration-Toxicity Screen Values: Soil 0 to 2 feet bgs Normal (mg/kg)	Soil 0 to 4 feet bgs Normal (mg/kg)	Soil 0 to 6 feet bgs Normal (mg/kg)
Fluorene	1.5E+02	7.4E-04	2.2E-03	1.9E-03
Hexachlorobutadiene	8.5E-01	-	-	-
Hexachlorocyclopentadiene	1.3E+01	-	-	-
Indeno(1,2,3-cd)pyrene	5.8E+00	1.5E-03	1.1E+00	6.3E-01
Naphthalene	2.1E+02	-	-	2.7E-04
Pentachlorophenol	1.3E+01	-	-	-
Perylene	NA	-	-	-
Phenanthrene	6.2E+01	4.8E-03	1.2E-01	1.0E-01
Pyrene	7.6E+01	3.7E-04	1.8E-01	1.6E-01
Pesticides				
4,4'-DDT	3.4E+00	-	-	-
Chlordane	3.6E-01	-	-	-
Dieldrin	8.5E-02	-	-	-
Endosulfan I	NA	-	-	-
Endosulfan II	NA	-	-	-
Endrin	1.3E-01	-	-	-
Heptachlor	5.6E-01	-	-	-
Heptachlor epoxide	1.6E-02	-	-	-
Toxaphene	NA	-	-	-
PCDD/PCDFs				
2,3,7,8-TCDD	4.3E-06	9.4E-02	8.1E-02	8.1E-02
1,2,3,7,8-PeCDD	4.4E-06	3.4E-01	3.0E-01	3.0E-01
1,2,3,4,7,8-HxCDD	4.5E-05	9.2E-02	8.2E-02	8.2E-02
1,2,3,6,7,8-HxCDD	1.1E-04	1.9E-01	1.8E-01	1.8E-01
1,2,3,7,8,9-HxCDD	4.3E-05	2.3E-01	2.0E-01	2.0E-01
1,2,3,4,6,7,8-HpCDD	9.6E-04	5.2E-01	5.2E-01	5.2E-01
OCDD	1.2E-01	6.3E-02	6.3E-02	6.3E-02
2,3,7,8-TCDF	4.3E-05	1.9E-02	1.8E-02	1.8E-02
1,2,3,7,8-PeCDF	1.0E-04	3.8E-03	3.8E-03	3.8E-03
2,3,4,7,8-PeCDF	9.8E-06	1.0E-01	9.1E-02	9.1E-02
1,2,3,4,7,8-HxCDF	4.7E-05	3.8E-02	3.7E-02	3.7E-02
1,2,3,6,7,8-HxCDF	5.4E-05	3.4E-02	3.0E-02	3.0E-02
1,2,3,4,6,7,8-HpCDF	1.1E-03	4.5E-02	4.5E-02	4.5E-02
1,2,3,4,7,8,9-HpCDF	4.3E-04	9.9E-03	9.9E-03	9.9E-03
OCDF	9.7E-02	1.5E-03	1.5E-03	1.5E-03
PCBs				
Aroclor-1016	5.9E+00	-	-	-
Aroclor-1221	5.9E+00	-	-	-
Aroclor-1232	2.9E-01	-	-	-
Aroclor-1242	2.9E-01	-	-	-
Aroclor-1248	6.0E-02	-	-	-
Aroclor-1254	2.9E-01	1.5E+00	1.5E+00	1.5E+00
Aroclor-1260	2.9E-01	2.7E+01	2.6E+01	2.6E+01
PCB-105	8.5E-03	7.5E-02	7.4E-02	7.4E-02
PCB-114	8.8E-04	1.3E-02	1.3E-02	1.3E-02
PCB-118	8.2E-03	1.6E-01	1.5E-01	1.5E-01
PCB-123	7.5E-03	2.4E-03	2.4E-03	2.4E-03
PCB-126	1.4E-05	3.4E+00	3.4E+00	3.4E+00
PCB-156	2.6E-03	1.6E-01	1.6E-01	1.6E-01
PCB-157	2.5E-03	7.5E-02	7.4E-02	7.4E-02

Ecological Concentration-Toxicity Screen
for Determination of Applicable Soil Depth - Wet Pond Scenario [a]
Sodium Reactor Experiment (SRE) Area

Chemical	Mammalian ESL (mg/kg)	Concentration-Toxicity Screen Values		
		Soil 0 to 2 feet bgs Normal (mg/kg)	Soil 0 to 4 feet bgs Normal (mg/kg)	Soil 0 to 6 feet bgs Normal (mg/kg)
PCB-167	1.2E-01	2.7E-03	2.6E-03	2.6E-03
PCB-169	4.3E-04	1.2E-02	1.1E-02	1.1E-02
PCB-189	2.0E-02	2.5E-03	2.4E-03	2.4E-03
PCB-77	1.3E-02	7.7E-03	7.6E-03	7.6E-03
PCB-81	1.2E-02	1.5E-03	1.5E-03	1.5E-03
Total Depth-Specific Concentration-Toxicity Screen Value		8.4E+01	1.0E+02	1.0E+02

Notes:

a. Ecological concentration-toxicity screen value
= RME soil concentration / mammalian ecological screening level.
Concentration-toxicity screen values are for comparative purposes only and are not an indication of risk.

VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCDD/PCDF - polychlorinated dibenzo-p-dioxins and dibenzofurans
ESL - ecological screening level
RME - reasonable maximum exposure
"-" not applicable
mg/kg - milligram per kilogram
bgs - below ground surface
NA - Not applicable

Spreadsheet C3-111a (1 of 2)

Ecological Concentration-Toxicity Screen
for Determination of Applicable Soil Depth - Dry Pond Scenario [a]
Sodium Reactor Experiment (SRE) Area

Chemical	Mammalian ESL (mg/kg)	Concentration-Toxicity Screen Values: Soil 0 to 2 feet bgs Normal (mg/kg)	Soil 0 to 4 feet bgs Normal (mg/kg)	Soil 0 to 6 feet bgs Normal (mg/kg)
Inorganic Compounds				
Cadmium	2.1E-02	5.5E+01	8.2E+01	7.5E+01
Copper	2.1E+00	2.1E+01	1.6E+01	1.5E+01
Lead	2.8E+00	1.2E+01	9.1E+00	8.4E+00
Mercury	2.9E+00	1.5E+00	1.7E+00	1.6E+00
Methyl Mercury	1.1E+00	3.4E-03	3.4E-03	3.4E-03
Silver	5.4E-01	5.3E+00	7.6E+00	7.0E+00
Thallium	2.9E+00	1.1E-01	7.3E-01	9.8E-01
Zinc	2.1E+01	2.1E+01	1.5E+01	2.4E+01
VOCs				
1,1,1-Trichloroethane	4.3E+03	-	6.3E-05	6.1E-05
1,1,2-Trichloro-1,2,2-trifluoroethane	2.1E+02	5.7E-05	5.7E-05	5.7E-05
1,1-Dichloroethane	2.1E+02	-	3.9E-04	3.8E-04
1,2-Dichloroethene (total)	6.8E+01	1.0E-03	8.2E-04	7.8E-04
2-Butanone	7.6E+03	4.9E-06	4.9E-06	4.9E-06
Acetone	4.3E+01	9.8E-02	6.1E-02	5.9E-02
Ethylbenzene	2.1E+02	-	-	2.8E-04
m,p-Xylene	1.3E+02	-	-	4.7E-06
Methylene chloride	2.5E+01	5.2E-04	1.1E-01	1.0E-01
Tetrachloroethene	2.1E+00	4.1E-02	9.5E-02	9.2E-02
Toluene	2.5E+00	1.4E-01	8.9E-01	8.6E-01
Trichloroethene	3.0E+00	6.8E-02	2.1E-01	2.0E-01
Xylenes (total)	1.3E+02	4.0E-04	3.3E-03	3.1E-03
SVOCs				
Acenaphthene	2.7E+02	3.7E-04	7.2E-04	6.5E-04
Acenaphthylene	7.5E+02	1.1E-04	1.1E-04	1.1E-04
Anthracene	1.4E+03	5.7E-05	4.6E-04	4.1E-04
Benzo(a)anthracene	1.4E+00	1.0E-01	3.3E+00	2.9E+00
Benzo(a)pyrene	5.6E+00	2.7E-02	8.9E-01	8.0E-01
Benzo(b)fluoranthene	4.4E+00	6.1E-02	1.0E+00	9.0E-01
Benzo(e)pyrene	NA	-	-	-
Benzo(g,h,i)perylene	6.4E+00	1.4E-02	2.4E-01	2.2E-01
Benzo(k)fluoranthene	5.8E+00	1.5E-02	8.6E-01	7.7E-01
Chrysene	2.4E+00	9.2E-02	1.7E+00	1.6E+00
Dibenz(a,h)anthracene	5.6E+00	1.5E-02	1.3E-01	1.2E-01
Dibenzofuran	4.3E+03	-	2.8E-05	2.8E-05
Fluoranthene	1.2E+02	3.0E-03	6.7E-02	6.0E-02
Fluorene	1.5E+02	6.7E-04	1.3E-03	1.2E-03
Indeno(1,2,3-cd)pyrene	5.8E+00	2.3E-02	3.7E-01	3.3E-01
Naphthalene	2.1E+02	-	-	2.7E-04
Perylene	NA	-	-	-
Phenanthrene	6.2E+01	3.2E-03	3.1E-02	2.7E-02
Pyrene	7.6E+01	2.0E-03	9.1E-02	8.2E-02
Total Petroleum Hydrocarbons				
C11-C14(Kerosene Range)	NA	-	-	-
C14-C20(Diesel Range)	NA	-	-	-
C20-C30(Lubricant Oil Range)	NA	-	-	-

Ecological Concentration-Toxicity Screen
for Determination of Applicable Soil Depth - Dry Pond Scenario [a]
Sodium Reactor Experiment (SRE) Area

Chemical	Mammalian ESL (mg/kg)	Concentration-Toxicity Screen Values: Soil 0 to 2 feet bgs Normal (mg/kg)	Soil 0 to 4 feet bgs Normal (mg/kg)	Soil 0 to 6 feet bgs Normal (mg/kg)
Dioxins				
2,3,7,8-TCDD	4.3E-06	1.3E-01	1.0E-01	1.0E-01
1,2,3,7,8-PeCDD	4.4E-06	4.9E-01	4.0E-01	4.0E-01
1,2,3,4,7,8-HxCDD	4.5E-05	2.0E-01	1.6E-01	1.6E-01
1,2,3,6,7,8-HxCDD	1.1E-04	2.8E-01	2.3E-01	2.3E-01
1,2,3,7,8,9-HxCDD	4.3E-05	2.3E-01	2.2E-01	2.2E-01
1,2,3,4,6,7,8-HpCDD	9.6E-04	1.2E+00	9.9E-01	9.9E-01
OCDD	1.2E-01	1.5E-01	1.2E-01	1.2E-01
2,3,7,8-TCDF	4.3E-05	1.9E-02	1.9E-02	1.9E-02
1,2,3,7,8-PeCDF	1.0E-04	5.7E-03	4.6E-03	4.6E-03
2,3,4,7,8-PeCDF	9.8E-06	1.6E-01	1.3E-01	1.3E-01
1,2,3,4,7,8-HxCDF	4.7E-05	7.1E-02	5.8E-02	5.8E-02
1,2,3,6,7,8-HxCDF	5.4E-05	5.9E-02	4.8E-02	4.8E-02
2,3,4,6,7,8-HxCDF	4.9E-05	1.8E-01	1.4E-01	1.4E-01
1,2,3,7,8,9-HxCDF	4.3E-05	2.3E-02	2.3E-02	2.3E-02
1,2,3,4,6,7,8-HpCDF	1.1E-03	8.6E-02	7.1E-02	7.1E-02
1,2,3,4,7,8,9-HpCDF	4.3E-04	2.2E-02	1.8E-02	1.8E-02
OCDF	9.7E-02	2.4E-03	2.1E-03	2.1E-03
PCBs				
Aroclor-1254	2.9E-01	1.5E+00	1.5E+00	1.5E+00
Aroclor-1260	2.9E-01	2.5E+01	2.4E+01	2.4E+01
PCB-105	8.5E-03	6.6E-02	6.6E-02	6.6E-02
PCB-114	8.8E-04	1.1E-02	1.1E-02	1.1E-02
PCB-118	8.2E-03	1.4E-01	1.4E-01	1.4E-01
PCB-123	7.5E-03	2.1E-03	2.1E-03	2.1E-03
PCB-126	1.4E-05	3.0E+00	3.0E+00	3.0E+00
PCB-156	2.6E-03	1.4E-01	1.4E-01	1.4E-01
PCB-157	2.5E-03	6.7E-02	6.7E-02	6.7E-02
PCB-167	1.2E-01	2.4E-03	2.4E-03	2.4E-03
PCB-169	4.3E-04	1.0E-02	1.0E-02	1.0E-02
PCB-189	2.0E-02	2.2E-03	2.2E-03	2.2E-03
PCB-77	1.3E-02	6.8E-03	6.8E-03	6.8E-03
PCB-81	1.2E-02	1.3E-03	1.3E-03	1.3E-03
Total Depth-Specific Concentration-Toxicity Screen Value		1.5E+02	1.7E+02	1.7E+02

Notes:

a. Ecological concentration-toxicity screen value
= RME soil concentration / mammalian ecological screening level.
Concentration-toxicity screen values are for comparative purposes only and are not an indication of risk.

VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyls
ESL - ecological screening level
RME - reasonable maximum exposure
NC - Not Calculated
"-" not applicable
mg/kg - milligram per kilogram
bgs - below ground surface

TPH to Petroleum Constituent Extrapolation for Soil/Sediment (0-6 feet bgs) [a]
Sodium Reactor Experiment (SRE) Area

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
C08-C11 (Gasoline Range)	MJ630	5.40E+00	2.7E+00	U	-	-
C11-C14 (Kerosene Range)	MJ630	5.40E+00	2.7E+00	U	-	-
C14-C20 (Diesel Range)	MJ630	5.40E+00	2.7E+00	U	-	-
C20-C30 (Lubricant Oil Range)	MJ630	5.40E+00	2.7E+00	U	-	-
C11-C30	MJ630		8.1E+00		-	-
Benzene	MJ630	-	-	-	-	-
Ethylbenzene	MJ630	-	-	-	-	-
Toluene	MJ630	-	-	-	-	-
m,p-Xylene	MJ630	-	-	-	-	-
o-Xylene	MJ630	-	-	-	-	-
Xylene (total)	MJ630	-	-	-	-	-
2-Methylnaphthalene	MJ630	-	-	-	-	-
Acenaphthene	MJ630	-	-	-	4.6E-03	4.6E-03
Acenaphthylene	MJ630	-	-	-	5.7E-04	5.7E-04
Anthracene	MJ630	-	-	-	3.0E-03	3.0E-03
Benzo(a)anthracene	MJ630	-	-	-	2.2E-04	2.2E-04
Benzo(a)pyrene	MJ630	-	-	-	2.2E-04	2.2E-04
Benzo(b)fluoranthene	MJ630	-	-	-	3.5E-04	3.5E-04
Benzo(e)pyrene	MJ630	-	-	-	1.7E-03	1.7E-03
Benzo(g,h,i)perylene	MJ630	-	-	-	1.8E-03	1.8E-03
Benzo(k)fluoranthene	MJ630	-	-	-	1.7E-04	1.7E-04
Chrysene	MJ630	-	-	-	4.8E-04	4.8E-04
Dibenz(a,h)anthracene	MJ630	-	-	-	9.0E-05	9.0E-05
Fluoranthene	MJ630	-	-	-	6.1E-04	6.1E-04
Fluorene	MJ630	-	-	-	4.6E-03	4.6E-03
Indeno(1,2,3-cd)pyrene	MJ630	-	-	-	1.9E-04	1.9E-04
Naphthalene	MJ630	-	-	-	-	-
Perylene	MJ630	-	-	-	9.6E-04	9.6E-04
Phenanthrene	MJ630	-	-	-	1.2E-02	1.2E-02
Pyrene	MJ630	-	-	-	1.1E-03	1.1E-03
C08-C11 (Gasoline Range)	MJ631	5.30E+00	2.7E+00	U	-	-
C11-C14 (Kerosene Range)	MJ631	5.30E+00	2.7E+00	U	-	-
C14-C20 (Diesel Range)	MJ631	5.30E+00	2.7E+00	U	-	-
C20-C30 (Lubricant Oil Range)	MJ631	1.10E+01	1.1E+01		-	-
C11-C30	MJ631		1.6E+01		-	-
Benzene	MJ631	-	-	-	-	-
Ethylbenzene	MJ631	-	-	-	-	-
Toluene	MJ631	-	-	-	-	-
m,p-Xylene	MJ631	-	-	-	-	-
o-Xylene	MJ631	-	-	-	-	-
Xylene (total)	MJ631	-	-	-	-	-
2-Methylnaphthalene	MJ631	-	-	-	-	-
Acenaphthene	MJ631	-	-	-	9.3E-03	9.3E-03
Acenaphthylene	MJ631	-	-	-	1.1E-03	1.1E-03
Anthracene	MJ631	-	-	-	6.1E-03	6.1E-03
Benzo(a)anthracene	MJ631	-	-	-	4.4E-04	4.4E-04
Benzo(a)pyrene	MJ631	-	-	-	4.4E-04	4.4E-04
Benzo(b)fluoranthene	MJ631	-	-	-	7.1E-04	7.1E-04
Benzo(e)pyrene	MJ631	-	-	-	3.4E-03	3.4E-03
Benzo(g,h,i)perylene	MJ631	-	-	-	3.6E-03	3.6E-03
Benzo(k)fluoranthene	MJ631	-	-	-	3.3E-04	3.3E-04
Chrysene	MJ631	-	-	-	9.6E-04	9.6E-04
Dibenz(a,h)anthracene	MJ631	-	-	-	1.8E-04	1.8E-04
Fluoranthene	MJ631	-	-	-	1.2E-03	1.2E-03
Fluorene	MJ631	-	-	-	9.3E-03	9.3E-03

TPH to Petroleum Constituent Extrapolation for Soil/Sediment (0-6 feet bgs) [a]
Sodium Reactor Experiment (SRE) Area

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Indeno(1,2,3-cd)pyrene	MJ631	-	-	-	3.9E-04	3.9E-04
Naphthalene	MJ631	-	-	-	-	-
Perylene	MJ631	-	-	-	1.9E-03	1.9E-03
Phenanthrene	MJ631	-	-	-	2.5E-02	2.5E-02
Pyrene	MJ631	-	-	-	2.2E-03	2.2E-03
C08-C11 (Gasoline Range)	MJ661	1.20E+01	6.0E+00	U	-	-
C11-C14 (Kerosene Range)	MJ661	1.20E+01	6.0E+00	U	-	-
C14-C20 (Diesel Range)	MJ661	1.20E+01	6.0E+00	U	-	-
C20-C30 (Lubricant Oil Range)	MJ661	1.20E+01	6.0E+00	U	-	-
C11-C30	MJ661		1.8E+01		-	-
Benzene	MJ661	-	-	-	-	-
Ethylbenzene	MJ661	-	-	-	-	-
Toluene	MJ661	-	-	-	-	-
m,p-Xylene	MJ661	-	-	-	-	-
o-Xylene	MJ661	-	-	-	-	-
Xylene (total)	MJ661	-	-	-	-	-
2-Methylnaphthalene	MJ661	-	-	-	-	-
Acenaphthene	MJ661	-	-	-	1.0E-02	1.0E-02
Acenaphthylene	MJ661	-	-	-	1.3E-03	1.3E-03
Anthracene	MJ661	-	-	-	6.7E-03	6.7E-03
Benzo(a)anthracene	MJ661	-	-	-	4.9E-04	4.9E-04
Benzo(a)pyrene	MJ661	-	-	-	4.9E-04	4.9E-04
Benzo(b)fluoranthene	MJ661	-	-	-	7.8E-04	7.8E-04
Benzo(e)pyrene	MJ661	-	-	-	3.7E-03	3.7E-03
Benzo(g,h,i)perylene	MJ661	-	-	-	4.0E-03	4.0E-03
Benzo(k)fluoranthene	MJ661	-	-	-	3.7E-04	3.7E-04
Chrysene	MJ661	-	-	-	1.1E-03	1.1E-03
Dibenz(a,h)anthracene	MJ661	-	-	-	2.0E-04	2.0E-04
Fluoranthene	MJ661	-	-	-	1.3E-03	1.3E-03
Fluorene	MJ661	-	-	-	1.0E-02	1.0E-02
Indeno(1,2,3-cd)pyrene	MJ661	-	-	-	4.3E-04	4.3E-04
Naphthalene	MJ661	-	-	-	-	-
Perylene	MJ661	-	-	-	2.1E-03	2.1E-03
Phenanthrene	MJ661	-	-	-	2.8E-02	2.8E-02
Pyrene	MJ661	-	-	-	2.5E-03	2.5E-03
C08-C11 (Gasoline Range)	MJ662	1.10E+01	5.5E+00	U	-	-
C11-C14 (Kerosene Range)	MJ662	1.10E+01	5.5E+00	U	-	-
C14-C20 (Diesel Range)	MJ662	1.10E+01	5.5E+00	U	-	-
C20-C30 (Lubricant Oil Range)	MJ662	1.10E+01	5.5E+00	U	-	-
C11-C30	MJ662		1.7E+01		-	-
Benzene	MJ662	-	-	-	-	-
Ethylbenzene	MJ662	-	-	-	-	-
Toluene	MJ662	-	-	-	-	-
m,p-Xylene	MJ662	-	-	-	-	-
o-Xylene	MJ662	-	-	-	-	-
Xylene (total)	MJ662	-	-	-	-	-
2-Methylnaphthalene	MJ662	-	-	-	-	-
Acenaphthene	MJ662	-	-	-	9.5E-03	9.5E-03
Acenaphthylene	MJ662	-	-	-	1.2E-03	1.2E-03
Anthracene	MJ662	-	-	-	6.2E-03	6.2E-03
Benzo(a)anthracene	MJ662	-	-	-	4.4E-04	4.4E-04
Benzo(a)pyrene	MJ662	-	-	-	4.5E-04	4.5E-04
Benzo(b)fluoranthene	MJ662	-	-	-	7.1E-04	7.1E-04
Benzo(e)pyrene	MJ662	-	-	-	3.4E-03	3.4E-03
Benzo(g,h,i)perylene	MJ662	-	-	-	3.6E-03	3.6E-03

TPH to Petroleum Constituent Extrapolation for Soil/Sediment (0-6 feet bgs) [a]
Sodium Reactor Experiment (SRE) Area

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Benzo(k)fluoranthene	MJ662	-	-	-	3.4E-04	3.4E-04
Chrysene	MJ662	-	-	-	9.7E-04	9.7E-04
Dibenz(a,h)anthracene	MJ662	-	-	-	1.8E-04	1.8E-04
Fluoranthene	MJ662	-	-	-	1.2E-03	1.2E-03
Fluorene	MJ662	-	-	-	9.4E-03	9.4E-03
Indeno(1,2,3-cd)pyrene	MJ662	-	-	-	4.0E-04	4.0E-04
Naphthalene	MJ662	-	-	-	-	-
Perylene	MJ662	-	-	-	1.9E-03	1.9E-03
Phenanthrene	MJ662	-	-	-	2.5E-02	2.5E-02
Pyrene	MJ662	-	-	-	2.2E-03	2.2E-03
C08-C11 (Gasoline Range)	MJ663	1.10E+01	5.5E+00	U	-	-
C11-C14 (Kerosene Range)	MJ663	1.10E+01	5.5E+00	U	-	-
C14-C20 (Diesel Range)	MJ663	1.10E+01	5.5E+00	U	-	-
C20-C30 (Lubricant Oil Range)	MJ663	5.00E+00	5.0E+00	J	-	-
C11-C30	MJ663		1.6E+01		-	-
Benzene	MJ663	-	-	-	-	-
Ethylbenzene	MJ663	-	-	-	-	-
Toluene	MJ663	-	-	-	-	-
m,p-Xylene	MJ663	-	-	-	-	-
o-Xylene	MJ663	-	-	-	-	-
Xylene (total)	MJ663	-	-	-	-	-
2-Methylnaphthalene	MJ663	-	-	-	-	-
Acenaphthene	MJ663	-	-	-	9.2E-03	9.2E-03
Acenaphthylene	MJ663	-	-	-	1.1E-03	1.1E-03
Anthracene	MJ663	-	-	-	6.0E-03	6.0E-03
Benzo(a)anthracene	MJ663	-	-	-	4.3E-04	4.3E-04
Benzo(a)pyrene	MJ663	-	-	-	4.4E-04	4.4E-04
Benzo(b)fluoranthene	MJ663	-	-	-	6.9E-04	6.9E-04
Benzo(e)pyrene	MJ663	-	-	-	3.3E-03	3.3E-03
Benzo(g,h,i)perylene	MJ663	-	-	-	3.5E-03	3.5E-03
Benzo(k)fluoranthene	MJ663	-	-	-	3.3E-04	3.3E-04
Chrysene	MJ663	-	-	-	9.4E-04	9.4E-04
Dibenz(a,h)anthracene	MJ663	-	-	-	1.8E-04	1.8E-04
Fluoranthene	MJ663	-	-	-	1.2E-03	1.2E-03
Fluorene	MJ663	-	-	-	9.1E-03	9.1E-03
Indeno(1,2,3-cd)pyrene	MJ663	-	-	-	3.8E-04	3.8E-04
Naphthalene	MJ663	-	-	-	-	-
Perylene	MJ663	-	-	-	1.9E-03	1.9E-03
Phenanthrene	MJ663	-	-	-	2.5E-02	2.5E-02
Pyrene	MJ663	-	-	-	2.2E-03	2.2E-03
C08-C11 (Gasoline Range)	MJ664	1.10E+01	5.5E+00	U	-	-
C11-C14 (Kerosene Range)	MJ664	1.10E+01	5.5E+00	U	-	-
C14-C20 (Diesel Range)	MJ664	1.10E+01	5.5E+00	U	-	-
C20-C30 (Lubricant Oil Range)	MJ664	6.30E+00	6.3E+00	J	-	-
C11-C30	MJ664		1.7E+01		-	-
Benzene	MJ664	-	-	-	-	-
Ethylbenzene	MJ664	-	-	-	-	-
Toluene	MJ664	-	-	-	-	-
m,p-Xylene	MJ664	-	-	-	-	-
o-Xylene	MJ664	-	-	-	-	-
Xylene (total)	MJ664	-	-	-	-	-
2-Methylnaphthalene	MJ664	-	-	-	-	-
Acenaphthene	MJ664	-	-	-	9.9E-03	9.9E-03
Acenaphthylene	MJ664	-	-	-	1.2E-03	1.2E-03
Anthracene	MJ664	-	-	-	6.5E-03	6.5E-03

TPH to Petroleum Constituent Extrapolation for Soil/Sediment (0-6 feet bgs) [a]
Sodium Reactor Experiment (SRE) Area

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Benzo(a)anthracene	MJ664	-	-	-	4.7E-04	4.7E-04
Benzo(a)pyrene	MJ664	-	-	-	4.7E-04	4.7E-04
Benzo(b)fluoranthene	MJ664	-	-	-	7.5E-04	7.5E-04
Benzo(e)pyrene	MJ664	-	-	-	3.6E-03	3.6E-03
Benzo(g,h,i)perylene	MJ664	-	-	-	3.8E-03	3.8E-03
Benzo(k)fluoranthene	MJ664	-	-	-	3.5E-04	3.5E-04
Chrysene	MJ664	-	-	-	1.0E-03	1.0E-03
Dibenz(a,h)anthracene	MJ664	-	-	-	1.9E-04	1.9E-04
Fluoranthene	MJ664	-	-	-	1.3E-03	1.3E-03
Fluorene	MJ664	-	-	-	9.8E-03	9.8E-03
Indeno(1,2,3-cd)pyrene	MJ664	-	-	-	4.2E-04	4.2E-04
Naphthalene	MJ664	-	-	-	-	-
Perylene	MJ664	-	-	-	2.0E-03	2.0E-03
Phenanthrene	MJ664	-	-	-	2.7E-02	2.7E-02
Pyrene	MJ664	-	-	-	2.4E-03	2.4E-03
C08-C11 (Gasoline Range)	RD977	1.10E+01	5.5E+00	UJ	-	-
C11-C14 (Kerosene Range)	RD977	1.10E+01	5.5E+00	UJ	-	-
C14-C20 (Diesel Range)	RD977	1.10E+01	5.5E+00	UJ	-	-
C20-C30 (Lubricant Oil Range)	RD977	1.10E+01	5.5E+00	UJ	-	-
C11-C30	RD977		1.7E+01		-	-
Benzene	RD977	5.00E-03	2.5E-03	U	-	2.5E-03
Ethylbenzene	RD977	5.00E-03	2.5E-03	U	-	2.5E-03
Toluene	RD977	5.00E-03	2.5E-03	U	-	2.5E-03
m,p-Xylene	RD977	5.00E-03	2.5E-03	U	-	2.5E-03
o-Xylene	RD977	5.00E-03	2.5E-03	U	-	2.5E-03
Xylene (total)	RD977	-	-	-	-	-
2-Methylnaphthalene	RD977	-	-	-	-	-
Acenaphthene	RD977	-	-	-	9.5E-03	9.5E-03
Acenaphthylene	RD977	-	-	-	1.2E-03	1.2E-03
Anthracene	RD977	-	-	-	6.2E-03	6.2E-03
Benzo(a)anthracene	RD977	-	-	-	4.4E-04	4.4E-04
Benzo(a)pyrene	RD977	-	-	-	4.5E-04	4.5E-04
Benzo(b)fluoranthene	RD977	-	-	-	7.1E-04	7.1E-04
Benzo(e)pyrene	RD977	-	-	-	3.4E-03	3.4E-03
Benzo(g,h,i)perylene	RD977	-	-	-	3.6E-03	3.6E-03
Benzo(k)fluoranthene	RD977	-	-	-	3.4E-04	3.4E-04
Chrysene	RD977	-	-	-	9.7E-04	9.7E-04
Dibenz(a,h)anthracene	RD977	-	-	-	1.8E-04	1.8E-04
Fluoranthene	RD977	-	-	-	1.2E-03	1.2E-03
Fluorene	RD977	-	-	-	9.4E-03	9.4E-03
Indeno(1,2,3-cd)pyrene	RD977	-	-	-	4.0E-04	4.0E-04
Naphthalene	RD977	-	-	-	-	-
Perylene	RD977	-	-	-	1.9E-03	1.9E-03
Phenanthrene	RD977	-	-	-	2.5E-02	2.5E-02
Pyrene	RD977	-	-	-	2.2E-03	2.2E-03
C08-C11 (Gasoline Range)	RD979	1.10E+01	5.5E+00	UJ	-	-
C11-C14 (Kerosene Range)	RD979	1.10E+01	5.5E+00	UJ	-	-
C14-C20 (Diesel Range)	RD979	1.10E+01	5.5E+00	UJ	-	-
C20-C30 (Lubricant Oil Range)	RD979	1.10E+01	5.5E+00	UJ	-	-
C11-C30	RD979		1.7E+01		-	-
Benzene	RD979	5.00E-03	2.5E-03	U	-	2.5E-03
Ethylbenzene	RD979	5.00E-03	2.5E-03	U	-	2.5E-03
Toluene	RD979	5.00E-03	2.5E-03	U	-	2.5E-03
m,p-Xylene	RD979	5.00E-03	2.5E-03	U	-	2.5E-03
o-Xylene	RD979	5.00E-03	2.5E-03	U	-	2.5E-03

TPH to Petroleum Constituent Extrapolation for Soil/Sediment (0-6 feet bgs) [a]
Sodium Reactor Experiment (SRE) Area

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Xylene (total)	RD979	-	-	-	-	-
2-Methylnaphthalene	RD979	-	-	-	-	-
Acenaphthene	RD979	-	-	-	9.5E-03	9.5E-03
Acenaphthylene	RD979	-	-	-	1.2E-03	1.2E-03
Anthracene	RD979	-	-	-	6.2E-03	6.2E-03
Benzo(a)anthracene	RD979	-	-	-	4.4E-04	4.4E-04
Benzo(a)pyrene	RD979	-	-	-	4.5E-04	4.5E-04
Benzo(b)fluoranthene	RD979	-	-	-	7.1E-04	7.1E-04
Benzo(e)pyrene	RD979	-	-	-	3.4E-03	3.4E-03
Benzo(g,h,i)perylene	RD979	-	-	-	3.6E-03	3.6E-03
Benzo(k)fluoranthene	RD979	-	-	-	3.4E-04	3.4E-04
Chrysene	RD979	-	-	-	9.7E-04	9.7E-04
Dibenz(a,h)anthracene	RD979	-	-	-	1.8E-04	1.8E-04
Fluoranthene	RD979	-	-	-	1.2E-03	1.2E-03
Fluorene	RD979	-	-	-	9.4E-03	9.4E-03
Indeno(1,2,3-cd)pyrene	RD979	-	-	-	4.0E-04	4.0E-04
Naphthalene	RD979	-	-	-	-	-
Perylene	RD979	-	-	-	1.9E-03	1.9E-03
Phenanthrene	RD979	-	-	-	2.5E-02	2.5E-02
Pyrene	RD979	-	-	-	2.2E-03	2.2E-03
C08-C11 (Gasoline Range)	RD980	1.10E+01	5.5E+00	UJ	-	-
C11-C14 (Kerosene Range)	RD980	1.10E+01	5.5E+00	UJ	-	-
C14-C20 (Diesel Range)	RD980	1.10E+01	5.5E+00	UJ	-	-
C20-C30 (Lubricant Oil Range)	RD980	1.10E+01	5.5E+00	UJ	-	-
C11-C30	RD980		1.7E+01		-	-
Benzene	RD980	5.00E-03	2.5E-03	U	-	2.5E-03
Ethylbenzene	RD980	5.00E-03	2.5E-03	U	-	2.5E-03
Toluene	RD980	5.00E-03	2.5E-03	U	-	2.5E-03
m,p-Xylene	RD980	5.00E-03	2.5E-03	U	-	2.5E-03
o-Xylene	RD980	5.00E-03	2.5E-03	U	-	2.5E-03
Xylene (total)	RD980	-	-	-	-	-
2-Methylnaphthalene	RD980	-	-	-	-	-
Acenaphthene	RD980	-	-	-	9.5E-03	9.5E-03
Acenaphthylene	RD980	-	-	-	1.2E-03	1.2E-03
Anthracene	RD980	-	-	-	6.2E-03	6.2E-03
Benzo(a)anthracene	RD980	-	-	-	4.4E-04	4.4E-04
Benzo(a)pyrene	RD980	-	-	-	4.5E-04	4.5E-04
Benzo(b)fluoranthene	RD980	-	-	-	7.1E-04	7.1E-04
Benzo(e)pyrene	RD980	-	-	-	3.4E-03	3.4E-03
Benzo(g,h,i)perylene	RD980	-	-	-	3.6E-03	3.6E-03
Benzo(k)fluoranthene	RD980	-	-	-	3.4E-04	3.4E-04
Chrysene	RD980	-	-	-	9.7E-04	9.7E-04
Dibenz(a,h)anthracene	RD980	-	-	-	1.8E-04	1.8E-04
Fluoranthene	RD980	-	-	-	1.2E-03	1.2E-03
Fluorene	RD980	-	-	-	9.4E-03	9.4E-03
Indeno(1,2,3-cd)pyrene	RD980	-	-	-	4.0E-04	4.0E-04
Naphthalene	RD980	-	-	-	-	-
Perylene	RD980	-	-	-	1.9E-03	1.9E-03
Phenanthrene	RD980	-	-	-	2.5E-02	2.5E-02
Pyrene	RD980	-	-	-	2.2E-03	2.2E-03
C08-C11 (Gasoline Range)	RJ152	4.00E+00	2.0E+00	U	-	-
C11-C14 (Kerosene Range)	RJ152	4.00E+00	2.0E+00	U	-	-
C14-C20 (Diesel Range)	RJ152	4.00E+00	2.0E+00	U	-	-
C20-C30 (Lubricant Oil Range)	RJ152	4.00E+00	2.0E+00	U	-	-
C11-C30	RJ152		6.0E+00		-	-

TPH to Petroleum Constituent Extrapolation for Soil/Sediment (0-6 feet bgs) [a]
Sodium Reactor Experiment (SRE) Area

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Benzene	RJ152	5.00E-03	2.5E-03	U	-	2.5E-03
Ethylbenzene	RJ152	5.00E-03	2.5E-03	U	-	2.5E-03
Toluene	RJ152	5.00E-03	2.5E-03	U	-	2.5E-03
m,p-Xylene	RJ152	6.00E-04	6.0E-04	J	-	6.0E-04
o-Xylene	RJ152	5.00E-03	2.5E-03	U	-	2.5E-03
Xylene (total)	RJ152	6.00E-04	6.0E-04	J	-	6.0E-04
2-Methylnaphthalene	RJ152	-	-	-	-	-
Acenaphthene	RJ152	-	-	-	3.4E-03	3.4E-03
Acenaphthylene	RJ152	-	-	-	4.2E-04	4.2E-04
Anthracene	RJ152	-	-	-	2.2E-03	2.2E-03
Benzo(a)anthracene	RJ152	-	-	-	1.6E-04	1.6E-04
Benzo(a)pyrene	RJ152	-	-	-	1.6E-04	1.6E-04
Benzo(b)fluoranthene	RJ152	-	-	-	2.6E-04	2.6E-04
Benzo(e)pyrene	RJ152	-	-	-	1.2E-03	1.2E-03
Benzo(g,h,i)perylene	RJ152	-	-	-	1.3E-03	1.3E-03
Benzo(k)fluoranthene	RJ152	-	-	-	1.2E-04	1.2E-04
Chrysene	RJ152	-	-	-	3.5E-04	3.5E-04
Dibenz(a,h)anthracene	RJ152	-	-	-	6.6E-05	6.6E-05
Fluoranthene	RJ152	-	-	-	4.5E-04	4.5E-04
Fluorene	RJ152	-	-	-	3.4E-03	3.4E-03
Indeno(1,2,3-cd)pyrene	RJ152	-	-	-	1.4E-04	1.4E-04
Naphthalene	RJ152	-	-	-	-	-
Perylene	RJ152	-	-	-	7.1E-04	7.1E-04
Phenanthrene	RJ152	-	-	-	9.2E-03	9.2E-03
Pyrene	RJ152	-	-	-	8.2E-04	8.2E-04
C08-C11 (Gasoline Range)	RJ202	4.00E+00	2.0E+00	UJ	-	-
C11-C14 (Kerosene Range)	RJ202	4.00E+00	2.0E+00	UJ	-	-
C14-C20 (Diesel Range)	RJ202	4.00E+00	2.0E+00	UJ	-	-
C20-C30 (Lubricant Oil Range)	RJ202	6.25E+00	6.3E+00	J	-	-
C11-C30	RJ202		1.0E+01		-	-
Benzene	RJ202	-	-	-	-	-
Ethylbenzene	RJ202	-	-	-	-	-
Toluene	RJ202	-	-	-	-	-
m,p-Xylene	RJ202	-	-	-	-	-
o-Xylene	RJ202	-	-	-	-	-
Xylene (total)	RJ202	-	-	-	-	-
2-Methylnaphthalene	RJ202	-	-	-	-	-
Acenaphthene	RJ202	-	-	-	5.9E-03	5.9E-03
Acenaphthylene	RJ202	-	-	-	7.2E-04	7.2E-04
Anthracene	RJ202	-	-	-	3.8E-03	3.8E-03
Benzo(a)anthracene	RJ202	-	-	-	2.8E-04	2.8E-04
Benzo(a)pyrene	RJ202	-	-	-	2.8E-04	2.8E-04
Benzo(b)fluoranthene	RJ202	-	-	-	4.4E-04	4.4E-04
Benzo(e)pyrene	RJ202	-	-	-	2.1E-03	2.1E-03
Benzo(g,h,i)perylene	RJ202	-	-	-	2.3E-03	2.3E-03
Benzo(k)fluoranthene	RJ202	-	-	-	2.1E-04	2.1E-04
Chrysene	RJ202	-	-	-	6.0E-04	6.0E-04
Dibenz(a,h)anthracene	RJ202	-	-	-	1.1E-04	1.1E-04
Fluoranthene	RJ202	-	-	-	7.7E-04	7.7E-04
Fluorene	RJ202	-	-	-	5.8E-03	5.8E-03
Indeno(1,2,3-cd)pyrene	RJ202	-	-	-	2.5E-04	2.5E-04
Naphthalene	RJ202	-	-	-	-	-
Perylene	RJ202	-	-	-	1.2E-03	1.2E-03
Phenanthrene	RJ202	-	-	-	1.6E-02	1.6E-02
Pyrene	RJ202	-	-	-	1.4E-03	1.4E-03

TPH to Petroleum Constituent Extrapolation for Soil/Sediment (0-6 feet bgs) [a]
Sodium Reactor Experiment (SRE) Area

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
C08-C11 (Gasoline Range)	RJ253	4.00E+00	2.0E+00	U	-	-
C11-C14 (Kerosene Range)	RJ253	4.00E+00	2.0E+00	U	-	-
C14-C20 (Diesel Range)	RJ253	4.00E+00	2.0E+00	U	-	-
C20-C30 (Lubricant Oil Range)	RJ253	4.00E+00	2.0E+00	U	-	-
C11-C30	RJ253		6.0E+00		-	-
Benzene	RJ253	-	-	-	-	-
Ethylbenzene	RJ253	-	-	-	-	-
Toluene	RJ253	-	-	-	-	-
m,p-Xylene	RJ253	-	-	-	-	-
o-Xylene	RJ253	-	-	-	-	-
Xylene (total)	RJ253	-	-	-	-	-
2-Methylnaphthalene	RJ253	4.00E-03	2.0E-03	U	-	2.0E-03
Acenaphthene	RJ253	3.00E-03	3.0E-03	J	3.4E-03	3.0E-03
Acenaphthylene	RJ253	4.00E-03	2.0E-03	U	4.2E-04	4.2E-04
Anthracene	RJ253	4.00E-03	2.0E-03	U	2.2E-03	2.0E-03
Benzo(a)anthracene	RJ253	4.00E-03	2.0E-03	U	1.6E-04	1.6E-04
Benzo(a)pyrene	RJ253	4.00E-03	2.0E-03	U	1.6E-04	1.6E-04
Benzo(b)fluoranthene	RJ253	4.00E-03	2.0E-03	U	2.6E-04	2.6E-04
Benzo(e)pyrene	RJ253	-	-	-	1.2E-03	1.2E-03
Benzo(g,h,i)perylene	RJ253	4.00E-03	2.0E-03	U	1.3E-03	1.3E-03
Benzo(k)fluoranthene	RJ253	4.00E-03	2.0E-03	U	1.2E-04	1.2E-04
Chrysene	RJ253	4.00E-03	2.0E-03	U	3.5E-04	3.5E-04
Dibenz(a,h)anthracene	RJ253	4.00E-03	2.0E-03	U	6.6E-05	6.6E-05
Fluoranthene	RJ253	4.00E-03	2.0E-03	U	4.5E-04	4.5E-04
Fluorene	RJ253	4.00E-03	2.0E-03	U	3.4E-03	2.0E-03
Indeno(1,2,3-cd)pyrene	RJ253	4.00E-03	2.0E-03	U	1.4E-04	1.4E-04
Naphthalene	RJ253	4.00E-03	2.0E-03	U	-	2.0E-03
Perylene	RJ253	-	-	-	7.1E-04	7.1E-04
Phenanthrene	RJ253	4.00E-03	2.0E-03	U	9.2E-03	2.0E-03
Pyrene	RJ253	4.00E-03	2.0E-03	U	8.2E-04	8.2E-04
C08-C11 (Gasoline Range)	RJ271	4.00E+00	2.0E+00	U	-	-
C11-C14 (Kerosene Range)	RJ271	4.00E+00	2.0E+00	U	-	-
C14-C20 (Diesel Range)	RJ271	4.00E+00	2.0E+00	U	-	-
C20-C30 (Lubricant Oil Range)	RJ271	4.00E+00	2.0E+00	U	-	-
C11-C30	RJ271		6.0E+00		-	-
Benzene	RJ271	-	-	-	-	-
Ethylbenzene	RJ271	-	-	-	-	-
Toluene	RJ271	-	-	-	-	-
m,p-Xylene	RJ271	-	-	-	-	-
o-Xylene	RJ271	-	-	-	-	-
Xylene (total)	RJ271	-	-	-	-	-
2-Methylnaphthalene	RJ271	3.00E-03	1.5E-03	U	-	1.5E-03
Acenaphthene	RJ271	3.00E-03	1.5E-03	U	3.4E-03	1.5E-03
Acenaphthylene	RJ271	3.00E-03	1.5E-03	U	4.2E-04	4.2E-04
Anthracene	RJ271	3.00E-03	1.5E-03	U	2.2E-03	1.5E-03
Benzo(a)anthracene	RJ271	3.00E-03	1.5E-03	U	1.6E-04	1.6E-04
Benzo(a)pyrene	RJ271	3.00E-03	1.5E-03	U	1.6E-04	1.6E-04
Benzo(b)fluoranthene	RJ271	3.00E-03	1.5E-03	U	2.6E-04	2.6E-04
Benzo(e)pyrene	RJ271	-	-	-	1.2E-03	1.2E-03
Benzo(g,h,i)perylene	RJ271	3.00E-03	1.5E-03	U	1.3E-03	1.3E-03
Benzo(k)fluoranthene	RJ271	3.00E-03	1.5E-03	U	1.2E-04	1.2E-04
Chrysene	RJ271	3.00E-03	1.5E-03	U	3.5E-04	3.5E-04
Dibenz(a,h)anthracene	RJ271	3.00E-03	1.5E-03	U	6.6E-05	6.6E-05
Fluoranthene	RJ271	3.00E-03	1.5E-03	U	4.5E-04	4.5E-04
Fluorene	RJ271	3.00E-03	1.5E-03	U	3.4E-03	1.5E-03

TPH to Petroleum Constituent Extrapolation for Soil/Sediment (0-6 feet bgs) [a]
Sodium Reactor Experiment (SRE) Area

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Indeno(1,2,3-cd)pyrene	RJ271	3.00E-03	1.5E-03	U	1.4E-04	1.4E-04
Naphthalene	RJ271	3.00E-03	3.0E-03	J	-	3.0E-03
Perylene	RJ271	-	-	-	7.1E-04	7.1E-04
Phenanthrene	RJ271	3.00E-03	1.5E-03	U	9.2E-03	1.5E-03
Pyrene	RJ271	3.00E-03	1.5E-03	U	8.2E-04	8.2E-04
C08-C11 (Gasoline Range)	RJ513	3.00E+00	1.5E+00	UJ	-	-
C11-C14 (Kerosene Range)	RJ513	3.00E+00	1.5E+00	UJ	-	-
C14-C20 (Diesel Range)	RJ513	3.00E+00	1.5E+00	U	-	-
C20-C30 (Lubricant Oil Range)	RJ513	6.60E+01	6.6E+01		-	-
C11-C30	RJ513		6.9E+01		-	-
Benzene	RJ513	-	-	-	-	-
Ethylbenzene	RJ513	-	-	-	-	-
Toluene	RJ513	-	-	-	-	-
m,p-Xylene	RJ513	-	-	-	-	-
o-Xylene	RJ513	-	-	-	-	-
Xylene (total)	RJ513	-	-	-	-	-
2-Methylnaphthalene	RJ513	7.00E-03	3.5E-03	UJ	-	3.5E-03
Acenaphthene	RJ513	7.00E-03	3.5E-03	UJ	4.0E-02	3.5E-03
Acenaphthylene	RJ513	7.00E-03	3.5E-03	UJ	4.8E-03	3.5E-03
Anthracene	RJ513	7.00E-03	3.5E-03	UJ	2.6E-02	3.5E-03
Benzo(a)anthracene	RJ513	7.00E-03	3.5E-03	UJ	1.9E-03	1.9E-03
Benzo(a)pyrene	RJ513	-	-	-	1.9E-03	1.9E-03
Benzo(b)fluoranthene	RJ513	-	-	-	3.0E-03	3.0E-03
Benzo(e)pyrene	RJ513	-	-	-	1.4E-02	1.4E-02
Benzo(g,h,i)perylene	RJ513	-	-	-	1.5E-02	1.5E-02
Benzo(k)fluoranthene	RJ513	-	-	-	1.4E-03	1.4E-03
Chrysene	RJ513	7.00E-03	3.5E-03	U	4.0E-03	3.5E-03
Dibenz(a,h)anthracene	RJ513	-	-	-	7.6E-04	7.6E-04
Fluoranthene	RJ513	7.00E-03	3.5E-03	UJ	5.2E-03	3.5E-03
Fluorene	RJ513	7.00E-03	3.5E-03	UJ	3.9E-02	3.5E-03
Indeno(1,2,3-cd)pyrene	RJ513	-	-	-	1.7E-03	1.7E-03
Naphthalene	RJ513	7.00E-03	3.5E-03	UJ	-	3.5E-03
Perylene	RJ513	-	-	-	8.1E-03	8.1E-03
Phenanthrene	RJ513	5.40E-02	5.4E-02		1.1E-01	5.4E-02
Pyrene	RJ513	7.00E-03	3.5E-03	UJ	9.4E-03	3.5E-03
C08-C11 (Gasoline Range)	RJ516	9.90E+01	5.0E+01	U	-	-
C11-C14 (Kerosene Range)	RJ516	9.90E+01	5.0E+01	U	-	-
C14-C20 (Diesel Range)	RJ516	9.90E+01	5.0E+01	U	-	-
C20-C30 (Lubricant Oil Range)	RJ516	4.20E+02	4.2E+02		-	-
C11-C30	RJ516		5.2E+02		-	-
Benzene	RJ516	5.00E-03	2.5E-03	U	-	2.5E-03
Ethylbenzene	RJ516	5.00E-03	2.5E-03	U	-	2.5E-03
Toluene	RJ516	5.00E-03	2.5E-03	U	-	2.5E-03
m,p-Xylene	RJ516	1.00E-02	5.0E-03	U	-	5.0E-03
o-Xylene	RJ516	5.00E-03	2.5E-03	U	-	2.5E-03
Xylene (total)	RJ516	-	-	-	-	-
2-Methylnaphthalene	RJ516	3.00E-03	1.5E-03	U	-	1.5E-03
Acenaphthene	RJ516	3.00E-03	1.5E-03	U	3.0E-01	1.5E-03
Acenaphthylene	RJ516	3.00E-03	1.5E-03	U	3.6E-02	1.5E-03
Anthracene	RJ516	3.00E-03	1.5E-03	U	1.9E-01	1.5E-03
Benzo(a)anthracene	RJ516	2.00E-03	2.0E-03	J	1.4E-02	2.0E-03
Benzo(a)pyrene	RJ516	4.00E-03	4.0E-03		1.4E-02	4.0E-03
Benzo(b)fluoranthene	RJ516	5.00E-03	5.0E-03		2.2E-02	5.0E-03
Benzo(e)pyrene	RJ516	-	-	-	1.1E-01	1.1E-01
Benzo(g,h,i)perylene	RJ516	3.00E-03	1.5E-03	U	1.1E-01	1.5E-03

TPH to Petroleum Constituent Extrapolation for Soil/Sediment (0-6 feet bgs) [a]
Sodium Reactor Experiment (SRE) Area

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Benzo(k)fluoranthene	RJ516	4.00E-03	4.0E-03		1.1E-02	4.0E-03
Chrysene	RJ516	5.00E-03	5.0E-03		3.0E-02	5.0E-03
Dibenz(a,h)anthracene	RJ516	3.00E-03	1.5E-03	U	5.7E-03	1.5E-03
Fluoranthene	RJ516	4.00E-03	4.0E-03		3.9E-02	4.0E-03
Fluorene	RJ516	3.00E-03	1.5E-03	U	2.9E-01	1.5E-03
Indeno(1,2,3-cd)pyrene	RJ516	5.00E-03	5.0E-03		1.2E-02	5.0E-03
Naphthalene	RJ516	3.00E-03	1.5E-03	U	-	1.5E-03
Perylene	RJ516	-	-	-	6.1E-02	6.1E-02
Phenanthrene	RJ516	2.00E-03	2.0E-03	J	8.0E-01	2.0E-03
Pyrene	RJ516	5.00E-03	5.0E-03		7.1E-02	5.0E-03
C08-C11 (Gasoline Range)	RJ517	3.00E+00	1.5E+00	U	-	-
C11-C14 (Kerosene Range)	RJ517	3.00E+00	1.5E+00	U	-	-
C14-C20 (Diesel Range)	RJ517	3.00E+00	1.5E+00	U	-	-
C20-C30 (Lubricant Oil Range)	RJ517	1.20E+01	1.2E+01		-	-
C11-C30	RJ517		1.5E+01		-	-
Benzene	RJ517	5.00E-03	2.5E-03	U	-	2.5E-03
Ethylbenzene	RJ517	5.00E-03	2.5E-03	U	-	2.5E-03
Toluene	RJ517	3.00E-03	1.5E-03	U	-	1.5E-03
m,p-Xylene	RJ517	1.00E-02	5.0E-03	U	-	5.0E-03
o-Xylene	RJ517	5.00E-03	2.5E-03	U	-	2.5E-03
Xylene (total)	RJ517	1.50E-02	7.5E-03	U	-	7.5E-03
2-Methylnaphthalene	RJ517	3.00E-03	1.5E-03	U	-	1.5E-03
Acenaphthene	RJ517	3.00E-03	1.5E-03	U	8.6E-03	1.5E-03
Acenaphthylene	RJ517	3.00E-03	1.5E-03	U	1.1E-03	1.1E-03
Anthracene	RJ517	3.00E-03	1.5E-03	U	5.6E-03	1.5E-03
Benzo(a)anthracene	RJ517	3.00E-03	1.5E-03	U	4.0E-04	4.0E-04
Benzo(a)pyrene	RJ517	3.00E-03	1.5E-03	U	4.1E-04	4.1E-04
Benzo(b)fluoranthene	RJ517	3.00E-03	3.0E-03	J	6.5E-04	3.0E-03
Benzo(e)pyrene	RJ517	-	-	-	3.1E-03	3.1E-03
Benzo(g,h,i)perylene	RJ517	3.00E-03	1.5E-03	U	3.3E-03	1.5E-03
Benzo(k)fluoranthene	RJ517	3.00E-03	1.5E-03	U	3.1E-04	3.1E-04
Chrysene	RJ517	5.00E-03	5.0E-03		8.8E-04	5.0E-03
Dibenz(a,h)anthracene	RJ517	3.00E-03	1.5E-03	U	1.7E-04	1.7E-04
Fluoranthene	RJ517	4.00E-03	4.0E-03		1.1E-03	4.0E-03
Fluorene	RJ517	3.00E-03	1.5E-03	U	8.5E-03	1.5E-03
Indeno(1,2,3-cd)pyrene	RJ517	3.00E-03	1.5E-03	U	3.6E-04	3.6E-04
Naphthalene	RJ517	3.00E-03	1.5E-03	U	-	1.5E-03
Perylene	RJ517	-	-	-	1.8E-03	1.8E-03
Phenanthrene	RJ517	3.00E-03	1.5E-03	U	2.3E-02	1.5E-03
Pyrene	RJ517	3.00E-03	3.0E-03	J	2.0E-03	3.0E-03
C08-C11 (Gasoline Range)	RJ627	4.00E+00	2.0E+00	U	-	-
C11-C14 (Kerosene Range)	RJ627	4.00E+00	2.0E+00	U	-	-
C14-C20 (Diesel Range)	RJ627	4.00E+00	2.0E+00	U	-	-
C20-C30 (Lubricant Oil Range)	RJ627	4.00E+00	2.0E+00	U	-	-
C11-C30	RJ627		6.0E+00		-	-
Benzene	RJ627	-	-	-	-	-
Ethylbenzene	RJ627	-	-	-	-	-
Toluene	RJ627	-	-	-	-	-
m,p-Xylene	RJ627	-	-	-	-	-
o-Xylene	RJ627	-	-	-	-	-
Xylene (total)	RJ627	-	-	-	-	-
2-Methylnaphthalene	RJ627	-	-	-	-	-
Acenaphthene	RJ627	-	-	-	3.4E-03	3.4E-03
Acenaphthylene	RJ627	-	-	-	4.2E-04	4.2E-04
Anthracene	RJ627	-	-	-	2.2E-03	2.2E-03

TPH to Petroleum Constituent Extrapolation for Soil/Sediment (0-6 feet bgs) [a]
Sodium Reactor Experiment (SRE) Area

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Benzo(a)anthracene	RJ627	-	-	-	1.6E-04	1.6E-04
Benzo(a)pyrene	RJ627	-	-	-	1.6E-04	1.6E-04
Benzo(b)fluoranthene	RJ627	-	-	-	2.6E-04	2.6E-04
Benzo(e)pyrene	RJ627	-	-	-	1.2E-03	1.2E-03
Benzo(g,h,i)perylene	RJ627	-	-	-	1.3E-03	1.3E-03
Benzo(k)fluoranthene	RJ627	-	-	-	1.2E-04	1.2E-04
Chrysene	RJ627	-	-	-	3.5E-04	3.5E-04
Dibenz(a,h)anthracene	RJ627	-	-	-	6.6E-05	6.6E-05
Fluoranthene	RJ627	-	-	-	4.5E-04	4.5E-04
Fluorene	RJ627	-	-	-	3.4E-03	3.4E-03
Indeno(1,2,3-cd)pyrene	RJ627	-	-	-	1.4E-04	1.4E-04
Naphthalene	RJ627	-	-	-	-	-
Perylene	RJ627	-	-	-	7.1E-04	7.1E-04
Phenanthrene	RJ627	-	-	-	9.2E-03	9.2E-03
Pyrene	RJ627	-	-	-	8.2E-04	8.2E-04
C08-C11 (Gasoline Range)	RJ786	1.80E+01	9.0E+00	U	-	-
C11-C14 (Kerosene Range)	RJ786	4.00E+01	4.0E+01		-	-
C14-C20 (Diesel Range)	RJ786	1.80E+01	9.0E+00	U	-	-
C20-C30 (Lubricant Oil Range)	RJ786	4.70E+02	4.7E+02		-	-
C11-C30	RJ786		5.2E+02		-	-
Benzene	RJ786	-	-	-	-	-
Ethylbenzene	RJ786	-	-	-	-	-
Toluene	RJ786	-	-	-	-	-
m,p-Xylene	RJ786	-	-	-	-	-
o-Xylene	RJ786	-	-	-	-	-
Xylene (total)	RJ786	-	-	-	-	-
2-Methylnaphthalene	RJ786	-	-	-	-	-
Acenaphthene	RJ786	-	-	-	3.0E-01	3.0E-01
Acenaphthylene	RJ786	-	-	-	3.6E-02	3.6E-02
Anthracene	RJ786	-	-	-	1.9E-01	1.9E-01
Benzo(a)anthracene	RJ786	-	-	-	1.4E-02	1.4E-02
Benzo(a)pyrene	RJ786	-	-	-	1.4E-02	1.4E-02
Benzo(b)fluoranthene	RJ786	-	-	-	2.2E-02	2.2E-02
Benzo(e)pyrene	RJ786	-	-	-	1.1E-01	1.1E-01
Benzo(g,h,i)perylene	RJ786	-	-	-	1.1E-01	1.1E-01
Benzo(k)fluoranthene	RJ786	-	-	-	1.1E-02	1.1E-02
Chrysene	RJ786	-	-	-	3.0E-02	3.0E-02
Dibenz(a,h)anthracene	RJ786	-	-	-	5.7E-03	5.7E-03
Fluoranthene	RJ786	-	-	-	3.9E-02	3.9E-02
Fluorene	RJ786	-	-	-	2.9E-01	2.9E-01
Indeno(1,2,3-cd)pyrene	RJ786	-	-	-	1.2E-02	1.2E-02
Naphthalene	RJ786	-	-	-	-	-
Perylene	RJ786	-	-	-	6.1E-02	6.1E-02
Phenanthrene	RJ786	-	-	-	8.0E-01	8.0E-01
Pyrene	RJ786	-	-	-	7.1E-02	7.1E-02
C08-C11 (Gasoline Range)	RJ788	3.00E+00	1.5E+00	U	-	-
C11-C14 (Kerosene Range)	RJ788	3.00E+00	1.5E+00	U	-	-
C14-C20 (Diesel Range)	RJ788	1.40E+01	1.4E+01	J	-	-
C20-C30 (Lubricant Oil Range)	RJ788	1.30E+02	1.3E+02	J	-	-
C11-C30	RJ788		1.5E+02		-	-
Benzene	RJ788	-	-	-	-	-
Ethylbenzene	RJ788	-	-	-	-	-
Toluene	RJ788	-	-	-	-	-
m,p-Xylene	RJ788	-	-	-	-	-
o-Xylene	RJ788	-	-	-	-	-

TPH to Petroleum Constituent Extrapolation for Soil/Sediment (0-6 feet bgs) [a]
Sodium Reactor Experiment (SRE) Area

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Xylene (total)	RJ788	-	-	-	-	-
2-Methylnaphthalene	RJ788	2.50E-02	2.5E-02		-	2.5E-02
Acenaphthene	RJ788	2.00E-01	2.0E-01		8.3E-02	2.0E-01
Acenaphthylene	RJ788	1.80E-02	9.0E-03	U	1.0E-02	9.0E-03
Anthracene	RJ788	1.80E-02	9.0E-03	U	5.4E-02	9.0E-03
Benzo(a)anthracene	RJ788	3.90E+00	3.9E+00	J	3.9E-03	3.9E+00
Benzo(a)pyrene	RJ788	4.20E+00	4.2E+00		4.0E-03	4.2E+00
Benzo(b)fluoranthene	RJ788	4.10E+00	4.1E+00		6.3E-03	4.1E+00
Benzo(e)pyrene	RJ788	-	-	-	3.0E-02	3.0E-02
Benzo(g,h,i)perylene	RJ788	9.50E-01	9.5E-01		3.2E-02	9.5E-01
Benzo(k)fluoranthene	RJ788	4.00E+00	4.0E+00		3.0E-03	4.0E+00
Chrysene	RJ788	1.80E-02	9.0E-03	UJ	8.5E-03	8.5E-03
Dibenz(a,h)anthracene	RJ788	3.10E-01	3.1E-01		1.6E-03	3.1E-01
Fluoranthene	RJ788	7.00E+00	7.0E+00		1.1E-02	7.0E+00
Fluorene	RJ788	2.10E-01	2.1E-01		8.3E-02	2.1E-01
Indeno(1,2,3-cd)pyrene	RJ788	1.70E+00	1.7E+00	J	3.5E-03	1.7E+00
Naphthalene	RJ788	5.80E-02	5.8E-02		-	5.8E-02
Perylene	RJ788	-	-	-	1.7E-02	1.7E-02
Phenanthrene	RJ788	3.30E+00	3.3E+00		2.2E-01	3.3E+00
Pyrene	RJ788	5.60E+00	5.6E+00	J	2.0E-02	5.6E+00
C08-C11 (Gasoline Range)	RJ790	1.70E+01	8.5E+00	U	-	-
C11-C14 (Kerosene Range)	RJ790	1.70E+01	8.5E+00	U	-	-
C14-C20 (Diesel Range)	RJ790	1.80E+01	1.8E+01	J	-	-
C20-C30 (Lubricant Oil Range)	RJ790	3.40E+02	3.4E+02	J	-	-
C11-C30	RJ790		3.7E+02		-	-
Benzene	RJ790	-	-	-	-	-
Ethylbenzene	RJ790	-	-	-	-	-
Toluene	RJ790	-	-	-	-	-
m,p-Xylene	RJ790	-	-	-	-	-
o-Xylene	RJ790	-	-	-	-	-
Xylene (total)	RJ790	-	-	-	-	-
2-Methylnaphthalene	RJ790	3.50E-01	1.8E-01	U	-	1.8E-01
Acenaphthene	RJ790	9.00E-01	9.0E-01		2.1E-01	9.0E-01
Acenaphthylene	RJ790	3.50E-01	1.8E-01	U	2.6E-02	2.6E-02
Anthracene	RJ790	4.00E+00	4.0E+00		1.4E-01	4.0E+00
Benzo(a)anthracene	RJ790	1.40E+01	1.4E+01	J	9.9E-03	1.4E+01
Benzo(a)pyrene	RJ790	1.50E+01	1.5E+01		1.0E-02	1.5E+01
Benzo(b)fluoranthene	RJ790	1.30E+01	1.3E+01		1.6E-02	1.3E+01
Benzo(e)pyrene	RJ790	-	-	-	7.6E-02	7.6E-02
Benzo(g,h,i)perylene	RJ790	4.70E+00	4.7E+00		8.1E-02	4.7E+00
Benzo(k)fluoranthene	RJ790	1.50E+01	1.5E+01		7.5E-03	1.5E+01
Chrysene	RJ790	1.30E+01	1.3E+01	J	2.1E-02	1.3E+01
Dibenz(a,h)anthracene	RJ790	2.20E+00	2.2E+00		4.1E-03	2.2E+00
Fluoranthene	RJ790	2.50E+01	2.5E+01		2.7E-02	2.5E+01
Fluorene	RJ790	9.20E-01	9.2E-01		2.1E-01	9.2E-01
Indeno(1,2,3-cd)pyrene	RJ790	6.40E+00	6.4E+00	J	8.8E-03	6.4E+00
Naphthalene	RJ790	3.50E-01	1.8E-01	U	-	1.8E-01
Perylene	RJ790	-	-	-	4.3E-02	4.3E-02
Phenanthrene	RJ790	1.10E+01	1.1E+01		5.6E-01	1.1E+01
Pyrene	RJ790	2.10E+01	2.1E+01	J	5.0E-02	2.1E+01

Notes:

a. Petroleum constituent concentrations estimated and selected as described in Section 2.8 of the SRAM.

"-" not applicable

mg/kg - milligrams per kilogram

Aroclor to PCB Congener Extrapolation (0-6 feet bgs)
Sodium Reactor Experiment (SRE) Area

Chemical	EPA ID	Measured Concentrations (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF_{1254}	EF_{1260}	Estimated Concentrations Aroclor 1254 (mg/kg)	Estimated Concentrations Aroclor 1260 (mg/kg)	Estimated Concentrations PCB_{MAX} (mg/kg)
Aroclor-1254	MJ248	1.2E-01	1.2E-01	J	-	-	-	-	-
Aroclor-1260	MJ248	3.7E-02	1.9E-02	UJ	-	-	-	-	-
PCB-105	MJ248	-	-	-	1.2E-01	8.2E-02	1.5E-05	1.5E-06	1.5E-05
PCB-114	MJ248	-	-	-	4.5E-03	1.5E-03	5.4E-07	2.7E-08	5.4E-07
PCB-118	MJ248	-	-	-	2.7E-01	1.6E-01	3.2E-05	3.0E-06	3.2E-05
PCB-123	MJ248	-	-	-	3.0E-03	2.3E-03	3.6E-07	4.3E-08	3.6E-07
PCB-126	MJ248	-	-	-	7.5E-03	6.4E-03	9.0E-07	1.2E-07	9.0E-07
PCB-156	MJ248	-	-	-	6.3E-02	5.5E-02	7.5E-06	1.0E-06	7.5E-06
PCB-157	MJ248	-	-	-	1.2E-02	2.5E-02	1.5E-06	4.5E-07	1.5E-06
PCB-167	MJ248	-	-	-	2.1E-02	4.3E-02	2.5E-06	7.9E-07	2.5E-06
PCB-169	MJ248	-	-	-	3.7E-04	6.4E-04	4.4E-08	1.2E-08	4.4E-08
PCB-189	MJ248	-	-	-	3.0E-03	6.4E-03	3.6E-07	1.2E-07	3.6E-07
PCB-77	MJ248	-	-	-	1.5E-02	1.3E-02	1.9E-06	2.4E-07	1.9E-06
PCB-81	MJ248	-	-	-	3.0E-03	2.3E-03	3.6E-07	4.2E-08	3.6E-07
Aroclor-1254	MJ623	1.1E+00	5.5E-01	U	-	-	-	-	-
Aroclor-1260	MJ623	6.9E+00	6.9E+00		-	-	-	-	-
PCB-105	MJ623	-	-	-	1.2E-01	8.2E-02	6.8E-05	5.6E-04	5.6E-04
PCB-114	MJ623	-	-	-	4.5E-03	1.5E-03	2.5E-06	1.0E-05	1.0E-05
PCB-118	MJ623	-	-	-	2.7E-01	1.6E-01	1.5E-04	1.1E-03	1.1E-03
PCB-123	MJ623	-	-	-	3.0E-03	2.3E-03	1.6E-06	1.6E-05	1.6E-05
PCB-126	MJ623	-	-	-	7.5E-03	6.4E-03	4.1E-06	4.4E-05	4.4E-05
PCB-156	MJ623	-	-	-	6.3E-02	5.5E-02	3.5E-05	3.8E-04	3.8E-04
PCB-157	MJ623	-	-	-	1.2E-02	2.5E-02	6.8E-06	1.7E-04	1.7E-04
PCB-167	MJ623	-	-	-	2.1E-02	4.3E-02	1.1E-05	2.9E-04	2.9E-04
PCB-169	MJ623	-	-	-	3.7E-04	6.4E-04	2.0E-07	4.4E-06	4.4E-06
PCB-189	MJ623	-	-	-	3.0E-03	6.4E-03	1.6E-06	4.4E-05	4.4E-05
PCB-77	MJ623	-	-	-	1.5E-02	1.3E-02	8.5E-06	8.8E-05	8.8E-05
PCB-81	MJ623	-	-	-	3.0E-03	2.3E-03	1.6E-06	1.6E-05	1.6E-05
Aroclor-1254	MJ624	1.1E+00	5.5E-01	U	-	-	-	-	-
Aroclor-1260	MJ624	6.4E+00	6.4E+00		-	-	-	-	-
PCB-105	MJ624	-	-	-	1.2E-01	8.2E-02	6.8E-05	5.2E-04	5.2E-04
PCB-114	MJ624	-	-	-	4.5E-03	1.5E-03	2.5E-06	9.3E-06	9.3E-06
PCB-118	MJ624	-	-	-	2.7E-01	1.6E-01	1.5E-04	1.0E-03	1.0E-03
PCB-123	MJ624	-	-	-	3.0E-03	2.3E-03	1.6E-06	1.5E-05	1.5E-05
PCB-126	MJ624	-	-	-	7.5E-03	6.4E-03	4.1E-06	4.1E-05	4.1E-05
PCB-156	MJ624	-	-	-	6.3E-02	5.5E-02	3.5E-05	3.5E-04	3.5E-04
PCB-157	MJ624	-	-	-	1.2E-02	2.5E-02	6.8E-06	1.6E-04	1.6E-04
PCB-167	MJ624	-	-	-	2.1E-02	4.3E-02	1.1E-05	2.7E-04	2.7E-04
PCB-169	MJ624	-	-	-	3.7E-04	6.4E-04	2.0E-07	4.1E-06	4.1E-06
PCB-189	MJ624	-	-	-	3.0E-03	6.4E-03	1.6E-06	4.1E-05	4.1E-05
PCB-77	MJ624	-	-	-	1.5E-02	1.3E-02	8.5E-06	8.1E-05	8.1E-05
PCB-81	MJ624	-	-	-	3.0E-03	2.3E-03	1.6E-06	1.4E-05	1.4E-05

Aroclor to PCB Congener Extrapolation (0-6 feet bgs)
Sodium Reactor Experiment (SRE) Area

Chemical	EPA ID	Measured Concentrations (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF_{1254}	EF_{1260}	Estimated Concentrations Aroclor 1254 (mg/kg)	Estimated Concentrations Aroclor 1260 (mg/kg)	Estimated Concentrations PCB_{MAX} (mg/kg)
Aroclor-1254	MJ625	5.4E-01	2.7E-01	U	-	-	-	-	-
Aroclor-1260	MJ625	4.8E+00	4.8E+00		-	-	-	-	-
PCB-105	MJ625	-	-	-	1.2E-01	8.2E-02	3.3E-05	3.9E-04	3.9E-04
PCB-114	MJ625	-	-	-	4.5E-03	1.5E-03	1.2E-06	7.0E-06	7.0E-06
PCB-118	MJ625	-	-	-	2.7E-01	1.6E-01	7.2E-05	7.9E-04	7.9E-04
PCB-123	MJ625	-	-	-	3.0E-03	2.3E-03	8.1E-07	1.1E-05	1.1E-05
PCB-126	MJ625	-	-	-	7.5E-03	6.4E-03	2.0E-06	3.1E-05	3.1E-05
PCB-156	MJ625	-	-	-	6.3E-02	5.5E-02	1.7E-05	2.6E-04	2.6E-04
PCB-157	MJ625	-	-	-	1.2E-02	2.5E-02	3.3E-06	1.2E-04	1.2E-04
PCB-167	MJ625	-	-	-	2.1E-02	4.3E-02	5.6E-06	2.1E-04	2.1E-04
PCB-169	MJ625	-	-	-	3.7E-04	6.4E-04	9.9E-08	3.1E-06	3.1E-06
PCB-189	MJ625	-	-	-	3.0E-03	6.4E-03	8.1E-07	3.1E-05	3.1E-05
PCB-77	MJ625	-	-	-	1.5E-02	1.3E-02	4.2E-06	6.1E-05	6.1E-05
PCB-81	MJ625	-	-	-	3.0E-03	2.3E-03	8.1E-07	1.1E-05	1.1E-05
Aroclor-1254	MJ626	1.1E+00	5.5E-01	U	-	-	-	-	-
Aroclor-1260	MJ626	7.8E+00	7.8E+00		-	-	-	-	-
PCB-105	MJ626	-	-	-	1.2E-01	8.2E-02	6.8E-05	6.4E-04	6.4E-04
PCB-114	MJ626	-	-	-	4.5E-03	1.5E-03	2.5E-06	1.1E-05	1.1E-05
PCB-118	MJ626	-	-	-	2.7E-01	1.6E-01	1.5E-04	1.3E-03	1.3E-03
PCB-123	MJ626	-	-	-	3.0E-03	2.3E-03	1.6E-06	1.8E-05	1.8E-05
PCB-126	MJ626	-	-	-	7.5E-03	6.4E-03	4.1E-06	5.0E-05	5.0E-05
PCB-156	MJ626	-	-	-	6.3E-02	5.5E-02	3.5E-05	4.3E-04	4.3E-04
PCB-157	MJ626	-	-	-	1.2E-02	2.5E-02	6.8E-06	1.9E-04	1.9E-04
PCB-167	MJ626	-	-	-	2.1E-02	4.3E-02	1.1E-05	3.3E-04	3.3E-04
PCB-169	MJ626	-	-	-	3.7E-04	6.4E-04	2.0E-07	5.0E-06	5.0E-06
PCB-189	MJ626	-	-	-	3.0E-03	6.4E-03	1.6E-06	5.0E-05	5.0E-05
PCB-77	MJ626	-	-	-	1.5E-02	1.3E-02	8.5E-06	9.9E-05	9.9E-05
PCB-81	MJ626	-	-	-	3.0E-03	2.3E-03	1.6E-06	1.8E-05	1.8E-05
Aroclor-1254	MJ627	5.6E-02	2.8E-02	U	-	-	-	-	-
Aroclor-1260	MJ627	1.4E-01	1.4E-01		-	-	-	-	-
PCB-105	MJ627	-	-	-	1.2E-01	8.2E-02	3.5E-06	1.1E-05	1.1E-05
PCB-114	MJ627	-	-	-	4.5E-03	1.5E-03	1.3E-07	2.0E-07	2.0E-07
PCB-118	MJ627	-	-	-	2.7E-01	1.6E-01	7.5E-06	2.3E-05	2.3E-05
PCB-123	MJ627	-	-	-	3.0E-03	2.3E-03	8.4E-08	3.2E-07	3.2E-07
PCB-126	MJ627	-	-	-	7.5E-03	6.4E-03	2.1E-07	8.9E-07	8.9E-07
PCB-156	MJ627	-	-	-	6.3E-02	5.5E-02	1.8E-06	7.6E-06	7.6E-06
PCB-157	MJ627	-	-	-	1.2E-02	2.5E-02	3.5E-07	3.4E-06	3.4E-06
PCB-167	MJ627	-	-	-	2.1E-02	4.3E-02	5.8E-07	6.0E-06	6.0E-06
PCB-169	MJ627	-	-	-	3.7E-04	6.4E-04	1.0E-08	8.9E-08	8.9E-08
PCB-189	MJ627	-	-	-	3.0E-03	6.4E-03	8.4E-08	8.9E-07	8.9E-07
PCB-77	MJ627	-	-	-	1.5E-02	1.3E-02	4.3E-07	1.8E-06	1.8E-06
PCB-81	MJ627	-	-	-	3.0E-03	2.3E-03	8.4E-08	3.2E-07	3.2E-07

Aroclor to PCB Congener Extrapolation (0-6 feet bgs)
Sodium Reactor Experiment (SRE) Area

Chemical	EPA ID	Measured Concentrations (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF_{1254}	EF_{1260}	Estimated Concentrations Aroclor 1254 (mg/kg)	Estimated Concentrations Aroclor 1260 (mg/kg)	Estimated Concentrations PCB_{MAX} (mg/kg)
Aroclor-1254	MJ628	4.3E-01	4.3E-01		-	-	-	-	-
Aroclor-1260	MJ628	5.3E-02	2.7E-02	U	-	-	-	-	-
PCB-105	MJ628	-	-	-	1.2E-01	8.2E-02	5.3E-05	2.2E-06	5.3E-05
PCB-114	MJ628	-	-	-	4.5E-03	1.5E-03	2.0E-06	3.9E-08	2.0E-06
PCB-118	MJ628	-	-	-	2.7E-01	1.6E-01	1.2E-04	4.3E-06	1.2E-04
PCB-123	MJ628	-	-	-	3.0E-03	2.3E-03	1.3E-06	6.1E-08	1.3E-06
PCB-126	MJ628	-	-	-	7.5E-03	6.4E-03	3.2E-06	1.7E-07	3.2E-06
PCB-156	MJ628	-	-	-	6.3E-02	5.5E-02	2.7E-05	1.4E-06	2.7E-05
PCB-157	MJ628	-	-	-	1.2E-02	2.5E-02	5.3E-06	6.5E-07	5.3E-06
PCB-167	MJ628	-	-	-	2.1E-02	4.3E-02	8.9E-06	1.1E-06	8.9E-06
PCB-169	MJ628	-	-	-	3.7E-04	6.4E-04	1.6E-07	1.7E-08	1.6E-07
PCB-189	MJ628	-	-	-	3.0E-03	6.4E-03	1.3E-06	1.7E-07	1.3E-06
PCB-77	MJ628	-	-	-	1.5E-02	1.3E-02	6.6E-06	3.4E-07	6.6E-06
PCB-81	MJ628	-	-	-	3.0E-03	2.3E-03	1.3E-06	6.0E-08	1.3E-06
Aroclor-1254	MJ629	1.6E-01	1.6E-01		-	-	-	-	-
Aroclor-1260	MJ629	8.2E-02	4.1E-02	U	-	-	-	-	-
PCB-105	MJ629	-	-	-	1.2E-01	8.2E-02	2.0E-05	3.4E-06	2.0E-05
PCB-114	MJ629	-	-	-	4.5E-03	1.5E-03	7.3E-07	6.0E-08	7.3E-07
PCB-118	MJ629	-	-	-	2.7E-01	1.6E-01	4.3E-05	6.7E-06	4.3E-05
PCB-123	MJ629	-	-	-	3.0E-03	2.3E-03	4.8E-07	9.5E-08	4.8E-07
PCB-126	MJ629	-	-	-	7.5E-03	6.4E-03	1.2E-06	2.6E-07	1.2E-06
PCB-156	MJ629	-	-	-	6.3E-02	5.5E-02	1.0E-05	2.2E-06	1.0E-05
PCB-157	MJ629	-	-	-	1.2E-02	2.5E-02	2.0E-06	1.0E-06	2.0E-06
PCB-167	MJ629	-	-	-	2.1E-02	4.3E-02	3.3E-06	1.8E-06	3.3E-06
PCB-169	MJ629	-	-	-	3.7E-04	6.4E-04	5.9E-08	2.6E-08	5.9E-08
PCB-189	MJ629	-	-	-	3.0E-03	6.4E-03	4.8E-07	2.6E-07	4.8E-07
PCB-77	MJ629	-	-	-	1.5E-02	1.3E-02	2.5E-06	5.2E-07	2.5E-06
PCB-81	MJ629	-	-	-	3.0E-03	2.3E-03	4.8E-07	9.2E-08	4.8E-07
Aroclor-1254	MJ630	5.4E-02	2.7E-02	U	-	-	-	-	-
Aroclor-1260	MJ630	5.4E-02	2.7E-02	U	-	-	-	-	-
PCB-105	MJ630	-	-	-	1.2E-01	8.2E-02	3.3E-06	2.2E-06	3.3E-06
PCB-114	MJ630	-	-	-	4.5E-03	1.5E-03	1.2E-07	3.9E-08	1.2E-07
PCB-118	MJ630	-	-	-	2.7E-01	1.6E-01	7.2E-06	4.4E-06	7.2E-06
PCB-123	MJ630	-	-	-	3.0E-03	2.3E-03	8.1E-08	6.3E-08	8.1E-08
PCB-126	MJ630	-	-	-	7.5E-03	6.4E-03	2.0E-07	1.7E-07	2.0E-07
PCB-156	MJ630	-	-	-	6.3E-02	5.5E-02	1.7E-06	1.5E-06	1.7E-06
PCB-157	MJ630	-	-	-	1.2E-02	2.5E-02	3.3E-07	6.6E-07	6.6E-07
PCB-167	MJ630	-	-	-	2.1E-02	4.3E-02	5.6E-07	1.2E-06	1.2E-06
PCB-169	MJ630	-	-	-	3.7E-04	6.4E-04	9.9E-09	1.7E-08	1.7E-08
PCB-189	MJ630	-	-	-	3.0E-03	6.4E-03	8.1E-08	1.7E-07	1.7E-07
PCB-77	MJ630	-	-	-	1.5E-02	1.3E-02	4.2E-07	3.4E-07	4.2E-07
PCB-81	MJ630	-	-	-	3.0E-03	2.3E-03	8.1E-08	6.1E-08	8.1E-08

Aroclor to PCB Congener Extrapolation (0-6 feet bgs)
Sodium Reactor Experiment (SRE) Area

Chemical	EPA ID	Measured Concentrations (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF_{1254}	EF_{1260}	Estimated Concentrations Aroclor 1254 (mg/kg)	Estimated Concentrations Aroclor 1260 (mg/kg)	Estimated Concentrations PCB_{MAX} (mg/kg)
Aroclor-1254	MJ631	5.3E-02	2.7E-02	U	-	-	-	-	-
Aroclor-1260	MJ631	5.3E-02	2.7E-02	U	-	-	-	-	-
PCB-105	MJ631	-	-	-	1.2E-01	8.2E-02	3.3E-06	2.2E-06	3.3E-06
PCB-114	MJ631	-	-	-	4.5E-03	1.5E-03	1.2E-07	3.9E-08	1.2E-07
PCB-118	MJ631	-	-	-	2.7E-01	1.6E-01	7.1E-06	4.3E-06	7.1E-06
PCB-123	MJ631	-	-	-	3.0E-03	2.3E-03	7.9E-08	6.1E-08	7.9E-08
PCB-126	MJ631	-	-	-	7.5E-03	6.4E-03	2.0E-07	1.7E-07	2.0E-07
PCB-156	MJ631	-	-	-	6.3E-02	5.5E-02	1.7E-06	1.4E-06	1.7E-06
PCB-157	MJ631	-	-	-	1.2E-02	2.5E-02	3.3E-07	6.5E-07	6.5E-07
PCB-167	MJ631	-	-	-	2.1E-02	4.3E-02	5.5E-07	1.1E-06	1.1E-06
PCB-169	MJ631	-	-	-	3.7E-04	6.4E-04	9.7E-09	1.7E-08	1.7E-08
PCB-189	MJ631	-	-	-	3.0E-03	6.4E-03	7.9E-08	1.7E-07	1.7E-07
PCB-77	MJ631	-	-	-	1.5E-02	1.3E-02	4.1E-07	3.4E-07	4.1E-07
PCB-81	MJ631	-	-	-	3.0E-03	2.3E-03	7.9E-08	6.0E-08	7.9E-08
Aroclor-1254	MJ635	1.1E-01	1.1E-01	J	-	-	-	-	-
Aroclor-1260	MJ635	1.8E-01	1.8E-01	J	-	-	-	-	-
PCB-105	MJ635	-	-	-	1.2E-01	8.2E-02	1.4E-05	1.5E-05	1.5E-05
PCB-114	MJ635	-	-	-	4.5E-03	1.5E-03	5.0E-07	2.6E-07	5.0E-07
PCB-118	MJ635	-	-	-	2.7E-01	1.6E-01	2.9E-05	2.9E-05	2.9E-05
PCB-123	MJ635	-	-	-	3.0E-03	2.3E-03	3.3E-07	4.2E-07	4.2E-07
PCB-126	MJ635	-	-	-	7.5E-03	6.4E-03	8.3E-07	1.1E-06	1.1E-06
PCB-156	MJ635	-	-	-	6.3E-02	5.5E-02	6.9E-06	9.8E-06	9.8E-06
PCB-157	MJ635	-	-	-	1.2E-02	2.5E-02	1.4E-06	4.4E-06	4.4E-06
PCB-167	MJ635	-	-	-	2.1E-02	4.3E-02	2.3E-06	7.7E-06	7.7E-06
PCB-169	MJ635	-	-	-	3.7E-04	6.4E-04	4.0E-08	1.1E-07	1.1E-07
PCB-189	MJ635	-	-	-	3.0E-03	6.4E-03	3.3E-07	1.1E-06	1.1E-06
PCB-77	MJ635	-	-	-	1.5E-02	1.3E-02	1.7E-06	2.3E-06	2.3E-06
PCB-81	MJ635	-	-	-	3.0E-03	2.3E-03	3.3E-07	4.1E-07	4.1E-07
Aroclor-1254	MJ644	9.1E-02	4.6E-02	UJ	-	-	-	-	-
Aroclor-1260	MJ644	9.1E-02	4.6E-02	UJ	-	-	-	-	-
PCB-105	MJ644	-	-	-	1.2E-01	8.2E-02	5.6E-06	3.7E-06	5.6E-06
PCB-114	MJ644	-	-	-	4.5E-03	1.5E-03	2.1E-07	6.6E-08	2.1E-07
PCB-118	MJ644	-	-	-	2.7E-01	1.6E-01	1.2E-05	7.4E-06	1.2E-05
PCB-123	MJ644	-	-	-	3.0E-03	2.3E-03	1.4E-07	1.1E-07	1.4E-07
PCB-126	MJ644	-	-	-	7.5E-03	6.4E-03	3.4E-07	2.9E-07	3.4E-07
PCB-156	MJ644	-	-	-	6.3E-02	5.5E-02	2.9E-06	2.5E-06	2.9E-06
PCB-157	MJ644	-	-	-	1.2E-02	2.5E-02	5.6E-07	1.1E-06	1.1E-06
PCB-167	MJ644	-	-	-	2.1E-02	4.3E-02	9.4E-07	1.9E-06	1.9E-06
PCB-169	MJ644	-	-	-	3.7E-04	6.4E-04	1.7E-08	2.9E-08	2.9E-08
PCB-189	MJ644	-	-	-	3.0E-03	6.4E-03	1.4E-07	2.9E-07	2.9E-07
PCB-77	MJ644	-	-	-	1.5E-02	1.3E-02	7.0E-07	5.8E-07	7.0E-07
PCB-81	MJ644	-	-	-	3.0E-03	2.3E-03	1.4E-07	1.0E-07	1.4E-07

Aroclor to PCB Congener Extrapolation (0-6 feet bgs)
Sodium Reactor Experiment (SRE) Area

Chemical	EPA ID	Measured Concentrations (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF_{1254}	EF_{1260}	Estimated Concentrations Aroclor 1254 (mg/kg)	Estimated Concentrations Aroclor 1260 (mg/kg)	Estimated Concentrations PCB_{MAX} (mg/kg)
Aroclor-1254	MJ652	5.4E-02	2.7E-02	U	-	-	-	-	-
Aroclor-1260	MJ652	5.4E-02	2.7E-02	U	-	-	-	-	-
PCB-105	MJ652	-	-	-	1.2E-01	8.2E-02	3.3E-06	2.2E-06	3.3E-06
PCB-114	MJ652	-	-	-	4.5E-03	1.5E-03	1.2E-07	3.9E-08	1.2E-07
PCB-118	MJ652	-	-	-	2.7E-01	1.6E-01	7.2E-06	4.4E-06	7.2E-06
PCB-123	MJ652	-	-	-	3.0E-03	2.3E-03	8.1E-08	6.3E-08	8.1E-08
PCB-126	MJ652	-	-	-	7.5E-03	6.4E-03	2.0E-07	1.7E-07	2.0E-07
PCB-156	MJ652	-	-	-	6.3E-02	5.5E-02	1.7E-06	1.5E-06	1.7E-06
PCB-157	MJ652	-	-	-	1.2E-02	2.5E-02	3.3E-07	6.6E-07	6.6E-07
PCB-167	MJ652	-	-	-	2.1E-02	4.3E-02	5.6E-07	1.2E-06	1.2E-06
PCB-169	MJ652	-	-	-	3.7E-04	6.4E-04	9.9E-09	1.7E-08	1.7E-08
PCB-189	MJ652	-	-	-	3.0E-03	6.4E-03	8.1E-08	1.7E-07	1.7E-07
PCB-77	MJ652	-	-	-	1.5E-02	1.3E-02	4.2E-07	3.4E-07	4.2E-07
PCB-81	MJ652	-	-	-	3.0E-03	2.3E-03	8.1E-08	6.1E-08	8.1E-08
Aroclor-1254	MJ653	5.3E-02	2.7E-02	U	-	-	-	-	-
Aroclor-1260	MJ653	5.3E-02	2.7E-02	U	-	-	-	-	-
PCB-105	MJ653	-	-	-	1.2E-01	8.2E-02	3.3E-06	2.2E-06	3.3E-06
PCB-114	MJ653	-	-	-	4.5E-03	1.5E-03	1.2E-07	3.9E-08	1.2E-07
PCB-118	MJ653	-	-	-	2.7E-01	1.6E-01	7.1E-06	4.3E-06	7.1E-06
PCB-123	MJ653	-	-	-	3.0E-03	2.3E-03	7.9E-08	6.1E-08	7.9E-08
PCB-126	MJ653	-	-	-	7.5E-03	6.4E-03	2.0E-07	1.7E-07	2.0E-07
PCB-156	MJ653	-	-	-	6.3E-02	5.5E-02	1.7E-06	1.4E-06	1.7E-06
PCB-157	MJ653	-	-	-	1.2E-02	2.5E-02	3.3E-07	6.5E-07	6.5E-07
PCB-167	MJ653	-	-	-	2.1E-02	4.3E-02	5.5E-07	1.1E-06	1.1E-06
PCB-169	MJ653	-	-	-	3.7E-04	6.4E-04	9.7E-09	1.7E-08	1.7E-08
PCB-189	MJ653	-	-	-	3.0E-03	6.4E-03	7.9E-08	1.7E-07	1.7E-07
PCB-77	MJ653	-	-	-	1.5E-02	1.3E-02	4.1E-07	3.4E-07	4.1E-07
PCB-81	MJ653	-	-	-	3.0E-03	2.3E-03	7.9E-08	6.0E-08	7.9E-08
Aroclor-1254	MJ664	8.2E-02	4.1E-02	U	-	-	-	-	-
Aroclor-1260	MJ664	8.2E-02	4.1E-02	U	-	-	-	-	-
PCB-105	MJ664	-	-	-	1.2E-01	8.2E-02	5.1E-06	3.4E-06	5.1E-06
PCB-114	MJ664	-	-	-	4.5E-03	1.5E-03	1.9E-07	6.0E-08	1.9E-07
PCB-118	MJ664	-	-	-	2.7E-01	1.6E-01	1.1E-05	6.7E-06	1.1E-05
PCB-123	MJ664	-	-	-	3.0E-03	2.3E-03	1.2E-07	9.5E-08	1.2E-07
PCB-126	MJ664	-	-	-	7.5E-03	6.4E-03	3.1E-07	2.6E-07	3.1E-07
PCB-156	MJ664	-	-	-	6.3E-02	5.5E-02	2.6E-06	2.2E-06	2.6E-06
PCB-157	MJ664	-	-	-	1.2E-02	2.5E-02	5.1E-07	1.0E-06	1.0E-06
PCB-167	MJ664	-	-	-	2.1E-02	4.3E-02	8.5E-07	1.8E-06	1.8E-06
PCB-169	MJ664	-	-	-	3.7E-04	6.4E-04	1.5E-08	2.6E-08	2.6E-08
PCB-189	MJ664	-	-	-	3.0E-03	6.4E-03	1.2E-07	2.6E-07	2.6E-07
PCB-77	MJ664	-	-	-	1.5E-02	1.3E-02	6.3E-07	5.2E-07	6.3E-07
PCB-81	MJ664	-	-	-	3.0E-03	2.3E-03	1.2E-07	9.2E-08	1.2E-07

Aroclor to PCB Congener Extrapolation (0-6 feet bgs)
Sodium Reactor Experiment (SRE) Area

Chemical	EPA ID	Measured Concentrations (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF_{1254}	EF_{1260}	Estimated Concentrations Aroclor 1254 (mg/kg)	Estimated Concentrations Aroclor 1260 (mg/kg)	Estimated Concentrations PCB_{MAX} (mg/kg)
Aroclor-1254	MJ765	1.8E-01	9.0E-02	U	-	-	-	-	-
Aroclor-1260	MJ765	1.8E-01	9.0E-02	U	-	-	-	-	-
PCB-105	MJ765	-	-	-	1.2E-01	8.2E-02	1.1E-05	7.4E-06	1.1E-05
PCB-114	MJ765	-	-	-	4.5E-03	1.5E-03	4.1E-07	1.3E-07	4.1E-07
PCB-118	MJ765	-	-	-	2.7E-01	1.6E-01	2.4E-05	1.5E-05	2.4E-05
PCB-123	MJ765	-	-	-	3.0E-03	2.3E-03	2.7E-07	2.1E-07	2.7E-07
PCB-126	MJ765	-	-	-	7.5E-03	6.4E-03	6.8E-07	5.7E-07	6.8E-07
PCB-156	MJ765	-	-	-	6.3E-02	5.5E-02	5.7E-06	4.9E-06	5.7E-06
PCB-157	MJ765	-	-	-	1.2E-02	2.5E-02	1.1E-06	2.2E-06	2.2E-06
PCB-167	MJ765	-	-	-	2.1E-02	4.3E-02	1.9E-06	3.8E-06	3.8E-06
PCB-169	MJ765	-	-	-	3.7E-04	6.4E-04	3.3E-08	5.7E-08	5.7E-08
PCB-189	MJ765	-	-	-	3.0E-03	6.4E-03	2.7E-07	5.7E-07	5.7E-07
PCB-77	MJ765	-	-	-	1.5E-02	1.3E-02	1.4E-06	1.1E-06	1.4E-06
PCB-81	MJ765	-	-	-	3.0E-03	2.3E-03	2.7E-07	2.0E-07	2.7E-07
Aroclor-1254	MJ768	8.5E-02	4.3E-02	U	-	-	-	-	-
Aroclor-1260	MJ768	8.5E-02	4.3E-02	U	-	-	-	-	-
PCB-105	MJ768	-	-	-	1.2E-01	8.2E-02	5.3E-06	3.5E-06	5.3E-06
PCB-114	MJ768	-	-	-	4.5E-03	1.5E-03	1.9E-07	6.2E-08	1.9E-07
PCB-118	MJ768	-	-	-	2.7E-01	1.6E-01	1.1E-05	7.0E-06	1.1E-05
PCB-123	MJ768	-	-	-	3.0E-03	2.3E-03	1.3E-07	9.9E-08	1.3E-07
PCB-126	MJ768	-	-	-	7.5E-03	6.4E-03	3.2E-07	2.7E-07	3.2E-07
PCB-156	MJ768	-	-	-	6.3E-02	5.5E-02	2.7E-06	2.3E-06	2.7E-06
PCB-157	MJ768	-	-	-	1.2E-02	2.5E-02	5.3E-07	1.0E-06	1.0E-06
PCB-167	MJ768	-	-	-	2.1E-02	4.3E-02	8.8E-07	1.8E-06	1.8E-06
PCB-169	MJ768	-	-	-	3.7E-04	6.4E-04	1.6E-08	2.7E-08	2.7E-08
PCB-189	MJ768	-	-	-	3.0E-03	6.4E-03	1.3E-07	2.7E-07	2.7E-07
PCB-77	MJ768	-	-	-	1.5E-02	1.3E-02	6.6E-07	5.4E-07	6.6E-07
PCB-81	MJ768	-	-	-	3.0E-03	2.3E-03	1.3E-07	9.6E-08	1.3E-07
Aroclor-1254	MJ776	8.8E-02	4.4E-02	U	-	-	-	-	-
Aroclor-1260	MJ776	8.8E-02	4.4E-02	U	-	-	-	-	-
PCB-105	MJ776	-	-	-	1.2E-01	8.2E-02	5.4E-06	3.6E-06	5.4E-06
PCB-114	MJ776	-	-	-	4.5E-03	1.5E-03	2.0E-07	6.4E-08	2.0E-07
PCB-118	MJ776	-	-	-	2.7E-01	1.6E-01	1.2E-05	7.2E-06	1.2E-05
PCB-123	MJ776	-	-	-	3.0E-03	2.3E-03	1.3E-07	1.0E-07	1.3E-07
PCB-126	MJ776	-	-	-	7.5E-03	6.4E-03	3.3E-07	2.8E-07	3.3E-07
PCB-156	MJ776	-	-	-	6.3E-02	5.5E-02	2.8E-06	2.4E-06	2.8E-06
PCB-157	MJ776	-	-	-	1.2E-02	2.5E-02	5.4E-07	1.1E-06	1.1E-06
PCB-167	MJ776	-	-	-	2.1E-02	4.3E-02	9.1E-07	1.9E-06	1.9E-06
PCB-169	MJ776	-	-	-	3.7E-04	6.4E-04	1.6E-08	2.8E-08	2.8E-08
PCB-189	MJ776	-	-	-	3.0E-03	6.4E-03	1.3E-07	2.8E-07	2.8E-07
PCB-77	MJ776	-	-	-	1.5E-02	1.3E-02	6.8E-07	5.6E-07	6.8E-07
PCB-81	MJ776	-	-	-	3.0E-03	2.3E-03	1.3E-07	9.9E-08	1.3E-07

Aroclor to PCB Congener Extrapolation (0-6 feet bgs)
Sodium Reactor Experiment (SRE) Area

Chemical	EPA ID	Measured Concentrations (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF_{1254}	EF_{1260}	Estimated Concentrations Aroclor 1254 (mg/kg)	Estimated Concentrations Aroclor 1260 (mg/kg)	Estimated Concentrations PCB_{MAX} (mg/kg)
Aroclor-1254	MJ777	8.8E-02	4.4E-02	U	-	-	-	-	-
Aroclor-1260	MJ777	8.8E-02	4.4E-02	U	-	-	-	-	-
PCB-105	MJ777	-	-	-	1.2E-01	8.2E-02	5.4E-06	3.6E-06	5.4E-06
PCB-114	MJ777	-	-	-	4.5E-03	1.5E-03	2.0E-07	6.4E-08	2.0E-07
PCB-118	MJ777	-	-	-	2.7E-01	1.6E-01	1.2E-05	7.2E-06	1.2E-05
PCB-123	MJ777	-	-	-	3.0E-03	2.3E-03	1.3E-07	1.0E-07	1.3E-07
PCB-126	MJ777	-	-	-	7.5E-03	6.4E-03	3.3E-07	2.8E-07	3.3E-07
PCB-156	MJ777	-	-	-	6.3E-02	5.5E-02	2.8E-06	2.4E-06	2.8E-06
PCB-157	MJ777	-	-	-	1.2E-02	2.5E-02	5.4E-07	1.1E-06	1.1E-06
PCB-167	MJ777	-	-	-	2.1E-02	4.3E-02	9.1E-07	1.9E-06	1.9E-06
PCB-169	MJ777	-	-	-	3.7E-04	6.4E-04	1.6E-08	2.8E-08	2.8E-08
PCB-189	MJ777	-	-	-	3.0E-03	6.4E-03	1.3E-07	2.8E-07	2.8E-07
PCB-77	MJ777	-	-	-	1.5E-02	1.3E-02	6.8E-07	5.6E-07	6.8E-07
PCB-81	MJ777	-	-	-	3.0E-03	2.3E-03	1.3E-07	9.9E-08	1.3E-07
Aroclor-1254	RJ627	3.5E-02	1.8E-02	U	-	-	-	-	-
Aroclor-1260	RJ627	3.5E-02	1.8E-02	U	-	-	-	-	-
PCB-105	RJ627	-	-	-	1.2E-01	8.2E-02	2.2E-06	1.4E-06	2.2E-06
PCB-114	RJ627	-	-	-	4.5E-03	1.5E-03	7.9E-08	2.5E-08	7.9E-08
PCB-118	RJ627	-	-	-	2.7E-01	1.6E-01	4.7E-06	2.9E-06	4.7E-06
PCB-123	RJ627	-	-	-	3.0E-03	2.3E-03	5.2E-08	4.1E-08	5.2E-08
PCB-126	RJ627	-	-	-	7.5E-03	6.4E-03	1.3E-07	1.1E-07	1.3E-07
PCB-156	RJ627	-	-	-	6.3E-02	5.5E-02	1.1E-06	9.5E-07	1.1E-06
PCB-157	RJ627	-	-	-	1.2E-02	2.5E-02	2.2E-07	4.3E-07	4.3E-07
PCB-167	RJ627	-	-	-	2.1E-02	4.3E-02	3.6E-07	7.5E-07	7.5E-07
PCB-169	RJ627	-	-	-	3.7E-04	6.4E-04	6.4E-09	1.1E-08	1.1E-08
PCB-189	RJ627	-	-	-	3.0E-03	6.4E-03	5.2E-08	1.1E-07	1.1E-07
PCB-77	RJ627	-	-	-	1.5E-02	1.3E-02	2.7E-07	2.2E-07	2.7E-07
PCB-81	RJ627	-	-	-	3.0E-03	2.3E-03	5.2E-08	3.9E-08	5.2E-08
Aroclor-1254	RJ786	6.0E-02	6.0E-02	J	-	-	-	-	-
Aroclor-1260	RJ786	3.6E-02	1.8E-02	UJ	-	-	-	-	-
PCB-105	RJ786	-	-	-	1.2E-01	8.2E-02	7.4E-06	1.5E-06	7.4E-06
PCB-114	RJ786	-	-	-	4.5E-03	1.5E-03	2.7E-07	2.6E-08	2.7E-07
PCB-118	RJ786	-	-	-	2.7E-01	1.6E-01	1.6E-05	2.9E-06	1.6E-05
PCB-123	RJ786	-	-	-	3.0E-03	2.3E-03	1.8E-07	4.2E-08	1.8E-07
PCB-126	RJ786	-	-	-	7.5E-03	6.4E-03	4.5E-07	1.1E-07	4.5E-07
PCB-156	RJ786	-	-	-	6.3E-02	5.5E-02	3.8E-06	9.8E-07	3.8E-06
PCB-157	RJ786	-	-	-	1.2E-02	2.5E-02	7.4E-07	4.4E-07	7.4E-07
PCB-167	RJ786	-	-	-	2.1E-02	4.3E-02	1.2E-06	7.7E-07	1.2E-06
PCB-169	RJ786	-	-	-	3.7E-04	6.4E-04	2.2E-08	1.1E-08	2.2E-08
PCB-189	RJ786	-	-	-	3.0E-03	6.4E-03	1.8E-07	1.1E-07	1.8E-07
PCB-77	RJ786	-	-	-	1.5E-02	1.3E-02	9.3E-07	2.3E-07	9.3E-07
PCB-81	RJ786	-	-	-	3.0E-03	2.3E-03	1.8E-07	4.1E-08	1.8E-07

Notes:
PCBs - polychlorinated biphenyls
EF- Extrapolation Factor (ng congener/kg soil)/(µg Aroclor/kg soil)
"-" not applicable
mg/kg - milligrams per kilogram
µg/kg - micrograms per kilogram
ng/kg - nanograms per kilogram
bgs- below ground surface
PCB_{MAX} = the maximum of the extrapolated Aroclor 1254 and 1260 concentrations

TPH to Petroleum Constituent Extrapolation for Soil/Sediment (0-4 feet bgs) [a]
Sodium Reactor Experiment (SRE) Area

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
C08-C11 (Gasoline Range)	MJ630	5.40E+00	2.7E+00	U		-	-
C11-C14 (Kerosene Range)	MJ630	5.40E+00	2.7E+00	U		-	-
C14-C20 (Diesel Range)	MJ630	5.40E+00	2.7E+00	U		-	-
C20-C30 (Lubricant Oil Range)	MJ630	5.40E+00	2.7E+00	U		-	-
C11-C30	MJ630		8.1E+00			-	-
Benzene	MJ630	-	-	-	1.2E-04	-	-
Ethylbenzene	MJ630	-	-	-	1.2E-04	-	-
Toluene	MJ630	-	-	-	1.2E-04	-	-
m,p-Xylene	MJ630	-	-	-	3.6E-04	-	-
o-Xylene	MJ630	-	-	-	8.0E-05	-	-
Xylene (total)	MJ630	-	-	-	4.4E-04	-	-
2-Methylnaphthalene	MJ630	-	-	-	2.8E-02	-	-
Acenaphthene	MJ630	-	-	-	5.7E-04	4.6E-03	4.6E-03
Acenaphthylene	MJ630	-	-	-	7.0E-05	5.7E-04	5.7E-04
Anthracene	MJ630	-	-	-	3.7E-04	3.0E-03	3.0E-03
Benzo(a)anthracene	MJ630	-	-	-	2.7E-05	2.2E-04	2.2E-04
Benzo(a)pyrene	MJ630	-	-	-	2.7E-05	2.2E-04	2.2E-04
Benzo(b)fluoranthene	MJ630	-	-	-	4.3E-05	3.5E-04	3.5E-04
Benzo(e)pyrene	MJ630	-	-	-	2.1E-04	1.7E-03	1.7E-03
Benzo(g,h,i)perylene	MJ630	-	-	-	2.2E-04	1.8E-03	1.8E-03
Benzo(k)fluoranthene	MJ630	-	-	-	2.1E-05	1.7E-04	1.7E-04
Chrysene	MJ630	-	-	-	5.9E-05	4.8E-04	4.8E-04
Dibenz(a,h)anthracene	MJ630	-	-	-	1.1E-05	9.0E-05	9.0E-05
Fluoranthene	MJ630	-	-	-	7.5E-05	6.1E-04	6.1E-04
Fluorene	MJ630	-	-	-	5.7E-04	4.6E-03	4.6E-03
Indeno(1,2,3-cd)pyrene	MJ630	-	-	-	2.4E-05	1.9E-04	1.9E-04
Naphthalene	MJ630	-	-	-	6.9E-03	-	-
Perylene	MJ630	-	-	-	1.2E-04	9.6E-04	9.6E-04
Phenanthrene	MJ630	-	-	-	1.5E-03	1.2E-02	1.2E-02
Pyrene	MJ630	-	-	-	1.4E-04	1.1E-03	1.1E-03
C08-C11 (Gasoline Range)	MJ631	5.30E+00	2.7E+00	U		-	-
C11-C14 (Kerosene Range)	MJ631	5.30E+00	2.7E+00	U		-	-
C14-C20 (Diesel Range)	MJ631	5.30E+00	2.7E+00	U		-	-
C20-C30 (Lubricant Oil Range)	MJ631	1.10E+01	1.1E+01			-	-
C11-C30	MJ631		1.6E+01			-	-
Benzene	MJ631	-	-	-	1.2E-04	-	-
Ethylbenzene	MJ631	-	-	-	1.2E-04	-	-
Toluene	MJ631	-	-	-	1.2E-04	-	-
m,p-Xylene	MJ631	-	-	-	3.6E-04	-	-
o-Xylene	MJ631	-	-	-	8.0E-05	-	-
Xylene (total)	MJ631	-	-	-	4.4E-04	-	-
2-Methylnaphthalene	MJ631	-	-	-	2.8E-02	-	-
Acenaphthene	MJ631	-	-	-	5.7E-04	9.3E-03	9.3E-03
Acenaphthylene	MJ631	-	-	-	7.0E-05	1.1E-03	1.1E-03
Anthracene	MJ631	-	-	-	3.7E-04	6.1E-03	6.1E-03
Benzo(a)anthracene	MJ631	-	-	-	2.7E-05	4.4E-04	4.4E-04
Benzo(a)pyrene	MJ631	-	-	-	2.7E-05	4.4E-04	4.4E-04
Benzo(b)fluoranthene	MJ631	-	-	-	4.3E-05	7.1E-04	7.1E-04
Benzo(e)pyrene	MJ631	-	-	-	2.1E-04	3.4E-03	3.4E-03
Benzo(g,h,i)perylene	MJ631	-	-	-	2.2E-04	3.6E-03	3.6E-03
Benzo(k)fluoranthene	MJ631	-	-	-	2.1E-05	3.3E-04	3.3E-04
Chrysene	MJ631	-	-	-	5.9E-05	9.6E-04	9.6E-04
Dibenz(a,h)anthracene	MJ631	-	-	-	1.1E-05	1.8E-04	1.8E-04
Fluoranthene	MJ631	-	-	-	7.5E-05	1.2E-03	1.2E-03
Fluorene	MJ631	-	-	-	5.7E-04	9.3E-03	9.3E-03

TPH to Petroleum Constituent Extrapolation for Soil/Sediment (0-4 feet bgs) [a]
Sodium Reactor Experiment (SRE) Area

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Indeno(1,2,3-cd)pyrene	MJ631	-	-	-	2.4E-05	3.9E-04	3.9E-04
Naphthalene	MJ631	-	-	-	6.9E-03	-	-
Perylene	MJ631	-	-	-	1.2E-04	1.9E-03	1.9E-03
Phenanthrene	MJ631	-	-	-	1.5E-03	2.5E-02	2.5E-02
Pyrene	MJ631	-	-	-	1.4E-04	2.2E-03	2.2E-03
C08-C11 (Gasoline Range)	MJ661	1.20E+01	6.0E+00	U		-	-
C11-C14 (Kerosene Range)	MJ661	1.20E+01	6.0E+00	U		-	-
C14-C20 (Diesel Range)	MJ661	1.20E+01	6.0E+00	U		-	-
C20-C30 (Lubricant Oil Range)	MJ661	1.20E+01	6.0E+00	U		-	-
C11-C30	MJ661		1.8E+01			-	-
Benzene	MJ661	-	-	-	1.2E-04	-	-
Ethylbenzene	MJ661	-	-	-	1.2E-04	-	-
Toluene	MJ661	-	-	-	1.2E-04	-	-
m,p-Xylene	MJ661	-	-	-	3.6E-04	-	-
o-Xylene	MJ661	-	-	-	8.0E-05	-	-
Xylene (total)	MJ661	-	-	-	4.4E-04	-	-
2-Methylnaphthalene	MJ661	-	-	-	2.8E-02	-	-
Acenaphthene	MJ661	-	-	-	5.7E-04	1.0E-02	1.0E-02
Acenaphthylene	MJ661	-	-	-	7.0E-05	1.3E-03	1.3E-03
Anthracene	MJ661	-	-	-	3.7E-04	6.7E-03	6.7E-03
Benzo(a)anthracene	MJ661	-	-	-	2.7E-05	4.9E-04	4.9E-04
Benzo(a)pyrene	MJ661	-	-	-	2.7E-05	4.9E-04	4.9E-04
Benzo(b)fluoranthene	MJ661	-	-	-	4.3E-05	7.8E-04	7.8E-04
Benzo(e)pyrene	MJ661	-	-	-	2.1E-04	3.7E-03	3.7E-03
Benzo(g,h,i)perylene	MJ661	-	-	-	2.2E-04	4.0E-03	4.0E-03
Benzo(k)fluoranthene	MJ661	-	-	-	2.1E-05	3.7E-04	3.7E-04
Chrysene	MJ661	-	-	-	5.9E-05	1.1E-03	1.1E-03
Dibenz(a,h)anthracene	MJ661	-	-	-	1.1E-05	2.0E-04	2.0E-04
Fluoranthene	MJ661	-	-	-	7.5E-05	1.3E-03	1.3E-03
Fluorene	MJ661	-	-	-	5.7E-04	1.0E-02	1.0E-02
Indeno(1,2,3-cd)pyrene	MJ661	-	-	-	2.4E-05	4.3E-04	4.3E-04
Naphthalene	MJ661	-	-	-	6.9E-03	-	-
Perylene	MJ661	-	-	-	1.2E-04	2.1E-03	2.1E-03
Phenanthrene	MJ661	-	-	-	1.5E-03	2.8E-02	2.8E-02
Pyrene	MJ661	-	-	-	1.4E-04	2.5E-03	2.5E-03
C08-C11 (Gasoline Range)	MJ662	1.10E+01	5.5E+00	U		-	-
C11-C14 (Kerosene Range)	MJ662	1.10E+01	5.5E+00	U		-	-
C14-C20 (Diesel Range)	MJ662	1.10E+01	5.5E+00	U		-	-
C20-C30 (Lubricant Oil Range)	MJ662	1.10E+01	5.5E+00	U		-	-
C11-C30	MJ662		1.7E+01			-	-
Benzene	MJ662	-	-	-	1.2E-04	-	-
Ethylbenzene	MJ662	-	-	-	1.2E-04	-	-
Toluene	MJ662	-	-	-	1.2E-04	-	-
m,p-Xylene	MJ662	-	-	-	3.6E-04	-	-
o-Xylene	MJ662	-	-	-	8.0E-05	-	-
Xylene (total)	MJ662	-	-	-	4.4E-04	-	-
2-Methylnaphthalene	MJ662	-	-	-	2.8E-02	-	-
Acenaphthene	MJ662	-	-	-	5.7E-04	9.5E-03	9.5E-03
Acenaphthylene	MJ662	-	-	-	7.0E-05	1.2E-03	1.2E-03
Anthracene	MJ662	-	-	-	3.7E-04	6.2E-03	6.2E-03
Benzo(a)anthracene	MJ662	-	-	-	2.7E-05	4.4E-04	4.4E-04
Benzo(a)pyrene	MJ662	-	-	-	2.7E-05	4.5E-04	4.5E-04
Benzo(b)fluoranthene	MJ662	-	-	-	4.3E-05	7.1E-04	7.1E-04
Benzo(e)pyrene	MJ662	-	-	-	2.1E-04	3.4E-03	3.4E-03
Benzo(g,h,i)perylene	MJ662	-	-	-	2.2E-04	3.6E-03	3.6E-03

TPH to Petroleum Constituent Extrapolation for Soil/Sediment (0-4 feet bgs) [a]
Sodium Reactor Experiment (SRE) Area

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Benzo(k)fluoranthene	MJ662	-	-	-	2.1E-05	3.4E-04	3.4E-04
Chrysene	MJ662	-	-	-	5.9E-05	9.7E-04	9.7E-04
Dibenz(a,h)anthracene	MJ662	-	-	-	1.1E-05	1.8E-04	1.8E-04
Fluoranthene	MJ662	-	-	-	7.5E-05	1.2E-03	1.2E-03
Fluorene	MJ662	-	-	-	5.7E-04	9.4E-03	9.4E-03
Indeno(1,2,3-cd)pyrene	MJ662	-	-	-	2.4E-05	4.0E-04	4.0E-04
Naphthalene	MJ662	-	-	-	6.9E-03	-	-
Perylene	MJ662	-	-	-	1.2E-04	1.9E-03	1.9E-03
Phenanthrene	MJ662	-	-	-	1.5E-03	2.5E-02	2.5E-02
Pyrene	MJ662	-	-	-	1.4E-04	2.2E-03	2.2E-03
C08-C11 (Gasoline Range)	MJ663	1.10E+01	5.5E+00	U		-	-
C11-C14 (Kerosene Range)	MJ663	1.10E+01	5.5E+00	U		-	-
C14-C20 (Diesel Range)	MJ663	1.10E+01	5.5E+00	U		-	-
C20-C30 (Lubricant Oil Range)	MJ663	5.00E+00	5.0E+00	J		-	-
C11-C30	MJ663		1.6E+01			-	-
Benzene	MJ663	-	-	-	1.2E-04	-	-
Ethylbenzene	MJ663	-	-	-	1.2E-04	-	-
Toluene	MJ663	-	-	-	1.2E-04	-	-
m,p-Xylene	MJ663	-	-	-	3.6E-04	-	-
o-Xylene	MJ663	-	-	-	8.0E-05	-	-
Xylene (total)	MJ663	-	-	-	4.4E-04	-	-
2-Methylnaphthalene	MJ663	-	-	-	2.8E-02	-	-
Acenaphthene	MJ663	-	-	-	5.7E-04	9.2E-03	9.2E-03
Acenaphthylene	MJ663	-	-	-	7.0E-05	1.1E-03	1.1E-03
Anthracene	MJ663	-	-	-	3.7E-04	6.0E-03	6.0E-03
Benzo(a)anthracene	MJ663	-	-	-	2.7E-05	4.3E-04	4.3E-04
Benzo(a)pyrene	MJ663	-	-	-	2.7E-05	4.4E-04	4.4E-04
Benzo(b)fluoranthene	MJ663	-	-	-	4.3E-05	6.9E-04	6.9E-04
Benzo(e)pyrene	MJ663	-	-	-	2.1E-04	3.3E-03	3.3E-03
Benzo(g,h,i)perylene	MJ663	-	-	-	2.2E-04	3.5E-03	3.5E-03
Benzo(k)fluoranthene	MJ663	-	-	-	2.1E-05	3.3E-04	3.3E-04
Chrysene	MJ663	-	-	-	5.9E-05	9.4E-04	9.4E-04
Dibenz(a,h)anthracene	MJ663	-	-	-	1.1E-05	1.8E-04	1.8E-04
Fluoranthene	MJ663	-	-	-	7.5E-05	1.2E-03	1.2E-03
Fluorene	MJ663	-	-	-	5.7E-04	9.1E-03	9.1E-03
Indeno(1,2,3-cd)pyrene	MJ663	-	-	-	2.4E-05	3.8E-04	3.8E-04
Naphthalene	MJ663	-	-	-	6.9E-03	-	-
Perylene	MJ663	-	-	-	1.2E-04	1.9E-03	1.9E-03
Phenanthrene	MJ663	-	-	-	1.5E-03	2.5E-02	2.5E-02
Pyrene	MJ663	-	-	-	1.4E-04	2.2E-03	2.2E-03
C08-C11 (Gasoline Range)	MJ664	1.10E+01	5.5E+00	U		-	-
C11-C14 (Kerosene Range)	MJ664	1.10E+01	5.5E+00	U		-	-
C14-C20 (Diesel Range)	MJ664	1.10E+01	5.5E+00	U		-	-
C20-C30 (Lubricant Oil Range)	MJ664	6.30E+00	6.3E+00	J		-	-
C11-C30	MJ664		1.7E+01			-	-
Benzene	MJ664	-	-	-	1.2E-04	-	-
Ethylbenzene	MJ664	-	-	-	1.2E-04	-	-
Toluene	MJ664	-	-	-	1.2E-04	-	-
m,p-Xylene	MJ664	-	-	-	3.6E-04	-	-
o-Xylene	MJ664	-	-	-	8.0E-05	-	-
Xylene (total)	MJ664	-	-	-	4.4E-04	-	-
2-Methylnaphthalene	MJ664	-	-	-	2.8E-02	-	-
Acenaphthene	MJ664	-	-	-	5.7E-04	9.9E-03	9.9E-03
Acenaphthylene	MJ664	-	-	-	7.0E-05	1.2E-03	1.2E-03
Anthracene	MJ664	-	-	-	3.7E-04	6.5E-03	6.5E-03

TPH to Petroleum Constituent Extrapolation for Soil/Sediment (0-4 feet bgs) [a]
Sodium Reactor Experiment (SRE) Area

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Benzo(a)anthracene	MJ664	-	-	-	2.7E-05	4.7E-04	4.7E-04
Benzo(a)pyrene	MJ664	-	-	-	2.7E-05	4.7E-04	4.7E-04
Benzo(b)fluoranthene	MJ664	-	-	-	4.3E-05	7.5E-04	7.5E-04
Benzo(e)pyrene	MJ664	-	-	-	2.1E-04	3.6E-03	3.6E-03
Benzo(g,h,i)perylene	MJ664	-	-	-	2.2E-04	3.8E-03	3.8E-03
Benzo(k)fluoranthene	MJ664	-	-	-	2.1E-05	3.5E-04	3.5E-04
Chrysene	MJ664	-	-	-	5.9E-05	1.0E-03	1.0E-03
Dibenz(a,h)anthracene	MJ664	-	-	-	1.1E-05	1.9E-04	1.9E-04
Fluoranthene	MJ664	-	-	-	7.5E-05	1.3E-03	1.3E-03
Fluorene	MJ664	-	-	-	5.7E-04	9.8E-03	9.8E-03
Indeno(1,2,3-cd)pyrene	MJ664	-	-	-	2.4E-05	4.2E-04	4.2E-04
Naphthalene	MJ664	-	-	-	6.9E-03	-	-
Perylene	MJ664	-	-	-	1.2E-04	2.0E-03	2.0E-03
Phenanthrene	MJ664	-	-	-	1.5E-03	2.7E-02	2.7E-02
Pyrene	MJ664	-	-	-	1.4E-04	2.4E-03	2.4E-03
C08-C11 (Gasoline Range)	RD977	1.10E+01	5.5E+00	UJ		-	-
C11-C14 (Kerosene Range)	RD977	1.10E+01	5.5E+00	UJ		-	-
C14-C20 (Diesel Range)	RD977	1.10E+01	5.5E+00	UJ		-	-
C20-C30 (Lubricant Oil Range)	RD977	1.10E+01	5.5E+00	UJ		-	-
C11-C30	RD977		1.7E+01			-	-
Benzene	RD977	5.00E-03	2.5E-03	U	1.2E-04	-	2.5E-03
Ethylbenzene	RD977	5.00E-03	2.5E-03	U	1.2E-04	-	2.5E-03
Toluene	RD977	5.00E-03	2.5E-03	U	1.2E-04	-	2.5E-03
m,p-Xylene	RD977	5.00E-03	2.5E-03	U	3.6E-04	-	2.5E-03
o-Xylene	RD977	5.00E-03	2.5E-03	U	8.0E-05	-	2.5E-03
Xylene (total)	RD977	-	-	-	4.4E-04	-	-
2-Methylnaphthalene	RD977	-	-	-	2.8E-02	-	-
Acenaphthene	RD977	-	-	-	5.7E-04	9.5E-03	9.5E-03
Acenaphthylene	RD977	-	-	-	7.0E-05	1.2E-03	1.2E-03
Anthracene	RD977	-	-	-	3.7E-04	6.2E-03	6.2E-03
Benzo(a)anthracene	RD977	-	-	-	2.7E-05	4.4E-04	4.4E-04
Benzo(a)pyrene	RD977	-	-	-	2.7E-05	4.5E-04	4.5E-04
Benzo(b)fluoranthene	RD977	-	-	-	4.3E-05	7.1E-04	7.1E-04
Benzo(e)pyrene	RD977	-	-	-	2.1E-04	3.4E-03	3.4E-03
Benzo(g,h,i)perylene	RD977	-	-	-	2.2E-04	3.6E-03	3.6E-03
Benzo(k)fluoranthene	RD977	-	-	-	2.1E-05	3.4E-04	3.4E-04
Chrysene	RD977	-	-	-	5.9E-05	9.7E-04	9.7E-04
Dibenz(a,h)anthracene	RD977	-	-	-	1.1E-05	1.8E-04	1.8E-04
Fluoranthene	RD977	-	-	-	7.5E-05	1.2E-03	1.2E-03
Fluorene	RD977	-	-	-	5.7E-04	9.4E-03	9.4E-03
Indeno(1,2,3-cd)pyrene	RD977	-	-	-	2.4E-05	4.0E-04	4.0E-04
Naphthalene	RD977	-	-	-	6.9E-03	-	-
Perylene	RD977	-	-	-	1.2E-04	1.9E-03	1.9E-03
Phenanthrene	RD977	-	-	-	1.5E-03	2.5E-02	2.5E-02
Pyrene	RD977	-	-	-	1.4E-04	2.2E-03	2.2E-03
C08-C11 (Gasoline Range)	RD979	1.10E+01	5.5E+00	UJ		-	-
C11-C14 (Kerosene Range)	RD979	1.10E+01	5.5E+00	UJ		-	-
C14-C20 (Diesel Range)	RD979	1.10E+01	5.5E+00	UJ		-	-
C20-C30 (Lubricant Oil Range)	RD979	1.10E+01	5.5E+00	UJ		-	-
C11-C30	RD979		1.7E+01			-	-
Benzene	RD979	5.00E-03	2.5E-03	U	1.2E-04	-	2.5E-03
Ethylbenzene	RD979	5.00E-03	2.5E-03	U	1.2E-04	-	2.5E-03
Toluene	RD979	5.00E-03	2.5E-03	U	1.2E-04	-	2.5E-03
m,p-Xylene	RD979	5.00E-03	2.5E-03	U	3.6E-04	-	2.5E-03
o-Xylene	RD979	5.00E-03	2.5E-03	U	8.0E-05	-	2.5E-03

TPH to Petroleum Constituent Extrapolation for Soil/Sediment (0-4 feet bgs) [a]
Sodium Reactor Experiment (SRE) Area

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Xylene (total)	RD979	-	-	-	4.4E-04	-	-
2-Methylnaphthalene	RD979	-	-	-	2.8E-02	-	-
Acenaphthene	RD979	-	-	-	5.7E-04	9.5E-03	9.5E-03
Acenaphthylene	RD979	-	-	-	7.0E-05	1.2E-03	1.2E-03
Anthracene	RD979	-	-	-	3.7E-04	6.2E-03	6.2E-03
Benzo(a)anthracene	RD979	-	-	-	2.7E-05	4.4E-04	4.4E-04
Benzo(a)pyrene	RD979	-	-	-	2.7E-05	4.5E-04	4.5E-04
Benzo(b)fluoranthene	RD979	-	-	-	4.3E-05	7.1E-04	7.1E-04
Benzo(e)pyrene	RD979	-	-	-	2.1E-04	3.4E-03	3.4E-03
Benzo(g,h,i)perylene	RD979	-	-	-	2.2E-04	3.6E-03	3.6E-03
Benzo(k)fluoranthene	RD979	-	-	-	2.1E-05	3.4E-04	3.4E-04
Chrysene	RD979	-	-	-	5.9E-05	9.7E-04	9.7E-04
Dibenz(a,h)anthracene	RD979	-	-	-	1.1E-05	1.8E-04	1.8E-04
Fluoranthene	RD979	-	-	-	7.5E-05	1.2E-03	1.2E-03
Fluorene	RD979	-	-	-	5.7E-04	9.4E-03	9.4E-03
Indeno(1,2,3-cd)pyrene	RD979	-	-	-	2.4E-05	4.0E-04	4.0E-04
Naphthalene	RD979	-	-	-	6.9E-03	-	-
Perylene	RD979	-	-	-	1.2E-04	1.9E-03	1.9E-03
Phenanthrene	RD979	-	-	-	1.5E-03	2.5E-02	2.5E-02
Pyrene	RD979	-	-	-	1.4E-04	2.2E-03	2.2E-03
C08-C11 (Gasoline Range)	RD980	1.10E+01	5.5E+00	UJ		-	-
C11-C14 (Kerosene Range)	RD980	1.10E+01	5.5E+00	UJ		-	-
C14-C20 (Diesel Range)	RD980	1.10E+01	5.5E+00	UJ		-	-
C20-C30 (Lubricant Oil Range)	RD980	1.10E+01	5.5E+00	UJ		-	-
C11-C30	RD980		1.7E+01			-	-
Benzene	RD980	5.00E-03	2.5E-03	U	1.2E-04	-	2.5E-03
Ethylbenzene	RD980	5.00E-03	2.5E-03	U	1.2E-04	-	2.5E-03
Toluene	RD980	5.00E-03	2.5E-03	U	1.2E-04	-	2.5E-03
m,p-Xylene	RD980	5.00E-03	2.5E-03	U	3.6E-04	-	2.5E-03
o-Xylene	RD980	5.00E-03	2.5E-03	U	8.0E-05	-	2.5E-03
Xylene (total)	RD980	-	-	-	4.4E-04	-	-
2-Methylnaphthalene	RD980	-	-	-	2.8E-02	-	-
Acenaphthene	RD980	-	-	-	5.7E-04	9.5E-03	9.5E-03
Acenaphthylene	RD980	-	-	-	7.0E-05	1.2E-03	1.2E-03
Anthracene	RD980	-	-	-	3.7E-04	6.2E-03	6.2E-03
Benzo(a)anthracene	RD980	-	-	-	2.7E-05	4.4E-04	4.4E-04
Benzo(a)pyrene	RD980	-	-	-	2.7E-05	4.5E-04	4.5E-04
Benzo(b)fluoranthene	RD980	-	-	-	4.3E-05	7.1E-04	7.1E-04
Benzo(e)pyrene	RD980	-	-	-	2.1E-04	3.4E-03	3.4E-03
Benzo(g,h,i)perylene	RD980	-	-	-	2.2E-04	3.6E-03	3.6E-03
Benzo(k)fluoranthene	RD980	-	-	-	2.1E-05	3.4E-04	3.4E-04
Chrysene	RD980	-	-	-	5.9E-05	9.7E-04	9.7E-04
Dibenz(a,h)anthracene	RD980	-	-	-	1.1E-05	1.8E-04	1.8E-04
Fluoranthene	RD980	-	-	-	7.5E-05	1.2E-03	1.2E-03
Fluorene	RD980	-	-	-	5.7E-04	9.4E-03	9.4E-03
Indeno(1,2,3-cd)pyrene	RD980	-	-	-	2.4E-05	4.0E-04	4.0E-04
Naphthalene	RD980	-	-	-	6.9E-03	-	-
Perylene	RD980	-	-	-	1.2E-04	1.9E-03	1.9E-03
Phenanthrene	RD980	-	-	-	1.5E-03	2.5E-02	2.5E-02
Pyrene	RD980	-	-	-	1.4E-04	2.2E-03	2.2E-03
C08-C11 (Gasoline Range)	RJ202	4.00E+00	2.0E+00	UJ		-	-
C11-C14 (Kerosene Range)	RJ202	4.00E+00	2.0E+00	UJ		-	-
C14-C20 (Diesel Range)	RJ202	4.00E+00	2.0E+00	UJ		-	-
C20-C30 (Lubricant Oil Range)	RJ202	6.25E+00	6.3E+00	J		-	-
C11-C30	RJ202		1.0E+01			-	-

TPH to Petroleum Constituent Extrapolation for Soil/Sediment (0-4 feet bgs) [a]
Sodium Reactor Experiment (SRE) Area

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Benzene	RJ202	-	-	-	1.2E-04	-	-
Ethylbenzene	RJ202	-	-	-	1.2E-04	-	-
Toluene	RJ202	-	-	-	1.2E-04	-	-
m,p-Xylene	RJ202	-	-	-	3.6E-04	-	-
o-Xylene	RJ202	-	-	-	8.0E-05	-	-
Xylene (total)	RJ202	-	-	-	4.4E-04	-	-
2-Methylnaphthalene	RJ202	-	-	-	2.8E-02	-	-
Acenaphthene	RJ202	-	-	-	5.7E-04	5.9E-03	5.9E-03
Acenaphthylene	RJ202	-	-	-	7.0E-05	7.2E-04	7.2E-04
Anthracene	RJ202	-	-	-	3.7E-04	3.8E-03	3.8E-03
Benzo(a)anthracene	RJ202	-	-	-	2.7E-05	2.8E-04	2.8E-04
Benzo(a)pyrene	RJ202	-	-	-	2.7E-05	2.8E-04	2.8E-04
Benzo(b)fluoranthene	RJ202	-	-	-	4.3E-05	4.4E-04	4.4E-04
Benzo(e)pyrene	RJ202	-	-	-	2.1E-04	2.1E-03	2.1E-03
Benzo(g,h,i)perylene	RJ202	-	-	-	2.2E-04	2.3E-03	2.3E-03
Benzo(k)fluoranthene	RJ202	-	-	-	2.1E-05	2.1E-04	2.1E-04
Chrysene	RJ202	-	-	-	5.9E-05	6.0E-04	6.0E-04
Dibenz(a,h)anthracene	RJ202	-	-	-	1.1E-05	1.1E-04	1.1E-04
Fluoranthene	RJ202	-	-	-	7.5E-05	7.7E-04	7.7E-04
Fluorene	RJ202	-	-	-	5.7E-04	5.8E-03	5.8E-03
Indeno(1,2,3-cd)pyrene	RJ202	-	-	-	2.4E-05	2.5E-04	2.5E-04
Naphthalene	RJ202	-	-	-	6.9E-03	-	-
Perylene	RJ202	-	-	-	1.2E-04	1.2E-03	1.2E-03
Phenanthrene	RJ202	-	-	-	1.5E-03	1.6E-02	1.6E-02
Pyrene	RJ202	-	-	-	1.4E-04	1.4E-03	1.4E-03
C08-C11 (Gasoline Range)	RJ513	3.00E+00	1.5E+00	UJ		-	-
C11-C14 (Kerosene Range)	RJ513	3.00E+00	1.5E+00	UJ		-	-
C14-C20 (Diesel Range)	RJ513	3.00E+00	1.5E+00	U		-	-
C20-C30 (Lubricant Oil Range)	RJ513	6.60E+01	6.6E+01			-	-
C11-C30	RJ513		6.9E+01			-	-
Benzene	RJ513	-	-	-	1.2E-04	-	-
Ethylbenzene	RJ513	-	-	-	1.2E-04	-	-
Toluene	RJ513	-	-	-	1.2E-04	-	-
m,p-Xylene	RJ513	-	-	-	3.6E-04	-	-
o-Xylene	RJ513	-	-	-	8.0E-05	-	-
Xylene (total)	RJ513	-	-	-	4.4E-04	-	-
2-Methylnaphthalene	RJ513	7.00E-03	3.5E-03	UJ	2.8E-02	-	3.5E-03
Acenaphthene	RJ513	7.00E-03	3.5E-03	UJ	5.7E-04	4.0E-02	3.5E-03
Acenaphthylene	RJ513	7.00E-03	3.5E-03	UJ	7.0E-05	4.8E-03	3.5E-03
Anthracene	RJ513	7.00E-03	3.5E-03	UJ	3.7E-04	2.6E-02	3.5E-03
Benzo(a)anthracene	RJ513	7.00E-03	3.5E-03	UJ	2.7E-05	1.9E-03	1.9E-03
Benzo(a)pyrene	RJ513	-	-	-	2.7E-05	1.9E-03	1.9E-03
Benzo(b)fluoranthene	RJ513	-	-	-	4.3E-05	3.0E-03	3.0E-03
Benzo(e)pyrene	RJ513	-	-	-	2.1E-04	1.4E-02	1.4E-02
Benzo(g,h,i)perylene	RJ513	-	-	-	2.2E-04	1.5E-02	1.5E-02
Benzo(k)fluoranthene	RJ513	-	-	-	2.1E-05	1.4E-03	1.4E-03
Chrysene	RJ513	7.00E-03	3.5E-03	U	5.9E-05	4.0E-03	3.5E-03
Dibenz(a,h)anthracene	RJ513	-	-	-	1.1E-05	7.6E-04	7.6E-04
Fluoranthene	RJ513	7.00E-03	3.5E-03	UJ	7.5E-05	5.2E-03	3.5E-03
Fluorene	RJ513	7.00E-03	3.5E-03	UJ	5.7E-04	3.9E-02	3.5E-03
Indeno(1,2,3-cd)pyrene	RJ513	-	-	-	2.4E-05	1.7E-03	1.7E-03
Naphthalene	RJ513	7.00E-03	3.5E-03	UJ	6.9E-03	-	3.5E-03
Perylene	RJ513	-	-	-	1.2E-04	8.1E-03	8.1E-03
Phenanthrene	RJ513	5.40E-02	5.4E-02		1.5E-03	1.1E-01	5.4E-02
Pyrene	RJ513	7.00E-03	3.5E-03	UJ	1.4E-04	9.4E-03	3.5E-03

TPH to Petroleum Constituent Extrapolation for Soil/Sediment (0-4 feet bgs) [a]
Sodium Reactor Experiment (SRE) Area

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
C08-C11 (Gasoline Range)	RJ516	9.90E+01	5.0E+01	U		-	-
C11-C14 (Kerosene Range)	RJ516	9.90E+01	5.0E+01	U		-	-
C14-C20 (Diesel Range)	RJ516	9.90E+01	5.0E+01	U		-	-
C20-C30 (Lubricant Oil Range)	RJ516	4.20E+02	4.2E+02			-	-
C11-C30	RJ516		5.2E+02			-	-
Benzene	RJ516	5.00E-03	2.5E-03	U	1.2E-04	-	2.5E-03
Ethylbenzene	RJ516	5.00E-03	2.5E-03	U	1.2E-04	-	2.5E-03
Toluene	RJ516	5.00E-03	2.5E-03	U	1.2E-04	-	2.5E-03
m,p-Xylene	RJ516	1.00E-02	5.0E-03	U	3.6E-04	-	5.0E-03
o-Xylene	RJ516	5.00E-03	2.5E-03	U	8.0E-05	-	2.5E-03
Xylene (total)	RJ516	-	-	-	4.4E-04	-	-
2-Methylnaphthalene	RJ516	3.00E-03	1.5E-03	U	2.8E-02	-	1.5E-03
Acenaphthene	RJ516	3.00E-03	1.5E-03	U	5.7E-04	3.0E-01	1.5E-03
Acenaphthylene	RJ516	3.00E-03	1.5E-03	U	7.0E-05	3.6E-02	1.5E-03
Anthracene	RJ516	3.00E-03	1.5E-03	U	3.7E-04	1.9E-01	1.5E-03
Benzo(a)anthracene	RJ516	2.00E-03	2.0E-03	J	2.7E-05	1.4E-02	2.0E-03
Benzo(a)pyrene	RJ516	4.00E-03	4.0E-03		2.7E-05	1.4E-02	4.0E-03
Benzo(b)fluoranthene	RJ516	5.00E-03	5.0E-03		4.3E-05	2.2E-02	5.0E-03
Benzo(e)pyrene	RJ516	-	-	-	2.1E-04	1.1E-01	1.1E-01
Benzo(g,h,i)perylene	RJ516	3.00E-03	1.5E-03	U	2.2E-04	1.1E-01	1.5E-03
Benzo(k)fluoranthene	RJ516	4.00E-03	4.0E-03		2.1E-05	1.1E-02	4.0E-03
Chrysene	RJ516	5.00E-03	5.0E-03		5.9E-05	3.0E-02	5.0E-03
Dibenz(a,h)anthracene	RJ516	3.00E-03	1.5E-03	U	1.1E-05	5.7E-03	1.5E-03
Fluoranthene	RJ516	4.00E-03	4.0E-03		7.5E-05	3.9E-02	4.0E-03
Fluorene	RJ516	3.00E-03	1.5E-03	U	5.7E-04	2.9E-01	1.5E-03
Indeno(1,2,3-cd)pyrene	RJ516	5.00E-03	5.0E-03		2.4E-05	1.2E-02	5.0E-03
Naphthalene	RJ516	3.00E-03	1.5E-03	U	6.9E-03	-	1.5E-03
Perylene	RJ516	-	-	-	1.2E-04	6.1E-02	6.1E-02
Phenanthrene	RJ516	2.00E-03	2.0E-03	J	1.5E-03	8.0E-01	2.0E-03
Pyrene	RJ516	5.00E-03	5.0E-03		1.4E-04	7.1E-02	5.0E-03
C08-C11 (Gasoline Range)	RJ517	3.00E+00	1.5E+00	U		-	-
C11-C14 (Kerosene Range)	RJ517	3.00E+00	1.5E+00	U		-	-
C14-C20 (Diesel Range)	RJ517	3.00E+00	1.5E+00	U		-	-
C20-C30 (Lubricant Oil Range)	RJ517	1.20E+01	1.2E+01			-	-
C11-C30	RJ517		1.5E+01			-	-
Benzene	RJ517	5.00E-03	2.5E-03	U	1.2E-04	-	2.5E-03
Ethylbenzene	RJ517	5.00E-03	2.5E-03	U	1.2E-04	-	2.5E-03
Toluene	RJ517	3.00E-03	1.5E-03	U	1.2E-04	-	1.5E-03
m,p-Xylene	RJ517	1.00E-02	5.0E-03	U	3.6E-04	-	5.0E-03
o-Xylene	RJ517	5.00E-03	2.5E-03	U	8.0E-05	-	2.5E-03
Xylene (total)	RJ517	1.50E-02	7.5E-03	U	4.4E-04	-	7.5E-03
2-Methylnaphthalene	RJ517	3.00E-03	1.5E-03	U	2.8E-02	-	1.5E-03
Acenaphthene	RJ517	3.00E-03	1.5E-03	U	5.7E-04	8.6E-03	1.5E-03
Acenaphthylene	RJ517	3.00E-03	1.5E-03	U	7.0E-05	1.1E-03	1.1E-03
Anthracene	RJ517	3.00E-03	1.5E-03	U	3.7E-04	5.6E-03	1.5E-03
Benzo(a)anthracene	RJ517	3.00E-03	1.5E-03	U	2.7E-05	4.0E-04	4.0E-04
Benzo(a)pyrene	RJ517	3.00E-03	1.5E-03	U	2.7E-05	4.1E-04	4.1E-04
Benzo(b)fluoranthene	RJ517	3.00E-03	3.0E-03	J	4.3E-05	6.5E-04	3.0E-03
Benzo(e)pyrene	RJ517	-	-	-	2.1E-04	3.1E-03	3.1E-03
Benzo(g,h,i)perylene	RJ517	3.00E-03	1.5E-03	U	2.2E-04	3.3E-03	1.5E-03
Benzo(k)fluoranthene	RJ517	3.00E-03	1.5E-03	U	2.1E-05	3.1E-04	3.1E-04
Chrysene	RJ517	5.00E-03	5.0E-03		5.9E-05	8.8E-04	5.0E-03
Dibenz(a,h)anthracene	RJ517	3.00E-03	1.5E-03	U	1.1E-05	1.7E-04	1.7E-04
Fluoranthene	RJ517	4.00E-03	4.0E-03		7.5E-05	1.1E-03	4.0E-03
Fluorene	RJ517	3.00E-03	1.5E-03	U	5.7E-04	8.5E-03	1.5E-03

TPH to Petroleum Constituent Extrapolation for Soil/Sediment (0-4 feet bgs) [a]
Sodium Reactor Experiment (SRE) Area

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Indeno(1,2,3-cd)pyrene	RJ517	3.00E-03	1.5E-03	U	2.4E-05	3.6E-04	3.6E-04
Naphthalene	RJ517	3.00E-03	1.5E-03	U	6.9E-03	-	1.5E-03
Perylene	RJ517	-	-	-	1.2E-04	1.8E-03	1.8E-03
Phenanthrene	RJ517	3.00E-03	1.5E-03	U	1.5E-03	2.3E-02	1.5E-03
Pyrene	RJ517	3.00E-03	3.0E-03	J	1.4E-04	2.0E-03	3.0E-03
C08-C11 (Gasoline Range)	RJ627	4.00E+00	2.0E+00	U		-	-
C11-C14 (Kerosene Range)	RJ627	4.00E+00	2.0E+00	U		-	-
C14-C20 (Diesel Range)	RJ627	4.00E+00	2.0E+00	U		-	-
C20-C30 (Lubricant Oil Range)	RJ627	4.00E+00	2.0E+00	U		-	-
C11-C30	RJ627		6.0E+00			-	-
Benzene	RJ627	-	-	-	1.2E-04	-	-
Ethylbenzene	RJ627	-	-	-	1.2E-04	-	-
Toluene	RJ627	-	-	-	1.2E-04	-	-
m,p-Xylene	RJ627	-	-	-	3.6E-04	-	-
o-Xylene	RJ627	-	-	-	8.0E-05	-	-
Xylene (total)	RJ627	-	-	-	4.4E-04	-	-
2-Methylnaphthalene	RJ627	-	-	-	2.8E-02	-	-
Acenaphthene	RJ627	-	-	-	5.7E-04	3.4E-03	3.4E-03
Acenaphthylene	RJ627	-	-	-	7.0E-05	4.2E-04	4.2E-04
Anthracene	RJ627	-	-	-	3.7E-04	2.2E-03	2.2E-03
Benzo(a)anthracene	RJ627	-	-	-	2.7E-05	1.6E-04	1.6E-04
Benzo(a)pyrene	RJ627	-	-	-	2.7E-05	1.6E-04	1.6E-04
Benzo(b)fluoranthene	RJ627	-	-	-	4.3E-05	2.6E-04	2.6E-04
Benzo(e)pyrene	RJ627	-	-	-	2.1E-04	1.2E-03	1.2E-03
Benzo(g,h,i)perylene	RJ627	-	-	-	2.2E-04	1.3E-03	1.3E-03
Benzo(k)fluoranthene	RJ627	-	-	-	2.1E-05	1.2E-04	1.2E-04
Chrysene	RJ627	-	-	-	5.9E-05	3.5E-04	3.5E-04
Dibenz(a,h)anthracene	RJ627	-	-	-	1.1E-05	6.6E-05	6.6E-05
Fluoranthene	RJ627	-	-	-	7.5E-05	4.5E-04	4.5E-04
Fluorene	RJ627	-	-	-	5.7E-04	3.4E-03	3.4E-03
Indeno(1,2,3-cd)pyrene	RJ627	-	-	-	2.4E-05	1.4E-04	1.4E-04
Naphthalene	RJ627	-	-	-	6.9E-03	-	-
Perylene	RJ627	-	-	-	1.2E-04	7.1E-04	7.1E-04
Phenanthrene	RJ627	-	-	-	1.5E-03	9.2E-03	9.2E-03
Pyrene	RJ627	-	-	-	1.4E-04	8.2E-04	8.2E-04
C08-C11 (Gasoline Range)	RJ786	1.80E+01	9.0E+00	U		-	-
C11-C14 (Kerosene Range)	RJ786	4.00E+01	4.0E+01			-	-
C14-C20 (Diesel Range)	RJ786	1.80E+01	9.0E+00	U		-	-
C20-C30 (Lubricant Oil Range)	RJ786	4.70E+02	4.7E+02			-	-
C11-C30	RJ786		5.2E+02			-	-
Benzene	RJ786	-	-	-	1.2E-04	-	-
Ethylbenzene	RJ786	-	-	-	1.2E-04	-	-
Toluene	RJ786	-	-	-	1.2E-04	-	-
m,p-Xylene	RJ786	-	-	-	3.6E-04	-	-
o-Xylene	RJ786	-	-	-	8.0E-05	-	-
Xylene (total)	RJ786	-	-	-	4.4E-04	-	-
2-Methylnaphthalene	RJ786	-	-	-	2.8E-02	-	-
Acenaphthene	RJ786	-	-	-	5.7E-04	3.0E-01	3.0E-01
Acenaphthylene	RJ786	-	-	-	7.0E-05	3.6E-02	3.6E-02
Anthracene	RJ786	-	-	-	3.7E-04	1.9E-01	1.9E-01
Benzo(a)anthracene	RJ786	-	-	-	2.7E-05	1.4E-02	1.4E-02
Benzo(a)pyrene	RJ786	-	-	-	2.7E-05	1.4E-02	1.4E-02
Benzo(b)fluoranthene	RJ786	-	-	-	4.3E-05	2.2E-02	2.2E-02
Benzo(e)pyrene	RJ786	-	-	-	2.1E-04	1.1E-01	1.1E-01
Benzo(g,h,i)perylene	RJ786	-	-	-	2.2E-04	1.1E-01	1.1E-01

TPH to Petroleum Constituent Extrapolation for Soil/Sediment (0-4 feet bgs) [a]
Sodium Reactor Experiment (SRE) Area

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Benzo(k)fluoranthene	RJ786	-	-	-	2.1E-05	1.1E-02	1.1E-02
Chrysene	RJ786	-	-	-	5.9E-05	3.0E-02	3.0E-02
Dibenz(a,h)anthracene	RJ786	-	-	-	1.1E-05	5.7E-03	5.7E-03
Fluoranthene	RJ786	-	-	-	7.5E-05	3.9E-02	3.9E-02
Fluorene	RJ786	-	-	-	5.7E-04	2.9E-01	2.9E-01
Indeno(1,2,3-cd)pyrene	RJ786	-	-	-	2.4E-05	1.2E-02	1.2E-02
Naphthalene	RJ786	-	-	-	6.9E-03	-	-
Perylene	RJ786	-	-	-	1.2E-04	6.1E-02	6.1E-02
Phenanthrene	RJ786	-	-	-	1.5E-03	8.0E-01	8.0E-01
Pyrene	RJ786	-	-	-	1.4E-04	7.1E-02	7.1E-02
C08-C11 (Gasoline Range)	RJ788	3.00E+00	1.5E+00	U		-	-
C11-C14 (Kerosene Range)	RJ788	3.00E+00	1.5E+00	U		-	-
C14-C20 (Diesel Range)	RJ788	1.40E+01	1.4E+01	J		-	-
C20-C30 (Lubricant Oil Range)	RJ788	1.30E+02	1.3E+02	J		-	-
C11-C30	RJ788		1.5E+02			-	-
Benzene	RJ788	-	-	-	1.2E-04	-	-
Ethylbenzene	RJ788	-	-	-	1.2E-04	-	-
Toluene	RJ788	-	-	-	1.2E-04	-	-
m,p-Xylene	RJ788	-	-	-	3.6E-04	-	-
o-Xylene	RJ788	-	-	-	8.0E-05	-	-
Xylene (total)	RJ788	-	-	-	4.4E-04	-	-
2-Methylnaphthalene	RJ788	2.50E-02	2.5E-02		2.8E-02	-	2.5E-02
Acenaphthene	RJ788	2.00E-01	2.0E-01		5.7E-04	8.3E-02	2.0E-01
Acenaphthylene	RJ788	1.80E-02	9.0E-03	U	7.0E-05	1.0E-02	9.0E-03
Anthracene	RJ788	1.80E-02	9.0E-03	U	3.7E-04	5.4E-02	9.0E-03
Benzo(a)anthracene	RJ788	3.90E+00	3.9E+00	J	2.7E-05	3.9E-03	3.9E+00
Benzo(a)pyrene	RJ788	4.20E+00	4.2E+00		2.7E-05	4.0E-03	4.2E+00
Benzo(b)fluoranthene	RJ788	4.10E+00	4.1E+00		4.3E-05	6.3E-03	4.1E+00
Benzo(e)pyrene	RJ788	-	-	-	2.1E-04	3.0E-02	3.0E-02
Benzo(g,h,i)perylene	RJ788	9.50E-01	9.5E-01		2.2E-04	3.2E-02	9.5E-01
Benzo(k)fluoranthene	RJ788	4.00E+00	4.0E+00		2.1E-05	3.0E-03	4.0E+00
Chrysene	RJ788	1.80E-02	9.0E-03	UJ	5.9E-05	8.5E-03	8.5E-03
Dibenz(a,h)anthracene	RJ788	3.10E-01	3.1E-01		1.1E-05	1.6E-03	3.1E-01
Fluoranthene	RJ788	7.00E+00	7.0E+00		7.5E-05	1.1E-02	7.0E+00
Fluorene	RJ788	2.10E-01	2.1E-01		5.7E-04	8.3E-02	2.1E-01
Indeno(1,2,3-cd)pyrene	RJ788	1.70E+00	1.7E+00	J	2.4E-05	3.5E-03	1.7E+00
Naphthalene	RJ788	5.80E-02	5.8E-02		6.9E-03	-	5.8E-02
Perylene	RJ788	-	-	-	1.2E-04	1.7E-02	1.7E-02
Phenanthrene	RJ788	3.30E+00	3.3E+00		1.5E-03	2.2E-01	3.3E+00
Pyrene	RJ788	5.60E+00	5.6E+00	J	1.4E-04	2.0E-02	5.6E+00
C08-C11 (Gasoline Range)	RJ790	1.70E+01	8.5E+00	U		-	-
C11-C14 (Kerosene Range)	RJ790	1.70E+01	8.5E+00	U		-	-
C14-C20 (Diesel Range)	RJ790	1.80E+01	1.8E+01	J		-	-
C20-C30 (Lubricant Oil Range)	RJ790	3.40E+02	3.4E+02	J		-	-
C11-C30	RJ790		3.7E+02			-	-
Benzene	RJ790	-	-	-	1.2E-04	-	-
Ethylbenzene	RJ790	-	-	-	1.2E-04	-	-
Toluene	RJ790	-	-	-	1.2E-04	-	-
m,p-Xylene	RJ790	-	-	-	3.6E-04	-	-
o-Xylene	RJ790	-	-	-	8.0E-05	-	-
Xylene (total)	RJ790	-	-	-	4.4E-04	-	-
2-Methylnaphthalene	RJ790	3.50E-01	1.8E-01	U	2.8E-02	-	1.8E-01
Acenaphthene	RJ790	9.00E-01	9.0E-01		5.7E-04	2.1E-01	9.0E-01
Acenaphthylene	RJ790	3.50E-01	1.8E-01	U	7.0E-05	2.6E-02	2.6E-02
Anthracene	RJ790	4.00E+00	4.0E+00		3.7E-04	1.4E-01	4.0E+00

TPH to Petroleum Constituent Extrapolation for Soil/Sediment (0-4 feet bgs) [a]
Sodium Reactor Experiment (SRE) Area

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Benzo(a)anthracene	RJ790	1.40E+01	1.4E+01	J	2.7E-05	9.9E-03	1.4E+01
Benzo(a)pyrene	RJ790	1.50E+01	1.5E+01		2.7E-05	1.0E-02	1.5E+01
Benzo(b)fluoranthene	RJ790	1.30E+01	1.3E+01		4.3E-05	1.6E-02	1.3E+01
Benzo(e)pyrene	RJ790	-	-	-	2.1E-04	7.6E-02	7.6E-02
Benzo(g,h,i)perylene	RJ790	4.70E+00	4.7E+00		2.2E-04	8.1E-02	4.7E+00
Benzo(k)fluoranthene	RJ790	1.50E+01	1.5E+01		2.1E-05	7.5E-03	1.5E+01
Chrysene	RJ790	1.30E+01	1.3E+01	J	5.9E-05	2.1E-02	1.3E+01
Dibenz(a,h)anthracene	RJ790	2.20E+00	2.2E+00		1.1E-05	4.1E-03	2.2E+00
Fluoranthene	RJ790	2.50E+01	2.5E+01		7.5E-05	2.7E-02	2.5E+01
Fluorene	RJ790	9.20E-01	9.2E-01		5.7E-04	2.1E-01	9.2E-01
Indeno(1,2,3-cd)pyrene	RJ790	6.40E+00	6.4E+00	J	2.4E-05	8.8E-03	6.4E+00
Naphthalene	RJ790	3.50E-01	1.8E-01	U	6.9E-03	-	1.8E-01
Perylene	RJ790	-	-	-	1.2E-04	4.3E-02	4.3E-02
Phenanthrene	RJ790	1.10E+01	1.1E+01		1.5E-03	5.6E-01	1.1E+01
Pyrene	RJ790	2.10E+01	2.1E+01	J	1.4E-04	5.0E-02	2.1E+01

Notes:

a. Petroleum constituent concentrations estimated and selected as described in Section 2.8 of the SRAM.

"-" not applicable

mg/kg - milligrams per kilogram

Aroclor to PCB Congener Extrapolation (0-4 feet bgs)
Sodium Reactor Experiment (SRE) Area

Chemical	EPA ID	Measured Concentrations (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF_{1254}	EF_{1260}	Estimated Concentrations Aroclor-1254 (mg/kg)	Estimated Concentrations Aroclor-1260 (mg/kg)	Estimated Concentrations PCB_{MAX} (mg/kg)
Aroclor-1254	MJ248	1.2E-01	1.2E-01	J	-	-	-	-	-
Aroclor-1260	MJ248	3.7E-02	1.9E-02	UJ	-	-	-	-	-
PCB-105	MJ248	-	-	-	1.2E-01	8.2E-02	1.5E-05	1.5E-06	1.5E-05
PCB-114	MJ248	-	-	-	4.5E-03	1.5E-03	5.4E-07	2.7E-08	5.4E-07
PCB-118	MJ248	-	-	-	2.7E-01	1.6E-01	3.2E-05	3.0E-06	3.2E-05
PCB-123	MJ248	-	-	-	3.0E-03	2.3E-03	3.6E-07	4.3E-08	3.6E-07
PCB-126	MJ248	-	-	-	7.5E-03	6.4E-03	9.0E-07	1.2E-07	9.0E-07
PCB-156	MJ248	-	-	-	6.3E-02	5.5E-02	7.5E-06	1.0E-06	7.5E-06
PCB-157	MJ248	-	-	-	1.2E-02	2.5E-02	1.5E-06	4.5E-07	1.5E-06
PCB-167	MJ248	-	-	-	2.1E-02	4.3E-02	2.5E-06	7.9E-07	2.5E-06
PCB-169	MJ248	-	-	-	3.7E-04	6.4E-04	4.4E-08	1.2E-08	4.4E-08
PCB-189	MJ248	-	-	-	3.0E-03	6.4E-03	3.6E-07	1.2E-07	3.6E-07
PCB-77	MJ248	-	-	-	1.5E-02	1.3E-02	1.9E-06	2.4E-07	1.9E-06
PCB-81	MJ248	-	-	-	3.0E-03	2.3E-03	3.6E-07	4.2E-08	3.6E-07
Aroclor-1254	MJ623	1.1E+00	5.5E-01	U	-	-	-	-	-
Aroclor-1260	MJ623	6.9E+00	6.9E+00		-	-	-	-	-
PCB-105	MJ623	-	-	-	1.2E-01	8.2E-02	6.8E-05	5.6E-04	5.6E-04
PCB-114	MJ623	-	-	-	4.5E-03	1.5E-03	2.5E-06	1.0E-05	1.0E-05
PCB-118	MJ623	-	-	-	2.7E-01	1.6E-01	1.5E-04	1.1E-03	1.1E-03
PCB-123	MJ623	-	-	-	3.0E-03	2.3E-03	1.6E-06	1.6E-05	1.6E-05
PCB-126	MJ623	-	-	-	7.5E-03	6.4E-03	4.1E-06	4.4E-05	4.4E-05
PCB-156	MJ623	-	-	-	6.3E-02	5.5E-02	3.5E-05	3.8E-04	3.8E-04
PCB-157	MJ623	-	-	-	1.2E-02	2.5E-02	6.8E-06	1.7E-04	1.7E-04
PCB-167	MJ623	-	-	-	2.1E-02	4.3E-02	1.1E-05	2.9E-04	2.9E-04
PCB-169	MJ623	-	-	-	3.7E-04	6.4E-04	2.0E-07	4.4E-06	4.4E-06
PCB-189	MJ623	-	-	-	3.0E-03	6.4E-03	1.6E-06	4.4E-05	4.4E-05
PCB-77	MJ623	-	-	-	1.5E-02	1.3E-02	8.5E-06	8.8E-05	8.8E-05
PCB-81	MJ623	-	-	-	3.0E-03	2.3E-03	1.6E-06	1.6E-05	1.6E-05
Aroclor-1254	MJ624	1.1E+00	5.5E-01	U	-	-	-	-	-
Aroclor-1260	MJ624	6.4E+00	6.4E+00		-	-	-	-	-
PCB-105	MJ624	-	-	-	1.2E-01	8.2E-02	6.8E-05	5.2E-04	5.2E-04
PCB-114	MJ624	-	-	-	4.5E-03	1.5E-03	2.5E-06	9.3E-06	9.3E-06
PCB-118	MJ624	-	-	-	2.7E-01	1.6E-01	1.5E-04	1.0E-03	1.0E-03
PCB-123	MJ624	-	-	-	3.0E-03	2.3E-03	1.6E-06	1.5E-05	1.5E-05
PCB-126	MJ624	-	-	-	7.5E-03	6.4E-03	4.1E-06	4.1E-05	4.1E-05
PCB-156	MJ624	-	-	-	6.3E-02	5.5E-02	3.5E-05	3.5E-04	3.5E-04
PCB-157	MJ624	-	-	-	1.2E-02	2.5E-02	6.8E-06	1.6E-04	1.6E-04
PCB-167	MJ624	-	-	-	2.1E-02	4.3E-02	1.1E-05	2.7E-04	2.7E-04
PCB-169	MJ624	-	-	-	3.7E-04	6.4E-04	2.0E-07	4.1E-06	4.1E-06
PCB-189	MJ624	-	-	-	3.0E-03	6.4E-03	1.6E-06	4.1E-05	4.1E-05
PCB-77	MJ624	-	-	-	1.5E-02	1.3E-02	8.5E-06	8.1E-05	8.1E-05
PCB-81	MJ624	-	-	-	3.0E-03	2.3E-03	1.6E-06	1.4E-05	1.4E-05

Aroclor to PCB Congener Extrapolation (0-4 feet bgs)
Sodium Reactor Experiment (SRE) Area

Chemical	EPA ID	Measured Concentrations (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF_{1254}	EF_{1260}	Estimated Concentrations Aroclor-1254 (mg/kg)	Estimated Concentrations Aroclor-1260 (mg/kg)	Estimated Concentrations PCB_{MAX} (mg/kg)
Aroclor-1254	MJ625	5.4E-01	2.7E-01	U	-	-	-	-	-
Aroclor-1260	MJ625	4.8E+00	4.8E+00		-	-	-	-	-
PCB-105	MJ625	-	-	-	1.2E-01	8.2E-02	3.3E-05	3.9E-04	3.9E-04
PCB-114	MJ625	-	-	-	4.5E-03	1.5E-03	1.2E-06	7.0E-06	7.0E-06
PCB-118	MJ625	-	-	-	2.7E-01	1.6E-01	7.2E-05	7.9E-04	7.9E-04
PCB-123	MJ625	-	-	-	3.0E-03	2.3E-03	8.1E-07	1.1E-05	1.1E-05
PCB-126	MJ625	-	-	-	7.5E-03	6.4E-03	2.0E-06	3.1E-05	3.1E-05
PCB-156	MJ625	-	-	-	6.3E-02	5.5E-02	1.7E-05	2.6E-04	2.6E-04
PCB-157	MJ625	-	-	-	1.2E-02	2.5E-02	3.3E-06	1.2E-04	1.2E-04
PCB-167	MJ625	-	-	-	2.1E-02	4.3E-02	5.6E-06	2.1E-04	2.1E-04
PCB-169	MJ625	-	-	-	3.7E-04	6.4E-04	9.9E-08	3.1E-06	3.1E-06
PCB-189	MJ625	-	-	-	3.0E-03	6.4E-03	8.1E-07	3.1E-05	3.1E-05
PCB-77	MJ625	-	-	-	1.5E-02	1.3E-02	4.2E-06	6.1E-05	6.1E-05
PCB-81	MJ625	-	-	-	3.0E-03	2.3E-03	8.1E-07	1.1E-05	1.1E-05
Aroclor-1254	MJ626	1.1E+00	5.5E-01	U	-	-	-	-	-
Aroclor-1260	MJ626	7.8E+00	7.8E+00		-	-	-	-	-
PCB-105	MJ626	-	-	-	1.2E-01	8.2E-02	6.8E-05	6.4E-04	6.4E-04
PCB-114	MJ626	-	-	-	4.5E-03	1.5E-03	2.5E-06	1.1E-05	1.1E-05
PCB-118	MJ626	-	-	-	2.7E-01	1.6E-01	1.5E-04	1.3E-03	1.3E-03
PCB-123	MJ626	-	-	-	3.0E-03	2.3E-03	1.6E-06	1.8E-05	1.8E-05
PCB-126	MJ626	-	-	-	7.5E-03	6.4E-03	4.1E-06	5.0E-05	5.0E-05
PCB-156	MJ626	-	-	-	6.3E-02	5.5E-02	3.5E-05	4.3E-04	4.3E-04
PCB-157	MJ626	-	-	-	1.2E-02	2.5E-02	6.8E-06	1.9E-04	1.9E-04
PCB-167	MJ626	-	-	-	2.1E-02	4.3E-02	1.1E-05	3.3E-04	3.3E-04
PCB-169	MJ626	-	-	-	3.7E-04	6.4E-04	2.0E-07	5.0E-06	5.0E-06
PCB-189	MJ626	-	-	-	3.0E-03	6.4E-03	1.6E-06	5.0E-05	5.0E-05
PCB-77	MJ626	-	-	-	1.5E-02	1.3E-02	8.5E-06	9.9E-05	9.9E-05
PCB-81	MJ626	-	-	-	3.0E-03	2.3E-03	1.6E-06	1.8E-05	1.8E-05
Aroclor-1254	MJ627	5.6E-02	2.8E-02	U	-	-	-	-	-
Aroclor-1260	MJ627	1.4E-01	1.4E-01		-	-	-	-	-
PCB-105	MJ627	-	-	-	1.2E-01	8.2E-02	3.5E-06	1.1E-05	1.1E-05
PCB-114	MJ627	-	-	-	4.5E-03	1.5E-03	1.3E-07	2.0E-07	2.0E-07
PCB-118	MJ627	-	-	-	2.7E-01	1.6E-01	7.5E-06	2.3E-05	2.3E-05
PCB-123	MJ627	-	-	-	3.0E-03	2.3E-03	8.4E-08	3.2E-07	3.2E-07
PCB-126	MJ627	-	-	-	7.5E-03	6.4E-03	2.1E-07	8.9E-07	8.9E-07
PCB-156	MJ627	-	-	-	6.3E-02	5.5E-02	1.8E-06	7.6E-06	7.6E-06
PCB-157	MJ627	-	-	-	1.2E-02	2.5E-02	3.5E-07	3.4E-06	3.4E-06
PCB-167	MJ627	-	-	-	2.1E-02	4.3E-02	5.8E-07	6.0E-06	6.0E-06
PCB-169	MJ627	-	-	-	3.7E-04	6.4E-04	1.0E-08	8.9E-08	8.9E-08
PCB-189	MJ627	-	-	-	3.0E-03	6.4E-03	8.4E-08	8.9E-07	8.9E-07
PCB-77	MJ627	-	-	-	1.5E-02	1.3E-02	4.3E-07	1.8E-06	1.8E-06
PCB-81	MJ627	-	-	-	3.0E-03	2.3E-03	8.4E-08	3.2E-07	3.2E-07

Aroclor to PCB Congener Extrapolation (0-4 feet bgs)
Sodium Reactor Experiment (SRE) Area

Chemical	EPA ID	Measured Concentrations (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF_{1254}	EF_{1260}	Estimated Concentrations Aroclor-1254 (mg/kg)	Estimated Concentrations Aroclor-1260 (mg/kg)	Estimated Concentrations PCB_{MAX} (mg/kg)
Aroclor-1254	MJ628	4.3E-01	4.3E-01		-	-	-	-	-
Aroclor-1260	MJ628	5.3E-02	2.7E-02	U	-	-	-	-	-
PCB-105	MJ628	-	-	-	1.2E-01	8.2E-02	5.3E-05	2.2E-06	5.3E-05
PCB-114	MJ628	-	-	-	4.5E-03	1.5E-03	2.0E-06	3.9E-08	2.0E-06
PCB-118	MJ628	-	-	-	2.7E-01	1.6E-01	1.2E-04	4.3E-06	1.2E-04
PCB-123	MJ628	-	-	-	3.0E-03	2.3E-03	1.3E-06	6.1E-08	1.3E-06
PCB-126	MJ628	-	-	-	7.5E-03	6.4E-03	3.2E-06	1.7E-07	3.2E-06
PCB-156	MJ628	-	-	-	6.3E-02	5.5E-02	2.7E-05	1.4E-06	2.7E-05
PCB-157	MJ628	-	-	-	1.2E-02	2.5E-02	5.3E-06	6.5E-07	5.3E-06
PCB-167	MJ628	-	-	-	2.1E-02	4.3E-02	8.9E-06	1.1E-06	8.9E-06
PCB-169	MJ628	-	-	-	3.7E-04	6.4E-04	1.6E-07	1.7E-08	1.6E-07
PCB-189	MJ628	-	-	-	3.0E-03	6.4E-03	1.3E-06	1.7E-07	1.3E-06
PCB-77	MJ628	-	-	-	1.5E-02	1.3E-02	6.6E-06	3.4E-07	6.6E-06
PCB-81	MJ628	-	-	-	3.0E-03	2.3E-03	1.3E-06	6.0E-08	1.3E-06
Aroclor-1254	MJ629	1.6E-01	1.6E-01		-	-	-	-	-
Aroclor-1260	MJ629	8.2E-02	4.1E-02	U	-	-	-	-	-
PCB-105	MJ629	-	-	-	1.2E-01	8.2E-02	2.0E-05	3.4E-06	2.0E-05
PCB-114	MJ629	-	-	-	4.5E-03	1.5E-03	7.3E-07	6.0E-08	7.3E-07
PCB-118	MJ629	-	-	-	2.7E-01	1.6E-01	4.3E-05	6.7E-06	4.3E-05
PCB-123	MJ629	-	-	-	3.0E-03	2.3E-03	4.8E-07	9.5E-08	4.8E-07
PCB-126	MJ629	-	-	-	7.5E-03	6.4E-03	1.2E-06	2.6E-07	1.2E-06
PCB-156	MJ629	-	-	-	6.3E-02	5.5E-02	1.0E-05	2.2E-06	1.0E-05
PCB-157	MJ629	-	-	-	1.2E-02	2.5E-02	2.0E-06	1.0E-06	2.0E-06
PCB-167	MJ629	-	-	-	2.1E-02	4.3E-02	3.3E-06	1.8E-06	3.3E-06
PCB-169	MJ629	-	-	-	3.7E-04	6.4E-04	5.9E-08	2.6E-08	5.9E-08
PCB-189	MJ629	-	-	-	3.0E-03	6.4E-03	4.8E-07	2.6E-07	4.8E-07
PCB-77	MJ629	-	-	-	1.5E-02	1.3E-02	2.5E-06	5.2E-07	2.5E-06
PCB-81	MJ629	-	-	-	3.0E-03	2.3E-03	4.8E-07	9.2E-08	4.8E-07
Aroclor-1254	MJ630	5.4E-02	2.7E-02	U	-	-	-	-	-
Aroclor-1260	MJ630	5.4E-02	2.7E-02	U	-	-	-	-	-
PCB-105	MJ630	-	-	-	1.2E-01	8.2E-02	3.3E-06	2.2E-06	3.3E-06
PCB-114	MJ630	-	-	-	4.5E-03	1.5E-03	1.2E-07	3.9E-08	1.2E-07
PCB-118	MJ630	-	-	-	2.7E-01	1.6E-01	7.2E-06	4.4E-06	7.2E-06
PCB-123	MJ630	-	-	-	3.0E-03	2.3E-03	8.1E-08	6.3E-08	8.1E-08
PCB-126	MJ630	-	-	-	7.5E-03	6.4E-03	2.0E-07	1.7E-07	2.0E-07
PCB-156	MJ630	-	-	-	6.3E-02	5.5E-02	1.7E-06	1.5E-06	1.7E-06
PCB-157	MJ630	-	-	-	1.2E-02	2.5E-02	3.3E-07	6.6E-07	6.6E-07
PCB-167	MJ630	-	-	-	2.1E-02	4.3E-02	5.6E-07	1.2E-06	1.2E-06
PCB-169	MJ630	-	-	-	3.7E-04	6.4E-04	9.9E-09	1.7E-08	1.7E-08
PCB-189	MJ630	-	-	-	3.0E-03	6.4E-03	8.1E-08	1.7E-07	1.7E-07
PCB-77	MJ630	-	-	-	1.5E-02	1.3E-02	4.2E-07	3.4E-07	4.2E-07
PCB-81	MJ630	-	-	-	3.0E-03	2.3E-03	8.1E-08	6.1E-08	8.1E-08

Aroclor to PCB Congener Extrapolation (0-4 feet bgs)
Sodium Reactor Experiment (SRE) Area

Chemical	EPA ID	Measured Concentrations (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF_{1254}	EF_{1260}	Estimated Concentrations Aroclor-1254 (mg/kg)	Estimated Concentrations Aroclor-1260 (mg/kg)	Estimated Concentrations PCB_{MAX} (mg/kg)
Aroclor-1254	MJ631	5.3E-02	2.7E-02	U	-	-	-	-	-
Aroclor-1260	MJ631	5.3E-02	2.7E-02	U	-	-	-	-	-
PCB-105	MJ631	-	-	-	1.2E-01	8.2E-02	3.3E-06	2.2E-06	3.3E-06
PCB-114	MJ631	-	-	-	4.5E-03	1.5E-03	1.2E-07	3.9E-08	1.2E-07
PCB-118	MJ631	-	-	-	2.7E-01	1.6E-01	7.1E-06	4.3E-06	7.1E-06
PCB-123	MJ631	-	-	-	3.0E-03	2.3E-03	7.9E-08	6.1E-08	7.9E-08
PCB-126	MJ631	-	-	-	7.5E-03	6.4E-03	2.0E-07	1.7E-07	2.0E-07
PCB-156	MJ631	-	-	-	6.3E-02	5.5E-02	1.7E-06	1.4E-06	1.7E-06
PCB-157	MJ631	-	-	-	1.2E-02	2.5E-02	3.3E-07	6.5E-07	6.5E-07
PCB-167	MJ631	-	-	-	2.1E-02	4.3E-02	5.5E-07	1.1E-06	1.1E-06
PCB-169	MJ631	-	-	-	3.7E-04	6.4E-04	9.7E-09	1.7E-08	1.7E-08
PCB-189	MJ631	-	-	-	3.0E-03	6.4E-03	7.9E-08	1.7E-07	1.7E-07
PCB-77	MJ631	-	-	-	1.5E-02	1.3E-02	4.1E-07	3.4E-07	4.1E-07
PCB-81	MJ631	-	-	-	3.0E-03	2.3E-03	7.9E-08	6.0E-08	7.9E-08
Aroclor-1254	MJ635	1.1E-01	1.1E-01	J	-	-	-	-	-
Aroclor-1260	MJ635	1.8E-01	1.8E-01	J	-	-	-	-	-
PCB-105	MJ635	-	-	-	1.2E-01	8.2E-02	1.4E-05	1.5E-05	1.5E-05
PCB-114	MJ635	-	-	-	4.5E-03	1.5E-03	5.0E-07	2.6E-07	5.0E-07
PCB-118	MJ635	-	-	-	2.7E-01	1.6E-01	2.9E-05	2.9E-05	2.9E-05
PCB-123	MJ635	-	-	-	3.0E-03	2.3E-03	3.3E-07	4.2E-07	4.2E-07
PCB-126	MJ635	-	-	-	7.5E-03	6.4E-03	8.3E-07	1.1E-06	1.1E-06
PCB-156	MJ635	-	-	-	6.3E-02	5.5E-02	6.9E-06	9.8E-06	9.8E-06
PCB-157	MJ635	-	-	-	1.2E-02	2.5E-02	1.4E-06	4.4E-06	4.4E-06
PCB-167	MJ635	-	-	-	2.1E-02	4.3E-02	2.3E-06	7.7E-06	7.7E-06
PCB-169	MJ635	-	-	-	3.7E-04	6.4E-04	4.0E-08	1.1E-07	1.1E-07
PCB-189	MJ635	-	-	-	3.0E-03	6.4E-03	3.3E-07	1.1E-06	1.1E-06
PCB-77	MJ635	-	-	-	1.5E-02	1.3E-02	1.7E-06	2.3E-06	2.3E-06
PCB-81	MJ635	-	-	-	3.0E-03	2.3E-03	3.3E-07	4.1E-07	4.1E-07
Aroclor-1254	MJ644	9.1E-02	4.6E-02	UJ	-	-	-	-	-
Aroclor-1260	MJ644	9.1E-02	4.6E-02	UJ	-	-	-	-	-
PCB-105	MJ644	-	-	-	1.2E-01	8.2E-02	5.6E-06	3.7E-06	5.6E-06
PCB-114	MJ644	-	-	-	4.5E-03	1.5E-03	2.1E-07	6.6E-08	2.1E-07
PCB-118	MJ644	-	-	-	2.7E-01	1.6E-01	1.2E-05	7.4E-06	1.2E-05
PCB-123	MJ644	-	-	-	3.0E-03	2.3E-03	1.4E-07	1.1E-07	1.4E-07
PCB-126	MJ644	-	-	-	7.5E-03	6.4E-03	3.4E-07	2.9E-07	3.4E-07
PCB-156	MJ644	-	-	-	6.3E-02	5.5E-02	2.9E-06	2.5E-06	2.9E-06
PCB-157	MJ644	-	-	-	1.2E-02	2.5E-02	5.6E-07	1.1E-06	1.1E-06
PCB-167	MJ644	-	-	-	2.1E-02	4.3E-02	9.4E-07	1.9E-06	1.9E-06
PCB-169	MJ644	-	-	-	3.7E-04	6.4E-04	1.7E-08	2.9E-08	2.9E-08
PCB-189	MJ644	-	-	-	3.0E-03	6.4E-03	1.4E-07	2.9E-07	2.9E-07
PCB-77	MJ644	-	-	-	1.5E-02	1.3E-02	7.0E-07	5.8E-07	7.0E-07
PCB-81	MJ644	-	-	-	3.0E-03	2.3E-03	1.4E-07	1.0E-07	1.4E-07

Aroclor to PCB Congener Extrapolation (0-4 feet bgs)
Sodium Reactor Experiment (SRE) Area

Chemical	EPA ID	Measured Concentrations (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF_{1254}	EF_{1260}	Estimated Concentrations Aroclor-1254 (mg/kg)	Estimated Concentrations Aroclor-1260 (mg/kg)	Estimated Concentrations PCB_{MAX} (mg/kg)
Aroclor-1254	MJ652	5.4E-02	2.7E-02	U	-	-	-	-	-
Aroclor-1260	MJ652	5.4E-02	2.7E-02	U	-	-	-	-	-
PCB-105	MJ652	-	-	-	1.2E-01	8.2E-02	3.3E-06	2.2E-06	3.3E-06
PCB-114	MJ652	-	-	-	4.5E-03	1.5E-03	1.2E-07	3.9E-08	1.2E-07
PCB-118	MJ652	-	-	-	2.7E-01	1.6E-01	7.2E-06	4.4E-06	7.2E-06
PCB-123	MJ652	-	-	-	3.0E-03	2.3E-03	8.1E-08	6.3E-08	8.1E-08
PCB-126	MJ652	-	-	-	7.5E-03	6.4E-03	2.0E-07	1.7E-07	2.0E-07
PCB-156	MJ652	-	-	-	6.3E-02	5.5E-02	1.7E-06	1.5E-06	1.7E-06
PCB-157	MJ652	-	-	-	1.2E-02	2.5E-02	3.3E-07	6.6E-07	6.6E-07
PCB-167	MJ652	-	-	-	2.1E-02	4.3E-02	5.6E-07	1.2E-06	1.2E-06
PCB-169	MJ652	-	-	-	3.7E-04	6.4E-04	9.9E-09	1.7E-08	1.7E-08
PCB-189	MJ652	-	-	-	3.0E-03	6.4E-03	8.1E-08	1.7E-07	1.7E-07
PCB-77	MJ652	-	-	-	1.5E-02	1.3E-02	4.2E-07	3.4E-07	4.2E-07
PCB-81	MJ652	-	-	-	3.0E-03	2.3E-03	8.1E-08	6.1E-08	8.1E-08
Aroclor-1254	MJ653	5.3E-02	2.7E-02	U	-	-	-	-	-
Aroclor-1260	MJ653	5.3E-02	2.7E-02	U	-	-	-	-	-
PCB-105	MJ653	-	-	-	1.2E-01	8.2E-02	3.3E-06	2.2E-06	3.3E-06
PCB-114	MJ653	-	-	-	4.5E-03	1.5E-03	1.2E-07	3.9E-08	1.2E-07
PCB-118	MJ653	-	-	-	2.7E-01	1.6E-01	7.1E-06	4.3E-06	7.1E-06
PCB-123	MJ653	-	-	-	3.0E-03	2.3E-03	7.9E-08	6.1E-08	7.9E-08
PCB-126	MJ653	-	-	-	7.5E-03	6.4E-03	2.0E-07	1.7E-07	2.0E-07
PCB-156	MJ653	-	-	-	6.3E-02	5.5E-02	1.7E-06	1.4E-06	1.7E-06
PCB-157	MJ653	-	-	-	1.2E-02	2.5E-02	3.3E-07	6.5E-07	6.5E-07
PCB-167	MJ653	-	-	-	2.1E-02	4.3E-02	5.5E-07	1.1E-06	1.1E-06
PCB-169	MJ653	-	-	-	3.7E-04	6.4E-04	9.7E-09	1.7E-08	1.7E-08
PCB-189	MJ653	-	-	-	3.0E-03	6.4E-03	7.9E-08	1.7E-07	1.7E-07
PCB-77	MJ653	-	-	-	1.5E-02	1.3E-02	4.1E-07	3.4E-07	4.1E-07
PCB-81	MJ653	-	-	-	3.0E-03	2.3E-03	7.9E-08	6.0E-08	7.9E-08
Aroclor-1254	MJ664	8.2E-02	4.1E-02	U	-	-	-	-	-
Aroclor-1260	MJ664	8.2E-02	4.1E-02	U	-	-	-	-	-
PCB-105	MJ664	-	-	-	1.2E-01	8.2E-02	5.1E-06	3.4E-06	5.1E-06
PCB-114	MJ664	-	-	-	4.5E-03	1.5E-03	1.9E-07	6.0E-08	1.9E-07
PCB-118	MJ664	-	-	-	2.7E-01	1.6E-01	1.1E-05	6.7E-06	1.1E-05
PCB-123	MJ664	-	-	-	3.0E-03	2.3E-03	1.2E-07	9.5E-08	1.2E-07
PCB-126	MJ664	-	-	-	7.5E-03	6.4E-03	3.1E-07	2.6E-07	3.1E-07
PCB-156	MJ664	-	-	-	6.3E-02	5.5E-02	2.6E-06	2.2E-06	2.6E-06
PCB-157	MJ664	-	-	-	1.2E-02	2.5E-02	5.1E-07	1.0E-06	1.0E-06
PCB-167	MJ664	-	-	-	2.1E-02	4.3E-02	8.5E-07	1.8E-06	1.8E-06
PCB-169	MJ664	-	-	-	3.7E-04	6.4E-04	1.5E-08	2.6E-08	2.6E-08
PCB-189	MJ664	-	-	-	3.0E-03	6.4E-03	1.2E-07	2.6E-07	2.6E-07
PCB-77	MJ664	-	-	-	1.5E-02	1.3E-02	6.3E-07	5.2E-07	6.3E-07
PCB-81	MJ664	-	-	-	3.0E-03	2.3E-03	1.2E-07	9.2E-08	1.2E-07

Aroclor to PCB Congener Extrapolation (0-4 feet bgs)
Sodium Reactor Experiment (SRE) Area

Chemical	EPA ID	Measured Concentrations (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF_{1254}	EF_{1260}	Estimated Concentrations Aroclor-1254 (mg/kg)	Estimated Concentrations Aroclor-1260 (mg/kg)	Estimated Concentrations PCB_{MAX} (mg/kg)
Aroclor-1254	MJ765	1.8E-01	9.0E-02	U	-	-	-	-	-
Aroclor-1260	MJ765	1.8E-01	9.0E-02	U	-	-	-	-	-
PCB-105	MJ765	-	-	-	1.2E-01	8.2E-02	1.1E-05	7.4E-06	1.1E-05
PCB-114	MJ765	-	-	-	4.5E-03	1.5E-03	4.1E-07	1.3E-07	4.1E-07
PCB-118	MJ765	-	-	-	2.7E-01	1.6E-01	2.4E-05	1.5E-05	2.4E-05
PCB-123	MJ765	-	-	-	3.0E-03	2.3E-03	2.7E-07	2.1E-07	2.7E-07
PCB-126	MJ765	-	-	-	7.5E-03	6.4E-03	6.8E-07	5.7E-07	6.8E-07
PCB-156	MJ765	-	-	-	6.3E-02	5.5E-02	5.7E-06	4.9E-06	5.7E-06
PCB-157	MJ765	-	-	-	1.2E-02	2.5E-02	1.1E-06	2.2E-06	2.2E-06
PCB-167	MJ765	-	-	-	2.1E-02	4.3E-02	1.9E-06	3.8E-06	3.8E-06
PCB-169	MJ765	-	-	-	3.7E-04	6.4E-04	3.3E-08	5.7E-08	5.7E-08
PCB-189	MJ765	-	-	-	3.0E-03	6.4E-03	2.7E-07	5.7E-07	5.7E-07
PCB-77	MJ765	-	-	-	1.5E-02	1.3E-02	1.4E-06	1.1E-06	1.4E-06
PCB-81	MJ765	-	-	-	3.0E-03	2.3E-03	2.7E-07	2.0E-07	2.7E-07
Aroclor-1254	MJ768	8.5E-02	4.3E-02	U	-	-	-	-	-
Aroclor-1260	MJ768	8.5E-02	4.3E-02	U	-	-	-	-	-
PCB-105	MJ768	-	-	-	1.2E-01	8.2E-02	5.3E-06	3.5E-06	5.3E-06
PCB-114	MJ768	-	-	-	4.5E-03	1.5E-03	1.9E-07	6.2E-08	1.9E-07
PCB-118	MJ768	-	-	-	2.7E-01	1.6E-01	1.1E-05	7.0E-06	1.1E-05
PCB-123	MJ768	-	-	-	3.0E-03	2.3E-03	1.3E-07	9.9E-08	1.3E-07
PCB-126	MJ768	-	-	-	7.5E-03	6.4E-03	3.2E-07	2.7E-07	3.2E-07
PCB-156	MJ768	-	-	-	6.3E-02	5.5E-02	2.7E-06	2.3E-06	2.7E-06
PCB-157	MJ768	-	-	-	1.2E-02	2.5E-02	5.3E-07	1.0E-06	1.0E-06
PCB-167	MJ768	-	-	-	2.1E-02	4.3E-02	8.8E-07	1.8E-06	1.8E-06
PCB-169	MJ768	-	-	-	3.7E-04	6.4E-04	1.6E-08	2.7E-08	2.7E-08
PCB-189	MJ768	-	-	-	3.0E-03	6.4E-03	1.3E-07	2.7E-07	2.7E-07
PCB-77	MJ768	-	-	-	1.5E-02	1.3E-02	6.6E-07	5.4E-07	6.6E-07
PCB-81	MJ768	-	-	-	3.0E-03	2.3E-03	1.3E-07	9.6E-08	1.3E-07
Aroclor-1254	MJ776	8.8E-02	4.4E-02	U	-	-	-	-	-
Aroclor-1260	MJ776	8.8E-02	4.4E-02	U	-	-	-	-	-
PCB-105	MJ776	-	-	-	1.2E-01	8.2E-02	5.4E-06	3.6E-06	5.4E-06
PCB-114	MJ776	-	-	-	4.5E-03	1.5E-03	2.0E-07	6.4E-08	2.0E-07
PCB-118	MJ776	-	-	-	2.7E-01	1.6E-01	1.2E-05	7.2E-06	1.2E-05
PCB-123	MJ776	-	-	-	3.0E-03	2.3E-03	1.3E-07	1.0E-07	1.3E-07
PCB-126	MJ776	-	-	-	7.5E-03	6.4E-03	3.3E-07	2.8E-07	3.3E-07
PCB-156	MJ776	-	-	-	6.3E-02	5.5E-02	2.8E-06	2.4E-06	2.8E-06
PCB-157	MJ776	-	-	-	1.2E-02	2.5E-02	5.4E-07	1.1E-06	1.1E-06
PCB-167	MJ776	-	-	-	2.1E-02	4.3E-02	9.1E-07	1.9E-06	1.9E-06
PCB-169	MJ776	-	-	-	3.7E-04	6.4E-04	1.6E-08	2.8E-08	2.8E-08
PCB-189	MJ776	-	-	-	3.0E-03	6.4E-03	1.3E-07	2.8E-07	2.8E-07
PCB-77	MJ776	-	-	-	1.5E-02	1.3E-02	6.8E-07	5.6E-07	6.8E-07
PCB-81	MJ776	-	-	-	3.0E-03	2.3E-03	1.3E-07	9.9E-08	1.3E-07

Aroclor to PCB Congener Extrapolation (0-4 feet bgs)
Sodium Reactor Experiment (SRE) Area

Chemical	EPA ID	Measured Concentrations (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF_{1254}	EF_{1260}	Estimated Concentrations Aroclor-1254 (mg/kg)	Estimated Concentrations Aroclor-1260 (mg/kg)	Estimated Concentrations PCB_{MAX} (mg/kg)
Aroclor-1254	MJ777	8.8E-02	4.4E-02	U	-	-	-	-	-
Aroclor-1260	MJ777	8.8E-02	4.4E-02	U	-	-	-	-	-
PCB-105	MJ777	-	-	-	1.2E-01	8.2E-02	5.4E-06	3.6E-06	5.4E-06
PCB-114	MJ777	-	-	-	4.5E-03	1.5E-03	2.0E-07	6.4E-08	2.0E-07
PCB-118	MJ777	-	-	-	2.7E-01	1.6E-01	1.2E-05	7.2E-06	1.2E-05
PCB-123	MJ777	-	-	-	3.0E-03	2.3E-03	1.3E-07	1.0E-07	1.3E-07
PCB-126	MJ777	-	-	-	7.5E-03	6.4E-03	3.3E-07	2.8E-07	3.3E-07
PCB-156	MJ777	-	-	-	6.3E-02	5.5E-02	2.8E-06	2.4E-06	2.8E-06
PCB-157	MJ777	-	-	-	1.2E-02	2.5E-02	5.4E-07	1.1E-06	1.1E-06
PCB-167	MJ777	-	-	-	2.1E-02	4.3E-02	9.1E-07	1.9E-06	1.9E-06
PCB-169	MJ777	-	-	-	3.7E-04	6.4E-04	1.6E-08	2.8E-08	2.8E-08
PCB-189	MJ777	-	-	-	3.0E-03	6.4E-03	1.3E-07	2.8E-07	2.8E-07
PCB-77	MJ777	-	-	-	1.5E-02	1.3E-02	6.8E-07	5.6E-07	6.8E-07
PCB-81	MJ777	-	-	-	3.0E-03	2.3E-03	1.3E-07	9.9E-08	1.3E-07
Aroclor-1254	RJ627	3.5E-02	1.8E-02	U	-	-	-	-	-
Aroclor-1260	RJ627	3.5E-02	1.8E-02	U	-	-	-	-	-
PCB-105	RJ627	-	-	-	1.2E-01	8.2E-02	2.2E-06	1.4E-06	2.2E-06
PCB-114	RJ627	-	-	-	4.5E-03	1.5E-03	7.9E-08	2.5E-08	7.9E-08
PCB-118	RJ627	-	-	-	2.7E-01	1.6E-01	4.7E-06	2.9E-06	4.7E-06
PCB-123	RJ627	-	-	-	3.0E-03	2.3E-03	5.2E-08	4.1E-08	5.2E-08
PCB-126	RJ627	-	-	-	7.5E-03	6.4E-03	1.3E-07	1.1E-07	1.3E-07
PCB-156	RJ627	-	-	-	6.3E-02	5.5E-02	1.1E-06	9.5E-07	1.1E-06
PCB-157	RJ627	-	-	-	1.2E-02	2.5E-02	2.2E-07	4.3E-07	4.3E-07
PCB-167	RJ627	-	-	-	2.1E-02	4.3E-02	3.6E-07	7.5E-07	7.5E-07
PCB-169	RJ627	-	-	-	3.7E-04	6.4E-04	6.4E-09	1.1E-08	1.1E-08
PCB-189	RJ627	-	-	-	3.0E-03	6.4E-03	5.2E-08	1.1E-07	1.1E-07
PCB-77	RJ627	-	-	-	1.5E-02	1.3E-02	2.7E-07	2.2E-07	2.7E-07
PCB-81	RJ627	-	-	-	3.0E-03	2.3E-03	5.2E-08	3.9E-08	5.2E-08
Aroclor-1254	RJ786	6.0E-02	6.0E-02	J	-	-	-	-	-
Aroclor-1260	RJ786	3.6E-02	1.8E-02	UJ	-	-	-	-	-
PCB-105	RJ786	-	-	-	1.2E-01	8.2E-02	7.4E-06	1.5E-06	7.4E-06
PCB-114	RJ786	-	-	-	4.5E-03	1.5E-03	2.7E-07	2.6E-08	2.7E-07
PCB-118	RJ786	-	-	-	2.7E-01	1.6E-01	1.6E-05	2.9E-06	1.6E-05
PCB-123	RJ786	-	-	-	3.0E-03	2.3E-03	1.8E-07	4.2E-08	1.8E-07
PCB-126	RJ786	-	-	-	7.5E-03	6.4E-03	4.5E-07	1.1E-07	4.5E-07
PCB-156	RJ786	-	-	-	6.3E-02	5.5E-02	3.8E-06	9.8E-07	3.8E-06
PCB-157	RJ786	-	-	-	1.2E-02	2.5E-02	7.4E-07	4.4E-07	7.4E-07
PCB-167	RJ786	-	-	-	2.1E-02	4.3E-02	1.2E-06	7.7E-07	1.2E-06
PCB-169	RJ786	-	-	-	3.7E-04	6.4E-04	2.2E-08	1.1E-08	2.2E-08
PCB-189	RJ786	-	-	-	3.0E-03	6.4E-03	1.8E-07	1.1E-07	1.8E-07
PCB-77	RJ786	-	-	-	1.5E-02	1.3E-02	9.3E-07	2.3E-07	9.3E-07
PCB-81	RJ786	-	-	-	3.0E-03	2.3E-03	1.8E-07	4.1E-08	1.8E-07

Notes:
PCBs - polychlorinated biphenyls
EF- Extrapolation Factor (ng congener/kg soil)/(µg Aroclor/kg soil)
"-" not applicable
mg/kg - milligrams per kilogram
µg/kg - micrograms per kilogram
ng/kg - nanograms per kilogram
bgs- below ground surface
PCB_{MAX} = the maximum of the extrapolated Aroclor 1254 and 1260 concentrations

TPH to Petroleum Constituent Extrapolation for Soil/Sediment (0-2 feet bgs) [a]
Sodium Reactor Experiment (SRE) Area

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
C08-C11 (Gasoline Range)	MJ630	5.40E+00	2.7E+00	U		-	-
C11-C14 (Kerosene Range)	MJ630	5.40E+00	2.7E+00	U		-	-
C14-C20 (Diesel Range)	MJ630	5.40E+00	2.7E+00	U		-	-
C20-C30 (Lubricant Oil Range)	MJ630	5.40E+00	2.7E+00	U		-	-
C11-C30	MJ630		8.1E+00			-	-
Benzene	MJ630	-	-	-	1.2E-04	-	-
Ethylbenzene	MJ630	-	-	-	1.2E-04	-	-
Toluene	MJ630	-	-	-	1.2E-04	-	-
m,p-Xylene	MJ630	-	-	-	3.6E-04	-	-
o-Xylene	MJ630	-	-	-	8.0E-05	-	-
Xylene (total)	MJ630	-	-	-	4.4E-04	-	-
2-Methylnaphthalene	MJ630	-	-	-	2.8E-02	-	-
Acenaphthene	MJ630	-	-	-	5.7E-04	4.6E-03	4.6E-03
Acenaphthylene	MJ630	-	-	-	7.0E-05	5.7E-04	5.7E-04
Anthracene	MJ630	-	-	-	3.7E-04	3.0E-03	3.0E-03
Benzo(a)anthracene	MJ630	-	-	-	2.7E-05	2.2E-04	2.2E-04
Benzo(a)pyrene	MJ630	-	-	-	2.7E-05	2.2E-04	2.2E-04
Benzo(b)fluoranthene	MJ630	-	-	-	4.3E-05	3.5E-04	3.5E-04
Benzo(e)pyrene	MJ630	-	-	-	2.1E-04	1.7E-03	1.7E-03
Benzo(g,h,i)perylene	MJ630	-	-	-	2.2E-04	1.8E-03	1.8E-03
Benzo(k)fluoranthene	MJ630	-	-	-	2.1E-05	1.7E-04	1.7E-04
Chrysene	MJ630	-	-	-	5.9E-05	4.8E-04	4.8E-04
Dibenz(a,h)anthracene	MJ630	-	-	-	1.1E-05	9.0E-05	9.0E-05
Fluoranthene	MJ630	-	-	-	7.5E-05	6.1E-04	6.1E-04
Fluorene	MJ630	-	-	-	5.7E-04	4.6E-03	4.6E-03
Indeno(1,2,3-cd)pyrene	MJ630	-	-	-	2.4E-05	1.9E-04	1.9E-04
Naphthalene	MJ630	-	-	-	6.9E-03	-	-
Perylene	MJ630	-	-	-	1.2E-04	9.6E-04	9.6E-04
Phenanthrene	MJ630	-	-	-	1.5E-03	1.2E-02	1.2E-02
Pyrene	MJ630	-	-	-	1.4E-04	1.1E-03	1.1E-03
C08-C11 (Gasoline Range)	MJ631	5.30E+00	2.7E+00	U		-	-
C11-C14 (Kerosene Range)	MJ631	5.30E+00	2.7E+00	U		-	-
C14-C20 (Diesel Range)	MJ631	5.30E+00	2.7E+00	U		-	-
C20-C30 (Lubricant Oil Range)	MJ631	1.10E+01	1.1E+01			-	-
C11-C30	MJ631		1.6E+01			-	-
Benzene	MJ631	-	-	-	1.2E-04	-	-
Ethylbenzene	MJ631	-	-	-	1.2E-04	-	-
Toluene	MJ631	-	-	-	1.2E-04	-	-
m,p-Xylene	MJ631	-	-	-	3.6E-04	-	-
o-Xylene	MJ631	-	-	-	8.0E-05	-	-
Xylene (total)	MJ631	-	-	-	4.4E-04	-	-
2-Methylnaphthalene	MJ631	-	-	-	2.8E-02	-	-
Acenaphthene	MJ631	-	-	-	5.7E-04	9.3E-03	9.3E-03
Acenaphthylene	MJ631	-	-	-	7.0E-05	1.1E-03	1.1E-03
Anthracene	MJ631	-	-	-	3.7E-04	6.1E-03	6.1E-03
Benzo(a)anthracene	MJ631	-	-	-	2.7E-05	4.4E-04	4.4E-04
Benzo(a)pyrene	MJ631	-	-	-	2.7E-05	4.4E-04	4.4E-04
Benzo(b)fluoranthene	MJ631	-	-	-	4.3E-05	7.1E-04	7.1E-04
Benzo(e)pyrene	MJ631	-	-	-	2.1E-04	3.4E-03	3.4E-03
Benzo(g,h,i)perylene	MJ631	-	-	-	2.2E-04	3.6E-03	3.6E-03
Benzo(k)fluoranthene	MJ631	-	-	-	2.1E-05	3.3E-04	3.3E-04
Chrysene	MJ631	-	-	-	5.9E-05	9.6E-04	9.6E-04
Dibenz(a,h)anthracene	MJ631	-	-	-	1.1E-05	1.8E-04	1.8E-04
Fluoranthene	MJ631	-	-	-	7.5E-05	1.2E-03	1.2E-03
Fluorene	MJ631	-	-	-	5.7E-04	9.3E-03	9.3E-03

TPH to Petroleum Constituent Extrapolation for Soil/Sediment (0-2 feet bgs) [a]
Sodium Reactor Experiment (SRE) Area

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Indeno(1,2,3-cd)pyrene	MJ631	-	-	-	2.4E-05	3.9E-04	3.9E-04
Naphthalene	MJ631	-	-	-	6.9E-03	-	-
Perylene	MJ631	-	-	-	1.2E-04	1.9E-03	1.9E-03
Phenanthrene	MJ631	-	-	-	1.5E-03	2.5E-02	2.5E-02
Pyrene	MJ631	-	-	-	1.4E-04	2.2E-03	2.2E-03
C08-C11 (Gasoline Range)	MJ661	1.20E+01	6.0E+00	U		-	-
C11-C14 (Kerosene Range)	MJ661	1.20E+01	6.0E+00	U		-	-
C14-C20 (Diesel Range)	MJ661	1.20E+01	6.0E+00	U		-	-
C20-C30 (Lubricant Oil Range)	MJ661	1.20E+01	6.0E+00	U		-	-
C11-C30	MJ661		1.8E+01			-	-
Benzene	MJ661	-	-	-	1.2E-04	-	-
Ethylbenzene	MJ661	-	-	-	1.2E-04	-	-
Toluene	MJ661	-	-	-	1.2E-04	-	-
m,p-Xylene	MJ661	-	-	-	3.6E-04	-	-
o-Xylene	MJ661	-	-	-	8.0E-05	-	-
Xylene (total)	MJ661	-	-	-	4.4E-04	-	-
2-Methylnaphthalene	MJ661	-	-	-	2.8E-02	-	-
Acenaphthene	MJ661	-	-	-	5.7E-04	1.0E-02	1.0E-02
Acenaphthylene	MJ661	-	-	-	7.0E-05	1.3E-03	1.3E-03
Anthracene	MJ661	-	-	-	3.7E-04	6.7E-03	6.7E-03
Benzo(a)anthracene	MJ661	-	-	-	2.7E-05	4.9E-04	4.9E-04
Benzo(a)pyrene	MJ661	-	-	-	2.7E-05	4.9E-04	4.9E-04
Benzo(b)fluoranthene	MJ661	-	-	-	4.3E-05	7.8E-04	7.8E-04
Benzo(e)pyrene	MJ661	-	-	-	2.1E-04	3.7E-03	3.7E-03
Benzo(g,h,i)perylene	MJ661	-	-	-	2.2E-04	4.0E-03	4.0E-03
Benzo(k)fluoranthene	MJ661	-	-	-	2.1E-05	3.7E-04	3.7E-04
Chrysene	MJ661	-	-	-	5.9E-05	1.1E-03	1.1E-03
Dibenz(a,h)anthracene	MJ661	-	-	-	1.1E-05	2.0E-04	2.0E-04
Fluoranthene	MJ661	-	-	-	7.5E-05	1.3E-03	1.3E-03
Fluorene	MJ661	-	-	-	5.7E-04	1.0E-02	1.0E-02
Indeno(1,2,3-cd)pyrene	MJ661	-	-	-	2.4E-05	4.3E-04	4.3E-04
Naphthalene	MJ661	-	-	-	6.9E-03	-	-
Perylene	MJ661	-	-	-	1.2E-04	2.1E-03	2.1E-03
Phenanthrene	MJ661	-	-	-	1.5E-03	2.8E-02	2.8E-02
Pyrene	MJ661	-	-	-	1.4E-04	2.5E-03	2.5E-03
C08-C11 (Gasoline Range)	MJ662	1.10E+01	5.5E+00	U		-	-
C11-C14 (Kerosene Range)	MJ662	1.10E+01	5.5E+00	U		-	-
C14-C20 (Diesel Range)	MJ662	1.10E+01	5.5E+00	U		-	-
C20-C30 (Lubricant Oil Range)	MJ662	1.10E+01	5.5E+00	U		-	-
C11-C30	MJ662		1.7E+01			-	-
Benzene	MJ662	-	-	-	1.2E-04	-	-
Ethylbenzene	MJ662	-	-	-	1.2E-04	-	-
Toluene	MJ662	-	-	-	1.2E-04	-	-
m,p-Xylene	MJ662	-	-	-	3.6E-04	-	-
o-Xylene	MJ662	-	-	-	8.0E-05	-	-
Xylene (total)	MJ662	-	-	-	4.4E-04	-	-
2-Methylnaphthalene	MJ662	-	-	-	2.8E-02	-	-
Acenaphthene	MJ662	-	-	-	5.7E-04	9.5E-03	9.5E-03
Acenaphthylene	MJ662	-	-	-	7.0E-05	1.2E-03	1.2E-03
Anthracene	MJ662	-	-	-	3.7E-04	6.2E-03	6.2E-03
Benzo(a)anthracene	MJ662	-	-	-	2.7E-05	4.4E-04	4.4E-04
Benzo(a)pyrene	MJ662	-	-	-	2.7E-05	4.5E-04	4.5E-04
Benzo(b)fluoranthene	MJ662	-	-	-	4.3E-05	7.1E-04	7.1E-04
Benzo(e)pyrene	MJ662	-	-	-	2.1E-04	3.4E-03	3.4E-03
Benzo(g,h,i)perylene	MJ662	-	-	-	2.2E-04	3.6E-03	3.6E-03

TPH to Petroleum Constituent Extrapolation for Soil/Sediment (0-2 feet bgs) [a]
Sodium Reactor Experiment (SRE) Area

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Benzo(k)fluoranthene	MJ662	-	-	-	2.1E-05	3.4E-04	3.4E-04
Chrysene	MJ662	-	-	-	5.9E-05	9.7E-04	9.7E-04
Dibenz(a,h)anthracene	MJ662	-	-	-	1.1E-05	1.8E-04	1.8E-04
Fluoranthene	MJ662	-	-	-	7.5E-05	1.2E-03	1.2E-03
Fluorene	MJ662	-	-	-	5.7E-04	9.4E-03	9.4E-03
Indeno(1,2,3-cd)pyrene	MJ662	-	-	-	2.4E-05	4.0E-04	4.0E-04
Naphthalene	MJ662	-	-	-	6.9E-03	-	-
Perylene	MJ662	-	-	-	1.2E-04	1.9E-03	1.9E-03
Phenanthrene	MJ662	-	-	-	1.5E-03	2.5E-02	2.5E-02
Pyrene	MJ662	-	-	-	1.4E-04	2.2E-03	2.2E-03
C08-C11 (Gasoline Range)	MJ663	1.10E+01	5.5E+00	U		-	-
C11-C14 (Kerosene Range)	MJ663	1.10E+01	5.5E+00	U		-	-
C14-C20 (Diesel Range)	MJ663	1.10E+01	5.5E+00	U		-	-
C20-C30 (Lubricant Oil Range)	MJ663	5.00E+00	5.0E+00	J		-	-
C11-C30	MJ663		1.6E+01			-	-
Benzene	MJ663	-	-	-	1.2E-04	-	-
Ethylbenzene	MJ663	-	-	-	1.2E-04	-	-
Toluene	MJ663	-	-	-	1.2E-04	-	-
m,p-Xylene	MJ663	-	-	-	3.6E-04	-	-
o-Xylene	MJ663	-	-	-	8.0E-05	-	-
Xylene (total)	MJ663	-	-	-	4.4E-04	-	-
2-Methylnaphthalene	MJ663	-	-	-	2.8E-02	-	-
Acenaphthene	MJ663	-	-	-	5.7E-04	9.2E-03	9.2E-03
Acenaphthylene	MJ663	-	-	-	7.0E-05	1.1E-03	1.1E-03
Anthracene	MJ663	-	-	-	3.7E-04	6.0E-03	6.0E-03
Benzo(a)anthracene	MJ663	-	-	-	2.7E-05	4.3E-04	4.3E-04
Benzo(a)pyrene	MJ663	-	-	-	2.7E-05	4.4E-04	4.4E-04
Benzo(b)fluoranthene	MJ663	-	-	-	4.3E-05	6.9E-04	6.9E-04
Benzo(e)pyrene	MJ663	-	-	-	2.1E-04	3.3E-03	3.3E-03
Benzo(g,h,i)perylene	MJ663	-	-	-	2.2E-04	3.5E-03	3.5E-03
Benzo(k)fluoranthene	MJ663	-	-	-	2.1E-05	3.3E-04	3.3E-04
Chrysene	MJ663	-	-	-	5.9E-05	9.4E-04	9.4E-04
Dibenz(a,h)anthracene	MJ663	-	-	-	1.1E-05	1.8E-04	1.8E-04
Fluoranthene	MJ663	-	-	-	7.5E-05	1.2E-03	1.2E-03
Fluorene	MJ663	-	-	-	5.7E-04	9.1E-03	9.1E-03
Indeno(1,2,3-cd)pyrene	MJ663	-	-	-	2.4E-05	3.8E-04	3.8E-04
Naphthalene	MJ663	-	-	-	6.9E-03	-	-
Perylene	MJ663	-	-	-	1.2E-04	1.9E-03	1.9E-03
Phenanthrene	MJ663	-	-	-	1.5E-03	2.5E-02	2.5E-02
Pyrene	MJ663	-	-	-	1.4E-04	2.2E-03	2.2E-03
C08-C11 (Gasoline Range)	MJ664	1.10E+01	5.5E+00	U		-	-
C11-C14 (Kerosene Range)	MJ664	1.10E+01	5.5E+00	U		-	-
C14-C20 (Diesel Range)	MJ664	1.10E+01	5.5E+00	U		-	-
C20-C30 (Lubricant Oil Range)	MJ664	6.30E+00	6.3E+00	J		-	-
C11-C30	MJ664		1.7E+01			-	-
Benzene	MJ664	-	-	-	1.2E-04	-	-
Ethylbenzene	MJ664	-	-	-	1.2E-04	-	-
Toluene	MJ664	-	-	-	1.2E-04	-	-
m,p-Xylene	MJ664	-	-	-	3.6E-04	-	-
o-Xylene	MJ664	-	-	-	8.0E-05	-	-
Xylene (total)	MJ664	-	-	-	4.4E-04	-	-
2-Methylnaphthalene	MJ664	-	-	-	2.8E-02	-	-
Acenaphthene	MJ664	-	-	-	5.7E-04	9.9E-03	9.9E-03
Acenaphthylene	MJ664	-	-	-	7.0E-05	1.2E-03	1.2E-03
Anthracene	MJ664	-	-	-	3.7E-04	6.5E-03	6.5E-03

TPH to Petroleum Constituent Extrapolation for Soil/Sediment (0-2 feet bgs) [a]
Sodium Reactor Experiment (SRE) Area

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Benzo(a)anthracene	MJ664	-	-	-	2.7E-05	4.7E-04	4.7E-04
Benzo(a)pyrene	MJ664	-	-	-	2.7E-05	4.7E-04	4.7E-04
Benzo(b)fluoranthene	MJ664	-	-	-	4.3E-05	7.5E-04	7.5E-04
Benzo(e)pyrene	MJ664	-	-	-	2.1E-04	3.6E-03	3.6E-03
Benzo(g,h,i)perylene	MJ664	-	-	-	2.2E-04	3.8E-03	3.8E-03
Benzo(k)fluoranthene	MJ664	-	-	-	2.1E-05	3.5E-04	3.5E-04
Chrysene	MJ664	-	-	-	5.9E-05	1.0E-03	1.0E-03
Dibenz(a,h)anthracene	MJ664	-	-	-	1.1E-05	1.9E-04	1.9E-04
Fluoranthene	MJ664	-	-	-	7.5E-05	1.3E-03	1.3E-03
Fluorene	MJ664	-	-	-	5.7E-04	9.8E-03	9.8E-03
Indeno(1,2,3-cd)pyrene	MJ664	-	-	-	2.4E-05	4.2E-04	4.2E-04
Naphthalene	MJ664	-	-	-	6.9E-03	-	-
Perylene	MJ664	-	-	-	1.2E-04	2.0E-03	2.0E-03
Phenanthrene	MJ664	-	-	-	1.5E-03	2.7E-02	2.7E-02
Pyrene	MJ664	-	-	-	1.4E-04	2.4E-03	2.4E-03
C08-C11 (Gasoline Range)	RD977	1.10E+01	5.5E+00	UJ		-	-
C11-C14 (Kerosene Range)	RD977	1.10E+01	5.5E+00	UJ		-	-
C14-C20 (Diesel Range)	RD977	1.10E+01	5.5E+00	UJ		-	-
C20-C30 (Lubricant Oil Range)	RD977	1.10E+01	5.5E+00	UJ		-	-
C11-C30	RD977		1.7E+01			-	-
Benzene	RD977	5.00E-03	2.5E-03	U	1.2E-04	-	2.5E-03
Ethylbenzene	RD977	5.00E-03	2.5E-03	U	1.2E-04	-	2.5E-03
Toluene	RD977	5.00E-03	2.5E-03	U	1.2E-04	-	2.5E-03
m,p-Xylene	RD977	5.00E-03	2.5E-03	U	3.6E-04	-	2.5E-03
o-Xylene	RD977	5.00E-03	2.5E-03	U	8.0E-05	-	2.5E-03
Xylene (total)	RD977	-	-	-	4.4E-04	-	-
2-Methylnaphthalene	RD977	-	-	-	2.8E-02	-	-
Acenaphthene	RD977	-	-	-	5.7E-04	9.5E-03	9.5E-03
Acenaphthylene	RD977	-	-	-	7.0E-05	1.2E-03	1.2E-03
Anthracene	RD977	-	-	-	3.7E-04	6.2E-03	6.2E-03
Benzo(a)anthracene	RD977	-	-	-	2.7E-05	4.4E-04	4.4E-04
Benzo(a)pyrene	RD977	-	-	-	2.7E-05	4.5E-04	4.5E-04
Benzo(b)fluoranthene	RD977	-	-	-	4.3E-05	7.1E-04	7.1E-04
Benzo(e)pyrene	RD977	-	-	-	2.1E-04	3.4E-03	3.4E-03
Benzo(g,h,i)perylene	RD977	-	-	-	2.2E-04	3.6E-03	3.6E-03
Benzo(k)fluoranthene	RD977	-	-	-	2.1E-05	3.4E-04	3.4E-04
Chrysene	RD977	-	-	-	5.9E-05	9.7E-04	9.7E-04
Dibenz(a,h)anthracene	RD977	-	-	-	1.1E-05	1.8E-04	1.8E-04
Fluoranthene	RD977	-	-	-	7.5E-05	1.2E-03	1.2E-03
Fluorene	RD977	-	-	-	5.7E-04	9.4E-03	9.4E-03
Indeno(1,2,3-cd)pyrene	RD977	-	-	-	2.4E-05	4.0E-04	4.0E-04
Naphthalene	RD977	-	-	-	6.9E-03	-	-
Perylene	RD977	-	-	-	1.2E-04	1.9E-03	1.9E-03
Phenanthrene	RD977	-	-	-	1.5E-03	2.5E-02	2.5E-02
Pyrene	RD977	-	-	-	1.4E-04	2.2E-03	2.2E-03
C08-C11 (Gasoline Range)	RD979	1.10E+01	5.5E+00	UJ		-	-
C11-C14 (Kerosene Range)	RD979	1.10E+01	5.5E+00	UJ		-	-
C14-C20 (Diesel Range)	RD979	1.10E+01	5.5E+00	UJ		-	-
C20-C30 (Lubricant Oil Range)	RD979	1.10E+01	5.5E+00	UJ		-	-
C11-C30	RD979		1.7E+01			-	-
Benzene	RD979	5.00E-03	2.5E-03	U	1.2E-04	-	2.5E-03
Ethylbenzene	RD979	5.00E-03	2.5E-03	U	1.2E-04	-	2.5E-03
Toluene	RD979	5.00E-03	2.5E-03	U	1.2E-04	-	2.5E-03
m,p-Xylene	RD979	5.00E-03	2.5E-03	U	3.6E-04	-	2.5E-03
o-Xylene	RD979	5.00E-03	2.5E-03	U	8.0E-05	-	2.5E-03

TPH to Petroleum Constituent Extrapolation for Soil/Sediment (0-2 feet bgs) [a]
Sodium Reactor Experiment (SRE) Area

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Xylene (total)	RD979	-	-	-	4.4E-04	-	-
2-Methylnaphthalene	RD979	-	-	-	2.8E-02	-	-
Acenaphthene	RD979	-	-	-	5.7E-04	9.5E-03	9.5E-03
Acenaphthylene	RD979	-	-	-	7.0E-05	1.2E-03	1.2E-03
Anthracene	RD979	-	-	-	3.7E-04	6.2E-03	6.2E-03
Benzo(a)anthracene	RD979	-	-	-	2.7E-05	4.4E-04	4.4E-04
Benzo(a)pyrene	RD979	-	-	-	2.7E-05	4.5E-04	4.5E-04
Benzo(b)fluoranthene	RD979	-	-	-	4.3E-05	7.1E-04	7.1E-04
Benzo(e)pyrene	RD979	-	-	-	2.1E-04	3.4E-03	3.4E-03
Benzo(g,h,i)perylene	RD979	-	-	-	2.2E-04	3.6E-03	3.6E-03
Benzo(k)fluoranthene	RD979	-	-	-	2.1E-05	3.4E-04	3.4E-04
Chrysene	RD979	-	-	-	5.9E-05	9.7E-04	9.7E-04
Dibenz(a,h)anthracene	RD979	-	-	-	1.1E-05	1.8E-04	1.8E-04
Fluoranthene	RD979	-	-	-	7.5E-05	1.2E-03	1.2E-03
Fluorene	RD979	-	-	-	5.7E-04	9.4E-03	9.4E-03
Indeno(1,2,3-cd)pyrene	RD979	-	-	-	2.4E-05	4.0E-04	4.0E-04
Naphthalene	RD979	-	-	-	6.9E-03	-	-
Perylene	RD979	-	-	-	1.2E-04	1.9E-03	1.9E-03
Phenanthrene	RD979	-	-	-	1.5E-03	2.5E-02	2.5E-02
Pyrene	RD979	-	-	-	1.4E-04	2.2E-03	2.2E-03
C08-C11 (Gasoline Range)	RJ202	4.00E+00	2.0E+00	UJ		-	-
C11-C14 (Kerosene Range)	RJ202	4.00E+00	2.0E+00	UJ		-	-
C14-C20 (Diesel Range)	RJ202	4.00E+00	2.0E+00	UJ		-	-
C20-C30 (Lubricant Oil Range)	RJ202	6.25E+00	6.3E+00	J		-	-
C11-C30	RJ202		1.0E+01			-	-
Benzene	RJ202	-	-	-	1.2E-04	-	-
Ethylbenzene	RJ202	-	-	-	1.2E-04	-	-
Toluene	RJ202	-	-	-	1.2E-04	-	-
m,p-Xylene	RJ202	-	-	-	3.6E-04	-	-
o-Xylene	RJ202	-	-	-	8.0E-05	-	-
Xylene (total)	RJ202	-	-	-	4.4E-04	-	-
2-Methylnaphthalene	RJ202	-	-	-	2.8E-02	-	-
Acenaphthene	RJ202	-	-	-	5.7E-04	5.9E-03	5.9E-03
Acenaphthylene	RJ202	-	-	-	7.0E-05	7.2E-04	7.2E-04
Anthracene	RJ202	-	-	-	3.7E-04	3.8E-03	3.8E-03
Benzo(a)anthracene	RJ202	-	-	-	2.7E-05	2.8E-04	2.8E-04
Benzo(a)pyrene	RJ202	-	-	-	2.7E-05	2.8E-04	2.8E-04
Benzo(b)fluoranthene	RJ202	-	-	-	4.3E-05	4.4E-04	4.4E-04
Benzo(e)pyrene	RJ202	-	-	-	2.1E-04	2.1E-03	2.1E-03
Benzo(g,h,i)perylene	RJ202	-	-	-	2.2E-04	2.3E-03	2.3E-03
Benzo(k)fluoranthene	RJ202	-	-	-	2.1E-05	2.1E-04	2.1E-04
Chrysene	RJ202	-	-	-	5.9E-05	6.0E-04	6.0E-04
Dibenz(a,h)anthracene	RJ202	-	-	-	1.1E-05	1.1E-04	1.1E-04
Fluoranthene	RJ202	-	-	-	7.5E-05	7.7E-04	7.7E-04
Fluorene	RJ202	-	-	-	5.7E-04	5.8E-03	5.8E-03
Indeno(1,2,3-cd)pyrene	RJ202	-	-	-	2.4E-05	2.5E-04	2.5E-04
Naphthalene	RJ202	-	-	-	6.9E-03	-	-
Perylene	RJ202	-	-	-	1.2E-04	1.2E-03	1.2E-03
Phenanthrene	RJ202	-	-	-	1.5E-03	1.6E-02	1.6E-02
Pyrene	RJ202	-	-	-	1.4E-04	1.4E-03	1.4E-03
C08-C11 (Gasoline Range)	RJ513	3.00E+00	1.5E+00	UJ		-	-
C11-C14 (Kerosene Range)	RJ513	3.00E+00	1.5E+00	UJ		-	-
C14-C20 (Diesel Range)	RJ513	3.00E+00	1.5E+00	U		-	-
C20-C30 (Lubricant Oil Range)	RJ513	6.60E+01	6.6E+01			-	-
C11-C30	RJ513		6.9E+01			-	-

TPH to Petroleum Constituent Extrapolation for Soil/Sediment (0-2 feet bgs) [a]
Sodium Reactor Experiment (SRE) Area

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Benzene	RJ513	-	-	-	1.2E-04	-	-
Ethylbenzene	RJ513	-	-	-	1.2E-04	-	-
Toluene	RJ513	-	-	-	1.2E-04	-	-
m,p-Xylene	RJ513	-	-	-	3.6E-04	-	-
o-Xylene	RJ513	-	-	-	8.0E-05	-	-
Xylene (total)	RJ513	-	-	-	4.4E-04	-	-
2-Methylnaphthalene	RJ513	7.00E-03	3.5E-03	UJ	2.8E-02	-	3.5E-03
Acenaphthene	RJ513	7.00E-03	3.5E-03	UJ	5.7E-04	4.0E-02	3.5E-03
Acenaphthylene	RJ513	7.00E-03	3.5E-03	UJ	7.0E-05	4.8E-03	3.5E-03
Anthracene	RJ513	7.00E-03	3.5E-03	UJ	3.7E-04	2.6E-02	3.5E-03
Benzo(a)anthracene	RJ513	7.00E-03	3.5E-03	UJ	2.7E-05	1.9E-03	1.9E-03
Benzo(a)pyrene	RJ513	-	-	-	2.7E-05	1.9E-03	1.9E-03
Benzo(b)fluoranthene	RJ513	-	-	-	4.3E-05	3.0E-03	3.0E-03
Benzo(e)pyrene	RJ513	-	-	-	2.1E-04	1.4E-02	1.4E-02
Benzo(g,h,i)perylene	RJ513	-	-	-	2.2E-04	1.5E-02	1.5E-02
Benzo(k)fluoranthene	RJ513	-	-	-	2.1E-05	1.4E-03	1.4E-03
Chrysene	RJ513	7.00E-03	3.5E-03	U	5.9E-05	4.0E-03	3.5E-03
Dibenz(a,h)anthracene	RJ513	-	-	-	1.1E-05	7.6E-04	7.6E-04
Fluoranthene	RJ513	7.00E-03	3.5E-03	UJ	7.5E-05	5.2E-03	3.5E-03
Fluorene	RJ513	7.00E-03	3.5E-03	UJ	5.7E-04	3.9E-02	3.5E-03
Indeno(1,2,3-cd)pyrene	RJ513	-	-	-	2.4E-05	1.7E-03	1.7E-03
Naphthalene	RJ513	7.00E-03	3.5E-03	UJ	6.9E-03	-	3.5E-03
Perylene	RJ513	-	-	-	1.2E-04	8.1E-03	8.1E-03
Phenanthrene	RJ513	5.40E-02	5.4E-02		1.5E-03	1.1E-01	5.4E-02
Pyrene	RJ513	7.00E-03	3.5E-03	UJ	1.4E-04	9.4E-03	3.5E-03
C08-C11 (Gasoline Range)	RJ516	9.90E+01	5.0E+01	U		-	-
C11-C14 (Kerosene Range)	RJ516	9.90E+01	5.0E+01	U		-	-
C14-C20 (Diesel Range)	RJ516	9.90E+01	5.0E+01	U		-	-
C20-C30 (Lubricant Oil Range)	RJ516	4.20E+02	4.2E+02			-	-
C11-C30	RJ516		5.2E+02			-	-
Benzene	RJ516	5.00E-03	2.5E-03	U	1.2E-04	-	2.5E-03
Ethylbenzene	RJ516	5.00E-03	2.5E-03	U	1.2E-04	-	2.5E-03
Toluene	RJ516	5.00E-03	2.5E-03	U	1.2E-04	-	2.5E-03
m,p-Xylene	RJ516	1.00E-02	5.0E-03	U	3.6E-04	-	5.0E-03
o-Xylene	RJ516	5.00E-03	2.5E-03	U	8.0E-05	-	2.5E-03
Xylene (total)	RJ516	-	-	-	4.4E-04	-	-
2-Methylnaphthalene	RJ516	3.00E-03	1.5E-03	U	2.8E-02	-	1.5E-03
Acenaphthene	RJ516	3.00E-03	1.5E-03	U	5.7E-04	3.0E-01	1.5E-03
Acenaphthylene	RJ516	3.00E-03	1.5E-03	U	7.0E-05	3.6E-02	1.5E-03
Anthracene	RJ516	3.00E-03	1.5E-03	U	3.7E-04	1.9E-01	1.5E-03
Benzo(a)anthracene	RJ516	2.00E-03	2.0E-03	J	2.7E-05	1.4E-02	2.0E-03
Benzo(a)pyrene	RJ516	4.00E-03	4.0E-03		2.7E-05	1.4E-02	4.0E-03
Benzo(b)fluoranthene	RJ516	5.00E-03	5.0E-03		4.3E-05	2.2E-02	5.0E-03
Benzo(e)pyrene	RJ516	-	-	-	2.1E-04	1.1E-01	1.1E-01
Benzo(g,h,i)perylene	RJ516	3.00E-03	1.5E-03	U	2.2E-04	1.1E-01	1.5E-03
Benzo(k)fluoranthene	RJ516	4.00E-03	4.0E-03		2.1E-05	1.1E-02	4.0E-03
Chrysene	RJ516	5.00E-03	5.0E-03		5.9E-05	3.0E-02	5.0E-03
Dibenz(a,h)anthracene	RJ516	3.00E-03	1.5E-03	U	1.1E-05	5.7E-03	1.5E-03
Fluoranthene	RJ516	4.00E-03	4.0E-03		7.5E-05	3.9E-02	4.0E-03
Fluorene	RJ516	3.00E-03	1.5E-03	U	5.7E-04	2.9E-01	1.5E-03
Indeno(1,2,3-cd)pyrene	RJ516	5.00E-03	5.0E-03		2.4E-05	1.2E-02	5.0E-03
Naphthalene	RJ516	3.00E-03	1.5E-03	U	6.9E-03	-	1.5E-03
Perylene	RJ516	-	-	-	1.2E-04	6.1E-02	6.1E-02
Phenanthrene	RJ516	2.00E-03	2.0E-03	J	1.5E-03	8.0E-01	2.0E-03
Pyrene	RJ516	5.00E-03	5.0E-03		1.4E-04	7.1E-02	5.0E-03

TPH to Petroleum Constituent Extrapolation for Soil/Sediment (0-2 feet bgs) [a]
Sodium Reactor Experiment (SRE) Area

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
C08-C11 (Gasoline Range)	RJ517	3.00E+00	1.5E+00	U		-	-
C11-C14 (Kerosene Range)	RJ517	3.00E+00	1.5E+00	U		-	-
C14-C20 (Diesel Range)	RJ517	3.00E+00	1.5E+00	U		-	-
C20-C30 (Lubricant Oil Range)	RJ517	1.20E+01	1.2E+01			-	-
C11-C30	RJ517		1.5E+01			-	-
Benzene	RJ517	5.00E-03	2.5E-03	U	1.2E-04	-	2.5E-03
Ethylbenzene	RJ517	5.00E-03	2.5E-03	U	1.2E-04	-	2.5E-03
Toluene	RJ517	3.00E-03	1.5E-03	U	1.2E-04	-	1.5E-03
m,p-Xylene	RJ517	1.00E-02	5.0E-03	U	3.6E-04	-	5.0E-03
o-Xylene	RJ517	5.00E-03	2.5E-03	U	8.0E-05	-	2.5E-03
Xylene (total)	RJ517	1.50E-02	7.5E-03	U	4.4E-04	-	7.5E-03
2-Methylnaphthalene	RJ517	3.00E-03	1.5E-03	U	2.8E-02	-	1.5E-03
Acenaphthene	RJ517	3.00E-03	1.5E-03	U	5.7E-04	8.6E-03	1.5E-03
Acenaphthylene	RJ517	3.00E-03	1.5E-03	U	7.0E-05	1.1E-03	1.1E-03
Anthracene	RJ517	3.00E-03	1.5E-03	U	3.7E-04	5.6E-03	1.5E-03
Benzo(a)anthracene	RJ517	3.00E-03	1.5E-03	U	2.7E-05	4.0E-04	4.0E-04
Benzo(a)pyrene	RJ517	3.00E-03	1.5E-03	U	2.7E-05	4.1E-04	4.1E-04
Benzo(b)fluoranthene	RJ517	3.00E-03	3.0E-03	J	4.3E-05	6.5E-04	3.0E-03
Benzo(e)pyrene	RJ517	-	-	-	2.1E-04	3.1E-03	3.1E-03
Benzo(g,h,i)perylene	RJ517	3.00E-03	1.5E-03	U	2.2E-04	3.3E-03	1.5E-03
Benzo(k)fluoranthene	RJ517	3.00E-03	1.5E-03	U	2.1E-05	3.1E-04	3.1E-04
Chrysene	RJ517	5.00E-03	5.0E-03		5.9E-05	8.8E-04	5.0E-03
Dibenz(a,h)anthracene	RJ517	3.00E-03	1.5E-03	U	1.1E-05	1.7E-04	1.7E-04
Fluoranthene	RJ517	4.00E-03	4.0E-03		7.5E-05	1.1E-03	4.0E-03
Fluorene	RJ517	3.00E-03	1.5E-03	U	5.7E-04	8.5E-03	1.5E-03
Indeno(1,2,3-cd)pyrene	RJ517	3.00E-03	1.5E-03	U	2.4E-05	3.6E-04	3.6E-04
Naphthalene	RJ517	3.00E-03	1.5E-03	U	6.9E-03	-	1.5E-03
Perylene	RJ517	-	-	-	1.2E-04	1.8E-03	1.8E-03
Phenanthrene	RJ517	3.00E-03	1.5E-03	U	1.5E-03	2.3E-02	1.5E-03
Pyrene	RJ517	3.00E-03	3.0E-03	J	1.4E-04	2.0E-03	3.0E-03
C08-C11 (Gasoline Range)	RJ627	4.00E+00	2.0E+00	U		-	-
C11-C14 (Kerosene Range)	RJ627	4.00E+00	2.0E+00	U		-	-
C14-C20 (Diesel Range)	RJ627	4.00E+00	2.0E+00	U		-	-
C20-C30 (Lubricant Oil Range)	RJ627	4.00E+00	2.0E+00	U		-	-
C11-C30	RJ627		6.0E+00			-	-
Benzene	RJ627	-	-	-	1.2E-04	-	-
Ethylbenzene	RJ627	-	-	-	1.2E-04	-	-
Toluene	RJ627	-	-	-	1.2E-04	-	-
m,p-Xylene	RJ627	-	-	-	3.6E-04	-	-
o-Xylene	RJ627	-	-	-	8.0E-05	-	-
Xylene (total)	RJ627	-	-	-	4.4E-04	-	-
2-Methylnaphthalene	RJ627	-	-	-	2.8E-02	-	-
Acenaphthene	RJ627	-	-	-	5.7E-04	3.4E-03	3.4E-03
Acenaphthylene	RJ627	-	-	-	7.0E-05	4.2E-04	4.2E-04
Anthracene	RJ627	-	-	-	3.7E-04	2.2E-03	2.2E-03
Benzo(a)anthracene	RJ627	-	-	-	2.7E-05	1.6E-04	1.6E-04
Benzo(a)pyrene	RJ627	-	-	-	2.7E-05	1.6E-04	1.6E-04
Benzo(b)fluoranthene	RJ627	-	-	-	4.3E-05	2.6E-04	2.6E-04
Benzo(e)pyrene	RJ627	-	-	-	2.1E-04	1.2E-03	1.2E-03
Benzo(g,h,i)perylene	RJ627	-	-	-	2.2E-04	1.3E-03	1.3E-03
Benzo(k)fluoranthene	RJ627	-	-	-	2.1E-05	1.2E-04	1.2E-04
Chrysene	RJ627	-	-	-	5.9E-05	3.5E-04	3.5E-04
Dibenz(a,h)anthracene	RJ627	-	-	-	1.1E-05	6.6E-05	6.6E-05
Fluoranthene	RJ627	-	-	-	7.5E-05	4.5E-04	4.5E-04
Fluorene	RJ627	-	-	-	5.7E-04	3.4E-03	3.4E-03

TPH to Petroleum Constituent Extrapolation for Soil/Sediment (0-2 feet bgs) [a]
Sodium Reactor Experiment (SRE) Area

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Indeno(1,2,3-cd)pyrene	RJ627	-	-	-	2.4E-05	1.4E-04	1.4E-04
Naphthalene	RJ627	-	-	-	6.9E-03	-	-
Perylene	RJ627	-	-	-	1.2E-04	7.1E-04	7.1E-04
Phenanthrene	RJ627	-	-	-	1.5E-03	9.2E-03	9.2E-03
Pyrene	RJ627	-	-	-	1.4E-04	8.2E-04	8.2E-04
C08-C11 (Gasoline Range)	RJ786	1.80E+01	9.0E+00	U		-	-
C11-C14 (Kerosene Range)	RJ786	4.00E+01	4.0E+01			-	-
C14-C20 (Diesel Range)	RJ786	1.80E+01	9.0E+00	U		-	-
C20-C30 (Lubricant Oil Range)	RJ786	4.70E+02	4.7E+02			-	-
C11-C30	RJ786		5.2E+02			-	-
Benzene	RJ786	-	-	-	1.2E-04	-	-
Ethylbenzene	RJ786	-	-	-	1.2E-04	-	-
Toluene	RJ786	-	-	-	1.2E-04	-	-
m,p-Xylene	RJ786	-	-	-	3.6E-04	-	-
o-Xylene	RJ786	-	-	-	8.0E-05	-	-
Xylene (total)	RJ786	-	-	-	4.4E-04	-	-
2-Methylnaphthalene	RJ786	-	-	-	2.8E-02	-	-
Acenaphthene	RJ786	-	-	-	5.7E-04	3.0E-01	3.0E-01
Acenaphthylene	RJ786	-	-	-	7.0E-05	3.6E-02	3.6E-02
Anthracene	RJ786	-	-	-	3.7E-04	1.9E-01	1.9E-01
Benzo(a)anthracene	RJ786	-	-	-	2.7E-05	1.4E-02	1.4E-02
Benzo(a)pyrene	RJ786	-	-	-	2.7E-05	1.4E-02	1.4E-02
Benzo(b)fluoranthene	RJ786	-	-	-	4.3E-05	2.2E-02	2.2E-02
Benzo(e)pyrene	RJ786	-	-	-	2.1E-04	1.1E-01	1.1E-01
Benzo(g,h,i)perylene	RJ786	-	-	-	2.2E-04	1.1E-01	1.1E-01
Benzo(k)fluoranthene	RJ786	-	-	-	2.1E-05	1.1E-02	1.1E-02
Chrysene	RJ786	-	-	-	5.9E-05	3.0E-02	3.0E-02
Dibenz(a,h)anthracene	RJ786	-	-	-	1.1E-05	5.7E-03	5.7E-03
Fluoranthene	RJ786	-	-	-	7.5E-05	3.9E-02	3.9E-02
Fluorene	RJ786	-	-	-	5.7E-04	2.9E-01	2.9E-01
Indeno(1,2,3-cd)pyrene	RJ786	-	-	-	2.4E-05	1.2E-02	1.2E-02
Naphthalene	RJ786	-	-	-	6.9E-03	-	-
Perylene	RJ786	-	-	-	1.2E-04	6.1E-02	6.1E-02
Phenanthrene	RJ786	-	-	-	1.5E-03	8.0E-01	8.0E-01
Pyrene	RJ786	-	-	-	1.4E-04	7.1E-02	7.1E-02

Notes:
a. Petroleum constituent concentrations estimated and selected as described in Section 2.8 of the SRAM.
"-" not applicable
mg/kg - milligrams per kilogram

Aroclor to PCB Congener Extrapolation (0-2 feet bgs)
Sodium Reactor Experiment (SRE) Area

Chemical	EPA ID	Measured Concentrations (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF_{1254}	EF_{1260}	Estimated Concentrations Aroclor 1254 (mg/kg)	Estimated Concentrations Aroclor 1260 (mg/kg)	Estimated Concentrations PCB_{MAX} (mg/kg)
Aroclor-1254	MJ248	1.2E-01	1.2E-01	J	-	-	-	-	-
Aroclor-1260	MJ248	3.7E-02	1.9E-02	UJ	-	-	-	-	-
PCB-105	MJ248	-	-	-	1.2E-01	8.2E-02	1.5E-05	1.5E-06	1.5E-05
PCB-114	MJ248	-	-	-	4.5E-03	1.5E-03	5.4E-07	2.7E-08	5.4E-07
PCB-118	MJ248	-	-	-	2.7E-01	1.6E-01	3.2E-05	3.0E-06	3.2E-05
PCB-123	MJ248	-	-	-	3.0E-03	2.3E-03	3.6E-07	4.3E-08	3.6E-07
PCB-126	MJ248	-	-	-	7.5E-03	6.4E-03	9.0E-07	1.2E-07	9.0E-07
PCB-156	MJ248	-	-	-	6.3E-02	5.5E-02	7.5E-06	1.0E-06	7.5E-06
PCB-157	MJ248	-	-	-	1.2E-02	2.5E-02	1.5E-06	4.5E-07	1.5E-06
PCB-167	MJ248	-	-	-	2.1E-02	4.3E-02	2.5E-06	7.9E-07	2.5E-06
PCB-169	MJ248	-	-	-	3.7E-04	6.4E-04	4.4E-08	1.2E-08	4.4E-08
PCB-189	MJ248	-	-	-	3.0E-03	6.4E-03	3.6E-07	1.2E-07	3.6E-07
PCB-77	MJ248	-	-	-	1.5E-02	1.3E-02	1.9E-06	2.4E-07	1.9E-06
PCB-81	MJ248	-	-	-	3.0E-03	2.3E-03	3.6E-07	4.2E-08	3.6E-07
Aroclor-1254	MJ623	1.1E+00	5.5E-01	U	-	-	-	-	-
Aroclor-1260	MJ623	6.9E+00	6.9E+00		-	-	-	-	-
PCB-105	MJ623	-	-	-	1.2E-01	8.2E-02	6.8E-05	5.6E-04	5.6E-04
PCB-114	MJ623	-	-	-	4.5E-03	1.5E-03	2.5E-06	1.0E-05	1.0E-05
PCB-118	MJ623	-	-	-	2.7E-01	1.6E-01	1.5E-04	1.1E-03	1.1E-03
PCB-123	MJ623	-	-	-	3.0E-03	2.3E-03	1.6E-06	1.6E-05	1.6E-05
PCB-126	MJ623	-	-	-	7.5E-03	6.4E-03	4.1E-06	4.4E-05	4.4E-05
PCB-156	MJ623	-	-	-	6.3E-02	5.5E-02	3.5E-05	3.8E-04	3.8E-04
PCB-157	MJ623	-	-	-	1.2E-02	2.5E-02	6.8E-06	1.7E-04	1.7E-04
PCB-167	MJ623	-	-	-	2.1E-02	4.3E-02	1.1E-05	2.9E-04	2.9E-04
PCB-169	MJ623	-	-	-	3.7E-04	6.4E-04	2.0E-07	4.4E-06	4.4E-06
PCB-189	MJ623	-	-	-	3.0E-03	6.4E-03	1.6E-06	4.4E-05	4.4E-05
PCB-77	MJ623	-	-	-	1.5E-02	1.3E-02	8.5E-06	8.8E-05	8.8E-05
PCB-81	MJ623	-	-	-	3.0E-03	2.3E-03	1.6E-06	1.6E-05	1.6E-05
Aroclor-1254	MJ624	1.1E+00	5.5E-01	U	-	-	-	-	-
Aroclor-1260	MJ624	6.4E+00	6.4E+00		-	-	-	-	-
PCB-105	MJ624	-	-	-	1.2E-01	8.2E-02	6.8E-05	5.2E-04	5.2E-04
PCB-114	MJ624	-	-	-	4.5E-03	1.5E-03	2.5E-06	9.3E-06	9.3E-06
PCB-118	MJ624	-	-	-	2.7E-01	1.6E-01	1.5E-04	1.0E-03	1.0E-03
PCB-123	MJ624	-	-	-	3.0E-03	2.3E-03	1.6E-06	1.5E-05	1.5E-05
PCB-126	MJ624	-	-	-	7.5E-03	6.4E-03	4.1E-06	4.1E-05	4.1E-05
PCB-156	MJ624	-	-	-	6.3E-02	5.5E-02	3.5E-05	3.5E-04	3.5E-04
PCB-157	MJ624	-	-	-	1.2E-02	2.5E-02	6.8E-06	1.6E-04	1.6E-04
PCB-167	MJ624	-	-	-	2.1E-02	4.3E-02	1.1E-05	2.7E-04	2.7E-04
PCB-169	MJ624	-	-	-	3.7E-04	6.4E-04	2.0E-07	4.1E-06	4.1E-06
PCB-189	MJ624	-	-	-	3.0E-03	6.4E-03	1.6E-06	4.1E-05	4.1E-05
PCB-77	MJ624	-	-	-	1.5E-02	1.3E-02	8.5E-06	8.1E-05	8.1E-05
PCB-81	MJ624	-	-	-	3.0E-03	2.3E-03	1.6E-06	1.4E-05	1.4E-05

Aroclor to PCB Congener Extrapolation (0-2 feet bgs)
Sodium Reactor Experiment (SRE) Area

Chemical	EPA ID	Measured Concentrations (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF_{1254}	EF_{1260}	Estimated Concentrations Aroclor 1254 (mg/kg)	Estimated Concentrations Aroclor 1260 (mg/kg)	Estimated Concentrations PCB_{MAX} (mg/kg)
Aroclor-1254	MJ625	5.4E-01	2.7E-01	U	-	-	-	-	-
Aroclor-1260	MJ625	4.8E+00	4.8E+00		-	-	-	-	-
PCB-105	MJ625	-	-	-	1.2E-01	8.2E-02	3.3E-05	3.9E-04	3.9E-04
PCB-114	MJ625	-	-	-	4.5E-03	1.5E-03	1.2E-06	7.0E-06	7.0E-06
PCB-118	MJ625	-	-	-	2.7E-01	1.6E-01	7.2E-05	7.9E-04	7.9E-04
PCB-123	MJ625	-	-	-	3.0E-03	2.3E-03	8.1E-07	1.1E-05	1.1E-05
PCB-126	MJ625	-	-	-	7.5E-03	6.4E-03	2.0E-06	3.1E-05	3.1E-05
PCB-156	MJ625	-	-	-	6.3E-02	5.5E-02	1.7E-05	2.6E-04	2.6E-04
PCB-157	MJ625	-	-	-	1.2E-02	2.5E-02	3.3E-06	1.2E-04	1.2E-04
PCB-167	MJ625	-	-	-	2.1E-02	4.3E-02	5.6E-06	2.1E-04	2.1E-04
PCB-169	MJ625	-	-	-	3.7E-04	6.4E-04	9.9E-08	3.1E-06	3.1E-06
PCB-189	MJ625	-	-	-	3.0E-03	6.4E-03	8.1E-07	3.1E-05	3.1E-05
PCB-77	MJ625	-	-	-	1.5E-02	1.3E-02	4.2E-06	6.1E-05	6.1E-05
PCB-81	MJ625	-	-	-	3.0E-03	2.3E-03	8.1E-07	1.1E-05	1.1E-05
Aroclor-1254	MJ626	1.1E+00	5.5E-01	U	-	-	-	-	-
Aroclor-1260	MJ626	7.8E+00	7.8E+00		-	-	-	-	-
PCB-105	MJ626	-	-	-	1.2E-01	8.2E-02	6.8E-05	6.4E-04	6.4E-04
PCB-114	MJ626	-	-	-	4.5E-03	1.5E-03	2.5E-06	1.1E-05	1.1E-05
PCB-118	MJ626	-	-	-	2.7E-01	1.6E-01	1.5E-04	1.3E-03	1.3E-03
PCB-123	MJ626	-	-	-	3.0E-03	2.3E-03	1.6E-06	1.8E-05	1.8E-05
PCB-126	MJ626	-	-	-	7.5E-03	6.4E-03	4.1E-06	5.0E-05	5.0E-05
PCB-156	MJ626	-	-	-	6.3E-02	5.5E-02	3.5E-05	4.3E-04	4.3E-04
PCB-157	MJ626	-	-	-	1.2E-02	2.5E-02	6.8E-06	1.9E-04	1.9E-04
PCB-167	MJ626	-	-	-	2.1E-02	4.3E-02	1.1E-05	3.3E-04	3.3E-04
PCB-169	MJ626	-	-	-	3.7E-04	6.4E-04	2.0E-07	5.0E-06	5.0E-06
PCB-189	MJ626	-	-	-	3.0E-03	6.4E-03	1.6E-06	5.0E-05	5.0E-05
PCB-77	MJ626	-	-	-	1.5E-02	1.3E-02	8.5E-06	9.9E-05	9.9E-05
PCB-81	MJ626	-	-	-	3.0E-03	2.3E-03	1.6E-06	1.8E-05	1.8E-05
Aroclor-1254	MJ628	4.3E-01	4.3E-01		-	-	-	-	-
Aroclor-1260	MJ628	5.3E-02	2.7E-02	U	-	-	-	-	-
PCB-105	MJ628	-	-	-	1.2E-01	8.2E-02	5.3E-05	2.2E-06	5.3E-05
PCB-114	MJ628	-	-	-	4.5E-03	1.5E-03	2.0E-06	3.9E-08	2.0E-06
PCB-118	MJ628	-	-	-	2.7E-01	1.6E-01	1.2E-04	4.3E-06	1.2E-04
PCB-123	MJ628	-	-	-	3.0E-03	2.3E-03	1.3E-06	6.1E-08	1.3E-06
PCB-126	MJ628	-	-	-	7.5E-03	6.4E-03	3.2E-06	1.7E-07	3.2E-06
PCB-156	MJ628	-	-	-	6.3E-02	5.5E-02	2.7E-05	1.4E-06	2.7E-05
PCB-157	MJ628	-	-	-	1.2E-02	2.5E-02	5.3E-06	6.5E-07	5.3E-06
PCB-167	MJ628	-	-	-	2.1E-02	4.3E-02	8.9E-06	1.1E-06	8.9E-06
PCB-169	MJ628	-	-	-	3.7E-04	6.4E-04	1.6E-07	1.7E-08	1.6E-07
PCB-189	MJ628	-	-	-	3.0E-03	6.4E-03	1.3E-06	1.7E-07	1.3E-06
PCB-77	MJ628	-	-	-	1.5E-02	1.3E-02	6.6E-06	3.4E-07	6.6E-06
PCB-81	MJ628	-	-	-	3.0E-03	2.3E-03	1.3E-06	6.0E-08	1.3E-06

Aroclor to PCB Congener Extrapolation (0-2 feet bgs)
Sodium Reactor Experiment (SRE) Area

Chemical	EPA ID	Measured Concentrations (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF_{1254}	EF_{1260}	Estimated Concentrations Aroclor 1254 (mg/kg)	Estimated Concentrations Aroclor 1260 (mg/kg)	Estimated Concentrations PCB_{MAX} (mg/kg)
Aroclor-1254	MJ629	1.6E-01	1.6E-01		-	-	-	-	-
Aroclor-1260	MJ629	8.2E-02	4.1E-02	U	-	-	-	-	-
PCB-105	MJ629	-	-	-	1.2E-01	8.2E-02	2.0E-05	3.4E-06	2.0E-05
PCB-114	MJ629	-	-	-	4.5E-03	1.5E-03	7.3E-07	6.0E-08	7.3E-07
PCB-118	MJ629	-	-	-	2.7E-01	1.6E-01	4.3E-05	6.7E-06	4.3E-05
PCB-123	MJ629	-	-	-	3.0E-03	2.3E-03	4.8E-07	9.5E-08	4.8E-07
PCB-126	MJ629	-	-	-	7.5E-03	6.4E-03	1.2E-06	2.6E-07	1.2E-06
PCB-156	MJ629	-	-	-	6.3E-02	5.5E-02	1.0E-05	2.2E-06	1.0E-05
PCB-157	MJ629	-	-	-	1.2E-02	2.5E-02	2.0E-06	1.0E-06	2.0E-06
PCB-167	MJ629	-	-	-	2.1E-02	4.3E-02	3.3E-06	1.8E-06	3.3E-06
PCB-169	MJ629	-	-	-	3.7E-04	6.4E-04	5.9E-08	2.6E-08	5.9E-08
PCB-189	MJ629	-	-	-	3.0E-03	6.4E-03	4.8E-07	2.6E-07	4.8E-07
PCB-77	MJ629	-	-	-	1.5E-02	1.3E-02	2.5E-06	5.2E-07	2.5E-06
PCB-81	MJ629	-	-	-	3.0E-03	2.3E-03	4.8E-07	9.2E-08	4.8E-07
Aroclor-1254	MJ630	5.4E-02	2.7E-02	U	-	-	-	-	-
Aroclor-1260	MJ630	5.4E-02	2.7E-02	U	-	-	-	-	-
PCB-105	MJ630	-	-	-	1.2E-01	8.2E-02	3.3E-06	2.2E-06	3.3E-06
PCB-114	MJ630	-	-	-	4.5E-03	1.5E-03	1.2E-07	3.9E-08	1.2E-07
PCB-118	MJ630	-	-	-	2.7E-01	1.6E-01	7.2E-06	4.4E-06	7.2E-06
PCB-123	MJ630	-	-	-	3.0E-03	2.3E-03	8.1E-08	6.3E-08	8.1E-08
PCB-126	MJ630	-	-	-	7.5E-03	6.4E-03	2.0E-07	1.7E-07	2.0E-07
PCB-156	MJ630	-	-	-	6.3E-02	5.5E-02	1.7E-06	1.5E-06	1.7E-06
PCB-157	MJ630	-	-	-	1.2E-02	2.5E-02	3.3E-07	6.6E-07	6.6E-07
PCB-167	MJ630	-	-	-	2.1E-02	4.3E-02	5.6E-07	1.2E-06	1.2E-06
PCB-169	MJ630	-	-	-	3.7E-04	6.4E-04	9.9E-09	1.7E-08	1.7E-08
PCB-189	MJ630	-	-	-	3.0E-03	6.4E-03	8.1E-08	1.7E-07	1.7E-07
PCB-77	MJ630	-	-	-	1.5E-02	1.3E-02	4.2E-07	3.4E-07	4.2E-07
PCB-81	MJ630	-	-	-	3.0E-03	2.3E-03	8.1E-08	6.1E-08	8.1E-08
Aroclor-1254	MJ631	5.3E-02	2.7E-02	U	-	-	-	-	-
Aroclor-1260	MJ631	5.3E-02	2.7E-02	U	-	-	-	-	-
PCB-105	MJ631	-	-	-	1.2E-01	8.2E-02	3.3E-06	2.2E-06	3.3E-06
PCB-114	MJ631	-	-	-	4.5E-03	1.5E-03	1.2E-07	3.9E-08	1.2E-07
PCB-118	MJ631	-	-	-	2.7E-01	1.6E-01	7.1E-06	4.3E-06	7.1E-06
PCB-123	MJ631	-	-	-	3.0E-03	2.3E-03	7.9E-08	6.1E-08	7.9E-08
PCB-126	MJ631	-	-	-	7.5E-03	6.4E-03	2.0E-07	1.7E-07	2.0E-07
PCB-156	MJ631	-	-	-	6.3E-02	5.5E-02	1.7E-06	1.4E-06	1.7E-06
PCB-157	MJ631	-	-	-	1.2E-02	2.5E-02	3.3E-07	6.5E-07	6.5E-07
PCB-167	MJ631	-	-	-	2.1E-02	4.3E-02	5.5E-07	1.1E-06	1.1E-06
PCB-169	MJ631	-	-	-	3.7E-04	6.4E-04	9.7E-09	1.7E-08	1.7E-08
PCB-189	MJ631	-	-	-	3.0E-03	6.4E-03	7.9E-08	1.7E-07	1.7E-07
PCB-77	MJ631	-	-	-	1.5E-02	1.3E-02	4.1E-07	3.4E-07	4.1E-07
PCB-81	MJ631	-	-	-	3.0E-03	2.3E-03	7.9E-08	6.0E-08	7.9E-08

Aroclor to PCB Congener Extrapolation (0-2 feet bgs)
Sodium Reactor Experiment (SRE) Area

Chemical	EPA ID	Measured Concentrations (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF_{1254}	EF_{1260}	Estimated Concentrations Aroclor 1254 (mg/kg)	Estimated Concentrations Aroclor 1260 (mg/kg)	Estimated Concentrations PCB_{MAX} (mg/kg)
Aroclor-1254	MJ635	1.1E-01	1.1E-01	J	-	-	-	-	-
Aroclor-1260	MJ635	1.8E-01	1.8E-01	J	-	-	-	-	-
PCB-105	MJ635	-	-	-	1.2E-01	8.2E-02	1.4E-05	1.5E-05	1.5E-05
PCB-114	MJ635	-	-	-	4.5E-03	1.5E-03	5.0E-07	2.6E-07	5.0E-07
PCB-118	MJ635	-	-	-	2.7E-01	1.6E-01	2.9E-05	2.9E-05	2.9E-05
PCB-123	MJ635	-	-	-	3.0E-03	2.3E-03	3.3E-07	4.2E-07	4.2E-07
PCB-126	MJ635	-	-	-	7.5E-03	6.4E-03	8.3E-07	1.1E-06	1.1E-06
PCB-156	MJ635	-	-	-	6.3E-02	5.5E-02	6.9E-06	9.8E-06	9.8E-06
PCB-157	MJ635	-	-	-	1.2E-02	2.5E-02	1.4E-06	4.4E-06	4.4E-06
PCB-167	MJ635	-	-	-	2.1E-02	4.3E-02	2.3E-06	7.7E-06	7.7E-06
PCB-169	MJ635	-	-	-	3.7E-04	6.4E-04	4.0E-08	1.1E-07	1.1E-07
PCB-189	MJ635	-	-	-	3.0E-03	6.4E-03	3.3E-07	1.1E-06	1.1E-06
PCB-77	MJ635	-	-	-	1.5E-02	1.3E-02	1.7E-06	2.3E-06	2.3E-06
PCB-81	MJ635	-	-	-	3.0E-03	2.3E-03	3.3E-07	4.1E-07	4.1E-07
Aroclor-1254	MJ644	9.1E-02	4.6E-02	UJ	-	-	-	-	-
Aroclor-1260	MJ644	9.1E-02	4.6E-02	UJ	-	-	-	-	-
PCB-105	MJ644	-	-	-	1.2E-01	8.2E-02	5.6E-06	3.7E-06	5.6E-06
PCB-114	MJ644	-	-	-	4.5E-03	1.5E-03	2.1E-07	6.6E-08	2.1E-07
PCB-118	MJ644	-	-	-	2.7E-01	1.6E-01	1.2E-05	7.4E-06	1.2E-05
PCB-123	MJ644	-	-	-	3.0E-03	2.3E-03	1.4E-07	1.1E-07	1.4E-07
PCB-126	MJ644	-	-	-	7.5E-03	6.4E-03	3.4E-07	2.9E-07	3.4E-07
PCB-156	MJ644	-	-	-	6.3E-02	5.5E-02	2.9E-06	2.5E-06	2.9E-06
PCB-157	MJ644	-	-	-	1.2E-02	2.5E-02	5.6E-07	1.1E-06	1.1E-06
PCB-167	MJ644	-	-	-	2.1E-02	4.3E-02	9.4E-07	1.9E-06	1.9E-06
PCB-169	MJ644	-	-	-	3.7E-04	6.4E-04	1.7E-08	2.9E-08	2.9E-08
PCB-189	MJ644	-	-	-	3.0E-03	6.4E-03	1.4E-07	2.9E-07	2.9E-07
PCB-77	MJ644	-	-	-	1.5E-02	1.3E-02	7.0E-07	5.8E-07	7.0E-07
PCB-81	MJ644	-	-	-	3.0E-03	2.3E-03	1.4E-07	1.0E-07	1.4E-07
Aroclor-1254	MJ652	5.4E-02	2.7E-02	U	-	-	-	-	-
Aroclor-1260	MJ652	5.4E-02	2.7E-02	U	-	-	-	-	-
PCB-105	MJ652	-	-	-	1.2E-01	8.2E-02	3.3E-06	2.2E-06	3.3E-06
PCB-114	MJ652	-	-	-	4.5E-03	1.5E-03	1.2E-07	3.9E-08	1.2E-07
PCB-118	MJ652	-	-	-	2.7E-01	1.6E-01	7.2E-06	4.4E-06	7.2E-06
PCB-123	MJ652	-	-	-	3.0E-03	2.3E-03	8.1E-08	6.3E-08	8.1E-08
PCB-126	MJ652	-	-	-	7.5E-03	6.4E-03	2.0E-07	1.7E-07	2.0E-07
PCB-156	MJ652	-	-	-	6.3E-02	5.5E-02	1.7E-06	1.5E-06	1.7E-06
PCB-157	MJ652	-	-	-	1.2E-02	2.5E-02	3.3E-07	6.6E-07	6.6E-07
PCB-167	MJ652	-	-	-	2.1E-02	4.3E-02	5.6E-07	1.2E-06	1.2E-06
PCB-169	MJ652	-	-	-	3.7E-04	6.4E-04	9.9E-09	1.7E-08	1.7E-08
PCB-189	MJ652	-	-	-	3.0E-03	6.4E-03	8.1E-08	1.7E-07	1.7E-07
PCB-77	MJ652	-	-	-	1.5E-02	1.3E-02	4.2E-07	3.4E-07	4.2E-07
PCB-81	MJ652	-	-	-	3.0E-03	2.3E-03	8.1E-08	6.1E-08	8.1E-08

Aroclor to PCB Congener Extrapolation (0-2 feet bgs)
Sodium Reactor Experiment (SRE) Area

Chemical	EPA ID	Measured Concentrations (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF_{1254}	EF_{1260}	Estimated Concentrations Aroclor 1254 (mg/kg)	Estimated Concentrations Aroclor 1260 (mg/kg)	Estimated Concentrations PCB_{MAX} (mg/kg)
Aroclor-1254	MJ653	5.3E-02	2.7E-02	U	-	-	-	-	-
Aroclor-1260	MJ653	5.3E-02	2.7E-02	U	-	-	-	-	-
PCB-105	MJ653	-	-	-	1.2E-01	8.2E-02	3.3E-06	2.2E-06	3.3E-06
PCB-114	MJ653	-	-	-	4.5E-03	1.5E-03	1.2E-07	3.9E-08	1.2E-07
PCB-118	MJ653	-	-	-	2.7E-01	1.6E-01	7.1E-06	4.3E-06	7.1E-06
PCB-123	MJ653	-	-	-	3.0E-03	2.3E-03	7.9E-08	6.1E-08	7.9E-08
PCB-126	MJ653	-	-	-	7.5E-03	6.4E-03	2.0E-07	1.7E-07	2.0E-07
PCB-156	MJ653	-	-	-	6.3E-02	5.5E-02	1.7E-06	1.4E-06	1.7E-06
PCB-157	MJ653	-	-	-	1.2E-02	2.5E-02	3.3E-07	6.5E-07	6.5E-07
PCB-167	MJ653	-	-	-	2.1E-02	4.3E-02	5.5E-07	1.1E-06	1.1E-06
PCB-169	MJ653	-	-	-	3.7E-04	6.4E-04	9.7E-09	1.7E-08	1.7E-08
PCB-189	MJ653	-	-	-	3.0E-03	6.4E-03	7.9E-08	1.7E-07	1.7E-07
PCB-77	MJ653	-	-	-	1.5E-02	1.3E-02	4.1E-07	3.4E-07	4.1E-07
PCB-81	MJ653	-	-	-	3.0E-03	2.3E-03	7.9E-08	6.0E-08	7.9E-08
Aroclor-1254	MJ664	8.2E-02	4.1E-02	U	-	-	-	-	-
Aroclor-1260	MJ664	8.2E-02	4.1E-02	U	-	-	-	-	-
PCB-105	MJ664	-	-	-	1.2E-01	8.2E-02	5.1E-06	3.4E-06	5.1E-06
PCB-114	MJ664	-	-	-	4.5E-03	1.5E-03	1.9E-07	6.0E-08	1.9E-07
PCB-118	MJ664	-	-	-	2.7E-01	1.6E-01	1.1E-05	6.7E-06	1.1E-05
PCB-123	MJ664	-	-	-	3.0E-03	2.3E-03	1.2E-07	9.5E-08	1.2E-07
PCB-126	MJ664	-	-	-	7.5E-03	6.4E-03	3.1E-07	2.6E-07	3.1E-07
PCB-156	MJ664	-	-	-	6.3E-02	5.5E-02	2.6E-06	2.2E-06	2.6E-06
PCB-157	MJ664	-	-	-	1.2E-02	2.5E-02	5.1E-07	1.0E-06	1.0E-06
PCB-167	MJ664	-	-	-	2.1E-02	4.3E-02	8.5E-07	1.8E-06	1.8E-06
PCB-169	MJ664	-	-	-	3.7E-04	6.4E-04	1.5E-08	2.6E-08	2.6E-08
PCB-189	MJ664	-	-	-	3.0E-03	6.4E-03	1.2E-07	2.6E-07	2.6E-07
PCB-77	MJ664	-	-	-	1.5E-02	1.3E-02	6.3E-07	5.2E-07	6.3E-07
PCB-81	MJ664	-	-	-	3.0E-03	2.3E-03	1.2E-07	9.2E-08	1.2E-07
Aroclor-1254	MJ765	1.8E-01	9.0E-02	U	-	-	-	-	-
Aroclor-1260	MJ765	1.8E-01	9.0E-02	U	-	-	-	-	-
PCB-105	MJ765	-	-	-	1.2E-01	8.2E-02	1.1E-05	7.4E-06	1.1E-05
PCB-114	MJ765	-	-	-	4.5E-03	1.5E-03	4.1E-07	1.3E-07	4.1E-07
PCB-118	MJ765	-	-	-	2.7E-01	1.6E-01	2.4E-05	1.5E-05	2.4E-05
PCB-123	MJ765	-	-	-	3.0E-03	2.3E-03	2.7E-07	2.1E-07	2.7E-07
PCB-126	MJ765	-	-	-	7.5E-03	6.4E-03	6.8E-07	5.7E-07	6.8E-07
PCB-156	MJ765	-	-	-	6.3E-02	5.5E-02	5.7E-06	4.9E-06	5.7E-06
PCB-157	MJ765	-	-	-	1.2E-02	2.5E-02	1.1E-06	2.2E-06	2.2E-06
PCB-167	MJ765	-	-	-	2.1E-02	4.3E-02	1.9E-06	3.8E-06	3.8E-06
PCB-169	MJ765	-	-	-	3.7E-04	6.4E-04	3.3E-08	5.7E-08	5.7E-08
PCB-189	MJ765	-	-	-	3.0E-03	6.4E-03	2.7E-07	5.7E-07	5.7E-07
PCB-77	MJ765	-	-	-	1.5E-02	1.3E-02	1.4E-06	1.1E-06	1.4E-06
PCB-81	MJ765	-	-	-	3.0E-03	2.3E-03	2.7E-07	2.0E-07	2.7E-07

Aroclor to PCB Congener Extrapolation (0-2 feet bgs)
Sodium Reactor Experiment (SRE) Area

Chemical	EPA ID	Measured Concentrations (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF_{1254}	EF_{1260}	Estimated Concentrations Aroclor 1254 (mg/kg)	Estimated Concentrations Aroclor 1260 (mg/kg)	Estimated Concentrations PCB_{MAX} (mg/kg)
Aroclor-1254	MJ768	8.5E-02	4.3E-02	U	-	-	-	-	-
Aroclor-1260	MJ768	8.5E-02	4.3E-02	U	-	-	-	-	-
PCB-105	MJ768	-	-	-	1.2E-01	8.2E-02	5.3E-06	3.5E-06	5.3E-06
PCB-114	MJ768	-	-	-	4.5E-03	1.5E-03	1.9E-07	6.2E-08	1.9E-07
PCB-118	MJ768	-	-	-	2.7E-01	1.6E-01	1.1E-05	7.0E-06	1.1E-05
PCB-123	MJ768	-	-	-	3.0E-03	2.3E-03	1.3E-07	9.9E-08	1.3E-07
PCB-126	MJ768	-	-	-	7.5E-03	6.4E-03	3.2E-07	2.7E-07	3.2E-07
PCB-156	MJ768	-	-	-	6.3E-02	5.5E-02	2.7E-06	2.3E-06	2.7E-06
PCB-157	MJ768	-	-	-	1.2E-02	2.5E-02	5.3E-07	1.0E-06	1.0E-06
PCB-167	MJ768	-	-	-	2.1E-02	4.3E-02	8.8E-07	1.8E-06	1.8E-06
PCB-169	MJ768	-	-	-	3.7E-04	6.4E-04	1.6E-08	2.7E-08	2.7E-08
PCB-189	MJ768	-	-	-	3.0E-03	6.4E-03	1.3E-07	2.7E-07	2.7E-07
PCB-77	MJ768	-	-	-	1.5E-02	1.3E-02	6.6E-07	5.4E-07	6.6E-07
PCB-81	MJ768	-	-	-	3.0E-03	2.3E-03	1.3E-07	9.6E-08	1.3E-07
Aroclor-1254	MJ776	8.8E-02	4.4E-02	U	-	-	-	-	-
Aroclor-1260	MJ776	8.8E-02	4.4E-02	U	-	-	-	-	-
PCB-105	MJ776	-	-	-	1.2E-01	8.2E-02	5.4E-06	3.6E-06	5.4E-06
PCB-114	MJ776	-	-	-	4.5E-03	1.5E-03	2.0E-07	6.4E-08	2.0E-07
PCB-118	MJ776	-	-	-	2.7E-01	1.6E-01	1.2E-05	7.2E-06	1.2E-05
PCB-123	MJ776	-	-	-	3.0E-03	2.3E-03	1.3E-07	1.0E-07	1.3E-07
PCB-126	MJ776	-	-	-	7.5E-03	6.4E-03	3.3E-07	2.8E-07	3.3E-07
PCB-156	MJ776	-	-	-	6.3E-02	5.5E-02	2.8E-06	2.4E-06	2.8E-06
PCB-157	MJ776	-	-	-	1.2E-02	2.5E-02	5.4E-07	1.1E-06	1.1E-06
PCB-167	MJ776	-	-	-	2.1E-02	4.3E-02	9.1E-07	1.9E-06	1.9E-06
PCB-169	MJ776	-	-	-	3.7E-04	6.4E-04	1.6E-08	2.8E-08	2.8E-08
PCB-189	MJ776	-	-	-	3.0E-03	6.4E-03	1.3E-07	2.8E-07	2.8E-07
PCB-77	MJ776	-	-	-	1.5E-02	1.3E-02	6.8E-07	5.6E-07	6.8E-07
PCB-81	MJ776	-	-	-	3.0E-03	2.3E-03	1.3E-07	9.9E-08	1.3E-07
Aroclor-1254	MJ777	8.8E-02	4.4E-02	U	-	-	-	-	-
Aroclor-1260	MJ777	8.8E-02	4.4E-02	U	-	-	-	-	-
PCB-105	MJ777	-	-	-	1.2E-01	8.2E-02	5.4E-06	3.6E-06	5.4E-06
PCB-114	MJ777	-	-	-	4.5E-03	1.5E-03	2.0E-07	6.4E-08	2.0E-07
PCB-118	MJ777	-	-	-	2.7E-01	1.6E-01	1.2E-05	7.2E-06	1.2E-05
PCB-123	MJ777	-	-	-	3.0E-03	2.3E-03	1.3E-07	1.0E-07	1.3E-07
PCB-126	MJ777	-	-	-	7.5E-03	6.4E-03	3.3E-07	2.8E-07	3.3E-07
PCB-156	MJ777	-	-	-	6.3E-02	5.5E-02	2.8E-06	2.4E-06	2.8E-06
PCB-157	MJ777	-	-	-	1.2E-02	2.5E-02	5.4E-07	1.1E-06	1.1E-06
PCB-167	MJ777	-	-	-	2.1E-02	4.3E-02	9.1E-07	1.9E-06	1.9E-06
PCB-169	MJ777	-	-	-	3.7E-04	6.4E-04	1.6E-08	2.8E-08	2.8E-08
PCB-189	MJ777	-	-	-	3.0E-03	6.4E-03	1.3E-07	2.8E-07	2.8E-07
PCB-77	MJ777	-	-	-	1.5E-02	1.3E-02	6.8E-07	5.6E-07	6.8E-07
PCB-81	MJ777	-	-	-	3.0E-03	2.3E-03	1.3E-07	9.9E-08	1.3E-07

Aroclor to PCB Congener Extrapolation (0-2 feet bgs)
Sodium Reactor Experiment (SRE) Area

Chemical	EPA ID	Measured Concentrations (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF_{1254}	EF_{1260}	Estimated Concentrations Aroclor 1254 (mg/kg)	Estimated Concentrations Aroclor 1260 (mg/kg)	Estimated Concentrations PCB_{MAX} (mg/kg)
Aroclor-1254	RJ627	3.5E-02	1.8E-02	U	-	-	-	-	-
Aroclor-1260	RJ627	3.5E-02	1.8E-02	U	-	-	-	-	-
PCB-105	RJ627	-	-	-	1.2E-01	8.2E-02	2.2E-06	1.4E-06	2.2E-06
PCB-114	RJ627	-	-	-	4.5E-03	1.5E-03	7.9E-08	2.5E-08	7.9E-08
PCB-118	RJ627	-	-	-	2.7E-01	1.6E-01	4.7E-06	2.9E-06	4.7E-06
PCB-123	RJ627	-	-	-	3.0E-03	2.3E-03	5.2E-08	4.1E-08	5.2E-08
PCB-126	RJ627	-	-	-	7.5E-03	6.4E-03	1.3E-07	1.1E-07	1.3E-07
PCB-156	RJ627	-	-	-	6.3E-02	5.5E-02	1.1E-06	9.5E-07	1.1E-06
PCB-157	RJ627	-	-	-	1.2E-02	2.5E-02	2.2E-07	4.3E-07	4.3E-07
PCB-167	RJ627	-	-	-	2.1E-02	4.3E-02	3.6E-07	7.5E-07	7.5E-07
PCB-169	RJ627	-	-	-	3.7E-04	6.4E-04	6.4E-09	1.1E-08	1.1E-08
PCB-189	RJ627	-	-	-	3.0E-03	6.4E-03	5.2E-08	1.1E-07	1.1E-07
PCB-77	RJ627	-	-	-	1.5E-02	1.3E-02	2.7E-07	2.2E-07	2.7E-07
PCB-81	RJ627	-	-	-	3.0E-03	2.3E-03	5.2E-08	3.9E-08	5.2E-08
Aroclor-1254	RJ786	6.0E-02	6.0E-02	J	-	-	-	-	-
Aroclor-1260	RJ786	3.6E-02	1.8E-02	UJ	-	-	-	-	-
PCB-105	RJ786	-	-	-	1.2E-01	8.2E-02	7.4E-06	1.5E-06	7.4E-06
PCB-114	RJ786	-	-	-	4.5E-03	1.5E-03	2.7E-07	2.6E-08	2.7E-07
PCB-118	RJ786	-	-	-	2.7E-01	1.6E-01	1.6E-05	2.9E-06	1.6E-05
PCB-123	RJ786	-	-	-	3.0E-03	2.3E-03	1.8E-07	4.2E-08	1.8E-07
PCB-126	RJ786	-	-	-	7.5E-03	6.4E-03	4.5E-07	1.1E-07	4.5E-07
PCB-156	RJ786	-	-	-	6.3E-02	5.5E-02	3.8E-06	9.8E-07	3.8E-06
PCB-157	RJ786	-	-	-	1.2E-02	2.5E-02	7.4E-07	4.4E-07	7.4E-07
PCB-167	RJ786	-	-	-	2.1E-02	4.3E-02	1.2E-06	7.7E-07	1.2E-06
PCB-169	RJ786	-	-	-	3.7E-04	6.4E-04	2.2E-08	1.1E-08	2.2E-08
PCB-189	RJ786	-	-	-	3.0E-03	6.4E-03	1.8E-07	1.1E-07	1.8E-07
PCB-77	RJ786	-	-	-	1.5E-02	1.3E-02	9.3E-07	2.3E-07	9.3E-07
PCB-81	RJ786	-	-	-	3.0E-03	2.3E-03	1.8E-07	4.1E-08	1.8E-07

Notes:
PCBs - polychlorinated biphenyls
EF- Extrapolation Factor (ng congener/kg soil)/(µg Aroclor/kg soil)
"-" not applicable
mg/kg - milligrams per kilogram
µg/kg - micrograms per kilogram
ng/kg - nanograms per kilogram
bgs- below ground surface
PCB_{MAX} = the maximum of the extrapolated Aroclor 1254 and 1260 concentrations

Exposure Point Concentrations for CPECs in Soil Vapor (0-6 feet bgs)
Sodium Reactor Experiment (SRE) Area

Chemical	Distribution Type	CTE [a] (µg/L)	RME [b] (µg/L)	
1,1,1-Trichloroethane	NT	5.0E-01	5.0E-01	c
1,1,2-Trichloro-1,2,2-trifluoroethane	NT	2.7E+00	3.1E+00	
1,1-Dichloroethane	NT	5.0E-01	5.0E-01	c
Ethylbenzene	NT	5.0E-01	5.0E-01	c
Methylene chloride	NT	1.7E+01	1.7E+01	c
Tetrachloroethene	NT	5.0E-01	5.0E-01	c
Toluene	NT	5.0E-01	5.0E-01	c
Trichloroethene	NT	5.0E-01	5.0E-01	c
m,p-Xylene	NT	1.0E+00	1.0E+00	c

Notes:

a. Either the arithmetic mean concentration for two or more samples or the reported concentration for a single sample.

b. Either the 95% upper confidence limit (95% UCL) on the arithmetic mean for three or more samples, or the maximum concentration for less than three samples, or the maximum concentration in cases where the 95% UCL exceeds the maximum

c. Exposure point concentrations estimated at one-half the soil vapor sample quantitation limit

CTE- Central Tendency Exposure

RME- Reasonable Maximum Exposure

NT - Not tested

µg/L - micrograms per liter volume

bgs- below ground surface

Spreadsheet C3-102c (1 of 3)

Exposure Point Concentrations for CPECs in Sediment ONLY (0-6 feet bgs) - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Chemical	Distribution Type	EPCs		
		CTE[a] (mg/kg)	RME[b] (mg/kg)	
Inorganic Compounds				
Cadmium	NP	6.0E-01	3.0E+00	
Copper	NP	2.6E+01	5.5E+01	
Lead	NP	1.7E+01	3.9E+01	
Mercury	NP	3.8E-01	1.3E+00	
Silver	NP	1.4E-01	1.4E-01	e
Thallium	NP	1.6E-01	1.6E-01	e
Zinc	NP	1.9E+02	9.4E+02	
VOCs				
1,1,1-Trichloroethane	NP	6.5E-02	3.7E-01	
1,1,2-Trichloro-1,2,2-trifluoroethane	NT	1.2E-02	1.2E-02	c
1,1-Dichloroethane	NP	3.1E-02	1.1E-01	
1,2-Dichloroethene (total)	NP	3.2E-02	6.1E-02	
Acetone	NP	2.0E-02	2.0E-02	e
Ethylbenzene	NP	2.5E-02	7.6E-02	
Methylene chloride	NP	5.7E-01	3.7E+00	
Tetrachloroethene	NP	5.7E-02	2.8E-01	
Toluene	NP	4.5E-01	3.1E+00	
Trichloroethene	NP	1.4E-01	8.5E-01	
Xylenes (total)	NP	8.3E-02	4.7E-01	
SVOCs				
Acenaphthene	NP	7.4E-03	7.4E-03	d,
Acenaphthylene	NP	1.5E-03	1.5E-03	d,
Anthracene	NP	4.0E-03	4.0E-03	d,
Benzo(a)anthracene	NP	7.3E-02	1.9E-01	d
Benzo(a)pyrene	NP	7.3E-02	1.9E-01	d
Benzo(b)fluoranthene	NP	8.9E-02	3.5E-01	d
Benzo(e)pyrene	NT	2.7E-03	3.4E-03	d
Benzo(g,h,i)perylene	NP	7.3E-02	1.2E-01	d
Benzo(k)fluoranthene	NP	2.7E-05	2.7E-05	d,
Chrysene	NP	8.2E-02	1.7E-01	d
Dibenz(a,h)anthracene	NP	2.3E-04	2.3E-04	d,
Fluoranthene	NP	1.0E-01	2.7E-01	d
Fluorene	NP	1.0E-02	1.0E-02	d,
Indeno(1,2,3-cd)pyrene	NP	7.1E-02	1.8E-01	d
Perylene	NT	1.5E-03	1.9E-03	d
Phenanthrene	NP	7.8E-02	1.4E-01	d
Pyrene	NP	9.2E-02	2.2E-01	d

Spreadsheet C3-102c (2 of 3)

Exposure Point Concentrations for CPECs in Sediment ONLY (0-6 feet bgs) - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Chemical	Distribution Type	EPCs	
		CTE[a] (mg/kg)	RME[b] (mg/kg)
PCDD/PCDFs			
2,3,7,8-TCDD	NT	5.3E-07	5.3E-07
1,2,3,7,8-PeCDD	NT	2.2E-06	2.2E-06
1,2,3,4,7,8-HxCDD	NT	1.0E-05	1.0E-05
1,2,3,6,7,8-HxCDD	NT	3.0E-05	3.0E-05
1,2,3,7,8,9-HxCDD	NT	1.0E-05	1.0E-05
1,2,3,4,6,7,8-HpCDD	NT	1.3E-03	1.3E-03
OCDD	NT	1.9E-02	1.9E-02
2,3,7,8-TCDF	NT	7.9E-07	7.9E-07
1,2,3,7,8-PeCDF	NT	5.8E-07	5.8E-07
2,3,4,7,8-PeCDF	NT	1.6E-06	1.6E-06
1,2,3,4,7,8-HxCDF	NT	3.7E-06	3.7E-06
1,2,3,6,7,8-HxCDF	NT	3.4E-06	3.4E-06
2,3,4,6,7,8-HxCDF	NT	1.0E-05	1.0E-05
1,2,3,7,8,9-HxCDF	NT	9.7E-07	9.7E-07
1,2,3,4,6,7,8-HpCDF	NT	1.0E-04	1.0E-04
1,2,3,4,7,8,9-HpCDF	NT	1.0E-05	1.0E-05
OCDF	NT	2.4E-04	2.4E-04
PCBs			
Aroclor-1254	NT	7.8E-02	1.1E-01
Aroclor-1260	NT	1.1E-01	1.8E-01
PCB-105	NT	1.0E-05	1.5E-05
PCB-114	NT	3.5E-07	5.0E-07
PCB-118	NT	2.1E-05	2.9E-05
PCB-123	NT	2.8E-07	4.2E-07
PCB-126	NT	7.4E-07	1.1E-06
PCB-156	NT	6.3E-06	9.8E-06
PCB-157	NT	2.8E-06	4.4E-06
PCB-167	NT	4.8E-06	7.7E-06
PCB-169	NT	7.2E-08	1.1E-07
PCB-189	NT	7.2E-07	1.1E-06
PCB-77	NT	1.5E-06	2.3E-06
PCB-81	NT	2.7E-07	4.1E-07

Notes:

a. Either the arithmetic mean concentration for two or more samples or the reported concentration for a single sample.

b. Either the 95% upper confidence limit (95% UCL) on the arithmetic mean for three or more samples, or the maximum concentration for less than three samples, or the maximum concentration in cases where the 95% UCL exceeds the maximum

Spreadsheet C3-102c (3 of 3)

Exposure Point Concentrations for CPECs in Sediment ONLY (0-6 feet bgs) - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Chemical	Distribution Type	EPCs	
		CTE[a] (mg/kg)	RME[b] (mg/kg)

concentration.

c. Exposure point concentrations estimated at one-half the sample quantitation limit for soil at 0 to 6 feet bgs.

at 0 to 6 feet bgs.

d. Exposure point concentrations estimated in part following the methods for extrapolation of total petroleum hydrocarbons to petroleum constituents as described in Section 2.8 of the SRAM and as presented in Spreadsheet D-99.

e. CTE exposure point concentrations estimated to equal the RME because the mean is greater than RME exposure point concentration.

CPEC - chemical of potential ecological concern
EPC - exposure point concentration
CTE - central tendency exposure
RME - reasonable maximum exposure
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCDD/PCDF - Polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.
N - normal distribution
LN - lognormal distribution
NP - non-parametric distribution
G - gamma distribution
NT - data not tested for distribution due to sample size
"-" not applicable
mg/kg - milligrams per kilogram
bgs- below ground surface

Spreadsheet C3-102b (1 of 3)

Exposure Point Concentrations for CPECs in Soil ONLY (0-6 feet bgs) - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Chemical	Distribution Type	EPCs		
		CTE[a] (mg/kg)	RME[b] (mg/kg)	
Inorganic Compounds				
Cadmium	G	2.0E-01	3.2E-01	
Copper	NP	9.9E+00	1.8E+01	
Lead	NP	9.3E+00	1.5E+01	
Mercury	LN	1.8E+00	3.8E+00	
Methyl Mercury	NT	1.7E-03	3.6E-03	
Silver	G	1.4E+00	2.8E+00	
Thallium	NP	9.4E-01	3.6E+00	
Zinc	NP	6.9E+01	2.3E+02	
VOCs				
1,1,2-Trichloro-1,2,2-trifluoroethane	NT	1.2E-02	1.2E-02	[c]
2-Butanone	N	1.8E-02	2.7E-02	[e]
Acetone	LN	6.9E-01	2.3E+00	
Methylene chloride	NP	1.0E-02	1.2E-02	
SVOCs				
Acenaphthene	NP	7.5E-02	2.8E-01	[d]
Acenaphthylene	NP	5.4E-03	1.5E-02	[d]
Anthracene	NP	2.1E-01	1.1E+00	[d]
Benzo(a)anthracene	NP	9.0E-01	1.4E+01	[d]
Benzo(a)pyrene	NP	9.6E-01	1.5E+01	[d]
Benzo(b)fluoranthene	NP	8.6E-01	7.5E+00	[d]
Benzo(e)pyrene	NP	2.2E-02	6.1E-02	[d]
Benzo(g,h,i)perylene	NP	2.9E-01	2.6E+00	[d]
Benzo(k)fluoranthene	NP	9.5E-01	1.5E+01	[d]
Chrysene	NP	6.5E-01	7.1E+00	[d]
Dibenz(a,h)anthracene	NP	1.3E-01	1.2E+00	[d]
Dibenzofuran	NT	2.8E-01	2.8E-01	
Fluoranthene	NP	1.6E+00	1.4E+01	[d]
Fluorene	NP	7.6E-02	2.8E-01	[d]
Indeno(1,2,3-cd)pyrene	NP	4.1E-01	3.7E+00	[d]
Naphthalene	NP	2.3E-02	5.8E-02	
Perylene	NP	1.2E-02	3.5E-02	[d]
Phenanthrene	NP	7.7E-01	6.4E+00	[d]
Pyrene	NP	1.3E+00	1.2E+01	[d]
Total Petroleum Hydrocarbons				
C11-C14(Kerosene Range)	NP	8.5E+00	4.0E+01	
C14-C20(Diesel Range)	LN	7.9E+00	1.4E+01	
C20-C30(Lubricant Oil Range)	NP	8.8E+01	4.7E+02	

Spreadsheet C3-102b (2 of 3)

Exposure Point Concentrations for CPECs in Soil ONLY (0-6 feet bgs) - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Chemical	Distribution Type	EPCs	
		CTE[a] (mg/kg)	RME[b] (mg/kg)
PCDD/PCDFs			
2,3,7,8-TCDD	N	1.5E-07	3.5E-07
1,2,3,7,8-PeCDD	N	5.6E-07	1.3E-06
1,2,3,4,7,8-HxCDD	N	1.6E-06	3.7E-06
1,2,3,6,7,8-HxCDD	N	8.3E-06	1.9E-05
1,2,3,7,8,9-HxCDD	N	3.4E-06	8.7E-06
1,2,3,4,6,7,8-HpCDD	N	2.4E-04	4.9E-04
OCDD	N	3.7E-03	7.3E-03
2,3,7,8-TCDF	N	3.6E-07	7.8E-07
1,2,3,7,8-PeCDF	G	1.5E-07	3.9E-07
2,3,4,7,8-PeCDF	N	4.2E-07	9.0E-07
1,2,3,4,7,8-HxCDF	N	8.8E-07	1.7E-06
1,2,3,6,7,8-HxCDF	N	7.2E-07	1.6E-06
2,3,4,6,7,8-HxCDF	N	1.4E-06	2.8E-06
1,2,3,7,8,9-HxCDF	N	1.4E-07	1.8E-07
1,2,3,4,6,7,8-HpCDF	N	2.8E-05	5.0E-05
1,2,3,4,7,8,9-HpCDF	N	2.4E-06	4.2E-06
OCDF	N	7.5E-05	1.5E-04
PCBs			
Aroclor-1254	NP	1.6E-01	4.3E-01
Aroclor-1260	NP	1.4E+00	7.7E+00
PCB-105	NP	1.2E-04	6.3E-04
PCB-114	NP	2.3E-06	1.1E-05
PCB-118	NP	2.4E-04	1.3E-03
PCB-123	NP	3.4E-06	1.8E-05
PCB-126	NP	9.2E-06	4.9E-05
PCB-156	NP	7.9E-05	4.2E-04
PCB-157	NP	3.5E-05	1.9E-04
PCB-167	NP	6.0E-05	3.3E-04
PCB-169	NP	9.0E-07	4.9E-06
PCB-189	NP	9.0E-06	4.9E-05
PCB-77	NP	1.8E-05	9.7E-05
PCB-81	NP	3.3E-06	1.7E-05

Notes:

a. Either the arithmetic mean concentration for two or more samples or the reported concentration for a single sample.

b. Either the 95% upper confidence limit (95% UCL) on the arithmetic mean for three or more samples, or the maximum concentration for less than three samples, or the maximum concentration in cases where the 95% UCL exceeds the maximum

Spreadsheet C3-102b (3 of 3)

Exposure Point Concentrations for CPECs in Soil ONLY (0-6 feet bgs) - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Chemical	Distribution Type	EPCs	
		CTE[a] (mg/kg)	RME[b] (mg/kg)

concentration.

c. Exposure point concentrations estimated at one-half the sample quantitation limit for soil at 0 to 6 feet bgs.

at 0 to 6 feet bgs.

d. Exposure point concentrations estimated in part following the methods for extrapolation of total petroleum hydrocarbons to petroleum constituents as described in Section 2.8 of the SRAM and as presented in Spreadsheet D-99.

e. CTE exposure point concentrations estimated to equal the RME because the mean is greater than RME exposure point concentration.

CPEC - chemical of potential ecological concern
EPC - exposure point concentration
CTE - central tendency exposure
RME - reasonable maximum exposure
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCDD/PCDF - Polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.
N - normal distribution
LN - lognormal distribution
NP - non-parametric distribution
G - gamma distribution
NT - data not tested for distribution due to sample size
"-" not applicable
mg/kg - milligrams per kilogram
bgs- below ground surface

Spreadsheet C3-102a (1 of 3)

Exposure Point Concentrations for CPECs in Soil/Sediment (0-6 feet bgs) - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Chemical	Distribution Type	EPCs		
		CTE[a] (mg/kg)	RME[b] (mg/kg)	
Inorganic Compounds				
Cadmium	NP	3.8E-01	1.6E+00	
Copper	NP	1.7E+01	3.2E+01	
Lead	NP	1.3E+01	2.4E+01	
Mercury	NP	1.5E+00	4.6E+00	
Methyl Mercury	NT	1.7E-03	3.6E-03	
Silver	NP	9.4E-01	3.8E+00	
Thallium	NP	9.8E-01	2.8E+00	
Zinc	NP	1.2E+02	4.9E+02	
VOCs				
1,1,1-Trichloroethane	NP	4.5E-02	2.6E-01	
1,1,2-Trichloro-1,2,2-trifluoroethane	NP	1.2E-02	1.2E-02	c
1,1-Dichloroethane	NP	2.2E-02	8.0E-02	
1,2-Dichloroethene (total)	NP	2.7E-02	5.4E-02	
2-Butanone	NP	3.7E-02	3.7E-02	e
Acetone	NP	5.0E-01	2.5E+00	
Ethylbenzene	NP	1.8E-02	5.9E-02	
Methylene chloride	NP	3.9E-01	2.5E+00	
Tetrachloroethene	NP	3.9E-02	2.0E-01	
Toluene	NP	3.0E-01	2.1E+00	
Trichloroethene	NP	9.7E-02	5.9E-01	
Xylenes (total)	NP	7.1E-02	4.0E-01	
SVOCs				
Acenaphthene	NP	7.1E-02	1.7E-01	d
Acenaphthylene	NP	3.4E-02	8.5E-02	d
Anthracene	NP	1.4E-01	5.9E-01	d
Benzo(a)anthracene	NP	5.0E-01	4.2E+00	d
Benzo(a)pyrene	NP	5.3E-01	4.5E+00	d
Benzo(b)fluoranthene	NP	4.8E-01	3.9E+00	d
Benzo(e)pyrene	NP	1.9E-02	5.3E-02	d
Benzo(g,h,i)perylene	NP	1.9E-01	1.4E+00	d
Benzo(k)fluoranthene	NP	5.2E-01	4.4E+00	d
Chrysene	NP	3.8E-01	3.7E+00	d
Dibenz(a,h)anthracene	NP	9.7E-02	6.6E-01	d
Dibenzofuran	NP	9.8E-02	1.2E-01	
Fluoranthene	NP	8.7E-01	7.4E+00	d
Fluorene	NP	7.1E-02	1.8E-01	d
Indeno(1,2,3-cd)pyrene	NP	2.4E-01	1.9E+00	d
Naphthalene	NP	5.4E-02	5.8E-02	
Perylene	NP	1.1E-02	3.0E-02	d

Spreadsheet C3-102a (2 of 3)

Exposure Point Concentrations for CPECs in Soil/Sediment (0-6 feet bgs) - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Chemical	Distribution Type	EPCs		
		CTE[a] (mg/kg)	RME[b] (mg/kg)	
Phenanthrene	NP	4.3E-01	1.7E+00	[d]
Pyrene	NP	7.3E-01	6.2E+00	[d]
Total Petroleum Hydrocarbons				
C11-C14(Kerosene Range)	NP	7.8E+00	2.0E+01	
C14-C20(Diesel Range)	NP	7.4E+00	1.8E+01	
C20-C30(Lubricant Oil Range)	NP	7.5E+01	4.1E+02	
PCDD/PCDFs				
2,3,7,8-TCDD	N	2.3E-07	4.4E-07	
1,2,3,7,8-PeCDD	N	8.9E-07	1.8E-06	
1,2,3,4,7,8-HxCDD	N	3.3E-06	7.2E-06	
1,2,3,6,7,8-HxCDD	N	1.3E-05	2.4E-05	
1,2,3,7,8,9-HxCDD	N	4.7E-06	9.4E-06	
1,2,3,4,6,7,8-HpCDD	N	4.5E-04	9.5E-04	
OCDD	N	6.7E-03	1.4E-02	
2,3,7,8-TCDF	N	4.5E-07	7.9E-07	
1,2,3,7,8-PeCDF	N	2.3E-07	4.6E-07	
2,3,4,7,8-PeCDF	N	6.6E-07	1.3E-06	
1,2,3,4,7,8-HxCDF	N	1.4E-06	2.8E-06	
1,2,3,6,7,8-HxCDF	N	1.2E-06	2.5E-06	
2,3,4,6,7,8-HxCDF	N	3.1E-06	6.9E-06	
1,2,3,7,8,9-HxCDF	G	3.0E-07	9.7E-07	
1,2,3,4,6,7,8-HpCDF	N	4.2E-05	8.0E-05	
1,2,3,4,7,8,9-HpCDF	N	3.9E-06	7.6E-06	
OCDF	N	1.1E-04	2.0E-04	
PCBs				
Aroclor-1254	NP	1.6E-01	4.3E-01	
Aroclor-1260	NP	1.3E+00	7.0E+00	
PCB-105	NP	1.1E-04	5.6E-04	
PCB-114	NP	2.1E-06	1.0E-05	
PCB-118	NP	2.2E-04	1.1E-03	
PCB-123	NP	3.1E-06	1.6E-05	
PCB-126	NP	8.4E-06	4.4E-05	
PCB-156	NP	7.2E-05	3.8E-04	
PCB-157	NP	3.2E-05	1.7E-04	
PCB-167	NP	5.5E-05	2.9E-04	
PCB-169	NP	8.2E-07	4.4E-06	
PCB-189	NP	8.2E-06	4.4E-05	
PCB-77	NP	1.7E-05	8.8E-05	
PCB-81	NP	3.0E-06	1.6E-05	

Spreadsheet C3-102a (3 of 3)

Exposure Point Concentrations for CPECs in Soil/Sediment (0-6 feet bgs) - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Chemical	Distribution Type	EPCs	
		CTE[a] (mg/kg)	RME[b] (mg/kg)

Notes:

a. Either the arithmetic mean concentration for two or more samples or the reported concentration for a single sample.

b. Either the 95% upper confidence limit (95% UCL) on the arithmetic mean for three or more samples, or the maximum concentration for less than three samples, or the maximum concentration in cases where the 95% UCL exceeds the maximum concentration.

c. Exposure point concentrations estimated at one-half the sample quantitation limit for soil at 0 to 6 feet bgs.
at 0 to 6 feet bgs.

d. Exposure point concentrations estimated in part following the methods for extrapolation of total petroleum hydrocarbons to petroleum constituents as described in Section 2.8 of the SRAM and as presented in Spreadsheet D-99.

e. CTE exposure point concentrations estimated to equal the RME because the mean is greater than RME exposure point concentration.

CPEC - chemical of potential ecological concern
EPC - exposure point concentration
CTE - central tendency exposure
RME - reasonable maximum exposure
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCDD/PCDF - Polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.
N - normal distribution
LN - lognormal distribution
NP - non-parametric distribution
G - gamma distribution
NT - data not tested for distribution due to sample size
"-" not applicable
mg/kg - milligrams per kilogram
bgs- below ground surface

Spreadsheet C3-101c (1 of 3)

Exposure Point Concentrations for CPECs in Sediment ONLY (0-4 feet bgs) - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Chemical	Distribution Type	EPCs		
		CTE[a] (mg/kg)	RME[b] (mg/kg)	
Inorganic Compounds				
Cadmium	NP	6.3E-01	1.7E+00	
Copper	NP	2.7E+01	5.7E+01	
Lead	NP	1.7E+01	4.1E+01	
Mercury	NP	4.0E-01	8.5E-01	
Silver	NP	1.4E-01	1.4E-01	e
Thallium	NP	1.6E-01	1.6E-01	e
Zinc	NP	1.9E+02	9.8E+02	
VOCs				
1,1,1-Trichloroethane	NP	6.9E-02	3.9E-01	
1,1,2-Trichloro-1,2,2-trifluoroethane	NT	1.2E-02	1.2E-02	c
1,1-Dichloroethane	NP	3.3E-02	6.8E-02	
1,2-Dichloroethene (total)	NP	3.4E-02	4.6E-02	
Methylene chloride	NP	6.1E-01	3.9E+00	
Tetrachloroethene	NP	6.0E-02	2.9E-01	
Toluene	NP	4.7E-01	3.2E+00	
Trichloroethene	NP	1.5E-01	9.0E-01	
Xylenes (total)	NP	8.9E-02	5.0E-01	
SVOCs				
Acenaphthene	NP	7.4E-03	7.4E-03	d,
Acenaphthylene	NP	1.5E-03	1.5E-03	d,
Anthracene	NP	4.0E-03	4.0E-03	d,
Benzo(a)anthracene	NP	7.7E-02	1.3E-01	d
Benzo(a)pyrene	NP	7.7E-02	1.3E-01	d
Benzo(b)fluoranthene	NP	9.4E-02	2.1E-01	d
Benzo(e)pyrene	NT	3.4E-03	3.4E-03	d
Benzo(g,h,i)perylene	NP	7.7E-02	1.3E-01	d
Benzo(k)fluoranthene	NP	2.7E-05	2.7E-05	d,
Chrysene	NP	8.7E-02	1.8E-01	d
Dibenz(a,h)anthracene	NP	2.3E-04	2.3E-04	d,
Fluoranthene	NP	1.1E-01	2.9E-01	d
Fluorene	NP	1.0E-02	1.0E-02	d,
Indeno(1,2,3-cd)pyrene	NP	7.5E-02	1.2E-01	d
Perylene	NT	1.9E-03	1.9E-03	d
Phenanthrene	NP	8.2E-02	1.4E-01	d
Pyrene	NP	9.7E-02	2.3E-01	d

Spreadsheet C3-101c (2 of 3)

Exposure Point Concentrations for CPECs in Sediment ONLY (0-4 feet bgs) - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Chemical	Distribution Type	EPCs	
		CTE[a] (mg/kg)	RME[b] (mg/kg)
PCDD/PCDFs			
2,3,7,8-TCDD	NT	5.3E-07	5.3E-07
1,2,3,7,8-PeCDD	NT	2.2E-06	2.2E-06
1,2,3,4,7,8-HxCDD	NT	1.0E-05	1.0E-05
1,2,3,6,7,8-HxCDD	NT	3.0E-05	3.0E-05
1,2,3,7,8,9-HxCDD	NT	1.0E-05	1.0E-05
1,2,3,4,6,7,8-HpCDD	NT	1.3E-03	1.3E-03
OCDD	NT	1.9E-02	1.9E-02
2,3,7,8-TCDF	NT	7.9E-07	7.9E-07
1,2,3,7,8-PeCDF	NT	5.8E-07	5.8E-07
2,3,4,7,8-PeCDF	NT	1.6E-06	1.6E-06
1,2,3,4,7,8-HxCDF	NT	3.7E-06	3.7E-06
1,2,3,6,7,8-HxCDF	NT	3.4E-06	3.4E-06
2,3,4,6,7,8-HxCDF	NT	1.0E-05	1.0E-05
1,2,3,7,8,9-HxCDF	NT	9.7E-07	9.7E-07
1,2,3,4,6,7,8-HpCDF	NT	1.0E-04	1.0E-04
1,2,3,4,7,8,9-HpCDF	NT	1.0E-05	1.0E-05
OCDF	NT	2.4E-04	2.4E-04
PCBs			
Aroclor-1254	NT	7.8E-02	1.1E-01
Aroclor-1260	NT	1.1E-01	1.8E-01
PCB-105	NT	1.0E-05	1.5E-05
PCB-114	NT	3.5E-07	5.0E-07
PCB-118	NT	2.1E-05	2.9E-05
PCB-123	NT	2.8E-07	4.2E-07
PCB-126	NT	7.4E-07	1.1E-06
PCB-156	NT	6.3E-06	9.8E-06
PCB-157	NT	2.8E-06	4.4E-06
PCB-167	NT	4.8E-06	7.7E-06
PCB-169	NT	7.2E-08	1.1E-07
PCB-189	NT	7.2E-07	1.1E-06
PCB-77	NT	1.5E-06	2.3E-06
PCB-81	NT	2.7E-07	4.1E-07

Notes:

a. Either the arithmetic mean concentration for two or more samples or the reported concentration for a single sample.

b. Either the 95% upper confidence limit (95% UCL) on the arithmetic mean for three or more samples, or the maximum concentration for less than three samples, or the maximum concentration in cases where the 95% UCL exceeds the maximum

Spreadsheet C3-101c (3 of 3)

Exposure Point Concentrations for CPECs in Sediment ONLY (0-4 feet bgs) - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Chemical	Distribution Type	EPCs	
		CTE[a] (mg/kg)	RME[b] (mg/kg)

concentration.

c. Exposure point concentrations estimated at one-half the sample quantitation limit for soil at 0 to 4 feet bgs.
at 0 to 6 feet bgs.

d. Exposure point concentrations estimated in part following the methods for extrapolation of total petroleum hydrocarbons to petroleum constituents as described in Section 2.8 of the SRAM and as presented in Spreadsheet D-97.

e. CTE exposure point concentrations estimated to equal the RME because the mean is greater than RME exposure point concentration.

CPEC - chemical of potential ecological concern
EPC - exposure point concentration
CTE - central tendency exposure
RME - reasonable maximum exposure
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCDD/PCDF - polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.
N - normal distribution
LN - lognormal distribution
NP - non-parametric distribution
G - gamma distribution
NT - data not tested for distribution due to sample size
"-" not applicable
mg/kg - milligrams per kilogram
bgs- below ground surface

Spreadsheet C3-101b (1 of 3)

Exposure Point Concentrations for CPECs in Soil ONLY (0-4 feet bgs) - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Chemical	Distribution Type	EPCs		
		CTE[a] (mg/kg)	RME[b] (mg/kg)	
Inorganic Compounds				
Cadmium	G	2.2E-01	3.6E-01	
Copper	NP	1.1E+01	2.0E+01	
Lead	G	9.9E+00	1.3E+01	
Mercury	LN	1.9E+00	4.1E+00	
Methyl mercury	NT	1.7E-03	3.6E-03	
Silver	G	1.5E+00	3.5E+00	
Thallium	NP	8.4E-01	2.1E+00	
Zinc	NP	7.5E+01	1.5E+02	
VOCs				
1,1,2-Trichloro-1,2,2-trifluoroethane	NT	1.2E-02	1.2E-02	c
2-Butanone	N	1.8E-02	2.7E-02	
Acetone	LN	6.9E-01	2.3E+00	
Methylene chloride	NP	1.0E-02	1.2E-02	
SVOCs				
Acenaphthene	NP	8.8E-02	3.3E-01	d
Acenaphthylene	NP	6.1E-03	1.7E-02	d
Anthracene	NP	2.5E-01	1.3E+00	d
Benzo(a)anthracene	NP	1.1E+00	1.4E+01	d
Benzo(a)pyrene	NP	1.1E+00	1.5E+01	d
Benzo(b)fluoranthene	NP	1.0E+00	1.3E+01	d
Benzo(e)pyrene	NP	2.4E-02	6.8E-02	d
Benzo(g,h,i)perylene	NP	3.4E-01	3.1E+00	d
Benzo(k)fluoranthene	NP	1.1E+00	1.5E+01	d
Chrysene	NP	7.7E-01	8.4E+00	d
Dibenz(a,h)anthracene	NP	1.5E-01	1.4E+00	d
Dibenzofuran	NT	2.8E-01	2.8E-01	
Fluoranthene	NP	1.9E+00	2.5E+01	d
Fluorene	NP	8.9E-02	3.3E-01	d
Indeno(1,2,3-cd)pyrene	NP	4.8E-01	6.4E+00	d
Perylene	NP	1.4E-02	3.9E-02	d
Phenanthrene	NP	9.0E-01	7.5E+00	d
Pyrene	NP	1.6E+00	1.4E+01	d
Total Petroleum Hydrocarbons				
C11-C14(Kerosene Range)	NP	9.3E+00	4.0E+01	
C14-C20(Diesel Range)	LN	8.7E+00	1.7E+01	
C20-C30(Lubricant Oil Range)	NP	9.9E+01	4.7E+02	

Spreadsheet C3-101b (2 of 3)

Exposure Point Concentrations for CPECs in Soil ONLY (0-4 feet bgs) - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Chemical	Distribution Type	EPCs	
		CTE[a] (mg/kg)	RME[b] (mg/kg)
PCDD/PCDFs			
2,3,7,8-TCDD	N	1.5E-07	3.5E-07
1,2,3,7,8-PeCDD	N	5.6E-07	1.3E-06
1,2,3,4,7,8-HxCDD	N	1.6E-06	3.7E-06
1,2,3,6,7,8-HxCDD	N	8.3E-06	1.9E-05
1,2,3,7,8,9-HxCDD	N	3.4E-06	8.7E-06
1,2,3,4,6,7,8-HpCDD	N	2.4E-04	4.9E-04
OCDD	N	3.7E-03	7.3E-03
2,3,7,8-TCDF	N	3.6E-07	7.8E-07
1,2,3,7,8-PeCDF	G	1.5E-07	3.9E-07
2,3,4,7,8-PeCDF	N	4.2E-07	9.0E-07
1,2,3,4,7,8-HxCDF	N	8.8E-07	1.7E-06
1,2,3,6,7,8-HxCDF	N	7.2E-07	1.6E-06
2,3,4,6,7,8-HxCDF	N	1.4E-06	2.8E-06
1,2,3,7,8,9-HxCDF	N	1.4E-07	1.8E-07
1,2,3,4,6,7,8-HpCDF	N	2.8E-05	5.0E-05
1,2,3,4,7,8,9-HpCDF	N	2.4E-06	4.2E-06
OCDF	N	7.5E-05	1.5E-04
PCBs			
Aroclor-1254	NP	1.6E-01	4.3E-01
Aroclor-1260	NP	1.4E+00	7.7E+00
PCB-105	NP	1.2E-04	6.3E-04
PCB-114	NP	2.3E-06	1.1E-05
PCB-118	NP	2.4E-04	1.3E-03
PCB-123	NP	3.4E-06	1.8E-05
PCB-126	NP	9.2E-06	4.9E-05
PCB-156	NP	7.9E-05	4.2E-04
PCB-157	NP	3.5E-05	1.9E-04
PCB-167	NP	6.0E-05	3.3E-04
PCB-169	NP	9.0E-07	4.9E-06
PCB-189	NP	9.0E-06	4.9E-05
PCB-77	NP	1.8E-05	9.7E-05
PCB-81	NP	3.3E-06	1.7E-05

Notes:

a. Either the arithmetic mean concentration for two or more samples or the reported concentration for a single sample.

b. Either the 95% upper confidence limit (95% UCL) on the arithmetic mean for three or more samples, or the maximum concentration for less than three samples, or the maximum concentration in cases where the 95% UCL exceeds the maximum

Spreadsheet C3-101b (3 of 3)

Exposure Point Concentrations for CPECs in Soil ONLY (0-4 feet bgs) - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Chemical	Distribution Type	EPCs	
		CTE[a] (mg/kg)	RME[b] (mg/kg)

concentration.

c. Exposure point concentrations estimated at one-half the sample quantitation limit for soil at 0 to 4 feet bgs.
at 0 to 6 feet bgs.

d. Exposure point concentrations estimated in part following the methods for extrapolation of total petroleum hydrocarbons to petroleum constituents as described in Section 2.8 of the SRAM and as presented in Spreadsheet D-97.

e. CTE exposure point concentrations estimated to equal the RME because the mean is greater than RME exposure point concentration.

CPEC - chemical of potential ecological concern
EPC - exposure point concentration
CTE - central tendency exposure
RME - reasonable maximum exposure
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCDD/PCDF - polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.
N - normal distribution
LN - lognormal distribution
NP - non-parametric distribution
G - gamma distribution
NT - data not tested for distribution due to sample size
"-" not applicable
mg/kg - milligrams per kilogram
bgs- below ground surface

Spreadsheet C3-101a (1 of 3)

Exposure Point Concentrations for CPECs in Soil/Sediment (0-4 feet bgs) - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Chemical	Distribution Type	EPCs		
		CTE[a] (mg/kg)	RME[b] (mg/kg)	
Inorganic Compounds				
Cadmium	NP	4.2E-01	1.7E+00	
Copper	NP	1.9E+01	3.5E+01	
Lead	NP	1.4E+01	2.6E+01	
Mercury	NP	1.5E+00	4.8E+00	
Methyl mercury	NT	1.7E-03	3.6E-03	
Silver	NP	1.0E+00	4.1E+00	
Thallium	NP	9.4E-01	2.1E+00	
Zinc	NP	1.3E+02	3.1E+02	
VOCs				
1,1,1-Trichloroethane	NP	4.7E-02	2.7E-01	
1,1,2-Trichloro-1,2,2-trifluoroethane	NP	1.2E-02	1.2E-02	c
1,1-Dichloroethane	NP	2.3E-02	8.3E-02	
1,2-Dichloroethene (total)	NP	2.9E-02	5.6E-02	
2-Butanone	NP	3.7E-02	3.7E-02	e
Acetone	NP	5.2E-01	2.6E+00	
Methylene chloride	NP	4.1E-01	2.6E+00	
Tetrachloroethene	NP	4.1E-02	2.0E-01	
Toluene	NP	3.2E-01	2.2E+00	
Trichloroethene	NP	1.0E-01	6.2E-01	
Xylenes (total)	NP	7.5E-02	4.2E-01	
SVOCs				
Acenaphthene	NP	7.8E-02	1.9E-01	d
Acenaphthylene	NP	3.8E-02	8.5E-02	d
Anthracene	NP	1.6E-01	6.5E-01	d
Benzo(a)anthracene	NP	5.5E-01	4.6E+00	d
Benzo(a)pyrene	NP	5.9E-01	5.0E+00	d
Benzo(b)fluoranthene	NP	5.4E-01	4.4E+00	d
Benzo(e)pyrene	NP	2.2E-02	6.1E-02	d
Benzo(g,h,i)perylene	NP	2.1E-01	1.5E+00	d
Benzo(k)fluoranthene	NP	5.8E-01	4.9E+00	d
Chrysene	NP	4.2E-01	4.1E+00	d
Dibenz(a,h)anthracene	NP	1.1E-01	7.3E-01	d
Dibenzofuran	NP	9.8E-02	1.2E-01	
Fluoranthene	NP	9.7E-01	8.3E+00	d
Fluorene	NP	7.9E-02	2.0E-01	d
Indeno(1,2,3-cd)pyrene	NP	2.7E-01	2.1E+00	d
Perylene	NP	1.2E-02	3.5E-02	d
Phenanthrene	NP	4.8E-01	1.9E+00	d
Pyrene	NP	8.1E-01	6.9E+00	d

Spreadsheet C3-101a (2 of 3)

Exposure Point Concentrations for CPECs in Soil/Sediment (0-4 feet bgs) - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Chemical	Distribution Type	EPCs	
		CTE[a] (mg/kg)	RME[b] (mg/kg)
Total Petroleum Hydrocarbons			
C11-C14(Kerosene Range)	NP	8.9E+00	4.0E+01
C14-C20(Diesel Range)	LN	8.3E+00	1.4E+01
C20-C30(Lubricant Oil Range)	NP	8.8E+01	4.7E+02
PCDD/PCDFs			
2,3,7,8-TCDD	N	2.3E-07	4.4E-07
1,2,3,7,8-PeCDD	N	8.9E-07	1.8E-06
1,2,3,4,7,8-HxCDD	N	3.3E-06	7.2E-06
1,2,3,6,7,8-HxCDD	N	1.3E-05	2.4E-05
1,2,3,7,8,9-HxCDD	N	4.7E-06	9.4E-06
1,2,3,4,6,7,8-HpCDD	N	4.5E-04	9.5E-04
OCDD	N	6.7E-03	1.4E-02
2,3,7,8-TCDF	N	4.5E-07	7.9E-07
1,2,3,7,8-PeCDF	N	2.3E-07	4.6E-07
2,3,4,7,8-PeCDF	N	6.6E-07	1.3E-06
1,2,3,4,7,8-HxCDF	N	1.4E-06	2.8E-06
1,2,3,6,7,8-HxCDF	N	1.2E-06	2.5E-06
2,3,4,6,7,8-HxCDF	N	3.1E-06	6.9E-06
1,2,3,7,8,9-HxCDF	G	3.0E-07	9.7E-07
1,2,3,4,6,7,8-HpCDF	N	4.2E-05	8.0E-05
1,2,3,4,7,8,9-HpCDF	N	3.9E-06	7.6E-06
OCDF	N	1.1E-04	2.0E-04
PCBs			
Aroclor-1254	NP	1.6E-01	4.3E-01
Aroclor-1260	NP	1.3E+00	7.0E+00
PCB-105	NP	1.1E-04	5.6E-04
PCB-114	NP	2.1E-06	1.0E-05
PCB-118	NP	2.2E-04	1.1E-03
PCB-123	NP	3.1E-06	1.6E-05
PCB-126	NP	8.4E-06	4.4E-05
PCB-156	NP	7.2E-05	3.8E-04
PCB-157	NP	3.2E-05	1.7E-04
PCB-167	NP	5.5E-05	2.9E-04
PCB-169	NP	8.2E-07	4.4E-06
PCB-189	NP	8.2E-06	4.4E-05
PCB-77	NP	1.7E-05	8.8E-05
PCB-81	NP	3.0E-06	1.6E-05

Notes:
a. Either the arithmetic mean concentration for two or more samples or the reported concentration for a single sample.

Spreadsheet C3-101a (3 of 3)

Exposure Point Concentrations for CPECs in Soil/Sediment (0-4 feet bgs) - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Chemical	Distribution Type	EPCs	
		CTE[a] (mg/kg)	RME[b] (mg/kg)

b. Either the 95% upper confidence limit (95% UCL) on the arithmetic mean for three or more samples, or the maximum concentration for less than three samples, or the maximum concentration in cases where the 95% UCL exceeds the maximum concentration.

c. Exposure point concentrations estimated at one-half the sample quantitation limit for soil at 0 to 4 feet bgs.
at 0 to 6 feet bgs.

d. Exposure point concentrations estimated in part following the methods for extrapolation of total petroleum hydrocarbons to petroleum constituents as described in Section 2.8 of the SRAM and as presented in Spreadsheet D-97.

e. CTE exposure point concentrations estimated to equal the RME because the mean is greater than RME exposure point concentration.

CPEC - chemical of potential ecological concern
EPC - exposure point concentration
CTE - central tendency exposure
RME - reasonable maximum exposure
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCDD/PCDF - polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.
N - normal distribution
LN - lognormal distribution
NP - non-parametric distribution
G - gamma distribution
NT - data not tested for distribution due to sample size
"-" not applicable
mg/kg - milligrams per kilogram
bgs- below ground surface

Spreadsheet C3-100c (1 of 3)

Exposure Point Concentrations for CPECs in Sediment ONLY (0-2 feet bgs) - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Chemical	Distribution Type	EPCs		
		CTE[a] (mg/kg)	RME[b] (mg/kg)	
Inorganic Compounds				
Cadmium	LN	8.9E-01	4.6E+00	
Copper	NP	3.7E+01	6.6E+01	
Lead	NP	2.5E+01	5.1E+01	
Mercury	LN	6.0E-01	1.1E+00	
Silver	NP	1.4E-01	1.4E-01	d
Thallium	NP	1.6E-01	1.6E-01	d
Zinc	NP	2.9E+02	6.6E+02	
VOCs				
1,1,2-Trichloro-1,2,2-trifluoroethane	NT	1.2E-02	1.2E-02	c
1,2-Dichloroethene (total)	NP	3.7E-02	8.9E-02	
Tetrachloroethene	NP	3.1E-02	7.0E-02	
Toluene	NP	8.6E-02	4.2E-01	
Trichloroethene	NP	5.6E-02	2.2E-01	
Xylenes (total)	NP	3.2E-02	4.5E-02	
SVOCs				
Acenaphthene	NP	7.4E-03	7.4E-03	d,
Acenaphthylene	NP	1.5E-03	1.5E-03	d,
Anthracene	NP	4.0E-03	4.0E-03	d,
Benzo(a)anthracene	NP	8.5E-02	1.7E-01	e
Benzo(a)pyrene	NP	8.5E-02	1.7E-01	e
Benzo(b)fluoranthene	NP	1.2E-01	3.3E-01	e
Benzo(e)pyrene	NP	3.4E-03	3.4E-03	e
Benzo(g,h,i)perylene	NP	8.5E-02	1.7E-01	e
Benzo(k)fluoranthene	NP	2.7E-05	2.7E-05	d,
Chrysene	NP	1.0E-01	2.6E-01	e
Dibenz(a,h)anthracene	NP	2.3E-04	2.3E-04	d,
Fluoranthene	NP	1.4E-01	4.6E-01	e
Fluorene	NP	1.0E-02	1.0E-02	d,
Indeno(1,2,3-cd)pyrene	NP	8.1E-02	1.5E-01	e
Perylene	NP	1.9E-03	1.9E-03	e
Phenanthrene	LN	9.2E-02	1.9E-01	e
Pyrene	NP	1.2E-01	3.5E-01	e

Spreadsheet C3-100c (2 of 3)

Exposure Point Concentrations for CPECs in Sediment ONLY (0-2 feet bgs) - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Chemical	Distribution Type	EPCs	
		CTE[a] (mg/kg)	RME[b] (mg/kg)
PCDD/PCDFs			
2,3,7,8-TCDD	N	5.3E-07	5.3E-07
1,2,3,7,8-PeCDD	N	2.2E-06	2.2E-06
1,2,3,4,7,8-HxCDD	N	1.0E-05	1.0E-05
1,2,3,6,7,8-HxCDD	N	3.0E-05	3.0E-05
1,2,3,7,8,9-HxCDD	N	1.0E-05	1.0E-05
1,2,3,4,6,7,8-HpCDD	N	1.3E-03	1.3E-03
OCDD	N	1.9E-02	1.9E-02
2,3,7,8-TCDF	N	7.9E-07	7.9E-07
1,2,3,7,8-PeCDF	N	5.8E-07	5.8E-07
2,3,4,7,8-PeCDF	N	1.6E-06	1.6E-06
1,2,3,4,7,8-HxCDF	N	3.7E-06	3.7E-06
1,2,3,6,7,8-HxCDF	N	3.4E-06	3.4E-06
2,3,4,6,7,8-HxCDF	N	1.0E-05	1.0E-05
1,2,3,7,8,9-HxCDF	G	9.7E-07	9.7E-07
1,2,3,4,6,7,8-HpCDF	N	1.0E-04	1.0E-04
1,2,3,4,7,8,9-HpCDF	N	1.0E-05	1.0E-05
OCDF	N	2.4E-04	2.4E-04
PCBs			
Aroclor-1254	NP	7.8E-02	1.1E-01
Aroclor-1260	NP	1.1E-01	1.8E-01
PCB-105	NP	1.0E-05	1.5E-05
PCB-114	NP	3.5E-07	5.0E-07
PCB-118	NP	2.1E-05	2.9E-05
PCB-123	NP	2.8E-07	4.2E-07
PCB-126	NP	7.4E-07	1.1E-06
PCB-156	NP	6.3E-06	9.8E-06
PCB-157	NP	2.8E-06	4.4E-06
PCB-167	NP	4.8E-06	7.7E-06
PCB-169	NP	7.2E-08	1.1E-07
PCB-189	NP	7.2E-07	1.1E-06
PCB-77	NP	1.5E-06	2.3E-06
PCB-81	NP	2.7E-07	4.1E-07

Notes:

a. Either the arithmetic mean concentration for two or more samples or the reported concentration for a single sample.

b. Either the 95% upper confidence limit (95% UCL) on the arithmetic mean for three or more samples, or the maximum concentration for less than three samples, or the maximum concentration in cases where the 95% UCL exceeds the maximum concentration.

Spreadsheet C3-100c (3 of 3)

Exposure Point Concentrations for CPECs in Sediment ONLY (0-2 feet bgs) - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Chemical	Distribution Type	EPCs	
		CTE[a] (mg/kg)	RME[b] (mg/kg)

c. Exposure point concentrations estimated at one-half the sample quantitation limit for soil at 0 to 2 feet bgs.
d. CTE exposure point concentrations estimated to equal the RME because the mean is greater than RME exposure point concentration.
e. Exposure point concentrations estimated following the methods for extrapolation of total petroleum hydrocarbons to petroleum constituents as described in Section 2.8 of the SRAM and as presented in Spreadsheet D-95.
CPEC - chemical of potential ecological concern
EPC - exposure point concentration
CTE - Central Tendency Exposure
RME - Reasonable Maximum Exposure
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCDD/PCDF - polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.
LN - lognormal distribution
NP - non-parametric distribution
G - gamma distribution
NT - data not tested for distribution due to sample size
"-" not applicable
mg/kg - milligrams per kilogram
bgs- below ground surface

Spreadsheet C3-100b (1 of 3)

Exposure Point Concentrations for CPECs in Soil ONLY (0-2 feet bgs) - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Chemical	Distribution Type	EPCs		
		CTE[a] (mg/kg)	RME[b] (mg/kg)	
Inorganic Compounds				
Cadmium	LN	2.4E-01	4.2E-01	
Copper	NP	9.9E+00	2.0E+01	
Lead	NP	9.3E+00	1.3E+01	
Mercury	LN	2.1E+00	5.5E+00	
Methyl mercury	NT	1.7E-03	3.6E-03	
Silver	NP	1.0E+00	2.7E+00	
Thallium	NP	3.3E-01	3.3E-01	d
Zinc	NP	8.4E+01	1.9E+02	
VOCs				
1,1,2-Trichloro-1,2,2-trifluoroethane	NT	1.2E-02	1.2E-02	c
2-Butanone	NP	2.1E-02	3.5E-02	
Acetone	NP	1.1E+00	5.2E+00	
Methylene chloride	NP	1.0E-02	1.3E-02	
SVOCs				
Acenaphthene	NP	2.6E-02	1.1E-01	e
Acenaphthylene	NP	4.6E-03	1.6E-02	e
Anthracene	NP	1.8E-02	7.3E-02	e
Benzo(a)anthracene	NP	2.8E-03	8.8E-03	e
Benzo(a)pyrene	NP	3.0E-03	8.9E-03	e
Benzo(b)fluoranthene	NP	4.3E-03	1.1E-02	e
Benzo(e)pyrene	NP	2.0E-02	6.7E-02	e
Benzo(g,h,i)perylene	NP	1.2E-02	4.4E-02	e
Benzo(k)fluoranthene	NP	2.8E-03	8.3E-03	e
Chrysene	NP	5.1E-03	1.2E-02	e
Dibenz(a,h)anthracene	NP	1.9E-03	6.9E-03	e
Fluoranthene	NP	5.6E-03	1.2E-02	e
Fluorene	NP	2.6E-02	1.1E-01	e
Indeno(1,2,3-cd)pyrene	NP	2.7E-03	8.5E-03	e
Perylene	NP	1.1E-02	3.8E-02	e
Phenanthrene	LN	7.1E-02	3.0E-01	e
Pyrene	NP	8.2E-03	2.8E-02	e
Total Petroleum Hydrocarbons				
C11-C14(Kerosene Range)	NP	1.0E+01	4.0E+01	
C20-C30(Lubricant Oil Range)	NP	7.8E+01	4.7E+02	

Spreadsheet C3-100b (2 of 3)

Exposure Point Concentrations for CPECs in Soil ONLY (0-2 feet bgs) - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Chemical	Distribution Type	EPCs	
		CTE[a] (mg/kg)	RME[b] (mg/kg)
PCDD/PCDFs			
2,3,7,8-TCDD	N	1.9E-07	4.0E-07
1,2,3,7,8-PeCDD	N	7.3E-07	1.5E-06
1,2,3,4,7,8-HxCDD	N	2.1E-06	4.2E-06
1,2,3,6,7,8-HxCDD	N	1.1E-05	2.0E-05
1,2,3,7,8,9-HxCDD	N	4.5E-06	1.0E-05
1,2,3,4,6,7,8-HpCDD	N	3.1E-04	5.0E-04
OCDD	N	5.0E-03	7.3E-03
2,3,7,8-TCDF	N	4.7E-07	7.9E-07
1,2,3,7,8-PeCDF	N	1.8E-07	3.9E-07
2,3,4,7,8-PeCDF	N	5.4E-07	9.9E-07
1,2,3,4,7,8-HxCDF	N	1.2E-06	1.8E-06
1,2,3,6,7,8-HxCDF	N	9.5E-07	1.8E-06
2,3,4,6,7,8-HxCDF	N	1.8E-06	3.0E-06
1,2,3,7,8,9-HxCDF	G	1.6E-07	1.8E-07
1,2,3,4,6,7,8-HpCDF	N	3.7E-05	5.0E-05
1,2,3,4,7,8,9-HpCDF	N	3.2E-06	4.2E-06
OCDF	N	1.0E-04	1.5E-04
PCBs			
Aroclor-1254	NP	1.7E-01	4.3E-01
Aroclor-1260	NP	1.5E+00	7.8E+00
PCB-105	NP	1.3E-04	6.4E-04
PCB-114	NP	2.4E-06	1.1E-05
PCB-118	NP	2.5E-04	1.3E-03
PCB-123	NP	3.5E-06	1.8E-05
PCB-126	NP	9.6E-06	5.0E-05
PCB-156	NP	8.3E-05	4.3E-04
PCB-157	NP	3.6E-05	1.9E-04
PCB-167	NP	6.3E-05	3.3E-04
PCB-169	NP	9.4E-07	5.0E-06
PCB-189	NP	9.4E-06	5.0E-05
PCB-77	NP	1.9E-05	9.9E-05
PCB-81	NP	3.4E-06	1.8E-05

Notes:

a. Either the arithmetic mean concentration for two or more samples or the reported concentration for a single sample.

b. Either the 95% upper confidence limit (95% UCL) on the arithmetic mean for three or more samples, or the maximum concentration for less than three samples, or the maximum concentration in cases where the 95% UCL exceeds the maximum concentration.

Spreadsheet C3-100b (3 of 3)

Exposure Point Concentrations for CPECs in Soil ONLY (0-2 feet bgs) - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Chemical	Distribution Type	EPCs	
		CTE[a] (mg/kg)	RME[b] (mg/kg)

c. Exposure point concentrations estimated at one-half the sample quantitation limit for soil at 0 to 2 feet bgs.
d. CTE exposure point concentrations estimated to equal the RME because the mean is greater than RME exposure point concentration.
e. Exposure point concentrations estimated following the methods for extrapolation of total petroleum hydrocarbons to petroleum constituents as described in Section 2.8 of the SRAM and as presented in Spreadsheet D-95.
CPEC - chemical of potential ecological concern
EPC - exposure point concentration
CTE - Central Tendency Exposure
RME - Reasonable Maximum Exposure
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCDD/PCDF - polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.
LN - lognormal distribution
NP - non-parametric distribution
G - gamma distribution
NT - data not tested for distribution due to sample size
"-" not applicable
mg/kg - milligrams per kilogram
bgs- below ground surface

Exposure Point Concentrations for CPECs in Soil/Sediment (0-2 feet bgs) - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Chemical	Distribution Type	EPCs		
		CTE[a] (mg/kg)	RME[b] (mg/kg)	
Inorganic Compounds				
Cadmium	LN	5.1E-01	1.1E+00	
Copper	NP	2.1E+01	4.6E+01	
Lead	NP	1.6E+01	3.4E+01	
Mercury	LN	1.9E+00	4.4E+00	
Methyl mercury	NT	1.7E-03	3.6E-03	
Silver	NP	7.7E-01	2.9E+00	
Thallium	NP	3.3E-01	3.3E-01	d
Zinc	NP	1.7E+02	4.4E+02	
VOCs				
1,1,2-Trichloro-1,2,2-trifluoroethane	NT	1.2E-02	1.2E-02	c
1,2-Dichloroethene (total)	NP	2.8E-02	7.0E-02	
2-Butanone	NP	3.7E-02	3.7E-02	d
Acetone	NP	6.8E-01	4.2E+00	
Methylene chloride	NP	1.3E-02	1.3E-02	d
Tetrachloroethene	NP	2.1E-02	8.8E-02	
Toluene	NP	5.6E-02	3.4E-01	
Trichloroethene	NP	3.7E-02	2.0E-01	
Xylenes (total)	NP	2.5E-02	5.1E-02	
SVOCs				
Acenaphthene	NP	4.4E-02	1.0E-01	e
Acenaphthylene	NP	3.1E-02	8.5E-02	e
Anthracene	NP	3.9E-02	8.2E-02	e
Benzo(a)anthracene	NP	3.6E-02	1.5E-01	e
Benzo(a)pyrene	NP	3.6E-02	1.5E-01	e
Benzo(b)fluoranthene	NP	4.9E-02	2.7E-01	e
Benzo(e)pyrene	NP	1.9E-02	6.3E-02	e
Benzo(g,h,i)perylene	NP	4.1E-02	9.0E-02	e
Benzo(k)fluoranthene	NP	3.0E-02	8.5E-02	e
Chrysene	NP	4.4E-02	2.2E-01	e
Dibenz(a,h)anthracene	NP	2.9E-02	8.5E-02	e
Fluoranthene	NP	6.0E-02	3.8E-01	e
Fluorene	NP	4.4E-02	1.0E-01	e
Indeno(1,2,3-cd)pyrene	NP	3.4E-02	1.4E-01	e
Perylene	NP	1.1E-02	3.6E-02	d
Phenanthrene	LN	7.9E-02	2.0E-01	e
Pyrene	NP	5.3E-02	1.6E-01	e
Total Petroleum Hydrocarbons				
C11-C14(Kerosene Range)	NP	9.7E+00	4.0E+01	
C20-C30(Lubricant Oil Range)	NP	7.3E+01	4.7E+02	

Exposure Point Concentrations for CPECs in Soil/Sediment (0-2 feet bgs) - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Chemical	Distribution Type	EPCs	
		CTE[a] (mg/kg)	RME[b] (mg/kg)
PCDD/PCDFs			
2,3,7,8-TCDD	N	2.7E-07	5.3E-07
1,2,3,7,8-PeCDD	N	1.1E-06	2.2E-06
1,2,3,4,7,8-HxCDD	N	4.1E-06	9.0E-06
1,2,3,6,7,8-HxCDD	N	1.6E-05	3.0E-05
1,2,3,7,8,9-HxCDD	N	5.9E-06	1.0E-05
1,2,3,4,6,7,8-HpCDD	N	5.7E-04	1.2E-03
OCDD	N	8.4E-03	1.7E-02
2,3,7,8-TCDF	N	5.5E-07	7.9E-07
1,2,3,7,8-PeCDF	N	2.8E-07	5.7E-07
2,3,4,7,8-PeCDF	N	8.2E-07	1.6E-06
1,2,3,4,7,8-HxCDF	N	1.8E-06	3.3E-06
1,2,3,6,7,8-HxCDF	N	1.6E-06	3.2E-06
2,3,4,6,7,8-HxCDF	N	3.8E-06	8.8E-06
1,2,3,7,8,9-HxCDF	G	3.6E-07	9.7E-07
1,2,3,4,6,7,8-HpCDF	N	5.3E-05	9.6E-05
1,2,3,4,7,8,9-HpCDF	N	4.9E-06	9.2E-06
OCDF	N	1.4E-04	2.4E-04
PCBs			
Aroclor-1254	NP	1.6E-01	4.3E-01
Aroclor-1260	NP	1.3E+00	7.3E+00
PCB-105	NP	1.1E-04	5.6E-04
PCB-114	NP	2.2E-06	1.0E-05
PCB-118	NP	2.3E-04	1.1E-03
PCB-123	NP	3.2E-06	1.6E-05
PCB-126	NP	8.8E-06	4.4E-05
PCB-156	NP	7.5E-05	3.8E-04
PCB-157	NP	3.3E-05	1.7E-04
PCB-167	NP	5.7E-05	2.9E-04
PCB-169	NP	8.6E-07	4.4E-06
PCB-189	NP	8.6E-06	4.4E-05
PCB-77	NP	1.8E-05	8.8E-05
PCB-81	NP	3.1E-06	1.6E-05

Notes:

a. Either the arithmetic mean concentration for two or more samples or the reported concentration for a single sample.

b. Either the 95% upper confidence limit (95% UCL) on the arithmetic mean for three or more samples, or the maximum concentration for less than three samples, or the maximum concentration in cases where the 95% UCL exceeds the maximum

Exposure Point Concentrations for CPECs in Soil/Sediment (0-2 feet bgs) - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Chemical	Distribution Type	EPCs	
		CTE[a] (mg/kg)	RME[b] (mg/kg)

concentration.

c. Exposure point concentrations estimated at one-half the sample quantitation limit for soil at 0 to 2 feet bgs.

d. CTE exposure point concentrations estimated to equal the RME because the mean is greater than RME exposure point concentration.

e. Exposure point concentrations estimated following the methods for extrapolation of total petroleum hydrocarbons to petroleum constituents as described in Section 2.8 of the SRAM and as presented in Spreadsheet D-95.

CPEC - chemical of potential ecological concern
EPC - exposure point concentration
CTE - Central Tendency Exposure
RME - Reasonable Maximum Exposure
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCDD/PCDF - polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.
LN - lognormal distribution
NP - non-parametric distribution
G - gamma distribution
NT - data not tested for distribution due to sample size
"-" not applicable
mg/kg - milligrams per kilogram
bgs- below ground surface

Spreadsheet C3-99 (1 of 2)

Assessment and Measurement Endpoints
Sodium Reactor Experiment (SRE) Area

Assessment Goal	Assessment Endpoint	Measurement Endpoint	Measurement Endpoint Measure of Effect
Protect wildlife, fish, invertebrate, and plant species from acute or chronic effects resulting from site-related chemicals	Protect the abundance of native terrestrial vegetation by limiting acute and chronic adverse effects from exposure to site-related CPECs.		Characterize native plant abundance through site-specific observational surveys of plant communities
	Protect the abundance of terrestrial invertebrate community by limiting acute and chronic adverse effects from exposure to site-related CPECs.	CPEC concentrations in soil	Compare CPEC concentrations to TRVs for soil invertebrates
	Protect avian species from acute or chronic health effects (direct and/or secondary effects) related to CPEC exposure	Calculate daily dosage to red-tailed hawk and thrush using exposure model	Compare NOAEL dosages for the red-tailed hawk or similar raptor species
	Protect bobcat from acute or chronic health effects related to CPEC exposure	Calculate daily CPEC dosage to bobcat using exposure model	Compare CPEC doses to TRVs for bobcat or similar species
	Protect deer from acute or chronic health effects related to secondary exposures to CPEC	Calculate daily CPEC dosage to mule deer using exposure model	Compare CPEC doses to TRVs for mule deer or similar species
	Protect prey abundance of raptor and bobcat prey items (rodents, invertebrates) from direct exposure to CPEC	Calculated daily CPEC dosage to deer mouse using exposure model	Compare CPEC doses to TRVs for the deer mouse or similar species

Spreadsheet C3-99 (2 of 2)

Assessment and Measurement Endpoints
Sodium Reactor Experiment (SRE) Area

Assessment Goal	Assessment Endpoint	Measurement Endpoint	
		Measurement Endpoint	Measure of Effect
Protect wildlife, fish, invertebrate, and plant species from acute or chronic effects resulting from site-related chemicals	Protect the abundance of great blue heron prey items (e.g., fish,) by limiting acute and chronic adverse effects from direct and/or secondary exposure to site-related	Measure contaminant concentrations in surface water and sediment.	Compare to NOAEL concentrations or NOAEL dosages for prey species.
	Protect great blue heron from acute (mortality) and chronic (e.g., reproductive impairment) adverse effects from direct and/or secondary exposure to site-related CPECs.	Calculate daily dosage to great blue heron using exposure models, measured chemical concentrations in abiotic and bitoic media, and food web interactions.	Compare to NOAEL dosages for the great blue heron or similar bird species.
	Protect the abundance of benthic invertebrate community by limiting acute and chronic adverse effects from exposure to site-related CPECs.	Measure contaminant concentrations in sediments. SSFL-specific BCFs have been calculated for use at other investigational units using concentrations measured in co-located surface water, sediment, and aquatic invertebrate	Compare to LOAEL concentrations for benthic invertebrate communities.
	Protect the abundance of wetland and aquatic vegetation by limiting acute and chronic adverse effects from exposure to site-related CPECs.	Note any stressed vegetation or reduced density of vegetation. SSFL-specific BCFs have been calculated for use at other investigational units using concentrations measured in co-located surface water, sediment, and aquatic plant samples.	Indicators of wetland habitat quality (e.g., vegetation survey results).

Notes:
BCF = Bioconcentration factor
CPEC = chemicals of potential ecological concern
NOAEL = no observable adverse effect level
LOAEL = lowest observable adverse effect level

Summary of Habitats
Sodium Reactor Experiment (SRE) Area

Habitat	Species Potentially Present	Observed Species[a]	Relative Occurrrence	Status[b]	Representative Ecological Receptor
Aquatic	aquatic biota	aquatic biota	common	none	generic
	sediment dwelling invertebrates	sediment dwelling invertebrates	common	none	generic
	great blue heron		uncommon	none	great blue heron
Coast live oak woodland	deer	mule deer	common	none	mule deer
	coast live oak		common	none	bobcat
	bobcat				
	plants				
Nonnative grassland	invertebrates	invertebrates	common	none	earthworm
	rodents	rodents	common	none	deer mouse
	small birds		common	none	thrush
	raptors	raptors	uncommon	none	red-tailed hawk
	deer	mule deer	common	none	mule deer
			uncommon	none	bobcat
Scrub	invertebrates	invertebrates	common	none	earthworm
	rodents		common	none	deer mouse
	small birds		common	none	thrush
	raptors		uncommon	none	red-tailed hawk
	deer		common	none	mule deer
			uncommon	none	bobcat
Ruderal habitat	invertebrates	invertebrates rodents	common	none	earth worm
	rodents		common	none	deer mouse

Notes:
a. Relative to other habitat types within the RFI site.
b. Listed state or federal threatened or endangered species, or proposed for listing.

PCDD/PCDF Congener Group Summation for Soil/Sediment (0-6 feet bgs)
Sodium Reactor Experiment (SRE) Area

EPA ID	PCDD/PCDF Congener	Measured Concentration [a] (mg/kg)	Data Qualifier	Adjusted Concentration [b] (mg/kg)	Sum of PCDD/PCDF Congener Concentrations				
					Total Tetra (mg/kg)	Total Penta (mg/kg)	Total Hexa (mg/kg)	Total Hepta (mg/kg)	Total Octa (mg/kg)
MJ636	1,2,3,4,6,7,8-HpCDD	1.3E-03		1.3E-03	1.3E-06	4.4E-06	6.8E-05	1.4E-03	1.9E-02
MJ636	1,2,3,4,6,7,8-HpCDF	1.0E-04	J	1.0E-04					
MJ636	1,2,3,4,7,8,9-HpCDF	1.0E-05		1.0E-05					
MJ636	1,2,3,4,7,8-HxCDD	1.0E-05		1.0E-05					
MJ636	1,2,3,4,7,8-HxCDF	3.7E-06		3.7E-06					
MJ636	1,2,3,6,7,8-HxCDD	3.0E-05		3.0E-05					
MJ636	1,2,3,6,7,8-HxCDF	3.4E-06		3.4E-06					
MJ636	1,2,3,7,8,9-HxCDD	1.0E-05		1.0E-05					
MJ636	1,2,3,7,8,9-HxCDF	9.7E-07	J	9.7E-07					
MJ636	1,2,3,7,8-PeCDD	2.2E-06	J	2.2E-06					
MJ636	1,2,3,7,8-PeCDF	5.8E-07	J	5.8E-07					
MJ636	2,3,4,6,7,8-HxCDF	1.0E-05		1.0E-05					
MJ636	2,3,4,7,8-PeCDF	1.6E-06	J	1.6E-06					
MJ636	2,3,7,8-TCDD	5.3E-07		5.3E-07					
MJ636	2,3,7,8-TCDF	7.9E-07	J	7.9E-07					
MJ636	OCDD	1.9E-02		1.9E-02					
MJ636	OCDF	2.4E-04		2.4E-04					
MJ637	1,2,3,4,6,7,8-HpCDD	1.0E-06	J	1.0E-06	8.6E-08	1.7E-07	5.2E-07	1.2E-06	1.0E-05
MJ637	1,2,3,4,6,7,8-HpCDF	2.0E-07	UJ	9.8E-08					
MJ637	1,2,3,4,7,8,9-HpCDF	1.3E-07	U	6.6E-08					
MJ637	1,2,3,4,7,8-HxCDD	2.1E-07	U	1.0E-07					
MJ637	1,2,3,4,7,8-HxCDF	7.8E-08	U	3.9E-08					
MJ637	1,2,3,6,7,8-HxCDD	2.2E-07	U	1.1E-07					
MJ637	1,2,3,6,7,8-HxCDF	7.8E-08	U	3.9E-08					
MJ637	1,2,3,7,8,9-HxCDD	2.1E-07	U	1.0E-07					
MJ637	1,2,3,7,8,9-HxCDF	1.6E-07	U	7.9E-08					
MJ637	1,2,3,7,8-PeCDD	1.0E-07	U	5.2E-08					
MJ637	1,2,3,7,8-PeCDF	1.3E-07	U	6.3E-08					
MJ637	2,3,4,6,7,8-HxCDF	9.2E-08	U	4.6E-08					
MJ637	2,3,4,7,8-PeCDF	1.2E-07	U	6.0E-08					
MJ637	2,3,7,8-TCDD	7.5E-08	U	3.8E-08					
MJ637	2,3,7,8-TCDF	9.7E-08	U	4.9E-08					
MJ637	OCDD	1.0E-05		1.0E-05					
MJ637	OCDF	2.8E-07	U	1.4E-07					
MJ645	1,2,3,4,6,7,8-HpCDD	1.2E-04		1.2E-04	5.8E-07	8.1E-07	7.9E-06	1.3E-04	1.8E-03
MJ645	1,2,3,4,6,7,8-HpCDF	1.0E-05		1.0E-05					
MJ645	1,2,3,4,7,8,9-HpCDF	1.1E-06	J	1.1E-06					
MJ645	1,2,3,4,7,8-HxCDD	1.1E-06	J	1.1E-06					
MJ645	1,2,3,4,7,8-HxCDF	7.5E-07	J	7.5E-07					
MJ645	1,2,3,6,7,8-HxCDD	3.2E-06		3.2E-06					
MJ645	1,2,3,6,7,8-HxCDF	4.5E-07	J	4.5E-07					
MJ645	1,2,3,7,8,9-HxCDD	1.5E-06	J	1.5E-06					
MJ645	1,2,3,7,8,9-HxCDF	4.1E-07	U	2.0E-07					
MJ645	1,2,3,7,8-PeCDD	3.2E-07	J	3.2E-07					
MJ645	1,2,3,7,8-PeCDF	1.7E-07	UJ	8.3E-08					
MJ645	2,3,4,6,7,8-HxCDF	8.0E-07	J	8.0E-07					
MJ645	2,3,4,7,8-PeCDF	4.1E-07	J	4.1E-07					
MJ645	2,3,7,8-TCDD	1.3E-07	U	6.4E-08					
MJ645	2,3,7,8-TCDF	5.2E-07	J	5.2E-07					
MJ645	OCDD	1.8E-03		1.8E-03					
MJ645	OCDF	3.0E-05		3.0E-05					

PCDD/PCDF Congener Group Summation for Soil/Sediment (0-6 feet bgs)
Sodium Reactor Experiment (SRE) Area

EPA ID	PCDD/PCDF Congener	Measured Concentration [a] (mg/kg)	Data Qualifier	Adjusted Concentration [b] (mg/kg)	Sum of PCDD/PCDF Congener Concentrations				
					Total Tetra (mg/kg)	Total Penta (mg/kg)	Total Hexa (mg/kg)	Total Hepta (mg/kg)	Total Octa (mg/kg)
MJ776	1,2,3,4,6,7,8-HpCDD	3.2E-04		3.2E-04	2.0E-07	6.5E-07	1.6E-05	3.7E-04	7.5E-03
MJ776	1,2,3,4,6,7,8-HpCDF	5.0E-05		5.0E-05					
MJ776	1,2,3,4,7,8,9-HpCDF	4.1E-06		4.1E-06					
MJ776	1,2,3,4,7,8-HxCDD	1.2E-06	J	1.2E-06					
MJ776	1,2,3,4,7,8-HxCDF	9.1E-07	J	9.1E-07					
MJ776	1,2,3,6,7,8-HxCDD	1.0E-05		1.0E-05					
MJ776	1,2,3,6,7,8-HxCDF	5.6E-07	J	5.6E-07					
MJ776	1,2,3,7,8,9-HxCDD	2.2E-06	J	2.2E-06					
MJ776	1,2,3,7,8,9-HxCDF	2.0E-07	U	9.8E-08					
MJ776	1,2,3,7,8-PeCDD	3.8E-07	J	3.8E-07					
MJ776	1,2,3,7,8-PeCDF	1.1E-07	U	5.6E-08					
MJ776	2,3,4,6,7,8-HxCDF	1.6E-06	J	1.6E-06					
MJ776	2,3,4,7,8-PeCDF	2.2E-07	J	2.2E-07					
MJ776	2,3,7,8-TCDD	1.9E-07	UJ	9.4E-08					
MJ776	2,3,7,8-TCDF	2.2E-07	U	1.1E-07					
MJ776	OCDD	7.3E-03		7.3E-03					
MJ776	OCDF	1.5E-04		1.5E-04					
MJ777	1,2,3,4,6,7,8-HpCDD	5.0E-04		5.0E-04	1.2E-06	2.9E-06	4.1E-05	5.5E-04	5.9E-03
MJ777	1,2,3,4,6,7,8-HpCDF	5.0E-05		5.0E-05					
MJ777	1,2,3,4,7,8,9-HpCDF	4.2E-06		4.2E-06					
MJ777	1,2,3,4,7,8-HxCDD	4.2E-06		4.2E-06					
MJ777	1,2,3,4,7,8-HxCDF	1.8E-06	J	1.8E-06					
MJ777	1,2,3,6,7,8-HxCDD	2.0E-05		2.0E-05					
MJ777	1,2,3,6,7,8-HxCDF	1.8E-06	J	1.8E-06					
MJ777	1,2,3,7,8,9-HxCDD	1.0E-05		1.0E-05					
MJ777	1,2,3,7,8,9-HxCDF	1.8E-07	J	1.8E-07					
MJ777	1,2,3,7,8-PeCDD	1.5E-06	J	1.5E-06					
MJ777	1,2,3,7,8-PeCDF	3.9E-07	J	3.9E-07					
MJ777	2,3,4,6,7,8-HxCDF	3.0E-06		3.0E-06					
MJ777	2,3,4,7,8-PeCDF	9.9E-07	J	9.9E-07					
MJ777	2,3,7,8-TCDD	4.0E-07	J	4.0E-07					
MJ777	2,3,7,8-TCDF	7.9E-07	J	7.9E-07					
MJ777	OCDD	5.8E-03		5.8E-03					
MJ777	OCDF	1.2E-04		1.2E-04					

Maximum of Total Summed Congener Concentrations

Total Tetra	1.3E-06
Total Penta	4.4E-06
Total Hexa	6.8E-05
Total Hepta	1.4E-03
Total Octa	1.9E-02

Notes:

a. Measured concentration - concentration reported by the analytial laboratory

b. Adjusted concentration - concentration reported by the analytical laboratory if the chemical was detected, or estimated at one-half the sample quantitation limit (SQL) if not detected.

PCDD/PCDF - polychlorinated dibenzo-p-dioxins and dibenzofurans

Total Tetra - sum of the 2,3,7,8-substituted tetraclorinated dibenzo-p-dioxin and dibenzofuran congeners.

Total Penta - sum of the 2,3,7,8-substituted pentaclorinated dibenzo-p-dioxin and dibenzofuran congeners.

Total Hexa - sum of the 2,3,7,8-substituted hexaclorinated dibenzo-p-dioxin and dibenzofuran congeners.

Total Hepta - sum of the 2,3,7,8-substituted heptaclorinated dibenzo-p-dioxin and dibenzofuran congeners.

Total Octa - sum of the 2,3,7,8-substituted Octaclorinated dibenzo-p-dioxin and dibenzofuran congeners.

J - concentration estimated

U - not detected. Concentration shown is the SQL.

UJ - not detected. Concentration shown is the estimated SQL.

mg/kg - milligrams per kilogram

bgs- below ground surface

PCDD/PCDF Congener Group Summation for Soil/Sediment (0-4 feet bgs)
Sodium Reactor Experiment (SRE) Area

EPA ID	PCDD/PCDF Congener	Measured Concentration [a] (mg/kg)	Data Qualifier	Adjusted Concentration [b] (mg/kg)	Sum of PCDD/PCDF Congener Concentrations				
					Total Tetra (mg/kg)	Total Penta (mg/kg)	Total Hexa (mg/kg)	Total Hepta (mg/kg)	Total Octa (mg/kg)
MJ636	1,2,3,4,6,7,8-HpCDD	1.3E-03		1.3E-03	1.3E-06	4.4E-06	6.8E-05	1.4E-03	1.9E-02
MJ636	1,2,3,4,6,7,8-HpCDF	1.0E-04	J	1.0E-04					
MJ636	1,2,3,4,7,8,9-HpCDF	1.0E-05		1.0E-05					
MJ636	1,2,3,4,7,8-HxCDD	1.0E-05		1.0E-05					
MJ636	1,2,3,4,7,8-HxCDF	3.7E-06		3.7E-06					
MJ636	1,2,3,6,7,8-HxCDD	3.0E-05		3.0E-05					
MJ636	1,2,3,6,7,8-HxCDF	3.4E-06		3.4E-06					
MJ636	1,2,3,7,8,9-HxCDD	1.0E-05		1.0E-05					
MJ636	1,2,3,7,8,9-HxCDF	9.7E-07	J	9.7E-07					
MJ636	1,2,3,7,8-PeCDD	2.2E-06	J	2.2E-06					
MJ636	1,2,3,7,8-PeCDF	5.8E-07	J	5.8E-07					
MJ636	2,3,4,6,7,8-HxCDF	1.0E-05		1.0E-05					
MJ636	2,3,4,7,8-PeCDF	1.6E-06	J	1.6E-06					
MJ636	2,3,7,8-TCDD	5.3E-07		5.3E-07					
MJ636	2,3,7,8-TCDF	7.9E-07	J	7.9E-07					
MJ636	OCDD	1.9E-02		1.9E-02					
MJ636	OCDF	2.4E-04		2.4E-04					
MJ637	1,2,3,4,6,7,8-HpCDD	1.0E-06	J	1.0E-06	8.6E-08	1.7E-07	5.2E-07	1.2E-06	1.0E-05
MJ637	1,2,3,4,6,7,8-HpCDF	2.0E-07	UJ	9.8E-08					
MJ637	1,2,3,4,7,8,9-HpCDF	1.3E-07	U	6.6E-08					
MJ637	1,2,3,4,7,8-HxCDD	2.1E-07	U	1.0E-07					
MJ637	1,2,3,4,7,8-HxCDF	7.8E-08	U	3.9E-08					
MJ637	1,2,3,6,7,8-HxCDD	2.2E-07	U	1.1E-07					
MJ637	1,2,3,6,7,8-HxCDF	7.8E-08	U	3.9E-08					
MJ637	1,2,3,7,8,9-HxCDD	2.1E-07	U	1.0E-07					
MJ637	1,2,3,7,8,9-HxCDF	1.6E-07	U	7.9E-08					
MJ637	1,2,3,7,8-PeCDD	1.0E-07	U	5.2E-08					
MJ637	1,2,3,7,8-PeCDF	1.3E-07	U	6.3E-08					
MJ637	2,3,4,6,7,8-HxCDF	9.2E-08	U	4.6E-08					
MJ637	2,3,4,7,8-PeCDF	1.2E-07	U	6.0E-08					
MJ637	2,3,7,8-TCDD	7.5E-08	U	3.8E-08					
MJ637	2,3,7,8-TCDF	9.7E-08	U	4.9E-08					
MJ637	OCDD	1.0E-05		1.0E-05					
MJ637	OCDF	2.8E-07	U	1.4E-07					
MJ645	1,2,3,4,6,7,8-HpCDD	1.2E-04		1.2E-04	5.8E-07	8.1E-07	7.9E-06	1.3E-04	1.8E-03
MJ645	1,2,3,4,6,7,8-HpCDF	1.0E-05		1.0E-05					
MJ645	1,2,3,4,7,8,9-HpCDF	1.1E-06	J	1.1E-06					
MJ645	1,2,3,4,7,8-HxCDD	1.1E-06	J	1.1E-06					
MJ645	1,2,3,4,7,8-HxCDF	7.5E-07	J	7.5E-07					
MJ645	1,2,3,6,7,8-HxCDD	3.2E-06		3.2E-06					
MJ645	1,2,3,6,7,8-HxCDF	4.5E-07	J	4.5E-07					
MJ645	1,2,3,7,8,9-HxCDD	1.5E-06	J	1.5E-06					
MJ645	1,2,3,7,8,9-HxCDF	4.1E-07	U	2.0E-07					
MJ645	1,2,3,7,8-PeCDD	3.2E-07	J	3.2E-07					
MJ645	1,2,3,7,8-PeCDF	1.7E-07	UJ	8.3E-08					
MJ645	2,3,4,6,7,8-HxCDF	8.0E-07	J	8.0E-07					
MJ645	2,3,4,7,8-PeCDF	4.1E-07	J	4.1E-07					
MJ645	2,3,7,8-TCDD	1.3E-07	U	6.4E-08					
MJ645	2,3,7,8-TCDF	5.2E-07	J	5.2E-07					
MJ645	OCDD	1.8E-03		1.8E-03					
MJ645	OCDF	3.0E-05		3.0E-05					

PCDD/PCDF Congener Group Summation for Soil/Sediment (0-4 feet bgs)
Sodium Reactor Experiment (SRE) Area

EPA ID	PCDD/PCDF Congener	Measured Concentration [a] (mg/kg)	Data Qualifier	Adjusted Concentration [b] (mg/kg)	Sum of PCDD/PCDF Congener Concentrations				
					Total Tetra (mg/kg)	Total Penta (mg/kg)	Total Hexa (mg/kg)	Total Hepta (mg/kg)	Total Octa (mg/kg)
MJ776	1,2,3,4,6,7,8-HpCDD	3.2E-04		3.2E-04	2.0E-07	6.5E-07	1.6E-05	3.7E-04	7.5E-03
MJ776	1,2,3,4,6,7,8-HpCDF	5.0E-05		5.0E-05					
MJ776	1,2,3,4,7,8,9-HpCDF	4.1E-06		4.1E-06					
MJ776	1,2,3,4,7,8-HxCDD	1.2E-06	J	1.2E-06					
MJ776	1,2,3,4,7,8-HxCDF	9.1E-07	J	9.1E-07					
MJ776	1,2,3,6,7,8-HxCDD	1.0E-05		1.0E-05					
MJ776	1,2,3,6,7,8-HxCDF	5.6E-07	J	5.6E-07					
MJ776	1,2,3,7,8,9-HxCDD	2.2E-06	J	2.2E-06					
MJ776	1,2,3,7,8,9-HxCDF	2.0E-07	U	9.8E-08					
MJ776	1,2,3,7,8-PeCDD	3.8E-07	J	3.8E-07					
MJ776	1,2,3,7,8-PeCDF	1.1E-07	U	5.6E-08					
MJ776	2,3,4,6,7,8-HxCDF	1.6E-06	J	1.6E-06					
MJ776	2,3,4,7,8-PeCDF	2.2E-07	J	2.2E-07					
MJ776	2,3,7,8-TCDD	1.9E-07	UJ	9.4E-08					
MJ776	2,3,7,8-TCDF	2.2E-07	U	1.1E-07					
MJ776	OCDD	7.3E-03		7.3E-03					
MJ776	OCDF	1.5E-04		1.5E-04					
MJ777	1,2,3,4,6,7,8-HpCDD	5.0E-04		5.0E-04	1.2E-06	2.9E-06	4.1E-05	5.5E-04	5.9E-03
MJ777	1,2,3,4,6,7,8-HpCDF	5.0E-05		5.0E-05					
MJ777	1,2,3,4,7,8,9-HpCDF	4.2E-06		4.2E-06					
MJ777	1,2,3,4,7,8-HxCDD	4.2E-06		4.2E-06					
MJ777	1,2,3,4,7,8-HxCDF	1.8E-06	J	1.8E-06					
MJ777	1,2,3,6,7,8-HxCDD	2.0E-05		2.0E-05					
MJ777	1,2,3,6,7,8-HxCDF	1.8E-06	J	1.8E-06					
MJ777	1,2,3,7,8,9-HxCDD	1.0E-05		1.0E-05					
MJ777	1,2,3,7,8,9-HxCDF	1.8E-07	J	1.8E-07					
MJ777	1,2,3,7,8-PeCDD	1.5E-06	J	1.5E-06					
MJ777	1,2,3,7,8-PeCDF	3.9E-07	J	3.9E-07					
MJ777	2,3,4,6,7,8-HxCDF	3.0E-06		3.0E-06					
MJ777	2,3,4,7,8-PeCDF	9.9E-07	J	9.9E-07					
MJ777	2,3,7,8-TCDD	4.0E-07	J	4.0E-07					
MJ777	2,3,7,8-TCDF	7.9E-07	J	7.9E-07					
MJ777	OCDD	5.8E-03		5.8E-03					
MJ777	OCDF	1.2E-04		1.2E-04					

Maximum of Total Summed Congener Concentrations	
Total Tetra	1.3E-06
Total Penta	4.4E-06
Total Hexa	6.8E-05
Total Hepta	1.4E-03
Total Octa	1.9E-02

Notes:

a. Measured concentration - concentration reported by the analytial laboratory

b. Adjusted concentration - concentration reported by the analytical laboratory if the chemical was detected, or estimated at one-half the sample quantitation limit (SQL) if not detected.

PCDD/PCDF - polychlorinated dibenzo-p-dioxins and dibenzofurans

Total Tetra - sum of the 2,3,7,8-substituted tetraclorinated dibenzo-p-dioxin and dibenzofuran congeners.

Total Penta - sum of the 2,3,7,8-substituted pentaclorinated dibenzo-p-dioxin and dibenzofuran congeners.

Total Hexa - sum of the 2,3,7,8-substituted hexaclorinated dibenzo-p-dioxin and dibenzofuran congeners.

Total Hepta - sum of the 2,3,7,8-substituted heptaclorinated dibenzo-p-dioxin and dibenzofuran congeners.

Total Octa - sum of the 2,3,7,8-substituted Octaclorinated dibenzo-p-dioxin and dibenzofuran congeners.

J - concentration estimated

U - not detected. Concentration shown is the SQL.

UJ - not detected. Concentration shown is the estimated SQL.

mg/kg - milligrams per kilogram

bgs- below ground surface

PCDD/PCDF Congener Group Summation for Soil/Sediment (0-2 feet bgs)
Sodium Reactor Experiment (SRE) Area

EPA ID	PCDD/PCDF Congener	Measured Concentration [a] (mg/kg)	Data Qualifier	Adjusted Concentration [b] (mg/kg)	Sum of PCDD/PCDF Congener Concentrations				
					Total Tetra (mg/kg)	Total Penta (mg/kg)	Total Hexa (mg/kg)	Total Hepta (mg/kg)	Total Octa (mg/kg)
MJ636	1,2,3,4,6,7,8-HpCDD	1.3E-03		1.3E-03	1.3E-06	4.4E-06	6.8E-05	1.4E-03	1.9E-02
MJ636	1,2,3,4,6,7,8-HpCDF	1.0E-04	J	1.0E-04					
MJ636	1,2,3,4,7,8,9-HpCDF	1.0E-05		1.0E-05					
MJ636	1,2,3,4,7,8-HxCDD	1.0E-05		1.0E-05					
MJ636	1,2,3,4,7,8-HxCDF	3.7E-06		3.7E-06					
MJ636	1,2,3,6,7,8-HxCDD	3.0E-05		3.0E-05					
MJ636	1,2,3,6,7,8-HxCDF	3.4E-06		3.4E-06					
MJ636	1,2,3,7,8,9-HxCDD	1.0E-05		1.0E-05					
MJ636	1,2,3,7,8,9-HxCDF	9.7E-07	J	9.7E-07					
MJ636	1,2,3,7,8-PeCDD	2.2E-06	J	2.2E-06					
MJ636	1,2,3,7,8-PeCDF	5.8E-07	J	5.8E-07					
MJ636	2,3,4,6,7,8-HxCDF	1.0E-05		1.0E-05					
MJ636	2,3,4,7,8-PeCDF	1.6E-06	J	1.6E-06					
MJ636	2,3,7,8-TCDD	5.3E-07		5.3E-07					
MJ636	2,3,7,8-TCDF	7.9E-07	J	7.9E-07					
MJ636	OCDD	1.9E-02		1.9E-02					
MJ636	OCDF	2.4E-04		2.4E-04					
MJ645	1,2,3,4,6,7,8-HpCDD	1.2E-04		1.2E-04	5.8E-07	8.1E-07	7.9E-06	1.3E-04	1.8E-03
MJ645	1,2,3,4,6,7,8-HpCDF	1.0E-05		1.0E-05					
MJ645	1,2,3,4,7,8,9-HpCDF	1.1E-06	J	1.1E-06					
MJ645	1,2,3,4,7,8-HxCDD	1.1E-06	J	1.1E-06					
MJ645	1,2,3,4,7,8-HxCDF	7.5E-07	J	7.5E-07					
MJ645	1,2,3,6,7,8-HxCDD	3.2E-06		3.2E-06					
MJ645	1,2,3,6,7,8-HxCDF	4.5E-07	J	4.5E-07					
MJ645	1,2,3,7,8,9-HxCDD	1.5E-06	J	1.5E-06					
MJ645	1,2,3,7,8,9-HxCDF	4.1E-07	U	2.0E-07					
MJ645	1,2,3,7,8-PeCDD	3.2E-07	J	3.2E-07					
MJ645	1,2,3,7,8-PeCDF	1.7E-07	UJ	8.3E-08					
MJ645	2,3,4,6,7,8-HxCDF	8.0E-07	J	8.0E-07					
MJ645	2,3,4,7,8-PeCDF	4.1E-07	J	4.1E-07					
MJ645	2,3,7,8-TCDD	1.3E-07	U	6.4E-08					
MJ645	2,3,7,8-TCDF	5.2E-07	J	5.2E-07					
MJ645	OCDD	1.8E-03		1.8E-03					
MJ645	OCDF	3.0E-05		3.0E-05					
MJ776	1,2,3,4,6,7,8-HpCDD	3.2E-04		3.2E-04	2.0E-07	6.5E-07	1.6E-05	3.7E-04	7.5E-03
MJ776	1,2,3,4,6,7,8-HpCDF	5.0E-05		5.0E-05					
MJ776	1,2,3,4,7,8,9-HpCDF	4.1E-06		4.1E-06					
MJ776	1,2,3,4,7,8-HxCDD	1.2E-06	J	1.2E-06					
MJ776	1,2,3,4,7,8-HxCDF	9.1E-07	J	9.1E-07					
MJ776	1,2,3,6,7,8-HxCDD	1.0E-05		1.0E-05					
MJ776	1,2,3,6,7,8-HxCDF	5.6E-07	J	5.6E-07					
MJ776	1,2,3,7,8,9-HxCDD	2.2E-06	J	2.2E-06					
MJ776	1,2,3,7,8,9-HxCDF	2.0E-07	U	9.8E-08					
MJ776	1,2,3,7,8-PeCDD	3.8E-07	J	3.8E-07					
MJ776	1,2,3,7,8-PeCDF	1.1E-07	U	5.6E-08					
MJ776	2,3,4,6,7,8-HxCDF	1.6E-06	J	1.6E-06					
MJ776	2,3,4,7,8-PeCDF	2.2E-07	J	2.2E-07					
MJ776	2,3,7,8-TCDD	1.9E-07	UJ	9.4E-08					
MJ776	2,3,7,8-TCDF	2.2E-07	U	1.1E-07					
MJ776	OCDD	7.3E-03		7.3E-03					
MJ776	OCDF	1.5E-04		1.5E-04					

PCDD/PCDF Congener Group Summation for Soil/Sediment (0-2 feet bgs)
Sodium Reactor Experiment (SRE) Area

EPA ID	PCDD/PCDF Congener	Measured Concentration [a] (mg/kg)	Data Qualifier	Adjusted Concentration [b] (mg/kg)	Sum of PCDD/PCDF Congener Concentrations				
					Total Tetra (mg/kg)	Total Penta (mg/kg)	Total Hexa (mg/kg)	Total Hepta (mg/kg)	Total Octa (mg/kg)
MJ777	1,2,3,4,6,7,8-HpCDD	5.0E-04		5.0E-04	1.2E-06	2.9E-06	4.1E-05	5.5E-04	5.9E-03
MJ777	1,2,3,4,6,7,8-HpCDF	5.0E-05		5.0E-05					
MJ777	1,2,3,4,7,8,9-HpCDF	4.2E-06		4.2E-06					
MJ777	1,2,3,4,7,8-HxCDD	4.2E-06		4.2E-06					
MJ777	1,2,3,4,7,8-HxCDF	1.8E-06	J	1.8E-06					
MJ777	1,2,3,6,7,8-HxCDD	2.0E-05		2.0E-05					
MJ777	1,2,3,6,7,8-HxCDF	1.8E-06	J	1.8E-06					
MJ777	1,2,3,7,8,9-HxCDD	1.0E-05		1.0E-05					
MJ777	1,2,3,7,8,9-HxCDF	1.8E-07	J	1.8E-07					
MJ777	1,2,3,7,8-PeCDD	1.5E-06	J	1.5E-06					
MJ777	1,2,3,7,8-PeCDF	3.9E-07	J	3.9E-07					
MJ777	2,3,4,6,7,8-HxCDF	3.0E-06		3.0E-06					
MJ777	2,3,4,7,8-PeCDF	9.9E-07	J	9.9E-07					
MJ777	2,3,7,8-TCDD	4.0E-07	J	4.0E-07					
MJ777	2,3,7,8-TCDF	7.9E-07	J	7.9E-07					
MJ777	OCDD	5.8E-03		5.8E-03					
MJ777	OCDF	1.2E-04		1.2E-04					

Maximum of Total Summed Congener Concentrations

Total Tetra	1.3E-06
Total Penta	4.4E-06
Total Hexa	6.8E-05
Total Hepta	1.4E-03
Total Octa	1.9E-02

Notes:

a. Measured concentration - concentration reported by the analytial laboratory

b. Adjusted concentration - concentration reported by the analytical laboratory if the chemical was detected, or estimated at one-half the sample quantitation limit (SQL) if not detected.

PCDD/PCDF - polychlorinated dibenzo-p-dioxins and dibenzofurans

Total Tetra - sum of the 2,3,7,8-substituted tetraclorinated dibenzo-p-dioxin and dibenzofuran congeners.

Total Penta - sum of the 2,3,7,8-substituted pentaclorinated dibenzo-p-dioxin and dibenzofuran congeners.

Total Hexa - sum of the 2,3,7,8-substituted hexaclorinated dibenzo-p-dioxin and dibenzofuran congeners.

Total Hepta - sum of the 2,3,7,8-substituted heptaclorinated dibenzo-p-dioxin and dibenzofuran congeners.

Total Octa - sum of the 2,3,7,8-substituted Octaclorinated dibenzo-p-dioxin and dibenzofuran congeners.

J - concentration estimated

U - not detected. Concentration shown is the SQL.

UJ - not detected. Concentration shown is the estimated SQL.

mg/kg - milligrams per kilogram

bgs- below ground surface

Comparison of Inorganic Compound Concentrations in Soil/Sediment (0-6 feet bgs) Against Background
Sodium Reactor Experiment (SRE) Area

PCDD/PCDF Congener Groups	Maximum Background (mg/kg)	Maximum RFI Site (mg/kg)	Results of Wilcoxon-Rank Sum Test	RFI Site Ever Detected?	RFI Site Exceeds Background?	
Total Tetra	9.5E-07	1.3E-06	No	Yes	Yes	b,e
Total Penta	8.7E-07	4.4E-06	No	Yes	Yes	b,e
Total Hexa	5.1E-06	6.8E-05	No	Yes	Yes	b,e
Total Hepta	1.6E-05	1.4E-03	No	Yes	Yes	b,e
Total Octa	1.5E-04	1.9E-02	No	Yes	Yes	b,e

Inorganic Compounds	Maximum Background [a] (mg/kg)	Maximum RFI Site (mg/kg)	Results of Wilcoxon-Rank Sum Test	RFI Site Ever Detected?	RFI Site Exceeds Background?	
Aluminum	2.0E+04	2.2E+04	No	Yes	No	c
Antimony	8.7E+00	8.6E-01	No	Yes	No	c
Arsenic	1.5E+01	9.0E+00	No	Yes	No	c
Barium	1.4E+02	2.0E+02	No	Yes	No	c
Beryllium	1.1E+00	1.4E+00	No	Yes	No	c
Boron	9.7E+00	1.0E+01	No	Yes	No	c
Cadmium	1.0E+00	4.6E+00	No	Yes	Yes	c,e
Chromium	3.7E+01	4.1E+01	No	Yes	No	c
Hexavalent chromium		5.5E-01	Yes	No	No	d
Cobalt	2.1E+01	1.5E+01	No	Yes	No	c
Copper	2.9E+01	1.3E+02	No	Yes	Yes	c,e
Lead	3.4E+01	9.0E+01	No	Yes	Yes	c,e
Manganese	5.0E+02	9.1E+02	No	Yes	No	c
Methyl mercury		3.6E-03	Yes	Yes	Yes	
Mercury	9.0E-02	3.5E+01	Yes	Yes	Yes	
Molybdenum	5.3E+00	7.1E-01	No	Yes	No	c
Nickel	2.9E+01	2.4E+01	No	Yes	No	c
Selenium	6.6E-01	1.0E+00	No	Yes	No	c
Silver	7.9E-01	1.1E+01	No	Yes	Yes	c,e
Thallium	4.6E-01	4.0E+00	No	Yes	Yes	c,e
Vanadium	6.2E+01	7.7E+01	No	Yes	No	c
Zinc	1.1E+02	1.5E+03	No	Yes	Yes	c,e

Notes:

a. The concentrations of inorganic compounds for which soil background data are not available are considered to be above background concentrations if they are detected and are potentially site-related.

b. Determined be within the range of background since the RFI site sample population for soils at 0 to 6 feet bgs was found to be no different than the background sample population at p=0.01 based on the Wilcoxon Rank Sum Test.

c. Determined be within the range of background since the RFI site sample population for soils at 0 to 6 feet bgs was found to be no different than the background sample population at p=0.05 based on the Wilcoxon Rank Sum Test.

d. Maximum RFI Site concentration is equal to half the maximum detection limit.

e. Determined to be within the range of background but was selected as a COPC because of spatial extent of the highest detections.

PCDD/PCDF - Polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.

Total Tetra - sum of the 2,3,7,8-substituted tetrachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations.

Total Penta - sum of the 2,3,7,8-substituted pentachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations.

Total Hexa - sum of the 2,3,7,8-substituted hexachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations.

Total Hepta - sum of the 2,3,7,8-substituted heptachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations.

Comparison of Inorganic Compound Concentrations in Soil/Sediment (0-6 feet bgs) Against Background
Sodium Reactor Experiment (SRE) Area

PCDD/PCDF Congener Groups	Maximum Background (mg/kg)	Maximum RFI Site (mg/kg)	Results of Wilcoxon-Rank Sum Test	RFI Site Ever Detected?	RFI Site Exceeds Background?

Total Octa - sum of the octachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations.
mg/kg - milligrams per kilogram
bgs- below ground surface

Comparison of Inorganic Compound Concentrations in Soil/Sediment (0-4 feet bgs) Against Background
Sodium Reactor Experiment (SRE) Area

PCDD/PCDF Congener Groups	Maximum Background (mg/kg)	Maximum RFI Site (mg/kg)	Results of Wilcoxon-Rank Sum Test	RFI Site Ever Detected?	RFI Site Exceeds Background?	
Total Tetra	9.5E-07	1.3E-06	No	Yes	Yes	b,e
Total Penta	8.7E-07	4.4E-06	No	Yes	Yes	b,e
Total Hexa	5.1E-06	6.8E-05	No	Yes	Yes	b,e
Total Hepta	1.6E-05	1.4E-03	No	Yes	Yes	b,e
Total Octa	1.5E-04	1.9E-02	No	Yes	Yes	b,e

Inorganic Compounds	Maximum Background [a] (mg/kg)	Maximum RFI Site (mg/kg)	Results of Wilcoxon-Rank Sum Test	RFI Site Ever Detected?	RFI Site Exceeds Background?	
Aluminum	2.0E+04	2.2E+04	No	Yes	No	c
Antimony	8.7E+00	8.6E-01	No	Yes	No	c
Arsenic	1.5E+01	9.0E+00	No	Yes	No	c
Barium	1.4E+02	2.0E+02	No	Yes	No	c
Beryllium	1.1E+00	1.4E+00	No	Yes	No	c
Boron	9.7E+00	1.0E+01	No	Yes	No	c
Cadmium	1.0E+00	4.6E+00	No	Yes	Yes	c,e
Chromium	3.7E+01	4.1E+01	No	Yes	No	c
Hexavalent chromium		5.5E-01	Yes	No	No	d
Cobalt	2.1E+01	1.5E+01	No	Yes	No	c
Copper	2.9E+01	1.3E+02	No	Yes	Yes	c
Lead	3.4E+01	9.0E+01	No	Yes	Yes	c,e
Manganese	5.0E+02	9.1E+02	No	Yes	No	c
Methyl mercury		3.6E-03	Yes	Yes	Yes	
Mercury	9.0E-02	3.5E+01	Yes	Yes	Yes	
Molybdenum	5.3E+00	7.1E-01	No	Yes	No	c
Nickel	2.9E+01	2.4E+01	No	Yes	No	c
Selenium	6.6E-01	7.7E-01	No	Yes	No	c
Silver	7.9E-01	1.1E+01	No	Yes	Yes	c,e
Thallium	4.6E-01	2.1E+00	No	Yes	Yes	c,e
Vanadium	6.2E+01	7.7E+01	No	Yes	No	c
Zinc	1.1E+02	1.5E+03	No	Yes	Yes	c,e

Notes:

a. The concentrations of inorganic compounds for which soil background data are not available are considered to be above background concentrations if they are detected and are potentially site-related.

b. Determined be within the range of background since the RFI site sample population for soils at 0 to 4 feet bgs was found to be no different than the background sample population at p=0.01 based on the Wilcoxon Rank Sum Test.

c. Determined be within the range of background since the RFI site sample population for soils at 0 to 4 feet bgs was found to be no different than the background sample population at p=0.05 based on the Wilcoxon Rank Sum Test.

d. Maximum RFI Site concentration is equal to half the maximum detection limit.

e. Determined to be within the range of background but was selected as a COPC because of spatial extent of the highest detections.

PCDD/PCDF - polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.

Total Tetra - sum of the 2,3,7,8-substituted tetrachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations.

Total Penta - sum of the 2,3,7,8-substituted pentachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations.

Total Hexa - sum of the 2,3,7,8-substituted hexachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations.

Comparison of Inorganic Compound Concentrations in Soil/Sediment (0-4 feet bgs) Against Background
Sodium Reactor Experiment (SRE) Area

PCDD/PCDF Congener Groups	Maximum Background (mg/kg)	Maximum RFI Site (mg/kg)	Results of Wilcoxon-Rank Sum Test	RFI Site Ever Detected?	RFI Site Exceeds Background?

Total Hepta - sum of the 2,3,7,8-substituted heptachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations.
Total Octa - sum of the octachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations.
mg/kg - milligrams per kilogram
bgs- below ground surface

Comparison of Inorganic Compound and PCDD/PCDF Concentrations in Soil/Sediment (0-2 feet bgs) Against Background Sodium Reactor Experiment (SRE) Area

PCDD/PCDF Congener Groups	Maximum Background (mg/kg)	Maximum RFI Site (mg/kg)	Results of Wilcoxon-Rank Sum Test	RFI Site Ever Detected?	RFI Site Exceeds Background?	
Total Tetra	9.5E-07	1.3E-06	No	Yes	No	b
Total Penta	8.7E-07	4.4E-06	No	Yes	No	b
Total Hexa	5.1E-06	6.8E-05	No	Yes	No	b
Total Hepta	1.6E-05	1.4E-03	Yes	Yes	Yes	
Total Octa	1.5E-04	1.9E-02	Yes	Yes	Yes	

Inorganic Compounds	Maximum Background [a] (mg/kg)	Maximum RFI Site (mg/kg)	Results of Wilcoxon-Rank Sum Test	RFI Site Ever Detected?	RFI Site Exceeds Background?	
Aluminum	2.0E+04	1.5E+04	No	Yes	No	c
Antimony	8.7E+00	8.6E-01	No	Yes	No	c
Arsenic	1.5E+01	9.0E+00	No	Yes	No	c
Barium	1.4E+02	2.0E+02	No	Yes	No	c
Beryllium	1.1E+00	1.4E+00	No	Yes	No	c
Boron	9.7E+00	1.0E+01	No	Yes	No	c
Cadmium	1.0E+00	4.6E+00	No	Yes	Yes	c,e
Chromium	3.7E+01	4.1E+01	No	Yes	No	c
Hexavalent chromium		5.5E-01	Yes	No	No	d
Cobalt	2.1E+01	1.5E+01	No	Yes	No	c
Copper	2.9E+01	1.3E+02	No	Yes	Yes	c,e
Lead	3.4E+01	9.0E+01	No	Yes	Yes	c,e
Manganese	5.0E+02	9.1E+02	No	Yes	No	c
Methyl mercury		3.6E-03	Yes	Yes	Yes	
Mercury	9.0E-02	3.5E+01	Yes	Yes	Yes	
Molybdenum	5.3E+00	6.5E-01	No	Yes	No	c
Nickel	2.9E+01	2.4E+01	No	Yes	No	c
Selenium	6.6E-01	7.7E-01	No	Yes	No	c
Silver	7.9E-01	4.8E+00	No	Yes	Yes	c,e
Thallium	4.6E-01	3.3E-01	No	Yes	Yes	c,e
Vanadium	6.2E+01	7.7E+01	No	Yes	No	c
Zinc	1.1E+02	1.5E+03	No	Yes	Yes	c,e

Notes:

a. The concentrations of inorganic compounds for which soil background data are not available are considered to be above background concentrations if they are detected and are potentially site-related.

b. Determined be within the range of background since the RFI site sample population for soils at 0 to 2 feet bgs was found to be no different than the background sample population at p=0.01 based on the Wilcoxon Rank Sum Test.

c. Determined be within the range of background since the RFI site sample population for soils at 0 to 2 feet bgs was found to be no different than the background sample population at p=0.05 based on the Wilcoxon Rank Sum Test.

d. Maximum RFI Site concentration is equal to half the maximum detection limit.

e. Determined to be within the range of background but was selected as a COPC because of spatial extent of the highest detections.

PCDD/PCDF - polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.

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Total Penta - sum of the 2,3,7,8-substituted pentachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations.

Total Hexa - sum of the 2,3,7,8-substituted hexachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations.

Total Hepta - sum of the 2,3,7,8-substituted heptachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations.

Total Octa - sum of the octachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations.

mg/kg - milligrams per kilogram

bgs- below ground surface

Comparison of Sample Quantitation Limits in Soil/Sediment (0-6 feet bgs) Against Ecological Screening Levels
Sodium Reactor Experiment (SRE) Area

Chemical	Number of Samples	Percent Frequency of Detection	Frequency of Detection Between 0% and 5% ?	Minimum SQL for Chemicals Never Detected or Detected at Frequency of < 5% (mg/kg)	Maximum SQL for Chemicals Never Detected or Detected at Frequency of < 5% (mg/kg)	Lowest ESL (mg/kg)	Percentage of SQLs Exceeding ESL	Greater than 50% of SQLs Exceeds ESL ?
Inorganic Compounds								
Aluminum	22	95	No			1.2E+01	0	No
Antimony	34	32	No			9.5E-02	100	Yes
Arsenic	41	85	No			1.9E+00	100	Yes
Barium	41	98	No			1.5E+01	0	No
Beryllium	41	59	No			5.1E+00	0	No
Boron	22	23	No			9.2E+00	12	No
Cadmium	41	27	No			2.1E-02	90	Yes
Chromium	41	98	No			9.3E+02	0	No
Hexavalent chromium	5	0	Yes	1.0E+00	1.1E+00	2.0E-01	100	Yes
Cobalt	41	98	No			9.0E+00	0	No
Copper	41	98	No			1.1E+00	0	No
Lead	41	100	No			6.3E-02	0	No
Manganese	13	100	No			7.2E+01	0	No
Methyl mercury	3	67	No			1.7E-01	0	No
Mercury	89	65	No			1.0E-01	58	Yes
Molybdenum	41	17	No			1.1E-01	100	Yes
Nickel	41	85	No			1.0E-01	100	Yes
Selenium	42	12	No			1.7E-01	100	Yes
Silver	45	11	No			5.4E-01	63	Yes
Thallium	43	28	No			2.9E+00	23	No
Vanadium	41	98	No			1.5E+00	0	No
Zinc	41	98	No			2.1E+01	0	No
VOCs								
1,1,1,2-Tetrachloroethane	11	0	Yes	4.6E-03	2.4E-02	7.6E+01	0	No
1,1,1-Trichloroethane	25	8	No			4.3E+03	0	No
1,1,2,2-Tetrachloroethane	25	0	Yes	1.8E-03	5.0E-02	6.0E+00	0	No
1,1,2-Trichloro-1,2,2-trifluoroethane	8	0	Yes	4.6E-03	2.4E-02	2.1E+02	0	No
1,1,2-Trichloroethane	25	0	Yes	1.8E-03	5.0E-02	8.3E+00	0	No
1,1-Dichloroethane	25	8	No			2.1E+02	0	No
1,1-Dichloroethene	25	0	Yes	4.6E-03	5.0E-02	2.9E-01	0	No
1,1-Dichloropropene	2	0	Yes	1.8E-03	2.2E-03	2.2E+01	0	No
1,2,3-Trichlorobenzene	2	0	Yes	4.6E-03	5.4E-03	2.0E+01	0	No
1,2,3-Trichloropropane	2	0	Yes	9.1E-03	1.1E-02	1.2E+01	0	No
1,2,4-Trichlorobenzene	17	0	Yes	4.6E-03	1.7E-01	2.0E+01	0	No
1,2,4-Trimethylbenzene	11	0	Yes	1.8E-03	2.4E-02	1.3E+02	0	No
1,2-Dibromo-3-chloropropane	11	0	Yes	4.6E-03	2.4E-02	2.2E+01	0	No
1,2-Dibromoethane	2	0	Yes	1.8E-03	2.2E-03	2.5E+01	0	No
1,2-Dichlorobenzene	26	0	Yes	1.8E-03	5.0E-02	3.7E+02	0	No
1,2-Dichloroethane	25	0	Yes	1.8E-03	5.0E-02	7.6E+01	0	No
1,2-Dichloroethene (total)	18	11	No			6.8E+01	0	No
1,2-Dichloropropane	21	0	Yes	1.8E-03	5.0E-02	2.5E+01	0	No
1,3,5-Trimethylbenzene	11	0	Yes	1.8E-03	2.4E-02	1.3E+02	0	No
1,3-Dichlorobenzene	26	0	Yes	1.8E-03	5.0E-02	3.2E+02	0	No
1,4-Dichlorobenzene	26	0	Yes	1.8E-03	5.0E-02	2.0E+01	0	No
2-Butanone	25	12	No			7.6E+03	0	No
2-Chloroethylvinylether	8	0	Yes	4.6E-03	5.9E-02	7.3E-01	0	No
2-Chlorotoluene	2	0	Yes	4.6E-03	5.4E-03	3.2E+02	0	No
2-Hexanone	16	0	Yes	9.1E-03	5.0E-01	2.4E+03	0	No
4-Chlorotoluene	2	0	Yes	4.6E-03	5.4E-03	3.2E+02	0	No
4-Isopropyltoluene	2	0	Yes	1.8E-03	2.2E-03	NA	-	No

Comparison of Sample Quantitation Limits in Soil/Sediment (0-6 feet bgs) Against Ecological Screening Levels
Sodium Reactor Experiment (SRE) Area

Chemical	Number of Samples	Percent Frequency of Detection	Frequency of Detection Between 0% and 5% ?	Minimum SQL for Chemicals Never Detected or Detected at Frequency of < 5% (mg/kg)	Maximum SQL for Chemicals Never Detected or Detected at Frequency of < 5% (mg/kg)	Lowest ESL (mg/kg)	Percentage of SQLs Exceeding ESL	Greater than 50% of SQLs Exceeds ESL ?
4-Methyl-2-pentanone	16	0	Yes	4.6E-03	5.0E-01	2.4E+03	0	No
Acetone	25	20	No			4.3E+01	0	No
Benzene	25	0	Yes	1.8E-03	5.0E-02	4.3E+00	0	No
Bromobenzene	2	0	Yes	4.6E-03	5.4E-03	4.3E+00	0	No
Bromodichloromethane	25	0	Yes	1.8E-03	5.0E-02	1.5E+01	0	No
Bromoform	25	0	Yes	4.6E-03	3.0E-01	3.8E+01	0	No
Bromomethane	25	0	Yes	4.6E-03	5.0E-01	2.5E+01	0	No
Carbon disulfide	14	0	Yes	5.0E-02	5.0E-02	4.7E+01	0	No
Carbon tetrachloride	25	0	Yes	4.6E-03	5.0E-02	1.5E+00	0	No
Chlorobenzene	25	0	Yes	1.8E-03	5.0E-02	4.0E+01	0	No
Chloroethane	25	0	Yes	4.6E-03	5.0E-02	7.3E+01	0	No
Chloroform	25	0	Yes	1.8E-03	5.0E-02	2.4E-01	0	No
Chloromethane	25	0	Yes	4.6E-03	5.0E-01	2.5E+01	0	No
Chlorotrifluoroethene	6	0	Yes	5.0E-03	2.4E-02	1.6E+01	0	No
cis-1,2-Dichloroethene	11	0	Yes	1.8E-03	6.0E-03	6.8E+01	0	No
cis-1,3-Dichloropropene	21	0	Yes	1.8E-03	5.0E-02	2.2E+01	0	No
Dibromochloromethane	16	0	Yes	1.8E-03	5.0E-02	4.6E+01	0	No
Dibromomethane	2	0	Yes	1.8E-03	2.2E-03	2.5E+01	0	No
Dichlorodifluoromethane	11	0	Yes	4.6E-03	1.2E-02	6.4E+01	0	No
Ethylbenzene	25	4	Yes	1.8E-03	5.0E-02	2.1E+02	0	No
Isopropylbenzene	2	0	Yes	1.8E-03	2.2E-03	4.1E+02	0	No
m,p-Xylene	11	9	No			1.3E+02	0	No
Methyl tert-butyl ether	2	0	Yes	4.6E-03	5.4E-03	6.1E+01	0	No
Methylene chloride	25	16	No			2.5E+01	0	No
n-Butylbenzene	2	0	Yes	4.6E-03	5.4E-03	4.1E+02	0	No
n-Propylbenzene	2	0	Yes	1.8E-03	2.2E-03	4.1E+02	0	No
o-Xylene	11	0	Yes	1.8E-03	6.0E-03	1.3E+02	0	No
sec-Butylbenzene	2	0	Yes	4.6E-03	5.4E-03	4.1E+02	0	No
Styrene	16	0	Yes	1.8E-03	5.0E-02	6.4E+02	0	No
tert-Butylbenzene	2	0	Yes	4.6E-03	5.4E-03	4.1E+02	0	No
Tetrachloroethene	25	12	No			2.1E+00	0	No
Toluene	25	12	No			2.5E+00	0	No
trans-1,2-Dichloroethene	11	0	Yes	1.8E-03	6.0E-03	9.7E+02	0	No
trans-1,3-Dichloropropene	25	0	Yes	1.8E-03	5.0E-02	4.4E+00	0	No
Trichloroethene	25	16	No			3.0E+00	0	No
Trichlorofluoromethane	11	0	Yes	4.6E-03	6.0E-03	3.0E+02	0	No
Vinyl acetate	14	0	Yes	5.0E-01	5.0E-01	5.0E+02	0	No
Vinyl chloride	25	0	Yes	1.8E-03	5.0E-02	7.3E-01	0	No
Xylenes (total)	18	22	No			1.3E+02	0	No
SVOCs								
2,4,5-Trichlorophenol	15	0	Yes	2.0E-01	8.5E-01	9.0E+00	0	No
2,4,6-Trichlorophenol	15	0	Yes	1.7E-01	3.3E-01	1.0E+01	0	No
2,4-Dichlorophenol	15	0	Yes	1.6E-01	1.7E-01	1.3E+00	0	No
2,4-Dimethylphenol	15	0	Yes	9.9E-02	1.7E-01	1.1E+02	0	No
2,4-Dinitrophenol	15	0	Yes	8.5E-01	1.6E+00	5.9E-01	100	Yes
2,4-Dinitrotoluene	15	0	Yes	3.3E-02	1.7E-01	1.3E+00	0	No
2,6-Dinitrotoluene	15	0	Yes	9.9E-02	1.7E-01	2.5E+00	0	No
2-Chloronaphthalene	15	0	Yes	3.3E-02	1.7E-01	5.3E+02	0	No
2-Chlorophenol	15	0	Yes	1.3E-01	1.7E-01	2.1E+01	0	No
2-Methylnaphthalene	23	9	No			2.1E+02	0	No
2-Methylphenol	15	0	Yes	1.6E-01	1.7E-01	1.1E+02	0	No

Comparison of Sample Quantitation Limits in Soil/Sediment (0-6 feet bgs) Against Ecological Screening Levels
Sodium Reactor Experiment (SRE) Area

Chemical	Number of Samples	Percent Frequency of Detection	Frequency of Detection Between 0% and 5% ?	Minimum SQL for Chemicals Never Detected or Detected at Frequency of < 5% (mg/kg)	Maximum SQL for Chemicals Never Detected or Detected at Frequency of < 5% (mg/kg)	Lowest ESL (mg/kg)	Percentage of SQLs Exceeding ESL	Greater than 50% of SQLs Exceeds ESL ?
2-Nitroaniline	15	0	Yes	9.9E-02	8.5E-01	2.3E+01	0	No
2-Nitrophenol	15	0	Yes	1.3E-01	1.7E-01	2.3E+01	0	No
Methylphenol	1	0	Yes	1.7E-01	1.7E-01	2.1E+02	0	No
4-Methylphenol	14	0	Yes	1.6E-01	1.7E-01	4.3E+00	0	No
3,3'-Dichlorobenzidine	15	0	Yes	1.3E-01	3.4E-01	1.3E+00	0	No
3-Nitroaniline	15	0	Yes	9.9E-02	8.5E-01	5.9E+00	0	No
4,6-Dinitro-2-methylphenol	15	0	Yes	3.3E-01	8.5E-01	2.3E+01	0	No
4-Bromophenyl phenyl ether	15	0	Yes	3.3E-02	1.7E-01	4.3E+00	0	No
4-Chloro-3-methylphenol	15	0	Yes	1.6E-01	1.7E-01	2.1E+01	0	No
4-Chloroaniline	15	0	Yes	1.6E-01	1.7E-01	4.4E+00	0	No
4-Chlorophenyl phenyl ether	15	0	Yes	3.3E-02	1.7E-01	1.3E+00	0	No
4-Nitroaniline	15	0	Yes	3.3E-01	8.5E-01	3.3E+00	0	No
4-Nitrophenol	15	0	Yes	3.3E-01	8.5E-01	7.0E+00	0	No
Acenaphthene	26	15	No			2.5E+00	0	No
Acenaphthylene	26	0	Yes	3.0E-03	3.5E-01	7.5E+02	0	No
Aniline	14	0	Yes	1.7E-01	1.7E-01	5.3E+01	0	No
Anthracene	26	4	Yes	3.0E-03	1.7E-01	2.4E+00	0	No
Benzidine	14	0	Yes	1.7E+00	1.7E+00	2.3E+00	0	No
Benzo(a)anthracene	26	19	No			1.4E+00	0	No
Benzo(a)pyrene	25	20	No			5.6E+00	0	No
Benzo(b)fluoranthene	25	24	No			4.4E+00	0	No
Benzo(g,h,i)perylene	25	12	No			6.4E+00	0	No
Benzo(k)fluoranthene	25	16	No			5.8E+00	0	No
Benzoic acid	14	0	Yes	8.5E-01	8.5E-01	4.4E+00	0	No
Benzyl alcohol	15	0	Yes	1.3E-01	1.7E-01	4.4E+00	0	No
bis(2-Chloroethoxy)methane	15	0	Yes	6.6E-02	1.7E-01	1.5E+02	0	No
bis(2-Chloroethyl)ether	15	0	Yes	6.6E-02	1.7E-01	1.5E+02	0	No
bis(2-Chloroisopropyl) ether	15	0	Yes	9.9E-02	1.7E-01	1.5E+02	0	No
bis(2-Ethylhexyl)phthalate	18	0	Yes	1.1E-01	3.3E-01	4.9E+00	0	No
Butyl benzyl phthalate	15	0	Yes	3.3E-02	1.7E-01	3.4E+02	0	No
Chrysene	26	19	No			2.4E+00	0	No
Dibenz(a,h)anthracene	25	8	No			5.6E+00	0	No
Dibenzofuran	15	7	No			6.2E+01	0	No
Diethylphthalate	18	0	Yes	1.1E-01	3.3E-01	6.9E+03	0	No
Dimethyl phthalate	15	0	Yes	3.3E-02	1.7E-01	2.0E+02	0	No
Di-n-butylphthalate	18	0	Yes	1.1E-01	3.3E-01	4.9E-01	0	No
Di-n-octyl phthalate	15	0	Yes	3.3E-02	1.7E-01	1.5E+03	0	No
Fluoranthene	26	23	No			3.8E+01	0	No
Fluorene	26	8	No			1.6E+00	0	No
Hexachlorobenzene	15	0	Yes	3.3E-02	1.7E-01	3.4E-01	0	No
Hexachlorobutadiene	17	0	Yes	4.6E-03	1.7E-01	8.5E-01	0	No
Hexachlorocyclopentadiene	15	0	Yes	1.7E-01	1.6E+00	1.3E+01	0	No
Hexachloroethane	15	0	Yes	3.3E-02	1.7E-01	2.1E+00	0	No
Indeno(1,2,3-cd)pyrene	25	16	No			5.8E+00	0	No
Isophorone	15	0	Yes	3.3E-02	1.7E-01	4.8E+02	0	No
Naphthalene	28	7	No			2.1E+02	0	No
Nitrobenzene	15	0	Yes	9.9E-02	1.7E-01	2.0E+00	0	No
N-Nitrosodimethylamine	24	0	Yes	2.0E-03	3.5E-01	5.6E+01	0	No
N-Nitrosodi-n-propylamine	15	0	Yes	3.3E-02	1.7E-01	5.6E+01	0	No
N-Nitrosodiphenylamine	18	0	Yes	3.3E-02	1.7E-01	2.0E+01	0	No
Pentachlorophenol	15	0	Yes	8.5E-01	1.6E+00	6.0E+00	0	No

Comparison of Sample Quantitation Limits in Soil/Sediment (0-6 feet bgs) Against Ecological Screening Levels
Sodium Reactor Experiment (SRE) Area

Chemical	Number of Samples	Percent Frequency of Detection	Frequency of Detection Between 0% and 5% ?	Minimum SQL for Chemicals Never Detected or Detected at Frequency of < 5% (mg/kg)	Maximum SQL for Chemicals Never Detected or Detected at Frequency of < 5% (mg/kg)	Lowest ESL (mg/kg)	Percentage of SQLs Exceeding ESL	Greater than 50% of SQLs Exceeds ESL ?
Phenanthrene	26	23	No			1.3E+00	0	No
Phenol	15	0	Yes	1.3E-01	1.7E-01	5.0E+00	0	No
Pyrene	26	23	No			1.8E+01	0	No
Total Petroleum Hydrocarbons								
C08-C11(Gasoline Range)	20	0	Yes	3.0E+00	9.9E+01	NA	-	No
C11-C14(Kerosene Range)	20	5	No			NA	-	No
C14-C20(Diesel Range)	20	10	No			NA	-	No
C20-C30(Lubricant Oil Range)	20	50	No			NA	-	No
Hydrocarbons	1	0	Yes	5.0E+00	5.0E+00	NA	-	No
PCDD/PCDFs								
2,3,7,8-TCDD	5	40	No			4.3E-06	0	No
1,2,3,7,8-PeCDD	5	80	No			4.4E-06	0	No
1,2,3,4,7,8-HxCDD	5	80	No			4.5E-05	0	No
1,2,3,6,7,8-HxCDD	5	80	No			1.1E-04	0	No
1,2,3,7,8,9-HxCDD	5	80	No			4.3E-05	0	No
1,2,3,4,6,7,8-HpCDD	5	100	No			9.6E-04	0	No
OCDD	5	100	No			1.2E-01	0	No
2,3,7,8-TCDF	5	60	No			4.4E-06	0	No
1,2,3,7,8-PeCDF	5	40	No			1.0E-04	0	No
2,3,4,7,8-PeCDF	5	80	No			9.8E-06	0	No
1,2,3,4,7,8-HxCDF	5	80	No			4.7E-05	0	No
1,2,3,6,7,8-HxCDF	5	80	No			5.4E-05	0	No
2,3,4,6,7,8-HxCDF	5	80	No			4.9E-05	0	No
1,2,3,7,8,9-HxCDF	5	40	No			4.3E-05	0	No
1,2,3,4,6,7,8-HpCDF	5	80	No			1.1E-03	0	No
1,2,3,4,7,8,9-HpCDF	5	80	No			4.3E-04	0	No
OCDF	5	80	No			9.7E-02	0	No
PCBs								
Aroclor-1016	21	0	Yes	3.5E-02	1.1E+00	5.9E+00	0	No
Aroclor-1221	21	0	Yes	5.3E-02	1.1E+00	5.9E+00	0	No
Aroclor-1232	21	0	Yes	3.5E-02	1.1E+00	2.9E-01	21	No
Aroclor-1242	21	0	Yes	3.5E-02	1.1E+00	2.9E-01	21	No
Aroclor-1248	21	0	Yes	3.5E-02	1.1E+00	6.0E-02	63	Yes
Aroclor-1254	21	24	No			2.9E-01	25	No
Aroclor-1260	21	29	No			2.9E-01	0	No

Notes:
VOC - volatile organic chemicals
SVOC - semivolatile organic chemicals
PCDD/PDDFs - polychlorinated dibenzo-p-dioxins and dibenzofurans
PCBs - polychlorinated biphenyls
SQL - sample quantitation limit
ESL - ecological screening level
mg/kg - milligrams per kilogram
bgs- below ground surface

Comparison of Sample Quantitation Limits in Soil/Sediment (0-4 feet bgs) Against Ecological Screening Levels
Sodium Reactor Experiment (SRE) Area

Chemical	Number of Samples	Percent Frequency of Detection	Frequency of Detection Between 0% and 5% ?	Minimum SQL for Chemicals Never Detected or Detected at Frequency of < 5% (mg/kg)	Maximum SQL for Chemicals Never Detected or Detected at Frequency of < 5% (mg/kg)	Lowest ESL (mg/kg)	Percentage of SQLs Exceeding ESL	Greater than 50% of SQLs Exceeds ESL ?
Inorganic Compounds								
Aluminum	18	100	No			1.2E+01	0	No
Antimony	30	27	No			9.5E-02	100	Yes
Arsenic	37	84	No			1.9E+00	100	Yes
Barium	37	100	No			1.5E+01	0	No
Beryllium	37	57	No			5.1E+00	0	No
Boron	18	11	No			9.2E+00	13	No
Cadmium	37	27	No			2.1E-02	96	Yes
Chromium	37	100	No			9.3E+02	0	No
Hexavalent chromium	5	0	Yes	1.0E+00	1.1E+00	2.0E-01	100	Yes
Cobalt	37	100	No			9.0E+00	0	No
Copper	37	100	No			1.1E+00	0	No
Lead	37	100	No			6.3E-02	0	Yes
Manganese	9	100	No			7.2E+01	0	No
Methyl mercury	3	67	No			1.7E-01	0	No
Mercury	85	68	No			1.0E-01	70	Yes
Molybdenum	37	16	No			1.1E-01	100	Yes
Nickel	37	86	No			1.0E-01	100	Yes
Selenium	38	3	Yes	2.1E-01	8.0E+00	1.7E-01	95	Yes
Silver	41	12	No			5.4E-01	69	Yes
Thallium	39	28	No			2.9E+00	25	No
Vanadium	37	100	No			1.5E+00	0	No
Zinc	37	100	No			2.1E+01	0	No
VOCs								
1,1,1,2-Tetrachloroethane	10	0	Yes	4.6E-03	2.4E-02	7.6E+01	0	No
1,1,1-Trichloroethane	24	8	No			4.3E+03	0	No
1,1,2,2-Tetrachloroethane	24	0	Yes	1.8E-03	5.0E-02	6.0E+00	0	No
1,1,2-Trichloro-1,2,2-trifluoroethane	7	0	Yes	4.6E-03	2.4E-02	2.1E+02	0	No
1,1,2-Trichloroethane	24	0	Yes	1.8E-03	5.0E-02	8.3E+00	0	No
1,1-Dichloroethane	24	8	No			2.1E+02	0	No
1,1-Dichloroethene	24	0	Yes	4.6E-03	5.0E-02	2.9E-01	0	No
1,1-Dichloropropene	2	0	Yes	1.8E-03	2.2E-03	2.2E+01	0	No
1,2,3-Trichlorobenzene	2	0	Yes	4.6E-03	5.4E-03	2.0E+01	0	No
1,2,3-Trichloropropane	2	0	Yes	9.1E-03	1.1E-02	1.2E+01	0	No
1,2,4-Trichlorobenzene	17	0	Yes	4.6E-03	1.7E-01	2.0E+01	0	No
1,2,4-Trimethylbenzene	10	0	Yes	1.8E-03	2.4E-02	1.3E+02	0	No
1,2-Dibromo-3-chloropropane	10	0	Yes	4.6E-03	2.4E-02	2.2E+01	0	No
1,2-Dibromoethane	2	0	Yes	1.8E-03	2.2E-03	2.5E+01	0	No
1,2-Dichlorobenzene	25	0	Yes	1.8E-03	5.0E-02	3.7E+02	0	No
1,2-Dichloroethane	24	0	Yes	1.8E-03	5.0E-02	7.6E+01	0	No
1,2-Dichloropropane	21	0	Yes	1.8E-03	5.0E-02	2.5E+01	0	No
1,3,5-Trimethylbenzene	10	0	Yes	1.8E-03	2.4E-02	1.3E+02	0	No
1,3-Dichlorobenzene	25	0	Yes	1.8E-03	5.0E-02	3.2E+02	0	No
1,4-Dichlorobenzene	25	0	Yes	1.8E-03	5.0E-02	2.0E+01	0	No
2-Butanone	24	13	No			7.6E+03	0	No
2-Chloroethylvinylether	7	0	Yes	4.6E-03	5.9E-02	7.3E-01	0	No
2-Chlorotoluene	2	0	Yes	4.6E-03	5.4E-03	3.2E+02	0	No
2-Hexanone	16	0	Yes	9.1E-03	5.0E-01	2.4E+03	0	No
4-Chlorotoluene	2	0	Yes	4.6E-03	5.4E-03	3.2E+02	0	No
4-Isopropyltoluene	2	0	Yes	1.8E-03	2.2E-03	NA	-	No
4-Methyl-2-pentanone	16	0	Yes	4.6E-03	5.0E-01	2.4E+03	0	No

Comparison of Sample Quantitation Limits in Soil/Sediment (0-4 feet bgs) Against Ecological Screening Levels
Sodium Reactor Experiment (SRE) Area

Chemical	Number of Samples	Percent Frequency of Detection	Frequency of Detection Between 0% and 5% ?	Minimum SQL for Chemicals Never Detected or Detected at Frequency of < 5% (mg/kg)	Maximum SQL for Chemicals Never Detected or Detected at Frequency of < 5% (mg/kg)	Lowest ESL (mg/kg)	Percentage of SQLs Exceeding ESL	Greater than 50% of SQLs Exceeds ESL ?
Acetone	24	17	No			4.3E+01	0	No
Benzene	24	0	Yes	1.8E-03	5.0E-02	4.3E+00	0	No
Bromobenzene	2	0	Yes	4.6E-03	5.4E-03	4.3E+00	0	No
Bromodichloromethane	24	0	Yes	1.8E-03	5.0E-02	1.5E+01	0	No
Bromoform	24	0	Yes	4.6E-03	3.0E-01	3.8E+01	0	No
Bromomethane	24	0	Yes	4.6E-03	5.0E-01	2.5E+01	0	No
Carbon disulfide	14	0	Yes	5.0E-02	5.0E-02	4.7E+01	0	No
Carbon tetrachloride	24	0	Yes	4.6E-03	5.0E-02	1.5E+00	0	No
Chlorobenzene	24	0	Yes	1.8E-03	5.0E-02	4.0E+01	0	No
Chloroethane	24	0	Yes	4.6E-03	5.0E-02	7.3E+01	0	No
Chloroform	24	0	Yes	1.8E-03	5.0E-02	2.4E-01	0	No
Chloromethane	24	0	Yes	4.6E-03	5.0E-01	2.5E+01	0	No
Chlorotrifluoroethene	5	0	Yes	2.2E-02	2.4E-02	1.6E+01	0	No
cis-1,2-Dichloroethene	10	0	Yes	1.8E-03	6.0E-03	6.8E+01	0	No
cis-1,3-Dichloropropene	21	0	Yes	1.8E-03	5.0E-02	2.2E+01	0	No
Dibromochloromethane	16	0	Yes	1.8E-03	5.0E-02	4.6E+01	0	No
Dibromomethane	2	0	Yes	1.8E-03	2.2E-03	2.5E+01	0	No
Dichlorodifluoromethane	10	0	Yes	4.6E-03	1.2E-02	6.4E+01	0	No
Ethylbenzene	24	4	Yes	1.8E-03	5.0E-02	2.1E+02	0	No
Isopropylbenzene	2	0	Yes	1.8E-03	2.2E-03	4.1E+02	0	No
m,p-Xylene	10	0	Yes	1.8E-03	1.1E-02	1.3E+02	0	No
Methyl tert-butyl ether	2	0	Yes	4.6E-03	5.4E-03	6.1E+01	0	No
Methylene chloride	24	17	No			2.5E+01	0	No
n-Butylbenzene	2	0	Yes	4.6E-03	5.4E-03	4.1E+02	0	No
n-Propylbenzene	2	0	Yes	1.8E-03	2.2E-03	4.1E+02	0	No
o-Xylene	10	0	Yes	1.8E-03	6.0E-03	1.3E+02	0	No
sec-Butylbenzene	2	0	Yes	4.6E-03	5.4E-03	4.1E+02	0	No
Styrene	16	0	Yes	1.8E-03	5.0E-02	6.4E+02	0	No
tert-Butylbenzene	2	0	Yes	4.6E-03	5.4E-03	4.1E+02	0	No
Tetrachloroethene	24	13	No			2.1E+00	0	No
Toluene	24	13	No			2.5E+00	0	No
trans-1,2-Dichloroethene	10	0	Yes	1.8E-03	6.0E-03	9.7E+02	0	No
trans-1,3-Dichloropropene	24	0	Yes	1.8E-03	5.0E-02	4.4E+00	0	No
Trichloroethene	24	17	No			3.0E+00	0	No
Trichlorofluoromethane	10	0	Yes	4.6E-03	6.0E-03	3.0E+02	0	No
Vinyl acetate	14	0	Yes	5.0E-01	5.0E-01	5.0E+02	0	No
Vinyl chloride	24	0	Yes	1.8E-03	5.0E-02	7.3E-01	0	No
SVOCs								
2,4,5-Trichlorophenol	15	0	Yes	2.0E-01	8.5E-01	9.0E+00	0	No
2,4,6-Trichlorophenol	15	0	Yes	1.7E-01	3.3E-01	1.0E+01	0	No
2,4-Dichlorophenol	15	0	Yes	1.6E-01	1.7E-01	1.3E+00	0	No
2,4-Dimethylphenol	15	0	Yes	9.9E-02	1.7E-01	1.1E+02	0	No
2,4-Dinitrophenol	15	0	Yes	8.5E-01	1.6E+00	5.9E-01	100	Yes
2,4-Dinitrotoluene	15	0	Yes	3.3E-02	1.7E-01	1.3E+00	0	No
2,6-Dinitrotoluene	15	0	Yes	9.9E-02	1.7E-01	2.5E+00	0	No
2-Chloronaphthalene	15	0	Yes	3.3E-02	1.7E-01	5.3E+02	0	No
2-Chlorophenol	15	0	Yes	1.3E-01	1.7E-01	2.1E+01	0	No
2-Methylnaphthalene	20	5	No			2.1E+02	0	No
2-Methylphenol	15	0	Yes	1.6E-01	1.7E-01	1.1E+02	0	No
2-Nitroaniline	15	0	Yes	9.9E-02	8.5E-01	2.3E+01	0	No
2-Nitrophenol	15	0	Yes	1.3E-01	1.7E-01	2.3E+01	0	No

Comparison of Sample Quantitation Limits in Soil/Sediment (0-4 feet bgs) Against Ecological Screening Levels
Sodium Reactor Experiment (SRE) Area

Chemical	Number of Samples	Percent Frequency of Detection	Frequency of Detection Between 0% and 5% ?	Minimum SQL for Chemicals Never Detected or Detected at Frequency of < 5% (mg/kg)	Maximum SQL for Chemicals Never Detected or Detected at Frequency of < 5% (mg/kg)	Lowest ESL (mg/kg)	Percentage of SQLs Exceeding ESL	Greater than 50% of SQLs Exceeds ESL ?
Methylphenol	1	0	Yes	1.7E-01	1.7E-01	2.1E+02	0	No
4-Methylphenol	14	0	Yes	1.6E-01	1.7E-01	4.3E+00	0	No
3,3'-Dichlorobenzidine	15	0	Yes	1.3E-01	3.4E-01	1.3E+00	0	No
3-Nitroaniline	15	0	Yes	9.9E-02	8.5E-01	5.9E+00	0	No
4,6-Dinitro-2-methylphenol	15	0	Yes	3.3E-01	8.5E-01	2.3E+01	0	No
4-Bromophenyl phenyl ether	15	0	Yes	3.3E-02	1.7E-01	4.3E+00	0	No
4-Chloro-3-methylphenol	15	0	Yes	1.6E-01	1.7E-01	2.1E+01	0	No
4-Chloroaniline	15	0	Yes	1.6E-01	1.7E-01	4.4E+00	0	No
4-Chlorophenyl phenyl ether	15	0	Yes	3.3E-02	1.7E-01	1.3E+00	0	No
4-Nitroaniline	15	0	Yes	3.3E-01	8.5E-01	3.3E+00	0	No
4-Nitrophenol	15	0	Yes	3.3E-01	8.5E-01	7.0E+00	0	No
Acenaphthene	23	9	No			2.5E+00	0	No
Acenaphthylene	23	0	Yes	3.0E-03	3.5E-01	7.5E+02	0	No
Aniline	14	0	Yes	1.7E-01	1.7E-01	5.3E+01	0	No
Anthracene	23	4	Yes	3.0E-03	1.7E-01	2.4E+00	0	No
Benzo(a)anthracene	23	22	No			1.4E+00	0	No
Benzo(a)pyrene	22	23	No			5.6E+00	0	No
Benzo(b)fluoranthene	22	27	No			4.4E+00	0	No
Benzo(g,h,i)perylene	22	14	No			6.4E+00	0	No
Benzo(k)fluoranthene	22	18	No			5.8E+00	0	No
Benzoic acid	14	0	Yes	8.5E-01	8.5E-01	4.4E+00	0	No
Benzyl alcohol	15	0	Yes	1.3E-01	1.7E-01	4.4E+00	0	No
bis(2-Chloroethoxy)methane	15	0	Yes	6.6E-02	1.7E-01	1.5E+02	0	No
bis(2-Chloroethyl)ether	15	0	Yes	6.6E-02	1.7E-01	1.5E+02	0	No
bis(2-Chloroisopropyl) ether	15	0	Yes	9.9E-02	1.7E-01	1.5E+02	0	No
bis(2-Ethylhexyl)phthalate	18	0	Yes	1.1E-01	3.3E-01	4.9E+00	0	No
Butyl benzyl phthalate	15	0	Yes	3.3E-02	1.7E-01	3.4E+02	0	No
Chrysene	23	22	No			2.4E+00	0	No
Dibenz(a,h)anthracene	22	9	No			5.6E+00	0	No
Dibenzofuran	15	7	No			6.2E+01	0	No
Diethylphthalate	18	0	Yes	1.1E-01	3.3E-01	6.9E+03	0	No
Dimethyl phthalate	15	0	Yes	3.3E-02	1.7E-01	2.0E+02	0	No
Di-n-butylphthalate	18	0	Yes	1.1E-01	3.3E-01	4.9E-01	0	No
Di-n-octyl phthalate	15	0	Yes	3.3E-02	1.7E-01	1.5E+03	0	No
Fluoranthene	23	26	No			3.8E+01	0	No
Fluorene	23	9	No			1.6E+00	0	No
Hexachlorobenzene	15	0	Yes	3.3E-02	1.7E-01	3.4E-01	0	No
Hexachlorobutadiene	17	0	Yes	4.6E-03	1.7E-01	8.5E-01	0	No
Hexachlorocyclopentadiene	15	0	Yes	1.7E-01	1.6E+00	1.3E+01	0	No
Hexachloroethane	15	0	Yes	3.3E-02	1.7E-01	2.1E+00	0	No
Indeno(1,2,3-cd)pyrene	22	18	No			5.8E+00	0	No
Isophorone	15	0	Yes	3.3E-02	1.7E-01	4.8E+02	0	No
Naphthalene	25	4	Yes	3.0E-03	3.5E-01	2.1E+02	0	No
Nitrobenzene	15	0	Yes	9.9E-02	1.7E-01	2.0E+00	0	No
N-Nitrosodimethylamine	21	0	Yes	2.0E-03	3.5E-01	5.6E+01	0	No
N-Nitrosodi-n-propylamine	15	0	Yes	3.3E-02	1.7E-01	5.6E+01	0	No
N-Nitrosodiphenylamine	18	0	Yes	3.3E-02	1.7E-01	2.0E+01	0	No
Pentachlorophenol	15	0	Yes	8.5E-01	1.6E+00	6.0E+00	0	No
Phenanthrene	23	26	No			1.3E+00	0	No
Phenol	15	0	Yes	1.3E-01	1.7E-01	5.0E+00	0	No
Pyrene	23	26	No			1.8E+01	0	No

Comparison of Sample Quantitation Limits in Soil/Sediment (0-4 feet bgs) Against Ecological Screening Levels
Sodium Reactor Experiment (SRE) Area

Chemical	Number of Samples	Percent Frequency of Detection	Frequency of Detection Between 0% and 5% ?	Minimum SQL for Chemicals Never Detected or Detected at Frequency of < 5% (mg/kg)	Maximum SQL for Chemicals Never Detected or Detected at Frequency of < 5% (mg/kg)	Lowest ESL (mg/kg)	Percentage of SQLs Exceeding ESL	Greater than 50% of SQLs Exceeds ESL ?
Total Petroleum Hydrocarbons								
C08-C11(Gasoline Range)	17	0	Yes	3.0E+00	9.9E+01	NA	-	No
C11-C14(Kerosene Range)	17	6	No			NA	-	No
C14-C20(Diesel Range)	17	12	No			NA	-	No
C20-C30(Lubricant Oil Range)	17	59	No			NA	-	No
Hydrocarbons	1	0	Yes	5.0E+00	5.0E+00	NA	-	No
PCDD/PCDFs								
2,3,7,8-TCDD	5	40	No			4.3E-06	0	No
1,2,3,7,8-PeCDD	5	80	No			4.4E-06	0	No
1,2,3,4,7,8-HxCDD	5	80	No			4.5E-05	0	No
1,2,3,6,7,8-HxCDD	5	80	No			1.1E-04	0	No
1,2,3,7,8,9-HxCDD	5	80	No			4.3E-05	0	No
1,2,3,4,6,7,8-HpCDD	5	100	No			9.6E-04	0	No
OCDD	5	100	No			1.2E-01	0	No
2,3,7,8-TCDF	5	60	No			4.4E-06	0	No
1,2,3,7,8-PeCDF	5	40	No			1.0E-04	0	No
2,3,4,7,8-PeCDF	5	80	No			9.8E-06	0	No
1,2,3,4,7,8-HxCDF	5	80	No			4.7E-05	0	No
1,2,3,6,7,8-HxCDF	5	80	No			5.4E-05	0	No
2,3,4,6,7,8-HxCDF	5	80	No			4.9E-05	0	No
1,2,3,7,8,9-HxCDF	5	40	No			4.3E-05	0	No
1,2,3,4,6,7,8-HpCDF	5	80	No			1.1E-03	0	No
1,2,3,4,7,8,9-HpCDF	5	80	No			4.3E-04	0	No
OCDF	5	80	No			9.7E-02	0	No
PCBs								
Aroclor-1016	21	0	Yes	3.5E-02	1.1E+00	5.9E+00	0	No
Aroclor-1221	21	0	Yes	5.3E-02	1.1E+00	5.9E+00	0	No
Aroclor-1232	21	0	Yes	3.5E-02	1.1E+00	2.9E-01	22	No
Aroclor-1242	21	0	Yes	3.5E-02	1.1E+00	2.9E-01	22	No
Aroclor-1248	21	0	Yes	3.5E-02	1.1E+00	6.0E-02	67	Yes
Aroclor-1254	21	24	No			2.9E-01	25	No
Aroclor-1260	21	29	No			2.9E-01	0	No

Notes:
VOC - volatile organic chemicals
SVOC - semivolatile organic chemicals
PCDD/PDDFs - polychlorinated dibenzo-p-dioxins and dibenzofurans
PCBs - polychlorinated biphenyls
SQL - sample quantitation limit
ESL - ecological screening level
mg/kg - milligrams per kilogram
bgs- below ground surface

Comparison of Sample Quantitation Limits in Soil/Sediment (0-2 feet bgs) Against Ecological Screening Levels
Sodium Reactor Experiment (SRE) Area

Chemical	Number of Samples	Percent Frequency of Detection	Frequency of Detection Between 0% and 5% ?	Minimum SQL for Chemicals Never Detected or Detected at Frequency of < 5% (mg/kg)	Maximum SQL for Chemicals Never Detected or Detected at Frequency of < 5% (mg/kg)	Lowest ESL (mg/kg)	Percentage of SQLs Exceeding ESL	Greater than 50% of SQLs Exceeds ESL ?
Inorganic Compounds								
Aluminum	13	100	No			1.2E+01	0	No
Antimony	20	40	No			9.5E-02	100	Yes
Arsenic	24	88	No			1.9E+00	100	Yes
Barium	24	100	No			1.5E+01	0	No
Beryllium	24	58	No			5.1E+00	0	No
Boron	13	8	No			9.2E+00	8	No
Cadmium	24	38	No			2.1E-02	93	Yes
Chromium	24	100	No			9.3E+02	0	No
Hexavalent chromium	3	0	Yes	1.0E+00	1.1E+00	2.0E-01	100	Yes
Cobalt	24	100	No			9.0E+00	0	No
Copper	24	100	No			1.1E+00	0	No
Lead	24	100	No			6.3E-02	0	No
Manganese	7	100	No			7.2E+01	0	No
Methyl mercury	3	67	No			1.7E-01	0	No
Mercury	67	76	No			1.0E-01	63	Yes
Molybdenum	24	17	No			1.1E-01	100	Yes
Nickel	24	88	No			1.0E-01	100	Yes
Selenium	26	4	Yes	2.1E-01	8.0E+00	1.7E-01	100	Yes
Silver	27	11	No			5.4E-01	67	Yes
Thallium	26	27	No			2.9E+00	21	No
Vanadium	24	100	No			1.5E+00	0	No
Zinc	24	100	No			2.1E+01	0	No
VOCs								
1,1,1,2-Tetrachloroethane	6	0	Yes	5.0E-03	2.3E-02	7.6E+01	0	No
1,1,1-Trichloroethane	14	0	Yes	5.0E-03	5.0E-02	4.3E+03	0	No
1,1,2,2-Tetrachloroethane	14	0	Yes	5.0E-03	5.0E-02	6.0E+00	0	No
1,1,2-Trichloro-1,2,2-trifluoroethar	3	0	Yes	2.2E-02	2.3E-02	2.1E+02	0	No
1,1,2-Trichloroethane	14	0	Yes	5.0E-03	5.0E-02	8.3E+00	0	No
1,1-Dichloroethane	14	0	Yes	5.0E-03	5.0E-02	2.1E+02	0	No
1,1-Dichloroethene	14	0	Yes	5.0E-03	5.0E-02	2.9E-01	0	No
1,2,4-Trichlorobenzene	8	0	Yes	1.7E-01	1.7E-01	2.0E+01	0	No
1,2,4-Trimethylbenzene	6	0	Yes	5.0E-03	2.3E-02	1.3E+02	0	No
1,2-Dibromo-3-chloropropane	6	0	Yes	5.0E-03	2.3E-02	2.2E+01	0	No
1,2-Dichlorobenzene	14	0	Yes	5.0E-03	5.0E-02	3.7E+02	0	No
1,2-Dichloroethane	14	0	Yes	5.0E-03	5.0E-02	7.6E+01	0	No
1,2-Dichloroethene (total)	11	9	No			6.8E+01	0	No
1,2-Dichloropropane	11	0	Yes	5.0E-03	5.0E-02	2.5E+01	0	No
1,3,5-Trimethylbenzene	6	0	Yes	5.0E-03	2.3E-02	1.3E+02	0	No
1,3-Dichlorobenzene	14	0	Yes	5.0E-03	5.0E-02	3.2E+02	0	No
1,4-Dichlorobenzene	14	0	Yes	5.0E-03	5.0E-02	2.0E+01	0	No
2-Butanone	14	21	No			7.6E+03	0	No
2-Chloroethylvinylether	3	0	Yes	5.4E-02	5.8E-02	7.3E-01	0	No
2-Chloro-1,1,1-trifluoroethane	3	0	Yes	2.2E-02	2.3E-02	NA	-	No
2-Hexanone	8	0	Yes	5.0E-01	5.0E-01	2.4E+03	0	No
4-Methyl-2-pentanone	8	0	Yes	5.0E-01	5.0E-01	2.4E+03	0	No
Acetone	14	21	No			4.3E+01	0	No
Benzene	14	0	Yes	5.0E-03	5.0E-02	4.3E+00	0	No
Bromodichloromethane	14	0	Yes	5.0E-03	5.0E-02	1.5E+01	0	No
Bromoform	14	0	Yes	5.0E-03	3.0E-01	3.8E+01	0	No
Bromomethane	14	0	Yes	5.0E-03	5.0E-01	2.5E+01	0	No

Comparison of Sample Quantitation Limits in Soil/Sediment (0-2 feet bgs) Against Ecological Screening Levels
Sodium Reactor Experiment (SRE) Area

Chemical	Number of Samples	Percent Frequency of Detection	Frequency of Detection Between 0% and 5% ?	Minimum SQL for Chemicals Never Detected or Detected at Frequency of < 5% (mg/kg)	Maximum SQL for Chemicals Never Detected or Detected at Frequency of < 5% (mg/kg)	Lowest ESL (mg/kg)	Percentage of SQLs Exceeding ESL	Greater than 50% of SQLs Exceeds ESL ?
Carbon disulfide	8	0	Yes	5.0E-02	5.0E-02	4.7E+01	0	No
Carbon tetrachloride	14	0	Yes	5.0E-03	5.0E-02	1.5E+00	0	No
Chlorobenzene	14	0	Yes	5.0E-03	5.0E-02	4.0E+01	0	No
Chloroethane	14	0	Yes	5.0E-03	5.0E-02	7.3E+01	0	No
Chloroform	14	0	Yes	5.0E-03	5.0E-02	2.4E-01	0	No
Chloromethane	14	0	Yes	5.0E-03	5.0E-01	2.5E+01	0	No
Chlorotrifluoroethene	3	0	Yes	2.2E-02	2.3E-02	1.6E+01	0	No
cis-1,2-Dichloroethene	6	0	Yes	5.0E-03	6.0E-03	6.8E+01	0	No
cis-1,3-Dichloropropene	11	0	Yes	5.0E-03	5.0E-02	2.2E+01	0	No
Dibromochloromethane	8	0	Yes	5.0E-02	5.0E-02	4.6E+01	0	No
Dichlorodifluoromethane	6	0	Yes	5.0E-03	1.2E-02	6.4E+01	0	No
Ethylbenzene	14	0	Yes	5.0E-03	5.0E-02	2.1E+02	0	No
m,p-Xylene	6	0	Yes	5.0E-03	1.1E-02	1.3E+02	0	No
Methylene chloride	14	14	No			2.5E+01	0	No
o-Xylene	6	0	Yes	5.0E-03	6.0E-03	1.3E+02	0	No
Styrene	8	0	Yes	5.0E-02	5.0E-02	6.4E+02	0	No
Tetrachloroethene	14	7	No			2.1E+00	0	No
Toluene	14	7	No			2.5E+00	0	No
trans-1,2-Dichloroethene	6	0	Yes	5.0E-03	6.0E-03	9.7E+02	0	No
trans-1,3-Dichloropropene	14	0	Yes	5.0E-03	5.0E-02	4.4E+00	0	No
Trichloroethene	14	14	No			3.0E+00	0	No
Trichlorofluoromethane	6	0	Yes	5.0E-03	6.0E-03	3.0E+02	0	No
Vinyl acetate	8	0	Yes	5.0E-01	5.0E-01	5.0E+02	0	No
Vinyl chloride	14	0	Yes	5.0E-03	5.0E-02	7.3E-01	0	No
Xylenes (total)	11	9	No			1.3E+02	0	No
SVOCs								
2,4,5-Trichlorophenol	8	0	Yes	8.5E-01	8.5E-01	9.0E+00	0	No
2,4,6-Trichlorophenol	8	0	Yes	1.7E-01	1.7E-01	1.0E+01	0	No
2,4-Dichlorophenol	8	0	Yes	1.7E-01	1.7E-01	1.3E+00	0	No
2,4-Dimethylphenol	8	0	Yes	1.7E-01	1.7E-01	1.1E+02	0	No
2,4-Dinitrophenol	8	0	Yes	8.5E-01	8.5E-01	5.9E-01	100	Yes
2,4-Dinitrotoluene	8	0	Yes	1.7E-01	1.7E-01	1.3E+00	0	No
2,6-Dinitrotoluene	8	0	Yes	1.7E-01	1.7E-01	2.5E+00	0	No
2-Chloronaphthalene	8	0	Yes	1.7E-01	1.7E-01	5.3E+02	0	No
2-Chlorophenol	8	0	Yes	1.7E-01	1.7E-01	2.1E+01	0	No
2-Methylnaphthalene	12	0	Yes	3.0E-03	1.7E-01	2.1E+02	0	No
2-Methylphenol	8	0	Yes	1.7E-01	1.7E-01	1.1E+02	0	No
2-Nitroaniline	8	0	Yes	8.5E-01	8.5E-01	2.3E+01	0	No
2-Nitrophenol	8	0	Yes	1.7E-01	1.7E-01	2.3E+01	0	No
Methylphenol	1	0	Yes	1.7E-01	1.7E-01	2.1E+02	0	No
4-Methylphenol	7	0	Yes	1.7E-01	1.7E-01	4.3E+00	0	No
3,3'-Dichlorobenzidine	8	0	Yes	3.4E-01	3.4E-01	1.3E+00	0	No
3-Nitroaniline	8	0	Yes	8.5E-01	8.5E-01	5.9E+00	0	No
4,6-Dinitro-2-methylphenol	8	0	Yes	8.5E-01	8.5E-01	2.3E+01	0	No
4-Bromophenyl phenyl ether	8	0	Yes	1.7E-01	1.7E-01	4.3E+00	0	No
4-Chloro-3-methylphenol	8	0	Yes	1.7E-01	1.7E-01	2.1E+01	0	No
4-Chloroaniline	8	0	Yes	1.7E-01	1.7E-01	4.4E+00	0	No
4-Chlorophenyl phenyl ether	8	0	Yes	1.7E-01	1.7E-01	1.3E+00	0	No
4-Nitroaniline	8	0	Yes	8.5E-01	8.5E-01	3.3E+00	0	No
4-Nitrophenol	8	0	Yes	8.5E-01	8.5E-01	7.0E+00	0	No
Acenaphthene	14	0	Yes	3.0E-03	1.7E-01	2.5E+00	0	No

Comparison of Sample Quantitation Limits in Soil/Sediment (0-2 feet bgs) Against Ecological Screening Levels
Sodium Reactor Experiment (SRE) Area

Chemical	Number of Samples	Percent Frequency of Detection	Frequency of Detection Between 0% and 5% ?	Minimum SQL for Chemicals Never Detected or Detected at Frequency of < 5% (mg/kg)	Maximum SQL for Chemicals Never Detected or Detected at Frequency of < 5% (mg/kg)	Lowest ESL (mg/kg)	Percentage of SQLs Exceeding ESL	Greater than 50% of SQLs Exceeds ESL ?
Acenaphthylene	14	0	Yes	3.0E-03	1.7E-01	7.5E+02	0	No
Aniline	8	0	Yes	1.7E-01	1.7E-01	5.3E+01	0	No
Anthracene	14	0	Yes	3.0E-03	1.7E-01	2.4E+00	0	No
Benzidine	8	0	Yes	1.7E+00	1.7E+00	2.3E+00	0	No
Benzo(a)anthracene	14	21	No			1.4E+00	0	No
Benzo(a)pyrene	13	23	No			5.6E+00	0	No
Benzo(b)fluoranthene	13	31	No			4.4E+00	0	No
Benzo(g,h,i)perylene	13	8	No			6.4E+00	0	No
Benzo(k)fluoranthene	13	15	No			5.8E+00	0	No
Benzoic acid	8	0	Yes	8.5E-01	8.5E-01	4.4E+00	0	No
Benzyl alcohol	8	0	Yes	1.7E-01	1.7E-01	4.4E+00	0	No
bis(2-Chloroethoxy)methane	8	0	Yes	1.7E-01	1.7E-01	1.5E+02	0	No
bis(2-Chloroethyl)ether	8	0	Yes	1.7E-01	1.7E-01	1.5E+02	0	No
bis(2-Chloroisopropyl) ether	8	0	Yes	1.7E-01	1.7E-01	1.5E+02	0	No
bis(2-Ethylhexyl)phthalate	10	0	Yes	1.1E-01	1.7E-01	4.9E+00	0	No
Butyl benzyl phthalate	8	0	Yes	1.7E-01	1.7E-01	3.4E+02	0	No
Chrysene	14	29	No			2.4E+00	0	No
Dibenz(a,h)anthracene	13	0	Yes	3.0E-03	1.7E-01	5.6E+00	0	No
Dibenzofuran	8	0	Yes	1.7E-01	1.7E-01	6.2E+01	0	No
Diethylphthalate	10	0	Yes	1.1E-01	1.7E-01	6.9E+03	0	No
Dimethyl phthalate	8	0	Yes	1.7E-01	1.7E-01	2.0E+02	0	No
Di-n-butylphthalate	10	0	Yes	1.1E-01	1.7E-01	4.9E-01	0	No
Di-n-octyl phthalate	8	0	Yes	1.7E-01	1.7E-01	1.5E+03	0	No
Fluoranthene	14	29	No			3.8E+01	0	No
Fluorene	14	0	Yes	3.0E-03	1.7E-01	1.6E+00	0	No
Hexachlorobenzene	8	0	Yes	1.7E-01	1.7E-01	3.4E-01	0	No
Hexachlorobutadiene	8	0	Yes	1.7E-01	1.7E-01	8.5E-01	0	No
Hexachlorocyclopentadiene	8	0	Yes	1.7E-01	1.7E-01	1.3E+01	0	No
Hexachloroethane	8	0	Yes	1.7E-01	1.7E-01	2.1E+00	0	No
Indeno(1,2,3-cd)pyrene	13	15	No			5.8E+00	0	No
Isophorone	8	0	Yes	1.7E-01	1.7E-01	4.8E+02	0	No
Naphthalene	14	0	Yes	3.0E-03	1.7E-01	2.1E+02	0	No
Nitrobenzene	8	0	Yes	1.7E-01	1.7E-01	2.0E+00	0	No
N-Nitrosodimethylamine	13	0	Yes	2.0E-03	1.7E-01	5.6E+01	0	No
N-Nitrosodi-n-propylamine	8	0	Yes	1.7E-01	1.7E-01	5.6E+01	0	No
N-Nitrosodiphenylamine	10	0	Yes	3.4E-02	1.7E-01	2.0E+01	0	No
Pentachlorophenol	8	0	Yes	8.5E-01	8.5E-01	6.0E+00	0	No
Phenanthrene	14	29	No			1.3E+00	0	No
Phenol	8	0	Yes	1.7E-01	1.7E-01	5.0E+00	0	No
Pyrene	14	29	No			1.8E+01	0	No
Total Petroleum Hydrocarbons								
C08-C11(Gasoline Range)	14	0	Yes	3.0E+00	9.9E+01	NA	-	No
C11-C14(Kerosene Range)	14	7	No			NA	-	No
C14-C20(Diesel Range)	14	0	Yes	3.0E+00	9.9E+01	NA	-	No
C20-C30(Lubricant Oil Range)	14	57	No			NA	-	No
Hydrocarbons	1	0	Yes	5.0E+00	5.0E+00	NA	-	No
PCDD/PCDFs								
2,3,7,8-TCDD	4	50	No			4.3E-06	0	No
1,2,3,7,8-PeCDD	4	100	No			4.4E-06	0	No
1,2,3,4,7,8-HxCDD	4	100	No			4.5E-05	0	No
1,2,3,6,7,8-HxCDD	4	100	No			1.1E-04	0	No

Comparison of Sample Quantitation Limits in Soil/Sediment (0-2 feet bgs) Against Ecological Screening Levels
Sodium Reactor Experiment (SRE) Area

Chemical	Number of Samples	Percent Frequency of Detection	Frequency of Detection Between 0% and 5% ?	Minimum SQL for Chemicals Never Detected or Detected at Frequency of < 5% (mg/kg)	Maximum SQL for Chemicals Never Detected or Detected at Frequency of < 5% (mg/kg)	Lowest ESL (mg/kg)	Percentage of SQLs Exceeding ESL	Greater than 50% of SQLs Exceeds ESL ?
1,2,3,7,8,9-HxCDD	4	100	No			4.3E-05	0	No
1,2,3,4,6,7,8-HpCDD	4	100	No			9.6E-04	0	No
OCDD	4	100	No			1.2E-01	0	No
2,3,7,8-TCDF	4	75	No			4.4E-06	0	No
1,2,3,7,8-PeCDF	4	50	No			1.0E-04	0	No
2,3,4,7,8-PeCDF	4	100	No			9.8E-06	0	No
1,2,3,4,7,8-HxCDF	4	100	No			4.7E-05	0	No
1,2,3,6,7,8-HxCDF	4	100	No			5.4E-05	0	No
2,3,4,6,7,8-HxCDF	4	100	No			4.9E-05	0	No
1,2,3,7,8,9-HxCDF	4	50	No			4.3E-05	0	No
1,2,3,4,6,7,8-HpCDF	4	100	No			1.1E-03	0	No
1,2,3,4,7,8,9-HpCDF	4	100	No			4.3E-04	0	No
OCDF	4	100	No			9.7E-02	0	No
PCBs								
Aroclor-1016	20	0	Yes	3.5E-02	1.1E+00	5.9E+00	0	No
Aroclor-1221	20	0	Yes	5.3E-02	1.1E+00	5.9E+00	0	No
Aroclor-1232	20	0	Yes	3.5E-02	1.1E+00	2.9E-01	20	No
Aroclor-1242	20	0	Yes	3.5E-02	1.1E+00	2.9E-01	20	No
Aroclor-1248	20	0	Yes	3.5E-02	1.1E+00	6.0E-02	60	Yes
Aroclor-1254	20	25	No			2.9E-01	27	No
Aroclor-1260	20	25	No			2.9E-01	0	No

Notes:
VOC - volatile organic chemicals
SVOC - semivolatile organic chemicals
PCDD/PDDFs - polychlorinated dibenzo-p-dioxins and dibenzofurans
PCBs - polychlorinated biphenyls
SQL - sample quantitation limit
ESL - ecological screening level
mg/kg - milligrams per kilogram
bgs- below ground surface

Selection of Chemicals of Potential Ecological Concern in Soil Vapor (0-6 feet bgs)
Sodium Reactor Experiment (SRE) Area

Chemical	Number of Samples	Number of Detects	Precent Frequency of Detection	Maximum Detected Concentration (ug/L)	Chemical Detected in Laboratory Blanks[a]	CPEC
1,1,1,2-Tetrachloroethane	6	0	0	-	No	No
1,1,1-Trichloroethane	6	0	0	-	No	Yes [b]
1,1,2,2-Tetrachloroethane	6	0	0	-	No	No
1,1,2-Trichloro-1,2,2-trifluoroethane	6	2	33	3.8	No	Yes
1,1,2-Trichloroethane	6	0	0	-	No	No
1,1-Dichloroethane	6	0	0	-	No	Yes [b]
1,1-Dichloroethene	6	0	0	-	No	No
1,2-Dichloroethane	6	0	0	-	No	No
Benzene	6	0	0	-	No	No
Carbon tetrachloride	6	0	0	-	No	No
Chloroethane	6	0	0	-	No	No
Chloroform	6	0	0	-	No	No
Dichlorodifluoromethane	6	0	0	-	No	No
Ethylbenzene	6	0	0	-	No	Yes [b]
Methylene chloride	6	0	0	-	No	Yes [b]
Tetrachloroethene	6	0	0	-	No	Yes [b]
Toluene	6	0	0	-	No	Yes [b]
Trichloroethene	6	0	0	-	No	Yes [b]
Trichlorofluoromethane	6	0	0	-	No	No
Vinyl chloride	6	0	0	-	No	No
cis-1,2-Dichloroethene	6	0	0	-	No	No
m,p-Xylene	6	0	0	-	No	Yes [b]
o-Xylene	6	0	0	-	No	No
trans-1,2-Dichloroethene	6	0	0	-	No	No

Notes:

a. Any chemical eliminated as COPC due to laboratory blank contamination is discussed in Section 3.0.

b. Selected as a soil vapor COPC since it was detected in soil.

c. Selected as a soil vapor COPC since total petrolum hydrocarbon fraction C08-C11 was detected in soil.

COPC - chemical of potential concern

VOC - volatile organic chemicals

"-" not applicable

ug/L - micrograms per liter vapor by volume.

bgs- below ground surface

Selection of Chemicals of Potential Ecological Concern in Soil/Sediment (0-6 feet bgs)
Sodium Reactor Experiment (SRE) Area

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (mg/kg)	Chemical Detected in Laboratory Blanks [a]	Maximum Detected Concentration Exceeds Background [b]	Maximum SQL (mg/kg)	SQLs Exceed Background	SQLs Exceed ESLs	Potentially Site Related	CPEC	
Inorganic Compounds												
Aluminum	22	21	95	2.2E+04	No	No	3.7E+00	-	No	Yes	No	c
Antimony	34	11	32	8.6E-01	No	No	6.8E-01	-	Yes	Yes	No	c
Arsenic	41	35	85	9.0E+00	No	No	6.0E+00	-	Yes	Yes	No	c
Barium	41	40	98	2.0E+02	No	No	2.4E-01	-	No	Yes	No	c
Beryllium	41	24	59	1.4E+00	No	No	3.0E-02	-	No	Yes	No	c
Boron	22	5	23	1.0E+01	No	No	2.9E+00	-	Yes	Yes	No	c
Cadmium	41	11	27	4.6E+00	No	Yes	2.0E-02	-	Yes	Yes	Yes	
Chromium	41	40	98	4.1E+01	No	No	3.8E-01	-	No	Yes	No	c
Hexavalent chromium	5	0	0	0.0E+00	No	No	1.0E+00	Yes	Yes	Yes	No	
Cobalt	41	40	98	1.5E+01	No	No	1.9E-01	-	No	Yes	No	c
Copper	41	40	98	1.3E+02	No	Yes	5.1E-01	-	No	Yes	Yes	
Lead	41	41	100	9.0E+01	No	Yes		-	No	Yes	Yes	
Manganese	13	13	100	9.1E+02	No	No		-	No	Yes	No	c
Methyl mercury	3	2	67	3.6E-03	No	Yes	4.0E-06	-	No	Yes	Yes	
Mercury	89	58	65	3.5E+01	No	Yes	1.0E-02	-	Yes	Yes	Yes	
Molybdenum	41	7	17	7.1E-01	No	No	3.3E-01	-	Yes	Yes	No	c
Nickel	41	35	85	2.4E+01	No	No	4.3E-01	-	Yes	Yes	No	c
Selenium	42	5	12	1.0E+00	No	No	2.1E-01	-	Yes	Yes	No	c
Silver	45	5	11	1.1E+01	No	Yes	2.1E-02	-	Yes	Yes	Yes	
Thallium	43	12	28	4.0E+00	No	Yes	1.5E-01	-	Yes	Yes	Yes	
Vanadium	41	40	98	7.7E+01	No	No	2.7E-01	-	No	Yes	No	c
Zinc	41	40	98	1.5E+03	No	Yes	4.2E-01	-	No	Yes	Yes	
VOCs												
1,1,1,2-Tetrachloroethane	11	0	0	-	No	-	4.6E-03	-	No	Yes	No	
1,1,1-Trichloroethane	25	2	8	4.0E-01	No	-	1.8E-03	-	No	Yes	Yes	
1,1,2,2-Tetrachloroethane	25	0	0	-	No	-	1.8E-03	-	No	Yes	No	
1,1,2-Trichloro-1,2,2-trifluoroethane	8	0	0	-	No	-	4.6E-03	-	No	Yes	Yes	d
1,1,2-Trichloroethane	25	0	0	-	No	-	1.8E-03	-	No	Yes	No	
1,1-Dichloroethane	25	2	8	1.3E-01	No	-	1.8E-03	-	No	Yes	Yes	
1,1-Dichloroethene	25	0	0	-	No	-	4.6E-03	-	No	Yes	No	
1,1-Dichloropropene	2	0	0	-	No	-	1.8E-03	-	No	Yes	No	
1,2,3-Trichlorobenzene	2	0	0	-	No	-	4.6E-03	-	No	Yes	No	

Selection of Chemicals of Potential Ecological Concern in Soil/Sediment (0-6 feet bgs)
Sodium Reactor Experiment (SRE) Area

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (mg/kg)	Chemical Detected in Laboratory Blanks [a]	Maximum Detected Concentration Exceeds Background [b]	Maximum SQL (mg/kg)	SQLs Exceed Background	SQLs Exceed ESLs	Potentially Site Related	CPEC
1,2,3-Trichloropropane	2	0	0	-	No	-	9.1E-03	-	No	Yes	No
1,2,4-Trichlorobenzene	17	0	0	-	No	-	4.6E-03	-	No	Yes	No
1,2,4-Trimethylbenzene	11	0	0	-	No	-	1.8E-03	-	No	Yes	No
1,2-Dibromo-3-chloropropane	11	0	0	-	No	-	4.6E-03	-	No	Yes	No
1,2-Dibromoethane	2	0	0	-	No	-	1.8E-03	-	No	Yes	No
1,2-Dichlorobenzene	26	0	0	-	No	-	1.8E-03	-	No	Yes	No
1,2-Dichloroethane	25	0	0	-	No	-	1.8E-03	-	No	Yes	No
1,2-Dichloroethene (total)	18	2	11	1.2E-01	No	-	1.0E-02	-	No	Yes	Yes
1,2-Dichloropropane	21	0	0	-	No	-	1.8E-03	-	No	Yes	No
1,3,5-Trimethylbenzene	11	0	0	-	No	-	1.8E-03	-	No	Yes	No
1,3-Dichlorobenzene	26	0	0	-	No	-	1.8E-03	-	No	Yes	No
1,3-Dichloropropane	2	0	0	-	No	-	1.8E-03	-	No	Yes	No
1,4-Dichlorobenzene	26	0	0	-	No	-	1.8E-03	-	No	Yes	No
2,2-Dichloropropane	2	0	0	-	No	-	1.8E-03	-	No	Yes	No
2-Butanone	25	3	12	3.7E-02	No	-	5.0E-03	-	No	Yes	Yes
2-Chloroethylvinylether	8	0	0	-	No	-	4.6E-03	-	No	Yes	No
2-Chlorotoluene	2	0	0	-	No	-	4.6E-03	-	No	Yes	No
2-Hexanone	16	0	0	-	No	-	9.1E-03	-	No	Yes	No
4-Chlorotoluene	2	0	0	-	No	-	4.6E-03	-	No	Yes	No
4-Isopropyltoluene	2	0	0	-	No	-	1.8E-03	-	-	Yes	No
4-Methyl-2-pentanone	16	0	0	-	No	-	4.6E-03	-	No	Yes	No
Acetone	25	5	20	5.2E+00	No	-	9.1E-03		No	Yes	Yes
Benzene	25	0	0	-	No	-	1.8E-03	-	No	Yes	No
Bromobenzene	2	0	0	-	No	-	4.6E-03	-	No	Yes	No
Bromochloromethane	2	0	0	-	No	-	4.6E-03	-	No	Yes	No
Bromodichloromethane	25	0	0	-	No	-	1.8E-03	-	No	Yes	No
Bromoform	25	0	0	-	No	-	4.6E-03	-	No	Yes	No
Bromomethane	25	0	0	-	No	-	4.6E-03	-	No	Yes	No
Carbon disulfide	14	0	0	-	No	-	5.0E-02	-	No	Yes	No
Carbon tetrachloride	25	0	0	-	No	-	4.6E-03	-	No	Yes	No
Chlorobenzene	25	0	0	-	No	-	1.8E-03	-	No	Yes	No
Chloroethane	25	0	0	-	No	-	4.6E-03	-	No	Yes	No
Chloroform	25	0	0	-	No	-	1.8E-03	-	No	Yes	No
Chloromethane	25	0	0	-	No	-	4.6E-03	-	No	Yes	No

Selection of Chemicals of Potential Ecological Concern in Soil/Sediment (0-6 feet bgs)
Sodium Reactor Experiment (SRE) Area

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (mg/kg)	Chemical Detected in Laboratory Blanks [a]	Maximum Detected Concentration Exceeds Background [b]	Maximum SQL (mg/kg)	SQLs Exceed Background	SQLs Exceed ESLs	Potentially Site Related	CPEC
Chlorotrifluoroethene	6	0	0	-	No	-	5.0E-03	-	No	Yes	No
cis-1,2-Dichloroethene	11	0	0	-	No	-	1.8E-03	-	No	Yes	No
cis-1,3-Dichloropropene	21	0	0	-	No	-	1.8E-03	-	No	Yes	No
Dibromochloromethane	16	0	0	-	No	-	1.8E-03	-	No	Yes	No
Dibromomethane	2	0	0	-	No	-	1.8E-03	-	No	Yes	No
Dichlorodifluoromethane	11	0	0	-	No	-	4.6E-03	-	No	Yes	No
Ethylbenzene	25	1	4	1.0E-01	No	-	1.8E-03	-	No	Yes	Yes
Isopropylbenzene	2	0	0	-	No	-	1.8E-03	-	No	Yes	No
m,p-Xylene	11	1	9	6.0E-04	No	-	1.8E-03	-	No	Yes	Yes
Methyl tert-butyl ether	2	0	0	-	No	-	4.6E-03	-	No	Yes	No
Methylene chloride	25	4	16	4.2E+00	No	-	5.0E-03	-	No	Yes	Yes
n-Butylbenzene	2	0	0	-	No	-	4.6E-03	-	No	Yes	No
n-Propylbenzene	2	0	0	-	No	-	1.8E-03	-	No	Yes	No
o-Xylene	11	0	0	-	No	-	1.8E-03	-	No	Yes	No
sec-Butylbenzene	2	0	0	-	No	-	4.6E-03	-	No	Yes	No
Styrene	16	0	0	-	No	-	1.8E-03	-	No	Yes	No
tert-Butylbenzene	2	0	0	-	No	-	4.6E-03	-	No	Yes	No
Tetrachloroethene	25	3	12	3.3E-01	No	-	1.8E-03	-	No	Yes	Yes
Toluene	25	3	12	3.6E+00	No	-	1.8E-03	-	No	Yes	Yes
trans-1,2-Dichloroethene	11	0	0	-	No	-	1.8E-03	-	No	Yes	No
trans-1,3-Dichloropropene	25	0	0	-	No	-	1.8E-03	-	No	Yes	No
Trichloroethene	25	4	16	1.0E+00	No	-	1.8E-03	-	No	Yes	Yes
Trichlorofluoromethane	11	0	0	-	No	-	4.6E-03	-	No	Yes	No
Vinyl acetate	14	0	0	-	No	-	5.0E-01	-	No	Yes	No
Vinyl chloride	25	0	0	-	No	-	1.8E-03	-	No	Yes	No
Xylenes (total)	18	4	22	5.2E-01	No	-	1.5E-02	-	No	Yes	Yes
SVOCs											
2,4,5-Trichlorophenol	15	0	0	-	No	-	2.0E-01	-	No	No	No
2,4,6-Trichlorophenol	15	0	0	-	No	-	1.7E-01	-	No	No	No
2,4-Dichlorophenol	15	0	0	-	No	-	1.6E-01	-	No	No	No
2,4-Dimethylphenol	15	0	0	-	No	-	9.9E-02	-	No	No	No
2,4-Dinitrophenol	15	0	0	-	No	-	8.5E-01	-	Yes	No	No
2,4-Dinitrotoluene	15	0	0	-	No	-	3.3E-02	-	No	No	No
2,6-Dinitrotoluene	15	0	0	-	No	-	9.9E-02	-	No	No	No

Selection of Chemicals of Potential Ecological Concern in Soil/Sediment (0-6 feet bgs)
Sodium Reactor Experiment (SRE) Area

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (mg/kg)	Chemical Detected in Laboratory Blanks [a]	Maximum Detected Concentration Exceeds Background [b]	Maximum SQL (mg/kg)	SQLs Exceed Background	SQLs Exceed ESLs	Potentially Site Related	CPEC
2-Chloronaphthalene	15	0	0	-	No	-	3.3E-02	-	No	No	No
2-Chlorophenol	15	0	0	-	No	-	1.3E-01	-	No	No	No
2-Methylnaphthalene	23	2	9	2.5E-02	No	-	3.0E-03	-	No	No	No
2-Methylphenol	15	0	0	-	No	-	1.6E-01	-	No	No	No
2-Nitroaniline	15	0	0	-	No	-	9.9E-02	-	No	No	No
2-Nitrophenol	15	0	0	-	No	-	1.3E-01	-	No	No	No
Methylphenol	1	0	0	-	No	-	1.7E-01	-	No	No	No
4-Methylphenol	14	0	0	-	No	-	1.6E-01	-	No	No	No
3,3'-Dichlorobenzidine	15	0	0	-	No	-	1.3E-01	-	No	No	No
3-Nitroaniline	15	0	0	-	No	-	9.9E-02	-	No	No	No
4,6-Dinitro-2-methylphenol	15	0	0	-	No	-	3.3E-01	-	No	No	No
4-Bromophenyl phenyl ether	15	0	0	-	No	-	3.3E-02	-	No	No	No
4-Chloro-3-methylphenol	15	0	0	-	No	-	1.6E-01	-	No	No	No
4-Chloroaniline	15	0	0	-	No	-	1.6E-01	-	No	No	No
4-Chlorophenyl phenyl ether	15	0	0	-	No	-	3.3E-02	-	No	No	No
4-Nitroaniline	15	0	0	-	No	-	3.3E-01	-	No	No	No
4-Nitrophenol	15	0	0	-	No	-	3.3E-01	-	No	No	No
Acenaphthene	26	4	15	9.0E-01	No	-	3.0E-03	-	No	Yes	Yes
Acenaphthylene	26	0	0	-	No	-	3.0E-03	-	No	Yes	Yes [e]
Aniline	14	0	0	-	No	-	1.7E-01	-	No	No	No
Anthracene	26	1	4	4.0E+00	No	-	3.0E-03	-	No	Yes	Yes
Benzidine	14	0	0	-	No	-	1.7E+00	-	No	No	No
Benzo(a)anthracene	26	5	19	1.4E+01	No	-	3.0E-03	-	No	Yes	Yes
Benzo(a)pyrene	25	5	20	1.5E+01	No	-	3.0E-03	-	No	Yes	Yes
Benzo(b)fluoranthene	25	6	24	1.3E+01	No	-	3.0E-03	-	No	Yes	Yes
Benzo(e)pyrene	-	-	-	-	No	-	-	-	-	Yes	Yes [e]
Benzo(g,h,i)perylene	25	3	12	4.7E+00	No	-	3.0E-03	-	No	Yes	Yes
Benzo(k)fluoranthene	25	4	16	1.5E+01	No	-	3.0E-03	-	No	Yes	Yes
Benzoic acid	14	0	0	-	No	-	8.5E-01	-	No	No	No
Benzyl alcohol	15	0	0	-	No	-	1.3E-01	-	No	No	No
bis(2-Chloroethoxy)methane	15	0	0	-	No	-	6.6E-02	-	No	No	No
bis(2-Chloroethyl)ether	15	0	0	-	No	-	6.6E-02	-	No	No	No
bis(2-Chloroisopropyl) ether	15	0	0	-	No	-	9.9E-02	-	No	No	No
bis(2-Ethylhexyl)phthalate	18	0	0	-	No	-	1.1E-01	-	No	No	No

Selection of Chemicals of Potential Ecological Concern in Soil/Sediment (0-6 feet bgs)
Sodium Reactor Experiment (SRE) Area

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (mg/kg)	Chemical Detected in Laboratory Blanks [a]	Maximum Detected Concentration Exceeds Background [b]	Maximum SQL (mg/kg)	SQLs Exceed Background	SQLs Exceed ESLs	Potentially Site Related	CPEC
Butyl benzyl phthalate	15	0	0	-	No	-	3.3E-02	-	No	No	No
Chrysene	26	5	19	1.3E+01	No	-	3.0E-03	-	No	Yes	Yes
Dibenz(a,h)anthracene	25	2	8	2.2E+00	No	-	3.0E-03	-	No	Yes	Yes
Dibenzofuran	15	1	7	2.8E-01	No	-	1.7E-01	-	No	No	Yes
Diethylphthalate	18	0	0	-	No	-	1.1E-01	-	No	No	No
Dimethyl phthalate	15	0	0	-	No	-	3.3E-02	-	No	No	No
Di-n-butylphthalate	18	0	0	-	No	-	1.1E-01	-	No	No	No
Di-n-octyl phthalate	15	0	0	-	No	-	3.3E-02	-	No	No	No
Fluoranthene	26	6	23	2.5E+01	No	-	3.0E-03	-	No	Yes	Yes
Fluorene	26	2	8	9.2E-01	No	-	3.0E-03	-	No	Yes	Yes
Hexachlorobenzene	15	0	0	-	No	-	3.3E-02	-	No	No	No
Hexachlorobutadiene	17	0	0	-	No	-	4.6E-03	-	No	No	No
Hexachlorocyclopentadiene	15	0	0	-	No	-	1.7E-01	-	No	No	No
Hexachloroethane	15	0	0	-	No	-	3.3E-02	-	No	No	No
Indeno(1,2,3-cd)pyrene	25	4	16	6.4E+00	No	-	3.0E-03	-	No	No	Yes
Isophorone	15	0	0	-	No	-	3.3E-02	-	No	No	No
Naphthalene	28	2	7	5.8E-02	No	-	3.0E-03	-	No	No	Yes
Nitrobenzene	15	0	0	-	No	-	9.9E-02	-	No	No	No
N-Nitrosodimethylamine	24	0	0	-	No	-	2.0E-03	-	No	No	No
N-Nitrosodi-n-propylamine	15	0	0	-	No	-	3.3E-02	-	No	No	No
N-Nitrosodiphenylamine	18	0	0	-	No	-	3.3E-02	-	No	No	No
Pentachlorophenol	15	0	0	-	No	-	8.5E-01	-	No	No	No
Perylene	-	-	-	-	No	-	-	-	-	Yes	Yes [e]
Phenanthrene	26	6	23	1.1E+01	No	-	3.0E-03	-	No	Yes	Yes
Phenol	15	0	0	-	No	-	1.3E-01	-	No	No	No
Pyrene	26	6	23	2.1E+01	No	-	3.0E-03	-	No	Yes	Yes
Total Petroleum Hydrocarbons											
C08-C11(Gasoline Range)	20	0	0	-	No	-	3.0E+00	-	-	Yes	No
C11-C14(Kerosene Range)	20	1	5	4.0E+01	No	-	3.0E+00	-	-	Yes	Yes
C14-C20(Diesel Range)	20	2	10	1.8E+01	No	-	3.0E+00	-	-	Yes	Yes
C20-C30(Lubricant Oil Range)	20	10	50	4.7E+02	No	-	4.0E+00	-	-	Yes	Yes
Hydrocarbons	1	0	0	-	No	-	5.0E+00	-	-	Yes	No

Selection of Chemicals of Potential Ecological Concern in Soil/Sediment (0-6 feet bgs)
Sodium Reactor Experiment (SRE) Area

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (mg/kg)	Chemical Detected in Laboratory Blanks [a]	Maximum Detected Concentration Exceeds Background [b]	Maximum SQL (mg/kg)	SQLs Exceed Background	SQLs Exceed ESLs	Potentially Site Related	CPEC
PCDD/PCDFs											
2,3,7,8-TCDD	5	2	40	5.3E-07	No	-	7.5E-08	-	No	Yes	Yes
1,2,3,7,8-PeCDD	5	4	80	2.2E-06	No	-	1.0E-07	-	No	Yes	Yes
1,2,3,4,7,8-HxCDD	5	4	80	1.0E-05	No	-	2.1E-07	-	No	Yes	Yes
1,2,3,6,7,8-HxCDD	5	4	80	3.0E-05	No	-	2.2E-07	-	No	Yes	Yes
1,2,3,7,8,9-HxCDD	5	4	80	1.0E-05	No	-	2.1E-07	-	No	Yes	Yes
1,2,3,4,6,7,8-HpCDD	5	5	100	1.3E-03	No	-		-	No	Yes	Yes
OCDD	5	5	100	1.9E-02	No	-		-	No	Yes	Yes
2,3,7,8-TCDF	5	3	60	7.9E-07	No	-	9.7E-08	-	No	Yes	Yes
1,2,3,7,8-PeCDF	5	2	40	5.8E-07	No	-	1.1E-07	-	No	Yes	Yes
2,3,4,7,8-PeCDF	5	4	80	1.6E-06	No	-	1.2E-07	-	No	Yes	Yes
1,2,3,4,7,8-HxCDF	5	4	80	3.7E-06	No	-	7.8E-08	-	No	Yes	Yes
1,2,3,6,7,8-HxCDF	5	4	80	3.4E-06	No	-	7.8E-08	-	No	Yes	Yes
2,3,4,6,7,8-HxCDF	5	4	80	1.0E-05	No	-	9.2E-08	-	No	Yes	Yes
1,2,3,7,8,9-HxCDF	5	2	40	9.7E-07	No	-	1.6E-07	-	No	Yes	Yes
1,2,3,4,6,7,8-HpCDF	5	4	80	1.0E-04	No	-	2.0E-07	-	No	Yes	Yes
1,2,3,4,7,8,9-HpCDF	5	4	80	1.0E-05	No	-	1.3E-07	-	No	Yes	Yes
OCDF	5	4	80	2.4E-04	No	-	2.8E-07	-	No	Yes	Yes
Total Tetra	-	-	-	-	-	Yes	-	-	-	Yes	-
Total Penta	-	-	-	-	-	Yes	-	-	-	Yes	-
Total Hexa	-	-	-	-	-	Yes	-	-	-	Yes	-
Total Hepta	-	-	-	-	-	Yes	-	-	-	Yes	-
Total Octa	-	-	-	-	-	Yes	-	-	-	Yes	-
PCDD/PCDF	-	-	-	-	-	-	-	-	-	Yes	Yes
PCBs											
Aroclor-1016	21	0	0	-	No	-	3.5E-02	-	No	No	No
Aroclor-1221	21	0	0	-	No	-	5.3E-02	-	No	No	No
Aroclor-1232	21	0	0	-	No	-	3.5E-02	-	Yes	No	No
Aroclor-1242	21	0	0	-	No	-	3.5E-02	-	Yes	No	No
Aroclor-1248	21	0	0	-	No	-	3.5E-02	-	Yes	No	No
Aroclor-1254	21	5	24	4.3E-01	No	-	3.5E-02	-	Yes	Yes	Yes
Aroclor-1260	21	6	29	7.8E+00	No	-	3.5E-02	-	No	Yes	Yes
PCB-105	-	-	-	-	No	-	-	-	-	Yes	Yes
PCB-114	-	-	-	-	No	-	-	-	-	Yes	Yes

Selection of Chemicals of Potential Ecological Concern in Soil/Sediment (0-6 feet bgs)
Sodium Reactor Experiment (SRE) Area

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (mg/kg)	Chemical Detected in Laboratory Blanks [a]	Maximum Detected Concentration Exceeds Background [b]	Maximum SQL (mg/kg)	SQLs Exceed Background	SQLs Exceed ESLs	Potentially Site Related	CPEC
PCB-118	-	-	-	-	No	-	-	-	-	Yes	Yes
PCB-123	-	-	-	-	No	-	-	-	-	Yes	Yes
PCB-126	-	-	-	-	No	-	-	-	-	Yes	Yes
PCB-156	-	-	-	-	No	-	-	-	-	Yes	Yes
PCB-157	-	-	-	-	No	-	-	-	-	Yes	Yes
PCB-167	-	-	-	-	No	-	-	-	-	Yes	Yes
PCB-169	-	-	-	-	No	-	-	-	-	Yes	Yes
PCB-189	-	-	-	-	No	-	-	-	-	Yes	Yes
PCB-77	-	-	-	-	No	-	-	-	-	Yes	Yes
PCB-81	-	-	-	-	No	-	-	-	-	Yes	Yes

Notes:
a. Any chemical eliminated as CPEC due to laboratory blank contamination is discussed in Section 3.0.
b. Background comparision for inorganic compounds presented in Attachment 1 Spreadsheet D-82.
c. Not selected as CPEC since the RFI site sample population for soils at 0 to 6 feet bgs was found to be no different than the background sample population at p=0.05 based on the Wilcoxon Rank Sum Test.
d. Selected as a soil COPC since it was selected as a COPC in soil vapor at 0 to 6 feet bgs.
e. Selected as a CPEC since either petroleum hydrocarbon fraction C11-C14, C14-C20, or C20-C30 was selected as a CPEC.
CPEC - chemical of potential ecological concern
ESL - ecological screening level
SQL - sample quantitation limit
VOC - volatile organic chemicals
SVOC - semivolatile organic chemicals
PCBs - polychlorinated biphenyls
Total Tetra - sum of the 2,3,7,8-substituted tetrachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations
Total Penta - sum of the 2,3,7,8-substituted pentachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations
Total Hexa - sum of the 2,3,7,8-substituted hexachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations
Total Hepta - sum of the 2,3,7,8-substituted heptachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations
Total Octa - sum of the octachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations concentrations
PCDD/PDDFs - polychlorinated dibenzo-p-dioxins and dibenzofurans
"-" not applicable
mg/kg - milligrams per kilogram
bgs- below ground surface

Selection of Chemicals of Potential Ecological Concern in Soil/Sediment (0-4 feet bgs)
Sodium Reactor Experiment (SRE) Area

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (mg/kg)	Chemical Detected in Laboratory Blanks [a]	Maximum Detected Concentration Exceeds Background [b]	Maximum SQL (mg/kg)	SQLs Exceed Background	SQLs Exceed ESLs	Potentially Site Related	CPEC	
Inorganic Compounds												
Aluminum	18	18	100	2.2E+04	No	No		-	No	Yes	No	c
Antimony	30	8	27	8.6E-01	No	No	2.0E+00	-	Yes	Yes	No	c
Arsenic	37	31	84	9.0E+00	No	No	6.0E+00	-	Yes	Yes	No	c
Barium	37	37	100	2.0E+02	No	No		-	No	Yes	No	c
Beryllium	37	21	57	1.4E+00	No	No	5.0E-01	-	No	Yes	No	c
Boron	18	2	11	1.0E+01	No	No	2.9E+00	-	Yes	Yes	No	c
Cadmium	37	10	27	4.6E+00	No	Yes	2.0E-02	-	Yes	Yes	Yes	
Chromium	37	37	100	4.1E+01	No	No		-	No	Yes	No	c
Hexavalent chromium	5	0	0	0.0E+00	No	No	1.0E+00	Yes	Yes	Yes	No	
Cobalt	37	37	100	1.5E+01	No	No		-	No	Yes	No	c
Copper	37	37	100	1.3E+02	No	Yes		-	No	Yes	Yes	
Lead	37	37	100	9.0E+01	No	Yes		-	No	Yes	Yes	
Manganese	9	9	100	9.1E+02	No	No		-	No	Yes	No	c
Methyl mercury	3	2	67	3.6E-03	No	Yes	4.0E-06	-	No	Yes	Yes	
Mercury	85	58	68	3.5E+01	No	Yes	1.0E-02	-	Yes	Yes	Yes	
Molybdenum	37	6	16	7.1E-01	No	No	3.3E-01	-	Yes	Yes	No	c
Nickel	37	32	86	2.4E+01	No	No	4.9E+00	-	Yes	Yes	No	c
Selenium	38	1	3	7.7E-01	No	No	2.1E-01	No	Yes	Yes	No	c
Silver	41	5	12	1.1E+01	No	Yes	2.1E-02	-	Yes	Yes	Yes	
Thallium	39	11	28	2.1E+00	No	Yes	1.5E-01	-	Yes	Yes	Yes	
Vanadium	37	37	100	7.7E+01	No	No		-	No	Yes	No	c
Zinc	37	37	100	1.5E+03	No	Yes		-	No	Yes	Yes	
VOCs												
1,1,1,2-Tetrachloroethane	10	0	0	0.0E+00	No	-	4.6E-03	-	No	Yes	No	
1,1,1-Trichloroethane	24	2	8	4.0E-01	No	-	1.8E-03	-	No	Yes	Yes	
1,1,2,2-Tetrachloroethane	24	0	0	0.0E+00	No	-	1.8E-03	-	No	Yes	No	
1,1,2-Trichloro-1,2,2-trifluoroethane	7	0	0	-	No	-	4.6E-03	-	No	Yes	Yes	d
1,1,2-Trichloroethane	24	0	0	0.0E+00	No	-	1.8E-03	-	No	Yes	No	
1,1-Dichloroethane	24	2	8	1.3E-01	No	-	1.8E-03	-	No	Yes	Yes	
1,1-Dichloroethene	24	0	0	-	No	-	4.6E-03	-	No	Yes	No	
1,1-Dichloropropene	2	0	0	0.0E+00	No	-	1.8E-03	-	No	Yes	No	
1,2,3-Trichlorobenzene	2	0	0	0.0E+00	No	-	4.6E-03	-	No	Yes	No	
1,2,3-Trichloropropane	2	0	0	0.0E+00	No	-	9.1E-03	-	No	Yes	No	

Selection of Chemicals of Potential Ecological Concern in Soil/Sediment (0-4 feet bgs)
Sodium Reactor Experiment (SRE) Area

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (mg/kg)	Chemical Detected in Laboratory Blanks [a]	Maximum Detected Concentration Exceeds Background [b]	Maximum SQL (mg/kg)	SQLs Exceed Background	SQLs Exceed ESLs	Potentially Site Related	CPEC
1,2,4-Trichlorobenzene	17	0	0	0.0E+00	No	-	4.6E-03	-	No	Yes	No
1,2,4-Trimethylbenzene	10	0	0	0.0E+00	No	-	1.8E-03	-	No	Yes	No
1,2-Dibromo-3-chloropropane	10	0	0	0.0E+00	No	-	4.6E-03	-	No	Yes	No
1,2-Dibromoethane	2	0	0	0.0E+00	No	-	1.8E-03	-	No	Yes	No
1,2-Dichlorobenzene	25	0	0	0.0E+00	No	-	1.8E-03	-	No	Yes	No
1,2-Dichloroethane	24	0	0	0.0E+00	No	-	1.8E-03	-	No	Yes	No
1,2-Dichloroethene (total)	17	2	12	1.2E-01	No	-	1.0E-02	-	No	Yes	Yes
1,2-Dichloropropane	21	0	0	0.0E+00	No	-	1.8E-03	-	No	Yes	No
1,3,5-Trimethylbenzene	10	0	0	0.0E+00	No	-	1.8E-03	-	No	Yes	No
1,3-Dichlorobenzene	25	0	0	0.0E+00	No	-	1.8E-03	-	No	Yes	No
1,3-Dichloropropane	2	0	0	0.0E+00	No	-	1.8E-03	-	No	Yes	No
1,4-Dichlorobenzene	25	0	0	0.0E+00	No	-	1.8E-03	-	No	Yes	No
2,2-Dichloropropane	2	0	0	0.0E+00	No	-	1.8E-03	-	No	Yes	No
2-Butanone	24	3	13	3.7E-02	No	-	9.1E-03	-	No	Yes	Yes
2-Chloroethylvinylether	7	0	0	0.0E+00	No	-	4.6E-03	-	No	Yes	No
2-Chlorotoluene	2	0	0	0.0E+00	No	-	4.6E-03	-	No	Yes	No
2-Hexanone	16	0	0	0.0E+00	No	-	9.1E-03	-	No	Yes	No
4-Chlorotoluene	2	0	0	0.0E+00	No	-	4.6E-03	-	No	Yes	No
4-Isopropyltoluene	2	0	0	0.0E+00	No	-	1.8E-03	-	-	Yes	No
4-Methyl-2-pentanone	16	0	0	0.0E+00	No	-	4.6E-03	-	No	Yes	No
Acetone	24	4	17	5.2E+00	No	-	9.1E-03		No	Yes	Yes
Benzene	24	0	0	0.0E+00	No	-	1.8E-03	-	No	Yes	No
Bromobenzene	2	0	0	0.0E+00	No	-	4.6E-03	-	No	Yes	No
Bromochloromethane	2	0	0	0.0E+00	No	-	4.6E-03	-	No	Yes	No
Bromodichloromethane	24	0	0	0.0E+00	No	-	1.8E-03	-	No	Yes	No
Bromoform	24	0	0	0.0E+00	No	-	4.6E-03	-	No	Yes	No
Bromomethane	24	0	0	0.0E+00	No	-	4.6E-03	-	No	Yes	No
Carbon disulfide	14	0	0	0.0E+00	No	-	5.0E-02	-	No	Yes	No
Carbon tetrachloride	24	0	0	0.0E+00	No	-	4.6E-03	-	No	Yes	No
Chlorobenzene	24	0	0	0.0E+00	No	-	1.8E-03	-	No	Yes	No
Chloroethane	24	0	0	0.0E+00	No	-	4.6E-03	-	No	Yes	No
Chloroform	24	0	0	0.0E+00	No	-	1.8E-03	-	No	Yes	No
Chloromethane	24	0	0	0.0E+00	No	-	4.6E-03	-	No	Yes	No
Chlorotrifluoroethene	5	0	0	0.0E+00	No	-	2.2E-02	-	No	Yes	No

Selection of Chemicals of Potential Ecological Concern in Soil/Sediment (0-4 feet bgs)
Sodium Reactor Experiment (SRE) Area

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (mg/kg)	Chemical Detected in Laboratory Blanks [a]	Maximum Detected Concentration Exceeds Background [b]	Maximum SQL (mg/kg)	SQLs Exceed Background	SQLs Exceed ESLs	Potentially Site Related	CPEC
cis-1,2-Dichloroethene	10	0	0	-	No	-	1.8E-03	-	No	Yes	No
cis-1,3-Dichloropropene	21	0	0	0.0E+00	No	-	1.8E-03	-	No	Yes	No
Dibromochloromethane	16	0	0	0.0E+00	No	-	1.8E-03	-	No	Yes	No
Dibromomethane	2	0	0	0.0E+00	No	-	1.8E-03	-	No	Yes	No
Dichlorodifluoromethane	10	0	0	0.0E+00	No	-	4.6E-03	-	No	Yes	No
Ethylbenzene	24	1	4	1.0E-01	No	-	1.8E-03	-	No	Yes	No
Isopropylbenzene	2	0	0	0.0E+00	No	-	1.8E-03	-	No	Yes	No
m,p-Xylene	10	0	0	0.0E+00	No	-	1.8E-03	-	No	Yes	No
Methyl tert-butyl ether	2	0	0	0.0E+00	No	-	4.6E-03	-	No	Yes	No
Methylene chloride	24	4	17	4.2E+00	No	-	9.0E-03	-	No	Yes	Yes
n-Butylbenzene	2	0	0	0.0E+00	No	-	4.6E-03	-	No	Yes	No
n-Propylbenzene	2	0	0	0.0E+00	No	-	1.8E-03	-	No	Yes	No
o-Xylene	10	0	0	0.0E+00	No	-	1.8E-03	-	No	Yes	No
sec-Butylbenzene	2	0	0	0.0E+00	No	-	4.6E-03	-	No	Yes	No
Styrene	16	0	0	0.0E+00	No	-	1.8E-03	-	No	Yes	No
tert-Butylbenzene	2	0	0	0.0E+00	No	-	4.6E-03	-	No	Yes	No
Tetrachloroethene	24	3	13	3.3E-01	No	-	1.8E-03	-	No	Yes	Yes
Toluene	24	3	13	3.6E+00	No	-	1.8E-03	-	No	Yes	Yes
trans-1,2-Dichloroethene	10	0	0	0.0E+00	No	-	1.8E-03	-	No	Yes	No
trans-1,3-Dichloropropene	24	0	0	0.0E+00	No	-	1.8E-03	-	No	Yes	No
Trichloroethene	24	4	17	1.0E+00	No	-	1.8E-03	-	No	Yes	Yes
Trichlorofluoromethane	10	0	0	0.0E+00	No	-	4.6E-03	-	No	Yes	No
Vinyl acetate	14	0	0	0.0E+00	No	-	5.0E-01	-	No	Yes	No
Vinyl chloride	24	0	0	0.0E+00	No	-	1.8E-03	-	No	Yes	No
Xylenes (total)	17	3	18	5.2E-01	No	-	1.5E-02	-	No	Yes	Yes
SVOCs											
2,4,5-Trichlorophenol	15	0	0	0.0E+00	No	-	2.0E-01	-	No	No	No
2,4,6-Trichlorophenol	15	0	0	0.0E+00	No	-	1.7E-01	-	No	No	No
2,4-Dichlorophenol	15	0	0	0.0E+00	No	-	1.6E-01	-	No	No	No
2,4-Dimethylphenol	15	0	0	0.0E+00	No	-	9.9E-02	-	No	No	No
2,4-Dinitrophenol	15	0	0	0.0E+00	No	-	8.5E-01	-	Yes	No	No
2,4-Dinitrotoluene	15	0	0	0.0E+00	No	-	3.3E-02	-	No	No	No
2,6-Dinitrotoluene	15	0	0	0.0E+00	No	-	9.9E-02	-	No	No	No
2-Chloronaphthalene	15	0	0	0.0E+00	No	-	3.3E-02	-	No	No	No

Selection of Chemicals of Potential Ecological Concern in Soil/Sediment (0-4 feet bgs)
Sodium Reactor Experiment (SRE) Area

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (mg/kg)	Chemical Detected in Laboratory Blanks [a]	Maximum Detected Concentration Exceeds Background [b]	Maximum SQL (mg/kg)	SQLs Exceed Background	SQLs Exceed ESLs	Potentially Site Related	CPEC
2-Chlorophenol	15	0	0	0.0E+00	No	-	1.3E-01	-	No	No	No
2-Methylnaphthalene	20	1	5	2.5E-02	No	-	3.0E-03	-	No	No	No
2-Methylphenol	15	0	0	0.0E+00	No	-	1.6E-01	-	No	No	No
2-Nitroaniline	15	0	0	0.0E+00	No	-	9.9E-02	-	No	No	No
2-Nitrophenol	15	0	0	0.0E+00	No	-	1.3E-01	-	No	No	No
Methylphenol	1	0	0	0.0E+00	No	-	1.7E-01	-	No	No	No
4-Methylphenol	14	0	0	0.0E+00	No	-	1.6E-01	-	No	No	No
3,3'-Dichlorobenzidine	15	0	0	0.0E+00	No	-	1.3E-01	-	No	No	No
3-Nitroaniline	15	0	0	0.0E+00	No	-	9.9E-02	-	No	No	No
4,6-Dinitro-2-methylphenol	15	0	0	0.0E+00	No	-	3.3E-01	-	No	No	No
4-Bromophenyl phenyl ether	15	0	0	0.0E+00	No	-	3.3E-02	-	No	No	No
4-Chloro-3-methylphenol	15	0	0	0.0E+00	No	-	1.6E-01	-	No	No	No
4-Chloroaniline	15	0	0	0.0E+00	No	-	1.6E-01	-	No	No	No
4-Chlorophenyl phenyl ether	15	0	0	0.0E+00	No	-	3.3E-02	-	No	No	No
4-Nitroaniline	15	0	0	0.0E+00	No	-	3.3E-01	-	No	No	No
4-Nitrophenol	15	0	0	0.0E+00	No	-	3.3E-01	-	No	No	No
Acenaphthene	23	2	9	9.0E-01	No	-	3.0E-03	-	No	Yes	Yes
Acenaphthylene	23	0	0	-	No	-	3.0E-03	-	No	Yes	Yes [e]
Aniline	14	0	0	0.0E+00	No	-	1.7E-01	-	No	No	No
Anthracene	23	1	4	4.0E+00	No	-	3.0E-03	-	No	Yes	Yes
Benzidine	14	0	0	0.0E+00	No	-	1.7E+00	-	No	No	No
Benzo(a)anthracene	23	5	22	1.4E+01	No	-	3.0E-03	-	No	Yes	Yes
Benzo(a)pyrene	22	5	23	1.5E+01	No	-	3.0E-03	-	No	Yes	Yes
Benzo(b)fluoranthene	22	6	27	1.3E+01	No	-	3.4E-02	-	No	Yes	Yes
Benzo(e)pyrene	-	-	-	-	No	-	-	-	-	Yes	Yes [e]
Benzo(g,h,i)perylene	22	3	14	4.7E+00	No	-	3.0E-03	-	No	Yes	Yes
Benzo(k)fluoranthene	22	4	18	1.5E+01	No	-	3.0E-03	-	No	Yes	Yes
Benzoic acid	14	0	0	0.0E+00	No	-	8.5E-01	-	No	No	No
Benzyl alcohol	15	0	0	0.0E+00	No	-	1.3E-01	-	No	No	No
bis(2-Chloroethoxy)methane	15	0	0	0.0E+00	No	-	6.6E-02	-	No	No	No
bis(2-Chloroethyl)ether	15	0	0	0.0E+00	No	-	6.6E-02	-	No	No	No
bis(2-Chloroisopropyl) ether	15	0	0	0.0E+00	No	-	9.9E-02	-	No	No	No
bis(2-Ethylhexyl)phthalate	18	0	0	-	No	-	1.1E-01	-	No	No	No
Butyl benzyl phthalate	15	0	0	0.0E+00	No	-	3.3E-02	-	No	No	No

Selection of Chemicals of Potential Ecological Concern in Soil/Sediment (0-4 feet bgs)
Sodium Reactor Experiment (SRE) Area

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (mg/kg)	Chemical Detected in Laboratory Blanks [a]	Maximum Detected Concentration Exceeds Background [b]	Maximum SQL (mg/kg)	SQLs Exceed Background	SQLs Exceed ESLs	Potentially Site Related	CPEC
Chrysene	23	5	22	1.3E+01	No	-	7.0E-03	-	No	Yes	Yes
Dibenz(a,h)anthracene	22	2	9	2.2E+00	No	-	3.0E-03	-	No	Yes	Yes
Dibenzofuran	15	1	7	2.8E-01	No	-	1.7E-01	-	No	No	Yes
Diethylphthalate	18	0	0	-	No	-	1.1E-01	-	No	No	No
Dimethyl phthalate	15	0	0	0.0E+00	No	-	3.3E-02	-	No	No	No
Di-n-butylphthalate	18	0	0	-	No	-	1.1E-01	-	No	No	No
Di-n-octyl phthalate	15	0	0	0.0E+00	No	-	3.3E-02	-	No	No	No
Fluoranthene	23	6	26	2.5E+01	No	-	7.0E-03	-	No	Yes	Yes
Fluorene	23	2	9	9.2E-01	No	-	3.0E-03	-	No	Yes	Yes
Hexachlorobenzene	15	0	0	0.0E+00	No	-	3.3E-02	-	No	No	No
Hexachlorobutadiene	17	0	0	0.0E+00	No	-	4.6E-03	-	No	No	No
Hexachlorocyclopentadiene	15	0	0	0.0E+00	No	-	1.7E-01	-	No	No	No
Hexachloroethane	15	0	0	0.0E+00	No	-	3.3E-02	-	No	No	No
Indeno(1,2,3-cd)pyrene	22	4	18	6.4E+00	No	-	3.0E-03	-	No	No	Yes
Isophorone	15	0	0	0.0E+00	No	-	3.3E-02	-	No	No	No
Naphthalene	25	1	4	5.8E-02	No	-	3.0E-03	-	No	No	No
Nitrobenzene	15	0	0	0.0E+00	No	-	9.9E-02	-	No	No	No
N-Nitrosodimethylamine	21	0	0	-	No	-	2.0E-03	-	No	No	No
N-Nitrosodi-n-propylamine	15	0	0	0.0E+00	No	-	3.3E-02	-	No	No	No
N-Nitrosodiphenylamine	18	0	0	-	No	-	3.3E-02	-	No	No	No
Pentachlorophenol	15	0	0	0.0E+00	No	-	8.5E-01	-	No	No	No
Perylene	-	-	-	-	No	-	-	-	-	Yes	Yes [e]
Phenanthrene	23	6	26	1.1E+01	No	-	3.0E-03	-	No	Yes	Yes
Phenol	15	0	0	0.0E+00	No	-	1.3E-01	-	No	No	No
Pyrene	23	6	26	2.1E+01	No	-	7.0E-03	-	No	Yes	Yes
Total Petroleum Hydrocarbons											
C08-C11(Gasoline Range)	17	0	0	-	No	-	3.0E+00	-	-	Yes	No
C11-C14(Kerosene Range)	17	1	6	4.0E+01	No	-	3.0E+00	-	-	Yes	Yes
C14-C20(Diesel Range)	17	2	12	1.8E+01	No	-	3.0E+00	-	-	Yes	Yes
C20-C30(Lubricant Oil Range)	17	10	59	4.7E+02	No	-	4.0E+00	-	-	Yes	Yes
Hydrocarbons	1	0	0	-	No	-	5.0E+00	-	-	Yes	No
PCDD/PCDFs											
2,3,7,8-TCDD	5	2	40	5.3E-07	No	-	7.5E-08	-	No	Yes	Yes
1,2,3,7,8-PeCDD	5	4	80	2.2E-06	No	-	1.0E-07	-	No	Yes	Yes

Selection of Chemicals of Potential Ecological Concern in Soil/Sediment (0-4 feet bgs)
Sodium Reactor Experiment (SRE) Area

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (mg/kg)	Chemical Detected in Laboratory Blanks [a]	Maximum Detected Concentration Exceeds Background [b]	Maximum SQL (mg/kg)	SQLs Exceed Background	SQLs Exceed ESLs	Potentially Site Related	CPEC
1,2,3,4,7,8-HxCDD	5	4	80	1.0E-05	No	-	2.1E-07	-	No	Yes	Yes
1,2,3,6,7,8-HxCDD	5	4	80	3.0E-05	No	-	2.2E-07	-	No	Yes	Yes
1,2,3,7,8,9-HxCDD	5	4	80	1.0E-05	No	-	2.1E-07	-	No	Yes	Yes
1,2,3,4,6,7,8-HpCDD	5	5	100	1.3E-03	No	-		-	No	Yes	Yes
OCDD	5	5	100	1.9E-02	No	-		-	No	Yes	Yes
2,3,7,8-TCDF	5	3	60	7.9E-07	No	-	9.7E-08	-	No	Yes	Yes
1,2,3,7,8-PeCDF	5	2	40	5.8E-07	No	-	1.1E-07	-	No	Yes	Yes
2,3,4,7,8-PeCDF	5	4	80	1.6E-06	No	-	1.2E-07	-	No	Yes	Yes
1,2,3,4,7,8-HxCDF	5	4	80	3.7E-06	No	-	7.8E-08	-	No	Yes	Yes
1,2,3,6,7,8-HxCDF	5	4	80	3.4E-06	No	-	7.8E-08	-	No	Yes	Yes
2,3,4,6,7,8-HxCDF	5	4	80	1.0E-05	No	-	9.2E-08	-	No	Yes	Yes
1,2,3,7,8,9-HxCDF	5	2	40	9.7E-07	No	-	1.6E-07	-	No	Yes	Yes
1,2,3,4,6,7,8-HpCDF	5	4	80	1.0E-04	No	-	2.0E-07	-	No	Yes	Yes
1,2,3,4,7,8,9-HpCDF	5	4	80	1.0E-05	No	-	1.3E-07	-	No	Yes	Yes
OCDF	5	4	80	2.4E-04	No	-	2.8E-07	-	No	Yes	Yes
Total Tetra	-	-	-	-	-	Yes	-	-	-	Yes	-
Total Penta	-	-	-	-	-	Yes	-	-	-	Yes	-
Total Hexa	-	-	-	-	-	Yes	-	-	-	Yes	-
Total Hepta	-	-	-	-	-	Yes	-	-	-	Yes	-
Total Octa	-	-	-	-	-	Yes	-	-	-	Yes	-
PCDD/PCDF	-	-	-	-	-	-	-	-	-	Yes	Yes
PCBs											
Aroclor-1016	21	0	0	-	No	-	3.5E-02	-	No	No	No
Aroclor-1221	21	0	0	-	No	-	5.3E-02	-	No	No	No
Aroclor-1232	21	0	0	-	No	-	3.5E-02	-	Yes	No	No
Aroclor-1242	21	0	0	-	No	-	3.5E-02	-	Yes	No	No
Aroclor-1248	21	0	0	-	No	-	3.5E-02	-	Yes	No	No
Aroclor-1254	21	5	24	4.3E-01	No	-	3.5E-02	-	Yes	Yes	Yes
Aroclor-1260	21	6	29	7.8E+00	No	-	3.5E-02	-	No	Yes	Yes
PCB-105	-	-	-	-	No	-	-	-	-	Yes	Yes
PCB-114	-	-	-	-	No	-	-	-	-	Yes	Yes
PCB-118	-	-	-	-	No	-	-	-	-	Yes	Yes
PCB-123	-	-	-	-	No	-	-	-	-	Yes	Yes
PCB-126	-	-	-	-	No	-	-	-	-	Yes	Yes

Selection of Chemicals of Potential Ecological Concern in Soil/Sediment (0-4 feet bgs)
Sodium Reactor Experiment (SRE) Area

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (mg/kg)	Chemical Detected in Laboratory Blanks [a]	Maximum Detected Concentration Exceeds Background [b]	Maximum SQL (mg/kg)	SQLs Exceed Background	SQLs Exceed ESLs	Potentially Site Related	CPEC
PCB-156	-	-	-	-	No	-	-	-	-	Yes	Yes
PCB-157	-	-	-	-	No	-	-	-	-	Yes	Yes
PCB-167	-	-	-	-	No	-	-	-	-	Yes	Yes
PCB-169	-	-	-	-	No	-	-	-	-	Yes	Yes
PCB-189	-	-	-	-	No	-	-	-	-	Yes	Yes
PCB-77	-	-	-	-	No	-	-	-	-	Yes	Yes
PCB-81	-	-	-	-	No	-	-	-	-	Yes	Yes

Notes:

a. Any chemical eliminated as CPEC due to laboratory blank contamination is discussed in Section 3.0.

b. Background comparision for inorganic compounds presented in Attachment 1 Spreadsheet D-82.

c. Not selected as CPEC since the RFI site sample population for soils at 0 to 4 feet bgs was found to be no different than the background sample population at p=0.01 based on the Wilcoxon Rank Sum Test.

d. Selected as CPEC in soil at 0 to 4 feet bgs since it was selected as a soil vapor CPEC.

e. Selected as a CPEC since either petroleum hydrocarbon fraction C11-C14, C14-C20, or C20-C30 was selected as a CPEC.

CPEC - chemical of potential ecological concern
ESL - ecological screening level
SQL - sample quantitation limit
VOC - volatile organic chemicals
SVOC - semivolatile organic chemicals
PCBs - polychlorinated biphenyls
Total Tetra - sum of the 2,3,7,8-substituted tetrachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations
Total Penta - sum of the 2,3,7,8-substituted pentachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations
Total Hexa - sum of the 2,3,7,8-substituted hexachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations
Total Hepta - sum of the 2,3,7,8-substituted heptachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations
Total Octa - sum of the octachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations concentrations
PCDD/PDDFs - polychlorinated dibenzo-p-dioxins and dibenzofurans
"-" not applicable
mg/kg - milligrams per kilogram
bgs- below ground surface

Selection of Chemicals of Potential Ecological Concern in Soil/Sediment (0-2 feet bgs)
Sodium Reactor Experiment (SRE) Area

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (mg/kg)	Chemical Detected in Laboratory Blanks [a]	Maximum Detected Concentration Exceeds Background [b]	Maximum SQL (mg/kg)	SQLs Exceed Background	SQLs Exceed ESLs	Potentially Site Related	CPEC
Inorganic Compounds											
Aluminum	13	13	100	1.5E+04	No	No		-	No	Yes	No [c]
Antimony	20	8	40	8.6E-01	No	No	3.0E+00	-	Yes	Yes	No [c]
Arsenic	24	21	88	9.0E+00	No	No	6.0E+00	-	Yes	Yes	No [c]
Barium	24	24	100	2.0E+02	No	No		-	No	Yes	No [c]
Beryllium	24	14	58	1.4E+00	No	No	5.0E-01	-	No	Yes	No [c]
Boron	13	1	8	1.0E+01	No	No	2.9E+00	-	Yes	Yes	No [c]
Cadmium	24	9	38	4.6E+00	No	Yes	2.0E-02	-	Yes	Yes	Yes
Chromium	24	24	100	4.1E+01	No	No		-	No	Yes	No [c]
Hexavalent chromium	3	0	0	0.0E+00	No	No	1.0E+00	Yes	Yes	Yes	No
Cobalt	24	24	100	1.5E+01	No	No		-	No	Yes	No [c]
Copper	24	24	100	1.3E+02	No	Yes		-	No	Yes	Yes
Lead	24	24	100	9.0E+01	No	Yes		-	No	Yes	Yes
Manganese	7	7	100	9.1E+02	No	No		-	No	Yes	No [c]
Methyl mercury	3	2	67	3.6E-03	No	Yes	4.0E-06	-	No	Yes	Yes
Mercury	67	51	76	3.5E+01	No	Yes	1.0E-02	-	Yes	Yes	Yes
Molybdenum	24	4	17	6.5E-01	No	No	3.3E-01	-	Yes	Yes	No [c]
Nickel	24	21	88	2.4E+01	No	No	9.4E+00	-	Yes	Yes	No [c]
Selenium	26	1	4	7.7E-01	No	No	0.21	No	Yes	Yes	No [c]
Silver	27	3	11	4.8E+00	No	Yes	2.1E-02	-	Yes	Yes	Yes
Thallium	26	7	27	3.3E-01	No	Yes	1.5E-01	-	Yes	Yes	Yes
Vanadium	24	24	100	7.7E+01	No	No		-	No	Yes	No [c]
Zinc	24	24	100	1.5E+03	No	Yes		-	No	Yes	Yes
VOCs											
1,1,1,2-Tetrachloroethane	6	0	0	0.0E+00	No	-	5.0E-03	-	No	Yes	No
1,1,1-Trichloroethane	14	0	0	0.0E+00	No	-	5.0E-03	-	No	Yes	No
1,1,2,2-Tetrachloroethane	14	0	0	0.0E+00	No	-	5.0E-03	-	No	Yes	No
1,1,2-Trichloro-1,2,2-trifluoroethane	3	0	0	0.0E+00	No	-	2.2E-02	-	No	Yes	Yes [d]
1,1,2-Trichloroethane	14	0	0	0.0E+00	No	-	5.0E-03	-	No	Yes	No
1,1-Dichloroethane	14	0	0	0.0E+00	No	-	5.0E-03	-	No	Yes	No
1,1-Dichloroethene	14	0	0	0.0E+00	No	-	5.0E-03	-	No	Yes	No
1,2,4-Trichlorobenzene	8	0	0	0.0E+00	No	-	1.7E-01	-	No	Yes	No
1,2,4-Trimethylbenzene	6	0	0	0.0E+00	No	-	5.0E-03	-	No	Yes	No
1,2-Dibromo-3-chloropropane	6	0	0	0.0E+00	No	-	5.0E-03	-	No	Yes	No

Selection of Chemicals of Potential Ecological Concern in Soil/Sediment (0-2 feet bgs)
Sodium Reactor Experiment (SRE) Area

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (mg/kg)	Chemical Detected in Laboratory Blanks [a]	Maximum Detected Concentration Exceeds Background [b]	Maximum SQL (mg/kg)	SQLs Exceed Background	SQLs Exceed ESLs	Potentially Site Related	CPEC
1,2-Dichlorobenzene	14	0	0	0.0E+00	No	-	5.0E-03	-	No	Yes	No
1,2-Dichloroethane	14	0	0	0.0E+00	No	-	5.0E-03	-	No	Yes	No
1,2-Dichloroethene (total)	11	1	9	1.2E-01	No	-	1.0E-02	-	No	Yes	Yes
1,2-Dichloropropane	11	0	0	0.0E+00	No	-	5.0E-03	-	No	Yes	No
1,3,5-Trimethylbenzene	6	0	0	0.0E+00	No	-	5.0E-03	-	No	Yes	No
1,3-Dichlorobenzene	14	0	0	0.0E+00	No	-	5.0E-03	-	No	Yes	No
1,4-Dichlorobenzene	14	0	0	0.0E+00	No	-	5.0E-03	-	No	Yes	No
2-Butanone	14	3	21	3.7E-02	No	-	5.4E-02	-	No	Yes	Yes
2-Chloroethylvinylether	3	0	0	0.0E+00	No	-	5.4E-02	-	No	Yes	No
2-Chloro-1,1,1-trifluoroethane	3	0	0	0.0E+00	No	-	2.2E-02	-	-	Yes	No
2-Hexanone	8	0	0	0.0E+00	No	-	5.0E-01	-	No	Yes	No
4-Methyl-2-pentanone	8	0	0	0.0E+00	No	-	5.0E-01	-	No	Yes	No
Acetone	14	3	21	5.2E+00	No	-	5.4E-02	-	No	Yes	Yes
Benzene	14	0	0	0.0E+00	No	-	5.0E-03	-	No	Yes	No
Bromodichloromethane	14	0	0	0.0E+00	No	-	5.0E-03	-	No	Yes	No
Bromoform	14	0	0	0.0E+00	No	-	5.0E-03	-	No	Yes	No
Bromomethane	14	0	0	0.0E+00	No	-	5.0E-03	-	No	Yes	No
Carbon disulfide	8	0	0	0.0E+00	No	-	5.0E-02	-	No	Yes	No
Carbon tetrachloride	14	0	0	0.0E+00	No	-	5.0E-03	-	No	Yes	No
Chlorobenzene	14	0	0	0.0E+00	No	-	5.0E-03	-	No	Yes	No
Chloroethane	14	0	0	0.0E+00	No	-	5.0E-03	-	No	Yes	No
Chloroform	14	0	0	0.0E+00	No	-	5.0E-03	-	No	Yes	No
Chloromethane	14	0	0	0.0E+00	No	-	5.0E-03	-	No	Yes	No
Chlorotrifluoroethene	3	0	0	0.0E+00	No	-	2.2E-02	-	No	Yes	No
cis-1,2-Dichloroethene	6	0	0	0.0E+00	No	-	5.0E-03	-	No	Yes	No
cis-1,3-Dichloropropene	11	0	0	0.0E+00	No	-	5.0E-03	-	No	Yes	No
Dibromochloromethane	8	0	0	0.0E+00	No	-	5.0E-02	-	No	Yes	No
Dichlorodifluoromethane	6	0	0	0.0E+00	No	-	5.0E-03	-	No	Yes	No
Ethylbenzene	14	0	0	0.0E+00	No	-	5.0E-03	-	No	Yes	No
m,p-Xylene	6	0	0	0.0E+00	No	-	5.0E-03	-	No	Yes	No
Methylene chloride	14	2	14	1.3E-02	No	-	9.0E-03	-	No	Yes	Yes
o-Xylene	6	0	0	0.0E+00	No	-	5.0E-03	-	No	Yes	No
Styrene	8	0	0	0.0E+00	No	-	5.0E-02	-	No	Yes	No
Tetrachloroethene	14	1	7	1.0E-01	No	-	5.0E-03	-	No	Yes	Yes

Selection of Chemicals of Potential Ecological Concern in Soil/Sediment (0-2 feet bgs)
Sodium Reactor Experiment (SRE) Area

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (mg/kg)	Chemical Detected in Laboratory Blanks [a]	Maximum Detected Concentration Exceeds Background [b]	Maximum SQL (mg/kg)	SQLs Exceed Background	SQLs Exceed ESLs	Potentially Site Related	CPEC
Toluene	14	1	7	4.2E-01	No	-	3.0E-03	-	No	Yes	Yes
trans-1,2-Dichloroethene	6	0	0	0.0E+00	No	-	5.0E-03	-	No	Yes	No
trans-1,3-Dichloropropene	14	0	0	0.0E+00	No	-	5.0E-03	-	No	Yes	No
Trichloroethene	14	2	14	2.2E-01	No	-	5.0E-03	-	No	Yes	Yes
Trichlorofluoromethane	6	0	0	0.0E+00	No	-	5.0E-03	-	No	Yes	No
Vinyl acetate	8	0	0	0.0E+00	No	-	5.0E-01	-	No	Yes	No
Vinyl chloride	14	0	0	0.0E+00	No	-	5.0E-03	-	No	Yes	No
Xylenes (total)	11	1	9	8.0E-02	No	-	1.5E-02	-	No	Yes	Yes
SVOCs											
2,4,5-Trichlorophenol	8	0	0	0.0E+00	No	-	8.5E-01	-	No	No	No
2,4,6-Trichlorophenol	8	0	0	0.0E+00	No	-	1.7E-01	-	No	No	No
2,4-Dichlorophenol	8	0	0	0.0E+00	No	-	1.7E-01	-	No	No	No
2,4-Dimethylphenol	8	0	0	0.0E+00	No	-	1.7E-01	-	No	No	No
2,4-Dinitrophenol	8	0	0	0.0E+00	No	-	8.5E-01	-	Yes	No	No
2,4-Dinitrotoluene	8	0	0	0.0E+00	No	-	1.7E-01	-	No	No	No
2,6-Dinitrotoluene	8	0	0	0.0E+00	No	-	1.7E-01	-	No	No	No
2-Chloronaphthalene	8	0	0	0.0E+00	No	-	1.7E-01	-	No	No	No
2-Chlorophenol	8	0	0	0.0E+00	No	-	1.7E-01	-	No	No	No
2-Methylnaphthalene	12	0	0	0.0E+00	No	-	3.0E-03	-	No	No	No
2-Methylphenol	8	0	0	0.0E+00	No	-	1.7E-01	-	No	No	No
2-Nitroaniline	8	0	0	0.0E+00	No	-	8.5E-01	-	No	No	No
2-Nitrophenol	8	0	0	0.0E+00	No	-	1.7E-01	-	No	No	No
Methylphenol	1	0	0	0.0E+00	No	-	1.7E-01	-	No	No	No
4-Methylphenol	7	0	0	0.0E+00	No	-	1.7E-01	-	No	No	No
3,3'-Dichlorobenzidine	8	0	0	0.0E+00	No	-	3.4E-01	-	No	No	No
3-Nitroaniline	8	0	0	0.0E+00	No	-	8.5E-01	-	No	No	No
4,6-Dinitro-2-methylphenol	8	0	0	0.0E+00	No	-	8.5E-01	-	No	No	No
4-Bromophenyl phenyl ether	8	0	0	0.0E+00	No	-	1.7E-01	-	No	No	No
4-Chloro-3-methylphenol	8	0	0	0.0E+00	No	-	1.7E-01	-	No	No	No
4-Chloroaniline	8	0	0	0.0E+00	No	-	1.7E-01	-	No	No	No
4-Chlorophenyl phenyl ether	8	0	0	0.0E+00	No	-	1.7E-01	-	No	No	No
4-Nitroaniline	8	0	0	0.0E+00	No	-	8.5E-01	-	No	No	No
4-Nitrophenol	8	0	0	0.0E+00	No	-	8.5E-01	-	No	No	No
Acenaphthene	14	0	0	-	No	-	3.0E-03	-	No	Yes	Yes [e]

Selection of Chemicals of Potential Ecological Concern in Soil/Sediment (0-2 feet bgs)
Sodium Reactor Experiment (SRE) Area

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (mg/kg)	Chemical Detected in Laboratory Blanks [a]	Maximum Detected Concentration Exceeds Background [b]	Maximum SQL (mg/kg)	SQLs Exceed Background	SQLs Exceed ESLs	Potentially Site Related	CPEC
Acenaphthylene	14	0	0	-	No	-	3.0E-03	-	No	Yes	Yes [e]
Aniline	8	0	0	0.0E+00	No	-	1.7E-01	-	No	No	No
Anthracene	14	0	0	-	No	-	3.0E-03	-	No	Yes	Yes [e]
Benzidine	8	0	0	0.0E+00	No	-	1.7E+00	-	No	No	No
Benzo(a)anthracene	14	3	21	2.4E-01	No	-	3.0E-03	-	No	Yes	Yes
Benzo(a)pyrene	13	3	23	2.4E-01	No	-	3.0E-03	-	No	Yes	Yes
Benzo(b)fluoranthene	13	4	31	5.4E-01	No	-	3.4E-02	-	No	Yes	Yes
Benzo(e)pyrene	-	-	-	-	No	-	-	-	-	Yes	Yes [e]
Benzo(g,h,i)perylene	13	1	8	2.3E-01	No	-	3.0E-03	-	No	Yes	Yes
Benzo(k)fluoranthene	13	2	15	6.0E-03	No	-	3.0E-03	-	No	Yes	Yes
Benzoic acid	8	0	0	0.0E+00	No	-	8.5E-01	-	No	No	No
Benzyl alcohol	8	0	0	0.0E+00	No	-	1.7E-01	-	No	No	No
bis(2-Chloroethoxy)methane	8	0	0	0.0E+00	No	-	1.7E-01	-	No	No	No
bis(2-Chloroethyl)ether	8	0	0	0.0E+00	No	-	1.7E-01	-	No	No	No
bis(2-Chloroisopropyl) ether	8	0	0	0.0E+00	No	-	1.7E-01	-	No	No	No
bis(2-Ethylhexyl)phthalate	10	0	0	-	No	-	1.1E-01	-	No	No	No
Butyl benzyl phthalate	8	0	0	0.0E+00	No	-	1.7E-01	-	No	No	No
Chrysene	14	4	29	4.2E-01	No	-	7.0E-03	-	No	Yes	Yes
Dibenz(a,h)anthracene	13	0	0	-	No	-	3.0E-03	-	No	Yes	Yes [e]
Dibenzofuran	8	0	0	0.0E+00	No	-	1.7E-01	-	No	No	No
Diethylphthalate	10	0	0	-	No	-	1.1E-01	-	No	No	No
Dimethyl phthalate	8	0	0	0.0E+00	No	-	1.7E-01	-	No	No	No
Di-n-butylphthalate	10	0	0	-	No	-	1.1E-01	-	No	No	No
Di-n-octyl phthalate	8	0	0	0.0E+00	No	-	1.7E-01	-	No	No	No
Fluoranthene	14	4	29	8.0E-01	No	-	7.0E-03	-	No	Yes	Yes
Fluorene	14	0	0	-	No	-	3.0E-03	-	No	Yes	Yes [e]
Hexachlorobenzene	8	0	0	0.0E+00	No	-	1.7E-01	-	No	No	No
Hexachlorobutadiene	8	0	0	0.0E+00	No	-	1.7E-01	-	No	No	No
Hexachlorocyclopentadiene	8	0	0	0.0E+00	No	-	1.7E-01	-	No	No	No
Hexachloroethane	8	0	0	0.0E+00	No	-	1.7E-01	-	No	No	No
Indeno(1,2,3-cd)pyrene	13	2	15	2.0E-01	No	-	3.0E-03	-	No	No	Yes
Isophorone	8	0	0	0.0E+00	No	-	1.7E-01	-	No	No	No
Naphthalene	14	0	0	-	No	-	3.0E-03	-	No	No	No
Nitrobenzene	8	0	0	0.0E+00	No	-	1.7E-01	-	No	No	No

Selection of Chemicals of Potential Ecological Concern in Soil/Sediment (0-2 feet bgs)
Sodium Reactor Experiment (SRE) Area

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (mg/kg)	Chemical Detected in Laboratory Blanks [a]	Maximum Detected Concentration Exceeds Background [b]	Maximum SQL (mg/kg)	SQLs Exceed Background	SQLs Exceed ESLs	Potentially Site Related	CPEC
N-Nitrosodimethylamine	13	0	0	-	No	-	2.0E-03	-	No	No	No
N-Nitrosodi-n-propylamine	8	0	0	0.0E+00	No	-	1.7E-01	-	No	No	No
N-Nitrosodiphenylamine	10	0	0	-	No	-	3.4E-02	-	No	No	No
Pentachlorophenol	8	0	0	0.0E+00	No	-	8.5E-01	-	No	No	No
Perylene	-	-	-	-	No	-	-	-	-	Yes	Yes [e]
Phenanthrene	14	4	29	2.8E-01	No	-	3.0E-03	-	No	Yes	Yes
Phenol	8	0	0	0.0E+00	No	-	1.7E-01	-	No	No	No
Pyrene	14	4	29	5.9E-01	No	-	7.0E-03	-	No	Yes	Yes
Total Petroleum Hydrocarbons											
C08-C11(Gasoline Range)	14	0	0	-	No	-	3.0E+00	-	-	Yes	No
C11-C14(Kerosene Range)	14	1	7	4.0E+01	No	-	3.0E+00	-	-	Yes	Yes
C14-C20(Diesel Range)	14	0	0	-	No	-	3.0E+00	-	-	Yes	No
C20-C30(Lubricant Oil Range)	14	8	57	4.7E+02	No	-	4.0E+00	-	-	Yes	Yes
Hydrocarbons	1	0	0	-	No	-	5.0E+00	-	-	Yes	No
PCDD/PCDFs											
2,3,7,8-TCDD	4	2	50	5.3E-07	No	-	1.3E-07	-	No	Yes	Yes
1,2,3,7,8-PeCDD	4	4	100	2.2E-06	No	-		-	No	Yes	Yes
1,2,3,4,7,8-HxCDD	4	4	100	1.0E-05	No	-		-	No	Yes	Yes
1,2,3,6,7,8-HxCDD	4	4	100	3.0E-05	No	-		-	No	Yes	Yes
1,2,3,7,8,9-HxCDD	4	4	100	1.0E-05	No	-		-	No	Yes	Yes
1,2,3,4,6,7,8-HpCDD	4	4	100	1.3E-03	No	-		-	No	Yes	Yes
OCDD	4	4	100	1.9E-02	No	-		-	No	Yes	Yes
2,3,7,8-TCDF	4	3	75	7.9E-07	No	-	2.2E-07	-	No	Yes	Yes
1,2,3,7,8-PeCDF	4	2	50	5.8E-07	No	-	1.1E-07	-	No	Yes	Yes
2,3,4,7,8-PeCDF	4	4	100	1.6E-06	No	-		-	No	Yes	Yes
1,2,3,4,7,8-HxCDF	4	4	100	3.7E-06	No	-		-	No	Yes	Yes
1,2,3,6,7,8-HxCDF	4	4	100	3.4E-06	No	-		-	No	Yes	Yes
2,3,4,6,7,8-HxCDF	4	4	100	1.0E-05	No	-		-	No	Yes	Yes
1,2,3,7,8,9-HxCDF	4	2	50	9.7E-07	No	-	2.0E-07	-	No	Yes	Yes
1,2,3,4,6,7,8-HpCDF	4	4	100	1.0E-04	No	-		-	No	Yes	Yes
1,2,3,4,7,8,9-HpCDF	4	4	100	1.0E-05	No	-		-	No	Yes	Yes
OCDF	4	4	100	2.4E-04	No	-		-	No	Yes	Yes
Total Tetra	-	-	-	-	-	No	-	-	-	-	No
Total Penta	-	-	-	-	-	No	-	-	-	-	No

Selection of Chemicals of Potential Ecological Concern in Soil/Sediment (0-2 feet bgs)
Sodium Reactor Experiment (SRE) Area

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (mg/kg)	Chemical Detected in Laboratory Blanks [a]	Maximum Detected Concentration Exceeds Background [b]	Maximum SQL (mg/kg)	SQLs Exceed Background	SQLs Exceed ESLs	Potentially Site Related	CPEC
Total Hexa	-	-	-	-	-	No	-	-	-	-	No
Total Hepta	-	-	-	-	-	Yes	-	-	-	-	Yes
Total Octa	-	-	-	-	-	Yes	-	-	-	-	Yes
PCDD/PCDF	-	-	-	-	-	-	-	-	-	-	Yes
PCBs											
Aroclor-1016	20	0	0	-	No	-	3.5E-02	-	No	No	No
Aroclor-1221	20	0	0	-	No	-	5.3E-02	-	No	No	No
Aroclor-1232	20	0	0	-	No	-	3.5E-02	-	Yes	No	No
Aroclor-1242	20	0	0	-	No	-	3.5E-02	-	Yes	No	No
Aroclor-1248	20	0	0	-	No	-	3.5E-02	-	Yes	No	No
Aroclor-1254	20	5	25	4.3E-01	No	-	3.5E-02	-	Yes	Yes	Yes
Aroclor-1260	20	5	25	7.8E+00	No	-	3.5E-02	-	No	Yes	Yes
PCB-105	-	-	-	-	No	-	-	-	-	Yes	Yes
PCB-114	-	-	-	-	No	-	-	-	-	Yes	Yes
PCB-118	-	-	-	-	No	-	-	-	-	Yes	Yes
PCB-123	-	-	-	-	No	-	-	-	-	Yes	Yes
PCB-126	-	-	-	-	No	-	-	-	-	Yes	Yes
PCB-156	-	-	-	-	No	-	-	-	-	Yes	Yes
PCB-157	-	-	-	-	No	-	-	-	-	Yes	Yes
PCB-167	-	-	-	-	No	-	-	-	-	Yes	Yes
PCB-169	-	-	-	-	No	-	-	-	-	Yes	Yes
PCB-189	-	-	-	-	No	-	-	-	-	Yes	Yes
PCB-77	-	-	-	-	No	-	-	-	-	Yes	Yes
PCB-81	-	-	-	-	No	-	-	-	-	Yes	Yes

Notes:
a. Any chemical eliminated as CPEC due to laboratory blank contamination is discussed in Section 3.0.
b. Background comparision for inorganic compounds presented in Attachment 1 Spreadsheet D-82.
c. Not selected as CPEC since the RFI site sample population for soils at 0 to 2 feet bgs was found to be no different than the background sample population at p=0.01 based on the Wilcoxon Rank Sum Test.
d. Selected as a soil COPC since it was selected as a COPEC in soil vapor].
e. Selected as a CPEC since either petroleum hydrocarbon fraction C11-C14, C14-C20, or C20-C30 was selected as a CPEC.
CPEC - chemical of potential ecological concern
ESL - ecological screening level
SQL - sample quantitation limit

Selection of Chemicals of Potential Ecological Concern in Soil/Sediment (0-2 feet bgs)
Sodium Reactor Experiment (SRE) Area

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (mg/kg)	Chemical Detected in Laboratory Blanks [a]	Maximum Detected Concentration Exceeds Background [b]	Maximum SQL (mg/kg)	SQLs Exceed Background	SQLs Exceed ESLs	Potentially Site Related	CPEC

SVOC - semivolatile organic chemicals
PCBs - polychlorinated biphenyls
Total Tetra - sum of the 2,3,7,8-substituted tetrachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations
Total Penta - sum of the 2,3,7,8-substituted pentachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations
Total Hexa - sum of the 2,3,7,8-substituted hexachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations
Total Hepta - sum of the 2,3,7,8-substituted heptachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations
Total Octa - sum of the octachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations concentrations
PCDD/PDDFs - polychlorinated dibenzo-p-dioxins and dibenzofurans
"-" not applicable
mg/kg - milligrams per kilogram
bgs- below ground surface

Estimates of Human Intake
Surface Water Dermal Contact Pathway for Child Resident
Sodium Reactor Experiment (SRE) Area

Intake Equation:

$$\text{Dosage} = \frac{C \times Kp \times SA \times CF \times EF \times ED \times EV \times ET}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Surface water concentration	C	mg/L	CS	CS
Skin surface area per event	SA	cm^2/day	6560	6560
Bioavailability	B	fraction	CS	CS
Conversion factor	CF	L/cm^3	1.E-03	1.E-03
Event frequency	EV	events/day	0.5	0.5
Exposure frequency	EF	days/year	50	100
Exposure time	ET	hrs/day	1	2
Exposure duration	ED	years	6	6
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/L)	RME EPC (mg/L)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Kp (cm/hr)
Inorganic Compounds							
Aluminum	1.0E+00	1.7E+00	6.6E-06	8.7E-05	5.3E-07	3.5E-06	1.0E-03
Antimony	9.0E-04	1.5E-03	5.8E-09	7.9E-08	4.6E-10	3.2E-09	1.0E-03
Arsenic	6.8E-03	1.1E-02	4.3E-08	5.6E-07	3.5E-09	2.3E-08	1.0E-03
Cadmium	1.5E-04	2.8E-04	9.8E-10	1.4E-08	7.8E-11	5.8E-10	1.0E-03
Chromium	2.3E-03	3.4E-03	1.5E-08	1.7E-07	1.2E-09	7.0E-09	1.0E-03
Copper	4.4E-03	5.7E-03	2.8E-08	2.9E-07	2.2E-09	1.2E-08	1.0E-03
Lead	8.1E-04	1.0E-03	5.2E-10	5.4E-09	4.1E-11	2.1E-10	1.0E-04
Mercury	1.2E-04	1.4E-04	7.6E-10	7.0E-09	6.1E-11	2.8E-10	1.0E-03
Nickel	4.1E-03	4.1E-03	5.3E-09	4.2E-08	4.2E-10	1.7E-09	2.0E-04
Thallium	2.1E-04	2.1E-04	1.3E-09	1.1E-08	1.1E-10	4.3E-10	1.0E-03
Vanadium	4.0E-03	5.7E-03	2.6E-08	2.9E-07	2.1E-09	1.2E-08	1.0E-03
VOCs							
1,1,1-Trichloroethane	7.6E-04	7.6E-04	0.0E+00	0.0E+00	0.0E+00	0.0E+00	0.0E+00
Trichloroethene	6.6E-04	6.6E-04	5.1E-08	4.1E-07	4.1E-09	1.6E-08	1.2E-02
PCDD/PCDFs							
1,2,3,7,8-PeCDD	1.7E-09	1.7E-09	8.7E-12	7.0E-11	7.0E-13	2.8E-12	8.1E-01
1,2,3,4,7,8-HxCDD	2.5E-09	2.5E-09	1.3E-11	1.0E-10	1.0E-12	4.1E-12	8.1E-01
1,2,3,6,7,8-HxCDD	2.7E-08	6.6E-08	1.4E-10	2.7E-09	1.1E-11	1.1E-10	8.1E-01
1,2,3,7,8,9-HxCDD	1.4E-08	1.4E-08	7.3E-11	5.8E-10	5.8E-12	2.3E-11	8.1E-01
1,2,3,4,6,7,8-HpCDD	2.2E-07	1.9E-06	1.1E-09	7.9E-08	9.1E-11	3.2E-09	8.1E-01
OCDD	1.8E-06	2.7E-06	9.3E-09	1.1E-07	7.4E-10	4.4E-09	8.1E-01
2,3,7,8-TCDF	4.0E-09	4.5E-09	2.1E-11	1.9E-10	1.7E-12	7.5E-12	8.1E-01
1,2,3,7,8-PeCDF	7.2E-09	7.2E-09	3.8E-11	3.0E-10	3.0E-12	1.2E-11	8.1E-01
2,3,4,7,8-PeCDF	1.8E-08	2.0E-08	9.4E-11	8.3E-10	7.5E-12	3.3E-11	8.1E-01
1,2,3,4,7,8-HxCDF	1.9E-08	2.1E-08	9.7E-11	8.9E-10	7.8E-12	3.6E-11	8.1E-01
1,2,3,6,7,8-HxCDF	1.1E-08	1.1E-08	5.7E-11	4.6E-10	4.6E-12	1.8E-11	8.1E-01
2,3,4,6,7,8-HxCDF	1.9E-08	2.1E-08	9.9E-11	8.9E-10	7.9E-12	3.6E-11	8.1E-01
1,2,3,7,8,9-HxCDF	1.8E-08	2.3E-08	9.5E-11	9.6E-10	7.6E-12	3.8E-11	8.1E-01
1,2,3,4,6,7,8-HpCDF	2.7E-08	5.1E-08	1.4E-10	2.1E-09	1.1E-11	8.5E-11	8.1E-01
1,2,3,4,7,8,9-HpCDF	1.4E-08	1.4E-08	7.3E-11	5.8E-10	5.8E-12	2.3E-11	8.1E-01
OCDF	7.2E-08	1.3E-07	3.8E-10	5.6E-09	3.0E-11	2.2E-10	8.1E-01

Spreadsheet C3-82 (2 of 2)

Estimates of Human Intake
Surface Water Dermal Contact Pathway for Child Resident
Sodium Reactor Experiment (SRE) Area

Intake Equation:

$$\text{Dosage} = \frac{C \times Kp \times SA \times CF \times EF \times ED \times EV \times ET}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Surface water concentration	C	mg/L	CS	CS
Skin surface area per event	SA	cm^2/day	6560	6560
Bioavailability	B	fraction	CS	CS
Conversion factor	CF	L/cm^3	1.E-03	1.E-03
Event frequency	EV	events/day	0.5	0.5
Exposure frequency	EF	days/year	50	100
Exposure time	ET	hrs/day	1	2
Exposure duration	ED	years	6	6
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/L)	RME EPC (mg/L)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Kp (cm/hr)

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2004).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2004).
Typical - typical or average exposure as defined in the SRAM (MWH 2004)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2004)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2004),
except dermal absorption factors which were taken from USEPA (2001).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
mg/kg-day - milligrams per kilogram per day
mg/kg - milligrams per kilogram

Estimates of Human Intake
Surface Water Ingestion Pathway for Child Resident
Sodium Reactor Experiment (SRE) Area

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times ET \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Soil ingestion rate	IR	L/hour	0.05	0.05
Exposure time	ET	hrs/day	1	2
Exposure frequency	EF	days/year	50	100
Exposure duration	ED	years	6	6
Bioavailability	B	fraction	CS	CS
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/L)	RME EPC (mg/L)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
Inorganic Compounds							
Aluminum	1.0E+00	1.7E+00	4.7E-04	3.1E-03	3.7E-05	2.5E-04	1
Antimony	9.0E-04	1.5E-03	4.1E-07	2.8E-06	3.3E-08	2.3E-07	1
Arsenic	6.8E-03	1.1E-02	3.1E-06	2.0E-05	2.5E-07	1.6E-06	1
Cadmium	1.5E-04	2.8E-04	6.9E-08	5.1E-07	5.6E-09	4.1E-08	1
Chromium	2.3E-03	3.4E-03	1.1E-06	6.2E-06	8.4E-08	5.0E-07	1
Copper	4.4E-03	5.7E-03	2.0E-06	1.0E-05	1.6E-07	8.3E-07	1
Lead	8.1E-04	1.0E-03	3.7E-07	1.9E-06	2.9E-08	1.5E-07	1
Mercury	1.2E-04	1.4E-04	5.4E-08	2.5E-07	4.3E-09	2.0E-08	1
Nickel	4.1E-03	4.1E-03	1.9E-06	7.5E-06	1.5E-07	6.0E-07	1
Thallium	2.1E-04	2.1E-04	9.6E-08	3.8E-07	7.7E-09	3.1E-08	1
Vanadium	4.0E-03	5.7E-03	1.8E-06	1.0E-05	1.5E-07	8.3E-07	1
VOCs							
1,1,1-Trichloroethane	7.6E-04	7.6E-04	3.5E-07	1.4E-06	2.8E-08	1.1E-07	1
Trichloroethene	6.6E-04	6.6E-04	3.0E-07	1.2E-06	2.4E-08	9.6E-08	1
PCDD/PCDFs							
1,2,3,7,8-PeCDD	1.7E-09	1.7E-09	7.7E-13	3.1E-12	6.1E-14	2.5E-13	1
1,2,3,4,7,8-HxCDD	2.5E-09	2.5E-09	1.1E-12	4.5E-12	9.1E-14	3.6E-13	1
1,2,3,6,7,8-HxCDD	2.7E-08	6.6E-08	1.2E-11	1.2E-10	9.8E-13	9.7E-12	1
1,2,3,7,8,9-HxCDD	1.4E-08	1.4E-08	6.4E-12	2.6E-11	5.1E-13	2.0E-12	1
1,2,3,4,6,7,8-HpCDD	2.2E-07	1.9E-06	1.0E-10	3.5E-09	8.0E-12	2.8E-10	1
OCDD	1.8E-06	2.7E-06	8.1E-10	4.8E-09	6.5E-11	3.9E-10	1
2,3,7,8-TCDF	4.0E-09	4.5E-09	1.8E-12	8.2E-12	1.5E-13	6.5E-13	1
1,2,3,7,8-PeCDF	7.2E-09	7.2E-09	3.3E-12	1.3E-11	2.6E-13	1.1E-12	1
2,3,4,7,8-PeCDF	1.8E-08	2.0E-08	8.2E-12	3.7E-11	6.6E-13	2.9E-12	1
1,2,3,4,7,8-HxCDF	1.9E-08	2.1E-08	8.5E-12	3.9E-11	6.8E-13	3.1E-12	1
1,2,3,6,7,8-HxCDF	1.1E-08	1.1E-08	5.0E-12	2.0E-11	4.0E-13	1.6E-12	1
2,3,4,6,7,8-HxCDF	1.9E-08	2.1E-08	8.7E-12	3.9E-11	7.0E-13	3.1E-12	1
1,2,3,7,8,9-HxCDF	1.8E-08	2.3E-08	8.3E-12	4.2E-11	6.7E-13	3.4E-12	1
1,2,3,4,6,7,8-HpCDF	2.7E-08	5.1E-08	1.2E-11	9.3E-11	1.0E-12	7.4E-12	1
1,2,3,4,7,8,9-HpCDF	1.4E-08	1.4E-08	6.4E-12	2.6E-11	5.1E-13	2.0E-12	1
OCDF	7.2E-08	1.3E-07	3.3E-11	2.4E-10	2.6E-12	2.0E-11	1

Spreadsheet C3-81 (2 of 2)

Estimates of Human Intake
Surface Water Ingestion Pathway for Child Resident
Sodium Reactor Experiment (SRE) Area

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times ET \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Soil ingestion rate	IR	L/hour	0.05	0.05
Exposure time	ET	hrs/day	1	2
Exposure frequency	EF	days/year	50	100
Exposure duration	ED	years	6	6
Bioavailability	B	fraction	CS	CS
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/L)	RME EPC (mg/L)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2004).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2004).
Typical - typical or average exposure as defined in the SRAM (MWH 2004)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2004)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2004).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
mg/kg-day - milligrams per kilogram per day
mg/kg - milligrams per kilogram

Estimates of Human Intake
Edible Plant Ingestion Pathway for Child Resident - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation: Dosage = $\frac{C \times IR \times CF \times F \times EF \times ED \times B}{BW \times AT}$

Exposure Parameters		Units	Typical	RME
Plant concentration	C	mg/kg	CS	CS
Plant ingestion rate	IR	g/day	47	166
Conversion factor	CF	kg/g	1.E-03	1.E-03
Fraction locally grown	F	unitless	0.24	1.0
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	6	6
Bioavailability	B	fraction	CS	CS
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
Inorganic Compounds							
Aluminum	NC	NC	NA	NA	NA	NA	1
Antimony	NC	NC	NA	NA	NA	NA	1
Arsenic	NC	NC	NA	NA	NA	NA	1
Cadmium	2.6E-02	5.8E-02	1.9E-05	4.2E-05	1.5E-06	5.0E-05	1
Chromium	NC	NC	NA	NA	NA	NA	1
Copper	1.7E+01	3.7E+01	1.2E-02	2.7E-02	9.8E-04	3.1E-02	1
Fluoride	NC	NC	NA	NA	NA	NA	1
Lead	6.1E-02	1.3E-01	4.5E-05	9.4E-05	3.6E-06	1.1E-04	1
Mercury	1.5E-01	3.5E-01	1.1E-04	2.5E-04	8.8E-06	3.0E-04	1
Methyl Mercury	2.4E-04	5.0E-04	1.7E-07	3.6E-07	1.4E-08	4.2E-07	1
Nickel	NC	NC	NA	NA	NA	NA	1
Nitrate	NC	NC	NA	NA	NA	NA	1
Silver	2.1E-04	7.8E-04	1.5E-07	5.7E-07	1.2E-08	6.7E-07	1
Thallium	6.4E-02	6.4E-02	4.7E-05	4.7E-05	3.7E-06	5.5E-05	1
Vanadium	NC	NC	NA	NA	NA	NA	1
Zinc	3.3E+01	8.5E+01	2.4E-02	6.2E-02	1.9E-03	7.2E-02	1
VOCs							
1,1,1-Trichloroethane	NC	NC	NA	NA	NA	NA	1
1,1,2-Trichloro-1,2,2-trifluoroethane	2.4E-02	2.4E-02	1.8E-05	1.8E-05	1.4E-06	2.1E-05	1
1,1-Dichloroethane	NC	NC	NA	NA	NA	NA	1
1,2-Dichloroethane	NC	NC	NA	NA	NA	NA	1
1,2-Dichloroethene (total)	4.0E-01	9.8E-01	2.9E-04	7.1E-04	2.3E-05	8.3E-04	1
1-Chlorohexane	NC	NC	NA	NA	NA	NA	1
2-Butanone	3.5E+00	3.5E+00	2.5E-03	2.5E-03	2.0E-04	3.0E-03	1
2-Hexanone	NC	NC	NA	NA	NA	NA	1
Acetone	1.3E+02	7.8E+02	9.2E-02	5.7E-01	7.4E-03	6.6E-01	1
Benzene	NC	NC	NA	NA	NA	NA	1
Carbon disulfide	NC	NC	NA	NA	NA	NA	1
Chloromethane	NC	NC	NA	NA	NA	NA	1
cis-1,2-Dichloroethene	NC	NC	NA	NA	NA	NA	1
Ethylbenzene	NC	NC	NA	NA	NA	NA	1
m,p-Xylene	NC	NC	NA	NA	NA	NA	1
Methylene chloride	5.4E-01	5.4E-01	3.9E-04	3.9E-04	3.1E-05	4.6E-04	1
Tetrachloroethene	3.1E-02	1.3E-01	2.2E-05	9.5E-05	1.8E-06	1.1E-04	1
Toluene	2.0E-01	1.2E+00	1.5E-04	9.0E-04	1.2E-05	1.1E-03	1
Trichloroethene	1.8E-01	9.8E-01	1.3E-04	7.1E-04	1.0E-05	8.4E-04	1
Xylenes (total)	5.4E-02	1.1E-01	4.0E-05	8.0E-05	3.2E-06	9.4E-05	1

Spreadsheet C3-80b (2 of 3)

Estimates of Human Intake
Edible Plant Ingestion Pathway for Child Resident - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation: Dosage = $\frac{C \times IR \times CF \times F \times EF \times ED \times B}{BW \times AT}$

Exposure Parameters		Units	Typical	RME
Plant concentration	C	mg/kg	CS	CS
Plant ingestion rate	IR	g/day	47	166
Conversion factor	CF	kg/g	1.E-03	1.E-03
Fraction locally grown	F	unitless	0.24	1.0
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	6	6
Bioavailability	B	fraction	CS	CS
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
SVOCs							
2-Methylnaphthalene	NC	NC	NA	NA	NA	NA	1
Acenaphthene	2.8E-02	1.0E-01	2.0E-05	7.4E-05	1.6E-06	8.6E-05	1
Acenaphthylene	1.9E-02	2.9E-02	1.4E-05	2.1E-05	1.1E-06	2.5E-05	1
Anthracene	1.8E-02	4.5E-02	1.3E-05	3.3E-05	1.0E-06	3.9E-05	1
Benzo(a)anthracene	2.4E-03	4.7E-03	1.8E-06	3.4E-06	1.4E-07	4.0E-06	1
Benzo(a)pyrene	1.0E-03	4.3E-03	7.5E-07	3.1E-06	6.0E-08	3.7E-06	1
Benzo(e)pyrene	3.5E-05	2.0E-04	2.6E-08	1.5E-07	2.1E-09	1.7E-07	1
Benzo(b)fluoranthene	1.5E-03	6.7E-03	1.1E-06	4.9E-06	8.7E-08	5.7E-06	1
Benzo(g,h,i)perylene	1.0E-03	3.7E-03	7.3E-07	2.7E-06	5.8E-08	3.1E-06	1
Benzo(k)fluoranthene	2.5E-04	2.5E-04	1.8E-07	1.8E-07	1.5E-08	2.2E-07	1
Chrysene	2.8E-03	1.4E-02	2.0E-06	1.0E-05	1.6E-07	1.2E-05	1
Dibenz(a,h)anthracene	4.4E-04	1.1E-04	3.2E-07	7.8E-08	2.5E-08	9.1E-08	1
Dibenzofuran	NC	NC	NA	NA	NA	NA	1
Fluoranthene	9.0E-03	5.7E-02	6.5E-06	4.1E-05	5.2E-07	4.8E-05	1
Fluorene	6.8E-03	2.7E-02	5.0E-06	2.0E-05	4.0E-07	2.3E-05	1
Indeno(1,2,3-cd)pyrene	3.0E-04	1.2E-03	2.2E-07	8.6E-07	1.7E-08	1.0E-06	1
Naphthalene	NC	NC	NA	NA	NA	NA	1
Perylene	5.7E-05	3.3E-04	4.1E-08	2.4E-07	3.3E-09	2.8E-07	1
Phenanthrene	2.2E-02	5.7E-02	1.6E-05	4.2E-05	1.3E-06	4.9E-05	1
Pyrene	9.4E-03	4.9E-02	6.8E-06	3.6E-05	5.5E-07	4.2E-05	1
Total Petroleum Hydrocarbons							
C11-C14(Kerosene Range)	3.3E+00	1.4E+01	2.4E-03	9.8E-03	1.9E-04	1.1E-02	1
C14-C20(Diesel Range)	1.3E+00	1.3E+00	9.5E-04	9.5E-04	7.6E-05	1.1E-03	1
C20-C30(Lubricant Oil Range)	3.4E+00	2.2E+01	2.4E-03	1.6E-02	2.0E-04	1.8E-02	1
PCDD/PCDFs							
2,3,7,8-TCDD	NC	NC	NA	NA	NA	NA	1
1,2,3,7,8-PeCDD	NC	NC	NA	NA	NA	NA	1
1,2,3,4,7,8-HxCDD	NC	NC	NA	NA	NA	NA	1
1,2,3,6,7,8-HxCDD	NC	NC	NA	NA	NA	NA	1
1,2,3,7,8,9-HxCDD	NC	NC	NA	NA	NA	NA	1
1,2,3,4,6,7,8-HpCDD	NC	NC	NA	NA	NA	NA	1
OCDD	NC	NC	NA	NA	NA	NA	1
2,3,7,8-TCDF	NC	NC	NA	NA	NA	NA	1
1,2,3,7,8-PeCDF	NC	NC	NA	NA	NA	NA	1
2,3,4,7,8-PeCDF	NC	NC	NA	NA	NA	NA	1
1,2,3,4,7,8-HxCDF	NC	NC	NA	NA	NA	NA	1

Spreadsheet C3-80b (3 of 3)

Estimates of Human Intake
Edible Plant Ingestion Pathway for Child Resident - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation: Dosage = $\frac{C \times IR \times CF \times F \times EF \times ED \times B}{BW \times AT}$

Exposure Parameters		Units	Typical	RME
Plant concentration	C	mg/kg	CS	CS
Plant ingestion rate	IR	g/day	47	166
Conversion factor	CF	kg/g	1.E-03	1.E-03
Fraction locally grown	F	unitless	0.24	1.0
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	6	6
Bioavailability	B	fraction	CS	CS
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
1,2,3,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA	1
2,3,4,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA	1
1,2,3,7,8,9-HxCDF	NC	NC	NA	NA	NA	NA	1
1,2,3,4,6,7,8-HpCDF	NC	NC	NA	NA	NA	NA	1
1,2,3,4,7,8,9-HpCDF	NC	NC	NA	NA	NA	NA	1
OCDF	NC	NC	NA	NA	NA	NA	1
PCBs							
Aroclor-1254	5.0E-03	1.3E-02	3.6E-06	9.6E-06	2.9E-07	1.1E-05	1
Aroclor-1260	2.1E-02	1.2E-01	1.5E-05	8.4E-05	1.2E-06	9.8E-05	1
PCB-105	3.5E-06	1.7E-05	2.6E-09	1.3E-08	2.0E-10	1.5E-08	1
PCB-114	6.7E-08	3.1E-07	4.9E-11	2.2E-10	3.9E-12	2.6E-10	1
PCB-118	7.1E-06	3.5E-05	5.1E-09	2.5E-08	4.1E-10	3.0E-08	1
PCB-123	9.8E-08	4.9E-07	7.2E-11	3.6E-10	5.7E-12	4.2E-10	1
PCB-126	2.7E-07	1.3E-06	2.0E-10	9.8E-10	1.6E-11	1.1E-09	1
PCB-156	2.3E-06	1.2E-05	1.7E-09	8.4E-09	1.3E-10	9.8E-09	1
PCB-157	1.0E-06	5.2E-06	7.4E-10	3.8E-09	5.9E-11	4.4E-09	1
PCB-167	1.8E-06	9.1E-06	1.3E-09	6.6E-09	1.0E-10	7.7E-09	1
PCB-169	2.6E-08	1.3E-07	1.9E-11	9.8E-11	1.5E-12	1.1E-10	1
PCB-189	2.6E-07	1.3E-06	1.9E-10	9.8E-10	1.5E-11	1.1E-09	1
PCB-77	3.1E-07	1.5E-06	2.2E-10	1.1E-09	1.8E-11	1.3E-09	1
PCB-81	5.5E-08	2.7E-07	4.0E-11	2.0E-10	3.2E-12	2.3E-10	1

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCDD/PCDF - Polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.
PCB - polychlorinated biphenyls
mg/kg-day - milligrams per kilogram per day
mg/kg - milligrams per kilogram

Estimates of Human Intake
Edible Plant Ingestion Pathway for Child Resident - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation: Dosage = $\frac{C \times IR \times CF \times F \times EF \times ED \times B}{BW \times AT}$

Exposure Parameters		Units	Typical	RME
Plant concentration	C	mg/kg	CS	CS
Plant ingestion rate	IR	g/day	47	166
Conversion factor	CF	kg/g	1.E-03	1.E-03
Fraction locally grown	F	unitless	0.24	1.0
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	6	6
Bioavailability	B	fraction	CS	CS
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
Inorganic Compounds							
Cadmium	2.6E-02	5.8E-02	1.9E-05	4.2E-05	1.5E-06	5.0E-05	1
Copper	1.7E+01	3.7E+01	1.2E-02	2.7E-02	9.8E-04	3.1E-02	1
Fluoride	NC	NC	NA	NA	NA	NA	1
Lead	6.1E-02	1.3E-01	4.5E-05	9.4E-05	3.6E-06	1.1E-04	1
Mercury	1.5E-01	3.5E-01	1.1E-04	2.5E-04	8.8E-06	3.0E-04	1
Methyl Mercury	2.4E-04	5.0E-04	1.7E-07	3.6E-07	1.4E-08	4.2E-07	1
Nitrate	NC	NC	NA	NA	NA	NA	1
Silver	2.1E-04	7.8E-04	1.5E-07	5.7E-07	1.2E-08	6.7E-07	1
Thallium	6.4E-02	6.4E-02	4.7E-05	4.7E-05	3.7E-06	5.5E-05	1
Zinc	3.3E+01	8.5E+01	2.4E-02	6.2E-02	1.9E-03	7.2E-02	1
VOCs							
1,1,1-Trichloroethane	NC	NC	NA	NA	NA	NA	1
1,1,2-Trichloro-1,2,2-trifluoroethane	2.4E-02	2.4E-02	1.8E-05	1.8E-05	1.4E-06	2.1E-05	1
1,1-Dichloroethane	NC	NC	NA	NA	NA	NA	1
1,2-Dichloroethane	NC	NC	NA	NA	NA	NA	1
1,2-Dichloroethene (total)	4.0E-01	9.8E-01	2.9E-04	7.1E-04	2.3E-05	8.3E-04	1
1-Chlorohexane	NC	NC	NA	NA	NA	NA	1
2-Butanone	3.5E+00	3.5E+00	2.5E-03	2.5E-03	2.0E-04	3.0E-03	1
2-Hexanone	NC	NC	NA	NA	NA	NA	1
Acetone	1.3E+02	7.8E+02	9.2E-02	5.7E-01	7.4E-03	6.6E-01	1
Benzene	NC	NC	NA	NA	NA	NA	1
Carbon disulfide	NC	NC	NA	NA	NA	NA	1
Chloromethane	NC	NC	NA	NA	NA	NA	1
cis-1,2-Dichloroethene	NC	NC	NA	NA	NA	NA	1
Ethylbenzene	NC	NC	NA	NA	NA	NA	1
m,p-Xylene	NC	NC	NA	NA	NA	NA	1
Methylene chloride	5.4E-01	5.4E-01	3.9E-04	3.9E-04	3.1E-05	4.6E-04	1
Tetrachloroethene	3.1E-02	1.3E-01	2.2E-05	9.5E-05	1.8E-06	1.1E-04	1
Toluene	2.0E-01	1.2E+00	1.5E-04	9.0E-04	1.2E-05	1.1E-03	1
Trichloroethene	1.8E-01	9.8E-01	1.3E-04	7.1E-04	1.0E-05	8.4E-04	1
Xylenes (total)	5.4E-02	1.1E-01	4.0E-05	8.0E-05	3.2E-06	9.4E-05	1
SVOCs							
2-Methylnaphthalene	NC	NC	NA	NA	NA	NA	1
Acenaphthene	3.0E-02	6.8E-02	2.2E-05	5.0E-05	1.7E-06	5.8E-05	1
Acenaphthylene	1.9E-02	5.1E-02	1.4E-05	3.7E-05	1.1E-06	4.4E-05	1
Anthracene	1.4E-02	3.0E-02	1.0E-05	2.2E-05	8.2E-07	2.5E-05	1

Spreadsheet C3-80a (2 of 3)

Estimates of Human Intake
Edible Plant Ingestion Pathway for Child Resident - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation: Dosage = $\frac{C \times IR \times CF \times F \times EF \times ED \times B}{BW \times AT}$

Exposure Parameters		Units	Typical	RME
Plant concentration	C	mg/kg	CS	CS
Plant ingestion rate	IR	g/day	47	166
Conversion factor	CF	kg/g	1.E-03	1.E-03
Fraction locally grown	F	unitless	0.24	1.0
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	6	6
Bioavailability	B	fraction	CS	CS
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
Benzo(a)anthracene	2.5E-03	1.0E-02	1.8E-06	7.4E-06	1.4E-07	8.7E-06	1
Benzo(a)pyrene	1.0E-03	4.3E-03	7.6E-07	3.1E-06	6.1E-08	3.7E-06	1
Benzo(e)pyrene	4.8E-04	1.6E-03	3.5E-07	1.2E-06	2.8E-08	1.4E-06	1
Benzo(b)fluoranthene	1.5E-03	8.4E-03	1.1E-06	6.1E-06	8.9E-08	7.1E-06	1
Benzo(g,h,i)perylene	9.7E-04	2.1E-03	7.0E-07	1.5E-06	5.6E-08	1.8E-06	1
Benzo(k)fluoranthene	1.3E-03	3.6E-03	9.1E-07	2.6E-06	7.3E-08	3.1E-06	1
Chrysene	2.8E-03	1.4E-02	2.1E-06	1.0E-05	1.7E-07	1.2E-05	1
Dibenz(a,h)anthracene	4.4E-04	1.3E-03	3.2E-07	9.2E-07	2.5E-08	1.1E-06	1
Dibenzofuran	NC	NC	NA	NA	NA	NA	1
Fluoranthene	9.1E-03	5.7E-02	6.6E-06	4.1E-05	5.3E-07	4.8E-05	1
Fluorene	6.7E-03	1.5E-02	4.9E-06	1.1E-05	3.9E-07	1.3E-05	1
Indeno(1,2,3-cd)pyrene	3.0E-04	1.2E-03	2.2E-07	8.6E-07	1.7E-08	1.0E-06	1
Naphthalene	NC	NC	NA	NA	NA	NA	1
Perylene	6.2E-04	2.1E-03	4.5E-07	1.5E-06	3.6E-08	1.8E-06	1
Phenanthrene	2.5E-02	6.2E-02	1.8E-05	4.5E-05	1.4E-06	5.3E-05	1
Pyrene	9.1E-03	2.7E-02	6.6E-06	1.9E-05	5.3E-07	2.3E-05	1
Total Petroleum Hydrocarbons							
C11-C14(Kerosene Range)	3.3E+00	1.4E+01	2.4E-03	9.8E-03	1.9E-04	1.1E-02	1
C14-C20(Diesel Range)	1.3E+00	1.3E+00	9.5E-04	9.5E-04	7.6E-05	1.1E-03	1
C20-C30(Lubricant Oil Range)	3.4E+00	2.2E+01	2.4E-03	1.6E-02	2.0E-04	1.8E-02	1
PCDD/PCDFs							
2,3,7,8-TCDD	NC	NC	NA	NA	NA	NA	1
1,2,3,7,8-PeCDD	NC	NC	NA	NA	NA	NA	1
1,2,3,4,7,8-HxCDD	NC	NC	NA	NA	NA	NA	1
1,2,3,6,7,8-HxCDD	NC	NC	NA	NA	NA	NA	1
1,2,3,7,8,9-HxCDD	NC	NC	NA	NA	NA	NA	1
1,2,3,4,6,7,8-HpCDD	NC	NC	NA	NA	NA	NA	1
OCDD	NC	NC	NA	NA	NA	NA	1
2,3,7,8-TCDF	NC	NC	NA	NA	NA	NA	1
1,2,3,7,8-PeCDF	NC	NC	NA	NA	NA	NA	1
2,3,4,7,8-PeCDF	NC	NC	NA	NA	NA	NA	1
1,2,3,4,7,8-HxCDF	NC	NC	NA	NA	NA	NA	1
1,2,3,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA	1
2,3,4,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA	1
1,2,3,7,8,9-HxCDF	NC	NC	NA	NA	NA	NA	1
1,2,3,4,6,7,8-HpCDF	NC	NC	NA	NA	NA	NA	1
1,2,3,4,7,8,9-HpCDF	NC	NC	NA	NA	NA	NA	1
OCDF	NC	NC	NA	NA	NA	NA	1

Spreadsheet C3-80a (3 of 3)

Estimates of Human Intake
Edible Plant Ingestion Pathway for Child Resident - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation: Dosage = $\frac{C \times IR \times CF \times F \times EF \times ED \times B}{BW \times AT}$

Exposure Parameters		Units	Typical	RME
Plant concentration	C	mg/kg	CS	CS
Plant ingestion rate	IR	g/day	47	166
Conversion factor	CF	kg/g	1.E-03	1.E-03
Fraction locally grown	F	unitless	0.24	1.0
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	6	6
Bioavailability	B	fraction	CS	CS
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
PCBs							
Aroclor-1254	5.0E-03	1.3E-02	3.6E-06	9.6E-06	2.9E-07	1.1E-05	1
Aroclor-1260	2.1E-02	1.2E-01	1.5E-05	8.4E-05	1.2E-06	9.8E-05	1
PCB-105	3.5E-06	1.7E-05	2.6E-09	1.3E-08	2.0E-10	1.5E-08	1
PCB-114	6.7E-08	3.1E-07	4.9E-11	2.2E-10	3.9E-12	2.6E-10	1
PCB-118	7.1E-06	3.5E-05	5.1E-09	2.5E-08	4.1E-10	3.0E-08	1
PCB-123	9.8E-08	4.9E-07	7.2E-11	3.6E-10	5.7E-12	4.2E-10	1
PCB-126	2.7E-07	1.3E-06	2.0E-10	9.8E-10	1.6E-11	1.1E-09	1
PCB-156	2.3E-06	1.2E-05	1.7E-09	8.4E-09	1.3E-10	9.8E-09	1
PCB-157	1.0E-06	5.2E-06	7.4E-10	3.8E-09	5.9E-11	4.4E-09	1
PCB-167	1.8E-06	9.1E-06	1.3E-09	6.6E-09	1.0E-10	7.7E-09	1
PCB-169	2.6E-08	1.3E-07	1.9E-11	9.8E-11	1.5E-12	1.1E-10	1
PCB-189	2.6E-07	1.3E-06	1.9E-10	9.8E-10	1.5E-11	1.1E-09	1
PCB-77	3.1E-07	1.5E-06	2.2E-10	1.1E-09	1.8E-11	1.3E-09	1
PCB-81	5.5E-08	2.7E-07	4.0E-11	2.0E-10	3.2E-12	2.3E-10	1

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCDD/PCDF - Polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.
PCB - polychlorinated biphenyls
mg/kg-day - milligrams per kilogram per day
mg/kg - milligrams per kilogram

Estimates of Human Intake
Domestic Groundwater Use for Child Resident
Sodium Reactor Experiment (SRE) Area

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED \times B}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Groundwater concentration	C	mg/L	CS	CS
Groundwater ingestion rate$_{voc}$	IR	L/day	1.5	2.5
Groundwater ingestion rate$_{non\text{-}vocs}$	IR	L/day	0.75	1.25
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	6	6
Bioavailability	B	fraction	CS	CS
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/L)	RME EPC (mg/L)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
Inorganic Compounds							
Cadmium	NC	NC	NA	NA	NA	NA	1
Copper	1.8E-02	1.8E-02	8.6E-04	1.4E-03	6.9E-05	1.2E-04	1
Fluoride	5.6E-01	5.6E-01	2.7E-02	4.5E-02	2.1E-03	3.6E-03	1
Lead	NC	NC	NA	NA	NA	NA	1
Mercury	NC	NC	NA	NA	NA	NA	1
Methyl Mercury	NC	NC	NA	NA	NA	NA	1
Nitrate	1.4E+01	1.4E+01	6.8E-01	1.1E+00	5.4E-02	9.1E-02	1
Silver	NC	NC	NA	NA	NA	NA	1
Thallium	5.4E-04	5.4E-04	2.6E-05	4.3E-05	2.1E-06	3.5E-06	1
Zinc	NC	NC	NA	NA	NA	NA	1
VOCs							
1,1,1-Trichloroethane	NC	NC	NA	NA	NA	NA	1
1,1,2-Trichloro-1,2,2-trifluoroethane	NC	NC	NA	NA	NA	NA	1
1,1-Dichloroethane	2.6E-03	2.6E-03	2.5E-04	4.2E-04	2.0E-05	3.3E-05	1
1,2-Dichloroethane	9.0E-04	9.0E-04	8.6E-05	1.4E-04	6.9E-06	1.2E-05	1
1,2-Dichloroethene (total)	NC	NC	NA	NA	NA	NA	1
1-Chlorohexane	NC	NC	NA	NA	NA	NA	1
2-Butanone	NC	NC	NA	NA	NA	NA	1
2-Hexanone	NC	NC	NA	NA	NA	NA	1
Acetone	1.6E-02	1.6E-02	1.5E-03	2.6E-03	1.2E-04	2.0E-04	1
Benzene	5.8E-04	5.8E-04	5.6E-05	9.3E-05	4.4E-06	7.4E-06	1
Carbon disulfide	2.6E-03	2.6E-03	2.5E-04	4.2E-04	2.0E-05	3.3E-05	1
Chloromethane	3.2E-04	3.2E-04	3.1E-05	5.1E-05	2.5E-06	4.1E-06	1
cis-1,2-Dichloroethene	5.1E-02	5.1E-02	4.9E-03	8.2E-03	3.9E-04	6.5E-04	1
Ethylbenzene	NC	NC	NA	NA	NA	NA	1
m,p-Xylene	NC	NC	NA	NA	NA	NA	1
Methylene chloride	6.4E-04	6.4E-04	6.1E-05	1.0E-04	4.9E-06	8.2E-06	1
Tetrachloroethene	NC	NC	NA	NA	NA	NA	1
Toluene	1.8E-03	1.8E-03	1.7E-04	2.9E-04	1.4E-05	2.3E-05	1
Trichloroethene	1.0E-02	1.0E-02	9.6E-04	1.6E-03	7.7E-05	1.3E-04	1
Xylenes (total)	NC	NC	NA	NA	NA	NA	1
SVOCs							
2-Methylnaphthalene	NC	NC	NA	NA	NA	NA	1
Acenaphthene	NC	NC	NA	NA	NA	NA	1
Acenaphthylene	NC	NC	NA	NA	NA	NA	1
Anthracene	NC	NC	NA	NA	NA	NA	1
Benzo(a)anthracene	NC	NC	NA	NA	NA	NA	1
Benzo(a)pyrene	NC	NC	NA	NA	NA	NA	1
Benzo(b)fluoranthene	NC	NC	NA	NA	NA	NA	1
Benzo(g,h,i)perylene	NC	NC	NA	NA	NA	NA	1
Benzo(k)fluoranthene	NC	NC	NA	NA	NA	NA	1
Chrysene	NC	NC	NA	NA	NA	NA	1
Dibenz(a,h)anthracene	NC	NC	NA	NA	NA	NA	1
Dibenzofuran	NC	NC	NA	NA	NA	NA	1
Benzo(e)pyrene	NC	NC	NA	NA	NA	NA	1
Fluoranthene	NC	NC	NA	NA	NA	NA	1
Fluorene	NC	NC	NA	NA	NA	NA	1

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Estimates of Human Intake
Domestic Groundwater Use for Child Resident
Sodium Reactor Experiment (SRE) Area

Intake Equation: Dosage = $\frac{C \times IR \times FT \times EF \times ED \times B}{BW \times AT}$

Exposure Parameters		Units	Typical	RME
Groundwater concentration	C	mg/L	CS	CS
Groundwater ingestion rate$_{voc}$	IR	L/day	1.5	2.5
Groundwater ingestion rate$_{non\text{-}vocs}$	IR	L/day	0.75	1.25
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	6	6
Bioavailability	B	fraction	CS	CS
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/L)	RME EPC (mg/L)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
Indeno(1,2,3-cd)pyrene	NC	NC	NA	NA	NA	NA	1
Naphthalene	NC	NC	NA	NA	NA	NA	1
Perylene	NC	NC	NA	NA	NA	NA	1
Phenanthrene	NC	NC	NA	NA	NA	NA	1
Pyrene	NC	NC	NA	NA	NA	NA	1
Total Petroleum Hydrocarbons							
C11-C14(Kerosene Range)	NC	NC	NA	NA	NA	NA	1
C14-C20(Diesel Range)	5.0E-02	5.0E-02	2.4E-03	4.0E-03	1.9E-04	3.2E-04	1
C20-C30(Lubricant Oil Range)	NC	NC	NA	NA	NA	NA	1
PCDD/PCDFs							
2,3,7,8-TCDD	NC	NC	NA	NA	NA	NA	1
1,2,3,7,8-PeCDD	NC	NC	NA	NA	NA	NA	1
1,2,3,4,7,8-HxCDD	NC	NC	NA	NA	NA	NA	1
1,2,3,6,7,8-HxCDD	NC	NC	NA	NA	NA	NA	1
1,2,3,7,8,9-HxCDD	NC	NC	NA	NA	NA	NA	1
1,2,3,4,6,7,8-HpCDD	NC	NC	NA	NA	NA	NA	1
OCDD	NC	NC	NA	NA	NA	NA	1
2,3,7,8-TCDF	NC	NC	NA	NA	NA	NA	1
1,2,3,7,8-PeCDF	NC	NC	NA	NA	NA	NA	1
2,3,4,7,8-PeCDF	NC	NC	NA	NA	NA	NA	1
1,2,3,4,7,8-HxCDF	NC	NC	NA	NA	NA	NA	1
1,2,3,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA	1
2,3,4,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA	1
1,2,3,7,8,9-HxCDF	NC	NC	NA	NA	NA	NA	1
1,2,3,4,6,7,8-HpCDF	NC	NC	NA	NA	NA	NA	1
1,2,3,4,7,8,9-HpCDF	NC	NC	NA	NA	NA	NA	1
OCDF	NC	NC	NA	NA	NA	NA	1
PCBs							
Aroclor-1254	NC	NC	NA	NA	NA	NA	1
Aroclor-1260	NC	NC	NA	NA	NA	NA	1
PCB-105	NC	NC	NA	NA	NA	NA	1
PCB-114	NC	NC	NA	NA	NA	NA	1
PCB-118	NC	NC	NA	NA	NA	NA	1
PCB-123	NC	NC	NA	NA	NA	NA	1
PCB-126	NC	NC	NA	NA	NA	NA	1
PCB-156	NC	NC	NA	NA	NA	NA	1
PCB-157	NC	NC	NA	NA	NA	NA	1
PCB-167	NC	NC	NA	NA	NA	NA	1
PCB-169	NC	NC	NA	NA	NA	NA	1
PCB-189	NC	NC	NA	NA	NA	NA	1
PCB-77	NC	NC	NA	NA	NA	NA	1
PCB-81	NC	NC	NA	NA	NA	NA	1

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)

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Estimates of Human Intake
Domestic Groundwater Use for Child Resident
Sodium Reactor Experiment (SRE) Area

Intake Equation: Dosage = $\frac{C \times IR \times FT \times EF \times ED \times B}{BW \times AT}$

Exposure Parameters		Units	Typical	RME
Groundwater concentration	C	mg/L	CS	CS
Groundwater ingestion rate$_{voc}$	IR	L/day	1.5	2.5
Groundwater ingestion rate$_{non\text{-}vocs}$	IR	L/day	0.75	1.25
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	6	6
Bioavailability	B	fraction	CS	CS
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/L)	RME EPC (mg/L)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)

RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCDD/PCDF - Polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.
PCB - polychlorinated biphenyls
mg/kg-day - milligrams per kilogram per day
mg/L - milligrams per liter

Estimates of Human Intake
Groundwater to Indoor Air Pathway for Child Resident
Sodium Reactor Experiment (SRE) Area

Intake Equation:

$$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	8.4	8.4
Fraction of time indoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	6	6
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Inorganic Compounds						
Cadmium	NC	NC	NA	NA	NA	NA
Copper	NC	NC	NA	NA	NA	NA
Fluoride	NC	NC	NA	NA	NA	NA
Lead	NC	NC	NA	NA	NA	NA
Mercury	NC	NC	NA	NA	NA	NA
Methyl Mercury	NC	NC	NA	NA	NA	NA
Nitrate	NC	NC	NA	NA	NA	NA
Silver	NC	NC	NA	NA	NA	NA
Thallium	NC	NC	NA	NA	NA	NA
Zinc	NC	NC	NA	NA	NA	NA
VOCs						
1,1,1-Trichloroethane	NC	NC	NA	NA	NA	NA
1,1,2-Trichloro-1,2,2-trifluoroethane	NC	NC	NA	NA	NA	NA
1,1-Dichloroethane	4.2E-06	4.2E-06	1.1E-06	1.7E-06	9.0E-08	1.3E-07
1,2-Dichloroethane	6.9E-07	6.9E-07	1.8E-07	2.8E-07	1.5E-08	2.2E-08
1,2-Dichloroethene (total)	NC	NC	NA	NA	NA	NA
1-Chlorohexane	NC	NC	NA	NA	NA	NA
2-Butanone	NC	NC	NA	NA	NA	NA
2-Hexanone	NC	NC	NA	NA	NA	NA
Acetone	2.8E-08	2.8E-08	7.5E-09	1.1E-08	6.0E-10	9.0E-10
Benzene	3.8E-06	3.8E-06	1.0E-06	1.5E-06	8.2E-08	1.2E-07
Carbon disulfide	2.1E-05	2.1E-05	5.6E-06	8.3E-06	4.4E-07	6.7E-07
Chloromethane	5.8E-06	5.8E-06	1.5E-06	2.3E-06	1.2E-07	1.9E-07
cis-1,2-Dichloroethene	2.2E-06	2.2E-06	6.0E-07	8.9E-07	4.8E-08	7.1E-08
Ethylbenzene	NC	NC	NA	NA	NA	NA
m,p-Xylene	NC	NC	NA	NA	NA	NA
Methylene chloride	1.2E-06	1.2E-06	3.2E-07	4.8E-07	2.6E-08	3.9E-08
Tetrachloroethene	NC	NC	NA	NA	NA	NA
Toluene	NC	NC	NA	NA	NA	NA
Trichloroethene	5.1E-06	5.1E-06	1.4E-06	2.1E-06	1.1E-07	1.7E-07
Xylenes (total)	NC	NC	NA	NA	NA	NA
SVOCs						
2-Methylnaphthalene	NC	NC	NA	NA	NA	NA
Acenaphthene	NC	NC	NA	NA	NA	NA
Acenaphthylene	NC	NC	NA	NA	NA	NA
Anthracene	NC	NC	NA	NA	NA	NA
Benzo(a)anthracene	NC	NC	NA	NA	NA	NA
Benzo(a)pyrene	NC	NC	NA	NA	NA	NA
Benzo(b)fluoranthene	NC	NC	NA	NA	NA	NA
Benzo(g,h,i)perylene	NC	NC	NA	NA	NA	NA
Benzo(k)fluoranthene	NC	NC	NA	NA	NA	NA
Chrysene	NC	NC	NA	NA	NA	NA
Dibenz(a,h)anthracene	NC	NC	NA	NA	NA	NA
Dibenzofuran	NC	NC	NA	NA	NA	NA
Benzo(e)pyrene	NC	NC	NA	NA	NA	NA
Fluoranthene	NC	NC	NA	NA	NA	NA
Fluorene	NC	NC	NA	NA	NA	NA
Indeno(1,2,3-cd)pyrene	NC	NC	NA	NA	NA	NA

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Estimates of Human Intake
Groundwater to Indoor Air Pathway for Child Resident
Sodium Reactor Experiment (SRE) Area

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	8.4	8.4
Fraction of time indoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	6	6
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Naphthalene	NC	NC	NA	NA	NA	NA
Perylene	NC	NC	NA	NA	NA	NA
Phenanthrene	NC	NC	NA	NA	NA	NA
Pyrene	NC	NC	NA	NA	NA	NA
Total Petroleum Hydrocarbons						
C11-C14(Kerosene Range)	NC	NC	NA	NA	NA	NA
C14-C20(Diesel Range)	NC	NC	NA	NA	NA	NA
C20-C30(Lubricant Oil Range)	NC	NC	NA	NA	NA	NA
PCDD/PCDFs						
2,3,7,8-TCDD	NC	NC	NA	NA	NA	NA
1,2,3,7,8-PeCDD	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,6,7,8-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,7,8,9-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,4,6,7,8-HpCDD	NC	NC	NA	NA	NA	NA
OCDD	NC	NC	NA	NA	NA	NA
2,3,7,8-TCDF	NC	NC	NA	NA	NA	NA
1,2,3,7,8-PeCDF	NC	NC	NA	NA	NA	NA
2,3,4,7,8-PeCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA
2,3,4,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,7,8,9-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,6,7,8-HpCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8,9-HpCDF	NC	NC	NA	NA	NA	NA
OCDF	NC	NC	NA	NA	NA	NA
PCBs						
Aroclor-1254	NC	NC	NA	NA	NA	NA
Aroclor-1260	NC	NC	NA	NA	NA	NA
PCB-105	NC	NC	NA	NA	NA	NA
PCB-114	NC	NC	NA	NA	NA	NA
PCB-118	NC	NC	NA	NA	NA	NA
PCB-123	NC	NC	NA	NA	NA	NA
PCB-126	NC	NC	NA	NA	NA	NA
PCB-156	NC	NC	NA	NA	NA	NA
PCB-157	NC	NC	NA	NA	NA	NA
PCB-167	NC	NC	NA	NA	NA	NA
PCB-169	NC	NC	NA	NA	NA	NA
PCB-189	NC	NC	NA	NA	NA	NA
PCB-77	NC	NC	NA	NA	NA	NA
PCB-81	NC	NC	NA	NA	NA	NA

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration

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Estimates of Human Intake
Groundwater to Indoor Air Pathway for Child Resident
Sodium Reactor Experiment (SRE) Area

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	8.4	8.4
Fraction of time indoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	6	6
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)

ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCDD/PCDF - Polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.
PCB - polychlorinated biphenyls
mg/kg-day - milligrams per kilogram per day
mg/m^3 - milligrams per cubic meter

Estimates of Human Intake
Soil Vapor to Indoor Air Pathway for Child Resident
Sodium Reactor Experiment (SRE) Area

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	8.4	8.4
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	6	6
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Inorganic Compounds						
Cadmium	NC	NC	NA	NA	NA	NA
Copper	NC	NC	NA	NA	NA	NA
Fluoride	NC	NC	NA	NA	NA	NA
Lead	NC	NC	NA	NA	NA	NA
Mercury	NC	NC	NA	NA	NA	NA
Methyl Mercury	NC	NC	NA	NA	NA	NA
Nitrate	NC	NC	NA	NA	NA	NA
Silver	NC	NC	NA	NA	NA	NA
Thallium	NC	NC	NA	NA	NA	NA
Zinc	NC	NC	NA	NA	NA	NA
VOCs						
1,1,1-Trichloroethane	6.3E-04	6.3E-04	1.7E-04	2.5E-04	1.3E-05	2.0E-05
1,1,2-Trichloro-1,2,2-trifluoroethane	3.2E-03	3.6E-03	8.5E-04	1.5E-03	6.8E-05	1.2E-04
1,1-Dichloroethane	6.1E-04	6.1E-04	1.6E-04	2.5E-04	1.3E-05	2.0E-05
1,2-Dichloroethane	NC	NC	NA	NA	NA	NA
1,2-Dichloroethene (total)	NC	NC	NA	NA	NA	NA
1-Chlorohexane	NC	NC	NA	NA	NA	NA
2-Butanone	NC	NC	NA	NA	NA	NA
2-Hexanone	NC	NC	NA	NA	NA	NA
Acetone	NC	NC	NA	NA	NA	NA
Benzene	NC	NC	NA	NA	NA	NA
Carbon disulfide	NC	NC	NA	NA	NA	NA
Chloromethane	NC	NC	NA	NA	NA	NA
cis-1,2-Dichloroethene	NC	NC	NA	NA	NA	NA
Ethylbenzene	6.1E-04	6.1E-04	1.6E-04	2.5E-04	1.3E-05	2.0E-05
m,p-Xylene	1.2E-03	1.2E-03	3.2E-04	4.8E-04	2.5E-05	3.8E-05
Methylene chloride	1.8E-02	1.8E-02	4.8E-03	7.2E-03	3.9E-04	5.8E-04
Tetrachloroethene	6.0E-04	6.0E-04	1.6E-04	2.4E-04	1.3E-05	1.9E-05
Toluene	6.6E-04	6.6E-04	1.8E-04	2.7E-04	1.4E-05	2.1E-05
Trichloroethene	6.3E-04	6.3E-04	1.7E-04	2.5E-04	1.4E-05	2.0E-05
Xylenes (total)	NC	NC	NA	NA	NA	NA
SVOCs						
2-Methylnaphthalene	NC	NC	NA	NA	NA	NA
Acenaphthene	NC	NC	NA	NA	NA	NA
Acenaphthylene	NC	NC	NA	NA	NA	NA
Anthracene	NC	NC	NA	NA	NA	NA
Benzo(a)anthracene	NC	NC	NA	NA	NA	NA
Benzo(a)pyrene	NC	NC	NA	NA	NA	NA

Spreadsheet D-76 (2 of 3)

Estimates of Human Intake
Soil Vapor to Indoor Air Pathway for Child Resident
Sodium Reactor Experiment (SRE) Area

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	8.4	8.4
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	6	6
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Benzo(e)pyrene	NC	NC	NA	NA	NA	NA
Benzo(b)fluoranthene	NC	NC	NA	NA	NA	NA
Benzo(g,h,i)perylene	NC	NC	NA	NA	NA	NA
Benzo(k)fluoranthene	NC	NC	NA	NA	NA	NA
Chrysene	NC	NC	NA	NA	NA	NA
Dibenz(a,h)anthracene	NC	NC	NA	NA	NA	NA
Dibenzofuran	NC	NC	NA	NA	NA	NA
Fluoranthene	NC	NC	NA	NA	NA	NA
Fluorene	NC	NC	NA	NA	NA	NA
Indeno(1,2,3-cd)pyrene	NC	NC	NA	NA	NA	NA
Naphthalene	NC	NC	NA	NA	NA	NA
Perylene	NC	NC	NA	NA	NA	NA
Phenanthrene	NC	NC	NA	NA	NA	NA
Pyrene	NC	NC	NA	NA	NA	NA
Total Petroleum Hydrocarbons						
C11-C14(Kerosene Range)	NC	NC	NA	NA	NA	NA
C14-C20(Diesel Range)	NC	NC	NA	NA	NA	NA
C20-C30(Lubricant Oil Range)	NC	NC	NA	NA	NA	NA
PCDD/PCDFs						
2,3,7,8-TCDD	NC	NC	NA	NA	NA	NA
1,2,3,7,8-PeCDD	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,6,7,8-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,7,8,9-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,4,6,7,8-HpCDD	NC	NC	NA	NA	NA	NA
OCDD	NC	NC	NA	NA	NA	NA
2,3,7,8-TCDF	NC	NC	NA	NA	NA	NA
1,2,3,7,8-PeCDF	NC	NC	NA	NA	NA	NA
2,3,4,7,8-PeCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA
2,3,4,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,7,8,9-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,6,7,8-HpCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8,9-HpCDF	NC	NC	NA	NA	NA	NA
OCDF	NC	NC	NA	NA	NA	NA

Spreadsheet D-76 (3 of 3)

Estimates of Human Intake
Soil Vapor to Indoor Air Pathway for Child Resident
Sodium Reactor Experiment (SRE) Area

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	8.4	8.4
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	6	6
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
PCBs						
Aroclor-1254	NC	NC	NA	NA	NA	NA
Aroclor-1260	NC	NC	NA	NA	NA	NA
PCB-105	NC	NC	NA	NA	NA	NA
PCB-114	NC	NC	NA	NA	NA	NA
PCB-118	NC	NC	NA	NA	NA	NA
PCB-123	NC	NC	NA	NA	NA	NA
PCB-126	NC	NC	NA	NA	NA	NA
PCB-156	NC	NC	NA	NA	NA	NA
PCB-157	NC	NC	NA	NA	NA	NA
PCB-167	NC	NC	NA	NA	NA	NA
PCB-169	NC	NC	NA	NA	NA	NA
PCB-189	NC	NC	NA	NA	NA	NA
PCB-77	NC	NC	NA	NA	NA	NA
PCB-81	NC	NC	NA	NA	NA	NA

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCDD/PCDF - Polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.
PCB - polychlorinated biphenyls
mg/kg-day - milligrams per kilogram per day
mg/m^3 - milligrams per cubic meter

Estimates of Human Intake
Groundwater to Ambient Air Pathway for Child Resident
Sodium Reactor Experiment (SRE) Area

Intake Equation: Dosage = $\frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	8.4	8.4
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	6	6
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Inorganic Compounds						
Cadmium	NC	NC	NA	NA	NA	NA
Copper	NC	NC	NA	NA	NA	NA
Fluoride	NC	NC	NA	NA	NA	NA
Lead	NC	NC	NA	NA	NA	NA
Mercury	NC	NC	NA	NA	NA	NA
Methyl Mercury	NC	NC	NA	NA	NA	NA
Nitrate	NC	NC	NA	NA	NA	NA
Silver	NC	NC	NA	NA	NA	NA
Thallium	NC	NC	NA	NA	NA	NA
Zinc	NC	NC	NA	NA	NA	NA
VOCs						
1,1,1-Trichloroethane	NC	NC	NA	NA	NA	NA
1,1,2-Trichloro-1,2,2-trifluoroethane	NC	NC	NA	NA	NA	NA
1,1-Dichloroethane	2.8E-06	2.8E-06	7.6E-07	1.1E-06	6.1E-08	9.2E-08
1,2-Dichloroethane	6.6E-07	6.6E-07	1.8E-07	2.7E-07	1.4E-08	2.1E-08
1,2-Dichloroethene (total)	NC	NC	NA	NA	NA	NA
1-Chlorohexane	NC	NC	NA	NA	NA	NA
2-Butanone	NC	NC	NA	NA	NA	NA
2-Hexanone	NC	NC	NA	NA	NA	NA
Acetone	2.5E-08	2.5E-08	6.6E-09	1.0E-08	5.3E-10	8.0E-10
Benzene	3.2E-06	3.2E-06	8.7E-07	1.3E-06	7.0E-08	1.0E-07
Carbon disulfide	2.2E-05	2.2E-05	6.0E-06	9.0E-06	4.8E-07	7.2E-07
Chloromethane	8.5E-06	8.5E-06	2.3E-06	3.4E-06	1.8E-07	2.7E-07
cis-1,2-Dichloroethene	2.0E-06	2.0E-06	5.4E-07	8.1E-07	4.3E-08	6.5E-08
Ethylbenzene	NC	NC	NA	NA	NA	NA
m,p-Xylene	NC	NC	NA	NA	NA	NA
Methylene chloride	1.5E-06	1.5E-06	4.1E-07	6.2E-07	3.3E-08	4.9E-08
Tetrachloroethene	NC	NC	NA	NA	NA	NA
Toluene	NC	NC	NA	NA	NA	NA
Trichloroethene	5.3E-06	5.3E-06	1.4E-06	2.1E-06	1.1E-07	1.7E-07
Xylenes (total)	NC	NC	NA	NA	NA	NA
SVOCs						
2-Methylnaphthalene	NC	NC	NA	NA	NA	NA
Acenaphthene	NC	NC	NA	NA	NA	NA
Acenaphthylene	NC	NC	NA	NA	NA	NA
Anthracene	NC	NC	NA	NA	NA	NA
Benzo(a)anthracene	NC	NC	NA	NA	NA	NA
Benzo(a)pyrene	NC	NC	NA	NA	NA	NA
Benzo(b)fluoranthene	NC	NC	NA	NA	NA	NA
Benzo(g,h,i)perylene	NC	NC	NA	NA	NA	NA
Benzo(k)fluoranthene	NC	NC	NA	NA	NA	NA
Chrysene	NC	NC	NA	NA	NA	NA
Dibenz(a,h)anthracene	NC	NC	NA	NA	NA	NA
Dibenzofuran	NC	NC	NA	NA	NA	NA
Benzo(e)pyrene	NC	NC	NA	NA	NA	NA
Fluoranthene	NC	NC	NA	NA	NA	NA
Fluorene	NC	NC	NA	NA	NA	NA
Indeno(1,2,3-cd)pyrene	NC	NC	NA	NA	NA	NA

Spreadsheet C3-75 (2 of 3)

Estimates of Human Intake
Groundwater to Ambient Air Pathway for Child Resident
Sodium Reactor Experiment (SRE) Area

Intake Equation: Dosage = $\frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	8.4	8.4
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	6	6
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Naphthalene	NC	NC	NA	NA	NA	NA
Perylene	NC	NC	NA	NA	NA	NA
Phenanthrene	NC	NC	NA	NA	NA	NA
Pyrene	NC	NC	NA	NA	NA	NA
Total Petroleum Hydrocarbons						
C11-C14(Kerosene Range)	NC	NC	NA	NA	NA	NA
C14-C20(Diesel Range)	NC	NC	NA	NA	NA	NA
C20-C30(Lubricant Oil Range)	NC	NC	NA	NA	NA	NA
PCDD/PCDFs						
2,3,7,8-TCDD	NC	NC	NA	NA	NA	NA
1,2,3,7,8-PeCDD	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,6,7,8-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,7,8,9-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,4,6,7,8-HpCDD	NC	NC	NA	NA	NA	NA
OCDD	NC	NC	NA	NA	NA	NA
2,3,7,8-TCDF	NC	NC	NA	NA	NA	NA
1,2,3,7,8-PeCDF	NC	NC	NA	NA	NA	NA
2,3,4,7,8-PeCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA
2,3,4,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,7,8,9-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,6,7,8-HpCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8,9-HpCDF	NC	NC	NA	NA	NA	NA
OCDF	NC	NC	NA	NA	NA	NA
PCBs						
Aroclor-1254	NC	NC	NA	NA	NA	NA
Aroclor-1260	NC	NC	NA	NA	NA	NA
PCB-105	NC	NC	NA	NA	NA	NA
PCB-114	NC	NC	NA	NA	NA	NA
PCB-118	NC	NC	NA	NA	NA	NA
PCB-123	NC	NC	NA	NA	NA	NA
PCB-126	NC	NC	NA	NA	NA	NA
PCB-156	NC	NC	NA	NA	NA	NA
PCB-157	NC	NC	NA	NA	NA	NA
PCB-167	NC	NC	NA	NA	NA	NA
PCB-169	NC	NC	NA	NA	NA	NA
PCB-189	NC	NC	NA	NA	NA	NA
PCB-77	NC	NC	NA	NA	NA	NA
PCB-81	NC	NC	NA	NA	NA	NA

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration

Spreadsheet C3-75 (3 of 3)

Estimates of Human Intake
Groundwater to Ambient Air Pathway for Child Resident
Sodium Reactor Experiment (SRE) Area

Intake Equation: Dosage = $\frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	8.4	8.4
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	6	6
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)

ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCDD/PCDF - Polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.
PCB - polychlorinated biphenyls
mg/kg-day - milligrams per kilogram per day
mg/m^3 - milligrams per cubic meter

Estimates of Human Intake
Soil to Ambient Air Pathway for Child Resident
Sodium Reactor Experiment (SRE) Area

Intake Equation: Dosage = $\frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	8.4	8.4
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	6	6
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Inorganic Compounds						
Cadmium	NC	NC	NA	NA	NA	NA
Copper	NC	NC	NA	NA	NA	NA
Fluoride	NC	NC	NA	NA	NA	NA
Lead	NC	NC	NA	NA	NA	NA
Mercury	NC	NC	NA	NA	NA	NA
Methyl Mercury	NC	NC	NA	NA	NA	NA
Nitrate	NC	NC	NA	NA	NA	NA
Silver	NC	NC	NA	NA	NA	NA
Thallium	NC	NC	NA	NA	NA	NA
Zinc	NC	NC	NA	NA	NA	NA
VOCs						
1,1,1-Trichloroethane	NC	NC	NA	NA	NA	NA
1,1,2-Trichloro-1,2,2-trifluoroethane	NC	NC	NA	NA	NA	NA
1,1-Dichloroethane	2.8E-06	2.8E-06	7.6E-07	1.1E-06	6.1E-08	9.2E-08
1,2-Dichloroethane	6.6E-07	6.6E-07	1.8E-07	2.7E-07	1.4E-08	2.1E-08
1,2-Dichloroethene (total)	NC	NC	NA	NA	NA	NA
1-Chlorohexane	NC	NC	NA	NA	NA	NA
2-Butanone	NC	NC	NA	NA	NA	NA
2-Hexanone	NC	NC	NA	NA	NA	NA
Acetone	2.5E-08	2.5E-08	6.6E-09	1.0E-08	5.3E-10	8.0E-10
Benzene	3.2E-06	3.2E-06	8.7E-07	1.3E-06	7.0E-08	1.0E-07
Carbon disulfide	NC	NC	NA	NA	NA	NA
Chloromethane	NC	NC	NA	NA	NA	NA
cis-1,2-Dichloroethene	2.0E-06	2.0E-06	5.4E-07	8.1E-07	4.3E-08	6.5E-08
Ethylbenzene	NC	NC	NA	NA	NA	NA
m,p-Xylene	NC	NC	NA	NA	NA	NA
Methylene chloride	1.5E-06	1.5E-06	4.1E-07	6.2E-07	3.3E-08	4.9E-08
Tetrachloroethene	NC	NC	NA	NA	NA	NA
Toluene	NC	NC	NA	NA	NA	NA
Trichloroethene	5.3E-06	5.3E-06	1.4E-06	2.1E-06	1.1E-07	1.7E-07
Xylenes (total)	NC	NC	NA	NA	NA	NA
SVOCs						
2-Methylnaphthalene	NC	NC	NA	NA	NA	NA
Acenaphthene	NC	NC	NA	NA	NA	NA
Acenaphthylene	NC	NC	NA	NA	NA	NA
Anthracene	NC	NC	NA	NA	NA	NA
Benzo(a)anthracene	NC	NC	NA	NA	NA	NA
Benzo(a)pyrene	NC	NC	NA	NA	NA	NA

Spreadsheet C3-74 (2 of 3)

Estimates of Human Intake
Soil to Ambient Air Pathway for Child Resident
Sodium Reactor Experiment (SRE) Area

Intake Equation: Dosage = $\frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	8.4	8.4
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	6	6
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Benzo(e)pyrene	NC	NC	NA	NA	NA	NA
Benzo(b)fluoranthene	NC	NC	NA	NA	NA	NA
Benzo(g,h,i)perylene	NC	NC	NA	NA	NA	NA
Benzo(k)fluoranthene	NC	NC	NA	NA	NA	NA
Chrysene	NC	NC	NA	NA	NA	NA
Dibenz(a,h)anthracene	NC	NC	NA	NA	NA	NA
Dibenzofuran	NC	NC	NA	NA	NA	NA
Fluoranthene	NC	NC	NA	NA	NA	NA
Fluorene	NC	NC	NA	NA	NA	NA
Indeno(1,2,3-cd)pyrene	NC	NC	NA	NA	NA	NA
Naphthalene	NC	NC	NA	NA	NA	NA
Perylene	NC	NC	NA	NA	NA	NA
Phenanthrene	NC	NC	NA	NA	NA	NA
Pyrene	NC	NC	NA	NA	NA	NA
Total Petroleum Hydrocarbons						
C11-C14(Kerosene Range)	NC	NC	NA	NA	NA	NA
C14-C20(Diesel Range)	NC	NC	NA	NA	NA	NA
C20-C30(Lubricant Oil Range)	NC	NC	NA	NA	NA	NA
PCDD/PCDFs						
2,3,7,8-TCDD	NC	NC	NA	NA	NA	NA
1,2,3,7,8-PeCDD	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,6,7,8-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,7,8,9-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,4,6,7,8-HpCDD	NC	NC	NA	NA	NA	NA
OCDD	NC	NC	NA	NA	NA	NA
2,3,7,8-TCDF	NC	NC	NA	NA	NA	NA
1,2,3,7,8-PeCDF	NC	NC	NA	NA	NA	NA
2,3,4,7,8-PeCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA
2,3,4,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,7,8,9-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,6,7,8-HpCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8,9-HpCDF	NC	NC	NA	NA	NA	NA
OCDF	NC	NC	NA	NA	NA	NA

Spreadsheet C3-74 (3 of 3)

Estimates of Human Intake
Soil to Ambient Air Pathway for Child Resident
Sodium Reactor Experiment (SRE) Area

Intake Equation: Dosage = $\frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	8.4	8.4
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	6	6
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
PCBs						
Aroclor-1254	NC	NC	NA	NA	NA	NA
Aroclor-1260	NC	NC	NA	NA	NA	NA
PCB-105	NC	NC	NA	NA	NA	NA
PCB-114	NC	NC	NA	NA	NA	NA
PCB-118	NC	NC	NA	NA	NA	NA
PCB-123	NC	NC	NA	NA	NA	NA
PCB-126	NC	NC	NA	NA	NA	NA
PCB-156	NC	NC	NA	NA	NA	NA
PCB-157	NC	NC	NA	NA	NA	NA
PCB-167	NC	NC	NA	NA	NA	NA
PCB-169	NC	NC	NA	NA	NA	NA
PCB-189	NC	NC	NA	NA	NA	NA
PCB-77	NC	NC	NA	NA	NA	NA
PCB-81	NC	NC	NA	NA	NA	NA

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCDD/PCDF - Polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.
PCB - polychlorinated biphenyls
mg/kg-day - milligrams per kilogram per day
mg/m^3 - milligrams per cubic meter

Estimates of Human Intake
Soil Particulate Inhalation Pathway for Child Resident - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation:

$$\text{Dosage} = \frac{C \times CF \times IR \times FT \times EF \times ED}{PEF \times BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Inhalation rate	IR	m^3/day	8.4	8.4
Conversion factor	CF	kg/ug	1.E-09	1.E-09
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	6	6
Particulate emission factor	PEF	m^3/ug	2.4	2.4
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Inorganic Compounds						
Aluminum	NC	NC	NA	NA	NA	NA
Antimony	NC	NC	NA	NA	NA	NA
Arsenic	NC	NC	NA	NA	NA	NA
Cadmium	1.9E-01	3.0E-01	2.1E-11	5.0E-11	1.7E-12	4.0E-12
Chromium	NC	NC	NA	NA	NA	NA
Copper	9.7E+00	1.8E+01	1.1E-09	2.9E-09	8.5E-11	2.3E-10
Fluoride	NC	NC	NA	NA	NA	NA
Lead	9.2E+00	1.5E+01	1.0E-09	2.4E-09	8.0E-11	1.9E-10
Mercury	1.7E+00	3.8E+00	1.9E-10	6.2E-10	1.5E-11	5.0E-11
Methyl Mercury	1.7E-03	3.6E-03	1.9E-13	6.0E-13	1.5E-14	4.8E-14
Nickel	NC	NC	NA	NA	NA	NA
Nitrate	NC	NC	NA	NA	NA	NA
Silver	1.3E+00	2.7E+00	1.4E-10	4.4E-10	1.1E-11	3.5E-11
Thallium	9.9E-01	3.6E+00	1.1E-10	5.9E-10	8.7E-12	4.7E-11
Vanadium	NC	NC	NA	NA	NA	NA
Zinc	6.8E+01	2.2E+02	7.4E-09	3.6E-08	5.9E-10	2.9E-09
VOCs						
1,1,1-Trichloroethane	NC	NC	NA	NA	NA	NA
1,1,2-Trichloro-1,2,2-trifluoroethane	1.2E-02	1.2E-02	1.3E-12	2.0E-12	1.1E-13	1.6E-13
1,1-Dichloroethane	NC	NC	NA	NA	NA	NA
1,2-Dichloroethane	NC	NC	NA	NA	NA	NA
1,2-Dichloroethene (total)	NC	NC	NA	NA	NA	NA
1-Chlorohexane	1.0E-03	1.0E-03	1.1E-13	1.6E-13	8.8E-15	1.3E-14
2-Butanone	1.9E-02	2.7E-02	2.1E-12	4.4E-12	1.7E-13	3.5E-13
2-Hexanone	3.0E-03	3.0E-03	3.3E-13	4.9E-13	2.6E-14	4.0E-14
Acetone	6.2E-01	5.2E+00	6.8E-11	8.6E-10	5.4E-12	6.8E-11
Benzene	NC	NC	NA	NA	NA	NA
Carbon disulfide	NC	NC	NA	NA	NA	NA
Chloromethane	NC	NC	NA	NA	NA	NA
cis-1,2-Dichloroethene	NC	NC	NA	NA	NA	NA
Ethylbenzene	NC	NC	NA	NA	NA	NA
m,p-Xylene	NC	NC	NA	NA	NA	NA
Methylene chloride	9.9E-03	1.2E-02	1.1E-12	1.9E-12	8.7E-14	1.5E-13
Tetrachloroethene	NC	NC	NA	NA	NA	NA
Toluene	NC	NC	NA	NA	NA	NA
Trichloroethene	NC	NC	NA	NA	NA	NA
Xylenes (total)	NC	NC	NA	NA	NA	NA

Spreadsheet C3-73b (2 of 3)

Estimates of Human Intake
Soil Particulate Inhalation Pathway for Child Resident - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation: $$\text{Dosage} = \frac{C \times CF \times IR \times FT \times EF \times ED}{PEF \times BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Inhalation rate	IR	m^3/day	8.4	8.4
Conversion factor	CF	kg/ug	1.E-09	1.E-09
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	6	6
Particulate emission factor	PEF	m^3/ug	2.4	2.4
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
SVOCs						
2-Methylnaphthalene	2.2E-02	2.5E-02	2.4E-12	4.1E-12	1.9E-13	3.3E-13
Acenaphthene	6.8E-02	2.5E-01	7.5E-12	4.2E-11	6.0E-13	3.3E-12
Acenaphthylene	4.9E-03	1.4E-02	5.4E-13	2.2E-12	4.3E-14	1.8E-13
Anthracene	1.9E-01	9.9E-01	2.1E-11	1.6E-10	1.7E-12	1.3E-11
Benzo(a)anthracene	8.2E-01	1.4E+01	9.0E-11	2.3E-09	7.2E-12	1.8E-10
Benzo(a)pyrene	8.8E-01	1.5E+01	9.6E-11	2.5E-09	7.7E-12	2.0E-10
Benzo(e)pyrene	2.0E-02	5.5E-02	2.2E-12	9.1E-12	1.7E-13	7.3E-13
Benzo(b)fluoranthene	7.8E-01	6.9E+00	8.6E-11	1.1E-09	6.9E-12	9.0E-11
Benzo(g,h,i)perylene	2.7E-01	2.4E+00	2.9E-11	4.0E-10	2.3E-12	3.2E-11
Benzo(k)fluoranthene	8.7E-01	1.5E+01	9.5E-11	2.5E-09	7.6E-12	2.0E-10
Chrysene	6.0E-01	6.5E+00	6.5E-11	1.1E-09	5.2E-12	8.5E-11
Dibenz(a,h)anthracene	1.2E-01	1.1E+00	1.3E-11	1.8E-10	1.0E-12	1.5E-11
Dibenzofuran	2.8E-01	2.8E-01	3.1E-11	4.6E-11	2.5E-12	3.7E-12
Fluoranthene	1.5E+00	1.3E+01	1.6E-10	2.1E-09	1.3E-11	1.7E-10
Fluorene	7.0E-02	2.6E-01	7.6E-12	4.3E-11	6.1E-13	3.4E-12
Indeno(1,2,3-cd)pyrene	3.7E-01	3.3E+00	4.1E-11	5.5E-10	3.3E-12	4.4E-11
Naphthalene	2.0E-02	5.8E-02	2.2E-12	9.5E-12	1.7E-13	7.6E-13
Perylene	1.1E-02	3.1E-02	1.2E-12	5.2E-12	9.7E-14	4.1E-13
Phenanthrene	7.0E-01	5.8E+00	7.7E-11	9.6E-10	6.1E-12	7.6E-11
Pyrene	1.2E+00	1.1E+01	1.3E-10	1.8E-09	1.1E-11	1.4E-10
Total Petroleum Hydrocarbons						
C11-C14(Kerosene Range)	7.8E+00	3.8E+01	8.5E-10	6.3E-09	6.8E-11	5.0E-10
C14-C20(Diesel Range)	7.3E+00	1.8E+01	8.0E-10	3.0E-09	6.4E-11	2.4E-10
C20-C30(Lubricant Oil Range)	7.9E+01	4.3E+02	8.7E-09	7.0E-08	6.9E-10	5.6E-09
PCDD/PCDFs						
2,3,7,8-TCDD	1.5E-07	3.5E-07	1.6E-17	5.7E-17	1.3E-18	4.6E-18
1,2,3,7,8-PeCDD	5.6E-07	1.3E-06	6.2E-17	2.2E-16	4.9E-18	1.7E-17
1,2,3,4,7,8-HxCDD	1.6E-06	3.7E-06	1.8E-16	6.1E-16	1.4E-17	4.9E-17
1,2,3,6,7,8-HxCDD	8.3E-06	1.9E-05	9.1E-16	3.1E-15	7.3E-17	2.5E-16
1,2,3,7,8,9-HxCDD	3.4E-06	8.7E-06	3.8E-16	1.4E-15	3.0E-17	1.1E-16
1,2,3,4,6,7,8-HpCDD	2.4E-04	4.9E-04	2.6E-14	8.1E-14	2.1E-15	6.5E-15
OCDD	3.7E-03	7.3E-03	4.1E-13	1.2E-12	3.3E-14	9.6E-14
2,3,7,8-TCDF	3.6E-07	7.8E-07	4.0E-17	1.3E-16	3.2E-18	1.0E-17
1,2,3,7,8-PeCDF	1.5E-07	3.9E-07	1.6E-17	6.4E-17	1.3E-18	5.1E-18
2,3,4,7,8-PeCDF	4.2E-07	9.0E-07	4.6E-17	1.5E-16	3.7E-18	1.2E-17
1,2,3,4,7,8-HxCDF	8.8E-07	1.7E-06	9.6E-17	2.9E-16	7.7E-18	2.3E-17

Spreadsheet C3-73b (3 of 3)

Estimates of Human Intake
Soil Particulate Inhalation Pathway for Child Resident - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation: $$\text{Dosage} = \frac{C \times CF \times IR \times FT \times EF \times ED}{PEF \times BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Inhalation rate	IR	m^3/day	8.4	8.4
Conversion factor	CF	kg/ug	1.E-09	1.E-09
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	6	6
Particulate emission factor	PEF	m^3/ug	2.4	2.4
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
1,2,3,6,7,8-HxCDF	7.2E-07	1.6E-06	7.9E-17	2.7E-16	6.3E-18	2.1E-17
2,3,4,6,7,8-HxCDF	1.4E-06	2.8E-06	1.5E-16	4.7E-16	1.2E-17	3.8E-17
1,2,3,7,8,9-HxCDF	1.4E-07	1.8E-07	1.5E-17	2.9E-17	1.2E-18	2.3E-18
1,2,3,4,6,7,8-HpCDF	2.8E-05	5.0E-05	3.0E-15	8.2E-15	2.4E-16	6.6E-16
1,2,3,4,7,8,9-HpCDF	2.4E-06	4.2E-06	2.6E-16	7.0E-16	2.1E-17	5.6E-17
OCDF	7.5E-05	1.5E-04	8.2E-15	2.5E-14	6.6E-16	2.0E-15
PCBs						
Aroclor-1254	1.6E-01	4.3E-01	1.8E-11	7.1E-11	1.4E-12	5.7E-12
Aroclor-1260	1.4E+00	7.7E+00	1.5E-10	1.3E-09	1.2E-11	1.0E-10
PCB-105	1.2E-04	6.3E-04	1.3E-14	1.0E-13	1.1E-15	8.2E-15
PCB-114	2.3E-06	1.1E-05	2.5E-16	1.8E-15	2.0E-17	1.5E-16
PCB-118	2.4E-04	1.3E-03	2.6E-14	2.1E-13	2.1E-15	1.6E-14
PCB-123	3.4E-06	1.8E-05	3.7E-16	2.9E-15	2.9E-17	2.3E-16
PCB-126	9.2E-06	4.9E-05	1.0E-15	8.0E-15	8.1E-17	6.4E-16
PCB-156	7.9E-05	4.2E-04	8.6E-15	6.9E-14	6.9E-16	5.5E-15
PCB-157	3.5E-05	1.9E-04	3.8E-15	3.1E-14	3.0E-16	2.5E-15
PCB-167	6.0E-05	3.3E-04	6.6E-15	5.4E-14	5.3E-16	4.3E-15
PCB-169	9.0E-07	4.9E-06	9.9E-17	8.0E-16	7.9E-18	6.4E-17
PCB-189	9.0E-06	4.9E-05	9.8E-16	8.0E-15	7.9E-17	6.4E-16
PCB-77	1.8E-05	9.7E-05	2.0E-15	1.6E-14	1.6E-16	1.3E-15
PCB-81	3.3E-06	1.7E-05	3.6E-16	2.8E-15	2.9E-17	2.3E-16

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCDD/PCDF - Polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.
PCB - polychlorinated biphenyls
mg/kg-day - milligrams per kilogram per day
mg/kg - milligrams per kilogram

Estimates of Human Intake
Soil Particulate Inhalation Pathway for Child Resident - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation:

$$\text{Dosage} = \frac{C \times CF \times IR \times FT \times EF \times ED}{PEF \times BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Inhalation rate	IR	m^3/day	8.4	8.4
Conversion factor	CF	kg/ug	1.E-09	1.E-09
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	6	6
Particulate emission factor	PEF	m^3/ug	2.4	2.4
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Inorganic Compounds						
Cadmium	5.1E-01	1.1E+00	5.6E-11	1.9E-10	4.5E-12	1.5E-11
Copper	2.1E+01	4.6E+01	2.3E-09	7.5E-09	1.9E-10	6.0E-10
Fluoride	NC	NC	NA	NA	NA	NA
Lead	1.6E+01	3.4E+01	1.8E-09	5.6E-09	1.4E-10	4.5E-10
Mercury	1.9E+00	4.4E+00	2.1E-10	7.3E-10	1.7E-11	5.8E-11
Methyl Mercury	1.7E-03	3.6E-03	1.9E-13	6.0E-13	1.5E-14	4.8E-14
Nitrate	NC	NC	NA	NA	NA	NA
Silver	7.7E-01	2.9E+00	8.5E-11	4.7E-10	6.8E-12	3.8E-11
Thallium	3.3E-01	3.3E-01	3.6E-11	5.4E-11	2.9E-12	4.3E-12
Zinc	1.7E+02	4.4E+02	1.9E-08	7.2E-08	1.5E-09	5.8E-09
VOCs						
1,1,1-Trichloroethane	NC	NC	NA	NA	NA	NA
1,1,2-Trichloro-1,2,2-trifluoroethane	NC	NC	NA	NA	NA	NA
1,1-Dichloroethane	NC	NC	NA	NA	NA	NA
1,2-Dichloroethane	NC	NC	NA	NA	NA	NA
1,2-Dichloroethene (total)	NC	NC	NA	NA	NA	NA
1-Chlorohexane	NC	NC	NA	NA	NA	NA
2-Butanone	NC	NC	NA	NA	NA	NA
2-Hexanone	NC	NC	NA	NA	NA	NA
Acetone	NC	NC	NA	NA	NA	NA
Benzene	NC	NC	NA	NA	NA	NA
Carbon disulfide	NC	NC	NA	NA	NA	NA
Chloromethane	NC	NC	NA	NA	NA	NA
cis-1,2-Dichloroethene	NC	NC	NA	NA	NA	NA
Ethylbenzene	NC	NC	NA	NA	NA	NA
m,p-Xylene	NC	NC	NA	NA	NA	NA
Methylene chloride	NC	NC	NA	NA	NA	NA
Tetrachloroethene	NC	NC	NA	NA	NA	NA
Toluene	NC	NC	NA	NA	NA	NA
Trichloroethene	NC	NC	NA	NA	NA	NA
Xylenes (total)	NC	NC	NA	NA	NA	NA
SVOCs						
2-Methylnaphthalene	NC	NC	NA	NA	NA	NA
Acenaphthene	4.4E-02	1.0E-01	4.8E-12	1.6E-11	3.9E-13	1.3E-12
Acenaphthylene	3.1E-02	8.5E-02	3.4E-12	1.4E-11	2.7E-13	1.1E-12
Anthracene	3.9E-02	8.2E-02	4.3E-12	1.3E-11	3.4E-13	1.1E-12

Spreadsheet C3-73a (2 of 3)

Estimates of Human Intake
Soil Particulate Inhalation Pathway for Child Resident - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation: $$\text{Dosage} = \frac{C \times CF \times IR \times FT \times EF \times ED}{PEF \times BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Inhalation rate	IR	m^3/day	8.4	8.4
Conversion factor	CF	kg/ug	1.E-09	1.E-09
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	6	6
Particulate emission factor	PEF	m^3/ug	2.4	2.4
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Benzo(a)anthracene	3.6E-02	1.5E-01	3.9E-12	2.4E-11	3.2E-13	2.0E-12
Benzo(a)pyrene	3.6E-02	1.5E-01	4.0E-12	2.4E-11	3.2E-13	2.0E-12
Benzo(e)pyrene	1.9E-02	6.3E-02	2.0E-12	1.0E-11	1.6E-13	8.2E-13
Benzo(b)fluoranthene	4.9E-02	2.7E-01	5.4E-12	4.4E-11	4.3E-13	3.5E-12
Benzo(g,h,i)perylene	4.1E-02	9.0E-02	4.5E-12	1.5E-11	3.6E-13	1.2E-12
Benzo(k)fluoranthene	3.0E-02	8.5E-02	3.3E-12	1.4E-11	2.6E-13	1.1E-12
Chrysene	4.4E-02	2.2E-01	4.9E-12	3.6E-11	3.9E-13	2.9E-12
Dibenz(a,h)anthracene	2.9E-02	8.5E-02	3.2E-12	1.4E-11	2.6E-13	1.1E-12
Dibenzofuran	NC	NC	NA	NA	NA	NA
Fluoranthene	6.0E-02	3.8E-01	6.6E-12	6.2E-11	5.3E-13	4.9E-12
Fluorene	4.4E-02	1.0E-01	4.8E-12	1.6E-11	3.9E-13	1.3E-12
Indeno(1,2,3-cd)pyrene	3.4E-02	1.4E-01	3.8E-12	2.2E-11	3.0E-13	1.8E-12
Naphthalene	NC	NC	NA	NA	NA	NA
Perylene	1.1E-02	3.6E-02	1.2E-12	5.9E-12	9.3E-14	4.7E-13
Phenanthrene	7.9E-02	2.0E-01	8.7E-12	3.3E-11	7.0E-13	2.6E-12
Pyrene	0.1	0.2	5.8E-12	2.6E-11	4.7E-13	2.1E-12
Total Petroleum Hydrocarbons						
C11-C14(Kerosene Range)	9.7E+00	4.0E+01	1.1E-09	6.6E-09	8.5E-11	5.3E-10
C14-C20(Diesel Range)	7.5E+00	7.5E+00	8.2E-10	1.2E-09	6.5E-11	9.8E-11
C20-C30(Lubricant Oil Range)	7.3E+01	4.7E+02	8.0E-09	7.7E-08	6.4E-10	6.2E-09
PCDD/PCDFs						
2,3,7,8-TCDD	2.7E-07	5.3E-07	3.0E-17	8.8E-17	2.4E-18	7.0E-18
1,2,3,7,8-PeCDD	1.1E-06	2.2E-06	1.2E-16	3.6E-16	9.7E-18	2.9E-17
1,2,3,4,7,8-HxCDD	4.1E-06	9.0E-06	4.5E-16	1.5E-15	3.6E-17	1.2E-16
1,2,3,6,7,8-HxCDD	1.6E-05	3.0E-05	1.7E-15	4.9E-15	1.4E-16	3.9E-16
1,2,3,7,8,9-HxCDD	5.9E-06	1.0E-05	6.5E-16	1.6E-15	5.2E-17	1.3E-16
1,2,3,4,6,7,8-HpCDD	5.7E-04	1.2E-03	6.2E-14	2.0E-13	5.0E-15	1.6E-14
OCDD	8.4E-03	1.7E-02	9.2E-13	2.8E-12	7.3E-14	2.2E-13
2,3,7,8-TCDF	5.5E-07	7.9E-07	6.0E-17	1.3E-16	4.8E-18	1.0E-17
1,2,3,7,8-PeCDF	2.8E-07	5.7E-07	3.0E-17	9.4E-17	2.4E-18	7.6E-18
2,3,4,7,8-PeCDF	8.2E-07	1.6E-06	9.0E-17	2.6E-16	7.2E-18	2.1E-17
1,2,3,4,7,8-HxCDF	1.8E-06	3.3E-06	2.0E-16	5.5E-16	1.6E-17	4.4E-17
1,2,3,6,7,8-HxCDF	1.6E-06	3.2E-06	1.7E-16	5.2E-16	1.4E-17	4.2E-17
2,3,4,6,7,8-HxCDF	3.8E-06	8.8E-06	4.2E-16	1.4E-15	3.4E-17	1.2E-16
1,2,3,7,8,9-HxCDF	3.6E-07	9.7E-07	4.0E-17	1.6E-16	3.2E-18	1.3E-17
1,2,3,4,6,7,8-HpCDF	5.3E-05	9.6E-05	5.8E-15	1.6E-14	4.6E-16	1.3E-15
1,2,3,4,7,8,9-HpCDF	4.9E-06	9.2E-06	5.3E-16	1.5E-15	4.3E-17	1.2E-16
OCDF	1.4E-04	2.4E-04	1.5E-14	3.9E-14	1.2E-15	3.1E-15

Spreadsheet C3-73a (3 of 3)

Estimates of Human Intake
Soil Particulate Inhalation Pathway for Child Resident - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation:

$$\text{Dosage} = \frac{C \times CF \times IR \times FT \times EF \times ED}{PEF \times BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Inhalation rate	IR	m^3/day	8.4	8.4
Conversion factor	CF	kg/ug	1.E-09	1.E-09
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	6	6
Particulate emission factor	PEF	m^3/ug	2.4	2.4
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
PCBs						
Aroclor-1254	1.6E-01	4.3E-01	1.8E-11	7.1E-11	1.4E-12	5.7E-12
Aroclor-1260	1.3E+00	7.3E+00	1.5E-10	1.2E-09	1.2E-11	9.6E-11
PCB-105	1.1E-04	5.6E-04	1.3E-14	9.3E-14	1.0E-15	7.4E-15
PCB-114	2.2E-06	1.0E-05	2.4E-16	1.7E-15	1.9E-17	1.3E-16
PCB-118	2.3E-04	1.1E-03	2.5E-14	1.9E-13	2.0E-15	1.5E-14
PCB-123	3.2E-06	1.6E-05	3.5E-16	2.6E-15	2.8E-17	2.1E-16
PCB-126	8.8E-06	4.4E-05	9.6E-16	7.2E-15	7.7E-17	5.8E-16
PCB-156	7.5E-05	3.8E-04	8.2E-15	6.2E-14	6.6E-16	5.0E-15
PCB-157	3.3E-05	1.7E-04	3.6E-15	2.8E-14	2.9E-16	2.2E-15
PCB-167	5.7E-05	2.9E-04	6.3E-15	4.9E-14	5.0E-16	3.9E-15
PCB-169	8.6E-07	4.4E-06	9.4E-17	7.2E-16	7.5E-18	5.8E-17
PCB-189	8.6E-06	4.4E-05	9.4E-16	7.2E-15	7.5E-17	5.8E-16
PCB-77	1.8E-05	8.8E-05	1.9E-15	1.4E-14	1.5E-16	1.2E-15
PCB-81	3.1E-06	1.6E-05	3.4E-16	2.6E-15	2.7E-17	2.0E-16

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCDD/PCDF - Polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.
PCB - polychlorinated biphenyls
mg/kg-day - milligrams per kilogram per day
mg/kg - milligrams per kilogram

Estimates of Human Intake
Soil Dermal Contact Pathway for Child Resident - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation: $$\text{Dosage} = \frac{C \times SA \times AF \times B \times CF \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Skin surface area per event	SA	cm^2/day	2800	2800
Soil loading to skin	AF	mg/cm^2	0.06	0.20
Bioavailability	B	fraction	CS	CS
Conversion factor	CF	kg/mg	1.E-06	1.E-06
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	6	6
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
Inorganic Compounds							
Aluminum	NC	NC	NA	NA	NA	NA	0.01
Antimony	NC	NC	NA	NA	NA	NA	0.01
Arsenic	NC	NC	NA	NA	NA	NA	0.03
Cadmium	1.9E-01	3.0E-01	2.1E-09	1.1E-08	1.6E-10	8.7E-10	0.00
Chromium	NC	NC	NA	NA	NA	NA	0.01
Copper	9.7E+00	1.8E+01	1.0E-06	6.3E-06	8.3E-08	5.0E-07	0.01
Fluoride	NC	NC	NA	NA	NA	NA	0.01
Lead	9.2E+00	1.5E+01	9.8E-07	5.3E-06	7.9E-08	4.2E-07	0.01
Mercury	1.7E+00	3.8E+00	1.9E-07	1.4E-06	1.5E-08	1.1E-07	0.01
Methyl Mercury	1.7E-03	3.6E-03	1.9E-10	1.3E-09	1.5E-11	1.0E-10	0.01
Nickel	NC	NC	NA	NA	NA	NA	0.01
Nitrate	NC	NC	NA	NA	NA	NA	0.01
Silver	1.3E+00	2.7E+00	1.4E-07	9.6E-07	1.1E-08	7.7E-08	0.01
Thallium	9.9E-01	3.6E+00	1.1E-07	1.3E-06	8.5E-09	1.0E-07	0.01
Vanadium	NC	NC	NA	NA	NA	NA	0.01
Zinc	6.8E+01	2.2E+02	7.3E-06	7.8E-05	5.8E-07	6.3E-06	0.01
VOCs							
1,1,1-Trichloroethane	NC	NC	NA	NA	NA	NA	0.10
1,1,2-Trichloro-1,2,2-trifluoroethane	1.2E-02	1.2E-02	1.3E-08	4.3E-08	1.0E-09	3.4E-09	0.10
1,1-Dichloroethane	NC	NC	NA	NA	NA	NA	0.10
1,2-Dichloroethane	NC	NC	NA	NA	NA	NA	0.10
1,2-Dichloroethene (total)	NC	NC	NA	NA	NA	NA	0.10
1-Chlorohexane	1.0E-03	1.0E-03	1.1E-09	3.6E-09	8.6E-11	2.9E-10	0.10
2-Butanone	1.9E-02	2.7E-02	2.0E-08	9.6E-08	1.6E-09	7.7E-09	0.10
2-Hexanone	3.0E-03	3.0E-03	3.2E-09	1.1E-08	2.6E-10	8.6E-10	0.10
Acetone	6.2E-01	5.2E+00	6.6E-07	1.9E-05	5.3E-08	1.5E-06	0.10
Benzene	NC	NC	NA	NA	NA	NA	0.10
Carbon disulfide	NC	NC	NA	NA	NA	NA	0.01
Chloromethane	NC	NC	NA	NA	NA	NA	0.10
cis-1,2-Dichloroethene	NC	NC	NA	NA	NA	NA	0.10
Ethylbenzene	NC	NC	NA	NA	NA	NA	0.10
m,p-Xylene	NC	NC	NA	NA	NA	NA	0.10
Methylene chloride	9.9E-03	1.2E-02	1.1E-08	4.2E-08	8.5E-10	3.3E-09	0.10
Tetrachloroethene	NC	NC	NA	NA	NA	NA	0.10
Toluene	NC	NC	NA	NA	NA	NA	0.10
Trichloroethene	NC	NC	NA	NA	NA	NA	0.10
Xylenes (total)	NC	NC	NA	NA	NA	NA	0.10

Spreadsheet C3-72b (2 of 3)

Estimates of Human Intake
Soil Dermal Contact Pathway for Child Resident - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation: $$\text{Dosage} = \frac{C \times SA \times AF \times B \times CF \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Skin surface area per event	SA	cm^2/day	2800	2800
Soil loading to skin	AF	mg/cm^2	0.06	0.20
Bioavailability	B	fraction	CS	CS
Conversion factor	CF	kg/mg	1.E-06	1.E-06
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	6	6
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
SVOCs							
2-Methylnaphthalene	2.2E-02	2.5E-02	3.0E-08	1.2E-07	2.4E-09	9.3E-09	0.13
Acenaphthene	6.8E-02	2.5E-01	9.6E-08	1.2E-06	7.6E-09	9.5E-08	0.13
Acenaphthylene	4.9E-03	1.4E-02	6.9E-09	6.4E-08	5.5E-10	5.1E-09	0.13
Anthracene	1.9E-01	9.9E-01	2.7E-07	4.6E-06	2.2E-08	3.7E-07	0.13
Benzo(a)anthracene	8.2E-01	1.4E+01	1.1E-06	6.5E-05	9.1E-08	5.2E-06	0.13
Benzo(a)pyrene	8.8E-01	1.5E+01	1.2E-06	7.0E-05	9.8E-08	5.6E-06	0.13
Benzo(e)pyrene	2.0E-02	5.5E-02	2.7E-08	2.6E-07	2.2E-09	2.1E-08	0.13
Benzo(b)fluoranthene	7.8E-01	6.9E+00	1.1E-06	3.2E-05	8.7E-08	2.6E-06	0.13
Benzo(g,h,i)perylene	2.7E-01	2.4E+00	3.7E-07	1.1E-05	3.0E-08	9.0E-07	0.13
Benzo(k)fluoranthene	8.7E-01	1.5E+01	1.2E-06	7.0E-05	9.7E-08	5.6E-06	0.13
Chrysene	6.0E-01	6.5E+00	8.3E-07	3.0E-05	6.6E-08	2.4E-06	0.13
Dibenz(a,h)anthracene	1.2E-01	1.1E+00	1.6E-07	5.2E-06	1.3E-08	4.1E-07	0.13
Dibenzofuran	2.8E-01	2.8E-01	3.9E-07	1.3E-06	3.1E-08	1.0E-07	0.13
Fluoranthene	1.5E+00	1.3E+01	2.0E-06	6.1E-05	1.6E-07	4.9E-06	0.13
Fluorene	7.0E-02	2.6E-01	9.7E-08	1.2E-06	7.8E-09	9.6E-08	0.13
Indeno(1,2,3-cd)pyrene	3.7E-01	3.3E+00	5.2E-07	1.5E-05	4.1E-08	1.2E-06	0.13
Naphthalene	2.0E-02	5.8E-02	2.7E-08	2.7E-07	2.2E-09	2.2E-08	0.13
Perylene	1.1E-02	3.1E-02	1.5E-08	1.5E-07	1.2E-09	1.2E-08	0.13
Phenanthrene	7.0E-01	5.8E+00	9.8E-07	2.7E-05	7.8E-08	2.2E-06	0.13
Pyrene	1.2E+00	1.1E+01	1.7E-06	5.1E-05	1.4E-07	4.1E-06	0.13
Total Petroleum Hydrocarbons							
C11-C14(Kerosene Range)	7.8E+00	3.8E+01	1.1E-05	1.8E-04	8.7E-07	1.4E-05	0.13
C14-C20(Diesel Range)	7.3E+00	1.8E+01	1.0E-05	8.4E-05	8.2E-07	6.7E-06	0.13
C20-C30(Lubricant Oil Range)	7.9E+01	4.3E+02	1.1E-04	2.0E-03	8.8E-06	1.6E-04	0.13
2,3,7,8-TCDD	1.5E-07	3.5E-07	4.8E-14	3.7E-13	3.8E-15	3.0E-14	0.03
1,2,3,7,8-PeCDD	5.6E-07	1.3E-06	1.8E-13	1.4E-12	1.4E-14	1.1E-13	0.03
1,2,3,4,7,8-HxCDD	1.6E-06	3.7E-06	5.3E-13	4.0E-12	4.2E-14	3.2E-13	0.03
1,2,3,6,7,8-HxCDD	8.3E-06	1.9E-05	2.7E-12	2.0E-11	2.1E-13	1.6E-12	0.03
1,2,3,7,8,9-HxCDD	3.4E-06	8.7E-06	1.1E-12	9.3E-12	8.9E-14	7.5E-13	0.03
1,2,3,4,6,7,8-HpCDD	2.4E-04	4.9E-04	7.6E-11	5.3E-10	6.1E-12	4.2E-11	0.03
OCDD	3.7E-03	7.3E-03	1.2E-09	7.9E-09	9.6E-11	6.3E-10	0.03
2,3,7,8-TCDF	3.6E-07	7.8E-07	1.2E-13	8.3E-13	9.4E-15	6.7E-14	0.03
1,2,3,7,8-PeCDF	1.5E-07	3.9E-07	4.7E-14	4.2E-13	3.8E-15	3.3E-14	0.03
2,3,4,7,8-PeCDF	4.2E-07	9.0E-07	1.4E-13	9.7E-13	1.1E-14	7.7E-14	0.03
1,2,3,4,7,8-HxCDF	8.8E-07	1.7E-06	2.8E-13	1.9E-12	2.3E-14	1.5E-13	0.03
1,2,3,6,7,8-HxCDF	7.2E-07	1.6E-06	2.3E-13	1.7E-12	1.9E-14	1.4E-13	0.03
2,3,4,6,7,8-HxCDF	1.4E-06	2.8E-06	4.4E-13	3.1E-12	3.5E-14	2.4E-13	0.03

Spreadsheet C3-72b (3 of 3)

Estimates of Human Intake
Soil Dermal Contact Pathway for Child Resident - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation: $$\text{Dosage} = \frac{C \times SA \times AF \times B \times CF \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Skin surface area per event	SA	cm^2/day	2800	2800
Soil loading to skin	AF	mg/cm^2	0.06	0.20
Bioavailability	B	fraction	CS	CS
Conversion factor	CF	kg/mg	1.E-06	1.E-06
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	6	6
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
1,2,3,7,8,9-HxCDF	1.4E-07	1.8E-07	4.5E-14	1.9E-13	3.6E-15	1.5E-14	0.03
1,2,3,4,6,7,8-HpCDF	2.8E-05	5.0E-05	8.9E-12	5.4E-11	7.1E-13	4.3E-12	0.03
1,2,3,4,7,8,9-HpCDF	2.4E-06	4.2E-06	7.7E-13	4.6E-12	6.1E-14	3.6E-13	0.03
OCDF	7.5E-05	1.5E-04	2.4E-11	1.6E-10	1.9E-12	1.3E-11	0.03
PCBs							
Aroclor-1254	1.6E-01	4.3E-01	2.5E-07	2.2E-06	2.0E-08	1.7E-07	0.14
Aroclor-1260	1.4E+00	7.7E+00	2.1E-06	3.8E-05	1.7E-07	3.1E-06	0.14
PCB-105	1.2E-04	6.3E-04	1.8E-10	3.1E-09	1.4E-11	2.5E-10	0.14
PCB-114	2.3E-06	1.1E-05	3.4E-12	5.6E-11	2.7E-13	4.5E-12	0.14
PCB-118	2.4E-04	1.3E-03	3.6E-10	6.3E-09	2.9E-11	5.0E-10	0.14
PCB-123	3.4E-06	1.8E-05	5.1E-12	8.9E-11	4.0E-13	7.1E-12	0.14
PCB-126	9.2E-06	4.9E-05	1.4E-11	2.4E-10	1.1E-12	2.0E-11	0.14
PCB-156	7.9E-05	4.2E-04	1.2E-10	2.1E-09	9.5E-12	1.7E-10	0.14
PCB-157	3.5E-05	1.9E-04	5.2E-11	9.4E-10	4.2E-12	7.5E-11	0.14
PCB-167	6.0E-05	3.3E-04	9.1E-11	1.6E-09	7.2E-12	1.3E-10	0.14
PCB-169	9.0E-07	4.9E-06	1.4E-12	2.4E-11	1.1E-13	2.0E-12	0.14
PCB-189	9.0E-06	4.9E-05	1.3E-11	2.4E-10	1.1E-12	2.0E-11	0.14
PCB-77	1.8E-05	9.7E-05	2.8E-11	4.9E-10	2.2E-12	3.9E-11	0.14
PCB-81	3.3E-06	1.7E-05	4.9E-12	8.6E-11	3.9E-13	6.9E-12	0.14

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005), except dermal absorption factors which were taken from USEPA (2001).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCDD/PCDF - Polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.
PCB - polychlorinated biphenyls
mg/kg-day - milligrams per kilogram per day
mg/kg - milligrams per kilogram

Estimates of Human Intake
Soil Dermal Contact Pathway for Child Resident - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation: $$\text{Dosage} = \frac{C \times SA \times AF \times B \times CF \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Skin surface area per event	SA	cm^2/day	2800	2800
Soil loading to skin	AF	mg/cm^2	0.06	0.20
Bioavailability	B	fraction	CS	CS
Conversion factor	CF	kg/mg	1.E-06	1.E-06
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	6	6
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
Inorganic Compounds							
Cadmium	5.1E-01	1.1E+00	5.5E-09	4.1E-08	4.4E-10	3.3E-09	0.001
Copper	2.1E+01	4.6E+01	2.3E-06	1.6E-05	1.8E-07	1.3E-06	0.01
Fluoride	NC	NC	NA	NA	NA	NA	0.01
Lead	1.6E+01	3.4E+01	1.7E-06	1.2E-05	1.4E-07	9.7E-07	0.01
Mercury	1.9E+00	4.4E+00	2.0E-07	1.6E-06	1.6E-08	1.3E-07	0.01
Methyl Mercury	1.7E-03	3.6E-03	1.9E-10	1.3E-09	1.5E-11	1.0E-10	0.01
Nitrate	NC	NC	NA	NA	NA	NA	0.01
Silver	7.7E-01	2.9E+00	8.3E-08	1.0E-06	6.6E-09	8.2E-08	0.01
Thallium	3.3E-01	3.3E-01	3.5E-08	1.2E-07	2.8E-09	9.5E-09	0.01
Zinc	1.7E+02	4.4E+02	1.8E-05	1.6E-04	1.5E-06	1.3E-05	0.01
VOCs							
1,1,1-Trichloroethane	NC	NC	NA	NA	NA	NA	0.10
1,1,2-Trichloro-1,2,2-trifluoroethane	1.2E-02	1.2E-02	1.3E-08	4.3E-08	1.0E-09	3.4E-09	0.10
1,1-Dichloroethane	NC	NC	NA	NA	NA	NA	0.10
1,2-Dichloroethane	NC	NC	NA	NA	NA	NA	0.10
1,2-Dichloroethene (total)	2.8E-02	7.0E-02	3.0E-08	2.5E-07	2.4E-09	2.0E-08	0.10
1-Chlorohexane	NC	NC	NA	NA	NA	NA	0.10
2-Butanone	3.7E-02	3.7E-02	4.0E-08	1.3E-07	3.2E-09	1.1E-08	0.10
2-Hexanone	NC	NC	NA	NA	NA	NA	0.10
Acetone	6.8E-01	4.2E+00	7.3E-07	1.5E-05	5.8E-08	1.2E-06	0.10
Benzene	NC	NC	NA	NA	NA	NA	0.10
Carbon disulfide	NC	NC	NA	NA	NA	NA	0.01
Chloromethane	NC	NC	NA	NA	NA	NA	0.10
cis-1,2-Dichloroethene	NC	NC	NA	NA	NA	NA	0.10
Ethylbenzene	NC	NC	NA	NA	NA	NA	0.10
m,p-Xylene	NC	NC	NA	NA	NA	NA	0.10
Methylene chloride	1.3E-02	1.3E-02	1.4E-08	4.7E-08	1.1E-09	3.7E-09	0.10
Tetrachloroethene	2.1E-02	8.8E-02	2.2E-08	3.2E-07	1.8E-09	2.5E-08	0.10
Toluene	5.6E-02	3.4E-01	6.0E-08	1.2E-06	4.8E-09	9.8E-08	0.10
Trichloroethene	3.7E-02	2.0E-01	4.0E-08	7.2E-07	3.2E-09	5.8E-08	0.10
Xylenes (total)	2.5E-02	5.1E-02	2.7E-08	1.8E-07	2.2E-09	1.5E-08	0.10
SVOCs							
2-Methylnaphthalene	NC	NC	NA	NA	NA	NA	0.13
Acenaphthene	4.4E-02	1.0E-01	6.2E-08	4.7E-07	4.9E-09	3.7E-08	0.13
Acenaphthylene	3.1E-02	8.5E-02	4.3E-08	4.0E-07	3.4E-09	3.2E-08	0.13
Anthracene	3.9E-02	8.2E-02	5.4E-08	3.8E-07	4.3E-09	3.1E-08	0.13

Spreadsheet C3-72a (2 of 3)

Estimates of Human Intake
Soil Dermal Contact Pathway for Child Resident - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation: $$\text{Dosage} = \frac{C \times SA \times AF \times B \times CF \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Skin surface area per event	SA	cm^2/day	2800	2800
Soil loading to skin	AF	mg/cm^2	0.06	0.20
Bioavailability	B	fraction	CS	CS
Conversion factor	CF	kg/mg	1.E-06	1.E-06
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	6	6
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
Benzo(a)anthracene	3.6E-02	1.5E-01	5.0E-08	6.9E-07	4.0E-09	5.5E-08	0.13
Benzo(a)pyrene	3.6E-02	1.5E-01	5.0E-08	6.9E-07	4.0E-09	5.5E-08	0.13
Benzo(e)pyrene	1.9E-02	6.3E-02	2.6E-08	2.9E-07	2.1E-09	2.3E-08	0.13
Benzo(b)fluoranthene	4.9E-02	2.7E-01	6.8E-08	1.2E-06	5.5E-09	9.9E-08	0.13
Benzo(g,h,i)perylene	4.1E-02	9.0E-02	5.7E-08	4.2E-07	4.6E-09	3.3E-08	0.13
Benzo(k)fluoranthene	3.0E-02	8.5E-02	4.1E-08	4.0E-07	3.3E-09	3.2E-08	0.13
Chrysene	4.4E-02	2.2E-01	6.2E-08	1.0E-06	5.0E-09	8.1E-08	0.13
Dibenz(a,h)anthracene	2.9E-02	8.5E-02	4.1E-08	4.0E-07	3.3E-09	3.2E-08	0.13
Dibenzofuran	NC	NC	NA	NA	NA	NA	0.13
Fluoranthene	6.0E-02	3.8E-01	8.4E-08	1.7E-06	6.7E-09	1.4E-07	0.13
Fluorene	4.4E-02	1.0E-01	6.1E-08	4.6E-07	4.9E-09	3.7E-08	0.13
Indeno(1,2,3-cd)pyrene	3.4E-02	1.4E-01	4.8E-08	6.3E-07	3.8E-09	5.0E-08	0.13
Naphthalene	NC	NC	NA	NA	NA	NA	0.13
Perylene	1.1E-02	3.6E-02	1.5E-08	1.7E-07	1.2E-09	1.3E-08	0.13
Phenanthrene	7.9E-02	2.0E-01	1.1E-07	9.3E-07	8.9E-09	7.5E-08	0.13
Pyrene	5.3E-02	1.6E-01	7.4E-08	7.3E-07	5.9E-09	5.8E-08	0.13
Total Petroleum Hydrocarbons							
C11-C14(Kerosene Range)	9.7E+00	4.0E+01	1.3E-05	1.9E-04	1.1E-06	1.5E-05	0.13
C14-C20(Diesel Range)	7.5E+00	7.5E+00	1.0E-05	3.5E-05	8.3E-07	2.8E-06	0.13
C20-C30(Lubricant Oil Range)	7.3E+01	4.7E+02	1.0E-04	2.2E-03	8.2E-06	1.7E-04	0.13
PCDD/PCDFs							
2,3,7,8-TCDD	2.7E-07	5.3E-07	8.8E-14	5.7E-13	7.0E-15	4.6E-14	0.03
1,2,3,7,8-PeCDD	1.1E-06	2.2E-06	3.5E-13	2.3E-12	2.8E-14	1.9E-13	0.03
1,2,3,4,7,8-HxCDD	4.1E-06	9.0E-06	1.3E-12	9.7E-12	1.1E-13	7.8E-13	0.03
1,2,3,6,7,8-HxCDD	1.6E-05	3.0E-05	5.1E-12	3.2E-11	4.1E-13	2.5E-12	0.03
1,2,3,7,8,9-HxCDD	5.9E-06	1.0E-05	1.9E-12	1.1E-11	1.5E-13	8.6E-13	0.03
1,2,3,4,6,7,8-HpCDD	5.7E-04	1.2E-03	1.8E-10	1.3E-09	1.5E-11	1.0E-10	0.03
OCDD	8.4E-03	1.7E-02	2.7E-09	1.8E-08	2.2E-10	1.4E-09	0.03
2,3,7,8-TCDF	5.5E-07	7.9E-07	1.8E-13	8.5E-13	1.4E-14	6.8E-14	0.03
1,2,3,7,8-PeCDF	2.8E-07	5.7E-07	8.9E-14	6.2E-13	7.1E-15	4.9E-14	0.03
2,3,4,7,8-PeCDF	8.2E-07	1.6E-06	2.6E-13	1.7E-12	2.1E-14	1.3E-13	0.03
1,2,3,4,7,8-HxCDF	1.8E-06	3.3E-06	5.7E-13	3.6E-12	4.6E-14	2.9E-13	0.03
1,2,3,6,7,8-HxCDF	1.6E-06	3.2E-06	5.0E-13	3.4E-12	4.0E-14	2.7E-13	0.03
2,3,4,6,7,8-HxCDF	3.8E-06	8.8E-06	1.2E-12	9.4E-12	9.9E-14	7.6E-13	0.03
1,2,3,7,8,9-HxCDF	3.6E-07	9.7E-07	1.2E-13	1.0E-12	9.3E-15	8.3E-14	0.03
1,2,3,4,6,7,8-HpCDF	5.3E-05	9.6E-05	1.7E-11	1.0E-10	1.4E-12	8.2E-12	0.03
1,2,3,4,7,8,9-HpCDF	4.9E-06	9.2E-06	1.6E-12	9.9E-12	1.3E-13	7.9E-13	0.03
OCDF	1.4E-04	2.4E-04	4.3E-11	2.5E-10	3.5E-12	2.0E-11	0.03

Spreadsheet C3-72a (3 of 3)

Estimates of Human Intake
Soil Dermal Contact Pathway for Child Resident - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation: $$\text{Dosage} = \frac{C \times SA \times AF \times B \times CF \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Skin surface area per event	SA	cm^2/day	2800	2800
Soil loading to skin	AF	mg/cm^2	0.06	0.20
Bioavailability	B	fraction	CS	CS
Conversion factor	CF	kg/mg	1.E-06	1.E-06
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	6	6
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
PCBs							
Aroclor-1254	1.6E-01	4.3E-01	2.4E-07	2.2E-06	1.9E-08	1.7E-07	0.14
Aroclor-1260	1.3E+00	7.3E+00	2.0E-06	3.7E-05	1.6E-07	2.9E-06	0.14
PCB-105	1.1E-04	5.6E-04	1.7E-10	2.8E-09	1.4E-11	2.3E-10	0.14
PCB-114	2.2E-06	1.0E-05	3.3E-12	5.0E-11	2.6E-13	4.0E-12	0.14
PCB-118	2.3E-04	1.1E-03	3.5E-10	5.7E-09	2.8E-11	4.5E-10	0.14
PCB-123	3.2E-06	1.6E-05	4.8E-12	8.0E-11	3.9E-13	6.4E-12	0.14
PCB-126	8.8E-06	4.4E-05	1.3E-11	2.2E-10	1.1E-12	1.8E-11	0.14
PCB-156	7.5E-05	3.8E-04	1.1E-10	1.9E-09	9.0E-12	1.5E-10	0.14
PCB-157	3.3E-05	1.7E-04	5.0E-11	8.5E-10	4.0E-12	6.8E-11	0.14
PCB-167	5.7E-05	2.9E-04	8.6E-11	1.5E-09	6.9E-12	1.2E-10	0.14
PCB-169	8.6E-07	4.4E-06	1.3E-12	2.2E-11	1.0E-13	1.8E-12	0.14
PCB-189	8.6E-06	4.4E-05	1.3E-11	2.2E-10	1.0E-12	1.8E-11	0.14
PCB-77	1.8E-05	8.8E-05	2.6E-11	4.4E-10	2.1E-12	3.5E-11	0.14
PCB-81	3.1E-06	1.6E-05	4.7E-12	7.8E-11	3.7E-13	6.2E-12	0.14

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005), except dermal absorption factors which were taken from USEPA (2001).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCDD/PCDF - Polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.
PCB - polychlorinated biphenyls
mg/kg-day - milligrams per kilogram per day
mg/kg - milligrams per kilogram

Estimates of Human Intake
Soil Ingestion Pathway for Child Resident - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times CF \times FT \times EF \times ED \times B}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Soil ingestion rate	IR	mg/day	100	200
Conversion factor	CF	kg/mg	1.E-06	1.E-06
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	6	6
Bioavailability	B	fraction	CS	CS
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
Inorganic Compounds							
Aluminum	NC	NC	NA	NA	NA	NA	1
Antimony	NC	NC	NA	NA	NA	NA	1
Arsenic	NC	NC	NA	NA	NA	NA	1
Cadmium	1.9E-01	3.0E-01	1.2E-06	3.9E-06	9.8E-08	3.1E-07	1
Chromium	NC	NC	NA	NA	NA	NA	1
Copper	9.7E+00	1.8E+01	6.2E-05	2.2E-04	5.0E-06	1.8E-05	1
Fluoride	NC	NC	NA	NA	NA	NA	1
Lead	9.2E+00	1.5E+01	5.9E-05	1.9E-04	4.7E-06	1.5E-05	1
Mercury	1.7E+00	3.8E+00	1.1E-05	4.8E-05	8.9E-07	3.9E-06	1
Methyl Mercury	1.7E-03	3.6E-03	1.1E-08	4.6E-08	8.9E-10	3.7E-09	1
Nickel	NC	NC	NA	NA	NA	NA	1
Nitrate	NC	NC	NA	NA	NA	NA	1
Silver	1.3E+00	2.7E+00	8.3E-06	3.4E-05	6.7E-07	2.7E-06	1
Thallium	9.9E-01	3.6E+00	6.4E-06	4.6E-05	5.1E-07	3.7E-06	1
Vanadium	NC	NC	NA	NA	NA	NA	1
Zinc	6.8E+01	2.2E+02	4.3E-04	2.8E-03	3.5E-05	2.2E-04	1
VOCs							
1,1,1-Trichloroethane	NC	NC	NA	NA	NA	NA	1
1,1,2-Trichloro-1,2,2-trifluoroethane	1.2E-02	1.2E-02	7.7E-08	1.5E-07	6.1E-09	1.2E-08	1
1,1-Dichloroethane	NC	NC	NA	NA	NA	NA	1
1,2-Dichloroethane	NC	NC	NA	NA	NA	NA	1
1,2-Dichloroethene (total)	NC	NC	NA	NA	NA	NA	1
1-Chlorohexane	1.0E-03	1.0E-03	6.4E-09	1.3E-08	5.1E-10	1.0E-09	1
2-Butanone	1.9E-02	2.7E-02	1.2E-07	3.4E-07	9.7E-09	2.7E-08	1
2-Hexanone	3.0E-03	3.0E-03	1.9E-08	3.8E-08	1.5E-09	3.1E-09	1
Acetone	6.2E-01	5.2E+00	3.9E-06	6.6E-05	3.2E-07	5.3E-06	1
Benzene	NC	NC	NA	NA	NA	NA	1
Carbon disulfide	NC	NC	NA	NA	NA	NA	1
Chloromethane	NC	NC	NA	NA	NA	NA	1
cis-1,2-Dichloroethene	NC	NC	NA	NA	NA	NA	1
Ethylbenzene	NC	NC	NA	NA	NA	NA	1
m,p-Xylene	NC	NC	NA	NA	NA	NA	1
Methylene chloride	9.9E-03	1.2E-02	6.3E-08	1.5E-07	5.1E-09	1.2E-08	1
Tetrachloroethene	NC	NC	NA	NA	NA	NA	1
Toluene	NC	NC	NA	NA	NA	NA	1
Trichloroethene	NC	NC	NA	NA	NA	NA	1
Xylenes (total)	NC	NC	NA	NA	NA	NA	1

Spreadsheet C3-71b (2 of 3)

Estimates of Human Intake
Soil Ingestion Pathway for Child Resident - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times CF \times FT \times EF \times ED \times B}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Soil ingestion rate	IR	mg/day	100	200
Conversion factor	CF	kg/mg	1.E-06	1.E-06
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	6	6
Bioavailability	B	fraction	CS	CS
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
SVOCs							
2-Methylnaphthalene	2.2E-02	2.5E-02	1.4E-07	3.2E-07	1.1E-08	2.6E-08	1
Acenaphthene	6.8E-02	2.5E-01	4.4E-07	3.2E-06	3.5E-08	2.6E-07	1
Acenaphthylene	4.9E-03	1.4E-02	3.1E-08	1.7E-07	2.5E-09	1.4E-08	1
Anthracene	1.9E-01	9.9E-01	1.2E-06	1.3E-05	1.0E-07	1.0E-06	1
Benzo(a)anthracene	8.2E-01	1.4E+01	5.2E-06	1.8E-04	4.2E-07	1.4E-05	1
Benzo(a)pyrene	8.8E-01	1.5E+01	5.6E-06	1.9E-04	4.5E-07	1.5E-05	1
Benzo(e)pyrene	2.0E-02	5.5E-02	1.3E-07	7.0E-07	1.0E-08	5.6E-08	1
Benzo(b)fluoranthene	7.8E-01	6.9E+00	5.0E-06	8.8E-05	4.0E-07	7.0E-06	1
Benzo(g,h,i)perylene	2.7E-01	2.4E+00	1.7E-06	3.1E-05	1.4E-07	2.5E-06	1
Benzo(k)fluoranthene	8.7E-01	1.5E+01	5.5E-06	1.9E-04	4.4E-07	1.5E-05	1
Chrysene	6.0E-01	6.5E+00	3.8E-06	8.3E-05	3.0E-07	6.6E-06	1
Dibenz(a,h)anthracene	1.2E-01	1.1E+00	7.4E-07	1.4E-05	5.9E-08	1.1E-06	1
Dibenzofuran	2.8E-01	2.8E-01	1.8E-06	3.6E-06	1.4E-07	2.9E-07	1
Fluoranthene	1.5E+00	1.3E+01	9.3E-06	1.7E-04	7.5E-07	1.3E-05	1
Fluorene	7.0E-02	2.6E-01	4.5E-07	3.3E-06	3.6E-08	2.6E-07	1
Indeno(1,2,3-cd)pyrene	3.7E-01	3.3E+00	2.4E-06	4.3E-05	1.9E-07	3.4E-06	1
Naphthalene	2.0E-02	5.8E-02	1.3E-07	7.4E-07	1.0E-08	5.9E-08	1
Perylene	1.1E-02	3.1E-02	7.1E-08	4.0E-07	5.7E-09	3.2E-08	1
Phenanthrene	7.0E-01	5.8E+00	4.5E-06	7.4E-05	3.6E-07	5.9E-06	1
Pyrene	1.2E+00	1.1E+01	7.8E-06	1.4E-04	6.2E-07	1.1E-05	1
Total Petroleum Hydrocarbons							
C11-C14(Kerosene Range)	7.8E+00	3.8E+01	5.0E-05	4.9E-04	4.0E-06	3.9E-05	1
C14-C20(Diesel Range)	7.3E+00	1.8E+01	4.7E-05	2.3E-04	3.7E-06	1.8E-05	1
C20-C30(Lubricant Oil Range)	7.9E+01	4.3E+02	5.0E-04	5.4E-03	4.0E-05	4.4E-04	1
PCDD/PCDFs							
2,3,7,8-TCDD	1.5E-07	3.5E-07	9.5E-13	4.4E-12	7.6E-14	3.6E-13	1
1,2,3,7,8-PeCDD	5.6E-07	1.3E-06	3.6E-12	1.7E-11	2.9E-13	1.3E-12	1
1,2,3,4,7,8-HxCDD	1.6E-06	3.7E-06	1.0E-11	4.8E-11	8.3E-13	3.8E-12	1
1,2,3,6,7,8-HxCDD	8.3E-06	1.9E-05	5.3E-11	2.4E-10	4.3E-12	1.9E-11	1
1,2,3,7,8,9-HxCDD	3.4E-06	8.7E-06	2.2E-11	1.1E-10	1.8E-12	8.9E-12	1
1,2,3,4,6,7,8-HpCDD	2.4E-04	4.9E-04	1.5E-09	6.3E-09	1.2E-10	5.1E-10	1
OCDD	3.7E-03	7.3E-03	2.4E-08	9.3E-08	1.9E-09	7.5E-09	1
2,3,7,8-TCDF	3.6E-07	7.8E-07	2.3E-12	9.9E-12	1.9E-13	7.9E-13	1
1,2,3,7,8-PeCDF	1.5E-07	3.9E-07	9.4E-13	5.0E-12	7.5E-14	4.0E-13	1
2,3,4,7,8-PeCDF	4.2E-07	9.0E-07	2.7E-12	1.2E-11	2.1E-13	9.2E-13	1
1,2,3,4,7,8-HxCDF	8.8E-07	1.7E-06	5.6E-12	2.2E-11	4.5E-13	1.8E-12	1
1,2,3,6,7,8-HxCDF	7.2E-07	1.6E-06	4.6E-12	2.1E-11	3.7E-13	1.7E-12	1
2,3,4,6,7,8-HxCDF	1.4E-06	2.8E-06	8.7E-12	3.6E-11	6.9E-13	2.9E-12	1

Spreadsheet C3-71b (3 of 3)

Estimates of Human Intake
Soil Ingestion Pathway for Child Resident - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times CF \times FT \times EF \times ED \times B}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Soil ingestion rate	IR	mg/day	100	200
Conversion factor	CF	kg/mg	1.E-06	1.E-06
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	6	6
Bioavailability	B	fraction	CS	CS
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
1,2,3,7,8,9-HxCDF	1.4E-07	1.8E-07	8.9E-13	2.2E-12	7.1E-14	1.8E-13	1
1,2,3,4,6,7,8-HpCDF	2.8E-05	5.0E-05	1.8E-10	6.4E-10	1.4E-11	5.1E-11	1
1,2,3,4,7,8,9-HpCDF	2.4E-06	4.2E-06	1.5E-11	5.4E-11	1.2E-12	4.3E-12	1
OCDF	7.5E-05	1.5E-04	4.8E-10	1.9E-09	3.8E-11	1.5E-10	1
PCBs							
Aroclor-1254	1.6E-01	4.3E-01	1.0E-06	5.5E-06	8.4E-08	4.4E-07	1
Aroclor-1260	1.4E+00	7.7E+00	8.9E-06	9.8E-05	7.1E-07	7.8E-06	1
PCB-105	1.2E-04	6.3E-04	7.6E-10	8.0E-09	6.1E-11	6.4E-10	1
PCB-114	2.3E-06	1.1E-05	1.5E-11	1.4E-10	1.2E-12	1.1E-11	1
PCB-118	2.4E-04	1.3E-03	1.5E-09	1.6E-08	1.2E-10	1.3E-09	1
PCB-123	3.4E-06	1.8E-05	2.1E-11	2.3E-10	1.7E-12	1.8E-11	1
PCB-126	9.2E-06	4.9E-05	5.9E-11	6.2E-10	4.7E-12	5.0E-11	1
PCB-156	7.9E-05	4.2E-04	5.0E-10	5.3E-09	4.0E-11	4.3E-10	1
PCB-157	3.5E-05	1.9E-04	2.2E-10	2.4E-09	1.8E-11	1.9E-10	1
PCB-167	6.0E-05	3.3E-04	3.9E-10	4.2E-09	3.1E-11	3.3E-10	1
PCB-169	9.0E-07	4.9E-06	5.8E-12	6.2E-11	4.6E-13	5.0E-12	1
PCB-189	9.0E-06	4.9E-05	5.7E-11	6.2E-10	4.6E-12	5.0E-11	1
PCB-77	1.8E-05	9.7E-05	1.2E-10	1.2E-09	9.4E-12	1.0E-10	1
PCB-81	3.3E-06	1.7E-05	2.1E-11	2.2E-10	1.7E-12	1.8E-11	1

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCDD/PCDF - Polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.
PCB - polychlorinated biphenyls
mg/kg-day - milligrams per kilogram perday
mg/kg - milligrams per kilogram

Estimates of Human Intake
Soil Ingestion Pathway for Child Resident - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times CF \times FT \times EF \times ED \times B}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Soil ingestion rate	IR	mg/day	100	200
Conversion factor	CF	kg/mg	1.E-06	1.E-06
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	6	6
Bioavailability	B	fraction	CS	CS
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
Inorganic Compounds							
Cadmium	5.1E-01	1.1E+00	3.2E-06	1.5E-05	2.6E-07	1.2E-06	1
Copper	2.1E+01	4.6E+01	1.3E-04	5.8E-04	1.1E-05	4.7E-05	1
Fluoride	NC	NC	NA	NA	NA	NA	1
Lead	1.6E+01	3.4E+01	1.0E-04	4.3E-04	8.2E-06	3.5E-05	1
Mercury	1.9E+00	4.4E+00	1.2E-05	5.6E-05	9.8E-07	4.5E-06	1
Methyl Mercury	1.7E-03	3.6E-03	1.1E-08	4.6E-08	8.9E-10	3.7E-09	1
Nitrate	NC	NC	NA	NA	NA	NA	1
Silver	7.7E-01	2.9E+00	4.9E-06	3.7E-05	4.0E-07	2.9E-06	1
Thallium	3.3E-01	3.3E-01	2.1E-06	4.2E-06	1.7E-07	3.4E-07	1
Zinc	1.7E+02	4.4E+02	1.1E-03	5.6E-03	8.7E-05	4.5E-04	1
VOCs							
1,1,1-Trichloroethane	NC	NC	NA	NA	NA	NA	1
1,1,2-Trichloro-1,2,2-trifluoroethane	1.2E-02	1.2E-02	7.7E-08	1.5E-07	6.1E-09	1.2E-08	1
1,1-Dichloroethane	NC	NC	NA	NA	NA	NA	1
1,2-Dichloroethane	NC	NC	NA	NA	NA	NA	1
1,2-Dichloroethene (total)	2.8E-02	7.0E-02	1.8E-07	8.9E-07	1.4E-08	7.2E-08	1
1-Chlorohexane	NC	NC	NA	NA	NA	NA	1
2-Butanone	3.7E-02	3.7E-02	2.4E-07	4.7E-07	1.9E-08	3.8E-08	1
2-Hexanone	NC	NC	NA	NA	NA	NA	1
Acetone	6.8E-01	4.2E+00	4.3E-06	5.4E-05	3.5E-07	4.3E-06	1
Benzene	NC	NC	NA	NA	NA	NA	1
Carbon disulfide	NC	NC	NA	NA	NA	NA	1
Chloromethane	NC	NC	NA	NA	NA	NA	1
cis-1,2-Dichloroethene	NC	NC	NA	NA	NA	NA	1
Ethylbenzene	NC	NC	NA	NA	NA	NA	1
m,p-Xylene	NC	NC	NA	NA	NA	NA	1
Methylene chloride	1.3E-02	1.3E-02	8.3E-08	1.7E-07	6.6E-09	1.3E-08	1
Tetrachloroethene	2.1E-02	8.8E-02	1.3E-07	1.1E-06	1.1E-08	9.0E-08	1
Toluene	5.6E-02	3.4E-01	3.6E-07	4.4E-06	2.9E-08	3.5E-07	1
Trichloroethene	3.7E-02	2.0E-01	2.4E-07	2.6E-06	1.9E-08	2.1E-07	1
Xylenes (total)	2.5E-02	5.1E-02	1.6E-07	6.6E-07	1.3E-08	5.2E-08	1
SVOCs							
2-Methylnaphthalene	NC	NC	NA	NA	NA	NA	1
Acenaphthene	4.4E-02	1.0E-01	2.8E-07	1.3E-06	2.3E-08	1.0E-07	1
Acenaphthylene	3.1E-02	8.5E-02	2.0E-07	1.1E-06	1.6E-08	8.7E-08	1
Anthracene	3.9E-02	8.2E-02	2.5E-07	1.0E-06	2.0E-08	8.4E-08	1
Benzo(a)anthracene	3.6E-02	1.5E-01	2.3E-07	1.9E-06	1.8E-08	1.5E-07	1

Spreadsheet C3-71a (2 of 3)

Estimates of Human Intake
Soil Ingestion Pathway for Child Resident - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times CF \times FT \times EF \times ED \times B}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Soil ingestion rate	IR	mg/day	100	200
Conversion factor	CF	kg/mg	1.E-06	1.E-06
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	6	6
Bioavailability	B	fraction	CS	CS
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
Benzo(a)pyrene	3.6E-02	1.5E-01	2.3E-07	1.9E-06	1.8E-08	1.5E-07	1
Benzo(e)pyrene	1.9E-02	6.3E-02	1.2E-07	8.0E-07	9.5E-09	6.4E-08	1
Benzo(b)fluoranthene	4.9E-02	2.7E-01	3.1E-07	3.4E-06	2.5E-08	2.7E-07	1
Benzo(g,h,i)perylene	4.1E-02	9.0E-02	2.6E-07	1.2E-06	2.1E-08	9.2E-08	1
Benzo(k)fluoranthene	3.0E-02	8.5E-02	1.9E-07	1.1E-06	1.5E-08	8.7E-08	1
Chrysene	4.4E-02	2.2E-01	2.8E-07	2.8E-06	2.3E-08	2.2E-07	1
Dibenz(a,h)anthracene	2.9E-02	8.5E-02	1.9E-07	1.1E-06	1.5E-08	8.7E-08	1
Dibenzofuran	NC	NC	NA	NA	NA	NA	1
Fluoranthene	6.0E-02	3.8E-01	3.8E-07	4.8E-06	3.1E-08	3.8E-07	1
Fluorene	4.4E-02	1.0E-01	2.8E-07	1.3E-06	2.2E-08	1.0E-07	1
Indeno(1,2,3-cd)pyrene	3.4E-02	1.4E-01	2.2E-07	1.7E-06	1.8E-08	1.4E-07	1
Naphthalene	NC	NC	NA	NA	NA	NA	1
Perylene	1.1E-02	3.6E-02	6.8E-08	4.6E-07	5.4E-09	3.6E-08	1
Phenanthrene	7.9E-02	2.0E-01	5.1E-07	2.6E-06	4.1E-08	2.1E-07	1
Pyrene	5.3E-02	1.6E-01	3.4E-07	2.0E-06	2.7E-08	1.6E-07	1
Total Petroleum Hydrocarbons							
C11-C14(Kerosene Range)	9.7E+00	4.0E+01	6.2E-05	5.1E-04	4.9E-06	4.1E-05	1
C14-C20(Diesel Range)	7.5E+00	7.5E+00	4.8E-05	9.5E-05	3.8E-06	7.6E-06	1
C20-C30(Lubricant Oil Range)	7.3E+01	4.7E+02	4.7E-04	6.0E-03	3.7E-05	4.8E-04	1
PCDD/PCDFs							
2,3,7,8-TCDD	2.7E-07	5.3E-07	1.7E-12	6.8E-12	1.4E-13	5.5E-13	1
1,2,3,7,8-PeCDD	1.1E-06	2.2E-06	7.0E-12	2.8E-11	5.6E-13	2.2E-12	1
1,2,3,4,7,8-HxCDD	4.1E-06	9.0E-06	2.6E-11	1.2E-10	2.1E-12	9.2E-12	1
1,2,3,6,7,8-HxCDD	1.6E-05	3.0E-05	1.0E-10	3.8E-10	8.1E-12	3.0E-11	1
1,2,3,7,8,9-HxCDD	5.9E-06	1.0E-05	3.8E-11	1.3E-10	3.0E-12	1.0E-11	1
1,2,3,4,6,7,8-HpCDD	5.7E-04	1.2E-03	3.6E-09	1.5E-08	2.9E-10	1.2E-09	1
OCDD	8.4E-03	1.7E-02	5.3E-08	2.2E-07	4.3E-09	1.7E-08	1
2,3,7,8-TCDF	5.5E-07	7.9E-07	3.5E-12	1.0E-11	2.8E-13	8.1E-13	1
1,2,3,7,8-PeCDF	2.8E-07	5.7E-07	1.8E-12	7.3E-12	1.4E-13	5.9E-13	1
2,3,4,7,8-PeCDF	8.2E-07	1.6E-06	5.2E-12	2.0E-11	4.2E-13	1.6E-12	1
1,2,3,4,7,8-HxCDF	1.8E-06	3.3E-06	1.1E-11	4.3E-11	9.1E-13	3.4E-12	1
1,2,3,6,7,8-HxCDF	1.6E-06	3.2E-06	9.9E-12	4.0E-11	7.9E-13	3.2E-12	1
2,3,4,6,7,8-HxCDF	3.8E-06	8.8E-06	2.5E-11	1.1E-10	2.0E-12	9.0E-12	1
1,2,3,7,8,9-HxCDF	3.6E-07	9.7E-07	2.3E-12	1.2E-11	1.8E-13	9.9E-13	1
1,2,3,4,6,7,8-HpCDF	5.3E-05	9.6E-05	3.4E-10	1.2E-09	2.7E-11	9.8E-11	1
1,2,3,4,7,8,9-HpCDF	4.9E-06	9.2E-06	3.1E-11	1.2E-10	2.5E-12	9.5E-12	1
OCDF	1.4E-04	2.4E-04	8.6E-10	3.0E-09	6.9E-11	2.4E-10	1

Spreadsheet C3-71a (3 of 3)

Estimates of Human Intake
Soil Ingestion Pathway for Child Resident - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times CF \times FT \times EF \times ED \times B}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Soil ingestion rate	IR	mg/day	100	200
Conversion factor	CF	kg/mg	1.E-06	1.E-06
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	6	6
Bioavailability	B	fraction	CS	CS
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
PCBs							
Aroclor-1254	1.6E-01	4.3E-01	1.0E-06	5.5E-06	8.3E-08	4.4E-07	1
Aroclor-1260	1.3E+00	7.3E+00	8.5E-06	9.3E-05	6.8E-07	7.5E-06	1
PCB-105	1.1E-04	5.6E-04	7.3E-10	7.2E-09	5.8E-11	5.8E-10	1
PCB-114	2.2E-06	1.0E-05	1.4E-11	1.3E-10	1.1E-12	1.0E-11	1
PCB-118	2.3E-04	1.1E-03	1.5E-09	1.4E-08	1.2E-10	1.2E-09	1
PCB-123	3.2E-06	1.6E-05	2.0E-11	2.0E-10	1.6E-12	1.6E-11	1
PCB-126	8.8E-06	4.4E-05	5.6E-11	5.6E-10	4.5E-12	4.5E-11	1
PCB-156	7.5E-05	3.8E-04	4.8E-10	4.8E-09	3.8E-11	3.8E-10	1
PCB-157	3.3E-05	1.7E-04	2.1E-10	2.2E-09	1.7E-11	1.7E-10	1
PCB-167	5.7E-05	2.9E-04	3.7E-10	3.8E-09	2.9E-11	3.0E-10	1
PCB-169	8.6E-07	4.4E-06	5.5E-12	5.6E-11	4.4E-13	4.5E-12	1
PCB-189	8.6E-06	4.4E-05	5.5E-11	5.6E-10	4.4E-12	4.5E-11	1
PCB-77	1.8E-05	8.8E-05	1.1E-10	1.1E-09	9.0E-12	9.0E-11	1
PCB-81	3.1E-06	1.6E-05	2.0E-11	2.0E-10	1.6E-12	1.6E-11	1

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCDD/PCDF - Polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.
PCB - polychlorinated biphenyls
mg/kg-day - milligrams per kilogram perday
mg/kg - milligrams per kilogram

Estimates of Human Intake
Surface Water Dermal Contact Pathway for Adult Resident
Sodium Reactor Experiment (SRE) Area

Intake Equation:

$$\text{Dosage} = \frac{C \times Kp \times SA \times CF \times EF \times ED \times EV \times ET}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Surface water concentration	C	mg/L	CS	CS
Skin surface area per event	SA	cm^2/day	18150	18150
Bioavailability	B	fraction	CS	CS
Conversion factor	CF	L/cm^3	1.E-03	1.E-03
Event frequency	EV	events/day	0.5	0.5
Exposure frequency	EF	days/year	25	50
Exposure time	ET	hrs/day	1	2
Exposure duration	ED	years	9	24
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/L)	RME EPC (mg/L)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Kp (cm/hr)
Inorganic Compounds							
Aluminum	1.0E+00	1.7E+00	9.1E-06	1.2E-04	1.1E-06	1.9E-05	1.0E-03
Antimony	9.0E-04	1.5E-03	8.0E-09	1.1E-07	9.6E-10	1.8E-08	1.0E-03
Arsenic	6.8E-03	1.1E-02	6.0E-08	7.8E-07	7.2E-09	1.3E-07	1.0E-03
Cadmium	1.5E-04	2.8E-04	1.4E-09	2.0E-08	1.6E-10	3.2E-09	1.0E-03
Chromium	2.3E-03	3.4E-03	2.0E-08	2.4E-07	2.5E-09	3.9E-08	1.0E-03
Copper	4.4E-03	5.7E-03	3.9E-08	4.1E-07	4.7E-09	6.5E-08	1.0E-03
Lead	8.1E-04	1.0E-03	7.2E-10	7.4E-09	8.6E-11	1.2E-09	1.0E-04
Mercury	1.2E-04	1.4E-04	1.1E-09	9.7E-09	1.3E-10	1.5E-09	1.0E-03
Nickel	4.1E-03	4.1E-03	7.3E-09	5.8E-08	8.7E-10	9.3E-09	2.0E-04
Thallium	2.1E-04	2.1E-04	1.9E-09	1.5E-08	2.2E-10	2.4E-09	1.0E-03
Vanadium	4.0E-03	5.7E-03	3.6E-08	4.0E-07	4.3E-09	6.5E-08	1.0E-03
VOCs							
1,1,1-Trichloroethane	7.6E-04	7.6E-04	0.0E+00	0.0E+00	0.0E+00	0.0E+00	0.0E+00
Trichloroethene	6.6E-04	6.6E-04	7.0E-08	5.6E-07	8.4E-09	9.0E-08	1.2E-02
PCDD/PCDFs							
1,2,3,7,8-PeCDD	1.7E-09	1.7E-09	1.2E-11	9.7E-11	1.5E-12	1.5E-11	8.1E-01
1,2,3,4,7,8-HxCDD	2.5E-09	2.5E-09	1.8E-11	1.4E-10	2.1E-12	2.3E-11	8.1E-01
1,2,3,6,7,8-HxCDD	2.7E-08	6.6E-08	1.9E-10	3.8E-09	2.3E-11	6.1E-10	8.1E-01
1,2,3,7,8,9-HxCDD	1.4E-08	1.4E-08	1.0E-10	8.1E-10	1.2E-11	1.3E-10	8.1E-01
1,2,3,4,6,7,8-HpCDD	2.2E-07	1.9E-06	1.6E-09	1.1E-07	1.9E-10	1.8E-08	8.1E-01
OCDD	1.8E-06	2.7E-06	1.3E-08	1.5E-07	1.5E-09	2.4E-08	8.1E-01
2,3,7,8-TCDF	4.0E-09	4.5E-09	2.9E-11	2.6E-10	3.4E-12	4.1E-11	8.1E-01
1,2,3,7,8-PeCDF	7.2E-09	7.2E-09	5.2E-11	4.2E-10	6.2E-12	6.7E-11	8.1E-01
2,3,4,7,8-PeCDF	1.8E-08	2.0E-08	1.3E-10	1.2E-09	1.6E-11	1.8E-10	8.1E-01
1,2,3,4,7,8-HxCDF	1.9E-08	2.1E-08	1.3E-10	1.2E-09	1.6E-11	2.0E-10	8.1E-01
1,2,3,6,7,8-HxCDF	1.1E-08	1.1E-08	7.9E-11	6.3E-10	9.5E-12	1.0E-10	8.1E-01
2,3,4,6,7,8-HxCDF	1.9E-08	2.1E-08	1.4E-10	1.2E-09	1.6E-11	2.0E-10	8.1E-01
1,2,3,7,8,9-HxCDF	1.8E-08	2.3E-08	1.3E-10	1.3E-09	1.6E-11	2.1E-10	8.1E-01
1,2,3,4,6,7,8-HpCDF	2.7E-08	5.1E-08	2.0E-10	2.9E-09	2.4E-11	4.7E-10	8.1E-01
1,2,3,4,7,8,9-HpCDF	1.4E-08	1.4E-08	1.0E-10	8.1E-10	1.2E-11	1.3E-10	8.1E-01
OCDF	7.2E-08	1.3E-07	5.2E-10	7.7E-09	6.2E-11	1.2E-09	8.1E-01

Estimates of Human Intake
Surface Water Dermal Contact Pathway for Adult Resident
Sodium Reactor Experiment (SRE) Area

Intake Equation:

$$\text{Dosage} = \frac{C \times Kp \times SA \times CF \times EF \times ED \times EV \times ET}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Surface water concentration	C	mg/L	CS	CS
Skin surface area per event	SA	cm^2/day	18150	18150
Bioavailability	B	fraction	CS	CS
Conversion factor	CF	L/cm^3	1.E-03	1.E-03
Event frequency	EV	events/day	0.5	0.5
Exposure frequency	EF	days/year	25	50
Exposure time	ET	hrs/day	1	2
Exposure duration	ED	years	9	24
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/L)	RME EPC (mg/L)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Kp (cm/hr)

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2004)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2004)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2004),
except dermal absorption factors which were taken from USEPA (2001).
VOC - volatile organic compound
PCDD/PCDF - Polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.
mg/kg-day - milligrams per kilogram per day
mg/kg - milligrams per kilogram

Estimates of Human Intake
Surface Water Ingestion Pathway for Adult Resident
Sodium Reactor Experiment (SRE) Area

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times ET \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Surface water concentration	C	mg/L	CS	CS
Surface water ingestion rate	IR	L/hour	0.05	0.05
Exposure time	ET	hrs/day	1	2
Exposure frequency	EF	days/year	25	50
Exposure duration	ED	years	9	24
Bioavailability	B	fraction	CS	CS
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/L)	RME EPC (mg/L)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
Inorganic Compounds							
Aluminum	1.0E+00	1.7E+00	5.0E-05	3.3E-04	6.0E-06	1.1E-04	1
Antimony	9.0E-04	1.5E-03	4.4E-08	3.0E-07	5.3E-09	9.6E-08	1
Arsenic	6.8E-03	1.1E-02	3.3E-07	2.2E-06	4.0E-08	6.9E-07	1
Cadmium	1.5E-04	2.8E-04	7.4E-09	5.5E-08	8.9E-10	1.8E-08	1
Chromium	2.3E-03	3.4E-03	1.1E-07	6.7E-07	1.4E-08	2.1E-07	1
Copper	4.4E-03	5.7E-03	2.1E-07	1.1E-06	2.6E-08	3.6E-07	1
Lead	8.1E-04	1.0E-03	3.9E-08	2.0E-07	4.7E-09	6.5E-08	1
Mercury	1.2E-04	1.4E-04	5.8E-09	2.7E-08	6.9E-10	8.5E-09	1
Nickel	4.1E-03	4.1E-03	2.0E-07	8.0E-07	2.4E-08	2.6E-07	1
Thallium	2.1E-04	2.1E-04	1.0E-08	4.1E-08	1.2E-09	1.3E-08	1
Vanadium	4.0E-03	5.7E-03	2.0E-07	1.1E-06	2.3E-08	3.6E-07	1
VOCs							
1,1,1-Trichloroethane	7.6E-04	7.6E-04	3.7E-08	1.5E-07	4.5E-09	4.8E-08	1
Trichloroethene	6.6E-04	6.6E-04	3.2E-08	1.3E-07	3.9E-09	4.1E-08	1
PCDD/PCDFs							
1,2,3,7,8-PeCDD	1.7E-09	1.7E-09	8.2E-14	3.3E-13	9.9E-15	1.1E-13	1
1,2,3,4,7,8-HxCDD	2.5E-09	2.5E-09	1.2E-13	4.9E-13	1.5E-14	1.6E-13	1
1,2,3,6,7,8-HxCDD	2.7E-08	6.6E-08	1.3E-12	1.3E-11	1.6E-13	4.1E-12	1
1,2,3,7,8,9-HxCDD	1.4E-08	1.4E-08	6.8E-13	2.7E-12	8.2E-14	8.8E-13	1
1,2,3,4,6,7,8-HpCDD	2.2E-07	1.9E-06	1.1E-11	3.7E-10	1.3E-12	1.2E-10	1
OCDD	1.8E-06	2.7E-06	8.7E-11	5.2E-10	1.0E-11	1.7E-10	1
2,3,7,8-TCDF	4.0E-09	4.5E-09	1.9E-13	8.8E-13	2.3E-14	2.8E-13	1
1,2,3,7,8-PeCDF	7.2E-09	7.2E-09	3.5E-13	1.4E-12	4.3E-14	4.5E-13	1
2,3,4,7,8-PeCDF	1.8E-08	2.0E-08	8.8E-13	3.9E-12	1.1E-13	1.3E-12	1
1,2,3,4,7,8-HxCDF	1.9E-08	2.1E-08	9.1E-13	4.2E-12	1.1E-13	1.3E-12	1
1,2,3,6,7,8-HxCDF	1.1E-08	1.1E-08	5.4E-13	2.2E-12	6.5E-14	6.9E-13	1
2,3,4,6,7,8-HxCDF	1.9E-08	2.1E-08	9.3E-13	4.2E-12	1.1E-13	1.3E-12	1
1,2,3,7,8,9-HxCDF	1.8E-08	2.3E-08	8.9E-13	4.5E-12	1.1E-13	1.4E-12	1
1,2,3,4,6,7,8-HpCDF	2.7E-08	5.1E-08	1.3E-12	1.0E-11	1.6E-13	3.2E-12	1
1,2,3,4,7,8,9-HpCDF	1.4E-08	1.4E-08	6.8E-13	2.7E-12	8.2E-14	8.8E-13	1
OCDF	7.2E-08	1.3E-07	3.5E-12	2.6E-11	4.2E-13	8.4E-12	1

Estimates of Human Intake
Surface Water Ingestion Pathway for Adult Resident
Sodium Reactor Experiment (SRE) Area

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times ET \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Surface water concentration	C	mg/L	CS	CS
Surface water ingestion rate	IR	L/hour	0.05	0.05
Exposure time	ET	hrs/day	1	2
Exposure frequency	EF	days/year	25	50
Exposure duration	ED	years	9	24
Bioavailability	B	fraction	CS	CS
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/L)	RME EPC (mg/L)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2004).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2004).
Typical - typical or average exposure as defined in the SRAM (MWH 2004)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2004)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2004).
VOC - volatile organic compound
PCDD/PCDF - Polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.
mg/kg-day - milligrams per kilogram per day
mg/kg - milligrams per kilogram

Estimates of Human Intake
Edible Plant Ingestion Pathway for Adult Resident - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times CF \times F \times EF \times ED \times B}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Plant concentration	C	mg/kg	CS	CS
Plant ingestion rate	IR	g/day	147	702
Conversion factor	CF	kg/g	1.E-03	1.E-03
Fraction locally grown	F	unitless	0.24	1.0
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	9	24
Bioavailability	B	fraction	CS	CS
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
Inorganic Compounds							
Aluminum	NC	NC	NA	NA	NA	NA	1
Antimony	NC	NC	NA	NA	NA	NA	1
Arsenic	NC	NC	NA	NA	NA	NA	1
Cadmium	2.6E-02	5.8E-02	1.3E-05	2.8E-05	1.5E-06	1.8E-04	1
Chromium	NC	NC	NA	NA	NA	NA	1
Copper	1.7E+01	3.7E+01	8.1E-03	1.8E-02	9.8E-04	1.1E-01	1
Fluoride	NC	NC	NA	NA	NA	NA	1
Lead	6.1E-02	1.3E-01	3.0E-05	6.3E-05	3.6E-06	4.0E-04	1
Mercury	1.5E-01	3.5E-01	7.3E-05	1.7E-04	8.7E-06	1.1E-03	1
Methyl Mercury	2.4E-04	5.0E-04	1.2E-07	2.4E-07	1.4E-08	1.5E-06	1
Nickel	NC	NC	NA	NA	NA	NA	1
Nitrate	NC	NC	NA	NA	NA	NA	1
Silver	2.1E-04	7.8E-04	1.0E-07	3.8E-07	1.2E-08	2.4E-06	1
Thallium	6.4E-02	6.4E-02	3.1E-05	3.1E-05	3.7E-06	2.0E-04	1
Vanadium	NC	NC	NA	NA	NA	NA	1
Zinc	3.3E+01	8.5E+01	1.6E-02	4.1E-02	1.9E-03	2.6E-01	1
							1
VOCs							1
1,1,1-Trichloroethane	NC	NC	NA	NA	NA	NA	1
1,1,2-Trichloro-1,2,2-trifluoroethane	2.4E-02	2.4E-02	1.2E-05	1.2E-05	1.4E-06	7.5E-05	1
1,1-Dichloroethane	NC	NC	NA	NA	NA	NA	1
1,2-Dichloroethane	NC	NC	NA	NA	NA	NA	1
1,2-Dichloroethene (total)	4.0E-01	9.8E-01	1.9E-04	4.7E-04	2.3E-05	3.0E-03	1
1-Chlorohexane	NC	NC	NA	NA	NA	NA	1
2-Butanone	3.5E+00	3.5E+00	1.7E-03	1.7E-03	2.0E-04	1.1E-02	1
2-Hexanone	NC	NC	NA	NA	NA	NA	1
Acetone	1.3E+02	7.8E+02	6.1E-02	3.8E-01	7.3E-03	2.4E+00	1
Benzene	NC	NC	NA	NA	NA	NA	1
Carbon disulfide	NC	NC	NA	NA	NA	NA	1
Chloromethane	NC	NC	NA	NA	NA	NA	1
cis-1,2-Dichloroethene	NC	NC	NA	NA	NA	NA	1
Ethylbenzene	NC	NC	NA	NA	NA	NA	1
m,p-Xylene	NC	NC	NA	NA	NA	NA	1
Methylene chloride	5.4E-01	5.4E-01	2.6E-04	2.6E-04	3.1E-05	1.7E-03	1
Tetrachloroethene	3.1E-02	1.3E-01	1.5E-05	6.3E-05	1.8E-06	4.0E-04	1
Toluene	2.0E-01	1.2E+00	9.8E-05	6.0E-04	1.2E-05	3.8E-03	1
Trichloroethene	1.8E-01	9.8E-01	8.7E-05	4.7E-04	1.0E-05	3.0E-03	1
Xylenes (total)	5.4E-02	1.1E-01	2.6E-05	5.3E-05	3.2E-06	3.4E-04	1

Spreadsheet C3-68b (2 of 3)

Estimates of Human Intake
Edible Plant Ingestion Pathway for Adult Resident - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times CF \times F \times EF \times ED \times B}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Plant concentration	C	mg/kg	CS	CS
Plant ingestion rate	IR	g/day	147	702
Conversion factor	CF	kg/g	1.E-03	1.E-03
Fraction locally grown	F	unitless	0.24	1.0
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	9	24
Bioavailability	B	fraction	CS	CS
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
SVOCs							
2-Methylnaphthalene	NC	NC	NA	NA	NA	NA	1
Acenaphthene	2.8E-02	1.0E-01	1.3E-05	4.9E-05	1.6E-06	3.1E-04	1
Acenaphthylene	1.9E-02	2.9E-02	9.2E-06	1.4E-05	1.1E-06	8.9E-05	1
Anthracene	1.8E-02	4.5E-02	8.6E-06	2.2E-05	1.0E-06	1.4E-04	1
Benzo(a)anthracene	2.4E-03	4.7E-03	1.2E-06	2.3E-06	1.4E-07	1.4E-05	1
Benzo(a)pyrene	1.0E-03	4.3E-03	5.0E-07	2.1E-06	6.0E-08	1.3E-05	1
Benzo(e)pyrene	3.5E-05	2.0E-04	1.7E-08	9.8E-08	2.1E-09	6.3E-07	1
Benzo(b)fluoranthene	1.5E-03	6.7E-03	7.3E-07	3.2E-06	8.7E-08	2.1E-05	1
Benzo(g,h,i)perylene	1.0E-03	3.7E-03	4.9E-07	1.8E-06	5.8E-08	1.1E-05	1
Benzo(k)fluoranthene	2.5E-04	2.5E-04	1.2E-07	1.2E-07	1.5E-08	7.8E-07	1
Chrysene	2.8E-03	1.4E-02	1.3E-06	6.7E-06	1.6E-07	4.3E-05	1
Dibenz(a,h)anthracene	4.4E-04	1.1E-04	2.1E-07	5.2E-08	2.5E-08	3.3E-07	1
Dibenzofuran	NC	NC	NA	NA	NA	NA	1
Fluoranthene	9.0E-03	5.7E-02	4.4E-06	2.8E-05	5.2E-07	1.8E-04	1
Fluorene	6.8E-03	2.7E-02	3.3E-06	1.3E-05	4.0E-07	8.3E-05	1
Indeno(1,2,3-cd)pyrene	3.0E-04	1.2E-03	1.4E-07	5.7E-07	1.7E-08	3.6E-06	1
Naphthalene	NC	NC	NA	NA	NA	NA	1
Perylene	5.7E-05	3.3E-04	2.7E-08	1.6E-07	3.3E-09	1.0E-06	1
Phenanthrene	2.2E-02	5.7E-02	1.0E-05	2.8E-05	1.3E-06	1.8E-04	1
Pyrene	9.4E-03	4.9E-02	4.5E-06	2.4E-05	5.4E-07	1.5E-04	1
Total Petroleum Hydrocarbons							
C11-C14(Kerosene Range)	3.3E+00	1.4E+01	1.6E-03	6.5E-03	1.9E-04	4.2E-02	1
C14-C20(Diesel Range)	1.3E+00	1.3E+00	6.3E-04	6.3E-04	7.5E-05	4.0E-03	1
C20-C30(Lubricant Oil Range)	3.4E+00	2.2E+01	1.6E-03	1.0E-02	1.9E-04	6.6E-02	1
PCDD/PCDFs							
2,3,7,8-TCDD	NC	NC	NA	NA	NA	NA	1
1,2,3,7,8-PeCDD	NC	NC	NA	NA	NA	NA	1
1,2,3,4,7,8-HxCDD	NC	NC	NA	NA	NA	NA	1
1,2,3,6,7,8-HxCDD	NC	NC	NA	NA	NA	NA	1
1,2,3,7,8,9-HxCDD	NC	NC	NA	NA	NA	NA	1
1,2,3,4,6,7,8-HpCDD	NC	NC	NA	NA	NA	NA	1
OCDD	NC	NC	NA	NA	NA	NA	1
2,3,7,8-TCDF	NC	NC	NA	NA	NA	NA	1
1,2,3,7,8-PeCDF	NC	NC	NA	NA	NA	NA	1
2,3,4,7,8-PeCDF	NC	NC	NA	NA	NA	NA	1
1,2,3,4,7,8-HxCDF	NC	NC	NA	NA	NA	NA	1

Spreadsheet C3-68b (3 of 3)

Estimates of Human Intake
Edible Plant Ingestion Pathway for Adult Resident - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times CF \times F \times EF \times ED \times B}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Plant concentration	C	mg/kg	CS	CS
Plant ingestion rate	IR	g/day	147	702
Conversion factor	CF	kg/g	1.E-03	1.E-03
Fraction locally grown	F	unitless	0.24	1.0
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	9	24
Bioavailability	B	fraction	CS	CS
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
1,2,3,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA	1
2,3,4,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA	1
1,2,3,7,8,9-HxCDF	NC	NC	NA	NA	NA	NA	1
1,2,3,4,6,7,8-HpCDF	NC	NC	NA	NA	NA	NA	1
1,2,3,4,7,8,9-HpCDF	NC	NC	NA	NA	NA	NA	1
OCDF	NC	NC	NA	NA	NA	NA	1
PCBs							
Aroclor-1254	5.0E-03	1.3E-02	2.4E-06	6.4E-06	2.9E-07	4.1E-05	1
Aroclor-1260	2.1E-02	1.2E-01	1.0E-05	5.6E-05	1.2E-06	3.5E-04	1
PCB-105	3.5E-06	1.7E-05	1.7E-09	8.4E-09	2.0E-10	5.3E-08	1
PCB-114	6.7E-08	3.1E-07	3.2E-11	1.5E-10	3.9E-12	9.5E-10	1
PCB-118	7.1E-06	3.5E-05	3.4E-09	1.7E-08	4.1E-10	1.1E-07	1
PCB-123	9.8E-08	4.9E-07	4.8E-11	2.4E-10	5.7E-12	1.5E-09	1
PCB-126	2.7E-07	1.3E-06	1.3E-10	6.5E-10	1.6E-11	4.2E-09	1
PCB-156	2.3E-06	1.2E-05	1.1E-09	5.6E-09	1.3E-10	3.6E-08	1
PCB-157	1.0E-06	5.2E-06	4.9E-10	2.5E-09	5.9E-11	1.6E-08	1
PCB-167	1.8E-06	9.1E-06	8.5E-10	4.4E-09	1.0E-10	2.8E-08	1
PCB-169	2.6E-08	1.3E-07	1.3E-11	6.5E-11	1.5E-12	4.2E-10	1
PCB-189	2.6E-07	1.3E-06	1.3E-10	6.5E-10	1.5E-11	4.2E-09	1
PCB-77	3.1E-07	1.5E-06	1.5E-10	7.4E-10	1.8E-11	4.7E-09	1
PCB-81	5.5E-08	2.7E-07	2.6E-11	1.3E-10	3.2E-12	8.4E-10	1

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCDD/PCDF - Polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.
PCB - polychlorinated biphenyls
mg/kg-day - milligrams per kilogram per day
mg/kg - milligrams per kilogram

Estimates of Human Intake
Edible Plant Ingestion Pathway for Adult Resident - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times CF \times F \times EF \times ED \times B}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Plant concentration	C	mg/kg	CS	CS
Plant ingestion rate	IR	g/day	147	702
Conversion factor	CF	kg/g	1.E-03	1.E-03
Fraction locally grown	F	unitless	0.24	1.0
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	9	24
Bioavailability	B	fraction	CS	CS
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
Inorganic Compounds							
Cadmium	2.6E-02	5.8E-02	1.3E-05	2.8E-05	1.5E-06	1.8E-04	1
Copper	1.7E+01	3.7E+01	8.1E-03	1.8E-02	9.8E-04	1.1E-01	1
Fluoride	NC	NC	NA	NA	NA	NA	1
Lead	6.1E-02	1.3E-01	3.0E-05	6.3E-05	3.6E-06	4.0E-04	1
Mercury	1.5E-01	3.5E-01	7.3E-05	1.7E-04	8.7E-06	1.1E-03	1
Methyl Mercury	2.4E-04	5.0E-04	1.2E-07	2.4E-07	1.4E-08	1.5E-06	1
Nitrate	NC	NC	NA	NA	NA	NA	1
Silver	2.1E-04	7.8E-04	1.0E-07	3.8E-07	1.2E-08	2.4E-06	1
Thallium	6.4E-02	6.4E-02	3.1E-05	3.1E-05	3.7E-06	2.0E-04	1
Zinc	3.3E+01	8.5E+01	1.6E-02	4.1E-02	1.9E-03	2.6E-01	1
VOCs							
1,1,1-Trichloroethane	NC	NC	NA	NA	NA	NA	1
1,1,2-Trichloro-1,2,2-trifluoroethane	2.4E-02	2.4E-02	1.2E-05	1.2E-05	1.4E-06	7.5E-05	1
1,1-Dichloroethane	NC	NC	NA	NA	NA	NA	1
1,2-Dichloroethane	NC	NC	NA	NA	NA	NA	1
1,2-Dichloroethene (total)	4.0E-01	9.8E-01	1.9E-04	4.7E-04	2.3E-05	3.0E-03	1
1-Chlorohexane	NC	NC	NA	NA	NA	NA	1
2-Butanone	3.5E+00	3.5E+00	1.7E-03	1.7E-03	2.0E-04	1.1E-02	1
2-Hexanone	NC	NC	NA	NA	NA	NA	1
Acetone	1.3E+02	7.8E+02	6.1E-02	3.8E-01	7.3E-03	2.4E+00	1
Benzene	NC	NC	NA	NA	NA	NA	1
Carbon disulfide	NC	NC	NA	NA	NA	NA	1
Chloromethane	NC	NC	NA	NA	NA	NA	1
cis-1,2-Dichloroethene	NC	NC	NA	NA	NA	NA	1
Ethylbenzene	NC	NC	NA	NA	NA	NA	1
m,p-Xylene	NC	NC	NA	NA	NA	NA	1
Methylene chloride	5.4E-01	5.4E-01	2.6E-04	2.6E-04	3.1E-05	1.7E-03	1
Tetrachloroethene	3.1E-02	1.3E-01	1.5E-05	6.3E-05	1.8E-06	4.0E-04	1
Toluene	2.0E-01	1.2E+00	9.8E-05	6.0E-04	1.2E-05	3.8E-03	1
Trichloroethene	1.8E-01	9.8E-01	8.7E-05	4.7E-04	1.0E-05	3.0E-03	1
Xylenes (total)	5.4E-02	1.1E-01	2.6E-05	5.3E-05	3.2E-06	3.4E-04	1
SVOCs							
2-Methylnaphthalene	NC	NC	NA	NA	NA	NA	1
Acenaphthene	3.0E-02	6.8E-02	1.5E-05	3.3E-05	1.7E-06	2.1E-04	1
Acenaphthylene	1.9E-02	5.1E-02	9.0E-06	2.5E-05	1.1E-06	1.6E-04	1
Anthracene	1.4E-02	3.0E-02	6.8E-06	1.4E-05	8.2E-07	9.2E-05	1

Spreadsheet C3-68a (2 of 3)

Estimates of Human Intake
Edible Plant Ingestion Pathway for Adult Resident - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times CF \times F \times EF \times ED \times B}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Plant concentration	C	mg/kg	CS	CS
Plant ingestion rate	IR	g/day	147	702
Conversion factor	CF	kg/g	1.E-03	1.E-03
Fraction locally grown	F	unitless	0.24	1.0
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	9	24
Bioavailability	B	fraction	CS	CS
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
Benzo(a)anthracene	2.5E-03	1.0E-02	1.2E-06	4.9E-06	1.4E-07	3.1E-05	1
Benzo(a)pyrene	1.0E-03	4.3E-03	5.1E-07	2.1E-06	6.1E-08	1.3E-05	1
Benzo(e)pyrene	4.8E-04	1.6E-03	2.3E-07	7.7E-07	2.8E-08	4.9E-06	1
Benzo(b)fluoranthene	1.5E-03	8.4E-03	7.4E-07	4.0E-06	8.9E-08	2.6E-05	1
Benzo(g,h,i)perylene	9.7E-04	2.1E-03	4.7E-07	1.0E-06	5.6E-08	6.5E-06	1
Benzo(k)fluoranthene	1.3E-03	3.6E-03	6.1E-07	1.7E-06	7.3E-08	1.1E-05	1
Chrysene	2.8E-03	1.4E-02	1.4E-06	6.7E-06	1.6E-07	4.3E-05	1
Dibenz(a,h)anthracene	4.4E-04	1.3E-03	2.1E-07	6.1E-07	2.5E-08	3.9E-06	1
Dibenzofuran	NC	NC	NA	NA	NA	NA	1
Fluoranthene	9.1E-03	5.7E-02	4.4E-06	2.8E-05	5.3E-07	1.8E-04	1
Fluorene	6.7E-03	1.5E-02	3.2E-06	7.3E-06	3.9E-07	4.7E-05	1
Indeno(1,2,3-cd)pyrene	3.0E-04	1.2E-03	1.4E-07	5.7E-07	1.7E-08	3.6E-06	1
Naphthalene	NC	NC	NA	NA	NA	NA	1
Perylene	6.2E-04	2.1E-03	3.0E-07	1.0E-06	3.6E-08	6.4E-06	1
Phenanthrene	2.5E-02	6.2E-02	1.2E-05	3.0E-05	1.4E-06	1.9E-04	1
Pyrene	9.1E-03	2.7E-02	4.4E-06	1.3E-05	5.3E-07	8.2E-05	1
Total Petroleum Hydrocarbons							
C11-C14(Kerosene Range)	3.3E+00	1.4E+01	1.6E-03	6.5E-03	1.9E-04	4.2E-02	1
C14-C20(Diesel Range)	1.3E+00	1.3E+00	6.3E-04	6.3E-04	7.5E-05	4.0E-03	1
C20-C30(Lubricant Oil Range)	3.4E+00	2.2E+01	1.6E-03	1.0E-02	1.9E-04	6.6E-02	1
PCDD/PCDFs							
2,3,7,8-TCDD	NC	NC	NA	NA	NA	NA	1
1,2,3,7,8-PeCDD	NC	NC	NA	NA	NA	NA	1
1,2,3,4,7,8-HxCDD	NC	NC	NA	NA	NA	NA	1
1,2,3,6,7,8-HxCDD	NC	NC	NA	NA	NA	NA	1
1,2,3,7,8,9-HxCDD	NC	NC	NA	NA	NA	NA	1
1,2,3,4,6,7,8-HpCDD	NC	NC	NA	NA	NA	NA	1
OCDD	NC	NC	NA	NA	NA	NA	1
2,3,7,8-TCDF	NC	NC	NA	NA	NA	NA	1
1,2,3,7,8-PeCDF	NC	NC	NA	NA	NA	NA	1
2,3,4,7,8-PeCDF	NC	NC	NA	NA	NA	NA	1
1,2,3,4,7,8-HxCDF	NC	NC	NA	NA	NA	NA	1
1,2,3,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA	1
2,3,4,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA	1
1,2,3,7,8,9-HxCDF	NC	NC	NA	NA	NA	NA	1
1,2,3,4,6,7,8-HpCDF	NC	NC	NA	NA	NA	NA	1
1,2,3,4,7,8,9-HpCDF	NC	NC	NA	NA	NA	NA	1
OCDF	NC	NC	NA	NA	NA	NA	1

Spreadsheet C3-68a (3 of 3)

Estimates of Human Intake
Edible Plant Ingestion Pathway for Adult Resident - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times CF \times F \times EF \times ED \times B}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Plant concentration	C	mg/kg	CS	CS
Plant ingestion rate	IR	g/day	147	702
Conversion factor	CF	kg/g	1.E-03	1.E-03
Fraction locally grown	F	unitless	0.24	1.0
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	9	24
Bioavailability	B	fraction	CS	CS
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
PCBs							
Aroclor-1254	5.0E-03	1.3E-02	2.4E-06	6.4E-06	2.9E-07	4.1E-05	1
Aroclor-1260	2.1E-02	1.2E-01	1.0E-05	5.6E-05	1.2E-06	3.5E-04	1
PCB-105	3.5E-06	1.7E-05	1.7E-09	8.4E-09	2.0E-10	5.3E-08	1
PCB-114	6.7E-08	3.1E-07	3.2E-11	1.5E-10	3.9E-12	9.5E-10	1
PCB-118	7.1E-06	3.5E-05	3.4E-09	1.7E-08	4.1E-10	1.1E-07	1
PCB-123	9.8E-08	4.9E-07	4.8E-11	2.4E-10	5.7E-12	1.5E-09	1
PCB-126	2.7E-07	1.3E-06	1.3E-10	6.5E-10	1.6E-11	4.2E-09	1
PCB-156	2.3E-06	1.2E-05	1.1E-09	5.6E-09	1.3E-10	3.6E-08	1
PCB-157	1.0E-06	5.2E-06	4.9E-10	2.5E-09	5.9E-11	1.6E-08	1
PCB-167	1.8E-06	9.1E-06	8.5E-10	4.4E-09	1.0E-10	2.8E-08	1
PCB-169	2.6E-08	1.3E-07	1.3E-11	6.5E-11	1.5E-12	4.2E-10	1
PCB-189	2.6E-07	1.3E-06	1.3E-10	6.5E-10	1.5E-11	4.2E-09	1
PCB-77	3.1E-07	1.5E-06	1.5E-10	7.4E-10	1.8E-11	4.7E-09	1
PCB-81	5.5E-08	2.7E-07	2.6E-11	1.3E-10	3.2E-12	8.4E-10	1

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCDD/PCDF - Polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.
PCB - polychlorinated biphenyls
mg/kg-day - milligrams per kilogram per day
mg/kg - milligrams per kilogram

Estimates of Human Intake
Domestic Groundwater Use for Adult Resident
Sodium Reactor Experiment (SRE) Area

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED \times B}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Groundwater concentration	C	mg/L	CS	CS
Groundwater ingestion rate$_{vocs}$	IR	L/day	2.0	3.1
Groundwater ingestion rate$_{non\text{-}vocs}$	IR	L/day	1.0	1.5
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	9	24
Bioavailability	B	fraction	CS	CS
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/L)	RME EPC (mg/L)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
Inorganic Compounds							
Cadmium	NC	NC	NA	NA	NA	NA	1
Copper	1.8E-02	1.8E-02	2.5E-04	3.8E-04	3.0E-05	1.2E-04	1
Fluoride	5.6E-01	5.6E-01	7.7E-03	1.2E-02	9.2E-04	3.8E-03	1
Lead	NC	NC	NA	NA	NA	NA	1
Mercury	NC	NC	NA	NA	NA	NA	1
Methyl Mercury	NC	NC	NA	NA	NA	NA	1
Nitrate	1.4E+01	1.4E+01	1.9E-01	3.0E-01	2.3E-02	9.6E-02	1
Silver	NC	NC	NA	NA	NA	NA	1
Thallium	5.4E-04	5.4E-04	7.4E-06	1.1E-05	8.9E-07	3.6E-06	1
Zinc	NC	NC	NA	NA	NA	NA	1
VOCs							
1,1,1-Trichloroethane	NC	NC	NA	NA	NA	NA	1
1,1,2-Trichloro-1,2,2-trifluoroethane	NC	NC	NA	NA	NA	NA	1
1,1-Dichloroethane	2.6E-03	2.6E-03	7.1E-05	1.1E-04	8.5E-06	3.5E-05	1
1,2-Dichloroethane	9.0E-04	9.0E-04	2.5E-05	3.8E-05	3.0E-06	1.2E-05	1
1,2-Dichloroethene (total)	NC	NC	NA	NA	NA	NA	1
1-Chlorohexane	NC	NC	NA	NA	NA	NA	1
2-Butanone	NC	NC	NA	NA	NA	NA	1
2-Hexanone	NC	NC	NA	NA	NA	NA	1
Acetone	1.6E-02	1.6E-02	4.4E-04	6.8E-04	5.3E-05	2.2E-04	1
Benzene	5.8E-04	5.8E-04	1.6E-05	2.4E-05	1.9E-06	7.8E-06	1
Carbon disulfide	2.6E-03	2.6E-03	7.1E-05	1.1E-04	8.5E-06	3.5E-05	1
Chloromethane	3.2E-04	3.2E-04	8.8E-06	1.4E-05	1.1E-06	4.3E-06	1
cis-1,2-Dichloroethene	5.1E-02	5.1E-02	1.4E-03	2.2E-03	1.7E-04	6.9E-04	1
Ethylbenzene	NC	NC	NA	NA	NA	NA	1
m,p-Xylene	NC	NC	NA	NA	NA	NA	1
Methylene chloride	6.4E-04	6.4E-04	1.8E-05	2.7E-05	2.1E-06	8.6E-06	1
Tetrachloroethene	NC	NC	NA	NA	NA	NA	1
Toluene	1.8E-03	1.8E-03	4.9E-05	7.6E-05	5.9E-06	2.4E-05	1
Trichloroethene	1.0E-02	1.0E-02	2.7E-04	4.2E-04	3.3E-05	1.4E-04	1
Xylenes (total)	NC	NC	NA	NA	NA	NA	1
SVOCs							
2-Methylnaphthalene	NC	NC	NA	NA	NA	NA	1
Acenaphthene	NC	NC	NA	NA	NA	NA	1
Acenaphthylene	NC	NC	NA	NA	NA	NA	1
Anthracene	NC	NC	NA	NA	NA	NA	1
Benzo(a)anthracene	NC	NC	NA	NA	NA	NA	1
Benzo(a)pyrene	NC	NC	NA	NA	NA	NA	1
Benzo(b)fluoranthene	NC	NC	NA	NA	NA	NA	1
Benzo(g,h,i)perylene	NC	NC	NA	NA	NA	NA	1
Benzo(k)fluoranthene	NC	NC	NA	NA	NA	NA	1
Chrysene	NC	NC	NA	NA	NA	NA	1
Dibenz(a,h)anthracene	NC	NC	NA	NA	NA	NA	1
Dibenzofuran	NC	NC	NA	NA	NA	NA	1
Benzo(e)pyrene	NC	NC	NA	NA	NA	NA	1
Fluoranthene	NC	NC	NA	NA	NA	NA	1
Fluorene	NC	NC	NA	NA	NA	NA	1

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Estimates of Human Intake
Domestic Groundwater Use for Adult Resident
Sodium Reactor Experiment (SRE) Area

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED \times B}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Groundwater concentration	C	mg/L	CS	CS
Groundwater ingestion rate$_{vocs}$	IR	L/day	2.0	3.1
Groundwater ingestion rate$_{non\text{-}vocs}$	IR	L/day	1.0	1.5
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	9	24
Bioavailability	B	fraction	CS	CS
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/L)	RME EPC (mg/L)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
Indeno(1,2,3-cd)pyrene	NC	NC	NA	NA	NA	NA	1
Naphthalene	NC	NC	NA	NA	NA	NA	1
Perylene	NC	NC	NA	NA	NA	NA	1
Phenanthrene	NC	NC	NA	NA	NA	NA	1
Pyrene	NC	NC	NA	NA	NA	NA	1
Total Petroleum Hydrocarbons							
C11-C14(Kerosene Range)	NC	NC	NA	NA	NA	NA	1
C14-C20(Diesel Range)	5.0E-02	5.0E-02	6.8E-04	1.1E-03	8.2E-05	3.4E-04	1
C20-C30(Lubricant Oil Range)	NC	NC	NA	NA	NA	NA	1
PCDD/PCDFs							
2,3,7,8-TCDD	NC	NC	NA	NA	NA	NA	1
1,2,3,7,8-PeCDD	NC	NC	NA	NA	NA	NA	1
1,2,3,4,7,8-HxCDD	NC	NC	NA	NA	NA	NA	1
1,2,3,6,7,8-HxCDD	NC	NC	NA	NA	NA	NA	1
1,2,3,7,8,9-HxCDD	NC	NC	NA	NA	NA	NA	1
1,2,3,4,6,7,8-HpCDD	NC	NC	NA	NA	NA	NA	1
OCDD	NC	NC	NA	NA	NA	NA	1
2,3,7,8-TCDF	NC	NC	NA	NA	NA	NA	1
1,2,3,7,8-PeCDF	NC	NC	NA	NA	NA	NA	1
2,3,4,7,8-PeCDF	NC	NC	NA	NA	NA	NA	1
1,2,3,4,7,8-HxCDF	NC	NC	NA	NA	NA	NA	1
1,2,3,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA	1
2,3,4,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA	1
1,2,3,7,8,9-HxCDF	NC	NC	NA	NA	NA	NA	1
1,2,3,4,6,7,8-HpCDF	NC	NC	NA	NA	NA	NA	1
1,2,3,4,7,8,9-HpCDF	NC	NC	NA	NA	NA	NA	1
OCDF	NC	NC	NA	NA	NA	NA	1
PCBs							
Aroclor-1254	NC	NC	NA	NA	NA	NA	1
Aroclor-1260	NC	NC	NA	NA	NA	NA	1
PCB-105	NC	NC	NA	NA	NA	NA	1
PCB-114	NC	NC	NA	NA	NA	NA	1
PCB-118	NC	NC	NA	NA	NA	NA	1
PCB-123	NC	NC	NA	NA	NA	NA	1
PCB-126	NC	NC	NA	NA	NA	NA	1
PCB-156	NC	NC	NA	NA	NA	NA	1
PCB-157	NC	NC	NA	NA	NA	NA	1
PCB-167	NC	NC	NA	NA	NA	NA	1
PCB-169	NC	NC	NA	NA	NA	NA	1
PCB-189	NC	NC	NA	NA	NA	NA	1
PCB-77	NC	NC	NA	NA	NA	NA	1
PCB-81	NC	NC	NA	NA	NA	NA	1

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)

Spreadsheet C3-67 (3 of 3)

Estimates of Human Intake
Domestic Groundwater Use for Adult Resident
Sodium Reactor Experiment (SRE) Area

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED \times B}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Groundwater concentration	C	mg/L	CS	CS
Groundwater ingestion rate$_{vocs}$	IR	L/day	2.0	3.1
Groundwater ingestion rate$_{non\text{-}vocs}$	IR	L/day	1.0	1.5
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	9	24
Bioavailability	B	fraction	CS	CS
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/L)	RME EPC (mg/L)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)

RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCDD/PCDF - Polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.
PCB - polychlorinated biphenyls
mg/kg-day - milligrams per kilogram per day
mg/L - milligrams per liter

Estimates of Human Intake
Groundwater to Indoor Air Pathway for Adult Resident
Sodium Reactor Experiment (SRE) Area

Intake Equation:

$$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	7.0	13.2
Fraction of time indoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	9	24
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Inorganic Compounds						
Cadmium	NC	NC	NA	NA	NA	NA
Copper	NC	NC	NA	NA	NA	NA
Fluoride	NC	NC	NA	NA	NA	NA
Lead	NC	NC	NA	NA	NA	NA
Mercury	NC	NC	NA	NA	NA	NA
Methyl Mercury	NC	NC	NA	NA	NA	NA
Nitrate	NC	NC	NA	NA	NA	NA
Silver	NC	NC	NA	NA	NA	NA
Thallium	NC	NC	NA	NA	NA	NA
Zinc	NC	NC	NA	NA	NA	NA
VOCs						
1,1,1-Trichloroethane	NC	NC	NA	NA	NA	NA
1,1,2-Trichloro-1,2,2-trifluoroethane	NC	NC	NA	NA	NA	NA
1,1-Dichloroethane	4.2E-06	4.2E-06	2.0E-07	5.7E-07	2.4E-08	1.8E-07
1,2-Dichloroethane	6.9E-07	6.9E-07	3.3E-08	9.3E-08	4.0E-09	3.0E-08
1,2-Dichloroethene (total)	NC	NC	NA	NA	NA	NA
1-Chlorohexane	NC	NC	NA	NA	NA	NA
2-Butanone	NC	NC	NA	NA	NA	NA
2-Hexanone	NC	NC	NA	NA	NA	NA
Acetone	2.8E-08	2.8E-08	1.3E-09	3.8E-09	1.6E-10	1.2E-09
Benzene	3.8E-06	3.8E-06	1.8E-07	5.2E-07	2.2E-08	1.7E-07
Carbon disulfide	2.1E-05	2.1E-05	9.9E-07	2.8E-06	1.2E-07	9.0E-07
Chloromethane	5.8E-06	5.8E-06	2.8E-07	7.8E-07	3.3E-08	2.5E-07
cis-1,2-Dichloroethene	2.2E-06	2.2E-06	1.1E-07	3.0E-07	1.3E-08	9.6E-08
Ethylbenzene	NC	NC	NA	NA	NA	NA
m,p-Xylene	NC	NC	NA	NA	NA	NA
Methylene chloride	1.2E-06	1.2E-06	5.7E-08	1.6E-07	6.9E-09	5.2E-08
Tetrachloroethene	NC	NC	NA	NA	NA	NA
Toluene	NC	NC	NA	NA	NA	NA
Trichloroethene	5.1E-06	5.1E-06	2.5E-07	7.0E-07	3.0E-08	2.2E-07
Xylenes (total)	NC	NC	NA	NA	NA	NA
SVOCs						
2-Methylnaphthalene	NC	NC	NA	NA	NA	NA
Acenaphthene	NC	NC	NA	NA	NA	NA
Acenaphthylene	NC	NC	NA	NA	NA	NA
Anthracene	NC	NC	NA	NA	NA	NA
Benzo(a)anthracene	NC	NC	NA	NA	NA	NA
Benzo(a)pyrene	NC	NC	NA	NA	NA	NA
Benzo(b)fluoranthene	NC	NC	NA	NA	NA	NA
Benzo(g,h,i)perylene	NC	NC	NA	NA	NA	NA
Benzo(k)fluoranthene	NC	NC	NA	NA	NA	NA
Chrysene	NC	NC	NA	NA	NA	NA
Dibenz(a,h)anthracene	NC	NC	NA	NA	NA	NA
Dibenzofuran	NC	NC	NA	NA	NA	NA
Benzo(e)pyrene	NC	NC	NA	NA	NA	NA
Fluoranthene	NC	NC	NA	NA	NA	NA
Fluorene	NC	NC	NA	NA	NA	NA
Indeno(1,2,3-cd)pyrene	NC	NC	NA	NA	NA	NA

Spreadsheet C3-66 (2 of 3)

Estimates of Human Intake
Groundwater to Indoor Air Pathway for Adult Resident
Sodium Reactor Experiment (SRE) Area

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	7.0	13.2
Fraction of time indoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	9	24
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Naphthalene	NC	NC	NA	NA	NA	NA
Perylene	NC	NC	NA	NA	NA	NA
Phenanthrene	NC	NC	NA	NA	NA	NA
Pyrene	NC	NC	NA	NA	NA	NA
Total Petroleum Hydrocarbons						
C11-C14(Kerosene Range)	NC	NC	NA	NA	NA	NA
C14-C20(Diesel Range)	NC	NC	NA	NA	NA	NA
C20-C30(Lubricant Oil Range)	NC	NC	NA	NA	NA	NA
PCDD/PCDFs						
2,3,7,8-TCDD	NC	NC	NA	NA	NA	NA
1,2,3,7,8-PeCDD	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,6,7,8-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,7,8,9-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,4,6,7,8-HpCDD	NC	NC	NA	NA	NA	NA
OCDD	NC	NC	NA	NA	NA	NA
2,3,7,8-TCDF	NC	NC	NA	NA	NA	NA
1,2,3,7,8-PeCDF	NC	NC	NA	NA	NA	NA
2,3,4,7,8-PeCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA
2,3,4,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,7,8,9-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,6,7,8-HpCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8,9-HpCDF	NC	NC	NA	NA	NA	NA
OCDF	NC	NC	NA	NA	NA	NA
PCBs						
Aroclor-1254	NC	NC	NA	NA	NA	NA
Aroclor-1260	NC	NC	NA	NA	NA	NA
PCB-105	NC	NC	NA	NA	NA	NA
PCB-114	NC	NC	NA	NA	NA	NA
PCB-118	NC	NC	NA	NA	NA	NA
PCB-123	NC	NC	NA	NA	NA	NA
PCB-126	NC	NC	NA	NA	NA	NA
PCB-156	NC	NC	NA	NA	NA	NA
PCB-157	NC	NC	NA	NA	NA	NA
PCB-167	NC	NC	NA	NA	NA	NA
PCB-169	NC	NC	NA	NA	NA	NA
PCB-189	NC	NC	NA	NA	NA	NA
PCB-77	NC	NC	NA	NA	NA	NA
PCB-81	NC	NC	NA	NA	NA	NA

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration

Spreadsheet C3-66 (3 of 3)

Estimates of Human Intake
Groundwater to Indoor Air Pathway for Adult Resident
Sodium Reactor Experiment (SRE) Area

Intake Equation:

$$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	7.0	13.2
Fraction of time indoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	9	24
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)

ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCDD/PCDF - Polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.
PCB - polychlorinated biphenyls
mg/kg-day - milligrams per kilogram per day
mg/m^3 - milligrams per cubic meter

Estimates of Human Intake
Soil Vapor to Indoor Air Pathway for Adult Resident
Sodium Reactor Experiment (SRE) Area

Intake Equation:

$$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	7.0	13.2
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	9	24
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Inorganic Compounds						
Cadmium	NC	NC	NA	NA	NA	NA
Copper	NC	NC	NA	NA	NA	NA
Fluoride	NC	NC	NA	NA	NA	NA
Lead	NC	NC	NA	NA	NA	NA
Mercury	NC	NC	NA	NA	NA	NA
Methyl Mercury	NC	NC	NA	NA	NA	NA
Nitrate	NC	NC	NA	NA	NA	NA
Silver	NC	NC	NA	NA	NA	NA
Thallium	NC	NC	NA	NA	NA	NA
Zinc	NC	NC	NA	NA	NA	NA
VOCs						
1,1,1-Trichloroethane	6.3E-04	6.3E-04	3.0E-05	8.5E-05	3.6E-06	2.7E-05
1,1,2-Trichloro-1,2,2-trifluoroethane	3.2E-03	3.6E-03	1.5E-04	4.9E-04	1.8E-05	1.6E-04
1,1-Dichloroethane	6.1E-04	6.1E-04	2.9E-05	8.3E-05	3.5E-06	2.7E-05
1,2-Dichloroethane	NC	NC	NA	NA	NA	NA
1,2-Dichloroethene (total)	NC	NC	NA	NA	NA	NA
1-Chlorohexane	NC	NC	NA	NA	NA	NA
2-Butanone	NC	NC	NA	NA	NA	NA
2-Hexanone	NC	NC	NA	NA	NA	NA
Acetone	NC	NC	NA	NA	NA	NA
Benzene	NC	NC	NA	NA	NA	NA
Carbon disulfide	NC	NC	NA	NA	NA	NA
Chloromethane	NC	NC	NA	NA	NA	NA
cis-1,2-Dichloroethene	NC	NC	NA	NA	NA	NA
Ethylbenzene	6.1E-04	6.1E-04	2.9E-05	8.3E-05	3.5E-06	2.7E-05
m,p-Xylene	1.2E-03	1.2E-03	5.7E-05	1.6E-04	6.8E-06	5.1E-05
Methylene chloride	1.8E-02	1.8E-02	8.6E-04	2.4E-03	1.0E-04	7.8E-04
Tetrachloroethene	6.0E-04	6.0E-04	2.9E-05	8.2E-05	3.5E-06	2.6E-05
Toluene	6.6E-04	6.6E-04	3.2E-05	8.9E-05	3.8E-06	2.9E-05
Trichloroethene	6.3E-04	6.3E-04	3.0E-05	8.5E-05	3.6E-06	2.7E-05
Xylenes (total)	NC	NC	NA	NA	NA	NA
SVOCs						
2-Methylnaphthalene	NC	NC	NA	NA	NA	NA
Acenaphthene	NC	NC	NA	NA	NA	NA
Acenaphthylene	NC	NC	NA	NA	NA	NA
Anthracene	NC	NC	NA	NA	NA	NA
Benzo(a)anthracene	NC	NC	NA	NA	NA	NA
Benzo(a)pyrene	NC	NC	NA	NA	NA	NA

Spreadsheet C3-64 (2 of 3)

Estimates of Human Intake
Soil Vapor to Indoor Air Pathway for Adult Resident
Sodium Reactor Experiment (SRE) Area

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	7.0	13.2
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	9	24
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Benzo(e)pyrene	NC	NC	NA	NA	NA	NA
Benzo(b)fluoranthene	NC	NC	NA	NA	NA	NA
Benzo(g,h,i)perylene	NC	NC	NA	NA	NA	NA
Benzo(k)fluoranthene	NC	NC	NA	NA	NA	NA
Chrysene	NC	NC	NA	NA	NA	NA
Dibenz(a,h)anthracene	NC	NC	NA	NA	NA	NA
Dibenzofuran	NC	NC	NA	NA	NA	NA
Fluoranthene	NC	NC	NA	NA	NA	NA
Fluorene	NC	NC	NA	NA	NA	NA
Indeno(1,2,3-cd)pyrene	NC	NC	NA	NA	NA	NA
Naphthalene	NC	NC	NA	NA	NA	NA
Perylene	NC	NC	NA	NA	NA	NA
Phenanthrene	NC	NC	NA	NA	NA	NA
Pyrene	NC	NC	NA	NA	NA	NA
Total Petroleum Hydrocarbons						
C11-C14(Kerosene Range)	NC	NC	NA	NA	NA	NA
C14-C20(Diesel Range)	NC	NC	NA	NA	NA	NA
C20-C30(Lubricant Oil Range)	NC	NC	NA	NA	NA	NA
PCDD/PCDFs						
2,3,7,8-TCDD	NC	NC	NA	NA	NA	NA
1,2,3,7,8-PeCDD	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,6,7,8-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,7,8,9-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,4,6,7,8-HpCDD	NC	NC	NA	NA	NA	NA
OCDD	NC	NC	NA	NA	NA	NA
2,3,7,8-TCDF	NC	NC	NA	NA	NA	NA
1,2,3,7,8-PeCDF	NC	NC	NA	NA	NA	NA
2,3,4,7,8-PeCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA
2,3,4,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,7,8,9-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,6,7,8-HpCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8,9-HpCDF	NC	NC	NA	NA	NA	NA
OCDF	NC	NC	NA	NA	NA	NA

Spreadsheet C3-64 (3 of 3)

Estimates of Human Intake
Soil Vapor to Indoor Air Pathway for Adult Resident
Sodium Reactor Experiment (SRE) Area

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	7.0	13.2
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	9	24
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
PCBs						
Aroclor-1254	NC	NC	NA	NA	NA	NA
Aroclor-1260	NC	NC	NA	NA	NA	NA
PCB-105	NC	NC	NA	NA	NA	NA
PCB-114	NC	NC	NA	NA	NA	NA
PCB-118	NC	NC	NA	NA	NA	NA
PCB-123	NC	NC	NA	NA	NA	NA
PCB-126	NC	NC	NA	NA	NA	NA
PCB-156	NC	NC	NA	NA	NA	NA
PCB-157	NC	NC	NA	NA	NA	NA
PCB-167	NC	NC	NA	NA	NA	NA
PCB-169	NC	NC	NA	NA	NA	NA
PCB-189	NC	NC	NA	NA	NA	NA
PCB-77	NC	NC	NA	NA	NA	NA
PCB-81	NC	NC	NA	NA	NA	NA

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCDD/PCDF - Polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.
PCB - polychlorinated biphenyls
mg/kg-day - milligrams per kilogram per day
mg/m^3 - milligrams per cubic meter

Estimates of Human Intake
Groundwater to Ambient Air Pathway for Adult Resident
Sodium Reactor Experiment (SRE) Area

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	7.0	13.2
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	9	24
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Inorganic Compounds						
Cadmium	NC	NC	NA	NA	NA	NA
Copper	NC	NC	NA	NA	NA	NA
Fluoride	NC	NC	NA	NA	NA	NA
Lead	NC	NC	NA	NA	NA	NA
Mercury	NC	NC	NA	NA	NA	NA
Methyl Mercury	NC	NC	NA	NA	NA	NA
Nitrate	NC	NC	NA	NA	NA	NA
Silver	NC	NC	NA	NA	NA	NA
Thallium	NC	NC	NA	NA	NA	NA
Zinc	NC	NC	NA	NA	NA	NA
VOCs						
1,1,1-Trichloroethane	NC	NC	NA	NA	NA	NA
1,1,2-Trichloro-1,2,2-trifluoroethane	NC	NC	NA	NA	NA	NA
1,1-Dichloroethane	2.8E-06	2.8E-06	1.4E-07	3.9E-07	1.6E-08	1.2E-07
1,2-Dichloroethane	6.6E-07	6.6E-07	3.2E-08	8.9E-08	3.8E-09	2.9E-08
1,2-Dichloroethene (total)	NC	NC	NA	NA	NA	NA
1-Chlorohexane	NC	NC	NA	NA	NA	NA
2-Butanone	NC	NC	NA	NA	NA	NA
2-Hexanone	NC	NC	NA	NA	NA	NA
Acetone	2.5E-08	2.5E-08	1.2E-09	3.4E-09	1.4E-10	1.1E-09
Benzene	3.2E-06	3.2E-06	1.6E-07	4.4E-07	1.9E-08	1.4E-07
Carbon disulfide	2.2E-05	2.2E-05	1.1E-06	3.0E-06	1.3E-07	9.6E-07
Chloromethane	8.5E-06	8.5E-06	4.1E-07	1.2E-06	4.9E-08	3.7E-07
cis-1,2-Dichloroethene	2.0E-06	2.0E-06	9.7E-08	2.7E-07	1.2E-08	8.8E-08
Ethylbenzene	NC	NC	NA	NA	NA	NA
m,p-Xylene	NC	NC	NA	NA	NA	NA
Methylene chloride	1.5E-06	1.5E-06	7.3E-08	2.1E-07	8.8E-09	6.6E-08
Tetrachloroethene	NC	NC	NA	NA	NA	NA
Toluene	NC	NC	NA	NA	NA	NA
Trichloroethene	5.3E-06	5.3E-06	2.6E-07	7.2E-07	3.1E-08	2.3E-07
Xylenes (total)	NC	NC	NA	NA	NA	NA
SVOCs						
2-Methylnaphthalene	NC	NC	NA	NA	NA	NA
Acenaphthene	NC	NC	NA	NA	NA	NA
Acenaphthylene	NC	NC	NA	NA	NA	NA
Anthracene	NC	NC	NA	NA	NA	NA
Benzo(a)anthracene	NC	NC	NA	NA	NA	NA
Benzo(a)pyrene	NC	NC	NA	NA	NA	NA
Benzo(b)fluoranthene	NC	NC	NA	NA	NA	NA
Benzo(g,h,i)perylene	NC	NC	NA	NA	NA	NA
Benzo(k)fluoranthene	NC	NC	NA	NA	NA	NA
Chrysene	NC	NC	NA	NA	NA	NA
Dibenz(a,h)anthracene	NC	NC	NA	NA	NA	NA
Dibenzofuran	NC	NC	NA	NA	NA	NA
Benzo(e)pyrene	NC	NC	NA	NA	NA	NA
Fluoranthene	NC	NC	NA	NA	NA	NA
Fluorene	NC	NC	NA	NA	NA	NA
Indeno(1,2,3-cd)pyrene	NC	NC	NA	NA	NA	NA

Spreadsheet C3-63 (2 of 3)

Estimates of Human Intake
Groundwater to Ambient Air Pathway for Adult Resident
Sodium Reactor Experiment (SRE) Area

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	7.0	13.2
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	9	24
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Naphthalene	NC	NC	NA	NA	NA	NA
Perylene	NC	NC	NA	NA	NA	NA
Phenanthrene	NC	NC	NA	NA	NA	NA
Pyrene	NC	NC	NA	NA	NA	NA
Total Petroleum Hydrocarbons						
C11-C14(Kerosene Range)	NC	NC	NA	NA	NA	NA
C14-C20(Diesel Range)	NC	NC	NA	NA	NA	NA
C20-C30(Lubricant Oil Range)	NC	NC	NA	NA	NA	NA
PCDD/PCDFs						
2,3,7,8-TCDD	NC	NC	NA	NA	NA	NA
1,2,3,7,8-PeCDD	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,6,7,8-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,7,8,9-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,4,6,7,8-HpCDD	NC	NC	NA	NA	NA	NA
OCDD	NC	NC	NA	NA	NA	NA
2,3,7,8-TCDF	NC	NC	NA	NA	NA	NA
1,2,3,7,8-PeCDF	NC	NC	NA	NA	NA	NA
2,3,4,7,8-PeCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA
2,3,4,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,7,8,9-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,6,7,8-HpCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8,9-HpCDF	NC	NC	NA	NA	NA	NA
OCDF	NC	NC	NA	NA	NA	NA
PCBs						
Aroclor-1254	NC	NC	NA	NA	NA	NA
Aroclor-1260	NC	NC	NA	NA	NA	NA
PCB-105	NC	NC	NA	NA	NA	NA
PCB-114	NC	NC	NA	NA	NA	NA
PCB-118	NC	NC	NA	NA	NA	NA
PCB-123	NC	NC	NA	NA	NA	NA
PCB-126	NC	NC	NA	NA	NA	NA
PCB-156	NC	NC	NA	NA	NA	NA
PCB-157	NC	NC	NA	NA	NA	NA
PCB-167	NC	NC	NA	NA	NA	NA
PCB-169	NC	NC	NA	NA	NA	NA
PCB-189	NC	NC	NA	NA	NA	NA
PCB-77	NC	NC	NA	NA	NA	NA
PCB-81	NC	NC	NA	NA	NA	NA

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration

Spreadsheet C3-63 (3 of 3)

Estimates of Human Intake
Groundwater to Ambient Air Pathway for Adult Resident
Sodium Reactor Experiment (SRE) Area

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	7.0	13.2
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	9	24
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)

ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCDD/PCDF - Polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.
PCB - polychlorinated biphenyls
mg/kg-day - milligrams per kilogram per day
mg/m^3 - milligrams per cubic meter

Estimates of Human Intake
Soil to Ambient Air Pathway for Adult Resident - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation:

$$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	7.0	13.2
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	9	24
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Inorganic Compounds						
Aluminum	NC	NC	NA	NA	NA	NA
Antimony	NC	NC	NA	NA	NA	NA
Arsenic	NC	NC	NA	NA	NA	NA
Cadmium	NC	NC	NA	NA	NA	NA
Chromium	NC	NC	NA	NA	NA	NA
Copper	NC	NC	NA	NA	NA	NA
Fluoride	NC	NC	NA	NA	NA	NA
Lead	NC	NC	NA	NA	NA	NA
Mercury	NC	NC	NA	NA	NA	NA
Methyl Mercury	NC	NC	NA	NA	NA	NA
Nickel	NC	NC	NA	NA	NA	NA
Nitrate	NC	NC	NA	NA	NA	NA
Silver	NC	NC	NA	NA	NA	NA
Thallium	NC	NC	NA	NA	NA	NA
Vanadium	NC	NC	NA	NA	NA	NA
Zinc	NC	NC	NA	NA	NA	NA
VOCs						
1,1,1-Trichloroethane	NC	NC	NA	NA	NA	NA
1,1,2-Trichloro-1,2,2-trifluoroethane	NC	NC	NA	NA	NA	NA
1,1-Dichloroethane	2.8E-06	2.8E-06	1.4E-07	3.9E-07	1.6E-08	1.2E-07
1,2-Dichloroethane	6.6E-07	6.6E-07	3.2E-08	8.9E-08	3.8E-09	2.9E-08
1,2-Dichloroethene (total)	NC	NC	NA	NA	NA	NA
1-Chlorohexane	NC	NC	NA	NA	NA	NA
2-Butanone	NC	NC	NA	NA	NA	NA
2-Hexanone	NC	NC	NA	NA	NA	NA
Acetone	2.5E-08	2.5E-08	1.2E-09	3.4E-09	1.4E-10	1.1E-09
Benzene	3.2E-06	3.2E-06	1.6E-07	4.4E-07	1.9E-08	1.4E-07
Carbon disulfide	NC	NC	NA	NA	NA	NA
Chloromethane	NC	NC	NA	NA	NA	NA
cis-1,2-Dichloroethene	2.0E-06	2.0E-06	9.7E-08	2.7E-07	1.2E-08	8.8E-08
Ethylbenzene	NC	NC	NA	NA	NA	NA
m,p-Xylene	NC	NC	NA	NA	NA	NA
Methylene chloride	1.5E-06	1.5E-06	7.3E-08	2.1E-07	8.8E-09	6.6E-08
Tetrachloroethene	NC	NC	NA	NA	NA	NA
Toluene	NC	NC	NA	NA	NA	NA
Trichloroethene	5.3E-06	5.3E-06	2.6E-07	7.2E-07	3.1E-08	2.3E-07
Xylenes (total)	NC	NC	NA	NA	NA	NA

Spreadsheet C3-62b (2 of 3)

Estimates of Human Intake
Soil to Ambient Air Pathway for Adult Resident - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	7.0	13.2
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	9	24
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
SVOCs						
2-Methylnaphthalene	NC	NC	NA	NA	NA	NA
Acenaphthene	NC	NC	NA	NA	NA	NA
Acenaphthylene	NC	NC	NA	NA	NA	NA
Anthracene	NC	NC	NA	NA	NA	NA
Benzo(a)anthracene	NC	NC	NA	NA	NA	NA
Benzo(a)pyrene	NC	NC	NA	NA	NA	NA
Benzo(e)pyrene	NC	NC	NA	NA	NA	NA
Benzo(b)fluoranthene	NC	NC	NA	NA	NA	NA
Benzo(g,h,i)perylene	NC	NC	NA	NA	NA	NA
Benzo(k)fluoranthene	NC	NC	NA	NA	NA	NA
Chrysene	NC	NC	NA	NA	NA	NA
Dibenz(a,h)anthracene	NC	NC	NA	NA	NA	NA
Dibenzofuran	NC	NC	NA	NA	NA	NA
Fluoranthene	NC	NC	NA	NA	NA	NA
Fluorene	NC	NC	NA	NA	NA	NA
Indeno(1,2,3-cd)pyrene	NC	NC	NA	NA	NA	NA
Naphthalene	NC	NC	NA	NA	NA	NA
Perylene	NC	NC	NA	NA	NA	NA
Phenanthrene	NC	NC	NA	NA	NA	NA
Pyrene	NC	NC	NA	NA	NA	NA
Total Petroleum Hydrocarbons						
C11-C14(Kerosene Range)	NC	NC	NA	NA	NA	NA
C14-C20(Diesel Range)	NC	NC	NA	NA	NA	NA
C20-C30(Lubricant Oil Range)	NC	NC	NA	NA	NA	NA
PCDD/PCDFs						
2,3,7,8-TCDD	NC	NC	NA	NA	NA	NA
1,2,3,7,8-PeCDD	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,6,7,8-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,7,8,9-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,4,6,7,8-HpCDD	NC	NC	NA	NA	NA	NA
OCDD	NC	NC	NA	NA	NA	NA
2,3,7,8-TCDF	NC	NC	NA	NA	NA	NA
1,2,3,7,8-PeCDF	NC	NC	NA	NA	NA	NA
2,3,4,7,8-PeCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA
2,3,4,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,7,8,9-HxCDF	NC	NC	NA	NA	NA	NA

Spreadsheet C3-62b (3 of 3)

Estimates of Human Intake
Soil to Ambient Air Pathway for Adult Resident - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	7.0	13.2
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	9	24
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
1,2,3,4,6,7,8-HpCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8,9-HpCDF	NC	NC	NA	NA	NA	NA
OCDF	NC	NC	NA	NA	NA	NA
PCBs						
Aroclor-1254	NC	NC	NA	NA	NA	NA
Aroclor-1260	NC	NC	NA	NA	NA	NA
PCB-105	NC	NC	NA	NA	NA	NA
PCB-114	NC	NC	NA	NA	NA	NA
PCB-118	NC	NC	NA	NA	NA	NA
PCB-123	NC	NC	NA	NA	NA	NA
PCB-126	NC	NC	NA	NA	NA	NA
PCB-156	NC	NC	NA	NA	NA	NA
PCB-157	NC	NC	NA	NA	NA	NA
PCB-167	NC	NC	NA	NA	NA	NA
PCB-169	NC	NC	NA	NA	NA	NA
PCB-189	NC	NC	NA	NA	NA	NA
PCB-77	NC	NC	NA	NA	NA	NA
PCB-81	NC	NC	NA	NA	NA	NA

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCDD/PCDF - Polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.
PCB - polychlorinated biphenyls
mg/kg-day - milligrams per kilogram per day
mg/m^3 - milligrams per cubic meter

Estimates of Human Intake
Soil to Ambient Air Pathway for Adult Resident - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	7.0	13.2
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	9	24
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Inorganic Compounds						
Cadmium	NC	NC	NA	NA	NA	NA
Copper	NC	NC	NA	NA	NA	NA
Fluoride	NC	NC	NA	NA	NA	NA
Lead	NC	NC	NA	NA	NA	NA
Mercury	NC	NC	NA	NA	NA	NA
Methyl Mercury	NC	NC	NA	NA	NA	NA
Nitrate	NC	NC	NA	NA	NA	NA
Silver	NC	NC	NA	NA	NA	NA
Thallium	NC	NC	NA	NA	NA	NA
Zinc	NC	NC	NA	NA	NA	NA
VOCs						
1,1,1-Trichloroethane	NC	NC	NA	NA	NA	NA
1,1,2-Trichloro-1,2,2-trifluoroethane	NC	NC	NA	NA	NA	NA
1,1-Dichloroethane	2.8E-06	2.8E-06	1.4E-07	3.9E-07	1.6E-08	1.2E-07
1,2-Dichloroethane	6.6E-07	6.6E-07	3.2E-08	8.9E-08	3.8E-09	2.9E-08
1,2-Dichloroethene (total)	NC	NC	NA	NA	NA	NA
1-Chlorohexane	NC	NC	NA	NA	NA	NA
2-Butanone	NC	NC	NA	NA	NA	NA
2-Hexanone	NC	NC	NA	NA	NA	NA
Acetone	2.5E-08	2.5E-08	1.2E-09	3.4E-09	1.4E-10	1.1E-09
Benzene	3.2E-06	3.2E-06	1.6E-07	4.4E-07	1.9E-08	1.4E-07
Carbon disulfide	NC	NC	NA	NA	NA	NA
Chloromethane	NC	NC	NA	NA	NA	NA
cis-1,2-Dichloroethene	2.0E-06	2.0E-06	9.7E-08	2.7E-07	1.2E-08	8.8E-08
Ethylbenzene	NC	NC	NA	NA	NA	NA
m,p-Xylene	NC	NC	NA	NA	NA	NA
Methylene chloride	1.5E-06	1.5E-06	7.3E-08	2.1E-07	8.8E-09	6.6E-08
Tetrachloroethene	NC	NC	NA	NA	NA	NA
Toluene	NC	NC	NA	NA	NA	NA
Trichloroethene	5.3E-06	5.3E-06	2.6E-07	7.2E-07	3.1E-08	2.3E-07
Xylenes (total)	NC	NC	NA	NA	NA	NA
SVOCs						
2-Methylnaphthalene	NC	NC	NA	NA	NA	NA
Acenaphthene	NC	NC	NA	NA	NA	NA
Acenaphthylene	NC	NC	NA	NA	NA	NA
Anthracene	NC	NC	NA	NA	NA	NA
Benzo(a)anthracene	NC	NC	NA	NA	NA	NA
Benzo(a)pyrene	NC	NC	NA	NA	NA	NA

Spreadsheet C3-62a (2 of 3)

Estimates of Human Intake
Soil to Ambient Air Pathway for Adult Resident - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	7.0	13.2
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	9	24
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Benzo(e)pyrene	NC	NC	NA	NA	NA	NA
Benzo(b)fluoranthene	NC	NC	NA	NA	NA	NA
Benzo(g,h,i)perylene	NC	NC	NA	NA	NA	NA
Benzo(k)fluoranthene	NC	NC	NA	NA	NA	NA
Chrysene	NC	NC	NA	NA	NA	NA
Dibenz(a,h)anthracene	NC	NC	NA	NA	NA	NA
Dibenzofuran	NC	NC	NA	NA	NA	NA
Fluoranthene	NC	NC	NA	NA	NA	NA
Fluorene	NC	NC	NA	NA	NA	NA
Indeno(1,2,3-cd)pyrene	NC	NC	NA	NA	NA	NA
Naphthalene	NC	NC	NA	NA	NA	NA
Perylene	NC	NC	NA	NA	NA	NA
Phenanthrene	NC	NC	NA	NA	NA	NA
Pyrene	NC	NC	NA	NA	NA	NA
Total Petroleum Hydrocarbons						
C11-C14(Kerosene Range)	NC	NC	NA	NA	NA	NA
C14-C20(Diesel Range)	NC	NC	NA	NA	NA	NA
C20-C30(Lubricant Oil Range)	NC	NC	NA	NA	NA	NA
PCDD/PCDFs						
2,3,7,8-TCDD	NC	NC	NA	NA	NA	NA
1,2,3,7,8-PeCDD	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,6,7,8-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,7,8,9-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,4,6,7,8-HpCDD	NC	NC	NA	NA	NA	NA
OCDD	NC	NC	NA	NA	NA	NA
2,3,7,8-TCDF	NC	NC	NA	NA	NA	NA
1,2,3,7,8-PeCDF	NC	NC	NA	NA	NA	NA
2,3,4,7,8-PeCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA
2,3,4,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,7,8,9-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,6,7,8-HpCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8,9-HpCDF	NC	NC	NA	NA	NA	NA
OCDF	NC	NC	NA	NA	NA	NA

Spreadsheet C3-62a (3 of 3)

Estimates of Human Intake
Soil to Ambient Air Pathway for Adult Resident - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	7.0	13.2
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	9	24
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
PCBs						
Aroclor-1254	NC	NC	NA	NA	NA	NA
Aroclor-1260	NC	NC	NA	NA	NA	NA
PCB-105	NC	NC	NA	NA	NA	NA
PCB-114	NC	NC	NA	NA	NA	NA
PCB-118	NC	NC	NA	NA	NA	NA
PCB-123	NC	NC	NA	NA	NA	NA
PCB-126	NC	NC	NA	NA	NA	NA
PCB-156	NC	NC	NA	NA	NA	NA
PCB-157	NC	NC	NA	NA	NA	NA
PCB-167	NC	NC	NA	NA	NA	NA
PCB-169	NC	NC	NA	NA	NA	NA
PCB-189	NC	NC	NA	NA	NA	NA
PCB-77	NC	NC	NA	NA	NA	NA
PCB-81	NC	NC	NA	NA	NA	NA

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCDD/PCDF - Polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.
PCB - polychlorinated biphenyls
mg/kg-day - milligrams per kilogram per day
mg/m^3 - milligrams per cubic meter

Estimates of Human Intake
Soil Particulate Inhalation Pathway for Adult Resident - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation:

$$\text{Dosage} = \frac{C \times CF \times IR \times FT \times EF \times ED}{PEF \times BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Inhalation rate	IR	m^3/day	7.0	13.2
Conversion factor	CF	kg/ug	1.E-09	1.E-09
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	9	24
Particulate emission factor	PEF	m^3/ug	2.4	2.4
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Inorganic Compounds						
Aluminum	NC	NC	NA	NA	NA	NA
Antimony	NC	NC	NA	NA	NA	NA
Arsenic	NC	NC	NA	NA	NA	NA
Cadmium	1.9E-01	3.0E-01	3.7E-12	1.7E-11	4.5E-13	5.4E-12
Chromium	NC	NC	NA	NA	NA	NA
Copper	9.7E+00	1.8E+01	1.9E-10	9.7E-10	2.3E-11	3.1E-10
Fluoride	NC	NC	NA	NA	NA	NA
Lead	9.2E+00	1.5E+01	1.8E-10	8.2E-10	2.2E-11	2.6E-10
Mercury	1.7E+00	3.8E+00	3.4E-11	2.1E-10	4.1E-12	6.7E-11
Methyl Mercury	1.7E-03	3.6E-03	3.4E-14	2.0E-13	4.1E-15	6.4E-14
Nickel	NC	NC	NA	NA	NA	NA
Nitrate	NC	NC	NA	NA	NA	NA
Silver	1.3E+00	2.7E+00	2.6E-11	1.5E-10	3.1E-12	4.8E-11
Thallium	9.9E-01	3.6E+00	2.0E-11	2.0E-10	2.3E-12	6.4E-11
Vanadium	NC	NC	NA	NA	NA	NA
Zinc	6.8E+01	2.2E+02	1.3E-09	1.2E-08	1.6E-10	3.9E-09
VOCs						
1,1,1-Trichloroethane	NC	NC	NA	NA	NA	NA
1,1,2-Trichloro-1,2,2-trifluoroethane	1.2E-02	1.2E-02	2.4E-13	6.7E-13	2.8E-14	2.1E-13
1,1-Dichloroethane	NC	NC	NA	NA	NA	NA
1,2-Dichloroethane	NC	NC	NA	NA	NA	NA
1,2-Dichloroethene (total)	NC	NC	NA	NA	NA	NA
1-Chlorohexane	1.0E-03	1.0E-03	2.0E-14	5.5E-14	2.4E-15	1.8E-14
2-Butanone	1.9E-02	2.7E-02	3.7E-13	1.5E-12	4.5E-14	4.8E-13
2-Hexanone	3.0E-03	3.0E-03	5.9E-14	1.7E-13	7.1E-15	5.3E-14
Acetone	6.2E-01	5.2E+00	1.2E-11	2.9E-10	1.5E-12	9.2E-11
Benzene	NC	NC	NA	NA	NA	NA
Carbon disulfide	NC	NC	NA	NA	NA	NA
Chloromethane	NC	NC	NA	NA	NA	NA
cis-1,2-Dichloroethene	NC	NC	NA	NA	NA	NA
Ethylbenzene	NC	NC	NA	NA	NA	NA
m,p-Xylene	NC	NC	NA	NA	NA	NA
Methylene chloride	9.9E-03	1.2E-02	1.9E-13	6.5E-13	2.3E-14	2.1E-13
Tetrachloroethene	NC	NC	NA	NA	NA	NA
Toluene	NC	NC	NA	NA	NA	NA
Trichloroethene	NC	NC	NA	NA	NA	NA
Xylenes (total)	NC	NC	NA	NA	NA	NA

Spreadsheet C3-61b (2 of 3)

Estimates of Human Intake
Soil Particulate Inhalation Pathway for Adult Resident - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation: $$\text{Dosage} = \frac{C \times CF \times IR \times FT \times EF \times ED}{PEF \times BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Inhalation rate	IR	m^3/day	7.0	13.2
Conversion factor	CF	kg/ug	1.E-09	1.E-09
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	9	24
Particulate emission factor	PEF	m^3/ug	2.4	2.4
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
SVOCs						
2-Methylnaphthalene	2.2E-02	2.5E-02	4.2E-13	1.4E-12	5.1E-14	4.4E-13
Acenaphthene	6.8E-02	2.5E-01	1.3E-12	1.4E-11	1.6E-13	4.5E-12
Acenaphthylene	4.9E-03	1.4E-02	9.6E-14	7.6E-13	1.2E-14	2.4E-13
Anthracene	1.9E-01	9.9E-01	3.8E-12	5.5E-11	4.6E-13	1.7E-11
Benzo(a)anthracene	8.2E-01	1.4E+01	1.6E-11	7.8E-10	1.9E-12	2.5E-10
Benzo(a)pyrene	8.8E-01	1.5E+01	1.7E-11	8.3E-10	2.1E-12	2.7E-10
Benzo(e)pyrene	2.0E-02	5.5E-02	3.9E-13	3.1E-12	4.6E-14	9.8E-13
Benzo(b)fluoranthene	7.8E-01	6.9E+00	1.5E-11	3.8E-10	1.8E-12	1.2E-10
Benzo(g,h,i)perylene	2.7E-01	2.4E+00	5.2E-12	1.3E-10	6.2E-13	4.3E-11
Benzo(k)fluoranthene	8.7E-01	1.5E+01	1.7E-11	8.3E-10	2.0E-12	2.7E-10
Chrysene	6.0E-01	6.5E+00	1.2E-11	3.6E-10	1.4E-12	1.1E-10
Dibenz(a,h)anthracene	1.2E-01	1.1E+00	2.3E-12	6.2E-11	2.7E-13	2.0E-11
Dibenzofuran	2.8E-01	2.8E-01	5.5E-12	1.6E-11	6.6E-13	5.0E-12
Fluoranthene	1.5E+00	1.3E+01	2.9E-11	7.2E-10	3.4E-12	2.3E-10
Fluorene	7.0E-02	2.6E-01	1.4E-12	1.4E-11	1.6E-13	4.6E-12
Indeno(1,2,3-cd)pyrene	3.7E-01	3.3E+00	7.3E-12	1.8E-10	8.7E-13	5.9E-11
Naphthalene	2.0E-02	5.8E-02	3.8E-13	3.2E-12	4.6E-14	1.0E-12
Perylene	1.1E-02	3.1E-02	2.2E-13	1.7E-12	2.6E-14	5.6E-13
Phenanthrene	7.0E-01	5.8E+00	1.4E-11	3.2E-10	1.6E-12	1.0E-10
Pyrene	1.2E+00	1.1E+01	2.4E-11	6.1E-10	2.9E-12	1.9E-10
Total Petroleum Hydrocarbons						
C11-C14(Kerosene Range)	7.8E+00	3.8E+01	1.5E-10	2.1E-09	1.8E-11	6.8E-10
C14-C20(Diesel Range)	7.3E+00	1.8E+01	1.4E-10	1.0E-09	1.7E-11	3.2E-10
C20-C30(Lubricant Oil Range)	7.9E+01	4.3E+02	1.5E-09	2.4E-08	1.9E-10	7.6E-09
PCDD/PCDFs						
2,3,7,8-TCDD	1.5E-07	3.5E-07	2.9E-18	1.9E-17	3.5E-19	6.2E-18
1,2,3,7,8-PeCDD	5.6E-07	1.3E-06	1.1E-17	7.3E-17	1.3E-18	2.3E-17
1,2,3,4,7,8-HxCDD	1.6E-06	3.7E-06	3.2E-17	2.1E-16	3.8E-18	6.6E-17
1,2,3,6,7,8-HxCDD	8.3E-06	1.9E-05	1.6E-16	1.0E-15	2.0E-17	3.3E-16
1,2,3,7,8,9-HxCDD	3.4E-06	8.7E-06	6.7E-17	4.8E-16	8.1E-18	1.5E-16
1,2,3,4,6,7,8-HpCDD	2.4E-04	4.9E-04	4.6E-15	2.7E-14	5.5E-16	8.8E-15
OCDD	3.7E-03	7.3E-03	7.3E-14	4.1E-13	8.8E-15	1.3E-13
2,3,7,8-TCDF	3.6E-07	7.8E-07	7.2E-18	4.3E-17	8.6E-19	1.4E-17
1,2,3,7,8-PeCDF	1.5E-07	3.9E-07	2.9E-18	2.2E-17	3.5E-19	6.9E-18
2,3,4,7,8-PeCDF	4.2E-07	9.0E-07	8.3E-18	5.0E-17	9.9E-19	1.6E-17
1,2,3,4,7,8-HxCDF	8.8E-07	1.7E-06	1.7E-17	9.6E-17	2.1E-18	3.1E-17

Spreadsheet C3-61b (3 of 3)

Estimates of Human Intake
Soil Particulate Inhalation Pathway for Adult Resident - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation: $$\text{Dosage} = \frac{C \times CF \times IR \times FT \times EF \times ED}{PEF \times BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Inhalation rate	IR	m^3/day	7.0	13.2
Conversion factor	CF	kg/ug	1.E-09	1.E-09
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	9	24
Particulate emission factor	PEF	m^3/ug	2.4	2.4
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
1,2,3,6,7,8-HxCDF	7.2E-07	1.6E-06	1.4E-17	9.0E-17	1.7E-18	2.9E-17
2,3,4,6,7,8-HxCDF	1.4E-06	2.8E-06	2.7E-17	1.6E-16	3.2E-18	5.1E-17
1,2,3,7,8,9-HxCDF	1.4E-07	1.8E-07	2.7E-18	9.7E-18	3.3E-19	3.1E-18
1,2,3,4,6,7,8-HpCDF	2.8E-05	5.0E-05	5.4E-16	2.8E-15	6.5E-17	8.9E-16
1,2,3,4,7,8,9-HpCDF	2.4E-06	4.2E-06	4.7E-17	2.4E-16	5.6E-18	7.5E-17
OCDF	7.5E-05	1.5E-04	1.5E-15	8.3E-15	1.8E-16	2.7E-15
PCBs						
Aroclor-1254	1.6E-01	4.3E-01	3.2E-12	2.4E-11	3.8E-13	7.6E-12
Aroclor-1260	1.4E+00	7.7E+00	2.7E-11	4.2E-10	3.3E-12	1.4E-10
PCB-105	1.2E-04	6.3E-04	2.3E-15	3.5E-14	2.8E-16	1.1E-14
PCB-114	2.3E-06	1.1E-05	4.5E-17	6.2E-16	5.3E-18	2.0E-16
PCB-118	2.4E-04	1.3E-03	4.7E-15	6.9E-14	5.7E-16	2.2E-14
PCB-123	3.4E-06	1.8E-05	6.6E-17	9.8E-16	7.9E-18	3.1E-16
PCB-126	9.2E-06	4.9E-05	1.8E-16	2.7E-15	2.2E-17	8.6E-16
PCB-156	7.9E-05	4.2E-04	1.5E-15	2.3E-14	1.9E-16	7.4E-15
PCB-157	3.5E-05	1.9E-04	6.8E-16	1.0E-14	8.2E-17	3.3E-15
PCB-167	6.0E-05	3.3E-04	1.2E-15	1.8E-14	1.4E-16	5.8E-15
PCB-169	9.0E-07	4.9E-06	1.8E-17	2.7E-16	2.1E-18	8.6E-17
PCB-189	9.0E-06	4.9E-05	1.8E-16	2.7E-15	2.1E-17	8.6E-16
PCB-77	1.8E-05	9.7E-05	3.6E-16	5.4E-15	4.3E-17	1.7E-15
PCB-81	3.3E-06	1.7E-05	6.4E-17	9.5E-16	7.7E-18	3.1E-16

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCDD/PCDF - Polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.
PCB - polychlorinated biphenyls
mg/kg-day - milligrams per kilogram per day
mg/kg - milligrams per kilogram

Estimates of Human Intake
Soil Particulate Inhalation Pathway for Adult Resident - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation:

$$\text{Dosage} = \frac{C \times CF \times IR \times FT \times EF \times ED}{PEF \times BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Inhalation rate	IR	m^3/day	7.0	13.2
Conversion factor	CF	kg/ug	1.E-09	1.E-09
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	9	24
Particulate emission factor	PEF	m^3/ug	2.4	2.4
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Inorganic Compounds						
Cadmium	5.1E-01	1.1E+00	1.0E-11	6.3E-11	1.2E-12	2.0E-11
Copper	2.1E+01	4.6E+01	4.1E-10	2.5E-09	5.0E-11	8.1E-10
Fluoride	NC	NC	NA	NA	NA	NA
Lead	1.6E+01	3.4E+01	3.1E-10	1.9E-09	3.8E-11	6.0E-10
Mercury	1.9E+00	4.4E+00	3.7E-11	2.4E-10	4.5E-12	7.8E-11
Methyl Mercury	1.7E-03	3.6E-03	3.4E-14	2.0E-13	4.1E-15	6.4E-14
Nitrate	NC	NC	NA	NA	NA	NA
Silver	7.7E-01	2.9E+00	1.5E-11	1.6E-10	1.8E-12	5.1E-11
Thallium	3.3E-01	3.3E-01	6.5E-12	1.8E-11	7.8E-13	5.9E-12
Zinc	1.7E+02	4.4E+02	3.3E-09	2.4E-08	4.0E-10	7.8E-09
VOCs						
1,1,1-Trichloroethane	NC	NC	NA	NA	NA	NA
1,1,2-Trichloro-1,2,2-trifluoroethane	NC	NC	NA	NA	NA	NA
1,1-Dichloroethane	NC	NC	NA	NA	NA	NA
1,2-Dichloroethane	NC	NC	NA	NA	NA	NA
1,2-Dichloroethene (total)	NC	NC	NA	NA	NA	NA
1-Chlorohexane	NC	NC	NA	NA	NA	NA
2-Butanone	NC	NC	NA	NA	NA	NA
2-Hexanone	NC	NC	NA	NA	NA	NA
Acetone	NC	NC	NA	NA	NA	NA
Benzene	NC	NC	NA	NA	NA	NA
Carbon disulfide	NC	NC	NA	NA	NA	NA
Chloromethane	NC	NC	NA	NA	NA	NA
cis-1,2-Dichloroethene	NC	NC	NA	NA	NA	NA
Ethylbenzene	NC	NC	NA	NA	NA	NA
m,p-Xylene	NC	NC	NA	NA	NA	NA
Methylene chloride	NC	NC	NA	NA	NA	NA
Tetrachloroethene	NC	NC	NA	NA	NA	NA
Toluene	NC	NC	NA	NA	NA	NA
Trichloroethene	NC	NC	NA	NA	NA	NA
Xylenes (total)	NC	NC	NA	NA	NA	NA
SVOCs						
2-Methylnaphthalene	NC	NC	NA	NA	NA	NA
Acenaphthene	4.4E-02	1.0E-01	8.7E-13	5.5E-12	1.0E-13	1.8E-12
Acenaphthylene	3.1E-02	8.5E-02	6.0E-13	4.7E-12	7.3E-14	1.5E-12
Anthracene	3.9E-02	8.2E-02	7.6E-13	4.5E-12	9.1E-14	1.5E-12

Spreadsheet C3-61a (2 of 3)

Estimates of Human Intake
Soil Particulate Inhalation Pathway for Adult Resident - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation: $$\text{Dosage} = \frac{C \times CF \times IR \times FT \times EF \times ED}{PEF \times BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Inhalation rate	IR	m^3/day	7.0	13.2
Conversion factor	CF	kg/ug	1.E-09	1.E-09
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	9	24
Particulate emission factor	PEF	m^3/ug	2.4	2.4
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Benzo(a)anthracene	3.6E-02	1.5E-01	7.0E-13	8.2E-12	8.5E-14	2.6E-12
Benzo(a)pyrene	3.6E-02	1.5E-01	7.1E-13	8.2E-12	8.5E-14	2.6E-12
Benzo(e)pyrene	1.9E-02	6.3E-02	3.7E-13	3.5E-12	4.4E-14	1.1E-12
Benzo(b)fluoranthene	4.9E-02	2.7E-01	9.6E-13	1.5E-11	1.1E-13	4.7E-12
Benzo(g,h,i)perylene	4.1E-02	9.0E-02	8.1E-13	5.0E-12	9.7E-14	1.6E-12
Benzo(k)fluoranthene	3.0E-02	8.5E-02	5.8E-13	4.7E-12	7.0E-14	1.5E-12
Chrysene	4.4E-02	2.2E-01	8.7E-13	1.2E-11	1.0E-13	3.8E-12
Dibenz(a,h)anthracene	2.9E-02	8.5E-02	5.7E-13	4.7E-12	6.9E-14	1.5E-12
Dibenzofuran	NC	NC	NA	NA	NA	NA
Fluoranthene	6.0E-02	3.8E-01	1.2E-12	2.1E-11	1.4E-13	6.7E-12
Fluorene	4.4E-02	1.0E-01	8.6E-13	5.5E-12	1.0E-13	1.8E-12
Indeno(1,2,3-cd)pyrene	3.4E-02	1.4E-01	6.7E-13	7.5E-12	8.1E-14	2.4E-12
Naphthalene	NC	NC	NA	NA	NA	NA
Perylene	1.1E-02	3.6E-02	2.1E-13	2.0E-12	2.5E-14	6.3E-13
Phenanthrene	7.9E-02	2.0E-01	1.6E-12	1.1E-11	1.9E-13	3.6E-12
Pyrene	5.3E-02	1.6E-01	1.0E-12	8.6E-12	1.3E-13	2.8E-12
Total Petroleum Hydrocarbons						
C11-C14(Kerosene Range)	9.7E+00	4.0E+01	1.9E-10	2.2E-09	2.3E-11	7.1E-10
C14-C20(Diesel Range)	7.5E+00	7.5E+00	1.5E-10	4.1E-10	1.8E-11	1.3E-10
C20-C30(Lubricant Oil Range)	7.3E+01	4.7E+02	1.4E-09	2.6E-08	1.7E-10	8.3E-09
PCDD/PCDFs						
2,3,7,8-TCDD	2.7E-07	5.3E-07	5.4E-18	3.0E-17	6.4E-19	9.5E-18
1,2,3,7,8-PeCDD	1.1E-06	2.2E-06	2.2E-17	1.2E-16	2.6E-18	3.9E-17
1,2,3,4,7,8-HxCDD	4.1E-06	9.0E-06	8.1E-17	5.0E-16	9.7E-18	1.6E-16
1,2,3,6,7,8-HxCDD	1.6E-05	3.0E-05	3.1E-16	1.6E-15	3.7E-17	5.2E-16
1,2,3,7,8,9-HxCDD	5.9E-06	1.0E-05	1.2E-16	5.5E-16	1.4E-17	1.8E-16
1,2,3,4,6,7,8-HpCDD	5.7E-04	1.2E-03	1.1E-14	6.6E-14	1.3E-15	2.1E-14
OCDD	8.4E-03	1.7E-02	1.6E-13	9.3E-13	2.0E-14	3.0E-13
2,3,7,8-TCDF	5.5E-07	7.9E-07	1.1E-17	4.4E-17	1.3E-18	1.4E-17
1,2,3,7,8-PeCDF	2.8E-07	5.7E-07	5.4E-18	3.2E-17	6.5E-19	1.0E-17
2,3,4,7,8-PeCDF	8.2E-07	1.6E-06	1.6E-17	8.7E-17	1.9E-18	2.8E-17
1,2,3,4,7,8-HxCDF	1.8E-06	3.3E-06	3.5E-17	1.9E-16	4.2E-18	5.9E-17
1,2,3,6,7,8-HxCDF	1.6E-06	3.2E-06	3.0E-17	1.8E-16	3.7E-18	5.6E-17
2,3,4,6,7,8-HxCDF	3.8E-06	8.8E-06	7.5E-17	4.9E-16	9.0E-18	1.6E-16
1,2,3,7,8,9-HxCDF	3.6E-07	9.7E-07	7.1E-18	5.4E-17	8.5E-19	1.7E-17
1,2,3,4,6,7,8-HpCDF	5.3E-05	9.6E-05	1.0E-15	5.3E-15	1.2E-16	1.7E-15
1,2,3,4,7,8,9-HpCDF	4.9E-06	9.2E-06	9.5E-17	5.1E-16	1.1E-17	1.6E-16
OCDF	1.4E-04	2.4E-04	2.6E-15	1.3E-14	3.2E-16	4.2E-15

Spreadsheet C3-61a (3 of 3)

Estimates of Human Intake
Soil Particulate Inhalation Pathway for Adult Resident - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation: $$\text{Dosage} = \frac{C \times CF \times IR \times FT \times EF \times ED}{PEF \times BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Inhalation rate	IR	m^3/day	7.0	13.2
Conversion factor	CF	kg/ug	1.E-09	1.E-09
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	9	24
Particulate emission factor	PEF	m^3/ug	2.4	2.4
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
PCBs						
Aroclor-1254	1.6E-01	4.3E-01	3.2E-12	2.4E-11	3.8E-13	7.6E-12
Aroclor-1260	1.3E+00	7.3E+00	2.6E-11	4.1E-10	3.1E-12	1.3E-10
PCB-105	1.1E-04	5.6E-04	2.2E-15	3.1E-14	2.7E-16	1.0E-14
PCB-114	2.2E-06	1.0E-05	4.3E-17	5.6E-16	5.1E-18	1.8E-16
PCB-118	2.3E-04	1.1E-03	4.5E-15	6.3E-14	5.4E-16	2.0E-14
PCB-123	3.2E-06	1.6E-05	6.3E-17	8.9E-16	7.5E-18	2.8E-16
PCB-126	8.8E-06	4.4E-05	1.7E-16	2.4E-15	2.1E-17	7.8E-16
PCB-156	7.5E-05	3.8E-04	1.5E-15	2.1E-14	1.8E-16	6.7E-15
PCB-157	3.3E-05	1.7E-04	6.5E-16	9.4E-15	7.8E-17	3.0E-15
PCB-167	5.7E-05	2.9E-04	1.1E-15	1.6E-14	1.4E-16	5.2E-15
PCB-169	8.6E-07	4.4E-06	1.7E-17	2.4E-16	2.0E-18	7.8E-17
PCB-189	8.6E-06	4.4E-05	1.7E-16	2.4E-15	2.0E-17	7.8E-16
PCB-77	1.8E-05	8.8E-05	3.4E-16	4.9E-15	4.1E-17	1.6E-15
PCB-81	3.1E-06	1.6E-05	6.1E-17	8.6E-16	7.3E-18	2.8E-16

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCDD/PCDF - Polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.
PCB - polychlorinated biphenyls
mg/kg-day - milligrams per kilogram per day
mg/kg - milligrams per kilogram

Estimates of Human Intake
Soil Dermal Contact Pathway for Adult Resident - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation: Dosage = $\frac{C \times SA \times AF \times B \times CF \times EF \times ED}{BW \times AT}$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Skin surface area per event	SA	cm^2/day	5700	5700
Soil loading to skin	AF	mg/cm^2	0.01	0.07
Bioavailability	B	fraction	CS	CS
Conversion factor	CF	kg/mg	1.E-06	1.E-06
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	9	24
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
Inorganic Compounds							
Aluminum	NC	NC	NA	NA	NA	NA	0.01
Antimony	NC	NC	NA	NA	NA	NA	0.01
Arsenic	NC	NC	NA	NA	NA	NA	0.03
Cadmium	1.9E-01	3.0E-01	1.5E-10	1.7E-09	1.8E-11	5.3E-10	0.001
Chromium	NC	NC	NA	NA	NA	NA	0.01
Copper	9.7E+00	1.8E+01	7.6E-08	9.6E-07	9.1E-09	3.1E-07	0.01
Fluoride	NC	NC	NA	NA	NA	NA	0.01
Lead	9.2E+00	1.5E+01	7.2E-08	8.0E-07	8.6E-09	2.6E-07	0.01
Mercury	1.7E+00	3.8E+00	1.4E-08	2.1E-07	1.6E-09	6.6E-08	0.01
Methyl Mercury	1.7E-03	3.6E-03	1.4E-11	2.0E-10	1.6E-12	6.3E-11	0.01
Nickel	NC	NC	NA	NA	NA	NA	0.01
Nitrate	NC	NC	NA	NA	NA	NA	0.01
Silver	1.3E+00	2.7E+00	1.0E-08	1.5E-07	1.2E-09	4.7E-08	0.01
Thallium	9.9E-01	3.6E+00	7.8E-09	2.0E-07	9.3E-10	6.3E-08	0.01
Vanadium	NC	NC	NA	NA	NA	NA	0.01
Zinc	6.8E+01	2.2E+02	5.3E-07	1.2E-05	6.3E-08	3.8E-06	0.01
VOCs							
1,1,1-Trichloroethane	NC	NC	NA	NA	NA	NA	0.10
1,1,2-Trichloro-1,2,2-trifluoroethane	1.2E-02	1.2E-02	9.4E-10	6.6E-09	1.1E-10	2.1E-09	0.10
1,1-Dichloroethane	NC	NC	NA	NA	NA	NA	0.10
1,2-Dichloroethane	NC	NC	NA	NA	NA	NA	0.10
1,2-Dichloroethene (total)	NC	NC	NA	NA	NA	NA	0.10
1-Chlorohexane	1.0E-03	1.0E-03	7.8E-11	5.5E-10	9.4E-12	1.7E-10	0.10
2-Butanone	1.9E-02	2.7E-02	1.5E-09	1.5E-08	1.8E-10	4.7E-09	0.10
2-Hexanone	3.0E-03	3.0E-03	2.3E-10	1.6E-09	2.8E-11	5.2E-10	0.10
Acetone	6.2E-01	5.2E+00	4.8E-08	2.8E-06	5.8E-09	9.1E-07	0.10
Benzene	NC	NC	NA	NA	NA	NA	0.10
Carbon disulfide	NC	NC	NA	NA	NA	NA	0.01
Chloromethane	NC	NC	NA	NA	NA	NA	0.10
cis-1,2-Dichloroethene	NC	NC	NA	NA	NA	NA	0.10
Ethylbenzene	NC	NC	NA	NA	NA	NA	0.10
m,p-Xylene	NC	NC	NA	NA	NA	NA	0.10
Methylene chloride	9.9E-03	1.2E-02	7.7E-10	6.4E-09	9.3E-11	2.0E-09	0.10
Tetrachloroethene	NC	NC	NA	NA	NA	NA	0.10
Toluene	NC	NC	NA	NA	NA	NA	0.10
Trichloroethene	NC	NC	NA	NA	NA	NA	0.10
Xylenes (total)	NC	NC	NA	NA	NA	NA	0.10

Spreadsheet C3-60b (2 of 3)

Estimates of Human Intake
Soil Dermal Contact Pathway for Adult Resident - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation: Dosage = $\frac{C \times SA \times AF \times B \times CF \times EF \times ED}{BW \times AT}$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Skin surface area per event	SA	cm^2/day	5700	5700
Soil loading to skin	AF	mg/cm^2	0.01	0.07
Bioavailability	B	fraction	CS	CS
Conversion factor	CF	kg/mg	1.E-06	1.E-06
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	9	24
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
SVOCs							
2-Methylnaphthalene	2.2E-02	2.5E-02	2.2E-09	1.8E-08	2.6E-10	5.7E-09	0.13
Acenaphthene	6.8E-02	2.5E-01	6.9E-09	1.8E-07	8.3E-10	5.8E-08	0.13
Acenaphthylene	4.9E-03	1.4E-02	5.0E-10	9.7E-09	6.0E-11	3.1E-09	0.13
Anthracene	1.9E-01	9.9E-01	2.0E-08	7.0E-07	2.4E-09	2.2E-07	0.13
Benzo(a)anthracene	8.2E-01	1.4E+01	8.3E-08	9.9E-06	9.9E-09	3.2E-06	0.13
Benzo(a)pyrene	8.8E-01	1.5E+01	8.9E-08	1.1E-05	1.1E-08	3.4E-06	0.13
Benzo(e)pyrene	2.0E-02	5.5E-02	2.0E-09	3.9E-08	2.4E-10	1.3E-08	0.13
Benzo(b)fluoranthene	7.8E-01	6.9E+00	7.9E-08	4.9E-06	9.5E-09	1.6E-06	0.13
Benzo(g,h,i)perylene	2.7E-01	2.4E+00	2.7E-08	1.7E-06	3.2E-09	5.5E-07	0.13
Benzo(k)fluoranthene	8.7E-01	1.5E+01	8.8E-08	1.1E-05	1.1E-08	3.4E-06	0.13
Chrysene	6.0E-01	6.5E+00	6.0E-08	4.6E-06	7.3E-09	1.5E-06	0.13
Dibenz(a,h)anthracene	1.2E-01	1.1E+00	1.2E-08	7.9E-07	1.4E-09	2.5E-07	0.13
Dibenzofuran	2.8E-01	2.8E-01	2.8E-08	2.0E-07	3.4E-09	6.4E-08	0.13
Fluoranthene	1.5E+00	1.3E+01	1.5E-07	9.3E-06	1.8E-08	3.0E-06	0.13
Fluorene	7.0E-02	2.6E-01	7.1E-09	1.8E-07	8.5E-10	5.9E-08	0.13
Indeno(1,2,3-cd)pyrene	3.7E-01	3.3E+00	3.8E-08	2.4E-06	4.5E-09	7.6E-07	0.13
Naphthalene	2.0E-02	5.8E-02	2.0E-09	4.1E-08	2.4E-10	1.3E-08	0.13
Perylene	1.1E-02	3.1E-02	1.1E-09	2.2E-08	1.3E-10	7.1E-09	0.13
Phenanthrene	7.0E-01	5.8E+00	7.1E-08	4.1E-06	8.5E-09	1.3E-06	0.13
Pyrene	1.2E+00	1.1E+01	1.2E-07	7.8E-06	1.5E-08	2.5E-06	0.13
Total Petroleum Hydrocarbons							
C11-C14(Kerosene Range)	7.8E+00	3.8E+01	7.9E-07	2.7E-05	9.5E-08	8.7E-06	0.13
C14-C20(Diesel Range)	7.3E+00	1.8E+01	7.4E-07	1.3E-05	8.9E-08	4.1E-06	0.13
C20-C30(Lubricant Oil Range)	7.9E+01	4.3E+02	8.0E-06	3.0E-04	9.6E-07	9.7E-05	0.13
PCDD/PCDFs							
2,3,7,8-TCDD	1.5E-07	3.5E-07	3.5E-15	5.7E-14	4.2E-16	1.8E-14	0.03
1,2,3,7,8-PeCDD	5.6E-07	1.3E-06	1.3E-14	2.2E-13	1.6E-15	6.9E-14	0.03
1,2,3,4,7,8-HxCDD	1.6E-06	3.7E-06	3.8E-14	6.1E-13	4.6E-15	2.0E-13	0.03
1,2,3,6,7,8-HxCDD	8.3E-06	1.9E-05	2.0E-13	3.1E-12	2.3E-14	9.8E-13	0.03
1,2,3,7,8,9-HxCDD	3.4E-06	8.7E-06	8.0E-14	1.4E-12	9.7E-15	4.6E-13	0.03
1,2,3,4,6,7,8-HpCDD	2.4E-04	4.9E-04	5.5E-12	8.1E-11	6.6E-13	2.6E-11	0.03
OCDD	3.7E-03	7.3E-03	8.7E-11	1.2E-09	1.0E-11	3.8E-10	0.03
2,3,7,8-TCDF	3.6E-07	7.8E-07	8.5E-15	1.3E-13	1.0E-15	4.1E-14	0.03
1,2,3,7,8-PeCDF	1.5E-07	3.9E-07	3.4E-15	6.4E-14	4.1E-16	2.0E-14	0.03
2,3,4,7,8-PeCDF	4.2E-07	9.0E-07	9.8E-15	1.5E-13	1.2E-15	4.7E-14	0.03
1,2,3,4,7,8-HxCDF	8.8E-07	1.7E-06	2.1E-14	2.8E-13	2.5E-15	9.1E-14	0.03

Spreadsheet C3-60b (3 of 3)

Estimates of Human Intake
Soil Dermal Contact Pathway for Adult Resident - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation: Dosage = $\frac{C \times SA \times AF \times B \times CF \times EF \times ED}{BW \times AT}$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Skin surface area per event	SA	cm^2/day	5700	5700
Soil loading to skin	AF	mg/cm^2	0.01	0.07
Bioavailability	B	fraction	CS	CS
Conversion factor	CF	kg/mg	1.E-06	1.E-06
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	9	24
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
1,2,3,6,7,8-HxCDF	7.2E-07	1.6E-06	1.7E-14	2.7E-13	2.0E-15	8.5E-14	0.03
2,3,4,6,7,8-HxCDF	1.4E-06	2.8E-06	3.2E-14	4.7E-13	3.8E-15	1.5E-13	0.03
1,2,3,7,8,9-HxCDF	1.4E-07	1.8E-07	3.3E-15	2.9E-14	3.9E-16	9.2E-15	0.03
1,2,3,4,6,7,8-HpCDF	2.8E-05	5.0E-05	6.4E-13	8.2E-12	7.7E-14	2.6E-12	0.03
1,2,3,4,7,8,9-HpCDF	2.4E-06	4.2E-06	5.6E-14	7.0E-13	6.7E-15	2.2E-13	0.03
OCDF	7.5E-05	1.5E-04	1.8E-12	2.5E-11	2.1E-13	7.9E-12	0.03
PCBs							
Aroclor-1254	1.6E-01	4.3E-01	1.8E-08	3.3E-07	2.1E-09	1.1E-07	0.14
Aroclor-1260	1.4E+00	7.7E+00	1.5E-07	5.9E-06	1.8E-08	1.9E-06	0.14
PCB-105	1.2E-04	6.3E-04	1.3E-11	4.8E-10	1.6E-12	1.5E-10	0.14
PCB-114	2.3E-06	1.1E-05	2.5E-13	8.5E-12	3.0E-14	2.7E-12	0.14
PCB-118	2.4E-04	1.3E-03	2.6E-11	9.6E-10	3.2E-12	3.1E-10	0.14
PCB-123	3.4E-06	1.8E-05	3.7E-13	1.4E-11	4.4E-14	4.3E-12	0.14
PCB-126	9.2E-06	4.9E-05	1.0E-12	3.7E-11	1.2E-13	1.2E-11	0.14
PCB-156	7.9E-05	4.2E-04	8.6E-12	3.2E-10	1.0E-12	1.0E-10	0.14
PCB-157	3.5E-05	1.9E-04	3.8E-12	1.4E-10	4.5E-13	4.6E-11	0.14
PCB-167	6.0E-05	3.3E-04	6.6E-12	2.5E-10	7.9E-13	8.0E-11	0.14
PCB-169	9.0E-07	4.9E-06	9.8E-14	3.7E-12	1.2E-14	1.2E-12	0.14
PCB-189	9.0E-06	4.9E-05	9.8E-13	3.7E-11	1.2E-13	1.2E-11	0.14
PCB-77	1.8E-05	9.7E-05	2.0E-12	7.5E-11	2.4E-13	2.4E-11	0.14
PCB-81	3.3E-06	1.7E-05	3.6E-13	1.3E-11	4.3E-14	4.2E-12	0.14

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005),
except dermal absorption factors which were taken from USEPA (2001).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCDD/PCDF - Polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.
PCB - polychlorinated biphenyls
mg/kg-day - milligrams per kilogram per day
mg/kg - milligrams per kilogram

Estimates of Human Intake
Soil Dermal Contact Pathway for Adult Resident - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation: Dosage = $\frac{C \times SA \times AF \times B \times CF \times EF \times ED}{BW \times AT}$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Skin surface area per event	SA	cm^2/day	5700	5700
Soil loading to skin	AF	mg/cm^2	0.01	0.07
Bioavailability	B	fraction	CS	CS
Conversion factor	CF	kg/mg	1.E-06	1.E-06
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	9	24
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
Inorganic Compounds							
Cadmium	5.1E-01	1.1E+00	4.0E-10	6.2E-09	4.8E-11	2.0E-09	0.001
Copper	2.1E+01	4.6E+01	1.6E-07	2.5E-06	2.0E-08	8.0E-07	0.01
Fluoride	NC	NC	NA	NA	NA	NA	0.01
Lead	1.6E+01	3.4E+01	1.3E-07	1.9E-06	1.5E-08	5.9E-07	0.01
Mercury	1.9E+00	4.4E+00	1.5E-08	2.4E-07	1.8E-09	7.7E-08	0.01
Methyl Mercury	1.7E-03	3.6E-03	1.4E-11	2.0E-10	1.6E-12	6.3E-11	0.01
Nitrate	NC	NC	NA	NA	NA	NA	0.01
Silver	7.7E-01	2.9E+00	6.0E-09	1.6E-07	7.3E-10	5.0E-08	0.01
Thallium	3.3E-01	3.3E-01	2.6E-09	1.8E-08	3.1E-10	5.8E-09	0.01
Zinc	1.7E+02	4.4E+02	1.3E-06	2.4E-05	1.6E-07	7.6E-06	0.01
VOCs							
1,1,1-Trichloroethane	NC	NC	NA	NA	NA	NA	0.10
1,1,2-Trichloro-1,2,2-trifluoroethane	1.2E-02	1.2E-02	9.4E-10	6.6E-09	1.1E-10	2.1E-09	0.10
1,1-Dichloroethane	NC	NC	NA	NA	NA	NA	0.10
1,2-Dichloroethane	NC	NC	NA	NA	NA	NA	0.10
1,2-Dichloroethene (total)	2.8E-02	7.0E-02	2.2E-09	3.8E-08	2.6E-10	1.2E-08	0.10
1-Chlorohexane	NC	NC	NA	NA	NA	NA	0.10
2-Butanone	3.7E-02	3.7E-02	2.9E-09	2.0E-08	3.5E-10	6.5E-09	0.10
2-Hexanone	NC	NC	NA	NA	NA	NA	0.10
Acetone	6.8E-01	4.2E+00	5.3E-08	2.3E-06	6.4E-09	7.3E-07	0.10
Benzene	NC	NC	NA	NA	NA	NA	0.10
Carbon disulfide	NC	NC	NA	NA	NA	NA	0.01
Chloromethane	NC	NC	NA	NA	NA	NA	0.10
cis-1,2-Dichloroethene	NC	NC	NA	NA	NA	NA	0.10
Ethylbenzene	NC	NC	NA	NA	NA	NA	0.10
m,p-Xylene	NC	NC	NA	NA	NA	NA	0.10
Methylene chloride	1.3E-02	1.3E-02	1.0E-09	7.1E-09	1.2E-10	2.3E-09	0.10
Tetrachloroethene	2.1E-02	8.8E-02	1.6E-09	4.8E-08	1.9E-10	1.5E-08	0.10
Toluene	5.6E-02	3.4E-01	4.4E-09	1.9E-07	5.3E-10	6.0E-08	0.10
Trichloroethene	3.7E-02	2.0E-01	2.9E-09	1.1E-07	3.5E-10	3.5E-08	0.10
Xylenes (total)	2.5E-02	5.1E-02	2.0E-09	2.8E-08	2.4E-10	9.0E-09	0.10
SVOCs							
2-Methylnaphthalene	NC	NC	NA	NA	NA	NA	0.13
Acenaphthene	4.4E-02	1.0E-01	4.5E-09	7.1E-08	5.4E-10	2.3E-08	0.13
Acenaphthylene	3.1E-02	8.5E-02	3.1E-09	6.0E-08	3.8E-10	1.9E-08	0.13
Anthracene	3.9E-02	8.2E-02	3.9E-09	5.8E-08	4.7E-10	1.9E-08	0.13

Spreadsheet C3-60a (2 of 3)

Estimates of Human Intake
Soil Dermal Contact Pathway for Adult Resident - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation: Dosage = $\frac{C \times SA \times AF \times B \times CF \times EF \times ED}{BW \times AT}$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Skin surface area per event	SA	cm^2/day	5700	5700
Soil loading to skin	AF	mg/cm^2	0.01	0.07
Bioavailability	B	fraction	CS	CS
Conversion factor	CF	kg/mg	1.E-06	1.E-06
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	9	24
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
Benzo(a)anthracene	3.6E-02	1.5E-01	3.6E-09	1.1E-07	4.4E-10	3.4E-08	0.13
Benzo(a)pyrene	3.6E-02	1.5E-01	3.7E-09	1.1E-07	4.4E-10	3.4E-08	0.13
Benzo(e)pyrene	1.9E-02	6.3E-02	1.9E-09	4.4E-08	2.3E-10	1.4E-08	0.13
Benzo(b)fluoranthene	4.9E-02	2.7E-01	5.0E-09	1.9E-07	5.9E-10	6.0E-08	0.13
Benzo(g,h,i)perylene	4.1E-02	9.0E-02	4.2E-09	6.4E-08	5.0E-10	2.0E-08	0.13
Benzo(k)fluoranthene	3.0E-02	8.5E-02	3.0E-09	6.0E-08	3.6E-10	1.9E-08	0.13
Chrysene	4.4E-02	2.2E-01	4.5E-09	1.5E-07	5.4E-10	4.9E-08	0.13
Dibenz(a,h)anthracene	2.9E-02	8.5E-02	3.0E-09	6.0E-08	3.5E-10	1.9E-08	0.13
Dibenzofuran	NC	NC	NA	NA	NA	NA	0.13
Fluoranthene	6.0E-02	3.8E-01	6.1E-09	2.7E-07	7.3E-10	8.5E-08	0.13
Fluorene	4.4E-02	1.0E-01	4.5E-09	7.1E-08	5.4E-10	2.3E-08	0.13
Indeno(1,2,3-cd)pyrene	3.4E-02	1.4E-01	3.5E-09	9.6E-08	4.2E-10	3.1E-08	0.13
Naphthalene	NC	NC	NA	NA	NA	NA	0.13
Perylene	1.1E-02	3.6E-02	1.1E-09	2.5E-08	1.3E-10	8.1E-09	0.13
Phenanthrene	7.9E-02	2.0E-01	8.1E-09	1.4E-07	9.7E-10	4.6E-08	0.13
Pyrene	5.3E-02	1.6E-01	5.4E-09	1.1E-07	6.5E-10	3.5E-08	0.13
Total Petroleum Hydrocarbons							
C11-C14(Kerosene Range)	9.7E+00	4.0E+01	9.8E-07	2.8E-05	1.2E-07	9.1E-06	0.13
C14-C20(Diesel Range)	7.5E+00	7.5E+00	7.6E-07	5.3E-06	9.1E-08	1.7E-06	0.13
C20-C30(Lubricant Oil Range)	7.3E+01	4.7E+02	7.4E-06	3.3E-04	8.9E-07	1.1E-04	0.13
PCDD/PCDFs							
2,3,7,8-TCDD	2.7E-07	5.3E-07	6.4E-15	8.8E-14	7.7E-16	2.8E-14	0.03
1,2,3,7,8-PeCDD	1.1E-06	2.2E-06	2.6E-14	3.6E-13	3.1E-15	1.1E-13	0.03
1,2,3,4,7,8-HxCDD	4.1E-06	9.0E-06	9.6E-14	1.5E-12	1.2E-14	4.7E-13	0.03
1,2,3,6,7,8-HxCDD	1.6E-05	3.0E-05	3.7E-13	4.9E-12	4.4E-14	1.6E-12	0.03
1,2,3,7,8,9-HxCDD	5.9E-06	1.0E-05	1.4E-13	1.6E-12	1.7E-14	5.2E-13	0.03
1,2,3,4,6,7,8-HpCDD	5.7E-04	1.2E-03	1.3E-11	1.9E-10	1.6E-12	6.2E-11	0.03
OCDD	8.4E-03	1.7E-02	2.0E-10	2.8E-09	2.4E-11	8.8E-10	0.03
2,3,7,8-TCDF	5.5E-07	7.9E-07	1.3E-14	1.3E-13	1.5E-15	4.1E-14	0.03
1,2,3,7,8-PeCDF	2.8E-07	5.7E-07	6.5E-15	9.4E-14	7.8E-16	3.0E-14	0.03
2,3,4,7,8-PeCDF	8.2E-07	1.6E-06	1.9E-14	2.6E-13	2.3E-15	8.2E-14	0.03
1,2,3,4,7,8-HxCDF	1.8E-06	3.3E-06	4.2E-14	5.5E-13	5.0E-15	1.8E-13	0.03
1,2,3,6,7,8-HxCDF	1.6E-06	3.2E-06	3.6E-14	5.2E-13	4.4E-15	1.7E-13	0.03
2,3,4,6,7,8-HxCDF	3.8E-06	8.8E-06	9.0E-14	1.4E-12	1.1E-14	4.6E-13	0.03
1,2,3,7,8,9-HxCDF	3.6E-07	9.7E-07	8.5E-15	1.6E-13	1.0E-15	5.1E-14	0.03
1,2,3,4,6,7,8-HpCDF	5.3E-05	9.6E-05	1.2E-12	1.6E-11	1.5E-13	5.0E-12	0.03
1,2,3,4,7,8,9-HpCDF	4.9E-06	9.2E-06	1.1E-13	1.5E-12	1.4E-14	4.8E-13	0.03
OCDF	1.4E-04	2.4E-04	3.2E-12	3.9E-11	3.8E-13	1.2E-11	0.03

Spreadsheet C3-60a (3 of 3)

Estimates of Human Intake
Soil Dermal Contact Pathway for Adult Resident - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation: Dosage = $\frac{C \times SA \times AF \times B \times CF \times EF \times ED}{BW \times AT}$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Skin surface area per event	SA	cm^2/day	5700	5700
Soil loading to skin	AF	mg/cm^2	0.01	0.07
Bioavailability	B	fraction	CS	CS
Conversion factor	CF	kg/mg	1.E-06	1.E-06
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	9	24
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
PCBs							
Aroclor-1254	1.6E-01	4.3E-01	1.8E-08	3.3E-07	2.1E-09	1.1E-07	0.14
Aroclor-1260	1.3E+00	7.3E+00	1.5E-07	5.6E-06	1.7E-08	1.8E-06	0.14
PCB-105	1.1E-04	5.6E-04	1.2E-11	4.3E-10	1.5E-12	1.4E-10	0.14
PCB-114	2.2E-06	1.0E-05	2.4E-13	7.7E-12	2.9E-14	2.5E-12	0.14
PCB-118	2.3E-04	1.1E-03	2.5E-11	8.6E-10	3.0E-12	2.8E-10	0.14
PCB-123	3.2E-06	1.6E-05	3.5E-13	1.2E-11	4.2E-14	3.9E-12	0.14
PCB-126	8.8E-06	4.4E-05	9.6E-13	3.4E-11	1.1E-13	1.1E-11	0.14
PCB-156	7.5E-05	3.8E-04	8.2E-12	2.9E-10	9.8E-13	9.2E-11	0.14
PCB-157	3.3E-05	1.7E-04	3.6E-12	1.3E-10	4.3E-13	4.1E-11	0.14
PCB-167	5.7E-05	2.9E-04	6.3E-12	2.3E-10	7.5E-13	7.2E-11	0.14
PCB-169	8.6E-07	4.4E-06	9.4E-14	3.4E-12	1.1E-14	1.1E-12	0.14
PCB-189	8.6E-06	4.4E-05	9.3E-13	3.4E-11	1.1E-13	1.1E-11	0.14
PCB-77	1.8E-05	8.8E-05	1.9E-12	6.7E-11	2.3E-13	2.2E-11	0.14
PCB-81	3.1E-06	1.6E-05	3.4E-13	1.2E-11	4.1E-14	3.8E-12	0.14

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005), except dermal absorption factors which were taken from USEPA (2001).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCDD/PCDF - Polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.
PCB - polychlorinated biphenyls
mg/kg-day - milligrams per kilogram per day
mg/kg - milligrams per kilogram

Estimates of Human Intake
Soil Ingestion Pathway for Adult Resident - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times CF \times FT \times EF \times ED \times B}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Soil ingestion rate	IR	mg/day	50	100
Conversion factor	CF	kg/mg	1.E-06	1.E-06
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	9	24
Bioavailability	B	fraction	CS	CS
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
Inorganic Compounds							
Aluminum	NC	NC	NA	NA	NA	NA	1
Antimony	NC	NC	NA	NA	NA	NA	1
Arsenic	NC	NC	NA	NA	NA	NA	1
Cadmium	1.9E-01	3.0E-01	1.3E-07	4.2E-07	1.6E-08	1.3E-07	1
Chromium	NC	NC	NA	NA	NA	NA	1
Copper	9.7E+00	1.8E+01	6.6E-06	2.4E-05	8.0E-07	7.7E-06	1
Fluoride	NC	NC	NA	NA	NA	NA	1
Lead	9.2E+00	1.5E+01	6.3E-06	2.0E-05	7.5E-07	6.4E-06	1
Mercury	1.7E+00	3.8E+00	1.2E-06	5.2E-06	1.4E-07	1.7E-06	1
Methyl Mercury	1.7E-03	3.6E-03	1.2E-09	5.0E-09	1.4E-10	1.6E-09	1
Nickel	NC	NC	NA	NA	NA	NA	1
Nitrate	NC	NC	NA	NA	NA	NA	1
Silver	1.3E+00	2.7E+00	8.9E-07	3.7E-06	1.1E-07	1.2E-06	1
Thallium	9.9E-01	3.6E+00	6.8E-07	4.9E-06	8.2E-08	1.6E-06	1
Vanadium	NC	NC	NA	NA	NA	NA	1
Zinc	6.8E+01	2.2E+02	4.6E-05	3.0E-04	5.6E-06	9.6E-05	1
VOCs							
1,1,1-Trichloroethane	NC	NC	NA	NA	NA	NA	1
1,1,2-Trichloro-1,2,2-trifluoroethane	1.2E-02	1.2E-02	8.2E-09	1.6E-08	9.9E-10	5.3E-09	1
1,1-Dichloroethane	NC	NC	NA	NA	NA	NA	1
1,2-Dichloroethane	NC	NC	NA	NA	NA	NA	1
1,2-Dichloroethene (total)	NC	NC	NA	NA	NA	NA	1
1-Chlorohexane	1.0E-03	1.0E-03	6.8E-10	1.4E-09	8.2E-11	4.4E-10	1
2-Butanone	1.9E-02	2.7E-02	1.3E-08	3.7E-08	1.6E-09	1.2E-08	1
2-Hexanone	3.0E-03	3.0E-03	2.1E-09	4.1E-09	2.5E-10	1.3E-09	1
Acetone	6.2E-01	5.2E+00	4.2E-07	7.1E-06	5.1E-08	2.3E-06	1
Benzene	NC	NC	NA	NA	NA	NA	1
Carbon disulfide	NC	NC	NA	NA	NA	NA	1
Chloromethane	NC	NC	NA	NA	NA	NA	1
cis-1,2-Dichloroethene	NC	NC	NA	NA	NA	NA	1
Ethylbenzene	NC	NC	NA	NA	NA	NA	1
m,p-Xylene	NC	NC	NA	NA	NA	NA	1
Methylene chloride	9.9E-03	1.2E-02	6.8E-09	1.6E-08	8.1E-10	5.1E-09	1
Tetrachloroethene	NC	NC	NA	NA	NA	NA	1
Toluene	NC	NC	NA	NA	NA	NA	1
Trichloroethene	NC	NC	NA	NA	NA	NA	1
Xylenes (total)	NC	NC	NA	NA	NA	NA	1

Spreadsheet C3-59b (2 of 3)

Estimates of Human Intake
Soil Ingestion Pathway for Adult Resident - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times CF \times FT \times EF \times ED \times B}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Soil ingestion rate	IR	mg/day	50	100
Conversion factor	CF	kg/mg	1.E-06	1.E-06
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	9	24
Bioavailability	B	fraction	CS	CS
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
SVOCs							
2-Methylnaphthalene	2.2E-02	2.5E-02	1.5E-08	3.4E-08	1.8E-09	1.1E-08	1
Acenaphthene	6.8E-02	2.5E-01	4.7E-08	3.5E-07	5.6E-09	1.1E-07	1
Acenaphthylene	4.9E-03	1.4E-02	3.4E-09	1.9E-08	4.0E-10	6.0E-09	1
Anthracene	1.9E-01	9.9E-01	1.3E-07	1.3E-06	1.6E-08	4.3E-07	1
Benzo(a)anthracene	8.2E-01	1.4E+01	5.6E-07	1.9E-05	6.7E-08	6.1E-06	1
Benzo(a)pyrene	8.8E-01	1.5E+01	6.0E-07	2.1E-05	7.2E-08	6.6E-06	1
Benzo(e)pyrene	2.0E-02	5.5E-02	1.3E-08	7.6E-08	1.6E-09	2.4E-08	1
Benzo(b)fluoranthene	7.8E-01	6.9E+00	5.3E-07	9.4E-06	6.4E-08	3.0E-06	1
Benzo(g,h,i)perylene	2.7E-01	2.4E+00	1.8E-07	3.3E-06	2.2E-08	1.1E-06	1
Benzo(k)fluoranthene	8.7E-01	1.5E+01	5.9E-07	2.1E-05	7.1E-08	6.6E-06	1
Chrysene	6.0E-01	6.5E+00	4.1E-07	8.9E-06	4.9E-08	2.8E-06	1
Dibenz(a,h)anthracene	1.2E-01	1.1E+00	7.9E-08	1.5E-06	9.5E-09	4.9E-07	1
Dibenzofuran	2.8E-01	2.8E-01	1.9E-07	3.8E-07	2.3E-08	1.2E-07	1
Fluoranthene	1.5E+00	1.3E+01	1.0E-06	1.8E-05	1.2E-07	5.7E-06	1
Fluorene	7.0E-02	2.6E-01	4.8E-08	3.5E-07	5.7E-09	1.1E-07	1
Indeno(1,2,3-cd)pyrene	3.7E-01	3.3E+00	2.5E-07	4.6E-06	3.0E-08	1.5E-06	1
Naphthalene	2.0E-02	5.8E-02	1.3E-08	7.9E-08	1.6E-09	2.5E-08	1
Perylene	1.1E-02	3.1E-02	7.6E-09	4.3E-08	9.1E-10	1.4E-08	1
Phenanthrene	7.0E-01	5.8E+00	4.8E-07	8.0E-06	5.7E-08	2.5E-06	1
Pyrene	1.2E+00	1.1E+01	8.3E-07	1.5E-05	1.0E-07	4.8E-06	1
Total Petroleum Hydrocarbons							
C11-C14(Kerosene Range)	7.8E+00	3.8E+01	5.3E-06	5.2E-05	6.4E-07	1.7E-05	1
C14-C20(Diesel Range)	7.3E+00	1.8E+01	5.0E-06	2.5E-05	6.0E-07	7.9E-06	1
C20-C30(Lubricant Oil Range)	7.9E+01	4.3E+02	5.4E-05	5.8E-04	6.5E-06	1.9E-04	1
PCDD/PCDFs							
2,3,7,8-TCDD	1.5E-07	3.5E-07	1.0E-13	4.8E-13	1.2E-14	1.5E-13	1
1,2,3,7,8-PeCDD	5.6E-07	1.3E-06	3.9E-13	1.8E-12	4.6E-14	5.8E-13	1
1,2,3,4,7,8-HxCDD	1.6E-06	3.7E-06	1.1E-12	5.1E-12	1.3E-13	1.6E-12	1
1,2,3,6,7,8-HxCDD	8.3E-06	1.9E-05	5.7E-12	2.6E-11	6.8E-13	8.2E-12	1
1,2,3,7,8,9-HxCDD	3.4E-06	8.7E-06	2.4E-12	1.2E-11	2.8E-13	3.8E-12	1
1,2,3,4,6,7,8-HpCDD	2.4E-04	4.9E-04	1.6E-10	6.8E-10	1.9E-11	2.2E-10	1
OCDD	3.7E-03	7.3E-03	2.5E-09	1.0E-08	3.1E-10	3.2E-09	1
2,3,7,8-TCDF	3.6E-07	7.8E-07	2.5E-13	1.1E-12	3.0E-14	3.4E-13	1
1,2,3,7,8-PeCDF	1.5E-07	3.9E-07	1.0E-13	5.3E-13	1.2E-14	1.7E-13	1
2,3,4,7,8-PeCDF	4.2E-07	9.0E-07	2.9E-13	1.2E-12	3.5E-14	3.9E-13	1
1,2,3,4,7,8-HxCDF	8.8E-07	1.7E-06	6.0E-13	2.4E-12	7.2E-14	7.6E-13	1
1,2,3,6,7,8-HxCDF	7.2E-07	1.6E-06	4.9E-13	2.2E-12	5.9E-14	7.1E-13	1
2,3,4,6,7,8-HxCDF	1.4E-06	2.8E-06	9.3E-13	3.9E-12	1.1E-13	1.2E-12	1

Spreadsheet C3-59b (3 of 3)

Estimates of Human Intake
Soil Ingestion Pathway for Adult Resident - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times CF \times FT \times EF \times ED \times B}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Soil ingestion rate	IR	mg/day	50	100
Conversion factor	CF	kg/mg	1.E-06	1.E-06
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	9	24
Bioavailability	B	fraction	CS	CS
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
1,2,3,7,8,9-HxCDF	1.4E-07	1.8E-07	9.5E-14	2.4E-13	1.1E-14	7.7E-14	1
1,2,3,4,6,7,8-HpCDF	2.8E-05	5.0E-05	1.9E-11	6.8E-11	2.3E-12	2.2E-11	1
1,2,3,4,7,8,9-HpCDF	2.4E-06	4.2E-06	1.6E-12	5.8E-12	2.0E-13	1.9E-12	1
OCDF	7.5E-05	1.5E-04	5.1E-11	2.1E-10	6.2E-12	6.6E-11	1
PCBs							
Aroclor-1254	1.6E-01	4.3E-01	1.1E-07	5.9E-07	1.3E-08	1.9E-07	1
Aroclor-1260	1.4E+00	7.7E+00	9.6E-07	1.0E-05	1.1E-07	3.4E-06	1
PCB-105	1.2E-04	6.3E-04	8.2E-11	8.6E-10	9.8E-12	2.7E-10	1
PCB-114	2.3E-06	1.1E-05	1.6E-12	1.5E-11	1.9E-13	4.9E-12	1
PCB-118	2.4E-04	1.3E-03	1.6E-10	1.7E-09	2.0E-11	5.5E-10	1
PCB-123	3.4E-06	1.8E-05	2.3E-12	2.4E-11	2.8E-13	7.8E-12	1
PCB-126	9.2E-06	4.9E-05	6.3E-12	6.7E-11	7.5E-13	2.1E-11	1
PCB-156	7.9E-05	4.2E-04	5.4E-11	5.7E-10	6.5E-12	1.8E-10	1
PCB-157	3.5E-05	1.9E-04	2.4E-11	2.6E-10	2.8E-12	8.2E-11	1
PCB-167	6.0E-05	3.3E-04	4.1E-11	4.5E-10	5.0E-12	1.4E-10	1
PCB-169	9.0E-07	4.9E-06	6.2E-13	6.7E-12	7.4E-14	2.1E-12	1
PCB-189	9.0E-06	4.9E-05	6.1E-12	6.7E-11	7.4E-13	2.1E-11	1
PCB-77	1.8E-05	9.7E-05	1.3E-11	1.3E-10	1.5E-12	4.3E-11	1
PCB-81	3.3E-06	1.7E-05	2.2E-12	2.4E-11	2.7E-13	7.5E-12	1

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCDD/PCDF - Polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.
PCB - polychlorinated biphenyls
mg/kg-day - milligrams per kilogram per day
mg/kg - milligrams per kilogram

Estimates of Human Intake
Soil Ingestion Pathway for Adult Resident - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times CF \times FT \times EF \times ED \times B}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Soil ingestion rate	IR	mg/day	50	100
Conversion factor	CF	kg/mg	1.E-06	1.E-06
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	9	24
Bioavailability	B	fraction	CS	CS
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
Inorganic Compounds							
Cadmium	5.1E-01	1.1E+00	3.5E-07	1.6E-06	4.2E-08	5.0E-07	1
Copper	2.1E+01	4.6E+01	1.4E-05	6.3E-05	1.7E-06	2.0E-05	1
Fluoride	NC	NC	NA	NA	NA	NA	1
Lead	1.6E+01	3.4E+01	1.1E-05	4.6E-05	1.3E-06	1.5E-05	1
Mercury	1.9E+00	4.4E+00	1.3E-06	6.1E-06	1.6E-07	1.9E-06	1
Methyl Mercury	1.7E-03	3.6E-03	1.2E-09	5.0E-09	1.4E-10	1.6E-09	1
Nitrate	NC	NC	NA	NA	NA	NA	1
Silver	7.7E-01	2.9E+00	5.3E-07	3.9E-06	6.4E-08	1.3E-06	1
Thallium	3.3E-01	3.3E-01	2.3E-07	4.5E-07	2.7E-08	1.4E-07	1
Zinc	1.7E+02	4.4E+02	1.2E-04	6.0E-04	1.4E-05	1.9E-04	1
VOCs							
1,1,1-Trichloroethane	NC	NC	NA	NA	NA	NA	1
1,1,2-Trichloro-1,2,2-trifluoroethane	1.2E-02	1.2E-02	8.2E-09	1.6E-08	9.9E-10	5.3E-09	1
1,1-Dichloroethane	NC	NC	NA	NA	NA	NA	1
1,2-Dichloroethane	NC	NC	NA	NA	NA	NA	1
1,2-Dichloroethene (total)	2.8E-02	7.0E-02	1.9E-08	9.6E-08	2.3E-09	3.1E-08	1
1-Chlorohexane	NC	NC	NA	NA	NA	NA	1
2-Butanone	3.7E-02	3.7E-02	2.5E-08	5.1E-08	3.0E-09	1.6E-08	1
2-Hexanone	NC	NC	NA	NA	NA	NA	1
Acetone	6.8E-01	4.2E+00	4.6E-07	5.7E-06	5.6E-08	1.8E-06	1
Benzene	NC	NC	NA	NA	NA	NA	1
Carbon disulfide	NC	NC	NA	NA	NA	NA	1
Chloromethane	NC	NC	NA	NA	NA	NA	1
cis-1,2-Dichloroethene	NC	NC	NA	NA	NA	NA	1
Ethylbenzene	NC	NC	NA	NA	NA	NA	1
m,p-Xylene	NC	NC	NA	NA	NA	NA	1
Methylene chloride	1.3E-02	1.3E-02	8.9E-09	1.8E-08	1.1E-09	5.7E-09	1
Tetrachloroethene	2.1E-02	8.8E-02	1.4E-08	1.2E-07	1.7E-09	3.9E-08	1
Toluene	5.6E-02	3.4E-01	3.8E-08	4.7E-07	4.6E-09	1.5E-07	1
Trichloroethene	3.7E-02	2.0E-01	2.5E-08	2.8E-07	3.0E-09	8.9E-08	1
Xylenes (total)	2.5E-02	5.1E-02	1.7E-08	7.0E-08	2.1E-09	2.2E-08	1
SVOCs							
2-Methylnaphthalene	NC	NC	NA	NA	NA	NA	1
Acenaphthene	4.4E-02	1.0E-01	3.0E-08	1.4E-07	3.6E-09	4.4E-08	1
Acenaphthylene	3.1E-02	8.5E-02	2.1E-08	1.2E-07	2.5E-09	3.7E-08	1
Anthracene	3.9E-02	8.2E-02	2.7E-08	1.1E-07	3.2E-09	3.6E-08	1
Benzo(a)anthracene	3.6E-02	1.5E-01	2.5E-08	2.0E-07	3.0E-09	6.5E-08	1

Spreadsheet C3-59a (2 of 3)

Estimates of Human Intake
Soil Ingestion Pathway for Adult Resident - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times CF \times FT \times EF \times ED \times B}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Soil ingestion rate	IR	mg/day	50	100
Conversion factor	CF	kg/mg	1.E-06	1.E-06
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	9	24
Bioavailability	B	fraction	CS	CS
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
Benzo(a)pyrene	3.6E-02	1.5E-01	2.5E-08	2.0E-07	3.0E-09	6.5E-08	1
Benzo(e)pyrene	1.9E-02	6.3E-02	1.3E-08	8.6E-08	1.5E-09	2.7E-08	1
Benzo(b)fluoranthene	4.9E-02	2.7E-01	3.3E-08	3.6E-07	4.0E-09	1.2E-07	1
Benzo(g,h,i)perylene	4.1E-02	9.0E-02	2.8E-08	1.2E-07	3.4E-09	3.9E-08	1
Benzo(k)fluoranthene	3.0E-02	8.5E-02	2.0E-08	1.2E-07	2.4E-09	3.7E-08	1
Chrysene	4.4E-02	2.2E-01	3.0E-08	3.0E-07	3.7E-09	9.5E-08	1
Dibenz(a,h)anthracene	2.9E-02	8.5E-02	2.0E-08	1.2E-07	2.4E-09	3.7E-08	1
Dibenzofuran	NC	NC	NA	NA	NA	NA	1
Fluoranthene	6.0E-02	3.8E-01	4.1E-08	5.1E-07	4.9E-09	1.6E-07	1
Fluorene	4.4E-02	1.0E-01	3.0E-08	1.4E-07	3.6E-09	4.4E-08	1
Indeno(1,2,3-cd)pyrene	3.4E-02	1.4E-01	2.3E-08	1.9E-07	2.8E-09	5.9E-08	1
Naphthalene	NC	NC	NA	NA	NA	NA	1
Perylene	1.1E-02	3.6E-02	7.3E-09	4.9E-08	8.7E-10	1.6E-08	1
Phenanthrene	7.9E-02	2.0E-01	5.4E-08	2.7E-07	6.5E-09	8.8E-08	1
Pyrene	5.3E-02	1.6E-01	3.6E-08	2.1E-07	4.4E-09	6.8E-08	1
Total Petroleum Hydrocarbons							
C11-C14(Kerosene Range)	9.7E+00	4.0E+01	6.6E-06	5.5E-05	7.9E-07	1.8E-05	1
C14-C20(Diesel Range)	7.5E+00	7.5E+00	5.1E-06	1.0E-05	6.1E-07	3.3E-06	1
C20-C30(Lubricant Oil Range)	7.3E+01	4.7E+02	5.0E-05	6.4E-04	6.0E-06	2.1E-04	1
PCDD/PCDFs							
2,3,7,8-TCDD	2.7E-07	5.3E-07	1.9E-13	7.3E-13	2.2E-14	2.3E-13	1
1,2,3,7,8-PeCDD	1.1E-06	2.2E-06	7.5E-13	3.0E-12	9.0E-14	9.5E-13	1
1,2,3,4,7,8-HxCDD	4.1E-06	9.0E-06	2.8E-12	1.2E-11	3.4E-13	4.0E-12	1
1,2,3,6,7,8-HxCDD	1.6E-05	3.0E-05	1.1E-11	4.1E-11	1.3E-12	1.3E-11	1
1,2,3,7,8,9-HxCDD	5.9E-06	1.0E-05	4.0E-12	1.4E-11	4.9E-13	4.4E-12	1
1,2,3,4,6,7,8-HpCDD	5.7E-04	1.2E-03	3.9E-10	1.6E-09	4.6E-11	5.2E-10	1
OCDD	8.4E-03	1.7E-02	5.7E-09	2.3E-08	6.9E-10	7.4E-09	1
2,3,7,8-TCDF	5.5E-07	7.9E-07	3.8E-13	1.1E-12	4.5E-14	3.5E-13	1
1,2,3,7,8-PeCDF	2.8E-07	5.7E-07	1.9E-13	7.9E-13	2.3E-14	2.5E-13	1
2,3,4,7,8-PeCDF	8.2E-07	1.6E-06	5.6E-13	2.1E-12	6.7E-14	6.9E-13	1
1,2,3,4,7,8-HxCDF	1.8E-06	3.3E-06	1.2E-12	4.6E-12	1.5E-13	1.5E-12	1
1,2,3,6,7,8-HxCDF	1.6E-06	3.2E-06	1.1E-12	4.3E-12	1.3E-13	1.4E-12	1
2,3,4,6,7,8-HxCDF	3.8E-06	8.8E-06	2.6E-12	1.2E-11	3.2E-13	3.9E-12	1
1,2,3,7,8,9-HxCDF	3.6E-07	9.7E-07	2.5E-13	1.3E-12	3.0E-14	4.2E-13	1
1,2,3,4,6,7,8-HpCDF	5.3E-05	9.6E-05	3.6E-11	1.3E-10	4.3E-12	4.2E-11	1
1,2,3,4,7,8,9-HpCDF	4.9E-06	9.2E-06	3.3E-12	1.3E-11	4.0E-13	4.1E-12	1
OCDF	1.4E-04	2.4E-04	9.2E-11	3.2E-10	1.1E-11	1.0E-10	1

Spreadsheet C3-59a (3 of 3)

Estimates of Human Intake
Soil Ingestion Pathway for Adult Resident - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times CF \times FT \times EF \times ED \times B}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Soil ingestion rate	IR	mg/day	50	100
Conversion factor	CF	kg/mg	1.E-06	1.E-06
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	9	24
Bioavailability	B	fraction	CS	CS
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
PCBs							
Aroclor-1254	1.6E-01	4.3E-01	1.1E-07	5.9E-07	1.3E-08	1.9E-07	1
Aroclor-1260	1.3E+00	7.3E+00	9.1E-07	1.0E-05	1.1E-07	3.2E-06	1
PCB-105	1.1E-04	5.6E-04	7.8E-11	7.7E-10	9.4E-12	2.5E-10	1
PCB-114	2.2E-06	1.0E-05	1.5E-12	1.4E-11	1.8E-13	4.4E-12	1
PCB-118	2.3E-04	1.1E-03	1.6E-10	1.5E-09	1.9E-11	4.9E-10	1
PCB-123	3.2E-06	1.6E-05	2.2E-12	2.2E-11	2.6E-13	7.0E-12	1
PCB-126	8.8E-06	4.4E-05	6.0E-12	6.0E-11	7.2E-13	1.9E-11	1
PCB-156	7.5E-05	3.8E-04	5.1E-11	5.2E-10	6.2E-12	1.6E-10	1
PCB-157	3.3E-05	1.7E-04	2.3E-11	2.3E-10	2.7E-12	7.4E-11	1
PCB-167	5.7E-05	2.9E-04	3.9E-11	4.0E-10	4.7E-12	1.3E-10	1
PCB-169	8.6E-07	4.4E-06	5.9E-13	6.0E-12	7.0E-14	1.9E-12	1
PCB-189	8.6E-06	4.4E-05	5.9E-12	6.0E-11	7.0E-13	1.9E-11	1
PCB-77	1.8E-05	8.8E-05	1.2E-11	1.2E-10	1.4E-12	3.8E-11	1
PCB-81	3.1E-06	1.6E-05	2.1E-12	2.1E-11	2.6E-13	6.8E-12	1

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCDD/PCDF - Polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.
PCB - polychlorinated biphenyls
mg/kg-day - milligrams per kilogram per day
mg/kg - milligrams per kilogram

Estimates of Human Intake
Surface Water Dermal Contact Pathway for Child Recreator
Sodium Reactor Experiment (SRE) Area

Intake Equation: $$\text{Dosage} = \frac{C \times Kp \times SA \times CF \times EF \times ED \times EV \times ET}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Surface water concentration	C	mg/L	CS	CS
Skin surface area per event	SA	cm^2/day	6560	6560
Bioavailability	B	fraction	CS	CS
Conversion factor	CF	L/cm^3	1.E-03	1.E-03
Event frequency	EV	events/day	0.5	0.5
Exposure frequency	EF	days/year	50	100
Exposure time	ET	hrs/day	1	2
Exposure duration	ED	years	6	6
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/L)	RME EPC (mg/L)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Kp (cm/hr)
Inorganic Compounds							
Aluminum	1.0E+00	1.7E+00	6.6E-06	8.7E-05	5.3E-07	3.5E-06	1.0E-03
Antimony	9.0E-04	1.5E-03	5.8E-09	7.9E-08	4.6E-10	3.2E-09	1.0E-03
Arsenic	6.8E-03	1.1E-02	4.3E-08	5.6E-07	3.5E-09	2.3E-08	1.0E-03
Cadmium	1.5E-04	2.8E-04	9.8E-10	1.4E-08	7.8E-11	5.8E-10	1.0E-03
Chromium	2.3E-03	3.4E-03	1.5E-08	1.7E-07	1.2E-09	7.0E-09	1.0E-03
Copper	4.4E-03	5.7E-03	2.8E-08	2.9E-07	2.2E-09	1.2E-08	1.0E-03
Lead	8.1E-04	1.0E-03	5.2E-10	5.4E-09	4.1E-11	2.1E-10	1.0E-04
Mercury	1.2E-04	1.4E-04	7.6E-10	7.0E-09	6.1E-11	2.8E-10	1.0E-03
Nickel	4.1E-03	4.1E-03	5.3E-09	4.2E-08	4.2E-10	1.7E-09	2.0E-04
Thallium	2.1E-04	2.1E-04	1.3E-09	1.1E-08	1.1E-10	4.3E-10	1.0E-03
Vanadium	4.0E-03	5.7E-03	2.6E-08	2.9E-07	2.1E-09	1.2E-08	1.0E-03
VOCs							
1,1,1-Trichloroethane	7.6E-04	7.6E-04	0.0E+00	0.0E+00	0.0E+00	0.0E+00	0.0E+00
Trichloroethene	6.6E-04	6.6E-04	5.1E-08	4.1E-07	4.1E-09	1.6E-08	1.2E-02
PCDD/PCDFs							
1,2,3,7,8-PeCDD	1.7E-09	1.7E-09	8.7E-12	7.0E-11	7.0E-13	2.8E-12	8.1E-01
1,2,3,4,7,8-HxCDD	2.5E-09	2.5E-09	1.3E-11	1.0E-10	1.0E-12	4.1E-12	8.1E-01
1,2,3,6,7,8-HxCDD	2.7E-08	6.6E-08	1.4E-10	2.7E-09	1.1E-11	1.1E-10	8.1E-01
1,2,3,7,8,9-HxCDD	1.4E-08	1.4E-08	7.3E-11	5.8E-10	5.8E-12	2.3E-11	8.1E-01
1,2,3,4,6,7,8-HpCDD	2.2E-07	1.9E-06	1.1E-09	7.9E-08	9.1E-11	3.2E-09	8.1E-01
OCDD	1.8E-06	2.7E-06	9.3E-09	1.1E-07	7.4E-10	4.4E-09	8.1E-01
2,3,7,8-TCDF	4.0E-09	4.5E-09	2.1E-11	1.9E-10	1.7E-12	7.5E-12	8.1E-01
1,2,3,7,8-PeCDF	7.2E-09	7.2E-09	3.8E-11	3.0E-10	3.0E-12	1.2E-11	8.1E-01
2,3,4,7,8-PeCDF	1.8E-08	2.0E-08	9.4E-11	8.3E-10	7.5E-12	3.3E-11	8.1E-01
1,2,3,4,7,8-HxCDF	1.9E-08	2.1E-08	9.7E-11	8.9E-10	7.8E-12	3.6E-11	8.1E-01
1,2,3,6,7,8-HxCDF	1.1E-08	1.1E-08	5.7E-11	4.6E-10	4.6E-12	1.8E-11	8.1E-01
2,3,4,6,7,8-HxCDF	1.9E-08	2.1E-08	9.9E-11	8.9E-10	7.9E-12	3.6E-11	8.1E-01
1,2,3,7,8,9-HxCDF	1.8E-08	2.3E-08	9.5E-11	9.6E-10	7.6E-12	3.8E-11	8.1E-01
1,2,3,4,6,7,8-HpCDF	2.7E-08	5.1E-08	1.4E-10	2.1E-09	1.1E-11	8.5E-11	8.1E-01
1,2,3,4,7,8,9-HpCDF	1.4E-08	1.4E-08	7.3E-11	5.8E-10	5.8E-12	2.3E-11	8.1E-01
OCDF	7.2E-08	1.3E-07	3.8E-10	5.6E-09	3.0E-11	2.2E-10	8.1E-01

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2004).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2004).

Estimates of Human Intake
Surface Water Dermal Contact Pathway for Child Recreator
Sodium Reactor Experiment (SRE) Area

Intake Equation:

$$\text{Dosage} = \frac{C \times Kp \times SA \times CF \times EF \times ED \times EV \times ET}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Surface water concentration	C	mg/L	CS	CS
Skin surface area per event	SA	cm^2/day	6560	6560
Bioavailability	B	fraction	CS	CS
Conversion factor	CF	L/cm^3	1.E-03	1.E-03
Event frequency	EV	events/day	0.5	0.5
Exposure frequency	EF	days/year	50	100
Exposure time	ET	hrs/day	1	2
Exposure duration	ED	years	6	6
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/L)	RME EPC (mg/L)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Kp (cm/hr)

Typical - typical or average exposure as defined in the SRAM (MWH 2004)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2004)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2004), except dermal absorption factors which were taken from USEPA (2001).
VOC - volatile organic compound
PCDD/PCDF - Polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.
mg/kg-day - milligrams per kilogram per day
mg/kg - milligrams per kilogram

Estimates of Human Intake
Surface Water Ingestion Pathway for Child Recreator
Sodium Reactor Experiment (SRE) Area

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times ET \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Soil ingestion rate	IR	L/hour	0.05	0.05
Exposure time	ET	hrs/day	1	2
Exposure frequency	EF	days/year	50	100
Exposure duration	ED	years	6	6
Bioavailability	B	fraction	CS	CS
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/L)	RME EPC (mg/L)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
Inorganic Compounds							
Aluminum	1.0E+00	1.7E+00	4.7E-04	3.1E-03	3.7E-05	2.5E-04	1
Antimony	9.0E-04	1.5E-03	4.1E-07	2.8E-06	3.3E-08	2.3E-07	1
Arsenic	6.8E-03	1.1E-02	3.1E-06	2.0E-05	2.5E-07	1.6E-06	1
Cadmium	1.5E-04	2.8E-04	6.9E-08	5.1E-07	5.6E-09	4.1E-08	1
Chromium	2.3E-03	3.4E-03	1.1E-06	6.2E-06	8.4E-08	5.0E-07	1
Copper	4.4E-03	5.7E-03	2.0E-06	1.0E-05	1.6E-07	8.3E-07	1
Lead	8.1E-04	1.0E-03	3.7E-07	1.9E-06	2.9E-08	1.5E-07	1
Mercury	1.2E-04	1.4E-04	5.4E-08	2.5E-07	4.3E-09	2.0E-08	1
Nickel	4.1E-03	4.1E-03	1.9E-06	7.5E-06	1.5E-07	6.0E-07	1
Thallium	2.1E-04	2.1E-04	9.6E-08	3.8E-07	7.7E-09	3.1E-08	1
Vanadium	4.0E-03	5.7E-03	1.8E-06	1.0E-05	1.5E-07	8.3E-07	1
VOCs							
1,1,1-Trichloroethane	7.6E-04	7.6E-04	3.5E-07	1.4E-06	2.8E-08	1.1E-07	1
Trichloroethene	6.6E-04	6.6E-04	3.0E-07	1.2E-06	2.4E-08	9.6E-08	1
PCDD/PCDFs							
1,2,3,7,8-PeCDD	1.7E-09	1.7E-09	7.7E-13	3.1E-12	6.1E-14	2.5E-13	1
1,2,3,4,7,8-HxCDD	2.5E-09	2.5E-09	1.1E-12	4.5E-12	9.1E-14	3.6E-13	1
1,2,3,6,7,8-HxCDD	2.7E-08	6.6E-08	1.2E-11	1.2E-10	9.8E-13	9.7E-12	1
1,2,3,7,8,9-HxCDD	1.4E-08	1.4E-08	6.4E-12	2.6E-11	5.1E-13	2.0E-12	1
1,2,3,4,6,7,8-HpCDD	2.2E-07	1.9E-06	1.0E-10	3.5E-09	8.0E-12	2.8E-10	1
OCDD	1.8E-06	2.7E-06	8.1E-10	4.8E-09	6.5E-11	3.9E-10	1
2,3,7,8-TCDF	4.0E-09	4.5E-09	1.8E-12	8.2E-12	1.5E-13	6.5E-13	1
1,2,3,7,8-PeCDF	7.2E-09	7.2E-09	3.3E-12	1.3E-11	2.6E-13	1.1E-12	1
2,3,4,7,8-PeCDF	1.8E-08	2.0E-08	8.2E-12	3.7E-11	6.6E-13	2.9E-12	1
1,2,3,4,7,8-HxCDF	1.9E-08	2.1E-08	8.5E-12	3.9E-11	6.8E-13	3.1E-12	1
1,2,3,6,7,8-HxCDF	1.1E-08	1.1E-08	5.0E-12	2.0E-11	4.0E-13	1.6E-12	1
2,3,4,6,7,8-HxCDF	1.9E-08	2.1E-08	8.7E-12	3.9E-11	7.0E-13	3.1E-12	1
1,2,3,7,8,9-HxCDF	1.8E-08	2.3E-08	8.3E-12	4.2E-11	6.7E-13	3.4E-12	1
1,2,3,4,6,7,8-HpCDF	2.7E-08	5.1E-08	1.2E-11	9.3E-11	1.0E-12	7.4E-12	1
1,2,3,4,7,8,9-HpCDF	1.4E-08	1.4E-08	6.4E-12	2.6E-11	5.1E-13	2.0E-12	1
OCDF	7.2E-08	1.3E-07	3.3E-11	2.4E-10	2.6E-12	2.0E-11	1

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2004).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2004).
Typical - typical or average exposure as defined in the SRAM (MWH 2004)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2004)

Spreadsheet C3-57 (2 of 2)

Estimates of Human Intake
Surface Water Ingestion Pathway for Child Recreator
Sodium Reactor Experiment (SRE) Area

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times ET \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Soil ingestion rate	IR	L/hour	0.05	0.05
Exposure time	ET	hrs/day	1	2
Exposure frequency	EF	days/year	50	100
Exposure duration	ED	years	6	6
Bioavailability	B	fraction	CS	CS
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/L)	RME EPC (mg/L)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)

EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2004).
VOC - volatile organic compound
PCDD/PCDF - Polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.
mg/kg-day - milligrams per kilogram per day

Estimates of Human Intake
Groundwater to Ambient Air Pathway for Child Recreator
Sodium Reactor Experiment (SRE) Area

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	4.4	8.8
Fraction of time outdoors	FT	fraction	1.0	1.0
Exposure frequency	EF	days/year	50	100
Exposure duration	ED	years	6	6
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Inorganic Compounds						
Cadmium	NC	NC	NA	NA	NA	NA
Copper	NC	NC	NA	NA	NA	NA
Fluoride	NC	NC	NA	NA	NA	NA
Lead	NC	NC	NA	NA	NA	NA
Mercury	NC	NC	NA	NA	NA	NA
Methyl Mercury	NC	NC	NA	NA	NA	NA
Nitrate	NC	NC	NA	NA	NA	NA
Silver	NC	NC	NA	NA	NA	NA
Thallium	NC	NC	NA	NA	NA	NA
Zinc	NC	NC	NA	NA	NA	NA
VOCs						
1,1,1-Trichloroethane	NC	NC	NA	NA	NA	NA
1,1,2-Trichloro-1,2,2-trifluoroethane	NC	NC	NA	NA	NA	NA
1,1-Dichloroethane	2.8E-06	2.8E-06	1.1E-07	4.6E-07	9.1E-09	3.7E-08
1,2-Dichloroethane	6.6E-07	6.6E-07	2.6E-08	1.1E-07	2.1E-09	8.5E-09
1,2-Dichloroethene (total)	NC	NC	NA	NA	NA	NA
1-Chlorohexane	NC	NC	NA	NA	NA	NA
2-Butanone	NC	NC	NA	NA	NA	NA
2-Hexanone	NC	NC	NA	NA	NA	NA
Acetone	2.5E-08	2.5E-08	9.9E-10	4.0E-09	7.9E-11	3.2E-10
Benzene	3.2E-06	3.2E-06	1.3E-07	5.2E-07	1.0E-08	4.2E-08
Carbon disulfide	2.2E-05	2.2E-05	8.9E-07	3.6E-06	7.1E-08	2.9E-07
Chloromethane	8.5E-06	8.5E-06	3.4E-07	1.4E-06	2.7E-08	1.1E-07
cis-1,2-Dichloroethene	2.0E-06	2.0E-06	8.1E-08	3.3E-07	6.5E-09	2.6E-08
Ethylbenzene	NC	NC	NA	NA	NA	NA
m,p-Xylene	NC	NC	NA	NA	NA	NA
Methylene chloride	1.5E-06	1.5E-06	6.2E-08	2.5E-07	4.9E-09	2.0E-08
Tetrachloroethene	NC	NC	NA	NA	NA	NA
Toluene	NC	NC	NA	NA	NA	NA
Trichloroethene	5.3E-06	5.3E-06	2.1E-07	8.5E-07	1.7E-08	6.8E-08
Xylenes (total)	NC	NC	NA	NA	NA	NA
SVOCs						
2-Methylnaphthalene	NC	NC	NA	NA	NA	NA
Acenaphthene	NC	NC	NA	NA	NA	NA
Acenaphthylene	NC	NC	NA	NA	NA	NA
Anthracene	NC	NC	NA	NA	NA	NA
Benzo(a)anthracene	NC	NC	NA	NA	NA	NA
Benzo(a)pyrene	NC	NC	NA	NA	NA	NA
Benzo(b)fluoranthene	NC	NC	NA	NA	NA	NA
Benzo(g,h,i)perylene	NC	NC	NA	NA	NA	NA
Benzo(k)fluoranthene	NC	NC	NA	NA	NA	NA
Chrysene	NC	NC	NA	NA	NA	NA
Dibenz(a,h)anthracene	NC	NC	NA	NA	NA	NA
Dibenzofuran	NC	NC	NA	NA	NA	NA
Benzo(e)pyrene	NC	NC	NA	NA	NA	NA
Fluoranthene	NC	NC	NA	NA	NA	NA
Fluorene	NC	NC	NA	NA	NA	NA
Indeno(1,2,3-cd)pyrene	NC	NC	NA	NA	NA	NA

Estimates of Human Intake
Groundwater to Ambient Air Pathway for Child Recreator
Sodium Reactor Experiment (SRE) Area

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	4.4	8.8
Fraction of time outdoors	FT	fraction	1.0	1.0
Exposure frequency	EF	days/year	50	100
Exposure duration	ED	years	6	6
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Naphthalene	NC	NC	NA	NA	NA	NA
Perylene	NC	NC	NA	NA	NA	NA
Phenanthrene	NC	NC	NA	NA	NA	NA
Pyrene	NC	NC	NA	NA	NA	NA
Total Petroleum Hydrocarbons						
C11-C14(Kerosene Range)	NC	NC	NA	NA	NA	NA
C14-C20(Diesel Range)	NC	NC	NA	NA	NA	NA
C20-C30(Lubricant Oil Range)	NC	NC	NA	NA	NA	NA
PCDD/PCDFs						
2,3,7,8-TCDD	NC	NC	NA	NA	NA	NA
1,2,3,7,8-PeCDD	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,6,7,8-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,7,8,9-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,4,6,7,8-HpCDD	NC	NC	NA	NA	NA	NA
OCDD	NC	NC	NA	NA	NA	NA
2,3,7,8-TCDF	NC	NC	NA	NA	NA	NA
1,2,3,7,8-PeCDF	NC	NC	NA	NA	NA	NA
2,3,4,7,8-PeCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA
2,3,4,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,7,8,9-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,6,7,8-HpCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8,9-HpCDF	NC	NC	NA	NA	NA	NA
OCDF	NC	NC	NA	NA	NA	NA
PCBs						
Aroclor-1254	NC	NC	NA	NA	NA	NA
Aroclor-1260	NC	NC	NA	NA	NA	NA
PCB-105	NC	NC	NA	NA	NA	NA
PCB-114	NC	NC	NA	NA	NA	NA
PCB-118	NC	NC	NA	NA	NA	NA
PCB-123	NC	NC	NA	NA	NA	NA
PCB-126	NC	NC	NA	NA	NA	NA
PCB-156	NC	NC	NA	NA	NA	NA
PCB-157	NC	NC	NA	NA	NA	NA
PCB-167	NC	NC	NA	NA	NA	NA
PCB-169	NC	NC	NA	NA	NA	NA
PCB-189	NC	NC	NA	NA	NA	NA
PCB-77	NC	NC	NA	NA	NA	NA
PCB-81	NC	NC	NA	NA	NA	NA

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)

Spreadsheet C3-56 (3 of 3)

Estimates of Human Intake
Groundwater to Ambient Air Pathway for Child Recreator
Sodium Reactor Experiment (SRE) Area

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	4.4	8.8
Fraction of time outdoors	FT	fraction	1.0	1.0
Exposure frequency	EF	days/year	50	100
Exposure duration	ED	years	6	6
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)

EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCDD/PCDF - Polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.
PCB - polychlorinated biphenyls
mg/kg-day - milligrams per kilogram per day
mg/m^3 - milligrams per cubic meter

Spreadsheet C3-55b (1 of 3)

Estimates of Human Intake
Soil to Ambient Air Pathway for Child Recreator - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	4.4	8.8
Fraction of time outdoors	FT	fraction	1.0	1.0
Exposure frequency	EF	days/year	50	100
Exposure duration	ED	years	6	6
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Inorganic Compounds						
Aluminum	NC	NC	NA	NA	NA	NA
Antimony	NC	NC	NA	NA	NA	NA
Arsenic	NC	NC	NA	NA	NA	NA
Cadmium	NC	NC	NA	NA	NA	NA
Chromium	NC	NC	NA	NA	NA	NA
Copper	NC	NC	NA	NA	NA	NA
Fluoride	NC	NC	NA	NA	NA	NA
Lead	NC	NC	NA	NA	NA	NA
Mercury	NC	NC	NA	NA	NA	NA
Methyl Mercury	NC	NC	NA	NA	NA	NA
Nickel	NC	NC	NA	NA	NA	NA
Nitrate	NC	NC	NA	NA	NA	NA
Silver	NC	NC	NA	NA	NA	NA
Thallium	NC	NC	NA	NA	NA	NA
Vanadium	NC	NC	NA	NA	NA	NA
Zinc	NC	NC	NA	NA	NA	NA
VOCs						
1,1,1-Trichloroethane	NC	NC	NA	NA	NA	NA
1,1,2-Trichloro-1,2,2-trifluoroethane	NC	NC	NA	NA	NA	NA
1,1-Dichloroethane	2.8E-06	2.8E-06	1.1E-07	4.6E-07	9.1E-09	3.7E-08
1,2-Dichloroethane	6.6E-07	6.6E-07	2.6E-08	1.1E-07	2.1E-09	8.5E-09
1,2-Dichloroethene (total)	NC	NC	NA	NA	NA	NA
1-Chlorohexane	NC	NC	NA	NA	NA	NA
2-Butanone	NC	NC	NA	NA	NA	NA
2-Hexanone	NC	NC	NA	NA	NA	NA
Acetone	2.5E-08	2.5E-08	9.9E-10	4.0E-09	7.9E-11	3.2E-10
Benzene	3.2E-06	3.2E-06	1.3E-07	5.2E-07	1.0E-08	4.2E-08
Carbon disulfide	NC	NC	NA	NA	NA	NA
Chloromethane	NC	NC	NA	NA	NA	NA
cis-1,2-Dichloroethene	2.0E-06	2.0E-06	8.1E-08	3.3E-07	6.5E-09	2.6E-08
Ethylbenzene	NC	NC	NA	NA	NA	NA
m,p-Xylene	NC	NC	NA	NA	NA	NA
Methylene chloride	1.5E-06	1.5E-06	6.2E-08	2.5E-07	4.9E-09	2.0E-08
Tetrachloroethene	NC	NC	NA	NA	NA	NA
Toluene	NC	NC	NA	NA	NA	NA
Trichloroethene	5.3E-06	5.3E-06	2.1E-07	8.5E-07	1.7E-08	6.8E-08
Xylenes (total)	NC	NC	NA	NA	NA	NA

Spreadsheet C3-55b (2 of 3)

Estimates of Human Intake
Soil to Ambient Air Pathway for Child Recreator - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	4.4	8.8
Fraction of time outdoors	FT	fraction	1.0	1.0
Exposure frequency	EF	days/year	50	100
Exposure duration	ED	years	6	6
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
SVOCs						
2-Methylnaphthalene	NC	NC	NA	NA	NA	NA
Acenaphthene	NC	NC	NA	NA	NA	NA
Acenaphthylene	NC	NC	NA	NA	NA	NA
Anthracene	NC	NC	NA	NA	NA	NA
Benzo(a)anthracene	NC	NC	NA	NA	NA	NA
Benzo(a)pyrene	NC	NC	NA	NA	NA	NA
Benzo(e)pyrene	NC	NC	NA	NA	NA	NA
Benzo(b)fluoranthene	NC	NC	NA	NA	NA	NA
Benzo(g,h,i)perylene	NC	NC	NA	NA	NA	NA
Benzo(k)fluoranthene	NC	NC	NA	NA	NA	NA
Chrysene	NC	NC	NA	NA	NA	NA
Dibenz(a,h)anthracene	NC	NC	NA	NA	NA	NA
Dibenzofuran	NC	NC	NA	NA	NA	NA
Fluoranthene	NC	NC	NA	NA	NA	NA
Fluorene	NC	NC	NA	NA	NA	NA
Indeno(1,2,3-cd)pyrene	NC	NC	NA	NA	NA	NA
Naphthalene	NC	NC	NA	NA	NA	NA
Perylene	NC	NC	NA	NA	NA	NA
Phenanthrene	NC	NC	NA	NA	NA	NA
Pyrene	NC	NC	NA	NA	NA	NA
Total Petroleum Hydrocarbons						
C11-C14(Kerosene Range)	NC	NC	NA	NA	NA	NA
C14-C20(Diesel Range)	NC	NC	NA	NA	NA	NA
C20-C30(Lubricant Oil Range)	NC	NC	NA	NA	NA	NA
PCDD/PCDFs						
2,3,7,8-TCDD	NC	NC	NA	NA	NA	NA
1,2,3,7,8-PeCDD	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,6,7,8-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,7,8,9-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,4,6,7,8-HpCDD	NC	NC	NA	NA	NA	NA
OCDD	NC	NC	NA	NA	NA	NA
2,3,7,8-TCDF	NC	NC	NA	NA	NA	NA
1,2,3,7,8-PeCDF	NC	NC	NA	NA	NA	NA
2,3,4,7,8-PeCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA

Spreadsheet C3-55b (3 of 3)

Estimates of Human Intake
Soil to Ambient Air Pathway for Child Recreator - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation:

$$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	4.4	8.8
Fraction of time outdoors	FT	fraction	1.0	1.0
Exposure frequency	EF	days/year	50	100
Exposure duration	ED	years	6	6
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
2,3,4,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,7,8,9-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,6,7,8-HpCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8,9-HpCDF	NC	NC	NA	NA	NA	NA
OCDF	NC	NC	NA	NA	NA	NA
PCBs						
Aroclor-1254	NC	NC	NA	NA	NA	NA
Aroclor-1260	NC	NC	NA	NA	NA	NA
PCB-105	NC	NC	NA	NA	NA	NA
PCB-114	NC	NC	NA	NA	NA	NA
PCB-118	NC	NC	NA	NA	NA	NA
PCB-123	NC	NC	NA	NA	NA	NA
PCB-126	NC	NC	NA	NA	NA	NA
PCB-156	NC	NC	NA	NA	NA	NA
PCB-157	NC	NC	NA	NA	NA	NA
PCB-167	NC	NC	NA	NA	NA	NA
PCB-169	NC	NC	NA	NA	NA	NA
PCB-189	NC	NC	NA	NA	NA	NA
PCB-77	NC	NC	NA	NA	NA	NA
PCB-81	NC	NC	NA	NA	NA	NA

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCDD/PCDF - Polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.
PCB - polychlorinated biphenyls
mg/kg-day - milligrams per kilogram per day
mg/m^3 - milligrams per cubic meter

Estimates of Human Intake
Soil to Ambient Air Pathway for Child Recreator - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	4.4	8.8
Fraction of time outdoors	FT	fraction	1.0	1.0
Exposure frequency	EF	days/year	50	100
Exposure duration	ED	years	6	6
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Inorganic Compounds						
Cadmium	NC	NC	NA	NA	NA	NA
Copper	NC	NC	NA	NA	NA	NA
Fluoride	NC	NC	NA	NA	NA	NA
Lead	NC	NC	NA	NA	NA	NA
Mercury	NC	NC	NA	NA	NA	NA
Methyl Mercury	NC	NC	NA	NA	NA	NA
Nitrate	NC	NC	NA	NA	NA	NA
Silver	NC	NC	NA	NA	NA	NA
Thallium	NC	NC	NA	NA	NA	NA
Zinc	NC	NC	NA	NA	NA	NA
VOCs						
1,1,1-Trichloroethane	NC	NC	NA	NA	NA	NA
1,1,2-Trichloro-1,2,2-trifluoroethane	NC	NC	NA	NA	NA	NA
1,1-Dichloroethane	2.8E-06	2.8E-06	1.1E-07	4.6E-07	9.1E-09	3.7E-08
1,2-Dichloroethane	6.6E-07	6.6E-07	2.6E-08	1.1E-07	2.1E-09	8.5E-09
1,2-Dichloroethene (total)	NC	NC	NA	NA	NA	NA
1-Chlorohexane	NC	NC	NA	NA	NA	NA
2-Butanone	NC	NC	NA	NA	NA	NA
2-Hexanone	NC	NC	NA	NA	NA	NA
Acetone	2.5E-08	2.5E-08	9.9E-10	4.0E-09	7.9E-11	3.2E-10
Benzene	3.2E-06	3.2E-06	1.3E-07	5.2E-07	1.0E-08	4.2E-08
Carbon disulfide	NC	NC	NA	NA	NA	NA
Chloromethane	NC	NC	NA	NA	NA	NA
cis-1,2-Dichloroethene	2.0E-06	2.0E-06	8.1E-08	3.3E-07	6.5E-09	2.6E-08
Ethylbenzene	NC	NC	NA	NA	NA	NA
m,p-Xylene	NC	NC	NA	NA	NA	NA
Methylene chloride	1.5E-06	1.5E-06	6.2E-08	2.5E-07	4.9E-09	2.0E-08
Tetrachloroethene	NC	NC	NA	NA	NA	NA
Toluene	NC	NC	NA	NA	NA	NA
Trichloroethene	5.3E-06	5.3E-06	2.1E-07	8.5E-07	1.7E-08	6.8E-08
Xylenes (total)	NC	NC	NA	NA	NA	NA
SVOCs						
2-Methylnaphthalene	NC	NC	NA	NA	NA	NA
Acenaphthene	NC	NC	NA	NA	NA	NA
Acenaphthylene	NC	NC	NA	NA	NA	NA
Anthracene	NC	NC	NA	NA	NA	NA
Benzo(a)anthracene	NC	NC	NA	NA	NA	NA
Benzo(a)pyrene	NC	NC	NA	NA	NA	NA

Estimates of Human Intake
Soil to Ambient Air Pathway for Child Recreator - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation:

$$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	4.4	8.8
Fraction of time outdoors	FT	fraction	1.0	1.0
Exposure frequency	EF	days/year	50	100
Exposure duration	ED	years	6	6
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Benzo(e)pyrene	NC	NC	NA	NA	NA	NA
Benzo(b)fluoranthene	NC	NC	NA	NA	NA	NA
Benzo(g,h,i)perylene	NC	NC	NA	NA	NA	NA
Benzo(k)fluoranthene	NC	NC	NA	NA	NA	NA
Chrysene	NC	NC	NA	NA	NA	NA
Dibenz(a,h)anthracene	NC	NC	NA	NA	NA	NA
Dibenzofuran	NC	NC	NA	NA	NA	NA
Fluoranthene	NC	NC	NA	NA	NA	NA
Fluorene	NC	NC	NA	NA	NA	NA
Indeno(1,2,3-cd)pyrene	NC	NC	NA	NA	NA	NA
Naphthalene	NC	NC	NA	NA	NA	NA
Perylene	NC	NC	NA	NA	NA	NA
Phenanthrene	NC	NC	NA	NA	NA	NA
Pyrene	NC	NC	NA	NA	NA	NA
Total Petroleum Hydrocarbons						
C11-C14(Kerosene Range)	NC	NC	NA	NA	NA	NA
C14-C20(Diesel Range)	NC	NC	NA	NA	NA	NA
C20-C30(Lubricant Oil Range)	NC	NC	NA	NA	NA	NA
PCDD/PCDFs						
2,3,7,8-TCDD	NC	NC	NA	NA	NA	NA
1,2,3,7,8-PeCDD	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,6,7,8-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,7,8,9-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,4,6,7,8-HpCDD	NC	NC	NA	NA	NA	NA
OCDD	NC	NC	NA	NA	NA	NA
2,3,7,8-TCDF	NC	NC	NA	NA	NA	NA
1,2,3,7,8-PeCDF	NC	NC	NA	NA	NA	NA
2,3,4,7,8-PeCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA
2,3,4,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,7,8,9-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,6,7,8-HpCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8,9-HpCDF	NC	NC	NA	NA	NA	NA
OCDF	NC	NC	NA	NA	NA	NA

Estimates of Human Intake
Soil to Ambient Air Pathway for Child Recreator - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	4.4	8.8
Fraction of time outdoors	FT	fraction	1.0	1.0
Exposure frequency	EF	days/year	50	100
Exposure duration	ED	years	6	6
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
PCBs						
Aroclor-1254	NC	NC	NA	NA	NA	NA
Aroclor-1260	NC	NC	NA	NA	NA	NA
PCB-105	NC	NC	NA	NA	NA	NA
PCB-114	NC	NC	NA	NA	NA	NA
PCB-118	NC	NC	NA	NA	NA	NA
PCB-123	NC	NC	NA	NA	NA	NA
PCB-126	NC	NC	NA	NA	NA	NA
PCB-156	NC	NC	NA	NA	NA	NA
PCB-157	NC	NC	NA	NA	NA	NA
PCB-167	NC	NC	NA	NA	NA	NA
PCB-169	NC	NC	NA	NA	NA	NA
PCB-189	NC	NC	NA	NA	NA	NA
PCB-77	NC	NC	NA	NA	NA	NA
PCB-81	NC	NC	NA	NA	NA	NA

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCDD/PCDF - Polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.
PCB - polychlorinated biphenyls
mg/kg-day - milligrams per kilogram per day
mg/m^3 - milligrams per cubic meter

Estimates of Human Intake
Soil Particulate Inhalation Pathway for Child Recreator - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation:

$$\text{Dosage} = \frac{C \times CF \times IR \times FT \times EF \times ED}{PEF \times BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Inhalation rate	IR	m^3/day	4.4	8.8
Conversion factor	CF	kg/ug	1.E-09	1.E-09
Fraction of time outdoors	FT	fraction	1.0	1.0
Exposure frequency	EF	days/year	50	100
Exposure duration	ED	years	6	6
Particulate emission factor	PEF	m^3/ug	2.4	2.4
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Inorganic Compounds						
Aluminum	NC	NC	NA	NA	NA	NA
Antimony	NC	NC	NA	NA	NA	NA
Arsenic	NC	NC	NA	NA	NA	NA
Cadmium	2.4E-01	4.2E-01	3.9E-12	2.7E-11	3.1E-13	2.2E-12
Chromium	NC	NC	NA	NA	NA	NA
Copper	9.9E+00	2.0E+01	1.6E-10	1.3E-09	1.3E-11	1.0E-10
Fluoride	NC	NC	NA	NA	NA	NA
Lead	9.3E+00	1.3E+01	1.5E-10	8.3E-10	1.2E-11	6.7E-11
Mercury	2.1E+00	5.5E+00	3.5E-11	3.6E-10	2.8E-12	2.9E-11
Methyl Mercury	1.7E-03	3.6E-03	2.9E-14	2.4E-13	2.3E-15	1.9E-14
Nickel	NC	NC	NA	NA	NA	NA
Nitrate	NC	NC	NA	NA	NA	NA
Silver	1.0E+00	2.7E+00	1.7E-11	1.8E-10	1.3E-12	1.4E-11
Thallium	3.3E-01	3.3E-01	5.4E-12	2.2E-11	4.3E-13	1.7E-12
Vanadium	NC	NC	NA	NA	NA	NA
Zinc	8.4E+01	1.9E+02	1.4E-09	1.2E-08	1.1E-10	9.9E-10
VOCs						
1,1,1-Trichloroethane	NC	NC	NA	NA	NA	NA
1,1,2-Trichloro-1,2,2-trifluoroethane	NC	NC	NA	NA	NA	NA
1,1-Dichloroethane	NC	NC	NA	NA	NA	NA
1,2-Dichloroethane	NC	NC	NA	NA	NA	NA
1,2-Dichloroethene (total)	NC	NC	NA	NA	NA	NA
1-Chlorohexane	NC	NC	NA	NA	NA	NA
2-Butanone	NC	NC	NA	NA	NA	NA
2-Hexanone	NC	NC	NA	NA	NA	NA
Acetone	NC	NC	NA	NA	NA	NA
Benzene	NC	NC	NA	NA	NA	NA
Carbon disulfide	NC	NC	NA	NA	NA	NA
Chloromethane	NC	NC	NA	NA	NA	NA
cis-1,2-Dichloroethene	NC	NC	NA	NA	NA	NA
Ethylbenzene	NC	NC	NA	NA	NA	NA
m,p-Xylene	NC	NC	NA	NA	NA	NA
Methylene chloride	NC	NC	NA	NA	NA	NA
Tetrachloroethene	NC	NC	NA	NA	NA	NA
Toluene	NC	NC	NA	NA	NA	NA
Trichloroethene	NC	NC	NA	NA	NA	NA
Xylenes (total)	NC	NC	NA	NA	NA	NA

Estimates of Human Intake
Soil Particulate Inhalation Pathway for Child Recreator - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation:

$$\text{Dosage} = \frac{C \times CF \times IR \times FT \times EF \times ED}{PEF \times BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Inhalation rate	IR	m^3/day	4.4	8.8
Conversion factor	CF	kg/ug	1.E-09	1.E-09
Fraction of time outdoors	FT	fraction	1.0	1.0
Exposure frequency	EF	days/year	50	100
Exposure duration	ED	years	6	6
Particulate emission factor	PEF	m^3/ug	2.4	2.4
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
SVOCs						
2-Methylnaphthalene	NC	NC	NA	NA	NA	NA
Acenaphthene	2.6E-02	1.1E-01	4.3E-13	7.3E-12	3.5E-14	5.8E-13
Acenaphthylene	4.6E-03	1.6E-02	7.6E-14	1.0E-12	6.1E-15	8.2E-14
Anthracene	1.8E-02	7.3E-02	2.9E-13	4.8E-12	2.3E-14	3.8E-13
Benzo(a)anthracene	2.8E-03	8.8E-03	4.7E-14	5.8E-13	3.7E-15	4.6E-14
Benzo(e)pyrene	2.0E-02	6.7E-02	3.3E-13	4.4E-12	2.6E-14	3.5E-13
Benzo(a)pyrene	3.0E-03	8.9E-03	4.9E-14	5.9E-13	3.9E-15	4.7E-14
Benzo(b)fluoranthene	4.3E-03	1.1E-02	7.1E-14	7.2E-13	5.7E-15	5.8E-14
Benzo(g,h,i)perylene	1.2E-02	4.4E-02	2.0E-13	2.9E-12	1.6E-14	2.3E-13
Benzo(k)fluoranthene	2.8E-03	8.3E-03	4.6E-14	5.5E-13	3.7E-15	4.4E-14
Chrysene	5.1E-03	1.2E-02	8.4E-14	8.0E-13	6.7E-15	6.4E-14
Dibenz(a,h)anthracene	1.9E-03	6.9E-03	3.1E-14	4.5E-13	2.5E-15	3.6E-14
Dibenzofuran	NC	NC	NA	NA	NA	NA
Fluoranthene	5.6E-03	1.2E-02	9.3E-14	7.9E-13	7.4E-15	6.3E-14
Fluorene	2.6E-02	1.1E-01	4.3E-13	7.2E-12	3.4E-14	5.8E-13
Indeno(1,2,3-cd)pyrene	2.7E-03	8.5E-03	4.5E-14	5.6E-13	3.6E-15	4.5E-14
Naphthalene	NC	NC	NA	NA	NA	NA
Perylene	1.1E-02	3.8E-02	1.9E-13	2.5E-12	1.5E-14	2.0E-13
Phenanthrene	7.1E-02	3.0E-01	1.2E-12	2.0E-11	9.3E-14	1.6E-12
Pyrene	8.2E-03	2.8E-02	1.4E-13	1.9E-12	1.1E-14	1.5E-13
Total Petroleum Hydrocarbons						
C11-C14(Kerosene Range)	1.0E+01	4.0E+01	1.6E-10	2.6E-09	1.3E-11	2.1E-10
C14-C20(Diesel Range)	NC	NC	NA	NA	NA	NA
C20-C30(Lubricant Oil Range)	7.8E+01	4.7E+02	1.3E-09	3.1E-08	1.0E-10	2.5E-09
PCDD/PCDFs						
2,3,7,8-TCDD	1.9E-07	4.0E-07	3.1E-18	2.6E-17	2.4E-19	2.1E-18
1,2,3,7,8-PeCDD	7.3E-07	1.5E-06	1.2E-17	9.9E-17	9.6E-19	7.9E-18
1,2,3,4,7,8-HxCDD	2.1E-06	4.2E-06	3.5E-17	2.8E-16	2.8E-18	2.2E-17
1,2,3,6,7,8-HxCDD	1.1E-05	2.0E-05	1.8E-16	1.3E-15	1.5E-17	1.1E-16
1,2,3,7,8,9-HxCDD	4.5E-06	1.0E-05	7.5E-17	6.6E-16	6.0E-18	5.3E-17
1,2,3,4,6,7,8-HpCDD	3.1E-04	5.0E-04	5.1E-15	3.3E-14	4.1E-16	2.6E-15
OCDD	5.0E-03	7.3E-03	8.1E-14	4.8E-13	6.5E-15	3.8E-14
2,3,7,8-TCDF	4.7E-07	7.9E-07	7.7E-18	5.2E-17	6.2E-19	4.1E-18
1,2,3,7,8-PeCDF	1.8E-07	3.9E-07	2.9E-18	2.5E-17	2.3E-19	2.0E-18
2,3,4,7,8-PeCDF	5.4E-07	9.9E-07	8.9E-18	6.5E-17	7.1E-19	5.2E-18

Estimates of Human Intake
Soil Particulate Inhalation Pathway for Child Recreator - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation:

$$\text{Dosage} = \frac{C \times CF \times IR \times FT \times EF \times ED}{PEF \times BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Inhalation rate	IR	m^3/day	4.4	8.8
Conversion factor	CF	kg/ug	1.E-09	1.E-09
Fraction of time outdoors	FT	fraction	1.0	1.0
Exposure frequency	EF	days/year	50	100
Exposure duration	ED	years	6	6
Particulate emission factor	PEF	m^3/ug	2.4	2.4
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
1,2,3,4,7,8-HxCDF	1.2E-06	1.8E-06	1.9E-17	1.2E-16	1.5E-18	9.5E-18
1,2,3,6,7,8-HxCDF	9.5E-07	1.8E-06	1.6E-17	1.2E-16	1.2E-18	9.6E-18
2,3,4,6,7,8-HxCDF	1.8E-06	3.0E-06	2.9E-17	2.0E-16	2.4E-18	1.6E-17
1,2,3,7,8,9-HxCDF	1.6E-07	1.8E-07	2.6E-18	1.1E-17	2.1E-19	9.2E-19
1,2,3,4,6,7,8-HpCDF	3.7E-05	5.0E-05	6.0E-16	3.3E-15	4.8E-17	2.6E-16
1,2,3,4,7,8,9-HpCDF	3.2E-06	4.2E-06	5.2E-17	2.8E-16	4.1E-18	2.2E-17
OCDF	1.0E-04	1.5E-04	1.6E-15	9.9E-15	1.3E-16	7.9E-16
PCBs						
Aroclor-1254	1.7E-01	4.3E-01	2.8E-12	2.8E-11	2.2E-13	2.3E-12
Aroclor-1260	1.5E+00	7.8E+00	2.4E-11	5.1E-10	1.9E-12	4.1E-11
PCB-105	1.3E-04	6.4E-04	2.1E-15	4.2E-14	1.7E-16	3.4E-15
PCB-114	2.4E-06	1.1E-05	3.9E-17	7.5E-16	3.1E-18	6.0E-17
PCB-118	2.5E-04	1.3E-03	4.2E-15	8.4E-14	3.3E-16	6.7E-15
PCB-123	3.5E-06	1.8E-05	5.8E-17	1.2E-15	4.6E-18	9.5E-17
PCB-126	9.6E-06	5.0E-05	1.6E-16	3.3E-15	1.3E-17	2.6E-16
PCB-156	8.3E-05	4.3E-04	1.4E-15	2.8E-14	1.1E-16	2.2E-15
PCB-157	3.6E-05	1.9E-04	6.0E-16	1.3E-14	4.8E-17	1.0E-15
PCB-167	6.3E-05	3.3E-04	1.0E-15	2.2E-14	8.3E-17	1.8E-15
PCB-169	9.4E-07	5.0E-06	1.6E-17	3.3E-16	1.2E-18	2.6E-17
PCB-189	9.4E-06	5.0E-05	1.5E-16	3.3E-15	1.2E-17	2.6E-16
PCB-77	1.9E-05	9.9E-05	3.2E-16	6.5E-15	2.5E-17	5.2E-16
PCB-81	3.4E-06	1.8E-05	5.6E-17	1.2E-15	4.5E-18	9.2E-17

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCDD/PCDF - Polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.
PCB - polychlorinated biphenyls
mg/kg-day - milligrams per kilogram per day

Estimates of Human Intake
Soil Particulate Inhalation Pathway for Child Recreator - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation:

$$\text{Dosage} = \frac{C \times CF \times IR \times FT \times EF \times ED}{PEF \times BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Inhalation rate	IR	m^3/day	4.4	8.8
Conversion factor	CF	kg/ug	1.E-09	1.E-09
Fraction of time outdoors	FT	fraction	1.0	1.0
Exposure frequency	EF	days/year	50	100
Exposure duration	ED	years	6	6
Particulate emission factor	PEF	m^3/ug	2.4	2.4
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)

mg/kg - milligrams per kilogram

Estimates of Human Intake
Soil Particulate Inhalation Pathway for Child Recreator - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation: $$\text{Dosage} = \frac{C \times CF \times IR \times FT \times EF \times ED}{PEF \times BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Inhalation rate	IR	m^3/day	4.4	8.8
Conversion factor	CF	kg/ug	1.E-09	1.E-09
Fraction of time outdoors	FT	fraction	1.0	1.0
Exposure frequency	EF	days/year	50	100
Exposure duration	ED	years	6	6
Particulate emission factor	PEF	m^3/ug	2.4	2.4
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Inorganic Compounds						
Cadmium	5.1E-01	1.1E+00	8.4E-12	7.5E-11	6.7E-13	6.0E-12
Copper	2.1E+01	4.6E+01	3.5E-10	3.0E-09	2.8E-11	2.4E-10
Fluoride	NC	NC	NA	NA	NA	NA
Lead	1.6E+01	3.4E+01	2.6E-10	2.2E-09	2.1E-11	1.8E-10
Mercury	1.9E+00	4.4E+00	3.1E-11	2.9E-10	2.5E-12	2.3E-11
Methyl Mercury	1.7E-03	3.6E-03	2.9E-14	2.4E-13	2.3E-15	1.9E-14
Nitrate	NC	NC	NA	NA	NA	NA
Silver	7.7E-01	2.9E+00	1.3E-11	1.9E-10	1.0E-12	1.5E-11
Thallium	3.3E-01	3.3E-01	5.4E-12	2.2E-11	4.3E-13	1.7E-12
Zinc	1.7E+02	4.4E+02	2.8E-09	2.9E-08	2.2E-10	2.3E-09
VOCs						
1,1,1-Trichloroethane	NC	NC	NA	NA	NA	NA
1,1,2-Trichloro-1,2,2-trifluoroethane	NC	NC	NA	NA	NA	NA
1,1-Dichloroethane	NC	NC	NA	NA	NA	NA
1,2-Dichloroethane	NC	NC	NA	NA	NA	NA
1,2-Dichloroethene (total)	NC	NC	NA	NA	NA	NA
1-Chlorohexane	NC	NC	NA	NA	NA	NA
2-Butanone	NC	NC	NA	NA	NA	NA
2-Hexanone	NC	NC	NA	NA	NA	NA
Acetone	NC	NC	NA	NA	NA	NA
Benzene	NC	NC	NA	NA	NA	NA
Carbon disulfide	NC	NC	NA	NA	NA	NA
Chloromethane	NC	NC	NA	NA	NA	NA
cis-1,2-Dichloroethene	NC	NC	NA	NA	NA	NA
Ethylbenzene	NC	NC	NA	NA	NA	NA
m,p-Xylene	NC	NC	NA	NA	NA	NA
Methylene chloride	NC	NC	NA	NA	NA	NA
Tetrachloroethene	NC	NC	NA	NA	NA	NA
Toluene	NC	NC	NA	NA	NA	NA
Trichloroethene	NC	NC	NA	NA	NA	NA
Xylenes (total)	NC	NC	NA	NA	NA	NA
SVOCs						
2-Methylnaphthalene	NC	NC	NA	NA	NA	NA
Acenaphthene	4.4E-02	1.0E-01	7.2E-13	6.6E-12	5.8E-14	5.3E-13
Acenaphthylene	3.1E-02	8.5E-02	5.1E-13	5.6E-12	4.0E-14	4.5E-13
Anthracene	3.9E-02	8.2E-02	6.4E-13	5.4E-12	5.1E-14	4.3E-13

Spreadsheet C3-54a (2 of 3)

Estimates of Human Intake
Soil Particulate Inhalation Pathway for Child Recreator - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation: $$\text{Dosage} = \frac{C \times CF \times IR \times FT \times EF \times ED}{PEF \times BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Inhalation rate	IR	m^3/day	4.4	8.8
Conversion factor	CF	kg/ug	1.E-09	1.E-09
Fraction of time outdoors	FT	fraction	1.0	1.0
Exposure frequency	EF	days/year	50	100
Exposure duration	ED	years	6	6
Particulate emission factor	PEF	m^3/ug	2.4	2.4
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Benzo(a)anthracene	3.6E-02	1.5E-01	5.9E-13	9.8E-12	4.7E-14	7.8E-13
Benzo(e)pyrene	1.9E-02	6.3E-02	3.1E-13	4.1E-12	2.5E-14	3.3E-13
Benzo(a)pyrene	3.6E-02	1.5E-01	5.9E-13	9.8E-12	4.7E-14	7.8E-13
Benzo(b)fluoranthene	4.9E-02	2.7E-01	8.0E-13	1.7E-11	6.4E-14	1.4E-12
Benzo(g,h,i)perylene	4.1E-02	9.0E-02	6.8E-13	5.9E-12	5.4E-14	4.7E-13
Benzo(k)fluoranthene	3.0E-02	8.5E-02	4.9E-13	5.6E-12	3.9E-14	4.5E-13
Chrysene	4.4E-02	2.2E-01	7.3E-13	1.4E-11	5.8E-14	1.1E-12
Dibenz(a,h)anthracene	2.9E-02	8.5E-02	4.8E-13	5.6E-12	3.8E-14	4.5E-13
Dibenzofuran	NC	NC	NA	NA	NA	NA
Fluoranthene	6.0E-02	3.8E-01	9.9E-13	2.5E-11	7.9E-14	2.0E-12
Fluorene	4.4E-02	1.0E-01	7.2E-13	6.5E-12	5.8E-14	5.2E-13
Indeno(1,2,3-cd)pyrene	3.4E-02	1.4E-01	5.6E-13	8.9E-12	4.5E-14	7.1E-13
Naphthalene	NC	NC	NA	NA	NA	NA
Perylene	1.1E-02	3.6E-02	1.7E-13	2.3E-12	1.4E-14	1.9E-13
Phenanthrene	7.9E-02	2.0E-01	1.3E-12	1.3E-11	1.0E-13	1.1E-12
Pyrene	5.3E-02	1.6E-01	8.7E-13	1.0E-11	7.0E-14	8.2E-13
Total Petroleum Hydrocarbons						
C11-C14(Kerosene Range)	9.7E+00	4.0E+01	1.6E-10	2.6E-09	1.3E-11	2.1E-10
C14-C20(Diesel Range)	7.5E+00	7.5E+00	1.2E-10	4.9E-10	9.8E-12	3.9E-11
C20-C30(Lubricant Oil Range)	7.3E+01	4.7E+02	1.2E-09	3.1E-08	9.6E-11	2.5E-09
PCDD/PCDFs						
2,3,7,8-TCDD	2.7E-07	5.3E-07	4.5E-18	3.5E-17	3.6E-19	2.8E-18
1,2,3,7,8-PeCDD	1.1E-06	2.2E-06	1.8E-17	1.4E-16	1.4E-18	1.1E-17
1,2,3,4,7,8-HxCDD	4.1E-06	9.0E-06	6.7E-17	5.9E-16	5.4E-18	4.8E-17
1,2,3,6,7,8-HxCDD	1.6E-05	3.0E-05	2.6E-16	1.9E-15	2.1E-17	1.6E-16
1,2,3,7,8,9-HxCDD	5.9E-06	1.0E-05	9.7E-17	6.6E-16	7.8E-18	5.3E-17
1,2,3,4,6,7,8-HpCDD	5.7E-04	1.2E-03	9.3E-15	7.8E-14	7.4E-16	6.2E-15
OCDD	8.4E-03	1.7E-02	1.4E-13	1.1E-12	1.1E-14	8.9E-14
2,3,7,8-TCDF	5.5E-07	7.9E-07	9.0E-18	5.2E-17	7.2E-19	4.1E-18
1,2,3,7,8-PeCDF	2.8E-07	5.7E-07	4.5E-18	3.8E-17	3.6E-19	3.0E-18
2,3,4,7,8-PeCDF	8.2E-07	1.6E-06	1.3E-17	1.0E-16	1.1E-18	8.2E-18
1,2,3,4,7,8-HxCDF	1.8E-06	3.3E-06	2.9E-17	2.2E-16	2.3E-18	1.8E-17
1,2,3,6,7,8-HxCDF	1.6E-06	3.2E-06	2.5E-17	2.1E-16	2.0E-18	1.7E-17
2,3,4,6,7,8-HxCDF	3.8E-06	8.8E-06	6.3E-17	5.8E-16	5.0E-18	4.6E-17
1,2,3,7,8,9-HxCDF	3.6E-07	9.7E-07	5.9E-18	6.4E-17	4.7E-19	5.1E-18
1,2,3,4,6,7,8-HpCDF	5.3E-05	9.6E-05	8.6E-16	6.3E-15	6.9E-17	5.0E-16
1,2,3,4,7,8,9-HpCDF	4.9E-06	9.2E-06	8.0E-17	6.1E-16	6.4E-18	4.9E-17

Spreadsheet C3-54a (3 of 3)

Estimates of Human Intake
Soil Particulate Inhalation Pathway for Child Recreator - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation:

$$\text{Dosage} = \frac{C \times CF \times IR \times FT \times EF \times ED}{PEF \times BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Inhalation rate	IR	m^3/day	4.4	8.8
Conversion factor	CF	kg/ug	1.E-09	1.E-09
Fraction of time outdoors	FT	fraction	1.0	1.0
Exposure frequency	EF	days/year	50	100
Exposure duration	ED	years	6	6
Particulate emission factor	PEF	m^3/ug	2.4	2.4
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
OCDF	1.4E-04	2.4E-04	2.2E-15	1.6E-14	1.8E-16	1.2E-15
PCBs						
Aroclor-1254	1.6E-01	4.3E-01	2.7E-12	2.8E-11	2.1E-13	2.3E-12
Aroclor-1260	1.3E+00	7.3E+00	2.2E-11	4.8E-10	1.7E-12	3.8E-11
PCB-105	1.1E-04	5.6E-04	1.9E-15	3.7E-14	1.5E-16	3.0E-15
PCB-114	2.2E-06	1.0E-05	3.6E-17	6.6E-16	2.9E-18	5.3E-17
PCB-118	2.3E-04	1.1E-03	3.8E-15	7.4E-14	3.0E-16	5.9E-15
PCB-123	3.2E-06	1.6E-05	5.3E-17	1.1E-15	4.2E-18	8.4E-17
PCB-126	8.8E-06	4.4E-05	1.4E-16	2.9E-15	1.1E-17	2.3E-16
PCB-156	7.5E-05	3.8E-04	1.2E-15	2.5E-14	9.8E-17	2.0E-15
PCB-157	3.3E-05	1.7E-04	5.4E-16	1.1E-14	4.3E-17	8.9E-16
PCB-167	5.7E-05	2.9E-04	9.4E-16	1.9E-14	7.5E-17	1.5E-15
PCB-169	8.6E-07	4.4E-06	1.4E-17	2.9E-16	1.1E-18	2.3E-17
PCB-189	8.6E-06	4.4E-05	1.4E-16	2.9E-15	1.1E-17	2.3E-16
PCB-77	1.8E-05	8.8E-05	2.9E-16	5.8E-15	2.3E-17	4.6E-16
PCB-81	3.1E-06	1.6E-05	5.1E-17	1.0E-15	4.1E-18	8.2E-17

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCDD/PCDF - Polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.
PCB - polychlorinated biphenyls
mg/kg-day - milligrams per kilogram per day
mg/kg - milligrams per kilogram

Soil Dermal Contact Pathway for Child Recreator - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation: Dosage = $\frac{C \times SA \times AF \times B \times CF \times EF \times ED}{BW \times AT}$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Skin surface area per event	SA	cm^2/day	2800	2800
Soil loading to skin	AF	mg/cm^2	0.06	0.20
Bioavailability	B	fraction	CS	CS
Conversion factor	CF	kg/mg	0	0
Exposure frequency	EF	days/year	50	100
Exposure duration	ED	years	6	6
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
Inorganic Compounds							
Aluminum	NC	NC	NA	NA	NA	NA	0.01
Antimony	NC	NC	NA	NA	NA	NA	0.01
Arsenic	NC	NC	NA	NA	NA	NA	0.03
Cadmium	2.4E-01	4.2E-01	3.7E-10	4.3E-09	2.9E-11	3.4E-10	0.001
Chromium	NC	NC	NA	NA	NA	NA	0.01
Copper	9.9E+00	2.0E+01	1.5E-07	2.0E-06	1.2E-08	1.6E-07	0.01
Fluoride	NC	NC	NA	NA	NA	NA	0.01
Lead	9.3E+00	1.3E+01	1.4E-07	1.3E-06	1.1E-08	1.0E-07	0.01
Mercury	2.1E+00	5.5E+00	3.3E-08	5.6E-07	2.6E-09	4.5E-08	0.01
Methyl Mercury	1.7E-03	3.6E-03	2.7E-11	3.7E-10	2.1E-12	3.0E-11	0.01
Nickel	NC	NC	NA	NA	NA	NA	0.01
Nitrate	NC	NC	NA	NA	NA	NA	0.01
Silver	1.0E+00	2.7E+00	1.6E-08	2.8E-07	1.2E-09	2.2E-08	0.01
Thallium	3.3E-01	3.3E-01	5.1E-09	3.4E-08	4.1E-10	2.7E-09	0.01
Vanadium	NC	NC	NA	NA	NA	NA	0.01
Zinc	8.4E+01	1.9E+02	1.3E-06	1.9E-05	1.0E-07	1.5E-06	0.01
VOCs							
1,1,1-Trichloroethane	NC	NC	NA	NA	NA	NA	0.10
1,1,2-Trichloro-1,2,2-trifluoroethane	1.2E-02	1.2E-02	1.8E-09	1.2E-08	1.5E-10	9.8E-10	0.10
1,1-Dichloroethane	NC	NC	NA	NA	NA	NA	0.10
1,2-Dichloroethane	NC	NC	NA	NA	NA	NA	0.10
1,2-Dichloroethene (total)	NC	NC	NA	NA	NA	NA	0.10
1-Chlorohexane	NC	NC	NA	NA	NA	NA	0.10
2-Butanone	2.1E-02	3.5E-02	3.3E-09	3.5E-08	2.6E-10	2.8E-09	0.10
2-Hexanone	NC	NC	NA	NA	NA	NA	0.10
Acetone	1.1E+00	5.2E+00	1.7E-07	5.3E-06	1.3E-08	4.2E-07	0.10
Benzene	NC	NC	NA	NA	NA	NA	0.10
Carbon disulfide	NC	NC	NA	NA	NA	NA	0.01
Chloromethane	NC	NC	NA	NA	NA	NA	0.10
cis-1,2-Dichloroethene	NC	NC	NA	NA	NA	NA	0.10
Ethylbenzene	NC	NC	NA	NA	NA	NA	0.10
m,p-Xylene	NC	NC	NA	NA	NA	NA	0.10
Methylene chloride	1.0E-02	1.3E-02	1.6E-09	1.3E-08	1.3E-10	1.1E-09	0.10
Tetrachloroethene	NC	NC	NA	NA	NA	NA	0.10
Toluene	NC	NC	NA	NA	NA	NA	0.10
Trichloroethene	NC	NC	NA	NA	NA	NA	0.10
Xylenes (total)	NC	NC	NA	NA	NA	NA	0.10

Soil Dermal Contact Pathway for Child Recreator - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation: Dosage = $\frac{C \times SA \times AF \times B \times CF \times EF \times ED}{BW \times AT}$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Skin surface area per event	SA	cm^2/day	2800	2800
Soil loading to skin	AF	mg/cm^2	0.06	0.20
Bioavailability	B	fraction	CS	CS
Conversion factor	CF	kg/mg	0	0
Exposure frequency	EF	days/year	50	100
Exposure duration	ED	years	6	6
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
SVOCs							
2-Methylnaphthalene	NC	NC	NA	NA	NA	NA	0.13
Acenaphthene	2.6E-02	1.1E-01	5.2E-09	1.5E-07	4.2E-10	1.2E-08	0.13
Acenaphthylene	4.6E-03	1.6E-02	9.3E-10	2.1E-08	7.4E-11	1.7E-09	0.13
Anthracene	1.8E-02	7.3E-02	3.5E-09	9.7E-08	2.8E-10	7.7E-09	0.13
Benzo(a)anthracene	2.8E-03	8.8E-03	5.7E-10	1.2E-08	4.5E-11	9.3E-10	0.13
Benzo(a)pyrene	3.0E-03	8.9E-03	6.0E-10	1.2E-08	4.8E-11	9.5E-10	0.13
Benzo(e)pyrene	2.0E-02	6.7E-02	4.0E-09	8.9E-08	3.2E-10	7.1E-09	0.13
Benzo(b)fluoranthene	4.3E-03	1.1E-02	8.6E-10	1.5E-08	6.9E-11	1.2E-09	0.13
Benzo(g,h,i)perylene	1.2E-02	4.4E-02	2.4E-09	5.9E-08	1.9E-10	4.7E-09	0.13
Benzo(k)fluoranthene	2.8E-03	8.3E-03	5.6E-10	1.1E-08	4.5E-11	8.9E-10	0.13
Chrysene	5.1E-03	1.2E-02	1.0E-09	1.6E-08	8.1E-11	1.3E-09	0.13
Dibenz(a,h)anthracene	1.9E-03	6.9E-03	3.7E-10	9.1E-09	3.0E-11	7.3E-10	0.13
Dibenzofuran	NC	NC	NA	NA	NA	NA	0.13
Fluoranthene	5.6E-03	1.2E-02	1.1E-09	1.6E-08	9.0E-11	1.3E-09	0.13
Fluorene	2.6E-02	1.1E-01	5.2E-09	1.5E-07	4.2E-10	1.2E-08	0.13
Indeno(1,2,3-cd)pyrene	2.7E-03	8.5E-03	5.5E-10	1.1E-08	4.4E-11	9.0E-10	0.13
Naphthalene	NC	NC	NA	NA	NA	NA	0.13
Perylene	1.1E-02	3.8E-02	2.3E-09	5.1E-08	1.8E-10	4.1E-09	0.13
Phenanthrene	7.1E-02	3.0E-01	1.4E-08	3.9E-07	1.1E-09	3.2E-08	0.13
Pyrene	8.2E-03	2.8E-02	1.6E-09	3.7E-08	1.3E-10	3.0E-09	0.13
Total Petroleum Hydrocarbons							
C11-C14(Kerosene Range)	1.0E+01	4.0E+01	2.0E-06	5.3E-05	1.6E-07	4.3E-06	0.13
C14-C20(Diesel Range)	NC	NC	NA	NA	NA	NA	0.13
C20-C30(Lubricant Oil Range)	7.8E+01	4.7E+02	1.6E-05	6.2E-04	1.2E-06	5.0E-05	0.13
PCDD/PCDFs							
2,3,7,8-TCDD	1.9E-07	4.0E-07	8.6E-15	1.2E-13	6.8E-16	9.8E-15	0.03
1,2,3,7,8-PeCDD	7.3E-07	1.5E-06	3.4E-14	4.6E-13	2.7E-15	3.7E-14	0.03
1,2,3,4,7,8-HxCDD	2.1E-06	4.2E-06	9.8E-14	1.3E-12	7.9E-15	1.0E-13	0.03
1,2,3,6,7,8-HxCDD	1.1E-05	2.0E-05	5.1E-13	6.1E-12	4.1E-14	4.9E-13	0.03
1,2,3,7,8,9-HxCDD	4.5E-06	1.0E-05	2.1E-13	3.1E-12	1.7E-14	2.5E-13	0.03
1,2,3,4,6,7,8-HpCDD	3.1E-04	5.0E-04	1.4E-11	1.5E-10	1.2E-12	1.2E-11	0.03
OCDD	5.0E-03	7.3E-03	2.3E-10	2.2E-09	1.8E-11	1.8E-10	0.03
2,3,7,8-TCDF	4.7E-07	7.9E-07	2.2E-14	2.4E-13	1.7E-15	1.9E-14	0.03
1,2,3,7,8-PeCDF	1.8E-07	3.9E-07	8.1E-15	1.2E-13	6.5E-16	9.5E-15	0.03
2,3,4,7,8-PeCDF	5.4E-07	9.9E-07	2.5E-14	3.0E-13	2.0E-15	2.4E-14	0.03
1,2,3,4,7,8-HxCDF	1.2E-06	1.8E-06	5.3E-14	5.6E-13	4.3E-15	4.4E-14	0.03

Soil Dermal Contact Pathway for Child Recreator - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation: Dosage = $\frac{C \times SA \times AF \times B \times CF \times EF \times ED}{BW \times AT}$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Skin surface area per event	SA	cm^2/day	2800	2800
Soil loading to skin	AF	mg/cm^2	0.06	0.20
Bioavailability	B	fraction	CS	CS
Conversion factor	CF	kg/mg	0	0
Exposure frequency	EF	days/year	50	100
Exposure duration	ED	years	6	6
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
1,2,3,6,7,8-HxCDF	9.5E-07	1.8E-06	4.3E-14	5.6E-13	3.5E-15	4.5E-14	0.03
2,3,4,6,7,8-HxCDF	1.8E-06	3.0E-06	8.2E-14	9.3E-13	6.6E-15	7.4E-14	0.03
1,2,3,7,8,9-HxCDF	1.6E-07	1.8E-07	7.3E-15	5.4E-14	5.9E-16	4.3E-15	0.03
1,2,3,4,6,7,8-HpCDF	3.7E-05	5.0E-05	1.7E-12	1.5E-11	1.4E-13	1.2E-12	0.03
1,2,3,4,7,8,9-HpCDF	3.2E-06	4.2E-06	1.4E-13	1.3E-12	1.2E-14	1.0E-13	0.03
OCDF	1.0E-04	1.5E-04	4.6E-12	4.6E-11	3.7E-13	3.7E-12	0.03
PCBs							
Aroclor-1254	1.7E-01	4.3E-01	3.7E-08	6.2E-07	2.9E-09	4.9E-08	0.14
Aroclor-1260	1.5E+00	7.8E+00	3.1E-07	1.1E-05	2.5E-08	8.9E-07	0.14
PCB-105	1.3E-04	6.4E-04	2.7E-11	9.1E-10	2.2E-12	7.3E-11	0.14
PCB-114	2.4E-06	1.1E-05	5.1E-13	1.6E-11	4.1E-14	1.3E-12	0.14
PCB-118	2.5E-04	1.3E-03	5.4E-11	1.8E-09	4.3E-12	1.5E-10	0.14
PCB-123	3.5E-06	1.8E-05	7.6E-13	2.6E-11	6.1E-14	2.1E-12	0.14
PCB-126	9.6E-06	5.0E-05	2.1E-12	7.1E-11	1.7E-13	5.7E-12	0.14
PCB-156	8.3E-05	4.3E-04	1.8E-11	6.1E-10	1.4E-12	4.9E-11	0.14
PCB-157	3.6E-05	1.9E-04	7.8E-12	2.7E-10	6.3E-13	2.2E-11	0.14
PCB-167	6.3E-05	3.3E-04	1.4E-11	4.8E-10	1.1E-12	3.8E-11	0.14
PCB-169	9.4E-07	5.0E-06	2.0E-13	7.1E-12	1.6E-14	5.7E-13	0.14
PCB-189	9.4E-06	5.0E-05	2.0E-12	7.1E-11	1.6E-13	5.7E-12	0.14
PCB-77	1.9E-05	9.9E-05	4.1E-12	1.4E-10	3.3E-13	1.1E-11	0.14
PCB-81	3.4E-06	1.8E-05	7.4E-13	2.5E-11	5.9E-14	2.0E-12	0.14

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005), except dermal absorption factors which were taken from USEPA (2001).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCDD/PCDF - Polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.
PCB - polychlorinated biphenyls
mg/kg-day - milligrams per kilogram per day
mg/kg - milligrams per kilogram

Soil Dermal Contact Pathway for Child Recreator - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation: Dosage = $\frac{C \times SA \times AF \times B \times CF \times EF \times ED}{BW \times AT}$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Skin surface area per event	SA	cm^2/day	2800	2800
Soil loading to skin	AF	mg/cm^2	0.06	0.20
Bioavailability	B	fraction	CS	CS
Conversion factor	CF	kg/mg	0	0
Exposure frequency	EF	days/year	50	100
Exposure duration	ED	years	6	6
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
Inorganic Compounds							
Cadmium	5.1E-01	1.1E+00	7.8E-10	1.2E-08	6.2E-11	9.3E-10	0.00
Copper	2.1E+01	4.6E+01	3.2E-07	4.7E-06	2.6E-08	3.7E-07	0.01
Fluoride	NC	NC	NA	NA	NA	NA	0.01
Lead	1.6E+01	3.4E+01	2.5E-07	3.5E-06	2.0E-08	2.8E-07	0.01
Mercury	1.9E+00	4.4E+00	2.9E-08	4.5E-07	2.3E-09	3.6E-08	0.01
Methyl Mercury	1.7E-03	3.6E-03	2.7E-11	3.7E-10	2.1E-12	3.0E-11	0.01
Nitrate	NC	NC	NA	NA	NA	NA	0.01
Silver	7.7E-01	2.9E+00	1.2E-08	2.9E-07	9.5E-10	2.3E-08	0.01
Thallium	3.3E-01	3.3E-01	5.1E-09	3.4E-08	4.1E-10	2.7E-09	0.01
Zinc	1.7E+02	4.4E+02	2.6E-06	4.5E-05	2.1E-07	3.6E-06	0.01
VOCs							
1,1,1-Trichloroethane	NC	NC	NA	NA	NA	NA	0.10
1,1,2-Trichloro-1,2,2-trifluoroethane	1.2E-02	1.2E-02	1.8E-09	1.2E-08	1.5E-10	9.8E-10	0.10
1,1-Dichloroethane	NC	NC	NA	NA	NA	NA	0.10
1,2-Dichloroethane	NC	NC	NA	NA	NA	NA	0.10
1,2-Dichloroethene (total)	2.8E-02	7.0E-02	4.3E-09	7.2E-08	3.5E-10	5.7E-09	0.10
1-Chlorohexane	NC	NC	NA	NA	NA	NA	0.10
2-Butanone	3.7E-02	3.7E-02	5.7E-09	3.8E-08	4.5E-10	3.0E-09	0.10
2-Hexanone	NC	NC	NA	NA	NA	NA	0.10
Acetone	6.8E-01	4.2E+00	1.0E-07	4.3E-06	8.3E-09	3.4E-07	0.10
Benzene	NC	NC	NA	NA	NA	NA	0.10
Carbon disulfide	NC	NC	NA	NA	NA	NA	0.01
Chloromethane	NC	NC	NA	NA	NA	NA	0.10
cis-1,2-Dichloroethene	NC	NC	NA	NA	NA	NA	0.10
Ethylbenzene	NC	NC	NA	NA	NA	NA	0.10
m,p-Xylene	NC	NC	NA	NA	NA	NA	0.10
Methylene chloride	1.3E-02	1.3E-02	2.0E-09	1.3E-08	1.6E-10	1.1E-09	0.10
Tetrachloroethene	2.1E-02	8.8E-02	3.2E-09	9.0E-08	2.6E-10	7.2E-09	0.10
Toluene	5.6E-02	3.4E-01	8.6E-09	3.5E-07	6.9E-10	2.8E-08	0.10
Trichloroethene	3.7E-02	2.0E-01	5.7E-09	2.1E-07	4.5E-10	1.7E-08	0.10
Xylenes (total)	2.5E-02	5.1E-02	3.9E-09	5.2E-08	3.1E-10	4.2E-09	0.10
SVOCs							
2-Methylnaphthalene	NC	NC	NA	NA	NA	NA	0.13
Acenaphthene	4.4E-02	1.0E-01	8.8E-09	1.3E-07	7.0E-10	1.1E-08	0.13
Acenaphthylene	3.1E-02	8.5E-02	6.1E-09	1.1E-07	4.9E-10	9.0E-09	0.13
Anthracene	3.9E-02	8.2E-02	7.7E-09	1.1E-07	6.2E-10	8.7E-09	0.13
Benzo(a)anthracene	3.6E-02	1.5E-01	7.2E-09	2.0E-07	5.7E-10	1.6E-08	0.13

Soil Dermal Contact Pathway for Child Recreator - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation: Dosage = $\frac{C \times SA \times AF \times B \times CF \times EF \times ED}{BW \times AT}$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Skin surface area per event	SA	cm^2/day	2800	2800
Soil loading to skin	AF	mg/cm^2	0.06	0.20
Bioavailability	B	fraction	CS	CS
Conversion factor	CF	kg/mg	0	0
Exposure frequency	EF	days/year	50	100
Exposure duration	ED	years	6	6
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
Benzo(a)pyrene	3.6E-02	1.5E-01	7.2E-09	2.0E-07	5.7E-10	1.6E-08	0.13
Benzo(e)pyrene	1.9E-02	6.3E-02	3.7E-09	8.3E-08	3.0E-10	6.7E-09	0.13
Benzo(b)fluoranthene	4.9E-02	2.7E-01	9.7E-09	3.5E-07	7.8E-10	2.8E-08	0.13
Benzo(g,h,i)perylene	4.1E-02	9.0E-02	8.2E-09	1.2E-07	6.6E-10	9.6E-09	0.13
Benzo(k)fluoranthene	3.0E-02	8.5E-02	5.9E-09	1.1E-07	4.7E-10	9.0E-09	0.13
Chrysene	4.4E-02	2.2E-01	8.9E-09	2.9E-07	7.1E-10	2.3E-08	0.13
Dibenz(a,h)anthracene	2.9E-02	8.5E-02	5.8E-09	1.1E-07	4.6E-10	9.0E-09	0.13
Dibenzofuran	NC	NC	NA	NA	NA	NA	0.13
Fluoranthene	6.0E-02	3.8E-01	1.2E-08	5.0E-07	9.6E-10	4.0E-08	0.13
Fluorene	4.4E-02	1.0E-01	8.8E-09	1.3E-07	7.0E-10	1.1E-08	0.13
Indeno(1,2,3-cd)pyrene	3.4E-02	1.4E-01	6.8E-09	1.8E-07	5.5E-10	1.4E-08	0.13
Naphthalene	NC	NC	NA	NA	NA	NA	0.13
Perylene	1.1E-02	3.6E-02	2.1E-09	4.7E-08	1.7E-10	3.8E-09	0.13
Phenanthrene	7.9E-02	2.0E-01	1.6E-08	2.7E-07	1.3E-09	2.1E-08	0.13
Pyrene	5.3E-02	1.6E-01	1.1E-08	2.1E-07	8.5E-10	1.7E-08	0.13
Total Petroleum Hydrocarbons							
C11-C14(Kerosene Range)	9.7E+00	4.0E+01	1.9E-06	5.3E-05	1.5E-07	4.3E-06	0.13
C14-C20(Diesel Range)	7.5E+00	7.5E+00	1.5E-06	9.9E-06	1.2E-07	7.9E-07	0.13
C20-C30(Lubricant Oil Range)	7.3E+01	4.7E+02	1.5E-05	6.2E-04	1.2E-06	5.0E-05	0.13
PCDD/PCDFs							
2,3,7,8-TCDD	2.7E-07	5.3E-07	1.3E-14	1.6E-13	1.0E-15	1.3E-14	0.03
1,2,3,7,8-PeCDD	1.1E-06	2.2E-06	5.1E-14	6.7E-13	4.0E-15	5.3E-14	0.03
1,2,3,4,7,8-HxCDD	4.1E-06	9.0E-06	1.9E-13	2.8E-12	1.5E-14	2.2E-13	0.03
1,2,3,6,7,8-HxCDD	1.6E-05	3.0E-05	7.3E-13	9.1E-12	5.8E-14	7.3E-13	0.03
1,2,3,7,8,9-HxCDD	5.9E-06	1.0E-05	2.7E-13	3.1E-12	2.2E-14	2.5E-13	0.03
1,2,3,4,6,7,8-HpCDD	5.7E-04	1.2E-03	2.6E-11	3.6E-10	2.1E-12	2.9E-11	0.03
OCDD	8.4E-03	1.7E-02	3.9E-10	5.2E-09	3.1E-11	4.1E-10	0.03
2,3,7,8-TCDF	5.5E-07	7.9E-07	2.5E-14	2.4E-13	2.0E-15	1.9E-14	0.03
1,2,3,7,8-PeCDF	2.8E-07	5.7E-07	1.3E-14	1.8E-13	1.0E-15	1.4E-14	0.03
2,3,4,7,8-PeCDF	8.2E-07	1.6E-06	3.8E-14	4.8E-13	3.0E-15	3.9E-14	0.03
1,2,3,4,7,8-HxCDF	1.8E-06	3.3E-06	8.2E-14	1.0E-12	6.5E-15	8.2E-14	0.03
1,2,3,6,7,8-HxCDF	1.6E-06	3.2E-06	7.1E-14	9.7E-13	5.7E-15	7.8E-14	0.03
2,3,4,6,7,8-HxCDF	3.8E-06	8.8E-06	1.8E-13	2.7E-12	1.4E-14	2.2E-13	0.03
1,2,3,7,8,9-HxCDF	3.6E-07	9.7E-07	1.7E-14	3.0E-13	1.3E-15	2.4E-14	0.03
1,2,3,4,6,7,8-HpCDF	5.3E-05	9.6E-05	2.4E-12	2.9E-11	1.9E-13	2.4E-12	0.03
1,2,3,4,7,8,9-HpCDF	4.9E-06	9.2E-06	2.2E-13	2.8E-12	1.8E-14	2.3E-13	0.03
OCDF	1.4E-04	2.4E-04	6.2E-12	7.3E-11	5.0E-13	5.8E-12	0.03

Soil Dermal Contact Pathway for Child Recreator - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation: Dosage = $\frac{C \times SA \times AF \times B \times CF \times EF \times ED}{BW \times AT}$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Skin surface area per event	SA	cm^2/day	2800	2800
Soil loading to skin	AF	mg/cm^2	0.06	0.20
Bioavailability	B	fraction	CS	CS
Conversion factor	CF	kg/mg	0	0
Exposure frequency	EF	days/year	50	100
Exposure duration	ED	years	6	6
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
PCBs							
Aroclor-1254	1.6E-01	4.3E-01	3.5E-08	6.2E-07	2.8E-09	4.9E-08	0.14
Aroclor-1260	1.3E+00	7.3E+00	2.9E-07	1.0E-05	2.3E-08	8.4E-07	0.14
PCB-105	1.1E-04	5.6E-04	2.5E-11	8.1E-10	2.0E-12	6.5E-11	0.14
PCB-114	2.2E-06	1.0E-05	4.7E-13	1.4E-11	3.7E-14	1.1E-12	0.14
PCB-118	2.3E-04	1.1E-03	4.9E-11	1.6E-09	3.9E-12	1.3E-10	0.14
PCB-123	3.2E-06	1.6E-05	6.9E-13	2.3E-11	5.5E-14	1.8E-12	0.14
PCB-126	8.8E-06	4.4E-05	1.9E-12	6.3E-11	1.5E-13	5.0E-12	0.14
PCB-156	7.5E-05	3.8E-04	1.6E-11	5.4E-10	1.3E-12	4.3E-11	0.14
PCB-157	3.3E-05	1.7E-04	7.1E-12	2.4E-10	5.7E-13	1.9E-11	0.14
PCB-167	5.7E-05	2.9E-04	1.2E-11	4.2E-10	9.9E-13	3.4E-11	0.14
PCB-169	8.6E-07	4.4E-06	1.8E-13	6.3E-12	1.5E-14	5.0E-13	0.14
PCB-189	8.6E-06	4.4E-05	1.8E-12	6.3E-11	1.5E-13	5.0E-12	0.14
PCB-77	1.8E-05	8.8E-05	3.8E-12	1.3E-10	3.0E-13	1.0E-11	0.14
PCB-81	3.1E-06	1.6E-05	6.7E-13	2.2E-11	5.4E-14	1.8E-12	0.14

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005), except dermal absorption factors which were taken from USEPA (2001).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCDD/PCDF - Polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.
PCB - polychlorinated biphenyls
mg/kg-day - milligrams per kilogram per day
mg/kg - milligrams per kilogram

Estimates of Human Intake
Soil Ingestion Pathway for Child Recreator - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times CF \times FT \times EF \times ED \times B}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Soil ingestion rate	IR	mg/day	100	200
Conversion factor	CF	kg/mg	1.E-06	1.E-06
Exposure frequency	EF	days/year	50	100
Exposure duration	ED	years	6	6
Bioavailability	B	fraction	CS	CS
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
Inorganic Compounds							
Aluminum	NC	NC	NA	NA	NA	NA	1
Antimony	NC	NC	NA	NA	NA	NA	1
Arsenic	NC	NC	NA	NA	NA	NA	1
Cadmium	2.4E-01	4.2E-01	2.2E-07	1.5E-06	1.7E-08	1.2E-07	1
Chromium	NC	NC	NA	NA	NA	NA	1
Copper	9.9E+00	2.0E+01	9.1E-06	7.3E-05	7.3E-07	5.8E-06	1
Fluoride	NC	NC	NA	NA	NA	NA	1
Lead	9.3E+00	1.3E+01	8.5E-06	4.6E-05	6.8E-07	3.7E-06	1
Mercury	2.1E+00	5.5E+00	2.0E-06	2.0E-05	1.6E-07	1.6E-06	1
Methyl Mercury	1.7E-03	3.6E-03	1.6E-09	1.3E-08	1.3E-10	1.1E-09	1
Nickel	NC	NC	NA	NA	NA	NA	1
Nitrate	NC	NC	NA	NA	NA	NA	1
Silver	1.0E+00	2.7E+00	9.3E-07	1.0E-05	7.4E-08	8.0E-07	1
Thallium	3.3E-01	3.3E-01	3.0E-07	1.2E-06	2.4E-08	9.6E-08	1
Vanadium	NC	NC	NA	NA	NA	NA	1
Zinc	8.4E+01	1.9E+02	7.7E-05	6.9E-04	6.2E-06	5.5E-05	1
VOCs							
1,1,1-Trichloroethane	NC	NC	NA	NA	NA	NA	1
1,1,2-Trichloro-1,2,2-trifluoroethane	1.2E-02	1.2E-02	1.1E-08	4.4E-08	8.8E-10	3.5E-09	1
1,1-Dichloroethane	NC	NC	NA	NA	NA	NA	1
1,2-Dichloroethane	NC	NC	NA	NA	NA	NA	1
1,2-Dichloroethene (total)	NC	NC	NA	NA	NA	NA	1
1-Chlorohexane	NC	NC	NA	NA	NA	NA	1
2-Butanone	2.1E-02	3.5E-02	2.0E-08	1.3E-07	1.6E-09	1.0E-08	1
2-Hexanone	NC	NC	NA	NA	NA	NA	1
Acetone	1.1E+00	5.2E+00	1.0E-06	1.9E-05	8.0E-08	1.5E-06	1
Benzene	NC	NC	NA	NA	NA	NA	1
Carbon disulfide	NC	NC	NA	NA	NA	NA	1
Chloromethane	NC	NC	NA	NA	NA	NA	1
cis-1,2-Dichloroethene	NC	NC	NA	NA	NA	NA	1
Ethylbenzene	NC	NC	NA	NA	NA	NA	1
m,p-Xylene	NC	NC	NA	NA	NA	NA	1
Methylene chloride	1.0E-02	1.3E-02	9.3E-09	4.7E-08	7.5E-10	3.8E-09	1
Tetrachloroethene	NC	NC	NA	NA	NA	NA	1
Toluene	NC	NC	NA	NA	NA	NA	1
Trichloroethene	NC	NC	NA	NA	NA	NA	1
Xylenes (total)	NC	NC	NA	NA	NA	NA	1

Estimates of Human Intake
Soil Ingestion Pathway for Child Recreator - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times CF \times FT \times EF \times ED \times B}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Soil ingestion rate	IR	mg/day	100	200
Conversion factor	CF	kg/mg	1.E-06	1.E-06
Exposure frequency	EF	days/year	50	100
Exposure duration	ED	years	6	6
Bioavailability	B	fraction	CS	CS
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
SVOCs							
2-Methylnaphthalene	NC	NC	NA	NA	NA	NA	1
Acenaphthene	2.6E-02	1.1E-01	2.4E-08	4.0E-07	1.9E-09	3.2E-08	1
Acenaphthylene	4.6E-03	1.6E-02	4.2E-09	5.7E-08	3.4E-10	4.5E-09	1
Anthracene	1.8E-02	7.3E-02	1.6E-08	2.7E-07	1.3E-09	2.1E-08	1
Benzo(a)anthracene	2.8E-03	8.8E-03	2.6E-09	3.2E-08	2.1E-10	2.6E-09	1
Benzo(a)pyrene	3.0E-03	8.9E-03	2.7E-09	3.3E-08	2.2E-10	2.6E-09	1
Benzo(e)pyrene	2.0E-02	6.7E-02	1.8E-08	2.4E-07	1.4E-09	2.0E-08	1
Benzo(b)fluoranthene	4.3E-03	1.1E-02	3.9E-09	4.0E-08	3.2E-10	3.2E-09	1
Benzo(g,h,i)perylene	1.2E-02	4.4E-02	1.1E-08	1.6E-07	8.7E-10	1.3E-08	1
Benzo(k)fluoranthene	2.8E-03	8.3E-03	2.6E-09	3.0E-08	2.0E-10	2.4E-09	1
Chrysene	5.1E-03	1.2E-02	4.6E-09	4.5E-08	3.7E-10	3.6E-09	1
Dibenz(a,h)anthracene	1.9E-03	6.9E-03	1.7E-09	2.5E-08	1.4E-10	2.0E-09	1
Dibenzofuran	NC	NC	NA	NA	NA	NA	1
Fluoranthene	5.6E-03	1.2E-02	5.2E-09	4.4E-08	4.1E-10	3.5E-09	1
Fluorene	2.6E-02	1.1E-01	2.4E-08	4.0E-07	1.9E-09	3.2E-08	1
Indeno(1,2,3-cd)pyrene	2.7E-03	8.5E-03	2.5E-09	3.1E-08	2.0E-10	2.5E-09	1
Naphthalene	NC	NC	NA	NA	NA	NA	1
Perylene	1.1E-02	3.8E-02	1.0E-08	1.4E-07	8.3E-10	1.1E-08	1
Phenanthrene	7.1E-02	3.0E-01	6.5E-08	1.1E-06	5.2E-09	8.7E-08	1
Pyrene	8.2E-03	2.8E-02	7.5E-09	1.0E-07	6.0E-10	8.2E-09	1
Total Petroleum Hydrocarbons							
C11-C14(Kerosene Range)	1.0E+01	4.0E+01	9.1E-06	1.5E-04	7.3E-07	1.2E-05	1
C14-C20(Diesel Range)	NC	NC	NA	NA	NA	NA	1
C20-C30(Lubricant Oil Range)	7.8E+01	4.7E+02	7.2E-05	1.7E-03	5.7E-06	1.4E-04	1
PCDD/PCDFs							
2,3,7,8-TCDD	1.9E-07	4.0E-07	1.7E-13	1.5E-12	1.4E-14	1.2E-13	1
1,2,3,7,8-PeCDD	7.3E-07	1.5E-06	6.7E-13	5.5E-12	5.4E-14	4.4E-13	1
1,2,3,4,7,8-HxCDD	2.1E-06	4.2E-06	2.0E-12	1.5E-11	1.6E-13	1.2E-12	1
1,2,3,6,7,8-HxCDD	1.1E-05	2.0E-05	1.0E-11	7.3E-11	8.1E-13	5.8E-12	1
1,2,3,7,8,9-HxCDD	4.5E-06	1.0E-05	4.2E-12	3.7E-11	3.3E-13	2.9E-12	1
1,2,3,4,6,7,8-HpCDD	3.1E-04	5.0E-04	2.9E-10	1.8E-09	2.3E-11	1.5E-10	1
OCDD	5.0E-03	7.3E-03	4.5E-09	2.7E-08	3.6E-10	2.1E-09	1
2,3,7,8-TCDF	4.7E-07	7.9E-07	4.3E-13	2.9E-12	3.4E-14	2.3E-13	1
1,2,3,7,8-PeCDF	1.8E-07	3.9E-07	1.6E-13	1.4E-12	1.3E-14	1.1E-13	1
2,3,4,7,8-PeCDF	5.4E-07	9.9E-07	4.9E-13	3.6E-12	4.0E-14	2.9E-13	1
1,2,3,4,7,8-HxCDF	1.2E-06	1.8E-06	1.1E-12	6.6E-12	8.4E-14	5.3E-13	1
1,2,3,6,7,8-HxCDF	9.5E-07	1.8E-06	8.6E-13	6.7E-12	6.9E-14	5.3E-13	1

Spreadsheet C3-52b (3 of 3)

Estimates of Human Intake
Soil Ingestion Pathway for Child Recreator - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times CF \times FT \times EF \times ED \times B}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Soil ingestion rate	IR	mg/day	100	200
Conversion factor	CF	kg/mg	1.E-06	1.E-06
Exposure frequency	EF	days/year	50	100
Exposure duration	ED	years	6	6
Bioavailability	B	fraction	CS	CS
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
2,3,4,6,7,8-HxCDF	1.8E-06	3.0E-06	1.6E-12	1.1E-11	1.3E-13	8.8E-13	1
1,2,3,7,8,9-HxCDF	1.6E-07	1.8E-07	1.5E-13	6.4E-13	1.2E-14	5.1E-14	1
1,2,3,4,6,7,8-HpCDF	3.7E-05	5.0E-05	3.3E-11	1.8E-10	2.7E-12	1.5E-11	1
1,2,3,4,7,8,9-HpCDF	3.2E-06	4.2E-06	2.9E-12	1.5E-11	2.3E-13	1.2E-12	1
OCDF	1.0E-04	1.5E-04	9.1E-11	5.5E-10	7.3E-12	4.4E-11	1
PCBs							
Aroclor-1254	1.7E-01	4.3E-01	1.6E-07	1.6E-06	1.2E-08	1.3E-07	1
Aroclor-1260	1.5E+00	7.8E+00	1.3E-06	2.8E-05	1.1E-07	2.3E-06	1
PCB-105	1.3E-04	6.4E-04	1.1E-10	2.3E-09	9.2E-12	1.9E-10	1
PCB-114	2.4E-06	1.1E-05	2.2E-12	4.1E-11	1.7E-13	3.3E-12	1
PCB-118	2.5E-04	1.3E-03	2.3E-10	4.7E-09	1.8E-11	3.7E-10	1
PCB-123	3.5E-06	1.8E-05	3.2E-12	6.6E-11	2.6E-13	5.3E-12	1
PCB-126	9.6E-06	5.0E-05	8.8E-12	1.8E-10	7.0E-13	1.5E-11	1
PCB-156	8.3E-05	4.3E-04	7.5E-11	1.6E-09	6.0E-12	1.2E-10	1
PCB-157	3.6E-05	1.9E-04	3.3E-11	7.0E-10	2.7E-12	5.6E-11	1
PCB-167	6.3E-05	3.3E-04	5.8E-11	1.2E-09	4.6E-12	9.7E-11	1
PCB-169	9.4E-07	5.0E-06	8.6E-13	1.8E-11	6.9E-14	1.5E-12	1
PCB-189	9.4E-06	5.0E-05	8.6E-12	1.8E-10	6.9E-13	1.5E-11	1
PCB-77	1.9E-05	9.9E-05	1.8E-11	3.6E-10	1.4E-12	2.9E-11	1
PCB-81	3.4E-06	1.8E-05	3.1E-12	6.4E-11	2.5E-13	5.1E-12	1

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCDD/PCDF - Polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.
PCB - polychlorinated biphenyls
mg/kg-day - milligrams per kilogram per day
mg/kg - milligrams per kilogram

Estimates of Human Intake - Dry Pond Scenario
Soil Ingestion Pathway for Child Recreator
Sodium Reactor Experiment (SRE) Area

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times CF \times FT \times EF \times ED \times B}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Soil ingestion rate	IR	mg/day	100	200
Conversion factor	CF	kg/mg	1.E-06	1.E-06
Exposure frequency	EF	days/year	50	100
Exposure duration	ED	years	6	6
Bioavailability	B	fraction	CS	CS
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
Inorganic Compounds							
Cadmium	5.1E-01	1.1E+00	4.6E-07	4.1E-06	3.7E-08	3.3E-07	1
Copper	2.1E+01	4.6E+01	1.9E-05	1.7E-04	1.5E-06	1.3E-05	1
Fluoride	NC	NC	NA	NA	NA	NA	1
Lead	1.6E+01	3.4E+01	1.5E-05	1.2E-04	1.2E-06	9.9E-06	1
Mercury	1.9E+00	4.4E+00	1.7E-06	1.6E-05	1.4E-07	1.3E-06	1
Methyl Mercury	1.7E-03	3.6E-03	1.6E-09	1.3E-08	1.3E-10	1.1E-09	1
Nitrate	NC	NC	NA	NA	NA	NA	1
Silver	7.7E-01	2.9E+00	7.1E-07	1.0E-05	5.7E-08	8.4E-07	1
Thallium	3.3E-01	3.3E-01	3.0E-07	1.2E-06	2.4E-08	9.6E-08	1
Zinc	1.7E+02	4.4E+02	1.6E-04	1.6E-03	1.2E-05	1.3E-04	1
							1
VOCs							1
1,1,1-Trichloroethane	NC	NC	NA	NA	NA	NA	1
1,1,2-Trichloro-1,2,2-trifluoroethane	1.2E-02	1.2E-02	1.1E-08	4.4E-08	8.8E-10	3.5E-09	1
1,1-Dichloroethane	NC	NC	NA	NA	NA	NA	1
1,2-Dichloroethane	NC	NC	NA	NA	NA	NA	1
1,2-Dichloroethene (total)	2.8E-02	7.0E-02	2.6E-08	2.6E-07	2.1E-09	2.0E-08	1
1-Chlorohexane	NC	NC	NA	NA	NA	NA	1
2-Butanone	3.7E-02	3.7E-02	3.4E-08	1.4E-07	2.7E-09	1.1E-08	1
2-Hexanone	NC	NC	NA	NA	NA	NA	1
Acetone	6.8E-01	4.2E+00	6.2E-07	1.5E-05	5.0E-08	1.2E-06	1
Benzene	NC	NC	NA	NA	NA	NA	1
Carbon disulfide	NC	NC	NA	NA	NA	NA	1
Chloromethane	NC	NC	NA	NA	NA	NA	1
cis-1,2-Dichloroethene	NC	NC	NA	NA	NA	NA	1
Ethylbenzene	NC	NC	NA	NA	NA	NA	1
m,p-Xylene	NC	NC	NA	NA	NA	NA	1
Methylene chloride	1.3E-02	1.3E-02	1.2E-08	4.7E-08	9.5E-10	3.8E-09	1
Tetrachloroethene	2.1E-02	8.8E-02	1.9E-08	3.2E-07	1.5E-09	2.6E-08	1
Toluene	5.6E-02	3.4E-01	5.1E-08	1.2E-06	4.1E-09	1.0E-07	1
Trichloroethene	3.7E-02	2.0E-01	3.4E-08	7.4E-07	2.7E-09	5.9E-08	1
Xylenes (total)	2.5E-02	5.1E-02	2.3E-08	1.9E-07	1.8E-09	1.5E-08	1
							1
SVOCs							1
2-Methylnaphthalene	NC	NC	NA	NA	NA	NA	1
Acenaphthene	4.4E-02	1.0E-01	4.0E-08	3.7E-07	3.2E-09	2.9E-08	1
Acenaphthylene	3.1E-02	8.5E-02	2.8E-08	3.1E-07	2.3E-09	2.5E-08	1
Anthracene	3.9E-02	8.2E-02	3.5E-08	3.0E-07	2.8E-09	2.4E-08	1
Benzo(a)anthracene	3.6E-02	1.5E-01	3.3E-08	5.4E-07	2.6E-09	4.3E-08	1

Estimates of Human Intake - Dry Pond Scenario
Soil Ingestion Pathway for Child Recreator
Sodium Reactor Experiment (SRE) Area

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times CF \times FT \times EF \times ED \times B}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Soil ingestion rate	IR	mg/day	100	200
Conversion factor	CF	kg/mg	1.E-06	1.E-06
Exposure frequency	EF	days/year	50	100
Exposure duration	ED	years	6	6
Bioavailability	B	fraction	CS	CS
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
Benzo(a)pyrene	3.6E-02	1.5E-01	3.3E-08	5.4E-07	2.6E-09	4.3E-08	1
Benzo(e)pyrene	1.9E-02	6.3E-02	1.7E-08	2.3E-07	1.4E-09	1.8E-08	1
Benzo(b)fluoranthene	4.9E-02	2.7E-01	4.5E-08	9.7E-07	3.6E-09	7.8E-08	1
Benzo(g,h,i)perylene	4.1E-02	9.0E-02	3.8E-08	3.3E-07	3.0E-09	2.6E-08	1
Benzo(k)fluoranthene	3.0E-02	8.5E-02	2.7E-08	3.1E-07	2.2E-09	2.5E-08	1
Chrysene	4.4E-02	2.2E-01	4.1E-08	7.9E-07	3.2E-09	6.3E-08	1
Dibenz(a,h)anthracene	2.9E-02	8.5E-02	2.7E-08	3.1E-07	2.1E-09	2.5E-08	1
Dibenzofuran	NC	NC	NA	NA	NA	NA	1
Fluoranthene	6.0E-02	3.8E-01	5.5E-08	1.4E-06	4.4E-09	1.1E-07	1
Fluorene	4.4E-02	1.0E-01	4.0E-08	3.6E-07	3.2E-09	2.9E-08	1
Indeno(1,2,3-cd)pyrene	3.4E-02	1.4E-01	3.1E-08	4.9E-07	2.5E-09	4.0E-08	1
Naphthalene	NC	NC	NA	NA	NA	NA	1
Perylene	1.1E-02	3.6E-02	9.7E-09	1.3E-07	7.8E-10	1.0E-08	1
Phenanthrene	7.9E-02	2.0E-01	7.3E-08	7.3E-07	5.8E-09	5.9E-08	1
Pyrene	5.3E-02	1.6E-01	4.9E-08	5.7E-07	3.9E-09	4.6E-08	1
Total Petroleum Hydrocarbons							
C11-C14(Kerosene Range)	9.7E+00	4.0E+01	8.8E-06	1.5E-04	7.1E-07	1.2E-05	1
C14-C20(Diesel Range)	7.5E+00	7.5E+00	6.8E-06	2.7E-05	5.4E-07	2.2E-06	1
C20-C30(Lubricant Oil Range)	7.3E+01	4.7E+02	6.7E-05	1.7E-03	5.3E-06	1.4E-04	1
PCDD/PCDFs							
2,3,7,8-TCDD	2.7E-07	5.3E-07	2.5E-13	2.0E-12	2.0E-14	1.6E-13	1
1,2,3,7,8-PeCDD	1.1E-06	2.2E-06	1.0E-12	7.9E-12	8.0E-14	6.4E-13	1
1,2,3,4,7,8-HxCDD	4.1E-06	9.0E-06	3.7E-12	3.3E-11	3.0E-13	2.6E-12	1
1,2,3,6,7,8-HxCDD	1.6E-05	3.0E-05	1.4E-11	1.1E-10	1.2E-12	8.6E-12	1
1,2,3,7,8,9-HxCDD	5.9E-06	1.0E-05	5.4E-12	3.7E-11	4.3E-13	2.9E-12	1
1,2,3,4,6,7,8-HpCDD	5.7E-04	1.2E-03	5.2E-10	4.3E-09	4.1E-11	3.5E-10	1
OCDD	8.4E-03	1.7E-02	7.6E-09	6.2E-08	6.1E-10	4.9E-09	1
2,3,7,8-TCDF	5.5E-07	7.9E-07	5.0E-13	2.9E-12	4.0E-14	2.3E-13	1
1,2,3,7,8-PeCDF	2.8E-07	5.7E-07	2.5E-13	2.1E-12	2.0E-14	1.7E-13	1
2,3,4,7,8-PeCDF	8.2E-07	1.6E-06	7.4E-13	5.7E-12	6.0E-14	4.6E-13	1
1,2,3,4,7,8-HxCDF	1.8E-06	3.3E-06	1.6E-12	1.2E-11	1.3E-13	9.8E-13	1
1,2,3,6,7,8-HxCDF	1.6E-06	3.2E-06	1.4E-12	1.2E-11	1.1E-13	9.2E-13	1
2,3,4,6,7,8-HxCDF	3.8E-06	8.8E-06	3.5E-12	3.2E-11	2.8E-13	2.6E-12	1
1,2,3,7,8,9-HxCDF	3.6E-07	9.7E-07	3.3E-13	3.5E-12	2.6E-14	2.8E-13	1
1,2,3,4,6,7,8-HpCDF	5.3E-05	9.6E-05	4.8E-11	3.5E-10	3.8E-12	2.8E-11	1
1,2,3,4,7,8,9-HpCDF	4.9E-06	9.2E-06	4.4E-12	3.4E-11	3.6E-13	2.7E-12	1
OCDF	1.4E-04	2.4E-04	1.2E-10	8.7E-10	9.9E-12	6.9E-11	1

Estimates of Human Intake - Dry Pond Scenario
Soil Ingestion Pathway for Child Recreator
Sodium Reactor Experiment (SRE) Area

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times CF \times FT \times EF \times ED \times B}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Soil ingestion rate	IR	mg/day	100	200
Conversion factor	CF	kg/mg	1.E-06	1.E-06
Exposure frequency	EF	days/year	50	100
Exposure duration	ED	years	6	6
Bioavailability	B	fraction	CS	CS
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
PCBs							
Aroclor-1254	1.6E-01	4.3E-01	1.5E-07	1.6E-06	1.2E-08	1.3E-07	1
Aroclor-1260	1.3E+00	7.3E+00	1.2E-06	2.7E-05	9.7E-08	2.1E-06	1
PCB-105	1.1E-04	5.6E-04	1.0E-10	2.1E-09	8.3E-12	1.6E-10	1
PCB-114	2.2E-06	1.0E-05	2.0E-12	3.7E-11	1.6E-13	2.9E-12	1
PCB-118	2.3E-04	1.1E-03	2.1E-10	4.1E-09	1.7E-11	3.3E-10	1
PCB-123	3.2E-06	1.6E-05	2.9E-12	5.8E-11	2.3E-13	4.7E-12	1
PCB-126	8.8E-06	4.4E-05	8.0E-12	1.6E-10	6.4E-13	1.3E-11	1
PCB-156	7.5E-05	3.8E-04	6.8E-11	1.4E-09	5.5E-12	1.1E-10	1
PCB-157	3.3E-05	1.7E-04	3.0E-11	6.2E-10	2.4E-12	4.9E-11	1
PCB-167	5.7E-05	2.9E-04	5.2E-11	1.1E-09	4.2E-12	8.6E-11	1
PCB-169	8.6E-07	4.4E-06	7.8E-13	1.6E-11	6.3E-14	1.3E-12	1
PCB-189	8.6E-06	4.4E-05	7.8E-12	1.6E-10	6.2E-13	1.3E-11	1
PCB-77	1.8E-05	8.8E-05	1.6E-11	3.2E-10	1.3E-12	2.6E-11	1
PCB-81	3.1E-06	1.6E-05	2.8E-12	5.7E-11	2.3E-13	4.5E-12	1

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCDD/PCDF - Polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.
PCB - polychlorinated biphenyls
mg/kg-day - milligrams per kilogram per day
mg/kg - milligrams per kilogram

Estimates of Human Intake
Surface Water Dermal Contact Pathway for Adult Recreator
Sodium Reactor Experiment (SRE) Area

Intake Equation:

$$\text{Dosage} = \frac{C \times Kp \times SA \times CF \times EF \times ED \times EV \times ET}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Surface water concentration	C	mg/L	CS	CS
Skin surface area per event	SA	cm^2/day	18150	18150
Bioavailability	B	fraction	CS	CS
Conversion factor	CF	L/cm^3	1.E-03	1.E-03
Event frequency	EV	events/day	0.5	0.5
Exposure frequency	EF	days/year	25	50
Exposure time	ET	hrs/day	1	2
Exposure duration	ED	years	9	24
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/L)	RME EPC (mg/L)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Kp (cm/hr)
Inorganic Compounds							
Aluminum	1.0E+00	1.7E+00	9.1E-06	1.2E-04	1.1E-06	1.9E-05	1.0E-03
Antimony	9.0E-04	1.5E-03	8.0E-09	1.1E-07	9.6E-10	1.8E-08	1.0E-03
Arsenic	6.8E-03	1.1E-02	6.0E-08	7.8E-07	7.2E-09	1.3E-07	1.0E-03
Cadmium	1.5E-04	2.8E-04	1.4E-09	2.0E-08	1.6E-10	3.2E-09	1.0E-03
Chromium	2.3E-03	3.4E-03	2.0E-08	2.4E-07	2.5E-09	3.9E-08	1.0E-03
Copper	4.4E-03	5.7E-03	3.9E-08	4.1E-07	4.7E-09	6.5E-08	1.0E-03
Lead	8.1E-04	1.0E-03	7.2E-10	7.4E-09	8.6E-11	1.2E-09	1.0E-04
Mercury	1.2E-04	1.4E-04	1.1E-09	9.7E-09	1.3E-10	1.5E-09	1.0E-03
Nickel	4.1E-03	4.1E-03	7.3E-09	5.8E-08	8.7E-10	9.3E-09	2.0E-04
Thallium	2.1E-04	2.1E-04	1.9E-09	1.5E-08	2.2E-10	2.4E-09	1.0E-03
Vanadium	4.0E-03	5.7E-03	3.6E-08	4.0E-07	4.3E-09	6.5E-08	1.0E-03
VOCs							
1,1,1-Trichloroethane	7.6E-04	7.6E-04	0.0E+00	0.0E+00	0.0E+00	0.0E+00	0.0E+00
Trichloroethene	6.6E-04	6.6E-04	7.0E-08	5.6E-07	8.4E-09	9.0E-08	1.2E-02
PCDD/PCDFs							
1,2,3,7,8-PeCDD	1.7E-09	1.7E-09	1.2E-11	9.7E-11	1.5E-12	1.5E-11	8.1E-01
1,2,3,4,7,8-HxCDD	2.5E-09	2.5E-09	1.8E-11	1.4E-10	2.1E-12	2.3E-11	8.1E-01
1,2,3,6,7,8-HxCDD	2.7E-08	6.6E-08	1.9E-10	3.8E-09	2.3E-11	6.1E-10	8.1E-01
1,2,3,7,8,9-HxCDD	1.4E-08	1.4E-08	1.0E-10	8.1E-10	1.2E-11	1.3E-10	8.1E-01
1,2,3,4,6,7,8-HpCDD	2.2E-07	1.9E-06	1.6E-09	1.1E-07	1.9E-10	1.8E-08	8.1E-01
OCDD	1.8E-06	2.7E-06	1.3E-08	1.5E-07	1.5E-09	2.4E-08	8.1E-01
2,3,7,8-TCDF	4.0E-09	4.5E-09	2.9E-11	2.6E-10	3.4E-12	4.1E-11	8.1E-01
1,2,3,7,8-PeCDF	7.2E-09	7.2E-09	5.2E-11	4.2E-10	6.2E-12	6.7E-11	8.1E-01
2,3,4,7,8-PeCDF	1.8E-08	2.0E-08	1.3E-10	1.2E-09	1.6E-11	1.8E-10	8.1E-01
1,2,3,4,7,8-HxCDF	1.9E-08	2.1E-08	1.3E-10	1.2E-09	1.6E-11	2.0E-10	8.1E-01
1,2,3,6,7,8-HxCDF	1.1E-08	1.1E-08	7.9E-11	6.3E-10	9.5E-12	1.0E-10	8.1E-01
2,3,4,6,7,8-HxCDF	1.9E-08	2.1E-08	1.4E-10	1.2E-09	1.6E-11	2.0E-10	8.1E-01
1,2,3,7,8,9-HxCDF	1.8E-08	2.3E-08	1.3E-10	1.3E-09	1.6E-11	2.1E-10	8.1E-01
1,2,3,4,6,7,8-HpCDF	2.7E-08	5.1E-08	2.0E-10	2.9E-09	2.4E-11	4.7E-10	8.1E-01
1,2,3,4,7,8,9-HpCDF	1.4E-08	1.4E-08	1.0E-10	8.1E-10	1.2E-11	1.3E-10	8.1E-01
OCDF	7.2E-08	1.3E-07	5.2E-10	7.7E-09	6.2E-11	1.2E-09	8.1E-01

Spreadsheet C3-51 (2 of 2)

Estimates of Human Intake
Surface Water Dermal Contact Pathway for Adult Recreator
Sodium Reactor Experiment (SRE) Area

Intake Equation:

$$\text{Dosage} = \frac{C \times Kp \times SA \times CF \times EF \times ED \times EV \times ET}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Surface water concentration	C	mg/L	CS	CS
Skin surface area per event	SA	cm^2/day	18150	18150
Bioavailability	B	fraction	CS	CS
Conversion factor	CF	L/cm^3	1.E-03	1.E-03
Event frequency	EV	events/day	0.5	0.5
Exposure frequency	EF	days/year	25	50
Exposure time	ET	hrs/day	1	2
Exposure duration	ED	years	9	24
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/L)	RME EPC (mg/L)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Kp (cm/hr)

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005),
except dermal absorption factors which were taken from USEPA (2001).
VOC - volatile organic compound
PCDD/PCDF - Polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.
PCB - polychlorinated biphenyls
mg/kg-day - milligrams per kilogram per day

Estimates of Human Intake
Surface Water Ingestion Pathway for Adult Recreator
Sodium Reactor Experiment (SRE) Area

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times ET \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Surface water concentration	C	mg/L	CS	CS
Surface water ingestion rate	IR	L/hour	0.05	0.05
Exposure time	ET	hrs/day	1	2
Exposure frequency	EF	days/year	25	50
Exposure duration	ED	years	9	24
Bioavailability	B	fraction	CS	CS
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/L)	RME EPC (mg/L)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
Inorganic Compounds							
Aluminum	1.0E+00	1.7E+00	5.0E-05	3.3E-04	6.0E-06	1.1E-04	1
Antimony	9.0E-04	1.5E-03	4.4E-08	3.0E-07	5.3E-09	9.6E-08	1
Arsenic	6.8E-03	1.1E-02	3.3E-07	2.2E-06	4.0E-08	6.9E-07	1
Cadmium	1.5E-04	2.8E-04	7.4E-09	5.5E-08	8.9E-10	1.8E-08	1
Chromium	2.3E-03	3.4E-03	1.1E-07	6.7E-07	1.4E-08	2.1E-07	1
Copper	4.4E-03	5.7E-03	2.1E-07	1.1E-06	2.6E-08	3.6E-07	1
Lead	8.1E-04	1.0E-03	3.9E-08	2.0E-07	4.7E-09	6.5E-08	1
Mercury	1.2E-04	1.4E-04	5.8E-09	2.7E-08	6.9E-10	8.5E-09	1
Nickel	4.1E-03	4.1E-03	2.0E-07	8.0E-07	2.4E-08	2.6E-07	1
Thallium	2.1E-04	2.1E-04	1.0E-08	4.1E-08	1.2E-09	1.3E-08	1
Vanadium	4.0E-03	5.7E-03	2.0E-07	1.1E-06	2.3E-08	3.6E-07	1
VOCs							
1,1,1-Trichloroethane	7.6E-04	7.6E-04	3.7E-08	1.5E-07	4.5E-09	4.8E-08	1
Trichloroethene	6.6E-04	6.6E-04	3.2E-08	1.3E-07	3.9E-09	4.1E-08	1
PCDD/PCDFs							
1,2,3,7,8-PeCDD	1.7E-09	1.7E-09	8.2E-14	3.3E-13	9.9E-15	1.1E-13	1
1,2,3,4,7,8-HxCDD	2.5E-09	2.5E-09	1.2E-13	4.9E-13	1.5E-14	1.6E-13	1
1,2,3,6,7,8-HxCDD	2.7E-08	6.6E-08	1.3E-12	1.3E-11	1.6E-13	4.1E-12	1
1,2,3,7,8,9-HxCDD	1.4E-08	1.4E-08	6.8E-13	2.7E-12	8.2E-14	8.8E-13	1
1,2,3,4,6,7,8-HpCDD	2.2E-07	1.9E-06	1.1E-11	3.7E-10	1.3E-12	1.2E-10	1
OCDD	1.8E-06	2.7E-06	8.7E-11	5.2E-10	1.0E-11	1.7E-10	1
2,3,7,8-TCDF	4.0E-09	4.5E-09	1.9E-13	8.8E-13	2.3E-14	2.8E-13	1
1,2,3,7,8-PeCDF	7.2E-09	7.2E-09	3.5E-13	1.4E-12	4.3E-14	4.5E-13	1
2,3,4,7,8-PeCDF	1.8E-08	2.0E-08	8.8E-13	3.9E-12	1.1E-13	1.3E-12	1
1,2,3,4,7,8-HxCDF	1.9E-08	2.1E-08	9.1E-13	4.2E-12	1.1E-13	1.3E-12	1
1,2,3,6,7,8-HxCDF	1.1E-08	1.1E-08	5.4E-13	2.2E-12	6.5E-14	6.9E-13	1
2,3,4,6,7,8-HxCDF	1.9E-08	2.1E-08	9.3E-13	4.2E-12	1.1E-13	1.3E-12	1
1,2,3,7,8,9-HxCDF	1.8E-08	2.3E-08	8.9E-13	4.5E-12	1.1E-13	1.4E-12	1
1,2,3,4,6,7,8-HpCDF	2.7E-08	5.1E-08	1.3E-12	1.0E-11	1.6E-13	3.2E-12	1
1,2,3,4,7,8,9-HpCDF	1.4E-08	1.4E-08	6.8E-13	2.7E-12	8.2E-14	8.8E-13	1
OCDF	7.2E-08	1.3E-07	3.5E-12	2.6E-11	4.2E-13	8.4E-12	1

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)

Spreadsheet C3-50 (2 of 2)

Estimates of Human Intake
Surface Water Ingestion Pathway for Adult Recreator
Sodium Reactor Experiment (SRE) Area

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times ET \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Surface water concentration	C	mg/L	CS	CS
Surface water ingestion rate	IR	L/hour	0.05	0.05
Exposure time	ET	hrs/day	1	2
Exposure frequency	EF	days/year	25	50
Exposure duration	ED	years	9	24
Bioavailability	B	fraction	CS	CS
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/L)	RME EPC (mg/L)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)

EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005).
VOC - volatile organic compound
PCDD/PCDF - Polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.
mg/kg-day - milligrams per kilogram per day

Spreadsheet C3-48b (1 of3)

Estimates of Human Intake
Soil to Ambient Air Pathway for Adult Recreator - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	5.2	5.2
Fraction of time outdoors	FT	fraction	1.0	1.0
Exposure frequency	EF	days/year	25	50
Exposure duration	ED	years	9	24
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Inorganic Compounds						
Aluminum	NC	NC	NA	NA	NA	NA
Antimony	NC	NC	NA	NA	NA	NA
Arsenic	NC	NC	NA	NA	NA	NA
Cadmium	NC	NC	NA	NA	NA	NA
Chromium	NC	NC	NA	NA	NA	NA
Copper	NC	NC	NA	NA	NA	NA
Fluoride	NC	NC	NA	NA	NA	NA
Lead	NC	NC	NA	NA	NA	NA
Mercury	NC	NC	NA	NA	NA	NA
Methyl Mercury	NC	NC	NA	NA	NA	NA
Nickel	NC	NC	NA	NA	NA	NA
Nitrate	NC	NC	NA	NA	NA	NA
Silver	NC	NC	NA	NA	NA	NA
Thallium	NC	NC	NA	NA	NA	NA
Vanadium	NC	NC	NA	NA	NA	NA
Zinc	NC	NC	NA	NA	NA	NA
VOCs						
1,1,1-Trichloroethane	NC	NC	NA	NA	NA	NA
1,1,2-Trichloro-1,2,2-trifluoroethane	NC	NC	NA	NA	NA	NA
1,1-Dichloroethane	2.8E-06	2.8E-06	1.4E-08	2.9E-08	1.7E-09	9.3E-09
1,2-Dichloroethane	6.6E-07	6.6E-07	3.4E-09	6.7E-09	4.0E-10	2.1E-09
1,2-Dichloroethene (total)	NC	NC	NA	NA	NA	NA
1-Chlorohexane	NC	NC	NA	NA	NA	NA
2-Butanone	NC	NC	NA	NA	NA	NA
2-Hexanone	NC	NC	NA	NA	NA	NA
Acetone	2.5E-08	2.5E-08	1.3E-10	2.5E-10	1.5E-11	8.0E-11
Benzene	3.2E-06	3.2E-06	1.6E-08	3.3E-08	2.0E-09	1.1E-08
Carbon disulfide	NC	NC	NA	NA	NA	NA
Chloromethane	NC	NC	NA	NA	NA	NA
cis-1,2-Dichloroethene	2.0E-06	2.0E-06	1.0E-08	2.1E-08	1.2E-09	6.6E-09
Ethylbenzene	NC	NC	NA	NA	NA	NA
m,p-Xylene	NC	NC	NA	NA	NA	NA
Methylene chloride	1.5E-06	1.5E-06	7.8E-09	1.6E-08	9.3E-10	5.0E-09
Tetrachloroethene	NC	NC	NA	NA	NA	NA
Toluene	NC	NC	NA	NA	NA	NA
Trichloroethene	5.3E-06	5.3E-06	2.7E-08	5.4E-08	3.2E-09	1.7E-08
Xylenes (total)	NC	NC	NA	NA	NA	NA

Spreadsheet C3-48b (2 of3)

Estimates of Human Intake
Soil to Ambient Air Pathway for Adult Recreator - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	5.2	5.2
Fraction of time outdoors	FT	fraction	1.0	1.0
Exposure frequency	EF	days/year	25	50
Exposure duration	ED	years	9	24
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
SVOCs						
2-Methylnaphthalene	NC	NC	NA	NA	NA	NA
Acenaphthene	NC	NC	NA	NA	NA	NA
Acenaphthylene	NC	NC	NA	NA	NA	NA
Anthracene	NC	NC	NA	NA	NA	NA
Benzo(a)anthracene	NC	NC	NA	NA	NA	NA
Benzo(a)pyrene	NC	NC	NA	NA	NA	NA
Benzo(e)pyrene	NC	NC	NA	NA	NA	NA
Benzo(b)fluoranthene	NC	NC	NA	NA	NA	NA
Benzo(g,h,i)perylene	NC	NC	NA	NA	NA	NA
Benzo(k)fluoranthene	NC	NC	NA	NA	NA	NA
Chrysene	NC	NC	NA	NA	NA	NA
Dibenz(a,h)anthracene	NC	NC	NA	NA	NA	NA
Dibenzofuran	NC	NC	NA	NA	NA	NA
Fluoranthene	NC	NC	NA	NA	NA	NA
Fluorene	NC	NC	NA	NA	NA	NA
Indeno(1,2,3-cd)pyrene	NC	NC	NA	NA	NA	NA
Naphthalene	NC	NC	NA	NA	NA	NA
Perylene	NC	NC	NA	NA	NA	NA
Phenanthrene	NC	NC	NA	NA	NA	NA
Pyrene	NC	NC	NA	NA	NA	NA
Total Petroleum Hydrocarbons						
C11-C14(Kerosene Range)	NC	NC	NA	NA	NA	NA
C14-C20(Diesel Range)	NC	NC	NA	NA	NA	NA
C20-C30(Lubricant Oil Range)	NC	NC	NA	NA	NA	NA
PCDD/PCDFs						
2,3,7,8-TCDD	NC	NC	NA	NA	NA	NA
1,2,3,7,8-PeCDD	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,6,7,8-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,7,8,9-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,4,6,7,8-HpCDD	NC	NC	NA	NA	NA	NA
OCDD	NC	NC	NA	NA	NA	NA
2,3,7,8-TCDF	NC	NC	NA	NA	NA	NA
1,2,3,7,8-PeCDF	NC	NC	NA	NA	NA	NA
2,3,4,7,8-PeCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA
2,3,4,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA

Spreadsheet C3-48b (3 of3)

Estimates of Human Intake
Soil to Ambient Air Pathway for Adult Recreator - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	5.2	5.2
Fraction of time outdoors	FT	fraction	1.0	1.0
Exposure frequency	EF	days/year	25	50
Exposure duration	ED	years	9	24
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
1,2,3,7,8,9-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,6,7,8-HpCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8,9-HpCDF	NC	NC	NA	NA	NA	NA
OCDF	NC	NC	NA	NA	NA	NA
PCBs						
Aroclor-1254	NC	NC	NA	NA	NA	NA
Aroclor-1260	NC	NC	NA	NA	NA	NA
PCB-105	NC	NC	NA	NA	NA	NA
PCB-114	NC	NC	NA	NA	NA	NA
PCB-118	NC	NC	NA	NA	NA	NA
PCB-123	NC	NC	NA	NA	NA	NA
PCB-126	NC	NC	NA	NA	NA	NA
PCB-156	NC	NC	NA	NA	NA	NA
PCB-157	NC	NC	NA	NA	NA	NA
PCB-167	NC	NC	NA	NA	NA	NA
PCB-169	NC	NC	NA	NA	NA	NA
PCB-189	NC	NC	NA	NA	NA	NA
PCB-77	NC	NC	NA	NA	NA	NA
PCB-81	NC	NC	NA	NA	NA	NA

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCDD/PCDF - Polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.
PCB - polychlorinated biphenyls
mg/kg-day - milligrams per kilogram per day
mg/m^3 - milligrams per cubic meter

Spreadsheet C3-48a (1 of3)

Estimates of Human Intake
Soil to Ambient Air Pathway for Adult Recreator - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	5.2	5.2
Fraction of time outdoors	FT	fraction	1.0	1.0
Exposure frequency	EF	days/year	25	50
Exposure duration	ED	years	9	24
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Inorganic Compounds						
Cadmium	NC	NC	NA	NA	NA	NA
Copper	NC	NC	NA	NA	NA	NA
Fluoride	NC	NC	NA	NA	NA	NA
Lead	NC	NC	NA	NA	NA	NA
Mercury	NC	NC	NA	NA	NA	NA
Methyl Mercury	NC	NC	NA	NA	NA	NA
Nitrate	NC	NC	NA	NA	NA	NA
Silver	NC	NC	NA	NA	NA	NA
Thallium	NC	NC	NA	NA	NA	NA
Zinc	NC	NC	NA	NA	NA	NA
VOCs						
1,1,1-Trichloroethane	NC	NC	NA	NA	NA	NA
1,1,2-Trichloro-1,2,2-trifluoroethane	NC	NC	NA	NA	NA	NA
1,1-Dichloroethane	2.8E-06	2.8E-06	1.4E-08	2.9E-08	1.7E-09	9.3E-09
1,2-Dichloroethane	6.6E-07	6.6E-07	3.4E-09	6.7E-09	4.0E-10	2.1E-09
1,2-Dichloroethene (total)	NC	NC	NA	NA	NA	NA
1-Chlorohexane	NC	NC	NA	NA	NA	NA
2-Butanone	NC	NC	NA	NA	NA	NA
2-Hexanone	NC	NC	NA	NA	NA	NA
Acetone	2.5E-08	2.5E-08	1.3E-10	2.5E-10	1.5E-11	8.0E-11
Benzene	3.2E-06	3.2E-06	1.6E-08	3.3E-08	2.0E-09	1.1E-08
Carbon disulfide	NC	NC	NA	NA	NA	NA
Chloromethane	NC	NC	NA	NA	NA	NA
cis-1,2-Dichloroethene	2.0E-06	2.0E-06	1.0E-08	2.1E-08	1.2E-09	6.6E-09
Ethylbenzene	NC	NC	NA	NA	NA	NA
m,p-Xylene	NC	NC	NA	NA	NA	NA
Methylene chloride	1.5E-06	1.5E-06	7.8E-09	1.6E-08	9.3E-10	5.0E-09
Tetrachloroethene	NC	NC	NA	NA	NA	NA
Toluene	NC	NC	NA	NA	NA	NA
Trichloroethene	5.3E-06	5.3E-06	2.7E-08	5.4E-08	3.2E-09	1.7E-08
Xylenes (total)	NC	NC	NA	NA	NA	NA
SVOCs						
2-Methylnaphthalene	NC	NC	NA	NA	NA	NA
Acenaphthene	NC	NC	NA	NA	NA	NA
Acenaphthylene	NC	NC	NA	NA	NA	NA
Anthracene	NC	NC	NA	NA	NA	NA
Benzo(a)anthracene	NC	NC	NA	NA	NA	NA
Benzo(a)pyrene	NC	NC	NA	NA	NA	NA

Spreadsheet C3-48a (2 of3)

Estimates of Human Intake
Soil to Ambient Air Pathway for Adult Recreator - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	5.2	5.2
Fraction of time outdoors	FT	fraction	1.0	1.0
Exposure frequency	EF	days/year	25	50
Exposure duration	ED	years	9	24
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Benzo(e)pyrene	NC	NC	NA	NA	NA	NA
Benzo(b)fluoranthene	NC	NC	NA	NA	NA	NA
Benzo(g,h,i)perylene	NC	NC	NA	NA	NA	NA
Benzo(k)fluoranthene	NC	NC	NA	NA	NA	NA
Chrysene	NC	NC	NA	NA	NA	NA
Dibenz(a,h)anthracene	NC	NC	NA	NA	NA	NA
Dibenzofuran	NC	NC	NA	NA	NA	NA
Fluoranthene	NC	NC	NA	NA	NA	NA
Fluorene	NC	NC	NA	NA	NA	NA
Indeno(1,2,3-cd)pyrene	NC	NC	NA	NA	NA	NA
Naphthalene	NC	NC	NA	NA	NA	NA
Perylene	NC	NC	NA	NA	NA	NA
Phenanthrene	NC	NC	NA	NA	NA	NA
Pyrene	NC	NC	NA	NA	NA	NA
Total Petroleum Hydrocarbons						
C11-C14(Kerosene Range)	NC	NC	NA	NA	NA	NA
C14-C20(Diesel Range)	NC	NC	NA	NA	NA	NA
C20-C30(Lubricant Oil Range)	NC	NC	NA	NA	NA	NA
PCDD/PCDFs						
2,3,7,8-TCDD	NC	NC	NA	NA	NA	NA
1,2,3,7,8-PeCDD	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,6,7,8-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,7,8,9-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,4,6,7,8-HpCDD	NC	NC	NA	NA	NA	NA
OCDD	NC	NC	NA	NA	NA	NA
2,3,7,8-TCDF	NC	NC	NA	NA	NA	NA
1,2,3,7,8-PeCDF	NC	NC	NA	NA	NA	NA
2,3,4,7,8-PeCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA
2,3,4,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,7,8,9-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,6,7,8-HpCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8,9-HpCDF	NC	NC	NA	NA	NA	NA
OCDF	NC	NC	NA	NA	NA	NA

Spreadsheet C3-48a (3 of3)

Estimates of Human Intake
Soil to Ambient Air Pathway for Adult Recreator - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	5.2	5.2
Fraction of time outdoors	FT	fraction	1.0	1.0
Exposure frequency	EF	days/year	25	50
Exposure duration	ED	years	9	24
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
PCBs						
Aroclor-1254	NC	NC	NA	NA	NA	NA
Aroclor-1260	NC	NC	NA	NA	NA	NA
PCB-105	NC	NC	NA	NA	NA	NA
PCB-114	NC	NC	NA	NA	NA	NA
PCB-118	NC	NC	NA	NA	NA	NA
PCB-123	NC	NC	NA	NA	NA	NA
PCB-126	NC	NC	NA	NA	NA	NA
PCB-156	NC	NC	NA	NA	NA	NA
PCB-157	NC	NC	NA	NA	NA	NA
PCB-167	NC	NC	NA	NA	NA	NA
PCB-169	NC	NC	NA	NA	NA	NA
PCB-189	NC	NC	NA	NA	NA	NA
PCB-77	NC	NC	NA	NA	NA	NA
PCB-81	NC	NC	NA	NA	NA	NA

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCDD/PCDF - Polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.
PCB - polychlorinated biphenyls
mg/kg-day - milligrams per kilogram per day
mg/m^3 - milligrams per cubic meter

Estimates of Human Intake
Soil Particulate Inhalation Pathway for Adult Recreator - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation:

$$\text{Dosage} = \frac{C \times CF \times IR \times FT \times EF \times ED}{PEF \times BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Inhalation rate	IR	m^3/day	5.2	5.2
Conversion factor	CF	kg/ug	1.E-09	1.E-09
Fraction of time outdoors	FT	fraction	1.0	1.0
Exposure frequency	EF	days/year	25	50
Exposure duration	ED	years	9	24
Particulate emission factor	PEF	m^3/ug	2.4	2.4
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Inorganic Compounds						
Aluminum	NC	NC	NA	NA	NA	NA
Antimony	NC	NC	NA	NA	NA	NA
Arsenic	NC	NC	NA	NA	NA	NA
Cadmium	2.4E-01	4.2E-01	5.1E-13	1.8E-12	6.1E-14	5.6E-13
Chromium	NC	NC	NA	NA	NA	NA
Copper	9.9E+00	2.0E+01	2.1E-11	8.4E-11	2.5E-12	2.7E-11
Fluoride	NC	NC	NA	NA	NA	NA
Lead	9.3E+00	1.3E+01	2.0E-11	5.4E-11	2.4E-12	1.7E-11
Mercury	2.1E+00	5.5E+00	4.5E-12	2.3E-11	5.4E-13	7.4E-12
Methyl Mercury	1.7E-03	3.6E-03	3.7E-15	1.5E-14	4.4E-16	4.9E-15
Nickel	NC	NC	NA	NA	NA	NA
Nitrate	NC	NC	NA	NA	NA	NA
Silver	1.0E+00	2.7E+00	2.2E-12	1.2E-11	2.6E-13	3.7E-12
Thallium	3.3E-01	3.3E-01	7.0E-13	1.4E-12	8.4E-14	4.5E-13
Vanadium	NC	NC	NA	NA	NA	NA
Zinc	NC	NC	NA	NA	NA	NA
VOCs						
1,1,1-Trichloroethane	NC	NC	NA	NA	NA	NA
1,1,2-Trichloro-1,2,2-trifluoroethane	NC	NC	NA	NA	NA	NA
1,1-Dichloroethane	NC	NC	NA	NA	NA	NA
1,2-Dichloroethane	NC	NC	NA	NA	NA	NA
1,2-Dichloroethene (total)	NC	NC	NA	NA	NA	NA
1-Chlorohexane	NC	NC	NA	NA	NA	NA
2-Butanone	NC	NC	NA	NA	NA	NA
2-Hexanone	NC	NC	NA	NA	NA	NA
Acetone	NC	NC	NA	NA	NA	NA
Benzene	NC	NC	NA	NA	NA	NA
Carbon disulfide	NC	NC	NA	NA	NA	NA
Chloromethane	NC	NC	NA	NA	NA	NA
cis-1,2-Dichloroethene	NC	NC	NA	NA	NA	NA
Ethylbenzene	NC	NC	NA	NA	NA	NA
m,p-Xylene	NC	NC	NA	NA	NA	NA
Methylene chloride	NC	NC	NA	NA	NA	NA
Tetrachloroethene	NC	NC	NA	NA	NA	NA
Toluene	NC	NC	NA	NA	NA	NA
Trichloroethene	NC	NC	NA	NA	NA	NA
Xylenes (total)	NC	NC	NA	NA	NA	NA

Spreadsheet C3-47b (2 of 3)

Estimates of Human Intake
Soil Particulate Inhalation Pathway for Adult Recreator - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation: $$\text{Dosage} = \frac{C \times CF \times IR \times FT \times EF \times ED}{PEF \times BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Inhalation rate	IR	m^3/day	5.2	5.2
Conversion factor	CF	kg/ug	1.E-09	1.E-09
Fraction of time outdoors	FT	fraction	1.0	1.0
Exposure frequency	EF	days/year	25	50
Exposure duration	ED	years	9	24
Particulate emission factor	PEF	m^3/ug	2.4	2.4
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
SVOCs						
2-Methylnaphthalene	NC	NC	NA	NA	NA	NA
Acenaphthene	2.6E-02	1.1E-01	5.6E-14	4.7E-13	6.7E-15	1.5E-13
Acenaphthylene	4.6E-03	1.6E-02	9.8E-15	6.6E-14	1.2E-15	2.1E-14
Anthracene	1.8E-02	7.3E-02	3.8E-14	3.1E-13	4.5E-15	9.9E-14
Benzo(a)anthracene	2.8E-03	8.8E-03	6.0E-15	3.7E-14	7.2E-16	1.2E-14
Benzo(a)pyrene	3.0E-03	8.9E-03	6.3E-15	3.8E-14	7.6E-16	1.2E-14
Benzo(e)pyrene	2.0E-02	6.7E-02	4.2E-14	2.8E-13	5.0E-15	9.1E-14
Benzo(b)fluoranthene	4.3E-03	1.1E-02	9.2E-15	4.7E-14	1.1E-15	1.5E-14
Benzo(g,h,i)perylene	1.2E-02	4.4E-02	2.5E-14	1.9E-13	3.0E-15	6.0E-14
Benzo(k)fluoranthene	2.8E-03	8.3E-03	5.9E-15	3.5E-14	7.1E-16	1.1E-14
Chrysene	5.1E-03	1.2E-02	1.1E-14	5.2E-14	1.3E-15	1.7E-14
Dibenz(a,h)anthracene	1.9E-03	6.9E-03	4.0E-15	2.9E-14	4.8E-16	9.3E-15
Dibenzofuran	NC	NC	NA	NA	NA	NA
Fluoranthene	5.6E-03	1.2E-02	1.2E-14	5.1E-14	1.4E-15	1.6E-14
Fluorene	2.6E-02	1.1E-01	5.5E-14	4.7E-13	6.6E-15	1.5E-13
Indeno(1,2,3-cd)pyrene	2.7E-03	8.5E-03	5.8E-15	3.6E-14	7.0E-16	1.1E-14
Naphthalene	NC	NC	NA	NA	NA	NA
Phenanthrene	7.1E-02	3.0E-01	1.5E-13	1.3E-12	1.8E-14	4.0E-13
Perylene	1.1E-02	3.8E-02	2.4E-14	1.6E-13	2.9E-15	5.2E-14
Pyrene	8.2E-03	2.8E-02	1.7E-14	1.2E-13	2.1E-15	3.8E-14
Total Petroleum Hydrocarbons						
C11-C14(Kerosene Range)	1.0E+01	4.0E+01	2.1E-11	1.7E-10	2.5E-12	5.4E-11
C14-C20(Diesel Range)	NC	NC	NA	NA	NA	NA
C20-C30(Lubricant Oil Range)	7.8E+01	4.7E+02	1.7E-10	2.0E-09	2.0E-11	6.4E-10
PCDD/PCDFs						
2,3,7,8-TCDD	1.9E-07	4.0E-07	3.9E-19	1.7E-18	4.7E-20	5.4E-19
1,2,3,7,8-PeCDD	7.3E-07	1.5E-06	1.6E-18	6.4E-18	1.9E-19	2.0E-18
1,2,3,4,7,8-HxCDD	2.1E-06	4.2E-06	4.5E-18	1.8E-17	5.4E-19	5.7E-18
1,2,3,6,7,8-HxCDD	1.1E-05	2.0E-05	2.3E-17	8.5E-17	2.8E-18	2.7E-17
1,2,3,7,8,9-HxCDD	4.5E-06	1.0E-05	9.6E-18	4.2E-17	1.2E-18	1.4E-17
1,2,3,4,6,7,8-HpCDD	3.1E-04	5.0E-04	6.6E-16	2.1E-15	8.0E-17	6.8E-16
OCDD	5.0E-03	7.3E-03	1.1E-14	3.1E-14	1.3E-15	9.9E-15
2,3,7,8-TCDF	4.7E-07	7.9E-07	1.0E-18	3.3E-18	1.2E-19	1.1E-18
1,2,3,7,8-PeCDF	1.8E-07	3.9E-07	3.7E-19	1.6E-18	4.5E-20	5.3E-19
2,3,4,7,8-PeCDF	5.4E-07	9.9E-07	1.1E-18	4.2E-18	1.4E-19	1.3E-18

Spreadsheet C3-47b (3 of 3)

Estimates of Human Intake
Soil Particulate Inhalation Pathway for Adult Recreator - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation:

$$\text{Dosage} = \frac{C \times CF \times IR \times FT \times EF \times ED}{PEF \times BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Inhalation rate	IR	m^3/day	5.2	5.2
Conversion factor	CF	kg/ug	1.E-09	1.E-09
Fraction of time outdoors	FT	fraction	1.0	1.0
Exposure frequency	EF	days/year	25	50
Exposure duration	ED	years	9	24
Particulate emission factor	PEF	m^3/ug	2.4	2.4
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
1,2,3,4,7,8-HxCDF	1.2E-06	1.8E-06	2.4E-18	7.7E-18	2.9E-19	2.5E-18
1,2,3,6,7,8-HxCDF	9.5E-07	1.8E-06	2.0E-18	7.8E-18	2.4E-19	2.5E-18
2,3,4,6,7,8-HxCDF	1.8E-06	3.0E-06	3.8E-18	1.3E-17	4.6E-19	4.1E-18
1,2,3,7,8,9-HxCDF	1.6E-07	1.8E-07	3.4E-19	7.4E-19	4.0E-20	2.4E-19
1,2,3,4,6,7,8-HpCDF	3.7E-05	5.0E-05	7.8E-17	2.1E-16	9.3E-18	6.8E-17
1,2,3,4,7,8,9-HpCDF	3.2E-06	4.2E-06	6.7E-18	1.8E-17	8.0E-19	5.8E-18
OCDF	1.0E-04	1.5E-04	2.1E-16	6.4E-16	2.5E-17	2.0E-16
PCBs						
Aroclor-1254	1.7E-01	4.3E-01	3.6E-13	1.8E-12	4.3E-14	5.8E-13
Aroclor-1260	1.5E+00	7.8E+00	3.1E-12	3.3E-11	3.7E-13	1.1E-11
PCB-105	1.3E-04	6.4E-04	2.7E-16	2.7E-15	3.2E-17	8.7E-16
PCB-114	2.4E-06	1.1E-05	5.1E-18	4.8E-17	6.1E-19	1.5E-17
PCB-118	2.5E-04	1.3E-03	5.4E-16	5.4E-15	6.4E-17	1.7E-15
PCB-123	3.5E-06	1.8E-05	7.5E-18	7.7E-17	9.0E-19	2.5E-17
PCB-126	9.6E-06	5.0E-05	2.0E-17	2.1E-16	2.5E-18	6.7E-17
PCB-156	8.3E-05	4.3E-04	1.7E-16	1.8E-15	2.1E-17	5.8E-16
PCB-157	3.6E-05	1.9E-04	7.7E-17	8.1E-16	9.3E-18	2.6E-16
PCB-167	6.3E-05	3.3E-04	1.3E-16	1.4E-15	1.6E-17	4.5E-16
PCB-169	9.4E-07	5.0E-06	2.0E-18	2.1E-17	2.4E-19	6.7E-18
PCB-189	9.4E-06	5.0E-05	2.0E-17	2.1E-16	2.4E-18	6.7E-17
PCB-77	1.9E-05	9.9E-05	4.1E-17	4.2E-16	4.9E-18	1.3E-16
PCB-81	3.4E-06	1.8E-05	7.3E-18	7.4E-17	8.7E-19	2.4E-17

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCDD/PCDF - Polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.
PCB - polychlorinated biphenyls
mg/kg-day - milligrams per kilogram per day
mg/kg - milligrams per kilogram

Estimates of Human Intake
Soil Particulate Inhalation Pathway for Adult Recreator - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation:

$$\text{Dosage} = \frac{C \times CF \times IR \times FT \times EF \times ED}{PEF \times BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Inhalation rate	IR	m^3/day	5.2	5.2
Conversion factor	CF	kg/ug	1.E-09	1.E-09
Fraction of time outdoors	FT	fraction	1.0	1.0
Exposure frequency	EF	days/year	25	50
Exposure duration	ED	years	9	24
Particulate emission factor	PEF	m^3/ug	2.4	2.4
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Inorganic Compounds						
Cadmium	5.1E-01	1.1E+00	1.1E-12	4.7E-12	1.3E-13	1.5E-12
Copper	2.1E+01	4.6E+01	4.4E-11	1.9E-10	5.3E-12	6.1E-11
Fluoride	NC	NC	NA	NA	NA	NA
Lead	1.6E+01	3.4E+01	3.3E-11	1.4E-10	4.0E-12	4.5E-11
Mercury	1.9E+00	4.4E+00	4.0E-12	1.8E-11	4.8E-13	5.9E-12
Methyl Mercury	1.7E-03	3.6E-03	3.6E-15	1.5E-14	4.4E-16	4.8E-15
Nitrate	NC	NC	NA	NA	NA	NA
Silver	7.7E-01	2.9E+00	1.6E-12	1.2E-11	1.9E-13	3.8E-12
Thallium	3.3E-01	3.3E-01	6.9E-13	1.4E-12	8.2E-14	4.4E-13
Zinc	NC	NC	NA	NA	NA	NA
VOCs						
1,1,1-Trichloroethane	NC	NC	NA	NA	NA	NA
1,1,2-Trichloro-1,2,2-trifluoroethane	NC	NC	NA	NA	NA	NA
1,1-Dichloroethane	NC	NC	NA	NA	NA	NA
1,2-Dichloroethane	NC	NC	NA	NA	NA	NA
1,2-Dichloroethene (total)	NC	NC	NA	NA	NA	NA
1-Chlorohexane	NC	NC	NA	NA	NA	NA
2-Butanone	NC	NC	NA	NA	NA	NA
2-Hexanone	NC	NC	NA	NA	NA	NA
Acetone	NC	NC	NA	NA	NA	NA
Benzene	NC	NC	NA	NA	NA	NA
Carbon disulfide	NC	NC	NA	NA	NA	NA
Chloromethane	NC	NC	NA	NA	NA	NA
cis-1,2-Dichloroethene	NC	NC	NA	NA	NA	NA
Ethylbenzene	NC	NC	NA	NA	NA	NA
m,p-Xylene	NC	NC	NA	NA	NA	NA
Methylene chloride	NC	NC	NA	NA	NA	NA
Tetrachloroethene	NC	NC	NA	NA	NA	NA
Toluene	NC	NC	NA	NA	NA	NA
Trichloroethene	NC	NC	NA	NA	NA	NA
Xylenes (total)	NC	NC	NA	NA	NA	NA
SVOCs						
2-Methylnaphthalene	NC	NC	NA	NA	NA	NA
Acenaphthene	4.4E-02	1.0E-01	9.2E-14	4.2E-13	1.1E-14	1.3E-13
Acenaphthylene	3.1E-02	8.5E-02	6.4E-14	3.5E-13	7.7E-15	1.1E-13
Anthracene	3.9E-02	8.2E-02	8.1E-14	3.4E-13	9.7E-15	1.1E-13

Spreadsheet C3-47a (2 of 3)

Estimates of Human Intake
Soil Particulate Inhalation Pathway for Adult Recreator - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation:

$$\text{Dosage} = \frac{C \times CF \times IR \times FT \times EF \times ED}{PEF \times BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Inhalation rate	IR	m^3/day	5.2	5.2
Conversion factor	CF	kg/ug	1.E-09	1.E-09
Fraction of time outdoors	FT	fraction	1.0	1.0
Exposure frequency	EF	days/year	25	50
Exposure duration	ED	years	9	24
Particulate emission factor	PEF	m^3/ug	2.4	2.4
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Benzo(a)anthracene	3.6E-02	1.5E-01	7.5E-14	6.2E-13	9.0E-15	2.0E-13
Benzo(a)pyrene	3.6E-02	1.5E-01	7.5E-14	6.2E-13	9.0E-15	2.0E-13
Benzo(e)pyrene	1.9E-02	6.3E-02	3.9E-14	2.6E-13	4.7E-15	8.3E-14
Benzo(b)fluoranthene	4.9E-02	2.7E-01	1.0E-13	1.1E-12	1.2E-14	3.5E-13
Benzo(g,h,i)perylene	4.1E-02	9.0E-02	8.5E-14	3.7E-13	1.0E-14	1.2E-13
Benzo(k)fluoranthene	3.0E-02	8.5E-02	6.2E-14	3.5E-13	7.4E-15	1.1E-13
Chrysene	4.4E-02	2.2E-01	9.3E-14	9.0E-13	1.1E-14	2.9E-13
Dibenz(a,h)anthracene	2.9E-02	8.5E-02	6.1E-14	3.5E-13	7.3E-15	1.1E-13
Dibenzofuran	NC	NC	NA	NA	NA	NA
Fluoranthene	6.0E-02	3.8E-01	1.2E-13	1.6E-12	1.5E-14	5.0E-13
Fluorene	4.4E-02	1.0E-01	9.1E-14	4.1E-13	1.1E-14	1.3E-13
Indeno(1,2,3-cd)pyrene	3.4E-02	1.4E-01	7.1E-14	5.6E-13	8.5E-15	1.8E-13
Naphthalene	NC	NC	NA	NA	NA	NA
Phenanthrene	7.9E-02	2.0E-01	1.7E-13	8.3E-13	2.0E-14	2.7E-13
Perylene	1.1E-02	3.6E-02	2.2E-14	1.5E-13	2.7E-15	4.7E-14
Pyrene	5.3E-02	1.6E-01	1.1E-13	6.5E-13	1.3E-14	2.1E-13
Total Petroleum Hydrocarbons						
C11-C14(Kerosene Range)	9.7E+00	4.0E+01	2.0E-11	1.7E-10	2.4E-12	5.3E-11
C14-C20(Diesel Range)	7.5E+00	7.5E+00	1.6E-11	3.1E-11	1.9E-12	9.9E-12
C20-C30(Lubricant Oil Range)	7.3E+01	4.7E+02	1.5E-10	2.0E-09	1.8E-11	6.3E-10
PCDD/PCDFs						
2,3,7,8-TCDD	2.7E-07	5.3E-07	5.7E-19	2.2E-18	6.8E-20	7.1E-19
1,2,3,7,8-PeCDD	1.1E-06	2.2E-06	2.3E-18	9.0E-18	2.7E-19	2.9E-18
1,2,3,4,7,8-HxCDD	4.1E-06	9.0E-06	8.5E-18	3.8E-17	1.0E-18	1.2E-17
1,2,3,6,7,8-HxCDD	1.6E-05	3.0E-05	3.3E-17	1.2E-16	3.9E-18	3.9E-17
1,2,3,7,8,9-HxCDD	5.9E-06	1.0E-05	1.2E-17	4.2E-17	1.5E-18	1.3E-17
1,2,3,4,6,7,8-HpCDD	5.7E-04	1.2E-03	1.2E-15	4.9E-15	1.4E-16	1.6E-15
OCDD	8.4E-03	1.7E-02	1.7E-14	7.0E-14	2.1E-15	2.2E-14
2,3,7,8-TCDF	5.5E-07	7.9E-07	1.1E-18	3.3E-18	1.4E-19	1.1E-18
1,2,3,7,8-PeCDF	2.8E-07	5.7E-07	5.8E-19	2.4E-18	6.9E-20	7.6E-19
2,3,4,7,8-PeCDF	8.2E-07	1.6E-06	1.7E-18	6.5E-18	2.0E-19	2.1E-18
1,2,3,4,7,8-HxCDF	1.8E-06	3.3E-06	3.7E-18	1.4E-17	4.4E-19	4.5E-18
1,2,3,6,7,8-HxCDF	1.6E-06	3.2E-06	3.2E-18	1.3E-17	3.9E-19	4.2E-18
2,3,4,6,7,8-HxCDF	3.8E-06	8.8E-06	8.0E-18	3.7E-17	9.6E-19	1.2E-17
1,2,3,7,8,9-HxCDF	3.6E-07	9.7E-07	7.5E-19	4.0E-18	9.0E-20	1.3E-18
1,2,3,4,6,7,8-HpCDF	5.3E-05	9.6E-05	1.1E-16	4.0E-16	1.3E-17	1.3E-16
1,2,3,4,7,8,9-HpCDF	4.9E-06	9.2E-06	1.0E-17	3.8E-17	1.2E-18	1.2E-17

Spreadsheet C3-47a (3 of 3)

Estimates of Human Intake
Soil Particulate Inhalation Pathway for Adult Recreator - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation:

$$\text{Dosage} = \frac{C \times CF \times IR \times FT \times EF \times ED}{PEF \times BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Inhalation rate	IR	m^3/day	5.2	5.2
Conversion factor	CF	kg/ug	1.E-09	1.E-09
Fraction of time outdoors	FT	fraction	1.0	1.0
Exposure frequency	EF	days/year	25	50
Exposure duration	ED	years	9	24
Particulate emission factor	PEF	m^3/ug	2.4	2.4
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
OCDF	1.4E-04	2.4E-04	2.8E-16	9.9E-16	3.4E-17	3.2E-16
PCBs						
Aroclor-1254	1.6E-01	4.3E-01	3.4E-13	1.8E-12	4.0E-14	5.7E-13
Aroclor-1260	1.3E+00	7.3E+00	2.8E-12	3.0E-11	3.3E-13	9.7E-12
PCB-105	1.1E-04	5.6E-04	2.4E-16	2.3E-15	2.8E-17	7.5E-16
PCB-114	2.2E-06	1.0E-05	4.5E-18	4.2E-17	5.4E-19	1.3E-17
PCB-118	2.3E-04	1.1E-03	4.8E-16	4.7E-15	5.7E-17	1.5E-15
PCB-123	3.2E-06	1.6E-05	6.7E-18	6.7E-17	8.0E-19	2.1E-17
PCB-126	8.8E-06	4.4E-05	1.8E-17	1.8E-16	2.2E-18	5.8E-17
PCB-156	7.5E-05	3.8E-04	1.6E-16	1.6E-15	1.9E-17	5.0E-16
PCB-157	3.3E-05	1.7E-04	6.9E-17	7.0E-16	8.2E-18	2.3E-16
PCB-167	5.7E-05	2.9E-04	1.2E-16	1.2E-15	1.4E-17	3.9E-16
PCB-169	8.6E-07	4.4E-06	1.8E-18	1.8E-17	2.1E-19	5.8E-18
PCB-189	8.6E-06	4.4E-05	1.8E-17	1.8E-16	2.1E-18	5.8E-17
PCB-77	1.8E-05	8.8E-05	3.6E-17	3.7E-16	4.4E-18	1.2E-16
PCB-81	3.1E-06	1.6E-05	6.5E-18	6.5E-17	7.8E-19	2.1E-17

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCDD/PCDF - Polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.
PCB - polychlorinated biphenyls
mg/kg-day - milligrams per kilogram per day
mg/kg - milligrams per kilogram

Estimates of Human Intake
Soil Dermal Contact Pathway for Adult Recreator - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation: $$\text{Dosage} = \frac{C \times SA \times AF \times B \times CF \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Skin surface area per event	SA	cm^2/day	5700	5700
Soil loading to skin	AF	mg/cm^2	0.01	0.90
Bioavailability	B	fraction	CS	CS
Conversion factor	CF	kg/mg	1.E-06	1.E-06
Exposure frequency	EF	days/year	25	50
Exposure duration	ED	years	9	24
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
Inorganic Compounds							
Aluminum	NC	NC	NA	NA	NA	NA	1.0E-02
Antimony	NC	NC	NA	NA	NA	NA	1.0E-02
Arsenic	NC	NC	NA	NA	NA	NA	3.0E-02
Cadmium	2.4E-01	4.2E-01	1.3E-11	4.2E-09	1.6E-12	1.3E-09	1.0E-03
Chromium	NC	NC	NA	NA	NA	NA	1.0E-02
Copper	9.9E+00	2.0E+01	5.5E-09	2.0E-06	6.6E-10	6.4E-07	1.0E-02
Fluoride	NC	NC	NA	NA	NA	NA	1.0E-02
Lead	9.3E+00	1.3E+01	5.2E-09	1.3E-06	6.2E-10	4.1E-07	1.0E-02
Mercury	2.1E+00	5.5E+00	1.2E-09	5.5E-07	1.4E-10	1.8E-07	1.0E-02
Methyl Mercury	1.7E-03	3.6E-03	9.7E-13	3.6E-10	1.2E-13	1.2E-10	1.0E-02
Nickel	NC	NC	NA	NA	NA	NA	1.0E-02
Nitrate	NC	NC	NA	NA	NA	NA	1.0E-02
Silver	1.0E+00	2.7E+00	5.7E-10	2.7E-07	6.8E-11	8.8E-08	1.0E-02
Thallium	3.3E-01	3.3E-01	1.8E-10	3.3E-08	2.2E-11	1.1E-08	1.0E-02
Vanadium	NC	NC	NA	NA	NA	NA	1.0E-02
Zinc	8.4E+01	1.9E+02	4.7E-08	1.9E-05	5.6E-09	6.1E-06	1.0E-02
VOCs							
1,1,1-Trichloroethane	NC	NC	NA	NA	NA	NA	1.0E-01
1,1,2-Trichloro-1,2,2-trifluoroethane	1.2E-02	1.2E-02	6.7E-11	1.2E-08	8.0E-12	3.9E-09	1.0E-01
1,1-Dichloroethane	NC	NC	NA	NA	NA	NA	1.0E-01
1,2-Dichloroethane	NC	NC	NA	NA	NA	NA	1.0E-01
1,2-Dichloroethene (total)	NC	NC	NA	NA	NA	NA	1.0E-01
1-Chlorohexane	NC	NC	NA	NA	NA	NA	1.0E-01
2-Butanone	2.1E-02	3.5E-02	1.2E-10	3.5E-08	1.4E-11	1.1E-08	1.0E-01
2-Hexanone	NC	NC	NA	NA	NA	NA	1.0E-01
Acetone	1.1E+00	5.2E+00	6.1E-09	5.2E-06	7.3E-10	1.7E-06	1.0E-01
Benzene	NC	NC	NA	NA	NA	NA	1.0E-01
Carbon disulfide	NC	NC	NA	NA	NA	NA	1.0E-02
Chloromethane	NC	NC	NA	NA	NA	NA	1.0E-01
cis-1,2-Dichloroethene	NC	NC	NA	NA	NA	NA	1.0E-01
Ethylbenzene	NC	NC	NA	NA	NA	NA	1.0E-01
m,p-Xylene	NC	NC	NA	NA	NA	NA	1.0E-01
Methylene chloride	1.0E-02	1.3E-02	5.7E-11	1.3E-08	6.8E-12	4.2E-09	1.0E-01
Tetrachloroethene	NC	NC	NA	NA	NA	NA	1.0E-01
Toluene	NC	NC	NA	NA	NA	NA	1.0E-01
Trichloroethene	NC	NC	NA	NA	NA	NA	1.0E-01
Xylenes (total)	NC	NC	NA	NA	NA	NA	1.0E-01

Spreadsheet C3-46b (2 of 3)

Estimates of Human Intake
Soil Dermal Contact Pathway for Adult Recreator - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation: $$\text{Dosage} = \frac{C \times SA \times AF \times B \times CF \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Skin surface area per event	SA	cm^2/day	5700	5700
Soil loading to skin	AF	mg/cm^2	0.01	0.90
Bioavailability	B	fraction	CS	CS
Conversion factor	CF	kg/mg	1.E-06	1.E-06
Exposure frequency	EF	days/year	25	50
Exposure duration	ED	years	9	24
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
SVOCs							
2-Methylnaphthalene	NC	NC	NA	NA	NA	NA	1.3E-01
Acenaphthene	2.6E-02	1.1E-01	1.9E-10	1.4E-07	2.3E-11	4.6E-08	1.3E-01
Acenaphthylene	4.6E-03	1.6E-02	3.4E-11	2.0E-08	4.0E-12	6.5E-09	1.3E-01
Anthracene	1.8E-02	7.3E-02	1.3E-10	9.5E-08	1.5E-11	3.0E-08	1.3E-01
Benzo(a)anthracene	2.8E-03	8.8E-03	2.1E-11	1.1E-08	2.5E-12	3.7E-09	1.3E-01
Benzo(a)pyrene	3.0E-03	8.9E-03	2.2E-11	1.2E-08	2.6E-12	3.7E-09	1.3E-01
Benzo(e)pyrene	2.0E-02	6.7E-02	1.4E-10	8.7E-08	1.7E-11	2.8E-08	1.3E-01
Benzo(b)fluoranthene	4.3E-03	1.1E-02	3.1E-11	1.4E-08	3.8E-12	4.6E-09	1.3E-01
Benzo(g,h,i)perylene	1.2E-02	4.4E-02	8.7E-11	5.8E-08	1.0E-11	1.9E-08	1.3E-01
Benzo(k)fluoranthene	2.8E-03	8.3E-03	2.0E-11	1.1E-08	2.4E-12	3.5E-09	1.3E-01
Chrysene	5.1E-03	1.2E-02	3.7E-11	1.6E-08	4.4E-12	5.1E-09	1.3E-01
Dibenz(a,h)anthracene	1.9E-03	6.9E-03	1.4E-11	8.9E-09	1.6E-12	2.9E-09	1.3E-01
Dibenzofuran	NC	NC	NA	NA	NA	NA	1.3E-01
Fluoranthene	5.6E-03	1.2E-02	4.1E-11	1.6E-08	4.9E-12	5.0E-09	1.3E-01
Fluorene	2.6E-02	1.1E-01	1.9E-10	1.4E-07	2.3E-11	4.6E-08	1.3E-01
Indeno(1,2,3-cd)pyrene	2.7E-03	8.5E-03	2.0E-11	1.1E-08	2.4E-12	3.5E-09	1.3E-01
Naphthalene	NC	NC	NA	NA	NA	NA	1.3E-01
Perylene	1.1E-02	3.8E-02	8.2E-11	5.0E-08	9.8E-12	1.6E-08	1.3E-01
Phenanthrene	7.1E-02	3.0E-01	5.1E-10	3.9E-07	6.2E-11	1.2E-07	1.3E-01
Pyrene	8.2E-03	2.8E-02	6.0E-11	3.7E-08	7.2E-12	1.2E-08	1.3E-01
Total Petroleum Hydrocarbons							
C11-C14(Kerosene Range)	1.0E+01	4.0E+01	7.2E-08	5.2E-05	8.7E-09	1.7E-05	1.3E-01
C14-C20(Diesel Range)	NC	NC	NA	NA	NA	NA	1.3E-01
C20-C30(Lubricant Oil Range)	7.8E+01	4.7E+02	5.7E-07	6.1E-04	6.8E-08	2.0E-04	1.3E-01
PCDD/PCDFs							
2,3,7,8-TCDD	1.9E-07	4.0E-07	3.1E-16	1.2E-13	3.7E-17	3.9E-14	3.0E-02
1,2,3,7,8-PeCDD	7.3E-07	1.5E-06	1.2E-15	4.5E-13	1.5E-16	1.4E-13	3.0E-02
1,2,3,4,7,8-HxCDD	2.1E-06	4.2E-06	3.6E-15	1.3E-12	4.3E-16	4.0E-13	3.0E-02
1,2,3,6,7,8-HxCDD	1.1E-05	2.0E-05	1.9E-14	6.0E-12	2.2E-15	1.9E-12	3.0E-02
1,2,3,7,8,9-HxCDD	4.5E-06	1.0E-05	7.6E-15	3.0E-12	9.1E-16	9.6E-13	3.0E-02
1,2,3,4,6,7,8-HpCDD	3.1E-04	5.0E-04	5.2E-13	1.5E-10	6.3E-14	4.8E-11	3.0E-02
OCDD	5.0E-03	7.3E-03	8.3E-12	2.2E-09	1.0E-12	7.0E-10	3.0E-02
2,3,7,8-TCDF	4.7E-07	7.9E-07	7.9E-16	2.4E-13	9.4E-17	7.6E-14	3.0E-02
1,2,3,7,8-PeCDF	1.8E-07	3.9E-07	2.9E-16	1.2E-13	3.5E-17	3.7E-14	3.0E-02
2,3,4,7,8-PeCDF	5.4E-07	9.9E-07	9.0E-16	3.0E-13	1.1E-16	9.6E-14	3.0E-02

Spreadsheet C3-46b (3 of 3)

Estimates of Human Intake
Soil Dermal Contact Pathway for Adult Recreator - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation: $$\text{Dosage} = \frac{C \times SA \times AF \times B \times CF \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Skin surface area per event	SA	cm^2/day	5700	5700
Soil loading to skin	AF	mg/cm^2	0.01	0.90
Bioavailability	B	fraction	CS	CS
Conversion factor	CF	kg/mg	1.E-06	1.E-06
Exposure frequency	EF	days/year	25	50
Exposure duration	ED	years	9	24
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
1,2,3,4,7,8-HxCDF	1.2E-06	1.8E-06	1.9E-15	5.5E-13	2.3E-16	1.7E-13	3.0E-02
1,2,3,6,7,8-HxCDF	9.5E-07	1.8E-06	1.6E-15	5.5E-13	1.9E-16	1.8E-13	3.0E-02
2,3,4,6,7,8-HxCDF	1.8E-06	3.0E-06	3.0E-15	9.1E-13	3.6E-16	2.9E-13	3.0E-02
1,2,3,7,8,9-HxCDF	1.6E-07	1.8E-07	2.7E-16	5.3E-14	3.2E-17	1.7E-14	3.0E-02
1,2,3,4,6,7,8-HpCDF	3.7E-05	5.0E-05	6.1E-14	1.5E-11	7.4E-15	4.8E-12	3.0E-02
1,2,3,4,7,8,9-HpCDF	3.2E-06	4.2E-06	5.3E-15	1.3E-12	6.3E-16	4.1E-13	3.0E-02
OCDF	1.0E-04	1.5E-04	1.7E-13	4.5E-11	2.0E-14	1.4E-11	3.0E-02
PCBs							
Aroclor-1254	1.7E-01	4.3E-01	1.3E-09	6.0E-07	1.6E-10	1.9E-07	1.4E-01
Aroclor-1260	1.5E+00	7.8E+00	1.1E-08	1.1E-05	1.4E-09	3.5E-06	1.4E-01
PCB-105	1.3E-04	6.4E-04	9.8E-13	9.0E-10	1.2E-13	2.9E-10	1.4E-01
PCB-114	2.4E-06	1.1E-05	1.9E-14	1.6E-11	2.2E-15	5.1E-12	1.4E-01
PCB-118	2.5E-04	1.3E-03	2.0E-12	1.8E-09	2.4E-13	5.7E-10	1.4E-01
PCB-123	3.5E-06	1.8E-05	2.8E-14	2.5E-11	3.3E-15	8.1E-12	1.4E-01
PCB-126	9.6E-06	5.0E-05	7.5E-14	7.0E-11	9.0E-15	2.2E-11	1.4E-01
PCB-156	8.3E-05	4.3E-04	6.4E-13	6.0E-10	7.7E-14	1.9E-10	1.4E-01
PCB-157	3.6E-05	1.9E-04	2.8E-13	2.7E-10	3.4E-14	8.6E-11	1.4E-01
PCB-167	6.3E-05	3.3E-04	4.9E-13	4.7E-10	5.9E-14	1.5E-10	1.4E-01
PCB-169	9.4E-07	5.0E-06	7.4E-15	7.0E-12	8.9E-16	2.2E-12	1.4E-01
PCB-189	9.4E-06	5.0E-05	7.4E-14	7.0E-11	8.8E-15	2.2E-11	1.4E-01
PCB-77	1.9E-05	9.9E-05	1.5E-13	1.4E-10	1.8E-14	4.5E-11	1.4E-01
PCB-81	3.4E-06	1.8E-05	2.7E-14	2.5E-11	3.2E-15	7.9E-12	1.4E-01

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005),
except dermal absorption factors which were taken from USEPA (2001).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCDD/PCDF - Polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.
PCB - polychlorinated biphenyls
mg/kg-day - milligrams per kilogram per day
mg/kg - milligrams per kilogram

Estimates of Human Intake
Soil Dermal Contact Pathway for Adult Recreator - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation: $$\text{Dosage} = \frac{C \times SA \times AF \times B \times CF \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Skin surface area per event	SA	cm^2/day	5700	5700
Soil loading to skin	AF	mg/cm^2	0.01	0.90
Bioavailability	B	fraction	CS	CS
Conversion factor	CF	kg/mg	1.E-06	1.E-06
Exposure frequency	EF	days/year	25	50
Exposure duration	ED	years	9	24
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
Inorganic Compounds							
Cadmium	5.1E-01	1.1E+00	2.8E-11	1.1E-08	3.4E-12	3.6E-09	1.0E-03
Copper	2.1E+01	4.6E+01	1.2E-08	4.6E-06	1.4E-09	1.5E-06	1.0E-02
Fluoride	NC	NC	NA	NA	NA	NA	1.0E-02
Lead	1.6E+01	3.4E+01	8.9E-09	3.4E-06	1.1E-09	1.1E-06	1.0E-02
Mercury	1.9E+00	4.4E+00	1.1E-09	4.4E-07	1.3E-10	1.4E-07	1.0E-02
Methyl Mercury	1.7E-03	3.6E-03	9.7E-13	3.6E-10	1.2E-13	1.2E-10	1.0E-02
Nitrate	NC	NC	NA	NA	NA	NA	1.0E-02
Silver	7.7E-01	2.9E+00	4.3E-10	2.9E-07	5.2E-11	9.2E-08	1.0E-02
Thallium	3.3E-01	3.3E-01	1.8E-10	3.3E-08	2.2E-11	1.1E-08	1.0E-02
Zinc	1.7E+02	4.4E+02	9.5E-08	4.4E-05	1.1E-08	1.4E-05	1.0E-02
VOCs							
1,1,1-Trichloroethane	NC	NC	NA	NA	NA	NA	1.0E-01
1,1,2-Trichloro-1,2,2-trifluoroethane	1.2E-02	1.2E-02	6.7E-11	1.2E-08	8.0E-12	3.9E-09	1.0E-01
1,1-Dichloroethane	NC	NC	NA	NA	NA	NA	1.0E-01
1,2-Dichloroethane	NC	NC	NA	NA	NA	NA	1.0E-01
1,2-Dichloroethene (total)	2.8E-02	7.0E-02	1.6E-10	7.0E-08	1.9E-11	2.2E-08	1.0E-01
1-Chlorohexane	NC	NC	NA	NA	NA	NA	1.0E-01
2-Butanone	3.7E-02	3.7E-02	2.1E-10	3.7E-08	2.5E-11	1.2E-08	1.0E-01
2-Hexanone	NC	NC	NA	NA	NA	NA	1.0E-01
Acetone	6.8E-01	4.2E+00	3.8E-09	4.2E-06	4.5E-10	1.3E-06	1.0E-01
Benzene	NC	NC	NA	NA	NA	NA	1.0E-01
Carbon disulfide	NC	NC	NA	NA	NA	NA	1.0E-02
Chloromethane	NC	NC	NA	NA	NA	NA	1.0E-01
cis-1,2-Dichloroethene	NC	NC	NA	NA	NA	NA	1.0E-01
Ethylbenzene	NC	NC	NA	NA	NA	NA	1.0E-01
m,p-Xylene	NC	NC	NA	NA	NA	NA	1.0E-01
Methylene chloride	1.3E-02	1.3E-02	7.3E-11	1.3E-08	8.7E-12	4.2E-09	1.0E-01
Tetrachloroethene	2.1E-02	8.8E-02	1.2E-10	8.9E-08	1.4E-11	2.8E-08	1.0E-01
Toluene	5.6E-02	3.4E-01	3.1E-10	3.4E-07	3.8E-11	1.1E-07	1.0E-01
Trichloroethene	3.7E-02	2.0E-01	2.1E-10	2.0E-07	2.5E-11	6.5E-08	1.0E-01
Xylenes (total)	2.5E-02	5.1E-02	1.4E-10	5.2E-08	1.7E-11	1.6E-08	1.0E-01
SVOCs							
2-Methylnaphthalene	NC	NC	NA	NA	NA	NA	1.3E-01
Acenaphthene	4.4E-02	1.0E-01	3.2E-10	1.3E-07	3.8E-11	4.2E-08	1.3E-01
Acenaphthylene	3.1E-02	8.5E-02	2.2E-10	1.1E-07	2.7E-11	3.5E-08	1.3E-01
Anthracene	3.9E-02	8.2E-02	2.8E-10	1.1E-07	3.4E-11	3.4E-08	1.3E-01

Estimates of Human Intake
Soil Dermal Contact Pathway for Adult Recreator - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation: $$\text{Dosage} = \frac{C \times SA \times AF \times B \times CF \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Skin surface area per event	SA	cm^2/day	5700	5700
Soil loading to skin	AF	mg/cm^2	0.01	0.90
Bioavailability	B	fraction	CS	CS
Conversion factor	CF	kg/mg	1.E-06	1.E-06
Exposure frequency	EF	days/year	25	50
Exposure duration	ED	years	9	24
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
Benzo(a)anthracene	3.6E-02	1.5E-01	2.6E-10	1.9E-07	3.1E-11	6.2E-08	1.3E-01
Benzo(a)pyrene	3.6E-02	1.5E-01	2.6E-10	1.9E-07	3.1E-11	6.2E-08	1.3E-01
Benzo(e)pyrene	1.9E-02	6.3E-02	1.4E-10	8.2E-08	1.6E-11	2.6E-08	1.3E-01
Benzo(b)fluoranthene	4.9E-02	2.7E-01	3.5E-10	3.5E-07	4.2E-11	1.1E-07	1.3E-01
Benzo(g,h,i)perylene	4.1E-02	9.0E-02	3.0E-10	1.2E-07	3.6E-11	3.8E-08	1.3E-01
Benzo(k)fluoranthene	3.0E-02	8.5E-02	2.2E-10	1.1E-07	2.6E-11	3.5E-08	1.3E-01
Chrysene	4.4E-02	2.2E-01	3.2E-10	2.8E-07	3.9E-11	9.0E-08	1.3E-01
Dibenz(a,h)anthracene	2.9E-02	8.5E-02	2.1E-10	1.1E-07	2.5E-11	3.5E-08	1.3E-01
Dibenzofuran	NC	NC	NA	NA	NA	NA	1.3E-01
Fluoranthene	6.0E-02	3.8E-01	4.4E-10	4.9E-07	5.2E-11	1.6E-07	1.3E-01
Fluorene	4.4E-02	1.0E-01	3.2E-10	1.3E-07	3.8E-11	4.2E-08	1.3E-01
Indeno(1,2,3-cd)pyrene	3.4E-02	1.4E-01	2.5E-10	1.8E-07	3.0E-11	5.7E-08	1.3E-01
Naphthalene	NC	NC	NA	NA	NA	NA	1.3E-01
Perylene	1.1E-02	3.6E-02	7.7E-11	4.7E-08	9.3E-12	1.5E-08	1.3E-01
Phenanthrene	7.9E-02	2.0E-01	5.8E-10	2.6E-07	6.9E-11	8.4E-08	1.3E-01
Pyrene	5.3E-02	1.6E-01	3.9E-10	2.0E-07	4.6E-11	6.5E-08	1.3E-01
Total Petroleum Hydrocarbons							
C11-C14(Kerosene Range)	9.7E+00	4.0E+01	7.0E-08	5.2E-05	8.4E-09	1.7E-05	1.3E-01
C14-C20(Diesel Range)	7.5E+00	7.5E+00	5.4E-08	9.7E-06	6.5E-09	3.1E-06	1.3E-01
C20-C30(Lubricant Oil Range)	7.3E+01	4.7E+02	5.3E-07	6.1E-04	6.4E-08	2.0E-04	1.3E-01
PCDD/PCDFs							
2,3,7,8-TCDD	2.7E-07	5.3E-07	4.6E-16	1.6E-13	5.5E-17	5.1E-14	3.0E-02
1,2,3,7,8-PeCDD	1.1E-06	2.2E-06	1.8E-15	6.5E-13	2.2E-16	2.1E-13	3.0E-02
1,2,3,4,7,8-HxCDD	4.1E-06	9.0E-06	6.9E-15	2.7E-12	8.2E-16	8.7E-13	3.0E-02
1,2,3,6,7,8-HxCDD	1.6E-05	3.0E-05	2.6E-14	8.9E-12	3.2E-15	2.9E-12	3.0E-02
1,2,3,7,8,9-HxCDD	5.9E-06	1.0E-05	9.9E-15	3.0E-12	1.2E-15	9.6E-13	3.0E-02
1,2,3,4,6,7,8-HpCDD	5.7E-04	1.2E-03	9.5E-13	3.6E-10	1.1E-13	1.1E-10	3.0E-02
OCDD	8.4E-03	1.7E-02	1.4E-11	5.1E-09	1.7E-12	1.6E-09	3.0E-02
2,3,7,8-TCDF	5.5E-07	7.9E-07	9.2E-16	2.4E-13	1.1E-16	7.6E-14	3.0E-02
1,2,3,7,8-PeCDF	2.8E-07	5.7E-07	4.6E-16	1.7E-13	5.6E-17	5.5E-14	3.0E-02
2,3,4,7,8-PeCDF	8.2E-07	1.6E-06	1.4E-15	4.7E-13	1.6E-16	1.5E-13	3.0E-02
1,2,3,4,7,8-HxCDF	1.8E-06	3.3E-06	3.0E-15	1.0E-12	3.6E-16	3.2E-13	3.0E-02
1,2,3,6,7,8-HxCDF	1.6E-06	3.2E-06	2.6E-15	9.5E-13	3.1E-16	3.0E-13	3.0E-02
2,3,4,6,7,8-HxCDF	3.8E-06	8.8E-06	6.4E-15	2.6E-12	7.7E-16	8.5E-13	3.0E-02
1,2,3,7,8,9-HxCDF	3.6E-07	9.7E-07	6.0E-16	2.9E-13	7.3E-17	9.3E-14	3.0E-02
1,2,3,4,6,7,8-HpCDF	5.3E-05	9.6E-05	8.8E-14	2.9E-11	1.1E-14	9.2E-12	3.0E-02
1,2,3,4,7,8,9-HpCDF	4.9E-06	9.2E-06	8.1E-15	2.8E-12	9.8E-16	8.9E-13	3.0E-02

Estimates of Human Intake
Soil Dermal Contact Pathway for Adult Recreator - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation: $$\text{Dosage} = \frac{C \times SA \times AF \times B \times CF \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Skin surface area per event	SA	cm^2/day	5700	5700
Soil loading to skin	AF	mg/cm^2	0.01	0.90
Bioavailability	B	fraction	CS	CS
Conversion factor	CF	kg/mg	1.E-06	1.E-06
Exposure frequency	EF	days/year	25	50
Exposure duration	ED	years	9	24
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
OCDF	1.4E-04	2.4E-04	2.3E-13	7.1E-11	2.7E-14	2.3E-11	3.0E-02
PCBs							
Aroclor-1254	1.6E-01	4.3E-01	1.3E-09	6.0E-07	1.5E-10	1.9E-07	1.4E-01
Aroclor-1260	1.3E+00	7.3E+00	1.0E-08	1.0E-05	1.2E-09	3.3E-06	1.4E-01
PCB-105	1.1E-04	5.6E-04	8.9E-13	7.9E-10	1.1E-13	2.5E-10	1.4E-01
PCB-114	2.2E-06	1.0E-05	1.7E-14	1.4E-11	2.0E-15	4.5E-12	1.4E-01
PCB-118	2.3E-04	1.1E-03	1.8E-12	1.6E-09	2.2E-13	5.1E-10	1.4E-01
PCB-123	3.2E-06	1.6E-05	2.5E-14	2.2E-11	3.0E-15	7.2E-12	1.4E-01
PCB-126	8.8E-06	4.4E-05	6.8E-14	6.2E-11	8.2E-15	2.0E-11	1.4E-01
PCB-156	7.5E-05	3.8E-04	5.8E-13	5.3E-10	7.0E-14	1.7E-10	1.4E-01
PCB-157	3.3E-05	1.7E-04	2.6E-13	2.4E-10	3.1E-14	7.6E-11	1.4E-01
PCB-167	5.7E-05	2.9E-04	4.5E-13	4.1E-10	5.4E-14	1.3E-10	1.4E-01
PCB-169	8.6E-07	4.4E-06	6.7E-15	6.2E-12	8.0E-16	2.0E-12	1.4E-01
PCB-189	8.6E-06	4.4E-05	6.7E-14	6.2E-11	8.0E-15	2.0E-11	1.4E-01
PCB-77	1.8E-05	8.8E-05	1.4E-13	1.2E-10	1.6E-14	3.9E-11	1.4E-01
PCB-81	3.1E-06	1.6E-05	2.4E-14	2.2E-11	2.9E-15	7.0E-12	1.4E-01

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005),
except dermal absorption factors which were taken from USEPA (2001).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCDD/PCDF - Polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.
PCB - polychlorinated biphenyls
mg/kg-day - milligrams per kilogram per day
mg/kg - milligrams per kilogram

Estimates of Human Intake
Soil Ingestion Pathway for Adult Recreator - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times CF \times FT \times EF \times ED \times B}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Soil ingestion rate	IR	mg/day	50	100
Conversion factor	CF	kg/mg	1.E-06	1.E-06
Exposure frequency	EF	days/year	25	50
Exposure duration	ED	years	9	24
Bioavailability	B	fraction	CS	CS
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
Inorganic Compounds							
Aluminum	NC	NC	NA	NA	NA	NA	1
Antimony	NC	NC	NA	NA	NA	NA	1
Arsenic	NC	NC	NA	NA	NA	NA	1
Cadmium	2.4E-01	4.2E-01	1.2E-08	8.1E-08	1.4E-09	2.6E-08	1
Chromium	NC	NC	NA	NA	NA	NA	1
Copper	9.9E+00	2.0E+01	4.9E-07	3.9E-06	5.8E-08	1.2E-06	1
Fluoride	NC	NC	NA	NA	NA	NA	1
Lead	9.3E+00	1.3E+01	4.5E-07	2.5E-06	5.5E-08	7.9E-07	1
Mercury	2.1E+00	5.5E+00	1.0E-07	1.1E-06	1.3E-08	3.4E-07	1
Methyl Mercury	1.7E-03	3.6E-03	8.5E-11	7.1E-10	1.0E-11	2.3E-10	1
Nickel	NC	NC	NA	NA	NA	NA	1
Nitrate	NC	NC	NA	NA	NA	NA	1
Silver	1.0E+00	2.7E+00	5.0E-08	5.4E-07	6.0E-09	1.7E-07	1
Thallium	3.3E-01	3.3E-01	1.6E-08	6.5E-08	1.9E-09	2.1E-08	1
Vanadium	NC	NC	NA	NA	NA	NA	1
Zinc	8.4E+01	1.9E+02	4.1E-06	3.7E-05	4.9E-07	1.2E-05	1
VOCs							
1,1,1-Trichloroethane	NC	NC	NA	NA	NA	NA	1
1,1,2-Trichloro-1,2,2-trifluoroethane	1.2E-02	1.2E-02	5.9E-10	2.3E-09	7.0E-11	7.5E-10	1
1,1-Dichloroethane	NC	NC	NA	NA	NA	NA	1
1,2-Dichloroethane	NC	NC	NA	NA	NA	NA	1
1,2-Dichloroethene (total)	NC	NC	NA	NA	NA	NA	1
1-Chlorohexane	NC	NC	NA	NA	NA	NA	1
2-Butanone	2.1E-02	3.5E-02	1.0E-09	6.8E-09	1.3E-10	2.2E-09	1
2-Hexanone	NC	NC	NA	NA	NA	NA	1
Acetone	1.1E+00	5.2E+00	5.4E-08	1.0E-06	6.4E-09	3.3E-07	1
Benzene	NC	NC	NA	NA	NA	NA	1
Carbon disulfide	NC	NC	NA	NA	NA	NA	1
Chloromethane	NC	NC	NA	NA	NA	NA	1
cis-1,2-Dichloroethene	NC	NC	NA	NA	NA	NA	1
Ethylbenzene	NC	NC	NA	NA	NA	NA	1
m,p-Xylene	NC	NC	NA	NA	NA	NA	1
Methylene chloride	1.0E-02	1.3E-02	5.0E-10	2.5E-09	6.0E-11	8.1E-10	1
Tetrachloroethene	NC	NC	NA	NA	NA	NA	1
Toluene	NC	NC	NA	NA	NA	NA	1
Trichloroethene	NC	NC	NA	NA	NA	NA	1
Xylenes (total)	NC	NC	NA	NA	NA	NA	1

Estimates of Human Intake
Soil Ingestion Pathway for Adult Recreator - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times CF \times FT \times EF \times ED \times B}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Soil ingestion rate	IR	mg/day	50	100
Conversion factor	CF	kg/mg	1.E-06	1.E-06
Exposure frequency	EF	days/year	25	50
Exposure duration	ED	years	9	24
Bioavailability	B	fraction	CS	CS
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
SVOCs							
2-Methylnaphthalene	NC	NC	NA	NA	NA	NA	1
Acenaphthene	2.6E-02	1.1E-01	1.3E-09	2.2E-08	1.5E-10	6.9E-09	1
Acenaphthylene	4.6E-03	1.6E-02	2.3E-10	3.0E-09	2.7E-11	9.7E-10	1
Anthracene	1.8E-02	7.3E-02	8.7E-10	1.4E-08	1.0E-10	4.6E-09	1
Benzo(a)anthracene	2.8E-03	8.8E-03	1.4E-10	1.7E-09	1.7E-11	5.5E-10	1
Benzo(a)pyrene	3.0E-03	8.9E-03	1.5E-10	1.7E-09	1.8E-11	5.6E-10	1
Benzo(e)pyrene	2.0E-02	6.7E-02	9.7E-10	1.3E-08	1.2E-10	4.2E-09	1
Benzo(b)fluoranthene	4.3E-03	1.1E-02	2.1E-10	2.2E-09	2.5E-11	6.9E-10	1
Benzo(g,h,i)perylene	1.2E-02	4.4E-02	5.8E-10	8.7E-09	7.0E-11	2.8E-09	1
Benzo(k)fluoranthene	2.8E-03	8.3E-03	1.4E-10	1.6E-09	1.6E-11	5.2E-10	1
Chrysene	5.1E-03	1.2E-02	2.5E-10	2.4E-09	3.0E-11	7.6E-10	1
Dibenz(a,h)anthracene	1.9E-03	6.9E-03	9.2E-11	1.3E-09	1.1E-11	4.3E-10	1
Dibenzofuran	NC	NC	NA	NA	NA	NA	1
Fluoranthene	5.6E-03	1.2E-02	2.8E-10	2.4E-09	3.3E-11	7.5E-10	1
Fluorene	2.6E-02	1.1E-01	1.3E-09	2.1E-08	1.5E-10	6.9E-09	1
Indeno(1,2,3-cd)pyrene	2.7E-03	8.5E-03	1.3E-10	1.7E-09	1.6E-11	5.3E-10	1
Naphthalene	NC	NC	NA	NA	NA	NA	1
Perylene	1.1E-02	3.8E-02	5.5E-10	7.5E-09	6.6E-11	2.4E-09	1
Phenanthrene	7.1E-02	3.0E-01	3.5E-09	5.8E-08	4.2E-10	1.9E-08	1
Pyrene	8.2E-03	2.8E-02	4.0E-10	5.5E-09	4.8E-11	1.8E-09	1
Total Petroleum Hydrocarbons							
C11-C14(Kerosene Range)	1.0E+01	4.0E+01	4.9E-07	7.8E-06	5.9E-08	2.5E-06	1
C14-C20(Diesel Range)	NC	NC	NA	NA	NA	NA	1
C20-C30(Lubricant Oil Range)	7.8E+01	4.7E+02	3.8E-06	9.2E-05	4.6E-07	2.9E-05	1
PCDD/PCDFs							
2,3,7,8-TCDD	1.9E-07	4.0E-07	9.1E-15	7.8E-14	1.1E-15	2.5E-14	1
1,2,3,7,8-PeCDD	7.3E-07	1.5E-06	3.6E-14	2.9E-13	4.3E-15	9.4E-14	1
1,2,3,4,7,8-HxCDD	2.1E-06	4.2E-06	1.0E-13	8.2E-13	1.3E-14	2.6E-13	1
1,2,3,6,7,8-HxCDD	1.1E-05	2.0E-05	5.4E-13	3.9E-12	6.5E-14	1.3E-12	1
1,2,3,7,8,9-HxCDD	4.5E-06	1.0E-05	2.2E-13	2.0E-12	2.7E-14	6.3E-13	1
1,2,3,4,6,7,8-HpCDD	3.1E-04	5.0E-04	1.5E-11	9.8E-11	1.8E-12	3.1E-11	1
OCDD	5.0E-03	7.3E-03	2.4E-10	1.4E-09	2.9E-11	4.6E-10	1
2,3,7,8-TCDF	4.7E-07	7.9E-07	2.3E-14	1.5E-13	2.8E-15	4.9E-14	1
1,2,3,7,8-PeCDF	1.8E-07	3.9E-07	8.6E-15	7.6E-14	1.0E-15	2.4E-14	1
2,3,4,7,8-PeCDF	5.4E-07	9.9E-07	2.6E-14	1.9E-13	3.2E-15	6.2E-14	1
1,2,3,4,7,8-HxCDF	1.2E-06	1.8E-06	5.7E-14	3.5E-13	6.8E-15	1.1E-13	1
1,2,3,6,7,8-HxCDF	9.5E-07	1.8E-06	4.6E-14	3.6E-13	5.5E-15	1.1E-13	1

Spreadsheet C3-45b (3 of 3)

Estimates of Human Intake
Soil Ingestion Pathway for Adult Recreator - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times CF \times FT \times EF \times ED \times B}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Soil ingestion rate	IR	mg/day	50	100
Conversion factor	CF	kg/mg	1.E-06	1.E-06
Exposure frequency	EF	days/year	25	50
Exposure duration	ED	years	9	24
Bioavailability	B	fraction	CS	CS
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
2,3,4,6,7,8-HxCDF	1.8E-06	3.0E-06	8.8E-14	5.9E-13	1.1E-14	1.9E-13	1
1,2,3,7,8,9-HxCDF	1.6E-07	1.8E-07	7.8E-15	3.4E-14	9.3E-16	1.1E-14	1
1,2,3,4,6,7,8-HpCDF	3.7E-05	5.0E-05	1.8E-12	9.8E-12	2.2E-13	3.1E-12	1
1,2,3,4,7,8,9-HpCDF	3.2E-06	4.2E-06	1.5E-13	8.3E-13	1.8E-14	2.7E-13	1
OCDF	1.0E-04	1.5E-04	4.9E-12	2.9E-11	5.9E-13	9.4E-12	1
PCBs							
Aroclor-1254	1.7E-01	4.3E-01	8.4E-09	8.4E-08	1.0E-09	2.7E-08	1
Aroclor-1260	1.5E+00	7.8E+00	7.2E-08	1.5E-06	8.6E-09	4.9E-07	1
PCB-105	1.3E-04	6.4E-04	6.1E-12	1.2E-10	7.4E-13	4.0E-11	1
PCB-114	2.4E-06	1.1E-05	1.2E-13	2.2E-12	1.4E-14	7.1E-13	1
PCB-118	2.5E-04	1.3E-03	1.2E-11	2.5E-10	1.5E-12	8.0E-11	1
PCB-123	3.5E-06	1.8E-05	1.7E-13	3.5E-12	2.1E-14	1.1E-12	1
PCB-126	9.6E-06	5.0E-05	4.7E-13	9.7E-12	5.7E-14	3.1E-12	1
PCB-156	8.3E-05	4.3E-04	4.0E-12	8.3E-11	4.8E-13	2.7E-11	1
PCB-157	3.6E-05	1.9E-04	1.8E-12	3.7E-11	2.1E-13	1.2E-11	1
PCB-167	6.3E-05	3.3E-04	3.1E-12	6.5E-11	3.7E-13	2.1E-11	1
PCB-169	9.4E-07	5.0E-06	4.6E-14	9.7E-13	5.5E-15	3.1E-13	1
PCB-189	9.4E-06	5.0E-05	4.6E-13	9.7E-12	5.5E-14	3.1E-12	1
PCB-77	1.9E-05	9.9E-05	9.4E-13	1.9E-11	1.1E-13	6.2E-12	1
PCB-81	3.4E-06	1.8E-05	1.7E-13	3.4E-12	2.0E-14	1.1E-12	1

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCDD/PCDF - Polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.
PCB - polychlorinated biphenyls
mg/kg-day - milligrams per kilogram per day
mg/kg - milligrams per kilogram

Estimates of Human Intake
Soil Ingestion Pathway for Adult Recreator - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times CF \times FT \times EF \times ED \times B}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Soil ingestion rate	IR	mg/day	50	100
Conversion factor	CF	kg/mg	1.E-06	1.E-06
Exposure frequency	EF	days/year	25	50
Exposure duration	ED	years	9	24
Bioavailability	B	fraction	CS	CS
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
Inorganic Compounds							
Cadmium	5.1E-01	1.1E+00	2.5E-08	2.2E-07	3.0E-09	7.1E-08	1
Copper	2.1E+01	4.6E+01	1.0E-06	8.9E-06	1.2E-07	2.9E-06	1
Fluoride	NC	NC	NA	NA	NA	NA	1
Lead	1.6E+01	3.4E+01	7.8E-07	6.6E-06	9.4E-08	2.1E-06	1
Mercury	1.9E+00	4.4E+00	9.3E-08	8.6E-07	1.1E-08	2.8E-07	1
Methyl Mercury	1.7E-03	3.6E-03	8.5E-11	7.1E-10	1.0E-11	2.3E-10	1
Nitrate	NC	NC	NA	NA	NA	NA	1
Silver	7.7E-01	2.9E+00	3.8E-08	5.6E-07	4.5E-09	1.8E-07	1
Thallium	3.3E-01	3.3E-01	1.6E-08	6.5E-08	1.9E-09	2.1E-08	1
Zinc	1.7E+02	4.4E+02	8.3E-06	8.6E-05	1.0E-06	2.7E-05	1
VOCs							
1,1,1-Trichloroethane	NC	NC	NA	NA	NA	NA	1
1,1,2-Trichloro-1,2,2-trifluoroethane	1.2E-02	1.2E-02	5.9E-10	2.3E-09	7.0E-11	7.5E-10	1
1,1-Dichloroethane	NC	NC	NA	NA	NA	NA	1
1,2-Dichloroethane	NC	NC	NA	NA	NA	NA	1
1,2-Dichloroethene (total)	2.8E-02	7.0E-02	1.4E-09	1.4E-08	1.7E-10	4.4E-09	1
1-Chlorohexane	NC	NC	NA	NA	NA	NA	1
2-Butanone	3.7E-02	3.7E-02	1.8E-09	7.2E-09	2.2E-10	2.3E-09	1
2-Hexanone	NC	NC	NA	NA	NA	NA	1
Acetone	6.8E-01	4.2E+00	3.3E-08	8.2E-07	4.0E-09	2.6E-07	1
Benzene	NC	NC	NA	NA	NA	NA	1
Carbon disulfide	NC	NC	NA	NA	NA	NA	1
Chloromethane	NC	NC	NA	NA	NA	NA	1
cis-1,2-Dichloroethene	NC	NC	NA	NA	NA	NA	1
Ethylbenzene	NC	NC	NA	NA	NA	NA	1
m,p-Xylene	NC	NC	NA	NA	NA	NA	1
Methylene chloride	1.3E-02	1.3E-02	6.4E-10	2.5E-09	7.6E-11	8.1E-10	1
Tetrachloroethene	2.1E-02	8.8E-02	1.0E-09	1.7E-08	1.2E-10	5.5E-09	1
Toluene	5.6E-02	3.4E-01	2.7E-09	6.7E-08	3.3E-10	2.1E-08	1
Trichloroethene	3.7E-02	2.0E-01	1.8E-09	4.0E-08	2.2E-10	1.3E-08	1
Xylenes (total)	2.5E-02	5.1E-02	1.2E-09	1.0E-08	1.5E-10	3.2E-09	1
SVOCs							
2-Methylnaphthalene	NC	NC	NA	NA	NA	NA	1
Acenaphthene	4.4E-02	1.0E-01	2.2E-09	2.0E-08	2.6E-10	6.3E-09	1
Acenaphthylene	3.1E-02	8.5E-02	1.5E-09	1.7E-08	1.8E-10	5.3E-09	1
Anthracene	3.9E-02	8.2E-02	1.9E-09	1.6E-08	2.3E-10	5.1E-09	1
Benzo(a)anthracene	3.6E-02	1.5E-01	1.8E-09	2.9E-08	2.1E-10	9.3E-09	1

Estimates of Human Intake
Soil Ingestion Pathway for Adult Recreator - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times CF \times FT \times EF \times ED \times B}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Soil ingestion rate	IR	mg/day	50	100
Conversion factor	CF	kg/mg	1.E-06	1.E-06
Exposure frequency	EF	days/year	25	50
Exposure duration	ED	years	9	24
Bioavailability	B	fraction	CS	CS
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
Benzo(a)pyrene	3.6E-02	1.5E-01	1.8E-09	2.9E-08	2.1E-10	9.3E-09	1
Benzo(e)pyrene	1.9E-02	6.3E-02	9.1E-10	1.2E-08	1.1E-10	3.9E-09	1
Benzo(b)fluoranthene	4.9E-02	2.7E-01	2.4E-09	5.2E-08	2.9E-10	1.7E-08	1
Benzo(g,h,i)perylene	4.1E-02	9.0E-02	2.0E-09	1.8E-08	2.4E-10	5.6E-09	1
Benzo(k)fluoranthene	3.0E-02	8.5E-02	1.5E-09	1.7E-08	1.7E-10	5.3E-09	1
Chrysene	4.4E-02	2.2E-01	2.2E-09	4.2E-08	2.6E-10	1.4E-08	1
Dibenz(a,h)anthracene	2.9E-02	8.5E-02	1.4E-09	1.7E-08	1.7E-10	5.3E-09	1
Dibenzofuran	NC	NC	NA	NA	NA	NA	1
Fluoranthene	6.0E-02	3.8E-01	2.9E-09	7.3E-08	3.5E-10	2.4E-08	1
Fluorene	4.4E-02	1.0E-01	2.2E-09	1.9E-08	2.6E-10	6.2E-09	1
Indeno(1,2,3-cd)pyrene	3.4E-02	1.4E-01	1.7E-09	2.7E-08	2.0E-10	8.5E-09	1
Naphthalene	NC	NC	NA	NA	NA	NA	1
Perylene	1.1E-02	3.6E-02	5.2E-10	7.0E-09	6.2E-11	2.2E-09	1
Phenanthrene	7.9E-02	2.0E-01	3.9E-09	3.9E-08	4.7E-10	1.3E-08	1
Pyrene	5.3E-02	1.6E-01	2.6E-09	3.1E-08	3.1E-10	9.8E-09	1
Total Petroleum Hydrocarbons							
C11-C14(Kerosene Range)	9.7E+00	4.0E+01	4.7E-07	7.8E-06	5.7E-08	2.5E-06	1
C14-C20(Diesel Range)	7.5E+00	7.5E+00	3.6E-07	1.5E-06	4.4E-08	4.7E-07	1
C20-C30(Lubricant Oil Range)	7.3E+01	4.7E+02	3.6E-06	9.2E-05	4.3E-07	2.9E-05	1
PCDD/PCDFs							
2,3,7,8-TCDD	2.7E-07	5.3E-07	1.3E-14	1.0E-13	1.6E-15	3.3E-14	1
1,2,3,7,8-PeCDD	1.1E-06	2.2E-06	5.4E-14	4.3E-13	6.5E-15	1.4E-13	1
1,2,3,4,7,8-HxCDD	4.1E-06	9.0E-06	2.0E-13	1.8E-12	2.4E-14	5.7E-13	1
1,2,3,6,7,8-HxCDD	1.6E-05	3.0E-05	7.7E-13	5.8E-12	9.3E-14	1.9E-12	1
1,2,3,7,8,9-HxCDD	5.9E-06	1.0E-05	2.9E-13	2.0E-12	3.5E-14	6.3E-13	1
1,2,3,4,6,7,8-HpCDD	5.7E-04	1.2E-03	2.8E-11	2.3E-10	3.3E-12	7.4E-11	1
OCDD	8.4E-03	1.7E-02	4.1E-10	3.3E-09	4.9E-11	1.1E-09	1
2,3,7,8-TCDF	5.5E-07	7.9E-07	2.7E-14	1.5E-13	3.2E-15	4.9E-14	1
1,2,3,7,8-PeCDF	2.8E-07	5.7E-07	1.4E-14	1.1E-13	1.6E-15	3.6E-14	1
2,3,4,7,8-PeCDF	8.2E-07	1.6E-06	4.0E-14	3.1E-13	4.8E-15	9.8E-14	1
1,2,3,4,7,8-HxCDF	1.8E-06	3.3E-06	8.7E-14	6.5E-13	1.0E-14	2.1E-13	1
1,2,3,6,7,8-HxCDF	1.6E-06	3.2E-06	7.6E-14	6.2E-13	9.1E-15	2.0E-13	1
2,3,4,6,7,8-HxCDF	3.8E-06	8.8E-06	1.9E-13	1.7E-12	2.3E-14	5.5E-13	1
1,2,3,7,8,9-HxCDF	3.6E-07	9.7E-07	1.8E-14	1.9E-13	2.1E-15	6.1E-14	1
1,2,3,4,6,7,8-HpCDF	5.3E-05	9.6E-05	2.6E-12	1.9E-11	3.1E-13	6.0E-12	1
1,2,3,4,7,8,9-HpCDF	4.9E-06	9.2E-06	2.4E-13	1.8E-12	2.9E-14	5.8E-13	1
OCDF	1.4E-04	2.4E-04	6.6E-12	4.6E-11	7.9E-13	1.5E-11	1

Estimates of Human Intake
Soil Ingestion Pathway for Adult Recreator - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times CF \times FT \times EF \times ED \times B}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Soil ingestion rate	IR	mg/day	50	100
Conversion factor	CF	kg/mg	1.E-06	1.E-06
Exposure frequency	EF	days/year	25	50
Exposure duration	ED	years	9	24
Bioavailability	B	fraction	CS	CS
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
PCBs							
Aroclor-1016	NC	NC	NA	NA	NA	NA	1
Aroclor-1254	1.6E-01	4.3E-01	7.9E-09	8.4E-08	9.5E-10	2.7E-08	1
Aroclor-1260	1.3E+00	7.3E+00	6.5E-08	1.4E-06	7.8E-09	4.6E-07	1
PCB-105	1.1E-04	5.6E-04	5.6E-12	1.1E-10	6.7E-13	3.5E-11	1
PCB-114	2.2E-06	1.0E-05	1.1E-13	2.0E-12	1.3E-14	6.3E-13	1
PCB-118	2.3E-04	1.1E-03	1.1E-11	2.2E-10	1.3E-12	7.1E-11	1
PCB-123	3.2E-06	1.6E-05	1.6E-13	3.1E-12	1.9E-14	1.0E-12	1
PCB-126	8.8E-06	4.4E-05	4.3E-13	8.6E-12	5.1E-14	2.7E-12	1
PCB-156	7.5E-05	3.8E-04	3.7E-12	7.4E-11	4.4E-13	2.4E-11	1
PCB-157	3.3E-05	1.7E-04	1.6E-12	3.3E-11	1.9E-13	1.1E-11	1
PCB-167	5.7E-05	2.9E-04	2.8E-12	5.8E-11	3.4E-13	1.8E-11	1
PCB-169	8.6E-07	4.4E-06	4.2E-14	8.6E-13	5.0E-15	2.7E-13	1
PCB-189	8.6E-06	4.4E-05	4.2E-13	8.6E-12	5.0E-14	2.7E-12	1
PCB-77	1.8E-05	8.8E-05	8.6E-13	1.7E-11	1.0E-13	5.5E-12	1
PCB-81	3.1E-06	1.6E-05	1.5E-13	3.0E-12	1.8E-14	9.7E-13	1

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCDD/PCDF - Polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.
PCB - polychlorinated biphenyls
mg/kg-day - milligrams per kilogram per day
mg/kg - milligrams per kilogram

Estimates of Human Intake
Groundwater to Indoor Air Pathway for Adult Worker
Sodium Reactor Experiment (SRE) Area

Intake Equation:

$$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	10.4	16.0
Fraction of time indoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	219	250
Exposure duration	ED	years	9	25
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	9125
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Inorganic Compounds						
Cadmium	NC	NC	NA	NA	NA	NA
Copper	NC	NC	NA	NA	NA	NA
Fluoride	NC	NC	NA	NA	NA	NA
Lead	NC	NC	NA	NA	NA	NA
Mercury	NC	NC	NA	NA	NA	NA
Methyl Mercury	NC	NC	NA	NA	NA	NA
Nitrate	NC	NC	NA	NA	NA	NA
Silver	NC	NC	NA	NA	NA	NA
Thallium	NC	NC	NA	NA	NA	NA
Zinc	NC	NC	NA	NA	NA	NA
VOCs						
1,1,1-Trichloroethane	NC	NC	NA	NA	NA	NA
1,1,2-Trichloro-1,2,2-trifluoroethane	NC	NC	NA	NA	NA	NA
1,1-Dichloroethane	1.3E-06	1.3E-06	6.0E-08	1.6E-07	7.2E-09	5.3E-08
1,2-Dichloroethane	2.2E-07	2.2E-07	9.8E-09	2.6E-08	1.2E-09	8.6E-09
1,2-Dichloroethene (total)	NC	NC	NA	NA	NA	NA
1-Chlorohexane	NC	NC	NA	NA	NA	NA
2-Butanone	NC	NC	NA	NA	NA	NA
2-Hexanone	NC	NC	NA	NA	NA	NA
Acetone	9.0E-09	9.0E-09	4.0E-10	1.1E-09	4.8E-11	3.5E-10
Benzene	1.2E-06	1.2E-06	5.5E-08	1.4E-07	6.5E-09	4.8E-08
Carbon disulfide	6.6E-06	6.6E-06	3.0E-07	7.8E-07	3.5E-08	2.6E-07
Chloromethane	1.8E-06	1.8E-06	8.2E-08	2.2E-07	9.9E-09	7.2E-08
cis-1,2-Dichloroethene	7.1E-07	7.1E-07	3.2E-08	8.4E-08	3.8E-09	2.8E-08
Ethylbenzene	NC	NC	NA	NA	NA	NA
m,p-Xylene	NC	NC	NA	NA	NA	NA
Methylene chloride	3.8E-07	3.8E-07	1.7E-08	4.5E-08	2.1E-09	1.5E-08
Tetrachloroethene	NC	NC	NA	NA	NA	NA
Toluene	NC	NC	NA	NA	NA	NA
Trichloroethene	1.6E-06	1.6E-06	7.3E-08	1.9E-07	8.8E-09	6.5E-08
Xylenes (total)	NC	NC	NA	NA	NA	NA
SVOCs						
2-Methylnaphthalene	NC	NC	NA	NA	NA	NA
Acenaphthene	NC	NC	NA	NA	NA	NA
Acenaphthylene	NC	NC	NA	NA	NA	NA
Anthracene	NC	NC	NA	NA	NA	NA
Benzo(a)anthracene	NC	NC	NA	NA	NA	NA
Benzo(a)pyrene	NC	NC	NA	NA	NA	NA
Benzo(b)fluoranthene	NC	NC	NA	NA	NA	NA
Benzo(g,h,i)perylene	NC	NC	NA	NA	NA	NA
Benzo(k)fluoranthene	NC	NC	NA	NA	NA	NA
Chrysene	NC	NC	NA	NA	NA	NA
Dibenz(a,h)anthracene	NC	NC	NA	NA	NA	NA
Dibenzofuran	NC	NC	NA	NA	NA	NA
Benzo(e)pyrene	NC	NC	NA	NA	NA	NA
Fluoranthene	NC	NC	NA	NA	NA	NA
Fluorene	NC	NC	NA	NA	NA	NA
Indeno(1,2,3-cd)pyrene	NC	NC	NA	NA	NA	NA

Estimates of Human Intake
Groundwater to Indoor Air Pathway for Adult Worker
Sodium Reactor Experiment (SRE) Area

Intake Equation:

$$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	10.4	16.0
Fraction of time indoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	219	250
Exposure duration	ED	years	9	25
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	9125
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Naphthalene	NC	NC	NA	NA	NA	NA
Perylene	NC	NC	NA	NA	NA	NA
Phenanthrene	NC	NC	NA	NA	NA	NA
Pyrene	NC	NC	NA	NA	NA	NA
Total Petroleum Hydrocarbons						
C11-C14(Kerosene Range)	NC	NC	NA	NA	NA	NA
C14-C20(Diesel Range)	NC	NC	NA	NA	NA	NA
C20-C30(Lubricant Oil Range)	NC	NC	NA	NA	NA	NA
PCDD/PCDFs						
2,3,7,8-TCDD	NC	NC	NA	NA	NA	NA
1,2,3,7,8-PeCDD	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,6,7,8-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,7,8,9-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,4,6,7,8-HpCDD	NC	NC	NA	NA	NA	NA
OCDD	NC	NC	NA	NA	NA	NA
2,3,7,8-TCDF	NC	NC	NA	NA	NA	NA
1,2,3,7,8-PeCDF	NC	NC	NA	NA	NA	NA
2,3,4,7,8-PeCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA
2,3,4,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,7,8,9-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,6,7,8-HpCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8,9-HpCDF	NC	NC	NA	NA	NA	NA
OCDF	NC	NC	NA	NA	NA	NA
PCBs						
Aroclor-1254	NC	NC	NA	NA	NA	NA
Aroclor-1260	NC	NC	NA	NA	NA	NA
PCB-105	NC	NC	NA	NA	NA	NA
PCB-114	NC	NC	NA	NA	NA	NA
PCB-118	NC	NC	NA	NA	NA	NA
PCB-123	NC	NC	NA	NA	NA	NA
PCB-126	NC	NC	NA	NA	NA	NA
PCB-156	NC	NC	NA	NA	NA	NA
PCB-157	NC	NC	NA	NA	NA	NA
PCB-167	NC	NC	NA	NA	NA	NA
PCB-169	NC	NC	NA	NA	NA	NA
PCB-189	NC	NC	NA	NA	NA	NA
PCB-77	NC	NC	NA	NA	NA	NA
PCB-81	NC	NC	NA	NA	NA	NA

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)

Estimates of Human Intake
Groundwater to Indoor Air Pathway for Adult Worker
Sodium Reactor Experiment (SRE) Area

Intake Equation:

$$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	10.4	16.0
Fraction of time indoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	219	250
Exposure duration	ED	years	9	25
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	9125
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)

EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCDD/PCDF - Polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.
PCB - polychlorinated biphenyls
mg/kg-day - milligrams per kilogram per day
mg/m^3 - milligrams per cubic meter

Estimates of Human Intake
Soil Vapor to Indoor Air Pathway for Adult Worker
Sodium Reactor Experiment (SRE) Area

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	10.4	16.0
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	219	250
Exposure duration	ED	years	9	25
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	9125
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Inorganic Compounds						
Cadmium	NC	NC	NA	NA	NA	NA
Copper	NC	NC	NA	NA	NA	NA
Fluoride	NC	NC	NA	NA	NA	NA
Lead	NC	NC	NA	NA	NA	NA
Mercury	NC	NC	NA	NA	NA	NA
Methyl Mercury	NC	NC	NA	NA	NA	NA
Nitrate	NC	NC	NA	NA	NA	NA
Silver	NC	NC	NA	NA	NA	NA
Thallium	NC	NC	NA	NA	NA	NA
Zinc	NC	NC	NA	NA	NA	NA
VOCs						
1,1,1-Trichloroethane	2.1E-04	2.1E-04	9.3E-06	2.5E-05	1.1E-06	8.2E-06
1,1,2-Trichloro-1,2,2-trifluoroethane	1.1E-03	1.2E-03	4.7E-05	1.4E-04	5.7E-06	4.7E-05
1,1-Dichloroethane	2.0E-04	2.0E-04	9.1E-06	2.4E-05	1.1E-06	8.0E-06
1,2-Dichloroethane	NC	NC	NA	NA	NA	NA
1,2-Dichloroethene (total)	NC	NC	NA	NA	NA	NA
1-Chlorohexane	NC	NC	NA	NA	NA	NA
2-Butanone	NC	NC	NA	NA	NA	NA
2-Hexanone	NC	NC	NA	NA	NA	NA
Acetone	NC	NC	NA	NA	NA	NA
Benzene	NC	NC	NA	NA	NA	NA
Carbon disulfide	NC	NC	NA	NA	NA	NA
Chloromethane	NC	NC	NA	NA	NA	NA
cis-1,2-Dichloroethene	NC	NC	NA	NA	NA	NA
Ethylbenzene	2.0E-04	2.0E-04	9.1E-06	2.4E-05	1.1E-06	8.0E-06
m,p-Xylene	4.0E-04	4.0E-04	1.8E-05	4.6E-05	2.1E-06	1.5E-05
Methylene chloride	6.0E-03	6.0E-03	2.7E-04	7.0E-04	3.2E-05	2.3E-04
Tetrachloroethene	2.0E-04	2.0E-04	8.9E-06	2.4E-05	1.1E-06	7.8E-06
Toluene	2.2E-04	2.2E-04	9.8E-06	2.6E-05	1.2E-06	8.6E-06
Trichloroethene	2.1E-04	2.1E-04	9.4E-06	2.5E-05	1.1E-06	8.2E-06
Xylenes (total)	NC	NC	NA	NA	NA	NA
SVOCs						
2-Methylnaphthalene	NC	NC	NA	NA	NA	NA
Acenaphthene	NC	NC	NA	NA	NA	NA
Acenaphthylene	NC	NC	NA	NA	NA	NA

Estimates of Human Intake
Soil Vapor to Indoor Air Pathway for Adult Worker
Sodium Reactor Experiment (SRE) Area

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	10.4	16.0
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	219	250
Exposure duration	ED	years	9	25
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	9125
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Anthracene	NC	NC	NA	NA	NA	NA
Benzo(a)anthracene	NC	NC	NA	NA	NA	NA
Benzo(a)pyrene	NC	NC	NA	NA	NA	NA
Benzo(e)pyrene	NC	NC	NA	NA	NA	NA
Benzo(b)fluoranthene	NC	NC	NA	NA	NA	NA
Benzo(g,h,i)perylene	NC	NC	NA	NA	NA	NA
Benzo(k)fluoranthene	NC	NC	NA	NA	NA	NA
Chrysene	NC	NC	NA	NA	NA	NA
Dibenz(a,h)anthracene	NC	NC	NA	NA	NA	NA
Dibenzofuran	NC	NC	NA	NA	NA	NA
Fluoranthene	NC	NC	NA	NA	NA	NA
Fluorene	NC	NC	NA	NA	NA	NA
Indeno(1,2,3-cd)pyrene	NC	NC	NA	NA	NA	NA
Naphthalene	NC	NC	NA	NA	NA	NA
Perylene	NC	NC	NA	NA	NA	NA
Phenanthrene	NC	NC	NA	NA	NA	NA
Pyrene	NC	NC	NA	NA	NA	NA
Total Petroleum Hydrocarbons						
C11-C14(Kerosene Range)	NC	NC	NA	NA	NA	NA
C14-C20(Diesel Range)	NC	NC	NA	NA	NA	NA
C20-C30(Lubricant Oil Range)	NC	NC	NA	NA	NA	NA
PCDD/PCDFs						
2,3,7,8-TCDD	NC	NC	NA	NA	NA	NA
1,2,3,7,8-PeCDD	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,6,7,8-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,7,8,9-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,4,6,7,8-HpCDD	NC	NC	NA	NA	NA	NA
OCDD	NC	NC	NA	NA	NA	NA
2,3,7,8-TCDF	NC	NC	NA	NA	NA	NA
1,2,3,7,8-PeCDF	NC	NC	NA	NA	NA	NA
2,3,4,7,8-PeCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA
2,3,4,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,7,8,9-HxCDF	NC	NC	NA	NA	NA	NA

Estimates of Human Intake
Soil Vapor to Indoor Air Pathway for Adult Worker
Sodium Reactor Experiment (SRE) Area

Intake Equation:

$$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	10.4	16.0
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	219	250
Exposure duration	ED	years	9	25
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	9125
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
1,2,3,4,6,7,8-HpCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8,9-HpCDF	NC	NC	NA	NA	NA	NA
OCDF	NC	NC	NA	NA	NA	NA
PCBs						
Aroclor-1254	NC	NC	NA	NA	NA	NA
Aroclor-1260	NC	NC	NA	NA	NA	NA
PCB-105	NC	NC	NA	NA	NA	NA
PCB-114	NC	NC	NA	NA	NA	NA
PCB-118	NC	NC	NA	NA	NA	NA
PCB-123	NC	NC	NA	NA	NA	NA
PCB-126	NC	NC	NA	NA	NA	NA
PCB-156	NC	NC	NA	NA	NA	NA
PCB-157	NC	NC	NA	NA	NA	NA
PCB-167	NC	NC	NA	NA	NA	NA
PCB-169	NC	NC	NA	NA	NA	NA
PCB-189	NC	NC	NA	NA	NA	NA
PCB-77	NC	NC	NA	NA	NA	NA
PCB-81	NC	NC	NA	NA	NA	NA

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCDD/PCDF - Polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.
PCB - polychlorinated biphenyls
mg/kg-day - milligrams per kilogram per day
mg/m^3 - milligrams per cubic meter

Spreadsheet C3-41 (1 of 3)

Estimates of Human Intake
Groundwater to Ambient Air Pathway for Adult Worker
Sodium Reactor Experiment (SRE) Area

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	10.4	16.0
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	219	250
Exposure duration	ED	years	9	25
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	9125
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Inorganic Compounds						
Cadmium	NC	NC	NA	NA	NA	NA
Copper	NC	NC	NA	NA	NA	NA
Fluoride	NC	NC	NA	NA	NA	NA
Lead	NC	NC	NA	NA	NA	NA
Mercury	NC	NC	NA	NA	NA	NA
Methyl Mercury	NC	NC	NA	NA	NA	NA
Nitrate	NC	NC	NA	NA	NA	NA
Silver	NC	NC	NA	NA	NA	NA
Thallium	NC	NC	NA	NA	NA	NA
Zinc	NC	NC	NA	NA	NA	NA
VOCs						
1,1,1-Trichloroethane	NC	NC	NA	NA	NA	NA
1,1,2-Trichloro-1,2,2-trifluoroethane	NC	NC	NA	NA	NA	NA
1,1-Dichloroethane	2.8E-06	2.8E-06	1.3E-07	3.3E-07	1.5E-08	1.1E-07
1,2-Dichloroethane	6.6E-07	6.6E-07	2.9E-08	7.7E-08	3.5E-09	2.6E-08
1,2-Dichloroethene (total)	NC	NC	NA	NA	NA	NA
1-Chlorohexane	NC	NC	NA	NA	NA	NA
2-Butanone	NC	NC	NA	NA	NA	NA
2-Hexanone	NC	NC	NA	NA	NA	NA
Acetone	2.5E-08	2.5E-08	1.1E-09	2.9E-09	1.3E-10	9.7E-10
Benzene	3.2E-06	3.2E-06	1.4E-07	3.8E-07	1.7E-08	1.3E-07
Carbon disulfide	2.2E-05	2.2E-05	9.9E-07	2.6E-06	1.2E-07	8.7E-07
Chloromethane	8.5E-06	8.5E-06	3.8E-07	1.0E-06	4.5E-08	3.3E-07
cis-1,2-Dichloroethene	2.0E-06	2.0E-06	9.0E-08	2.4E-07	1.1E-08	7.9E-08
Ethylbenzene	NC	NC	NA	NA	NA	NA
m,p-Xylene	NC	NC	NA	NA	NA	NA
Methylene chloride	1.5E-06	1.5E-06	6.8E-08	1.8E-07	8.2E-09	6.0E-08
Tetrachloroethene	NC	NC	NA	NA	NA	NA
Toluene	NC	NC	NA	NA	NA	NA
Trichloroethene	5.3E-06	5.3E-06	2.4E-07	6.2E-07	2.8E-08	2.1E-07
Xylenes (total)	NC	NC	NA	NA	NA	NA
SVOCs						
2-Methylnaphthalene	NC	NC	NA	NA	NA	NA
Acenaphthene	NC	NC	NA	NA	NA	NA
Acenaphthylene	NC	NC	NA	NA	NA	NA
Anthracene	NC	NC	NA	NA	NA	NA
Benzo(a)anthracene	NC	NC	NA	NA	NA	NA
Benzo(a)pyrene	NC	NC	NA	NA	NA	NA
Benzo(b)fluoranthene	NC	NC	NA	NA	NA	NA
Benzo(g,h,i)perylene	NC	NC	NA	NA	NA	NA
Benzo(k)fluoranthene	NC	NC	NA	NA	NA	NA
Chrysene	NC	NC	NA	NA	NA	NA
Dibenz(a,h)anthracene	NC	NC	NA	NA	NA	NA
Dibenzofuran	NC	NC	NA	NA	NA	NA
Benzo(e)pyrene	NC	NC	NA	NA	NA	NA
Fluoranthene	NC	NC	NA	NA	NA	NA
Fluorene	NC	NC	NA	NA	NA	NA
Indeno(1,2,3-cd)pyrene	NC	NC	NA	NA	NA	NA
Naphthalene	NC	NC	NA	NA	NA	NA

Spreadsheet C3-41 (2 of 3)

Estimates of Human Intake
Groundwater to Ambient Air Pathway for Adult Worker
Sodium Reactor Experiment (SRE) Area

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	10.4	16.0
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	219	250
Exposure duration	ED	years	9	25
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	9125
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Perylene	NC	NC	NA	NA	NA	NA
Phenanthrene	NC	NC	NA	NA	NA	NA
Pyrene	NC	NC	NA	NA	NA	NA
Total Petroleum Hydrocarbons						
C11-C14(Kerosene Range)	NC	NC	NA	NA	NA	NA
C14-C20(Diesel Range)	NC	NC	NA	NA	NA	NA
C20-C30(Lubricant Oil Range)	NC	NC	NA	NA	NA	NA
PCDD/PCDFs						
2,3,7,8-TCDD	NC	NC	NA	NA	NA	NA
1,2,3,7,8-PeCDD	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,6,7,8-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,7,8,9-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,4,6,7,8-HpCDD	NC	NC	NA	NA	NA	NA
OCDD	NC	NC	NA	NA	NA	NA
2,3,7,8-TCDF	NC	NC	NA	NA	NA	NA
1,2,3,7,8-PeCDF	NC	NC	NA	NA	NA	NA
2,3,4,7,8-PeCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA
2,3,4,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,7,8,9-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,6,7,8-HpCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8,9-HpCDF	NC	NC	NA	NA	NA	NA
OCDF	NC	NC	NA	NA	NA	NA
PCBs						
Aroclor-1254	NC	NC	NA	NA	NA	NA
Aroclor-1260	NC	NC	NA	NA	NA	NA
PCB-105	NC	NC	NA	NA	NA	NA
PCB-114	NC	NC	NA	NA	NA	NA
PCB-118	NC	NC	NA	NA	NA	NA
PCB-123	NC	NC	NA	NA	NA	NA
PCB-126	NC	NC	NA	NA	NA	NA
PCB-156	NC	NC	NA	NA	NA	NA
PCB-157	NC	NC	NA	NA	NA	NA
PCB-167	NC	NC	NA	NA	NA	NA
PCB-169	NC	NC	NA	NA	NA	NA
PCB-189	NC	NC	NA	NA	NA	NA
PCB-77	NC	NC	NA	NA	NA	NA
PCB-81	NC	NC	NA	NA	NA	NA

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose

Spreadsheet C3-41 (3 of 3)

Estimates of Human Intake
Groundwater to Ambient Air Pathway for Adult Worker
Sodium Reactor Experiment (SRE) Area

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	10.4	16.0
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	219	250
Exposure duration	ED	years	9	25
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	9125
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)

LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCDD/PCDF - Polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.
PCB - polychlorinated biphenyls
mg/kg-day - milligrams per kilogram per day
mg/m^3 - milligrams per cubic meter

Spreadsheet C3-40b (1 of 3)

Estimates of Human Intake
Soil to Ambient Air Pathway for Adult Worker - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	10.4	16.0
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	219	250
Exposure duration	ED	years	9	25
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	9125
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Inorganic Compounds						
Aluminum	NC	NC	NA	NA	NA	NA
Antimony	NC	NC	NA	NA	NA	NA
Arsenic	NC	NC	NA	NA	NA	NA
Cadmium	NC	NC	NA	NA	NA	NA
Chromium	NC	NC	NA	NA	NA	NA
Copper	NC	NC	NA	NA	NA	NA
Fluoride	NC	NC	NA	NA	NA	NA
Lead	NC	NC	NA	NA	NA	NA
Mercury	NC	NC	NA	NA	NA	NA
Methyl Mercury	NC	NC	NA	NA	NA	NA
Nickel	NC	NC	NA	NA	NA	NA
Nitrate	NC	NC	NA	NA	NA	NA
Silver	NC	NC	NA	NA	NA	NA
Thallium	NC	NC	NA	NA	NA	NA
Vanadium	NC	NC	NA	NA	NA	NA
Zinc	NC	NC	NA	NA	NA	NA
VOCs						
1,1,1-Trichloroethane	NC	NC	NA	NA	NA	NA
1,1,2-Trichloro-1,2,2-trifluoroethane	NC	NC	NA	NA	NA	NA
1,1-Dichloroethane	2.8E-06	2.8E-06	1.3E-07	3.3E-07	1.5E-08	1.1E-07
1,2-Dichloroethane	6.6E-07	6.6E-07	2.9E-08	7.7E-08	3.5E-09	2.6E-08
1,2-Dichloroethene (total)	NC	NC	NA	NA	NA	NA
1-Chlorohexane	NC	NC	NA	NA	NA	NA
2-Butanone	NC	NC	NA	NA	NA	NA
2-Hexanone	NC	NC	NA	NA	NA	NA
Acetone	2.5E-08	2.5E-08	1.1E-09	2.9E-09	1.3E-10	9.7E-10
Benzene	3.2E-06	3.2E-06	1.4E-07	3.8E-07	1.7E-08	1.3E-07
Carbon disulfide	NC	NC	NA	NA	NA	NA
Chloromethane	NC	NC	NA	NA	NA	NA
cis-1,2-Dichloroethene	2.0E-06	2.0E-06	9.0E-08	2.4E-07	1.1E-08	7.9E-08
Ethylbenzene	NC	NC	NA	NA	NA	NA
m,p-Xylene	NC	NC	NA	NA	NA	NA
Methylene chloride	1.5E-06	1.5E-06	6.8E-08	1.8E-07	8.2E-09	6.0E-08
Tetrachloroethene	NC	NC	NA	NA	NA	NA
Toluene	NC	NC	NA	NA	NA	NA
Trichloroethene	5.3E-06	5.3E-06	2.4E-07	6.2E-07	2.8E-08	2.1E-07
Xylenes (total)	NC	NC	NA	NA	NA	NA

Spreadsheet C3-40b (2 of 3)

Estimates of Human Intake
Soil to Ambient Air Pathway for Adult Worker - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	10.4	16.0
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	219	250
Exposure duration	ED	years	9	25
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	9125
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
SVOCs						
2-Methylnaphthalene	NC	NC	NA	NA	NA	NA
Acenaphthene	NC	NC	NA	NA	NA	NA
Acenaphthylene	NC	NC	NA	NA	NA	NA
Anthracene	NC	NC	NA	NA	NA	NA
Benzo(a)anthracene	NC	NC	NA	NA	NA	NA
Benzo(a)pyrene	NC	NC	NA	NA	NA	NA
Benzo(e)pyrene	NC	NC	NA	NA	NA	NA
Benzo(b)fluoranthene	NC	NC	NA	NA	NA	NA
Benzo(g,h,i)perylene	NC	NC	NA	NA	NA	NA
Benzo(k)fluoranthene	NC	NC	NA	NA	NA	NA
Chrysene	NC	NC	NA	NA	NA	NA
Dibenz(a,h)anthracene	NC	NC	NA	NA	NA	NA
Dibenzofuran	NC	NC	NA	NA	NA	NA
Fluoranthene	NC	NC	NA	NA	NA	NA
Fluorene	NC	NC	NA	NA	NA	NA
Indeno(1,2,3-cd)pyrene	NC	NC	NA	NA	NA	NA
Naphthalene	NC	NC	NA	NA	NA	NA
Perylene	NC	NC	NA	NA	NA	NA
Phenanthrene	NC	NC	NA	NA	NA	NA
Pyrene	NC	NC	NA	NA	NA	NA
Total Petroleum Hydrocarbons						
C11-C14(Kerosene Range)	NC	NC	NA	NA	NA	NA
C14-C20(Diesel Range)	NC	NC	NA	NA	NA	NA
C20-C30(Lubricant Oil Range)	NC	NC	NA	NA	NA	NA
PCDD/PCDFs						
2,3,7,8-TCDD	NC	NC	NA	NA	NA	NA
1,2,3,7,8-PeCDD	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,6,7,8-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,7,8,9-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,4,6,7,8-HpCDD	NC	NC	NA	NA	NA	NA
OCDD	NC	NC	NA	NA	NA	NA
2,3,7,8-TCDF	NC	NC	NA	NA	NA	NA
1,2,3,7,8-PeCDF	NC	NC	NA	NA	NA	NA
2,3,4,7,8-PeCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA
2,3,4,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,7,8,9-HxCDF	NC	NC	NA	NA	NA	NA

Spreadsheet C3-40b (3 of 3)

Estimates of Human Intake
Soil to Ambient Air Pathway for Adult Worker - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	10.4	16.0
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	219	250
Exposure duration	ED	years	9	25
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	9125
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
1,2,3,4,6,7,8-HpCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8,9-HpCDF	NC	NC	NA	NA	NA	NA
OCDF	NC	NC	NA	NA	NA	NA
PCBs						
Aroclor-1254	NC	NC	NA	NA	NA	NA
Aroclor-1260	NC	NC	NA	NA	NA	NA
PCB-105	NC	NC	NA	NA	NA	NA
PCB-114	NC	NC	NA	NA	NA	NA
PCB-118	NC	NC	NA	NA	NA	NA
PCB-123	NC	NC	NA	NA	NA	NA
PCB-126	NC	NC	NA	NA	NA	NA
PCB-156	NC	NC	NA	NA	NA	NA
PCB-157	NC	NC	NA	NA	NA	NA
PCB-167	NC	NC	NA	NA	NA	NA
PCB-169	NC	NC	NA	NA	NA	NA
PCB-189	NC	NC	NA	NA	NA	NA
PCB-77	NC	NC	NA	NA	NA	NA
PCB-81	NC	NC	NA	NA	NA	NA

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCDD/PCDF - Polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.
PCB - polychlorinated biphenyls
mg/kg-day - milligrams per kilogram per day
mg/m^3 - milligrams per cubic meter

Spreadsheet C3-40a (1 of 3)

Estimates of Human Intake
Soil to Ambient Air Pathway for Adult Worker - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	10.4	16.0
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	219	250
Exposure duration	ED	years	9	25
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	9125
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Inorganic Compounds						
Cadmium	NC	NC	NA	NA	NA	NA
Copper	NC	NC	NA	NA	NA	NA
Fluoride	NC	NC	NA	NA	NA	NA
Lead	NC	NC	NA	NA	NA	NA
Mercury	NC	NC	NA	NA	NA	NA
Methyl Mercury	NC	NC	NA	NA	NA	NA
Nitrate	NC	NC	NA	NA	NA	NA
Silver	NC	NC	NA	NA	NA	NA
Thallium	NC	NC	NA	NA	NA	NA
Zinc	NC	NC	NA	NA	NA	NA
VOCs						
1,1,1-Trichloroethane	NC	NC	NA	NA	NA	NA
1,1,2-Trichloro-1,2,2-trifluoroethane	NC	NC	NA	NA	NA	NA
1,1-Dichloroethane	2.8E-06	2.8E-06	1.3E-07	3.3E-07	1.5E-08	1.1E-07
1,2-Dichloroethane	6.6E-07	6.6E-07	2.9E-08	7.7E-08	3.5E-09	2.6E-08
1,2-Dichloroethene (total)	NC	NC	NA	NA	NA	NA
1-Chlorohexane	NC	NC	NA	NA	NA	NA
2-Butanone	NC	NC	NA	NA	NA	NA
2-Hexanone	NC	NC	NA	NA	NA	NA
Acetone	2.5E-08	2.5E-08	1.1E-09	2.9E-09	1.3E-10	9.7E-10
Benzene	3.2E-06	3.2E-06	1.4E-07	3.8E-07	1.7E-08	1.3E-07
Carbon disulfide	NC	NC	NA	NA	NA	NA
Chloromethane	NC	NC	NA	NA	NA	NA
cis-1,2-Dichloroethene	2.0E-06	2.0E-06	9.0E-08	2.4E-07	1.1E-08	7.9E-08
Ethylbenzene	NC	NC	NA	NA	NA	NA
m,p-Xylene	NC	NC	NA	NA	NA	NA
Methylene chloride	1.5E-06	1.5E-06	6.8E-08	1.8E-07	8.2E-09	6.0E-08
Tetrachloroethene	NC	NC	NA	NA	NA	NA
Toluene	NC	NC	NA	NA	NA	NA
Trichloroethene	5.3E-06	5.3E-06	2.4E-07	6.2E-07	2.8E-08	2.1E-07
Xylenes (total)	NC	NC	NA	NA	NA	NA
SVOCs						
2-Methylnaphthalene	NC	NC	NA	NA	NA	NA
Acenaphthene	NC	NC	NA	NA	NA	NA
Acenaphthylene	NC	NC	NA	NA	NA	NA
Anthracene	NC	NC	NA	NA	NA	NA
Benzo(a)anthracene	NC	NC	NA	NA	NA	NA
Benzo(a)pyrene	NC	NC	NA	NA	NA	NA

Spreadsheet C3-40a (2 of 3)

Estimates of Human Intake
Soil to Ambient Air Pathway for Adult Worker - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	10.4	16.0
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	219	250
Exposure duration	ED	years	9	25
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	9125
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Benzo(e)pyrene	NC	NC	NA	NA	NA	NA
Benzo(b)fluoranthene	NC	NC	NA	NA	NA	NA
Benzo(g,h,i)perylene	NC	NC	NA	NA	NA	NA
Benzo(k)fluoranthene	NC	NC	NA	NA	NA	NA
Chrysene	NC	NC	NA	NA	NA	NA
Dibenz(a,h)anthracene	NC	NC	NA	NA	NA	NA
Dibenzofuran	NC	NC	NA	NA	NA	NA
Fluoranthene	NC	NC	NA	NA	NA	NA
Fluorene	NC	NC	NA	NA	NA	NA
Indeno(1,2,3-cd)pyrene	NC	NC	NA	NA	NA	NA
Naphthalene	NC	NC	NA	NA	NA	NA
Perylene	NC	NC	NA	NA	NA	NA
Phenanthrene	NC	NC	NA	NA	NA	NA
Pyrene	NC	NC	NA	NA	NA	NA
Total Petroleum Hydrocarbons						
C11-C14(Kerosene Range)	NC	NC	NA	NA	NA	NA
C14-C20(Diesel Range)	NC	NC	NA	NA	NA	NA
C20-C30(Lubricant Oil Range)	NC	NC	NA	NA	NA	NA
PCDD/PCDFs						
2,3,7,8-TCDD	NC	NC	NA	NA	NA	NA
1,2,3,7,8-PeCDD	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,6,7,8-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,7,8,9-HxCDD	NC	NC	NA	NA	NA	NA
1,2,3,4,6,7,8-HpCDD	NC	NC	NA	NA	NA	NA
OCDD	NC	NC	NA	NA	NA	NA
2,3,7,8-TCDF	NC	NC	NA	NA	NA	NA
1,2,3,7,8-PeCDF	NC	NC	NA	NA	NA	NA
2,3,4,7,8-PeCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA
2,3,4,6,7,8-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,7,8,9-HxCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,6,7,8-HpCDF	NC	NC	NA	NA	NA	NA
1,2,3,4,7,8,9-HpCDF	NC	NC	NA	NA	NA	NA
OCDF	NC	NC	NA	NA	NA	NA

Spreadsheet C3-40a (3 of 3)

Estimates of Human Intake
Soil to Ambient Air Pathway for Adult Worker - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	10.4	16.0
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	219	250
Exposure duration	ED	years	9	25
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	9125
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
PCBs						
Aroclor-1254	NC	NC	NA	NA	NA	NA
Aroclor-1260	NC	NC	NA	NA	NA	NA
PCB-105	NC	NC	NA	NA	NA	NA
PCB-114	NC	NC	NA	NA	NA	NA
PCB-118	NC	NC	NA	NA	NA	NA
PCB-123	NC	NC	NA	NA	NA	NA
PCB-126	NC	NC	NA	NA	NA	NA
PCB-156	NC	NC	NA	NA	NA	NA
PCB-157	NC	NC	NA	NA	NA	NA
PCB-167	NC	NC	NA	NA	NA	NA
PCB-169	NC	NC	NA	NA	NA	NA
PCB-189	NC	NC	NA	NA	NA	NA
PCB-77	NC	NC	NA	NA	NA	NA
PCB-81	NC	NC	NA	NA	NA	NA

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCDD/PCDF - Polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.
PCB - polychlorinated biphenyls
mg/kg-day - milligrams per kilogram per day
mg/m^3 - milligrams per cubic meter

Spreadsheet C3-39b (1 of 3)

Estimates of Human Intake
Soil Particulate Inhalation Pathway for Adult Worker - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation:

$$\text{Dosage} = \frac{C \times CF \times IR \times FT \times EF \times ED}{PEF \times BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Inhalation rate	IR	m^3/day	10.4	16.0
Conversion factor	CF	kg/ug	1.E-09	1.E-09
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	219	250
Exposure duration	ED	years	9	25
Particulate emission factor	PEF	m^3/ug	2.4	2.4
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	9125
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Inorganic Compounds						
Aluminum	NC	NC	NA	NA	NA	NA
Antimony	NC	NC	NA	NA	NA	NA
Arsenic	NC	NC	NA	NA	NA	NA
Cadmium	1.9E-01	3.0E-01	3.5E-12	1.5E-11	4.2E-13	4.9E-12
Chromium	NC	NC	NA	NA	NA	NA
Copper	9.7E+00	1.8E+01	1.8E-10	8.4E-10	2.1E-11	2.8E-10
Fluoride	NC	NC	NA	NA	NA	NA
Lead	9.2E+00	1.5E+01	1.7E-10	7.1E-10	2.0E-11	2.4E-10
Mercury	1.7E+00	3.8E+00	3.2E-11	1.8E-10	3.8E-12	6.1E-11
Methyl Mercury	1.7E-03	3.6E-03	3.2E-14	1.7E-13	3.8E-15	5.8E-14
Nickel	NC	NC	NA	NA	NA	NA
Nitrate	NC	NC	NA	NA	NA	NA
Silver	1.3E+00	2.7E+00	2.4E-11	1.3E-10	2.9E-12	4.3E-11
Thallium	9.9E-01	3.6E+00	1.8E-11	1.7E-10	2.2E-12	5.7E-11
Vanadium	NC	NC	NA	NA	NA	NA
Zinc	6.8E+01	2.2E+02	1.2E-09	1.1E-08	1.5E-10	3.5E-09
VOCs						
1,1,1-Trichloroethane	NC	NC	NA	NA	NA	NA
1,1,2-Trichloro-1,2,2-trifluoroethane	1.2E-02	1.2E-02	NA	NA	NA	NA
1,1-Dichloroethane	NC	NC	NA	NA	NA	NA
1,2-Dichloroethane	NC	NC	NA	NA	NA	NA
1,2-Dichloroethene (total)	NC	NC	NA	NA	NA	NA
1-Chlorohexane	1.0E-03	1.0E-03	NA	NA	NA	NA
2-Butanone	1.9E-02	2.7E-02	NA	NA	NA	NA
2-Hexanone	3.0E-03	3.0E-03	NA	NA	NA	NA
Acetone	6.2E-01	5.2E+00	NA	NA	NA	NA
Benzene	NC	NC	NA	NA	NA	NA
Carbon disulfide	NC	NC	NA	NA	NA	NA
Chloromethane	NC	NC	NA	NA	NA	NA
cis-1,2-Dichloroethene	NC	NC	NA	NA	NA	NA
Ethylbenzene	NC	NC	NA	NA	NA	NA
m,p-Xylene	3.4E-03	0.0E+00	NA	NA	NA	NA
Methylene chloride	9.9E-03	1.2E-02	NA	NA	NA	NA
Tetrachloroethene	NC	NC	NA	NA	NA	NA
Toluene	NC	NC	NA	NA	NA	NA
Trichloroethene	NC	NC	NA	NA	NA	NA
Xylenes (total)	NC	NC	NA	NA	NA	NA

Spreadsheet C3-39b (2 of 3)

Estimates of Human Intake
Soil Particulate Inhalation Pathway for Adult Worker - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation: $$\text{Dosage} = \frac{C \times CF \times IR \times FT \times EF \times ED}{PEF \times BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Inhalation rate	IR	m^3/day	10.4	16.0
Conversion factor	CF	kg/ug	1.E-09	1.E-09
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	219	250
Exposure duration	ED	years	9	25
Particulate emission factor	PEF	m^3/ug	2.4	2.4
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	9125
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
SVOCs						
2-Methylnaphthalene	2.2E-02	2.5E-02	3.9E-13	1.2E-12	4.7E-14	4.0E-13
Acenaphthene	6.8E-02	2.5E-01	1.2E-12	1.2E-11	1.5E-13	4.1E-12
Acenaphthylene	4.9E-03	1.4E-02	9.0E-14	6.5E-13	1.1E-14	2.2E-13
Anthracene	1.9E-01	9.9E-01	3.5E-12	4.7E-11	4.3E-13	1.6E-11
Benzo(a)anthracene	8.2E-01	1.4E+01	1.5E-11	6.7E-10	1.8E-12	2.2E-10
Benzo(a)pyrene	8.8E-01	1.5E+01	1.6E-11	7.2E-10	1.9E-12	2.4E-10
Benzo(e)pyrene	2.0E-02	5.5E-02	3.6E-13	2.6E-12	4.3E-14	8.8E-13
Benzo(b)fluoranthene	7.8E-01	6.9E+00	1.4E-11	3.3E-10	1.7E-12	1.1E-10
Benzo(g,h,i)perylene	2.7E-01	2.4E+00	4.8E-12	1.2E-10	5.8E-13	3.9E-11
Benzo(k)fluoranthene	8.7E-01	1.5E+01	1.6E-11	7.2E-10	1.9E-12	2.4E-10
Chrysene	6.0E-01	6.5E+00	1.1E-11	3.1E-10	1.3E-12	1.0E-10
Dibenz(a,h)anthracene	1.2E-01	1.1E+00	2.1E-12	5.3E-11	2.5E-13	1.8E-11
Dibenzofuran	2.8E-01	2.8E-01	5.1E-12	1.3E-11	6.1E-13	4.5E-12
Fluoranthene	1.5E+00	1.3E+01	2.7E-11	6.3E-10	3.2E-12	2.1E-10
Fluorene	7.0E-02	2.6E-01	1.3E-12	1.2E-11	1.5E-13	4.1E-12
Indeno(1,2,3-cd)pyrene	3.7E-01	3.3E+00	6.8E-12	1.6E-10	8.1E-13	5.3E-11
Naphthalene	2.0E-02	5.8E-02	3.6E-13	2.8E-12	4.3E-14	9.3E-13
Perylene	1.1E-02	3.1E-02	2.0E-13	1.5E-12	2.4E-14	5.0E-13
Phenanthrene	7.0E-01	5.8E+00	1.3E-11	2.8E-10	1.5E-12	9.3E-11
Pyrene	1.2E+00	1.1E+01	2.2E-11	5.2E-10	2.7E-12	1.7E-10
Total Petroleum Hydrocarbons						
C11-C14(Kerosene Range)	7.8E+00	3.8E+01	1.4E-10	1.8E-09	1.7E-11	6.1E-10
C14-C20(Diesel Range)	7.3E+00	1.8E+01	1.3E-10	8.6E-10	1.6E-11	2.9E-10
C20-C30(Lubricant Oil Range)	7.9E+01	4.3E+02	1.4E-09	2.0E-08	1.7E-10	6.8E-09
PCDD/PCDFs						
2,3,7,8-TCDD	1.5E-07	3.5E-07	2.7E-18	1.7E-17	3.3E-19	5.6E-18
1,2,3,7,8-PeCDD	5.6E-07	1.3E-06	1.0E-17	6.3E-17	1.2E-18	2.1E-17
1,2,3,4,7,8-HxCDD	1.6E-06	3.7E-06	3.0E-17	1.8E-16	3.6E-18	6.0E-17
1,2,3,6,7,8-HxCDD	8.3E-06	1.9E-05	1.5E-16	9.0E-16	1.8E-17	3.0E-16
1,2,3,7,8,9-HxCDD	3.4E-06	8.7E-06	6.3E-17	4.2E-16	7.5E-18	1.4E-16
1,2,3,4,6,7,8-HpCDD	2.4E-04	4.9E-04	4.3E-15	2.4E-14	5.1E-16	7.9E-15
OCDD	3.7E-03	7.3E-03	6.8E-14	3.5E-13	8.1E-15	1.2E-13
2,3,7,8-TCDF	3.6E-07	7.8E-07	6.6E-18	3.7E-17	8.0E-19	1.2E-17
1,2,3,7,8-PeCDF	1.5E-07	3.9E-07	2.7E-18	1.9E-17	3.2E-19	6.2E-18
2,3,4,7,8-PeCDF	4.2E-07	9.0E-07	7.7E-18	4.3E-17	9.2E-19	1.4E-17
1,2,3,4,7,8-HxCDF	8.8E-07	1.7E-06	1.6E-17	8.3E-17	1.9E-18	2.8E-17
1,2,3,6,7,8-HxCDF	7.2E-07	1.6E-06	1.3E-17	7.8E-17	1.6E-18	2.6E-17
2,3,4,6,7,8-HxCDF	1.4E-06	2.8E-06	2.5E-17	1.4E-16	3.0E-18	4.6E-17

Spreadsheet C3-39b (3 of 3)

Estimates of Human Intake
Soil Particulate Inhalation Pathway for Adult Worker - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation:

$$\text{Dosage} = \frac{C \times CF \times IR \times FT \times EF \times ED}{PEF \times BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Inhalation rate	IR	m^3/day	10.4	16.0
Conversion factor	CF	kg/ug	1.E-09	1.E-09
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	219	250
Exposure duration	ED	years	9	25
Particulate emission factor	PEF	m^3/ug	2.4	2.4
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	9125
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
1,2,3,7,8,9-HxCDF	1.4E-07	1.8E-07	2.5E-18	8.4E-18	3.0E-19	2.8E-18
1,2,3,4,6,7,8-HpCDF	2.8E-05	5.0E-05	5.0E-16	2.4E-15	6.0E-17	8.0E-16
1,2,3,4,7,8,9-HpCDF	2.4E-06	4.2E-06	4.3E-17	2.0E-16	5.2E-18	6.8E-17
OCDF	7.5E-05	1.5E-04	1.4E-15	7.2E-15	1.6E-16	2.4E-15
PCBs						
Aroclor-1254	1.6E-01	4.3E-01	3.0E-12	2.1E-11	3.6E-13	6.9E-12
Aroclor-1260	1.4E+00	7.7E+00	2.5E-11	3.7E-10	3.1E-12	1.2E-10
PCB-105	1.2E-04	6.3E-04	2.2E-15	3.0E-14	2.6E-16	1.0E-14
PCB-114	2.3E-06	1.1E-05	4.1E-17	5.3E-16	5.0E-18	1.8E-16
PCB-118	2.4E-04	1.3E-03	4.4E-15	6.0E-14	5.3E-16	2.0E-14
PCB-123	3.4E-06	1.8E-05	6.1E-17	8.5E-16	7.3E-18	2.8E-16
PCB-126	9.2E-06	4.9E-05	1.7E-16	2.3E-15	2.0E-17	7.8E-16
PCB-156	7.9E-05	4.2E-04	1.4E-15	2.0E-14	1.7E-16	6.7E-15
PCB-157	3.5E-05	1.9E-04	6.3E-16	9.0E-15	7.6E-17	3.0E-15
PCB-167	6.0E-05	3.3E-04	1.1E-15	1.6E-14	1.3E-16	5.2E-15
PCB-169	9.0E-07	4.9E-06	1.6E-17	2.3E-16	2.0E-18	7.8E-17
PCB-189	9.0E-06	4.9E-05	1.6E-16	2.3E-15	2.0E-17	7.8E-16
PCB-77	1.8E-05	9.7E-05	3.3E-16	4.7E-15	4.0E-17	1.6E-15
PCB-81	3.3E-06	1.7E-05	6.0E-17	8.3E-16	7.1E-18	2.8E-16

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCDD/PCDF - Polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.
PCB - polychlorinated biphenyls
mg/kg-day - milligrams per kilogram per day
mg/kg - milligrams per kilogram

Spreadsheet C3-39a (1 of 3)

Estimates of Human Intake
Soil Particulate Inhalation Pathway for Adult Worker - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation: $$\text{Dosage} = \frac{C \times CF \times IR \times FT \times EF \times ED}{PEF \times BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Inhalation rate	IR	m^3/day	10.4	16.0
Conversion factor	CF	kg/ug	1.E-09	1.E-09
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	219	250
Exposure duration	ED	years	9	25
Particulate emission factor	PEF	m^3/ug	2.4	2.4
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	9125
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Inorganic Compounds						
Cadmium	5.1E-01	1.1E+00	9.3E-12	5.5E-11	1.1E-12	1.8E-11
Copper	2.1E+01	4.6E+01	3.8E-10	2.2E-09	4.6E-11	7.3E-10
Fluoride	NC	NC	NA	NA	NA	NA
Lead	1.6E+01	3.4E+01	2.9E-10	1.6E-09	3.5E-11	5.4E-10
Mercury	1.9E+00	4.4E+00	3.5E-11	2.1E-10	4.2E-12	7.1E-11
Methyl Mercury	1.7E-03	3.6E-03	3.2E-14	1.7E-13	3.8E-15	5.8E-14
Nitrate	NC	NC	NA	NA	NA	NA
Silver	7.7E-01	2.9E+00	1.4E-11	1.4E-10	1.7E-12	4.6E-11
Thallium	3.3E-01	3.3E-01	6.0E-12	1.6E-11	7.2E-13	5.3E-12
Zinc	1.7E+02	4.4E+02	3.1E-09	2.1E-08	3.7E-10	7.0E-09
VOCs						
1,1,1-Trichloroethane	NC	NC	NA	NA	NA	NA
1,1,2-Trichloro-1,2,2-trifluoroethane	1.2E-02	1.2E-02	NA	NA	NA	NA
1,1-Dichloroethane	NC	NC	NA	NA	NA	NA
1,2-Dichloroethane	NC	NC	NA	NA	NA	NA
1,2-Dichloroethene (total)	2.8E-02	7.0E-02	NA	NA	NA	NA
1-Chlorohexane	NC	NC	NA	NA	NA	NA
2-Butanone	3.7E-02	3.7E-02	NA	NA	NA	NA
2-Hexanone	NC	NC	NA	NA	NA	NA
Acetone	6.8E-01	4.2E+00	NA	NA	NA	NA
Benzene	NC	NC	NA	NA	NA	NA
Carbon disulfide	NC	NC	NA	NA	NA	NA
Chloromethane	NC	NC	NA	NA	NA	NA
cis-1,2-Dichloroethene	NC	NC	NA	NA	NA	NA
Ethylbenzene	NC	NC	NA	NA	NA	NA
m,p-Xylene	NC	NC	NA	NA	NA	NA
Methylene chloride	1.3E-02	1.3E-02	NA	NA	NA	NA
Tetrachloroethene	2.1E-02	8.8E-02	NA	NA	NA	NA
Toluene	5.6E-02	3.4E-01	NA	NA	NA	NA
Trichloroethene	3.7E-02	2.0E-01	NA	NA	NA	NA
Xylenes (total)	2.5E-02	5.1E-02	NA	NA	NA	NA
SVOCs						
2-Methylnaphthalene	NC	NC	NA	NA	NA	NA
Acenaphthene	4.4E-02	1.0E-01	8.0E-13	4.8E-12	9.6E-14	1.6E-12
Acenaphthylene	3.1E-02	8.5E-02	5.6E-13	4.1E-12	6.7E-14	1.4E-12
Anthracene	3.9E-02	8.2E-02	7.1E-13	3.9E-12	8.5E-14	1.3E-12
Benzo(a)anthracene	3.6E-02	1.5E-01	6.5E-13	7.1E-12	7.9E-14	2.4E-12

Spreadsheet C3-39a (2 of 3)

Estimates of Human Intake
Soil Particulate Inhalation Pathway for Adult Worker - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation: $$\text{Dosage} = \frac{C \times CF \times IR \times FT \times EF \times ED}{PEF \times BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Inhalation rate	IR	m^3/day	10.4	16.0
Conversion factor	CF	kg/ug	1.E-09	1.E-09
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	219	250
Exposure duration	ED	years	9	25
Particulate emission factor	PEF	m^3/ug	2.4	2.4
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	9125
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Benzo(a)pyrene	3.6E-02	1.5E-01	6.6E-13	7.1E-12	7.9E-14	2.4E-12
Benzo(e)pyrene	1.9E-02	6.3E-02	3.4E-13	3.0E-12	4.1E-14	1.0E-12
Benzo(b)fluoranthene	4.9E-02	2.7E-01	8.9E-13	1.3E-11	1.1E-13	4.2E-12
Benzo(g,h,i)perylene	4.1E-02	9.0E-02	7.5E-13	4.3E-12	9.0E-14	1.4E-12
Benzo(k)fluoranthene	3.0E-02	8.5E-02	5.4E-13	4.1E-12	6.5E-14	1.4E-12
Chrysene	4.4E-02	2.2E-01	8.1E-13	1.0E-11	9.7E-14	3.5E-12
Dibenz(a,h)anthracene	2.9E-02	8.5E-02	5.3E-13	4.1E-12	6.4E-14	1.4E-12
Dibenzofuran	NC	NC	NA	NA	NA	NA
Fluoranthene	6.0E-02	3.8E-01	1.1E-12	1.8E-11	1.3E-13	6.0E-12
Fluorene	4.4E-02	1.0E-01	8.0E-13	4.8E-12	9.6E-14	1.6E-12
Indeno(1,2,3-cd)pyrene	3.4E-02	1.4E-01	6.2E-13	6.5E-12	7.5E-14	2.2E-12
Naphthalene	NC	NC	NA	NA	NA	NA
Perylene	1.1E-02	3.6E-02	1.9E-13	1.7E-12	2.3E-14	5.7E-13
Phenanthrene	7.9E-02	2.0E-01	1.4E-12	9.6E-12	1.7E-13	3.2E-12
Pyrene	5.3E-02	1.6E-01	9.7E-13	7.5E-12	1.2E-13	2.5E-12
Total Petroleum Hydrocarbons						
C11-C14(Kerosene Range)	9.7E+00	4.0E+01	1.8E-10	1.9E-09	2.1E-11	6.4E-10
C14-C20(Diesel Range)	7.5E+00	7.5E+00	1.4E-10	3.6E-10	1.6E-11	1.2E-10
C20-C30(Lubricant Oil Range)	7.3E+01	4.7E+02	1.3E-09	2.3E-08	1.6E-10	7.5E-09
PCDD/PCDFs						
2,3,7,8-TCDD	2.7E-07	5.3E-07	5.0E-18	2.6E-17	6.0E-19	8.5E-18
1,2,3,7,8-PeCDD	1.1E-06	2.2E-06	2.0E-17	1.0E-16	2.4E-18	3.5E-17
1,2,3,4,7,8-HxCDD	4.1E-06	9.0E-06	7.5E-17	4.3E-16	9.0E-18	1.4E-16
1,2,3,6,7,8-HxCDD	1.6E-05	3.0E-05	2.9E-16	1.4E-15	3.5E-17	4.7E-16
1,2,3,7,8,9-HxCDD	5.9E-06	1.0E-05	1.1E-16	4.8E-16	1.3E-17	1.6E-16
1,2,3,4,6,7,8-HpCDD	5.7E-04	1.2E-03	1.0E-14	5.7E-14	1.2E-15	1.9E-14
OCDD	8.4E-03	1.7E-02	1.5E-13	8.1E-13	1.8E-14	2.7E-13
2,3,7,8-TCDF	5.5E-07	7.9E-07	1.0E-17	3.8E-17	1.2E-18	1.3E-17
1,2,3,7,8-PeCDF	2.8E-07	5.7E-07	5.0E-18	2.8E-17	6.0E-19	9.2E-18
2,3,4,7,8-PeCDF	8.2E-07	1.6E-06	1.5E-17	7.5E-17	1.8E-18	2.5E-17
1,2,3,4,7,8-HxCDF	1.8E-06	3.3E-06	3.2E-17	1.6E-16	3.9E-18	5.4E-17
1,2,3,6,7,8-HxCDF	1.6E-06	3.2E-06	2.8E-17	1.5E-16	3.4E-18	5.1E-17
2,3,4,6,7,8-HxCDF	3.8E-06	8.8E-06	7.0E-17	4.2E-16	8.4E-18	1.4E-16
1,2,3,7,8,9-HxCDF	3.6E-07	9.7E-07	6.6E-18	4.6E-17	7.9E-19	1.5E-17
1,2,3,4,6,7,8-HpCDF	5.3E-05	9.6E-05	9.6E-16	4.6E-15	1.1E-16	1.5E-15
1,2,3,4,7,8,9-HpCDF	4.9E-06	9.2E-06	8.9E-17	4.4E-16	1.1E-17	1.5E-16
OCDF	1.4E-04	2.4E-04	2.5E-15	1.1E-14	3.0E-16	3.8E-15

Spreadsheet C3-39a (3 of 3)

Estimates of Human Intake
Soil Particulate Inhalation Pathway for Adult Worker - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation:

$$\text{Dosage} = \frac{C \times CF \times IR \times FT \times EF \times ED}{PEF \times BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Inhalation rate	IR	m^3/day	10.4	16.0
Conversion factor	CF	kg/ug	1.E-09	1.E-09
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	219	250
Exposure duration	ED	years	9	25
Particulate emission factor	PEF	m^3/ug	2.4	2.4
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	9125
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
PCBs						
Aroclor-1254	1.6E-01	4.3E-01	2.9E-12	2.1E-11	3.5E-13	6.9E-12
Aroclor-1260	1.3E+00	7.3E+00	2.4E-11	3.5E-10	2.9E-12	1.2E-10
PCB-105	1.1E-04	5.6E-04	2.1E-15	2.7E-14	2.5E-16	9.0E-15
PCB-114	2.2E-06	1.0E-05	4.0E-17	4.8E-16	4.8E-18	1.6E-16
PCB-118	2.3E-04	1.1E-03	4.2E-15	5.4E-14	5.0E-16	1.8E-14
PCB-123	3.2E-06	1.6E-05	5.8E-17	7.7E-16	7.0E-18	2.6E-16
PCB-126	8.8E-06	4.4E-05	1.6E-16	2.1E-15	1.9E-17	7.0E-16
PCB-156	7.5E-05	3.8E-04	1.4E-15	1.8E-14	1.6E-16	6.0E-15
PCB-157	3.3E-05	1.7E-04	6.0E-16	8.1E-15	7.2E-17	2.7E-15
PCB-167	5.7E-05	2.9E-04	1.0E-15	1.4E-14	1.3E-16	4.7E-15
PCB-169	8.6E-07	4.4E-06	1.6E-17	2.1E-16	1.9E-18	7.0E-17
PCB-189	8.6E-06	4.4E-05	1.6E-16	2.1E-15	1.9E-17	7.0E-16
PCB-77	1.8E-05	8.8E-05	3.2E-16	4.2E-15	3.8E-17	1.4E-15
PCB-81	3.1E-06	1.6E-05	5.7E-17	7.5E-16	6.8E-18	2.5E-16

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCDD/PCDF - Polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.
PCB - polychlorinated biphenyls
mg/kg-day - milligrams per kilogram per day
mg/kg - milligrams per kilogram

Spreadsheet C3-38b (1 of 3)

Estimates of Human Intake
Soil Dermal Contact Pathway for Adult Worker - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation: $$\text{Dosage} = \frac{C \times SA \times AF \times B \times CF \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Skin surface area per event	SA	cm^2/day	2500	2500
Soil loading to skin	AF	mg/cm^2	0.02	0.20
Bioavailability	B	fraction	CS	CS
Conversion factor	CF	kg/mg	1.E-06	1.E-06
Exposure frequency	EF	days/year	219	250
Exposure duration	ED	years	9	25
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	9125
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
Inorganic Compounds							
Aluminum	NC	NC	NA	NA	NA	NA	0.01
Antimony	NC	NC	NA	NA	NA	NA	0.01
Arsenic	NC	NC	NA	NA	NA	NA	0.03
Cadmium	1.9E-01	3.0E-01	8.2E-11	1.5E-09	9.8E-12	5.0E-10	0.00
Chromium	NC	NC	NA	NA	NA	NA	0.01
Copper	9.7E+00	1.8E+01	4.1E-08	8.6E-07	5.0E-09	2.9E-07	0.01
Fluoride	NC	NC	NA	NA	NA	NA	0.01
Lead	9.2E+00	1.5E+01	3.9E-08	7.2E-07	4.7E-09	2.4E-07	0.01
Mercury	1.7E+00	3.8E+00	7.5E-09	1.9E-07	9.0E-10	6.2E-08	0.01
Methyl Mercury	1.7E-03	3.6E-03	7.5E-12	1.8E-10	9.0E-13	5.9E-11	0.01
Nickel	NC	NC	NA	NA	NA	NA	0.01
Nitrate	NC	NC	NA	NA	NA	NA	0.01
Silver	1.3E+00	2.7E+00	5.6E-09	1.3E-07	6.7E-10	4.4E-08	0.01
Thallium	9.9E-01	3.6E+00	4.3E-09	1.8E-07	5.1E-10	5.8E-08	0.01
Vanadium	NC	NC	NA	NA	NA	NA	0.01
Zinc	6.8E+01	2.2E+02	2.9E-07	1.1E-05	3.5E-08	3.6E-06	0.01
VOCs							
1,1,1-Trichloroethane	NC	NC	NA	NA	NA	NA	0.10
1,1,2-Trichloro-1,2,2-trifluoroethane	1.2E-02	1.2E-02	5.1E-10	5.9E-09	6.2E-11	2.0E-09	0.10
1,1-Dichloroethane	NC	NC	NA	NA	NA	NA	0.10
1,2-Dichloroethane	NC	NC	NA	NA	NA	NA	0.10
1,2-Dichloroethene (total)	NC	NC	NA	NA	NA	NA	0.10
1-Chlorohexane	1.0E-03	1.0E-03	4.3E-11	4.9E-10	5.1E-12	1.6E-10	0.10
2-Butanone	1.9E-02	2.7E-02	8.1E-10	1.3E-08	9.7E-11	4.4E-09	0.10
2-Hexanone	3.0E-03	3.0E-03	1.3E-10	1.5E-09	1.5E-11	4.9E-10	0.10
Acetone	6.2E-01	5.2E+00	2.6E-08	2.5E-06	3.2E-09	8.5E-07	0.10
Benzene	NC	NC	NA	NA	NA	NA	0.10
Carbon disulfide	NC	NC	NA	NA	NA	NA	0.01
Chloromethane	NC	NC	NA	NA	NA	NA	0.10
cis-1,2-Dichloroethene	NC	NC	NA	NA	NA	NA	0.10
Ethylbenzene	NC	NC	NA	NA	NA	NA	0.10
m,p-Xylene	3.4E-03	0.0E+00	1.5E-10	0.0E+00	1.8E-11	0.0E+00	0.10
Methylene chloride	9.9E-03	1.2E-02	4.2E-10	5.7E-09	5.1E-11	1.9E-09	0.10
Tetrachloroethene	NC	NC	NA	NA	NA	NA	0.10
Toluene	NC	NC	NA	NA	NA	NA	0.10
Trichloroethene	NC	NC	NA	NA	NA	NA	0.10
Xylenes (total)	NC	NC	NA	NA	NA	NA	0.10

Spreadsheet C3-38b (2 of 3)

Estimates of Human Intake
Soil Dermal Contact Pathway for Adult Worker - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation: $$\text{Dosage} = \frac{C \times SA \times AF \times B \times CF \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Skin surface area per event	SA	cm^2/day	2500	2500
Soil loading to skin	AF	mg/cm^2	0.02	0.20
Bioavailability	B	fraction	CS	CS
Conversion factor	CF	kg/mg	1.E-06	1.E-06
Exposure frequency	EF	days/year	219	250
Exposure duration	ED	years	9	25
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	9125
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
SVOCs							
2-Methylnaphthalene	2.2E-02	2.5E-02	1.2E-09	1.6E-08	1.4E-10	5.3E-09	0.13
Acenaphthene	6.8E-02	2.5E-01	3.8E-09	1.6E-07	4.6E-10	5.4E-08	0.13
Acenaphthylene	4.9E-03	1.4E-02	2.7E-10	8.7E-09	3.3E-11	2.9E-09	0.13
Anthracene	1.9E-01	9.9E-01	1.1E-08	6.3E-07	1.3E-09	2.1E-07	0.13
Benzo(a)anthracene	8.2E-01	1.4E+01	4.5E-08	8.9E-06	5.5E-09	3.0E-06	0.13
Benzo(a)pyrene	8.8E-01	1.5E+01	4.9E-08	9.5E-06	5.9E-09	3.2E-06	0.13
Benzo(e)pyrene	2.0E-02	5.5E-02	1.1E-09	3.5E-08	1.3E-10	1.2E-08	0.13
Benzo(b)fluoranthene	7.8E-01	6.9E+00	4.3E-08	4.4E-06	5.2E-09	1.5E-06	0.13
Benzo(g,h,i)perylene	2.7E-01	2.4E+00	1.5E-08	1.5E-06	1.8E-09	5.1E-07	0.13
Benzo(k)fluoranthene	8.7E-01	1.5E+01	4.8E-08	9.5E-06	5.8E-09	3.2E-06	0.13
Chrysene	6.0E-01	6.5E+00	3.3E-08	4.1E-06	4.0E-09	1.4E-06	0.13
Dibenz(a,h)anthracene	1.2E-01	1.1E+00	6.4E-09	7.1E-07	7.7E-10	2.4E-07	0.13
Dibenzofuran	2.8E-01	2.8E-01	1.6E-08	1.8E-07	1.9E-09	5.9E-08	0.13
Fluoranthene	1.5E+00	1.3E+01	8.1E-08	8.3E-06	9.8E-09	2.8E-06	0.13
Fluorene	7.0E-02	2.6E-01	3.9E-09	1.6E-07	4.7E-10	5.5E-08	0.13
Indeno(1,2,3-cd)pyrene	3.7E-01	3.3E+00	2.1E-08	2.1E-06	2.5E-09	7.1E-07	0.13
Naphthalene	2.0E-02	5.8E-02	1.1E-09	3.7E-08	1.3E-10	1.2E-08	0.13
Perylene	1.1E-02	3.1E-02	6.2E-10	2.0E-08	7.4E-11	6.7E-09	0.13
Phenanthrene	7.0E-01	5.8E+00	3.9E-08	3.7E-06	4.7E-09	1.2E-06	0.13
Pyrene	1.2E+00	1.1E+01	6.8E-08	6.9E-06	8.1E-09	2.3E-06	0.13
Total Petroleum Hydrocarbons							
C11-C14(Kerosene Range)	7.8E+00	3.8E+01	4.3E-07	2.4E-05	5.2E-08	8.1E-06	0.13
C14-C20(Diesel Range)	7.3E+00	1.8E+01	4.1E-07	1.1E-05	4.9E-08	3.8E-06	0.13
C20-C30(Lubricant Oil Range)	7.9E+01	4.3E+02	4.4E-06	2.7E-04	5.3E-07	9.0E-05	0.13
PCDD/PCDFs							
2,3,7,8-TCDD	1.5E-07	3.5E-07	1.9E-15	5.1E-14	2.3E-16	1.7E-14	0.03
1,2,3,7,8-PeCDD	5.6E-07	1.3E-06	7.2E-15	1.9E-13	8.7E-16	6.4E-14	0.03
1,2,3,4,7,8-HxCDD	1.6E-06	3.7E-06	2.1E-14	5.5E-13	2.5E-15	1.8E-13	0.03
1,2,3,6,7,8-HxCDD	8.3E-06	1.9E-05	1.1E-13	2.7E-12	1.3E-14	9.1E-13	0.03
1,2,3,7,8,9-HxCDD	3.4E-06	8.7E-06	4.4E-14	1.3E-12	5.3E-15	4.2E-13	0.03
1,2,3,4,6,7,8-HpCDD	2.4E-04	4.9E-04	3.0E-12	7.3E-11	3.6E-13	2.4E-11	0.03
OCDD	3.7E-03	7.3E-03	4.8E-11	1.1E-09	5.7E-12	3.6E-10	0.03
2,3,7,8-TCDF	3.6E-07	7.8E-07	4.7E-15	1.1E-13	5.6E-16	3.8E-14	0.03
1,2,3,7,8-PeCDF	1.5E-07	3.9E-07	1.9E-15	5.7E-14	2.3E-16	1.9E-14	0.03
2,3,4,7,8-PeCDF	4.2E-07	9.0E-07	5.4E-15	1.3E-13	6.5E-16	4.4E-14	0.03
1,2,3,4,7,8-HxCDF	8.8E-07	1.7E-06	1.1E-14	2.5E-13	1.4E-15	8.5E-14	0.03
1,2,3,6,7,8-HxCDF	7.2E-07	1.6E-06	9.2E-15	2.4E-13	1.1E-15	8.0E-14	0.03

Spreadsheet C3-38b (3 of 3)

Estimates of Human Intake
Soil Dermal Contact Pathway for Adult Worker - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation: $$\text{Dosage} = \frac{C \times SA \times AF \times B \times CF \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Skin surface area per event	SA	cm^2/day	2500	2500
Soil loading to skin	AF	mg/cm^2	0.02	0.20
Bioavailability	B	fraction	CS	CS
Conversion factor	CF	kg/mg	1.E-06	1.E-06
Exposure frequency	EF	days/year	219	250
Exposure duration	ED	years	9	25
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	9125
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
2,3,4,6,7,8-HxCDF	1.4E-06	2.8E-06	1.7E-14	4.2E-13	2.1E-15	1.4E-13	0.03
1,2,3,7,8,9-HxCDF	1.4E-07	1.8E-07	1.8E-15	2.6E-14	2.1E-16	8.6E-15	0.03
1,2,3,4,6,7,8-HpCDF	2.8E-05	5.0E-05	3.5E-13	7.3E-12	4.2E-14	2.4E-12	0.03
1,2,3,4,7,8,9-HpCDF	2.4E-06	4.2E-06	3.1E-14	6.2E-13	3.7E-15	2.1E-13	0.03
OCDF	7.5E-05	1.5E-04	9.6E-13	2.2E-11	1.2E-13	7.3E-12	0.03
PCBs							
Aroclor-1254	1.6E-01	4.3E-01	9.8E-09	2.9E-07	1.2E-09	9.8E-08	0.14
Aroclor-1260	1.4E+00	7.7E+00	8.4E-08	5.2E-06	1.0E-08	1.7E-06	0.14
PCB-105	1.2E-04	6.3E-04	7.2E-12	4.3E-10	8.6E-13	1.4E-10	0.14
PCB-114	2.3E-06	1.1E-05	1.4E-13	7.6E-12	1.6E-14	2.5E-12	0.14
PCB-118	2.4E-04	1.3E-03	1.4E-11	8.6E-10	1.7E-12	2.9E-10	0.14
PCB-123	3.4E-06	1.8E-05	2.0E-13	1.2E-11	2.4E-14	4.1E-12	0.14
PCB-126	9.2E-06	4.9E-05	5.5E-13	3.3E-11	6.6E-14	1.1E-11	0.14
PCB-156	7.9E-05	4.2E-04	4.7E-12	2.9E-10	5.7E-13	9.5E-11	0.14
PCB-157	3.5E-05	1.9E-04	2.1E-12	1.3E-10	2.5E-13	4.3E-11	0.14
PCB-167	6.0E-05	3.3E-04	3.6E-12	2.2E-10	4.3E-13	7.5E-11	0.14
PCB-169	9.0E-07	4.9E-06	5.4E-14	3.3E-12	6.5E-15	1.1E-12	0.14
PCB-189	9.0E-06	4.9E-05	5.4E-13	3.3E-11	6.5E-14	1.1E-11	0.14
PCB-77	1.8E-05	9.7E-05	1.1E-12	6.7E-11	1.3E-13	2.2E-11	0.14
PCB-81	3.3E-06	1.7E-05	2.0E-13	1.2E-11	2.4E-14	3.9E-12	0.14

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005),
except dermal absorption factors which were taken from USEPA (2001).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCDD/PCDF - Polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.
PCB - polychlorinated biphenyls
mg/kg-day - milligrams per kilogram per day
mg/kg - milligrams per kilogram

Spreadsheet C3-38a (1 of 3)

Estimates of Human Intake
Soil Dermal Contact Pathway for Adult Worker - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation: $$\text{Dosage} = \frac{C \times SA \times AF \times B \times CF \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Skin surface area per event	SA	cm^2/day	2500	2500
Soil loading to skin	AF	mg/cm^2	0.02	0.20
Bioavailability	B	fraction	CS	CS
Conversion factor	CF	kg/mg	1.E-06	1.E-06
Exposure frequency	EF	days/year	219	250
Exposure duration	ED	years	9	25
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	9125
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
Inorganic Compounds							
Cadmium	5.1E-01	1.1E+00	2.2E-10	5.6E-09	2.6E-11	1.9E-09	0.001
Copper	2.1E+01	4.6E+01	9.0E-08	2.2E-06	1.1E-08	7.5E-07	0.01
Fluoride	NC	NC	NA	NA	NA	NA	0.01
Lead	1.6E+01	3.4E+01	6.9E-08	1.7E-06	8.2E-09	5.5E-07	0.01
Mercury	1.9E+00	4.4E+00	8.2E-09	2.2E-07	9.8E-10	7.2E-08	0.01
Methyl Mercury	1.7E-03	3.6E-03	7.5E-12	1.8E-10	9.0E-13	5.9E-11	0.01
Nitrate	NC	NC	NA	NA	NA	NA	0.01
Silver	7.7E-01	2.9E+00	3.3E-09	1.4E-07	4.0E-10	4.7E-08	0.01
Thallium	3.3E-01	3.3E-01	1.4E-09	1.6E-08	1.7E-10	5.4E-09	0.01
Zinc	1.7E+02	4.4E+02	7.3E-07	2.1E-05	8.7E-08	7.1E-06	0.01
VOCs							
1,1,1-Trichloroethane	NC	NC	NA	NA	NA	NA	0.10
1,1,2-Trichloro-1,2,2-trifluoroethane	1.2E-02	1.2E-02	5.1E-10	5.9E-09	6.2E-11	2.0E-09	0.10
1,1-Dichloroethane	NC	NC	NA	NA	NA	NA	0.10
1,2-Dichloroethane	NC	NC	NA	NA	NA	NA	0.10
1,2-Dichloroethene (total)	2.8E-02	7.0E-02	1.2E-09	3.4E-08	1.5E-10	1.1E-08	0.10
1-Chlorohexane	NC	NC	NA	NA	NA	NA	0.10
2-Butanone	3.7E-02	3.7E-02	1.6E-09	1.8E-08	1.9E-10	6.0E-09	0.10
2-Hexanone	NC	NC	NA	NA	NA	NA	0.10
Acetone	6.8E-01	4.2E+00	2.9E-08	2.0E-06	3.5E-09	6.8E-07	0.10
Benzene	NC	NC	NA	NA	NA	NA	0.10
Carbon disulfide	NC	NC	NA	NA	NA	NA	0.01
Chloromethane	NC	NC	NA	NA	NA	NA	0.10
cis-1,2-Dichloroethene	NC	NC	NA	NA	NA	NA	0.10
Ethylbenzene	NC	NC	NA	NA	NA	NA	0.10
m,p-Xylene	NC	NC	NA	NA	NA	NA	0.10
Methylene chloride	1.3E-02	1.3E-02	5.6E-10	6.4E-09	6.7E-11	2.1E-09	0.10
Tetrachloroethene	2.1E-02	8.8E-02	8.9E-10	4.3E-08	1.1E-10	1.4E-08	0.10
Toluene	5.6E-02	3.4E-01	2.4E-09	1.7E-07	2.9E-10	5.6E-08	0.10
Trichloroethene	3.7E-02	2.0E-01	1.6E-09	9.9E-08	1.9E-10	3.3E-08	0.10
Xylenes (total)	2.5E-02	5.1E-02	1.1E-09	2.5E-08	1.3E-10	8.4E-09	0.10
SVOCs							
2-Methylnaphthalene	NC	NC	NA	NA	NA	NA	0.13
Acenaphthene	4.4E-02	1.0E-01	2.5E-09	6.4E-08	2.9E-10	2.1E-08	0.13
Acenaphthylene	3.1E-02	8.5E-02	1.7E-09	5.4E-08	2.1E-10	1.8E-08	0.13
Anthracene	3.9E-02	8.2E-02	2.2E-09	5.2E-08	2.6E-10	1.7E-08	0.13
Benzo(a)anthracene	3.6E-02	1.5E-01	2.0E-09	9.4E-08	2.4E-10	3.1E-08	0.13

Spreadsheet C3-38a (2 of 3)

Estimates of Human Intake
Soil Dermal Contact Pathway for Adult Worker - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation: $$\text{Dosage} = \frac{C \times SA \times AF \times B \times CF \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Skin surface area per event	SA	cm^2/day	2500	2500
Soil loading to skin	AF	mg/cm^2	0.02	0.20
Bioavailability	B	fraction	CS	CS
Conversion factor	CF	kg/mg	1.E-06	1.E-06
Exposure frequency	EF	days/year	219	250
Exposure duration	ED	years	9	25
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	9125
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
Benzo(a)pyrene	3.6E-02	1.5E-01	2.0E-09	9.4E-08	2.4E-10	3.1E-08	0.13
Benzo(e)pyrene	1.9E-02	6.3E-02	1.0E-09	4.0E-08	1.2E-10	1.3E-08	0.13
Benzo(b)fluoranthene	4.9E-02	2.7E-01	2.7E-09	1.7E-07	3.3E-10	5.6E-08	0.13
Benzo(g,h,i)perylene	4.1E-02	9.0E-02	2.3E-09	5.7E-08	2.7E-10	1.9E-08	0.13
Benzo(k)fluoranthene	3.0E-02	8.5E-02	1.7E-09	5.4E-08	2.0E-10	1.8E-08	0.13
Chrysene	4.4E-02	2.2E-01	2.5E-09	1.4E-07	3.0E-10	4.6E-08	0.13
Dibenz(a,h)anthracene	2.9E-02	8.5E-02	1.6E-09	5.4E-08	1.9E-10	1.8E-08	0.13
Dibenzofuran	NC	NC	NA	NA	NA	NA	0.13
Fluoranthene	6.0E-02	3.8E-01	3.3E-09	2.4E-07	4.0E-10	8.0E-08	0.13
Fluorene	4.4E-02	1.0E-01	2.5E-09	6.3E-08	2.9E-10	2.1E-08	0.13
Indeno(1,2,3-cd)pyrene	3.4E-02	1.4E-01	1.9E-09	8.6E-08	2.3E-10	2.9E-08	0.13
Naphthalene	NC	NC	NA	NA	NA	NA	0.13
Perylene	1.1E-02	3.6E-02	5.9E-10	2.3E-08	7.1E-11	7.6E-09	0.13
Phenanthrene	7.9E-02	2.0E-01	4.4E-09	1.3E-07	5.3E-10	4.3E-08	0.13
Pyrene	5.3E-02	1.6E-01	3.0E-09	9.9E-08	3.6E-10	3.3E-08	0.13
Total Petroleum Hydrocarbons							
C11-C14(Kerosene Range)	9.7E+00	4.0E+01	5.4E-07	2.5E-05	6.5E-08	8.5E-06	0.13
C14-C20(Diesel Range)	7.5E+00	7.5E+00	4.2E-07	4.7E-06	5.0E-08	1.6E-06	0.13
C20-C30(Lubricant Oil Range)	7.3E+01	4.7E+02	4.1E-06	3.0E-04	4.9E-07	1.0E-04	0.13
PCDD/PCDFs							
2,3,7,8-TCDD	2.7E-07	5.3E-07	3.5E-15	7.8E-14	4.2E-16	2.6E-14	0.03
1,2,3,7,8-PeCDD	1.1E-06	2.2E-06	1.4E-14	3.2E-13	1.7E-15	1.1E-13	0.03
1,2,3,4,7,8-HxCDD	4.1E-06	9.0E-06	5.3E-14	1.3E-12	6.3E-15	4.4E-13	0.03
1,2,3,6,7,8-HxCDD	1.6E-05	3.0E-05	2.0E-13	4.3E-12	2.4E-14	1.4E-12	0.03
1,2,3,7,8,9-HxCDD	5.9E-06	1.0E-05	7.6E-14	1.5E-12	9.1E-15	4.9E-13	0.03
1,2,3,4,6,7,8-HpCDD	5.7E-04	1.2E-03	7.3E-12	1.7E-10	8.7E-13	5.8E-11	0.03
OCDD	8.4E-03	1.7E-02	1.1E-10	2.5E-09	1.3E-11	8.2E-10	0.03
2,3,7,8-TCDF	5.5E-07	7.9E-07	7.1E-15	1.2E-13	8.5E-16	3.9E-14	0.03
1,2,3,7,8-PeCDF	2.8E-07	5.7E-07	3.6E-15	8.4E-14	4.3E-16	2.8E-14	0.03
2,3,4,7,8-PeCDF	8.2E-07	1.6E-06	1.0E-14	2.3E-13	1.3E-15	7.7E-14	0.03
1,2,3,4,7,8-HxCDF	1.8E-06	3.3E-06	2.3E-14	4.9E-13	2.7E-15	1.6E-13	0.03
1,2,3,6,7,8-HxCDF	1.6E-06	3.2E-06	2.0E-14	4.6E-13	2.4E-15	1.5E-13	0.03
2,3,4,6,7,8-HxCDF	3.8E-06	8.8E-06	4.9E-14	1.3E-12	5.9E-15	4.3E-13	0.03
1,2,3,7,8,9-HxCDF	3.6E-07	9.7E-07	4.6E-15	1.4E-13	5.6E-16	4.7E-14	0.03
1,2,3,4,6,7,8-HpCDF	5.3E-05	9.6E-05	6.8E-13	1.4E-11	8.1E-14	4.7E-12	0.03
1,2,3,4,7,8,9-HpCDF	4.9E-06	9.2E-06	6.3E-14	1.4E-12	7.5E-15	4.5E-13	0.03
OCDF	1.4E-04	2.4E-04	1.7E-12	3.5E-11	2.1E-13	1.2E-11	0.03

Spreadsheet C3-38a (3 of 3)

Estimates of Human Intake
Soil Dermal Contact Pathway for Adult Worker - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation: $$\text{Dosage} = \frac{C \times SA \times AF \times B \times CF \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Skin surface area per event	SA	cm^2/day	2500	2500
Soil loading to skin	AF	mg/cm^2	0.02	0.20
Bioavailability	B	fraction	CS	CS
Conversion factor	CF	kg/mg	1.E-06	1.E-06
Exposure frequency	EF	days/year	219	250
Exposure duration	ED	years	9	25
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	9125
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
PCBs							
Aroclor-1254	1.6E-01	4.3E-01	9.7E-09	2.9E-07	1.2E-09	9.8E-08	0.14
Aroclor-1260	1.3E+00	7.3E+00	8.0E-08	5.0E-06	9.6E-09	1.7E-06	0.14
PCB-105	1.1E-04	5.6E-04	6.8E-12	3.9E-10	8.2E-13	1.3E-10	0.14
PCB-114	2.2E-06	1.0E-05	1.3E-13	6.9E-12	1.6E-14	2.3E-12	0.14
PCB-118	2.3E-04	1.1E-03	1.4E-11	7.7E-10	1.7E-12	2.6E-10	0.14
PCB-123	3.2E-06	1.6E-05	1.9E-13	1.1E-11	2.3E-14	3.7E-12	0.14
PCB-126	8.8E-06	4.4E-05	5.3E-13	3.0E-11	6.3E-14	1.0E-11	0.14
PCB-156	7.5E-05	3.8E-04	4.5E-12	2.6E-10	5.4E-13	8.6E-11	0.14
PCB-157	3.3E-05	1.7E-04	2.0E-12	1.2E-10	2.4E-13	3.9E-11	0.14
PCB-167	5.7E-05	2.9E-04	3.4E-12	2.0E-10	4.1E-13	6.7E-11	0.14
PCB-169	8.6E-07	4.4E-06	5.1E-14	3.0E-12	6.2E-15	1.0E-12	0.14
PCB-189	8.6E-06	4.4E-05	5.1E-13	3.0E-11	6.2E-14	1.0E-11	0.14
PCB-77	1.8E-05	8.8E-05	1.1E-12	6.0E-11	1.3E-13	2.0E-11	0.14
PCB-81	3.1E-06	1.6E-05	1.9E-13	1.1E-11	2.2E-14	3.5E-12	0.14

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005),
except dermal absorption factors which were taken from USEPA (2001).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCDD/PCDF - Polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.
PCB - polychlorinated biphenyls
mg/kg-day - milligrams per kilogram per day
mg/kg - milligrams per kilogram

Spreadsheet C3-37b (1 of 3)

Estimates of Human Intake
Soil Ingestion Pathway for Adult Worker - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation: Dosage = $\frac{C \times IR \times CF \times FT \times EF \times ED \times B}{BW \times AT}$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Soil ingestion rate	IR	mg/day	50	200
Conversion factor	CF	kg/mg	1.E-06	1.E-06
Exposure frequency	EF	days/year	219	250
Exposure duration	ED	years	9	25
Bioavailability	B	fraction	CS	CS
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	9125
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
Inorganic Compounds							
Aluminum	NC	NC	NA	NA	NA	NA	1
Antimony	NC	NC	NA	NA	NA	NA	1
Arsenic	NC	NC	NA	NA	NA	NA	1
Cadmium	1.9E-01	3.0E-01	8.2E-08	5.9E-07	9.8E-09	2.0E-07	1
Chromium	NC	NC	NA	NA	NA	NA	1
Copper	9.7E+00	1.8E+01	4.1E-06	3.4E-05	5.0E-07	1.1E-05	1
Fluoride	NC	NC	NA	NA	NA	NA	1
Lead	9.2E+00	1.5E+01	3.9E-06	2.9E-05	4.7E-07	9.6E-06	1
Mercury	1.7E+00	3.8E+00	7.5E-07	7.4E-06	9.0E-08	2.5E-06	1
Methyl Mercury	1.7E-03	3.6E-03	7.5E-10	7.1E-09	9.0E-11	2.4E-09	1
Nickel	NC	NC	NA	NA	NA	NA	1
Nitrate	NC	NC	NA	NA	NA	NA	1
Silver	1.3E+00	2.7E+00	5.6E-07	5.2E-06	6.7E-08	1.7E-06	1
Thallium	9.9E-01	3.6E+00	4.3E-07	7.0E-06	5.1E-08	2.3E-06	1
Vanadium	NC	NC	NA	NA	NA	NA	1
Zinc	6.8E+01	2.2E+02	2.9E-05	4.3E-04	3.5E-06	1.4E-04	1
VOCs							
1,1,1-Trichloroethane	NC	NC	NA	NA	NA	NA	1
1,1,2-Trichloro-1,2,2-trifluoroethane	1.2E-02	1.2E-02	5.1E-09	2.3E-08	6.2E-10	7.8E-09	1
1,1-Dichloroethane	NC	NC	NA	NA	NA	NA	1
1,2-Dichloroethane	NC	NC	NA	NA	NA	NA	1
1,2-Dichloroethene (total)	NC	NC	NA	NA	NA	NA	1
1-Chlorohexane	1.0E-03	1.0E-03	4.3E-10	2.0E-09	5.1E-11	6.5E-10	1
2-Butanone	1.9E-02	2.7E-02	8.1E-09	5.3E-08	9.7E-10	1.8E-08	1
2-Hexanone	3.0E-03	3.0E-03	1.3E-09	5.9E-09	1.5E-10	2.0E-09	1
Acetone	6.2E-01	5.2E+00	2.6E-07	1.0E-05	3.2E-08	3.4E-06	1
Benzene	NC	NC	NA	NA	NA	NA	1
Carbon disulfide	NC	NC	NA	NA	NA	NA	1
Chloromethane	NC	NC	NA	NA	NA	NA	1
cis-1,2-Dichloroethene	NC	NC	NA	NA	NA	NA	1
Ethylbenzene	NC	NC	NA	NA	NA	NA	1
m,p-Xylene	3.4E-03	0.0E+00	1.5E-09	0.0E+00	1.8E-10	0.0E+00	1
Methylene chloride	9.9E-03	1.2E-02	4.2E-09	2.3E-08	5.1E-10	7.6E-09	1
Tetrachloroethene	NC	NC	NA	NA	NA	NA	1
Toluene	NC	NC	NA	NA	NA	NA	1
Trichloroethene	NC	NC	NA	NA	NA	NA	1
Xylenes (total)	NC	NC	NA	NA	NA	NA	1

Spreadsheet C3-37b (2 of 3)

Estimates of Human Intake
Soil Ingestion Pathway for Adult Worker - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation: Dosage = $\frac{C \times IR \times CF \times FT \times EF \times ED \times B}{BW \times AT}$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Soil ingestion rate	IR	mg/day	50	200
Conversion factor	CF	kg/mg	1.E-06	1.E-06
Exposure frequency	EF	days/year	219	250
Exposure duration	ED	years	9	25
Bioavailability	B	fraction	CS	CS
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	9125
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
SVOCs							
2-Methylnaphthalene	2.2E-02	2.5E-02	9.2E-09	4.9E-08	1.1E-09	1.6E-08	1
Acenaphthene	6.8E-02	2.5E-01	2.9E-08	5.0E-07	3.5E-09	1.7E-07	1
Acenaphthylene	4.9E-03	1.4E-02	2.1E-09	2.7E-08	2.5E-10	8.9E-09	1
Anthracene	1.9E-01	9.9E-01	8.3E-08	1.9E-06	1.0E-08	6.4E-07	1
Benzo(a)anthracene	8.2E-01	1.4E+01	3.5E-07	2.7E-05	4.2E-08	9.1E-06	1
Benzo(a)pyrene	8.8E-01	1.5E+01	3.8E-07	2.9E-05	4.5E-08	9.8E-06	1
Benzo(e)pyrene	2.0E-02	5.5E-02	8.4E-09	1.1E-07	1.0E-09	3.6E-08	1
Benzo(b)fluoranthene	7.8E-01	6.9E+00	3.3E-07	1.3E-05	4.0E-08	4.5E-06	1
Benzo(g,h,i)perylene	2.7E-01	2.4E+00	1.1E-07	4.7E-06	1.4E-08	1.6E-06	1
Benzo(k)fluoranthene	8.7E-01	1.5E+01	3.7E-07	2.9E-05	4.5E-08	9.8E-06	1
Chrysene	6.0E-01	6.5E+00	2.6E-07	1.3E-05	3.1E-08	4.2E-06	1
Dibenz(a,h)anthracene	1.2E-01	1.1E+00	5.0E-08	2.2E-06	5.9E-09	7.3E-07	1
Dibenzofuran	2.8E-01	2.8E-01	1.2E-07	5.5E-07	1.4E-08	1.8E-07	1
Fluoranthene	1.5E+00	1.3E+01	6.3E-07	2.6E-05	7.5E-08	8.5E-06	1
Fluorene	7.0E-02	2.6E-01	3.0E-08	5.1E-07	3.6E-09	1.7E-07	1
Indeno(1,2,3-cd)pyrene	3.7E-01	3.3E+00	1.6E-07	6.5E-06	1.9E-08	2.2E-06	1
Naphthalene	2.0E-02	5.8E-02	8.4E-09	1.1E-07	1.0E-09	3.8E-08	1
Perylene	1.1E-02	3.1E-02	4.7E-09	6.1E-08	5.7E-10	2.0E-08	1
Phenanthrene	7.0E-01	5.8E+00	3.0E-07	1.1E-05	3.6E-08	3.8E-06	1
Pyrene	1.2E+00	1.1E+01	5.2E-07	2.1E-05	6.3E-08	7.1E-06	1
Total Petroleum Hydrocarbons							
C11-C14(Kerosene Range)	7.8E+00	3.8E+01	3.3E-06	7.5E-05	4.0E-07	2.5E-05	1
C14-C20(Diesel Range)	7.3E+00	1.8E+01	3.1E-06	3.5E-05	3.8E-07	1.2E-05	1
C20-C30(Lubricant Oil Range)	7.9E+01	4.3E+02	3.4E-05	8.3E-04	4.1E-06	2.8E-04	1
PCDD/PCDFs							
2,3,7,8-TCDD	1.5E-07	3.5E-07	6.4E-14	6.8E-13	7.7E-15	2.3E-13	1
1,2,3,7,8-PeCDD	5.6E-07	1.3E-06	2.4E-13	2.6E-12	2.9E-14	8.6E-13	1
1,2,3,4,7,8-HxCDD	1.6E-06	3.7E-06	7.0E-13	7.3E-12	8.4E-14	2.4E-12	1
1,2,3,6,7,8-HxCDD	8.3E-06	1.9E-05	3.6E-12	3.7E-11	4.3E-13	1.2E-11	1
1,2,3,7,8,9-HxCDD	3.4E-06	8.7E-06	1.5E-12	1.7E-11	1.8E-13	5.7E-12	1
1,2,3,4,6,7,8-HpCDD	2.4E-04	4.9E-04	1.0E-10	9.7E-10	1.2E-11	3.2E-10	1
OCDD	3.7E-03	7.3E-03	1.6E-09	1.4E-08	1.9E-10	4.8E-09	1
2,3,7,8-TCDF	3.6E-07	7.8E-07	1.6E-13	1.5E-12	1.9E-14	5.1E-13	1
1,2,3,7,8-PeCDF	1.5E-07	3.9E-07	6.3E-14	7.6E-13	7.6E-15	2.5E-13	1
2,3,4,7,8-PeCDF	4.2E-07	9.0E-07	1.8E-13	1.8E-12	2.2E-14	5.9E-13	1
1,2,3,4,7,8-HxCDF	8.8E-07	1.7E-06	3.8E-13	3.4E-12	4.5E-14	1.1E-12	1
1,2,3,6,7,8-HxCDF	7.2E-07	1.6E-06	3.1E-13	3.2E-12	3.7E-14	1.1E-12	1
2,3,4,6,7,8-HxCDF	1.4E-06	2.8E-06	5.8E-13	5.6E-12	7.0E-14	1.9E-12	1
1,2,3,7,8,9-HxCDF	1.4E-07	1.8E-07	6.0E-14	3.4E-13	7.1E-15	1.1E-13	1
1,2,3,4,6,7,8-HpCDF	2.8E-05	5.0E-05	1.2E-11	9.8E-11	1.4E-12	3.3E-11	1
1,2,3,4,7,8,9-HpCDF	2.4E-06	4.2E-06	1.0E-12	8.3E-12	1.2E-13	2.8E-12	1
OCDF	7.5E-05	1.5E-04	3.2E-11	2.9E-10	3.9E-12	9.8E-11	1

Spreadsheet C3-37b (3 of 3)

Estimates of Human Intake
Soil Ingestion Pathway for Adult Worker - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation: Dosage = $\frac{C \times IR \times CF \times FT \times EF \times ED \times B}{BW \times AT}$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Soil ingestion rate	IR	mg/day	50	200
Conversion factor	CF	kg/mg	1.E-06	1.E-06
Exposure frequency	EF	days/year	219	250
Exposure duration	ED	years	9	25
Bioavailability	B	fraction	CS	CS
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	9125
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
PCBs							
Aroclor-1254	1.6E-01	4.3E-01	7.0E-08	8.4E-07	8.4E-09	2.8E-07	1
Aroclor-1260	1.4E+00	7.7E+00	6.0E-07	1.5E-05	7.2E-08	5.0E-06	1
PCB-105	1.2E-04	6.3E-04	5.1E-11	1.2E-09	6.2E-12	4.1E-10	1
PCB-114	2.3E-06	1.1E-05	9.7E-13	2.2E-11	1.2E-13	7.3E-12	1
PCB-118	2.4E-04	1.3E-03	1.0E-10	2.5E-09	1.2E-11	8.2E-10	1
PCB-123	3.4E-06	1.8E-05	1.4E-12	3.5E-11	1.7E-13	1.2E-11	1
PCB-126	9.2E-06	4.9E-05	3.9E-12	9.5E-11	4.7E-13	3.2E-11	1
PCB-156	7.9E-05	4.2E-04	3.4E-11	8.2E-10	4.0E-12	2.7E-10	1
PCB-157	3.5E-05	1.9E-04	1.5E-11	3.7E-10	1.8E-12	1.2E-10	1
PCB-167	6.0E-05	3.3E-04	2.6E-11	6.4E-10	3.1E-12	2.1E-10	1
PCB-169	9.0E-07	4.9E-06	3.9E-13	9.5E-12	4.6E-14	3.2E-12	1
PCB-189	9.0E-06	4.9E-05	3.8E-12	9.5E-11	4.6E-13	3.2E-11	1
PCB-77	1.8E-05	9.7E-05	7.9E-12	1.9E-10	9.5E-13	6.4E-11	1
PCB-81	3.3E-06	1.7E-05	1.4E-12	3.4E-11	1.7E-13	1.1E-11	1

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCDD/PCDF - Polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.
PCB - polychlorinated biphenyls
mg/kg-day - milligrams per kilogram per day
mg/kg - milligrams per kilogram

Spreadsheet C3-37a (1 of 3)

Estimates of Human Intake
Soil Ingestion Pathway for Adult Worker - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation: Dosage = $\frac{C \times IR \times CF \times FT \times EF \times ED \times B}{BW \times AT}$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Soil ingestion rate	IR	mg/day	50	200
Conversion factor	CF	kg/mg	1.E-06	1.E-06
Exposure frequency	EF	days/year	219	250
Exposure duration	ED	years	9	25
Bioavailability	B	fraction	CS	CS
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	9125
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
Inorganic Compounds							
Cadmium	5.1E-01	1.1E+00	2.2E-07	2.2E-06	2.6E-08	7.4E-07	1
Copper	2.1E+01	4.6E+01	9.0E-06	8.9E-05	1.1E-06	3.0E-05	1
Fluoride	NC	NC	NA	NA	NA	NA	1
Lead	1.6E+01	3.4E+01	6.9E-06	6.6E-05	8.2E-07	2.2E-05	1
Mercury	1.9E+00	4.4E+00	8.2E-07	8.6E-06	9.8E-08	2.9E-06	1
Methyl Mercury	1.7E-03	3.6E-03	7.5E-10	7.1E-09	9.0E-11	2.4E-09	1
Nitrate	NC	NC	NA	NA	NA	NA	1
Silver	7.7E-01	2.9E+00	3.3E-07	5.6E-06	4.0E-08	1.9E-06	1
Thallium	3.3E-01	3.3E-01	1.4E-07	6.5E-07	1.7E-08	2.2E-07	1
Zinc	1.7E+02	4.4E+02	7.3E-05	8.6E-04	8.7E-06	2.9E-04	1
VOCs							
1,1,1-Trichloroethane	NC	NC	NA	NA	NA	NA	1
1,1,2-Trichloro-1,2,2-trifluoroethane	1.2E-02	1.2E-02	5.1E-09	2.3E-08	6.2E-10	7.8E-09	1
1,1-Dichloroethane	NC	NC	NA	NA	NA	NA	1
1,2-Dichloroethane	NC	NC	NA	NA	NA	NA	1
1,2-Dichloroethene (total)	2.8E-02	7.0E-02	1.2E-08	1.4E-07	1.5E-09	4.6E-08	1
1-Chlorohexane	NC	NC	NA	NA	NA	NA	1
2-Butanone	3.7E-02	3.7E-02	1.6E-08	7.2E-08	1.9E-09	2.4E-08	1
2-Hexanone	NC	NC	NA	NA	NA	NA	1
Acetone	6.8E-01	4.2E+00	2.9E-07	8.2E-06	3.5E-08	2.7E-06	1
Benzene	NC	NC	NA	NA	NA	NA	1
Carbon disulfide	NC	NC	NA	NA	NA	NA	1
Chloromethane	NC	NC	NA	NA	NA	NA	1
cis-1,2-Dichloroethene	NC	NC	NA	NA	NA	NA	1
Ethylbenzene	NC	NC	NA	NA	NA	NA	1
m,p-Xylene	NC	NC	NA	NA	NA	NA	1
Methylene chloride	1.3E-02	1.3E-02	5.6E-09	2.5E-08	6.7E-10	8.5E-09	1
Tetrachloroethene	2.1E-02	8.8E-02	8.9E-09	1.7E-07	1.1E-09	5.8E-08	1
Toluene	5.6E-02	3.4E-01	2.4E-08	6.7E-07	2.9E-09	2.2E-07	1
Trichloroethene	3.7E-02	2.0E-01	1.6E-08	4.0E-07	1.9E-09	1.3E-07	1
Xylenes (total)	2.5E-02	5.1E-02	1.1E-08	1.0E-07	1.3E-09	3.3E-08	1
SVOCs							
2-Methylnaphthalene	NC	NC	NA	NA	NA	NA	1
Acenaphthene	4.4E-02	1.0E-01	1.9E-08	2.0E-07	2.3E-09	6.5E-08	1
Acenaphthylene	3.1E-02	8.5E-02	1.3E-08	1.7E-07	1.6E-09	5.5E-08	1
Anthracene	3.9E-02	8.2E-02	1.7E-08	1.6E-07	2.0E-09	5.3E-08	1
Benzo(a)anthracene	3.6E-02	1.5E-01	1.5E-08	2.9E-07	1.8E-09	9.7E-08	1
Benzo(a)pyrene	3.6E-02	1.5E-01	1.5E-08	2.9E-07	1.9E-09	9.7E-08	1
Benzo(e)pyrene	1.9E-02	6.3E-02	8.0E-09	1.2E-07	9.6E-10	4.1E-08	1
Benzo(b)fluoranthene	4.9E-02	2.7E-01	2.1E-08	5.2E-07	2.5E-09	1.7E-07	1
Benzo(g,h,i)perylene	4.1E-02	9.0E-02	1.8E-08	1.8E-07	2.1E-09	5.9E-08	1

Spreadsheet C3-37a (2 of 3)

Estimates of Human Intake
Soil Ingestion Pathway for Adult Worker - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation: Dosage = $\frac{C \times IR \times CF \times FT \times EF \times ED \times B}{BW \times AT}$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Soil ingestion rate	IR	mg/day	50	200
Conversion factor	CF	kg/mg	1.E-06	1.E-06
Exposure frequency	EF	days/year	219	250
Exposure duration	ED	years	9	25
Bioavailability	B	fraction	CS	CS
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	9125
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
Benzo(k)fluoranthene	3.0E-02	8.5E-02	1.3E-08	1.7E-07	1.5E-09	5.5E-08	1
Chrysene	4.4E-02	2.2E-01	1.9E-08	4.2E-07	2.3E-09	1.4E-07	1
Dibenz(a,h)anthracene	2.9E-02	8.5E-02	1.2E-08	1.7E-07	1.5E-09	5.5E-08	1
Dibenzofuran	NC	NC	NA	NA	NA	NA	1
Fluoranthene	6.0E-02	3.8E-01	2.6E-08	7.3E-07	3.1E-09	2.4E-07	1
Fluorene	4.4E-02	1.0E-01	1.9E-08	1.9E-07	2.3E-09	6.5E-08	1
Indeno(1,2,3-cd)pyrene	3.4E-02	1.4E-01	1.5E-08	2.7E-07	1.8E-09	8.8E-08	1
Naphthalene	NC	NC	NA	NA	NA	NA	1
Perylene	1.1E-02	3.6E-02	4.6E-09	7.0E-08	5.5E-10	2.3E-08	1
Phenanthrene	7.9E-02	2.0E-01	3.4E-08	3.9E-07	4.1E-09	1.3E-07	1
Pyrene	5.3E-02	1.6E-01	2.3E-08	3.1E-07	2.7E-09	1.0E-07	1
Total Petroleum Hydrocarbons							
C11-C14(Kerosene Range)	9.7E+00	4.0E+01	4.1E-06	7.8E-05	5.0E-07	2.6E-05	1
C14-C20(Diesel Range)	7.5E+00	7.5E+00	3.2E-06	1.5E-05	3.8E-07	4.9E-06	1
C20-C30(Lubricant Oil Range)	7.3E+01	4.7E+02	3.1E-05	9.2E-04	3.8E-06	3.1E-04	1
2,3,7,8-TCDD	2.7E-07	5.3E-07	1.2E-13	1.0E-12	1.4E-14	3.5E-13	1
1,2,3,7,8-PeCDD	1.1E-06	2.2E-06	4.7E-13	4.3E-12	5.7E-14	1.4E-12	1
1,2,3,4,7,8-HxCDD	4.1E-06	9.0E-06	1.8E-12	1.8E-11	2.1E-13	5.9E-12	1
1,2,3,6,7,8-HxCDD	1.6E-05	3.0E-05	6.8E-12	5.8E-11	8.1E-13	1.9E-11	1
1,2,3,7,8,9-HxCDD	5.9E-06	1.0E-05	2.5E-12	2.0E-11	3.0E-13	6.5E-12	1
1,2,3,4,6,7,8-HpCDD	5.7E-04	1.2E-03	2.4E-10	2.3E-09	2.9E-11	7.7E-10	1
OCDD	8.4E-03	1.7E-02	3.6E-09	3.3E-08	4.3E-10	1.1E-08	1
2,3,7,8-TCDF	5.5E-07	7.9E-07	2.4E-13	1.5E-12	2.8E-14	5.1E-13	1
1,2,3,7,8-PeCDF	2.8E-07	5.7E-07	1.2E-13	1.1E-12	1.4E-14	3.7E-13	1
2,3,4,7,8-PeCDF	8.2E-07	1.6E-06	3.5E-13	3.1E-12	4.2E-14	1.0E-12	1
1,2,3,4,7,8-HxCDF	1.8E-06	3.3E-06	7.6E-13	6.5E-12	9.1E-14	2.2E-12	1
1,2,3,6,7,8-HxCDF	1.6E-06	3.2E-06	6.6E-13	6.2E-12	8.0E-14	2.1E-12	1
2,3,4,6,7,8-HxCDF	3.8E-06	8.8E-06	1.6E-12	1.7E-11	2.0E-13	5.7E-12	1
1,2,3,7,8,9-HxCDF	3.6E-07	9.7E-07	1.5E-13	1.9E-12	1.9E-14	6.3E-13	1
1,2,3,4,6,7,8-HpCDF	5.3E-05	9.6E-05	2.3E-11	1.9E-10	2.7E-12	6.3E-11	1
1,2,3,4,7,8,9-HpCDF	4.9E-06	9.2E-06	2.1E-12	1.8E-11	2.5E-13	6.0E-12	1
OCDF	1.4E-04	2.4E-04	5.8E-11	4.6E-10	6.9E-12	1.5E-10	1
PCBs							
Aroclor-1254	1.6E-01	4.3E-01	6.9E-08	8.4E-07	8.3E-09	2.8E-07	1
Aroclor-1260	1.3E+00	7.3E+00	5.7E-07	1.4E-05	6.8E-08	4.8E-06	1
PCB-105	1.1E-04	5.6E-04	4.9E-11	1.1E-09	5.9E-12	3.7E-10	1
PCB-114	2.2E-06	1.0E-05	9.3E-13	2.0E-11	1.1E-13	6.5E-12	1
PCB-118	2.3E-04	1.1E-03	9.8E-11	2.2E-09	1.2E-11	7.4E-10	1
PCB-123	3.2E-06	1.6E-05	1.4E-12	3.1E-11	1.6E-13	1.0E-11	1
PCB-126	8.8E-06	4.4E-05	3.8E-12	8.6E-11	4.5E-13	2.9E-11	1
PCB-156	7.5E-05	3.8E-04	3.2E-11	7.4E-10	3.9E-12	2.5E-10	1

Spreadsheet C3-37a (3 of 3)

Estimates of Human Intake
Soil Ingestion Pathway for Adult Worker - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Intake Equation: Dosage = $\frac{C \times IR \times CF \times FT \times EF \times ED \times B}{BW \times AT}$

Exposure Parameters		Units	Typical	RME
Soil concentration	C	mg/kg	CS	CS
Soil ingestion rate	IR	mg/day	50	200
Conversion factor	CF	kg/mg	1.E-06	1.E-06
Exposure frequency	EF	days/year	219	250
Exposure duration	ED	years	9	25
Bioavailability	B	fraction	CS	CS
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	9125
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/kg)	RME EPC (mg/kg)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
PCB-157	3.3E-05	1.7E-04	1.4E-11	3.3E-10	1.7E-12	1.1E-10	1
PCB-167	5.7E-05	2.9E-04	2.5E-11	5.8E-10	3.0E-12	1.9E-10	1
PCB-169	8.6E-07	4.4E-06	3.7E-13	8.6E-12	4.4E-14	2.9E-12	1
PCB-189	8.6E-06	4.4E-05	3.7E-12	8.6E-11	4.4E-13	2.9E-11	1
PCB-77	1.8E-05	8.8E-05	7.5E-12	1.7E-10	9.0E-13	5.7E-11	1
PCB-81	3.1E-06	1.6E-05	1.3E-12	3.0E-11	1.6E-13	1.0E-11	1

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCDD/PCDF - Polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.
PCB - polychlorinated biphenyls
mg/kg-day - milligrams per kilogram per day
mg/kg - milligrams per kilogram

Spreadsheet C3-36b (1 of 4)

Estimated Human Intake for the Child Resident - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Central Tendancy Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation of Indoor Air_s		Inhalation Ambient Air_s		Inhalation of Indoor Air_{gw}		Inhalation Ambient Air_{gw}		Domestic Groundwater Use		Plant Consumption		Surface Water Ingestion		Surface Water Dermal Contact	
	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)
Inorganic Compounds																						
Aluminum	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	4.7E-04	3.7E-05	6.6E-06	5.3E-07
Antimony	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	4.1E-07	3.3E-08	5.8E-09	4.6E-10
Arsenic	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	3.1E-06	2.5E-07	4.3E-08	3.5E-09
Barium	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Boron	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Cadmium	1.2E-06	9.8E-08	2.1E-09	1.6E-10	2.1E-11	1.7E-12	-	-	-	-	-	-	-	-	-	-	1.9E-05	1.5E-06	6.9E-08	5.6E-09	9.8E-10	7.8E-11
Chromium	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1.1E-06	8.4E-08	1.5E-08	1.2E-09
Copper	6.2E-05	5.0E-06	1.0E-06	8.3E-08	1.1E-09	8.5E-11	-	-	-	-	-	-	-	-	8.6E-04	6.9E-05	1.2E-02	9.8E-04	2.0E-06	1.6E-07	2.8E-08	2.2E-09
Fluoride	-	-	-	-	-	-	-	-	-	-	-	-	-	-	2.7E-02	2.1E-03	-	-	-	-	-	-
Lead	5.9E-05	4.7E-06	9.8E-07	7.9E-08	1.0E-09	8.0E-11	-	-	-	-	-	-	-	-	-	-	4.5E-05	3.6E-06	3.7E-07	2.9E-08	5.2E-10	4.1E-11
Mercury	1.1E-05	8.9E-07	1.9E-07	1.5E-08	1.9E-10	1.5E-11	-	-	-	-	-	-	-	-	-	-	1.1E-04	8.8E-06	5.4E-08	4.3E-09	7.6E-10	6.1E-11
Methyl Mercury	1.1E-08	8.9E-10	1.9E-10	1.5E-11	1.9E-13	1.5E-14	-	-	-	-	-	-	-	-	-	-	1.7E-07	1.4E-08	-	-	-	-
Nickel	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1.9E-06	1.5E-07	5.3E-09	4.2E-10
Nitrate	-	-	-	-	-	-	-	-	-	-	-	-	-	-	6.8E-01	5.4E-02	-	-	-	-	-	-
Silver	8.3E-06	6.7E-07	1.4E-07	1.1E-08	1.4E-10	1.1E-11	-	-	-	-	-	-	-	-	-	-	1.5E-07	1.2E-08	-	-	-	-
Thallium	6.4E-06	5.1E-07	1.1E-07	8.5E-09	1.1E-10	8.7E-12	-	-	-	-	-	-	-	-	2.6E-05	2.1E-06	4.7E-05	3.7E-06	9.6E-08	7.7E-09	1.3E-09	1.1E-10
Vanadium	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1.8E-06	1.5E-07	2.6E-08	2.1E-09
Zinc	4.3E-04	3.5E-05	7.3E-06	5.8E-07	7.4E-09	5.9E-10	-	-	-	-	-	-	-	-	-	-	2.4E-02	1.9E-03	-	-	-	-
VOCs																						
1,1,1-Trichloroethane	-	-	-	-	-	-	1.7E-04	1.3E-05	-	-	-	-	-	-	-	-	-	-	3.5E-07	2.8E-08	0.0E+00	0.0E+00
1,1,2-Trichloro-1,2,2-trifluoroethan	7.7E-08	6.1E-09	1.3E-08	1.0E-09	1.3E-12	1.1E-13	8.5E-04	6.8E-05	-	-	-	-	-	-	-	-	1.8E-05	1.4E-06	-	-	-	-
1,1-Dichloroethane	-	-	-	-	-	-	1.6E-04	1.3E-05	7.6E-07	6.1E-08	1.1E-06	9.0E-08	7.6E-07	6.1E-08	2.5E-04	2.0E-05	-	-	-	-	-	-
1,2-Dichloroethane	-	-	-	-	-	-	-	-	1.8E-07	1.4E-08	1.8E-07	1.5E-08	1.8E-07	1.4E-08	8.6E-05	6.9E-06	-	-	-	-	-	-
1,2-Dichloroethene (total)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	2.9E-04	2.3E-05	-	-	-	-
1-Chlorohexane	6.4E-09	5.1E-10	1.1E-09	8.6E-11	1.1E-13	8.8E-15	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
2-Butanone	1.2E-07	9.7E-09	2.0E-08	1.6E-09	2.1E-12	1.7E-13	-	-	-	-	-	-	-	-	-	-	2.5E-03	2.0E-04	-	-	-	-
2-Hexanone	1.9E-08	1.5E-09	3.2E-09	2.6E-10	3.3E-13	2.6E-14	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Acetone	3.9E-06	3.2E-07	6.6E-07	5.3E-08	6.8E-11	5.4E-12	-	-	6.6E-09	5.3E-10	7.5E-09	6.0E-10	6.6E-09	5.3E-10	1.5E-03	1.2E-04	9.2E-02	7.4E-03	-	-	-	-
Benzene	-	-	-	-	-	-	-	-	8.7E-07	7.0E-08	1.0E-06	8.2E-08	8.7E-07	7.0E-08	5.6E-05	4.4E-06	-	-	-	-	-	-
Carbon disulfide	-	-	-	-	-	-	-	-	-	-	5.6E-06	4.4E-07	6.0E-06	4.8E-07	2.5E-04	2.0E-05	-	-	-	-	-	-
Chloromethane	-	-	-	-	-	-	-	-	-	-	1.5E-06	1.2E-07	2.3E-06	1.8E-07	3.1E-05	2.5E-06	-	-	-	-	-	-
cis-1,2-Dichloroethene	-	-	-	-	-	-	-	-	5.4E-07	4.3E-08	6.0E-07	4.8E-08	5.4E-07	4.3E-08	4.9E-03	3.9E-04	-	-	-	-	-	-
Ethylbenzene	-	-	-	-	-	-	1.6E-04	1.3E-05	-	-	-	-	-	-	-	-	-	-	-	-	-	-
m,p-Xylene	-	-	-	-	-	-	3.2E-04	2.5E-05	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Methylene chloride	6.3E-08	5.1E-09	1.1E-08	8.5E-10	1.1E-12	8.7E-14	4.8E-03	3.9E-04	4.1E-07	3.3E-08	3.2E-07	2.6E-08	4.1E-07	3.3E-08	6.1E-05	4.9E-06	3.9E-04	3.1E-05	-	-	-	-
Tetrachloroethene	-	-	-	-	-	-	1.6E-04	1.3E-05	-	-	-	-	-	-	-	-	2.2E-05	1.8E-06	-	-	-	-
Toluene	-	-	-	-	-	-	1.8E-04	1.4E-05	-	-	-	-	-	-	1.7E-04	1.4E-05	1.5E-04	1.2E-05	-	-	-	-
Trichloroethene	-	-	-	-	-	-	1.7E-04	1.4E-05	1.4E-06	1.1E-07	1.4E-06	1.1E-07	1.4E-06	1.1E-07	9.6E-04	7.7E-05	1.3E-04	1.0E-05	3.0E-07	2.4E-08	5.1E-08	4.1E-09
Xylenes (total)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	4.0E-05	3.2E-06	-	-	-	-
SVOCs																						
2-Methylnaphthalene	1.4E-07	1.1E-08	3.0E-08	2.4E-09	2.4E-12	1.9E-13	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Acenaphthene	4.4E-07	3.5E-08	9.6E-08	7.6E-09	7.5E-12	6.0E-13	-	-	-	-	-	-	-	-	-	-	2.0E-05	1.6E-06	-	-	-	-
Acenaphthylene	3.1E-08	2.5E-09	6.9E-09	5.5E-10	5.4E-13	4.3E-14	-	-	-	-	-	-	-	-	-	-	1.4E-05	1.1E-06	-	-	-	-
Anthracene	1.2E-06	1.0E-07	2.7E-07	2.2E-08	2.1E-11	1.7E-12	-	-	-	-	-	-	-	-	-	-	1.3E-05	1.0E-06	-	-	-	-
Benzo(a)anthracene	5.2E-06	4.2E-07	1.1E-06	9.1E-08	9.0E-11	7.2E-12	-	-	-	-	-	-	-	-	-	-	1.8E-06	1.4E-07	-	-	-	-
Benzo(a)pyrene	5.6E-06	4.5E-07	1.2E-06	9.8E-08	9.6E-11	7.7E-12	-	-	-	-	-	-	-	-	-	-	7.5E-07	6.0E-08	-	-	-	-
Benzo(e)pyrene	1.3E-07	1.0E-08	2.7E-08	2.2E-09	2.2E-12	1.7E-13	-	-	-	-	-	-	-	-	-	-	2.6E-08	2.1E-09	-	-	-	-
Benzo(b)fluoranthene	5.0E-06	4.0E-07	1.1E-06	8.7E-08	8.6E-11	6.9E-12	-	-	-	-	-	-	-	-	-	-	1.1E-06	8.7E-08	-	-	-	-
Benzo(g,h,i)perylene	1.7E-06	1.4E-07	3.7E-07	3.0E-08	2.9E-11	2.3E-12	-	-	-	-	-	-	-	-	-	-	7.3E-07	5.8E-08	-	-	-	-
Benzo(k)fluoranthene	5.5E-06	4.4E-07	1.2E-06	9.7E-08	9.5E-11	7.6E-12	-	-	-	-	-	-	-	-	-	-	1.8E-07	1.5E-08	-	-	-	-
Chrysene	3.8E-06	3.0E-07	8.3E-07	6.6E-08	6.5E-11	5.2E-12	-	-	-	-	-	-	-	-	-	-	2.0E-06	1.6E-07	-	-	-	-
Dibenz(a,h)anthracene	7.4E-07	5.9E-08	1.6E-07	1.3E-08	1.3E-11	1.0E-12	-	-	-	-	-	-	-	-	-	-	3.2E-07	2.5E-08	-	-	-	-
Dibenzofuran	1.8E-06	1.4E-07	3.9E-07	3.1E-08	3.1E-11	2.5E-12	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Fluoranthene	9.3E-06	7.5E-07	2.0E-06	1.6E-07	1.6E-10	1.3E-11	-	-	-	-	-	-	-	-	-	-	6.5E-06	5.2E-07	-	-	-	-
Fluorene	4.5E-07	3.6E-08	9.7E-08	7.8E-09	7.6E-12	6.1E-13	-	-	-	-	-	-	-	-	-	-	5.0E-06	4.0E-07	-	-	-	-
Indeno(1,2,3-cd)pyrene	2.4E-06	1.9E-07	5.2E-07	4.1E-08	4.1E-11	3.3E-12	-	-	-	-	-	-	-	-	-	-	2.2E-07	1.7E-08	-	-	-	-
Naphthalene	1.3E-07	1.0E-08	2.7E-08	2.2E-09	2.2E-12	1.7E-13	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Perylene	7.1E-08	5.7E-09	1.5E-08	1.2E-09	1.2E-12	9.7E-14	-	-	-	-	-	-	-	-	-	-	4.1E-08	3.3E-09	-	-	-	-
Phenanthrene	4.5E-06	3.6E-07	9.8E-07	7.8E-08	7.7E-11	6.1E-12	-	-	-	-	-	-	-	-	-	-	1.6E-05	1.3E-06	-	-	-	-
Pyrene	7.8E-06	6.2E-07	1.7E-06	1.4E-07	1.3E-10	1.1E-11	-	-	-	-	-	-	-	-	-	-	6.8E-06	5.5E-07	-	-	-	-
Total Petroleum Hydrocarbons																						
C11-C14(Kerosene Range)	5.0E-05	4.0E-06	1.1E-05	8.7E-07	8.5E-10	6.8E-11	-	-	-	-	-	-	-	-	-	-	2.4E-03	1.9E-04	-	-	-	-
C14-C20(Diesel Range)	4.7E-05	3.7E-06	1.0E-05	8.2E-07	8.0E-10	6.4E-11	-	-	-	-	-	-	-	-	2.4E-03	1.9E-04	9.5E-04	7.6E-05	-	-	-	-
C20-C30(Lubricant Oil Range)	5.0E-04	4.0E-05	1.1E-04	8.8E-06	8.7E-09	6.9E-10	-	-	-	-	-	-	-	-	-	-	2.4E-03	2.0E-04	-	-	-	-

Spreadsheet C3-36b (2 of 4)

Estimated Human Intake for the Child Resident - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Central Tendancy Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation of Indoor Air_s		Inhalation Ambient Air_s		Inhalation of Indoor Air_{gw}		Inhalation Ambient Air_{gw}		Domestic Groundwater Use		Plant Consumption		Surface Water Ingestion		Surface Water Dermal Contact	
	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)
PCDD/PCDFs																						
2,3,7,8-TCDD	9.5E-13	7.6E-14	4.8E-14	3.8E-15	1.6E-17	1.3E-18	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,7,8-PeCDD	3.6E-12	2.9E-13	1.8E-13	1.4E-14	6.2E-17	4.9E-18	-	-	-	-	-	-	-	-	-	-	-	-	7.7E-13	6.1E-14	8.7E-12	7.0E-13
1,2,3,4,7,8-HxCDD	1.0E-11	8.3E-13	5.3E-13	4.2E-14	1.8E-16	1.4E-17	-	-	-	-	-	-	-	-	-	-	-	-	1.1E-12	9.1E-14	1.3E-11	1.0E-12
1,2,3,6,7,8-HxCDD	5.3E-11	4.3E-12	2.7E-12	2.1E-13	9.1E-16	7.3E-17	-	-	-	-	-	-	-	-	-	-	-	-	1.2E-11	9.8E-13	1.4E-10	1.1E-11
1,2,3,7,8,9-HxCDD	2.2E-11	1.8E-12	1.1E-12	8.9E-14	3.8E-16	3.0E-17	-	-	-	-	-	-	-	-	-	-	-	-	6.4E-12	5.1E-13	7.3E-11	5.8E-12
1,2,3,4,6,7,8-HpCDD	1.5E-09	1.2E-10	7.6E-11	6.1E-12	2.6E-14	2.1E-15	-	-	-	-	-	-	-	-	-	-	-	-	1.0E-10	8.0E-12	1.1E-09	9.1E-11
OCDD	2.4E-08	1.9E-09	1.2E-09	9.6E-11	4.1E-13	3.3E-14	-	-	-	-	-	-	-	-	-	-	-	-	8.1E-10	6.5E-11	9.3E-09	7.4E-10
2,3,7,8-TCDF	2.3E-12	1.9E-13	1.2E-13	9.4E-15	4.0E-17	3.2E-18	-	-	-	-	-	-	-	-	-	-	-	-	1.8E-12	1.5E-13	2.1E-11	1.7E-12
1,2,3,7,8-PeCDF	9.4E-13	7.5E-14	4.7E-14	3.8E-15	1.6E-17	1.3E-18	-	-	-	-	-	-	-	-	-	-	-	-	3.3E-12	2.6E-13	3.8E-11	3.0E-12
2,3,4,7,8-PeCDF	2.7E-12	2.1E-13	1.4E-13	1.1E-14	4.6E-17	3.7E-18	-	-	-	-	-	-	-	-	-	-	-	-	8.2E-12	6.6E-13	9.4E-11	7.5E-12
1,2,3,4,7,8-HxCDF	5.6E-12	4.5E-13	2.8E-13	2.3E-14	9.6E-17	7.7E-18	-	-	-	-	-	-	-	-	-	-	-	-	8.5E-12	6.8E-13	9.7E-11	7.8E-12
1,2,3,6,7,8-HxCDF	4.6E-12	3.7E-13	2.3E-13	1.9E-14	7.9E-17	6.3E-18	-	-	-	-	-	-	-	-	-	-	-	-	5.0E-12	4.0E-13	5.7E-11	4.6E-12
2,3,4,6,7,8-HxCDF	8.7E-12	6.9E-13	4.4E-13	3.5E-14	1.5E-16	1.2E-17	-	-	-	-	-	-	-	-	-	-	-	-	8.7E-12	7.0E-13	9.9E-11	7.9E-12
1,2,3,7,8,9-HxCDF	8.9E-13	7.1E-14	4.5E-14	3.6E-15	1.5E-17	1.2E-18	-	-	-	-	-	-	-	-	-	-	-	-	8.3E-12	6.7E-13	9.5E-11	7.6E-12
1,2,3,4,6,7,8-HpCDF	1.8E-10	1.4E-11	8.9E-12	7.1E-13	3.0E-15	2.4E-16	-	-	-	-	-	-	-	-	-	-	-	-	1.2E-11	1.0E-12	1.4E-10	1.1E-11
1,2,3,4,7,8,9-HpCDF	1.5E-11	1.2E-12	7.7E-13	6.1E-14	2.6E-16	2.1E-17	-	-	-	-	-	-	-	-	-	-	-	-	6.4E-12	5.1E-13	7.3E-11	5.8E-12
OCDF	4.8E-10	3.8E-11	2.4E-11	1.9E-12	8.2E-15	6.6E-16	-	-	-	-	-	-	-	-	-	-	-	-	3.3E-11	2.6E-12	3.8E-10	3.0E-11
PCBs																						
Aroclor-1254	1.0E-06	8.4E-08	2.5E-07	2.0E-08	1.8E-11	1.4E-12	-	-	-	-	-	-	-	-	-	-	3.6E-06	2.9E-07	-	-	-	-
Aroclor-1260	8.9E-06	7.1E-07	2.1E-06	1.7E-07	1.5E-10	1.2E-11	-	-	-	-	-	-	-	-	-	-	1.5E-05	1.2E-06	-	-	-	-
PCB-105	7.6E-10	6.1E-11	1.8E-10	1.4E-11	1.3E-14	1.1E-15	-	-	-	-	-	-	-	-	-	-	2.6E-09	2.0E-10	-	-	-	-
PCB-114	1.5E-11	1.2E-12	3.4E-12	2.7E-13	2.5E-16	2.0E-17	-	-	-	-	-	-	-	-	-	-	4.9E-11	3.9E-12	-	-	-	-
PCB-118	1.5E-09	1.2E-10	3.6E-10	2.9E-11	2.6E-14	2.1E-15	-	-	-	-	-	-	-	-	-	-	5.1E-09	4.1E-10	-	-	-	-
PCB-123	2.1E-11	1.7E-12	5.1E-12	4.0E-13	3.7E-16	2.9E-17	-	-	-	-	-	-	-	-	-	-	7.2E-11	5.7E-12	-	-	-	-
PCB-126	5.9E-11	4.7E-12	1.4E-11	1.1E-12	1.0E-15	8.1E-17	-	-	-	-	-	-	-	-	-	-	2.0E-10	1.6E-11	-	-	-	-
PCB-156	5.0E-10	4.0E-11	1.2E-10	9.5E-12	8.6E-15	6.9E-16	-	-	-	-	-	-	-	-	-	-	1.7E-09	1.3E-10	-	-	-	-
PCB-157	2.2E-10	1.8E-11	5.2E-11	4.2E-12	3.8E-15	3.0E-16	-	-	-	-	-	-	-	-	-	-	7.4E-10	5.9E-11	-	-	-	-
PCB-167	3.9E-10	3.1E-11	9.1E-11	7.2E-12	6.6E-15	5.3E-16	-	-	-	-	-	-	-	-	-	-	1.3E-09	1.0E-10	-	-	-	-
PCB-169	5.8E-12	4.6E-13	1.4E-12	1.1E-13	9.9E-17	7.9E-18	-	-	-	-	-	-	-	-	-	-	1.9E-11	1.5E-12	-	-	-	-
PCB-189	5.7E-11	4.6E-12	1.3E-11	1.1E-12	9.8E-16	7.9E-17	-	-	-	-	-	-	-	-	-	-	1.9E-10	1.5E-11	-	-	-	-
PCB-77	1.2E-10	9.4E-12	2.8E-11	2.2E-12	2.0E-15	1.6E-16	-	-	-	-	-	-	-	-	-	-	2.2E-10	1.8E-11	-	-	-	-
PCB-81	2.1E-11	1.7E-12	4.9E-12	3.9E-13	3.6E-16	2.9E-17	-	-	-	-	-	-	-	-	-	-	4.0E-11	3.2E-12	-	-	-	-

Spreadsheet C3-36b (3 of 4)

Estimated Human Intake for the Child Resident - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Reasonable Maximum Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation of Indoor Air_s		Inhalation Ambient Air_s		Inhalation of Indoor Air_{gw}		Inhalation Ambient Air_{gw}		Domestic Groundwater Use		Plant Consumption		Surface Water Ingestion		Surface Water Dermal Contact	
	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)
Inorganic Compounds																						
Aluminum	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	3.1E-03	2.5E-04	8.7E-05	3.5E-06
Antimony	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	2.8E-06	2.3E-07	7.9E-08	3.2E-09
Arsenic	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	2.0E-05	1.6E-06	5.6E-07	2.3E-08
Barium	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Boron	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Cadmium	3.9E-06	3.1E-07	1.1E-08	8.7E-10	5.0E-11	4.0E-12	-	-	-	-	-	-	-	-	-	-	4.2E-05	5.0E-05	5.1E-07	4.1E-08	1.4E-08	5.8E-10
Chromium	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	6.2E-06	5.0E-07	1.7E-07	7.0E-09
Copper	2.2E-04	1.8E-05	6.3E-06	5.0E-07	2.9E-09	2.3E-10	-	-	-	-	-	-	-	-	1.4E-03	1.2E-04	2.7E-02	3.1E-02	1.0E-05	8.3E-07	2.9E-07	1.2E-08
Fluoride	-	-	-	-	-	-	-	-	-	-	-	-	-	-	4.5E-02	3.6E-03	-	-	-	-	-	-
Lead	1.9E-04	1.5E-05	5.3E-06	4.2E-07	2.4E-09	1.9E-10	-	-	-	-	-	-	-	-	-	-	9.4E-05	1.1E-04	1.9E-06	1.5E-07	5.4E-09	2.1E-10
Mercury	4.8E-05	3.9E-06	1.4E-06	1.1E-07	6.2E-10	5.0E-11	-	-	-	-	-	-	-	-	-	-	2.5E-04	3.0E-04	2.5E-07	2.0E-08	7.0E-09	2.8E-10
Methyl Mercury	4.6E-08	3.7E-09	1.3E-09	1.0E-10	6.0E-13	4.8E-14	-	-	-	-	-	-	-	-	-	-	3.6E-07	4.2E-07	-	-	-	-
Nickel	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	7.5E-06	6.0E-07	4.2E-08	1.7E-09
Nitrate	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1.1E+00	9.1E-02	-	-	-	-	-	-
Silver	3.4E-05	2.7E-06	9.6E-07	7.7E-08	4.4E-10	3.5E-11	-	-	-	-	-	-	-	-	-	-	5.7E-07	6.7E-07	-	-	-	-
Thallium	4.6E-05	3.7E-06	1.3E-06	1.0E-07	5.9E-10	4.7E-11	-	-	-	-	-	-	-	-	4.3E-05	3.5E-06	4.7E-05	5.5E-05	3.8E-07	3.1E-08	1.1E-08	4.3E-10
Vanadium	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1.0E-05	8.3E-07	2.9E-07	1.2E-08
Zinc	2.8E-03	2.2E-04	7.8E-05	6.3E-06	3.6E-08	2.9E-09	-	-	-	-	-	-	-	-	-	-	6.2E-02	7.2E-02	-	-	-	-
VOCs																						
1,1,1-Trichloroethane	-	-	-	-	-	-	2.5E-04	2.0E-05	-	-	-	-	-	-	-	-	-	-	1.4E-06	1.1E-07	0.0E+00	0.0E+00
1,1,2-Trichloro-1,2,2-trifluoroethan	1.5E-07	1.2E-08	4.3E-08	3.4E-09	2.0E-12	1.6E-13	1.5E-03	1.2E-04	-	-	-	-	-	-	-	-	1.8E-05	2.1E-05	-	-	-	-
1,1-Dichloroethane	-	-	-	-	-	-	2.5E-04	2.0E-05	1.1E-06	9.2E-08	1.7E-06	1.3E-07	1.1E-06	9.2E-08	4.2E-04	3.3E-05	-	-	-	-	-	-
1,2-Dichloroethane	-	-	-	-	-	-	-	-	2.7E-07	2.1E-08	2.8E-07	2.2E-08	2.7E-07	2.1E-08	1.4E-04	1.2E-05	-	-	-	-	-	-
1,2-Dichloroethene (total)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	7.1E-04	8.3E-04	-	-	-	-
1-Chlorohexane	1.3E-08	1.0E-09	3.6E-09	2.9E-10	1.6E-13	1.3E-14	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
2-Butanone	3.4E-07	2.7E-08	9.6E-08	7.7E-09	4.4E-12	3.5E-13	-	-	-	-	-	-	-	-	-	-	2.5E-03	3.0E-03	-	-	-	-
2-Hexanone	3.8E-08	3.1E-09	1.1E-08	8.6E-10	4.9E-13	4.0E-14	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Acetone	6.6E-05	5.3E-06	1.9E-05	1.5E-06	8.6E-10	6.8E-11	-	-	1.0E-08	8.0E-10	1.1E-08	9.0E-10	1.0E-08	8.0E-10	2.6E-03	2.0E-04	5.7E-01	6.6E-01	-	-	-	-
Benzene	-	-	-	-	-	-	-	-	1.3E-06	1.0E-07	1.5E-06	1.2E-07	1.3E-06	1.0E-07	9.3E-05	7.4E-06	-	-	-	-	-	-
Carbon disulfide	-	-	-	-	-	-	-	-	-	-	8.3E-06	6.7E-07	9.0E-06	7.2E-07	4.2E-04	3.3E-05	-	-	-	-	-	-
Chloromethane	-	-	-	-	-	-	-	-	-	-	2.3E-06	1.9E-07	3.4E-06	2.7E-07	5.1E-05	4.1E-06	-	-	-	-	-	-
cis-1,2-Dichloroethene	-	-	-	-	-	-	-	-	8.1E-07	6.5E-08	8.9E-07	7.1E-08	8.1E-07	6.5E-08	8.2E-03	6.5E-04	-	-	-	-	-	-
Ethylbenzene	-	-	-	-	-	-	2.5E-04	2.0E-05	-	-	-	-	-	-	-	-	-	-	-	-	-	-
m,p-Xylene	-	-	-	-	-	-	4.8E-04	3.8E-05	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Methylene chloride	1.5E-07	1.2E-08	4.2E-08	3.3E-09	1.9E-12	1.5E-13	7.2E-03	5.8E-04	6.2E-07	4.9E-08	4.8E-07	3.9E-08	6.2E-07	4.9E-08	1.0E-04	8.2E-06	3.9E-04	4.6E-04	-	-	-	-
Tetrachloroethene	-	-	-	-	-	-	2.4E-04	1.9E-05	-	-	-	-	-	-	-	-	9.5E-05	1.1E-04	-	-	-	-
Toluene	-	-	-	-	-	-	2.7E-04	2.1E-05	-	-	-	-	-	-	2.9E-04	2.3E-05	9.0E-04	1.1E-03	-	-	-	-
Trichloroethene	-	-	-	-	-	-	2.5E-04	2.0E-05	2.1E-06	1.7E-07	2.1E-06	1.7E-07	2.1E-06	1.7E-07	1.6E-03	1.3E-04	7.1E-04	8.4E-04	1.2E-06	9.6E-08	4.1E-07	1.6E-08
Xylenes (total)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	8.0E-05	9.4E-05	-	-	-	-
SVOCs																						
2-Methylnaphthalene	3.2E-07	2.6E-08	1.2E-07	9.3E-09	4.1E-12	3.3E-13	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Acenaphthene	3.2E-06	2.6E-07	1.2E-06	9.5E-08	4.2E-11	3.3E-12	-	-	-	-	-	-	-	-	-	-	7.4E-05	8.6E-05	-	-	-	-
Acenaphthylene	1.7E-07	1.4E-08	6.4E-08	5.1E-09	2.2E-12	1.8E-13	-	-	-	-	-	-	-	-	-	-	2.1E-05	2.5E-05	-	-	-	-
Anthracene	1.3E-05	1.0E-06	4.6E-06	3.7E-07	1.6E-10	1.3E-11	-	-	-	-	-	-	-	-	-	-	3.3E-05	3.9E-05	-	-	-	-
Benzo(a)anthracene	1.8E-04	1.4E-05	6.5E-05	5.2E-06	2.3E-09	1.8E-10	-	-	-	-	-	-	-	-	-	-	3.4E-06	4.0E-06	-	-	-	-
Benzo(a)pyrene	1.9E-04	1.5E-05	7.0E-05	5.6E-06	2.5E-09	2.0E-10	-	-	-	-	-	-	-	-	-	-	3.1E-06	3.7E-06	-	-	-	-
Benzo(e)pyrene	7.0E-07	5.6E-08	2.6E-07	2.1E-08	9.1E-12	7.3E-13	-	-	-	-	-	-	-	-	-	-	1.5E-07	1.7E-07	-	-	-	-
Benzo(b)fluoranthene	8.8E-05	7.0E-06	3.2E-05	2.6E-06	1.1E-09	9.0E-11	-	-	-	-	-	-	-	-	-	-	4.9E-06	5.7E-06	-	-	-	-
Benzo(g,h,i)perylene	3.1E-05	2.5E-06	1.1E-05	9.0E-07	4.0E-10	3.2E-11	-	-	-	-	-	-	-	-	-	-	2.7E-06	3.1E-06	-	-	-	-
Benzo(k)fluoranthene	1.9E-04	1.5E-05	7.0E-05	5.6E-06	2.5E-09	2.0E-10	-	-	-	-	-	-	-	-	-	-	1.8E-07	2.2E-07	-	-	-	-
Chrysene	8.3E-05	6.6E-06	3.0E-05	2.4E-06	1.1E-09	8.5E-11	-	-	-	-	-	-	-	-	-	-	1.0E-05	1.2E-05	-	-	-	-
Dibenz(a,h)anthracene	1.4E-05	1.1E-06	5.2E-06	4.1E-07	1.8E-10	1.5E-11	-	-	-	-	-	-	-	-	-	-	7.8E-08	9.1E-08	-	-	-	-
Dibenzofuran	3.6E-06	2.9E-07	1.3E-06	1.0E-07	4.6E-11	3.7E-12	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Fluoranthene	1.7E-04	1.3E-05	6.1E-05	4.9E-06	2.1E-09	1.7E-10	-	-	-	-	-	-	-	-	-	-	4.1E-05	4.8E-05	-	-	-	-
Fluorene	3.3E-06	2.6E-07	1.2E-06	9.6E-08	4.3E-11	3.4E-12	-	-	-	-	-	-	-	-	-	-	2.0E-05	2.3E-05	-	-	-	-
Indeno(1,2,3-cd)pyrene	4.3E-05	3.4E-06	1.5E-05	1.2E-06	5.5E-10	4.4E-11	-	-	-	-	-	-	-	-	-	-	8.6E-07	1.0E-06	-	-	-	-
Naphthalene	7.4E-07	5.9E-08	2.7E-07	2.2E-08	9.5E-12	7.6E-13	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Perylene	4.0E-07	3.2E-08	1.5E-07	1.2E-08	5.2E-12	4.1E-13	-	-	-	-	-	-	-	-	-	-	2.4E-07	2.8E-07	-	-	-	-
Phenanthrene	7.4E-05	5.9E-06	2.7E-05	2.2E-06	9.6E-10	7.6E-11	-	-	-	-	-	-	-	-	-	-	4.2E-05	4.9E-05	-	-	-	-
Pyrene	1.4E-04	1.1E-05	5.1E-05	4.1E-06	1.8E-09	1.4E-10	-	-	-	-	-	-	-	-	-	-	3.6E-05	4.2E-05	-	-	-	-
Total Petroleum Hydrocarbons																						
C11-C14(Kerosene Range)	4.9E-04	3.9E-05	1.8E-04	1.4E-05	6.3E-09	5.0E-10	-	-	-	-	-	-	-	-	-	-	9.8E-03	1.1E-02	-	-	-	-
C14-C20(Diesel Range)	2.3E-04	1.8E-05	8.4E-05	6.7E-06	3.0E-09	2.4E-10	-	-	-	-	-	-	-	-	4.0E-03	3.2E-04	9.5E-04	1.1E-03	-	-	-	-
C20-C30(Lubricant Oil Range)	5.4E-03	4.4E-04	2.0E-03	1.6E-04	7.0E-08	5.6E-09	-	-	-	-	-	-	-	-	-	-	1.6E-02	1.8E-02	-	-	-	-

Spreadsheet C3-36b (4 of 4)

Estimated Human Intake for the Child Resident - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Reasonable Maximum Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation of Indoor Air_s		Inhalation Ambient Air_s		Inhalation of Indoor Air_{gw}		Inhalation Ambient Air_{gw}		Domestic Groundwater Use		Plant Consumption		Surface Water Ingestion		Surface Water Dermal Contact	
	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)
PCDD/PCDFs																						
2,3,7,8-TCDD	4.4E-12	3.6E-13	3.7E-13	3.0E-14	5.7E-17	4.6E-18	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,7,8-PeCDD	1.7E-11	1.3E-12	1.4E-12	1.1E-13	2.2E-16	1.7E-17	-	-	-	-	-	-	-	-	-	-	-	-	3.1E-12	2.5E-13	7.0E-11	2.8E-12
1,2,3,4,7,8-HxCDD	4.8E-11	3.8E-12	4.0E-12	3.2E-13	6.1E-16	4.9E-17	-	-	-	-	-	-	-	-	-	-	-	-	4.5E-12	3.6E-13	1.0E-10	4.1E-12
1,2,3,6,7,8-HxCDD	2.4E-10	1.9E-11	2.0E-11	1.6E-12	3.1E-15	2.5E-16	-	-	-	-	-	-	-	-	-	-	-	-	1.2E-10	9.7E-12	2.7E-09	1.1E-10
1,2,3,7,8,9-HxCDD	1.1E-10	8.9E-12	9.3E-12	7.5E-13	1.4E-15	1.1E-16	-	-	-	-	-	-	-	-	-	-	-	-	2.6E-11	2.0E-12	5.8E-10	2.3E-11
1,2,3,4,6,7,8-HpCDD	6.3E-09	5.1E-10	5.3E-10	4.2E-11	8.1E-14	6.5E-15	-	-	-	-	-	-	-	-	-	-	-	-	3.5E-09	2.8E-10	7.9E-08	3.2E-09
OCDD	9.3E-08	7.5E-09	7.9E-09	6.3E-10	1.2E-12	9.6E-14	-	-	-	-	-	-	-	-	-	-	-	-	4.8E-09	3.9E-10	1.1E-07	4.4E-09
2,3,7,8-TCDF	9.9E-12	7.9E-13	8.3E-13	6.7E-14	1.3E-16	1.0E-17	-	-	-	-	-	-	-	-	-	-	-	-	8.2E-12	6.5E-13	1.9E-10	7.5E-12
1,2,3,7,8-PeCDF	5.0E-12	4.0E-13	4.2E-13	3.3E-14	6.4E-17	5.1E-18	-	-	-	-	-	-	-	-	-	-	-	-	1.3E-11	1.1E-12	3.0E-10	1.2E-11
2,3,4,7,8-PeCDF	1.2E-11	9.2E-13	9.7E-13	7.7E-14	1.5E-16	1.2E-17	-	-	-	-	-	-	-	-	-	-	-	-	3.7E-11	2.9E-12	8.3E-10	3.3E-11
1,2,3,4,7,8-HxCDF	2.2E-11	1.8E-12	1.9E-12	1.5E-13	2.9E-16	2.3E-17	-	-	-	-	-	-	-	-	-	-	-	-	3.9E-11	3.1E-12	8.9E-10	3.6E-11
1,2,3,6,7,8-HxCDF	2.1E-11	1.7E-12	1.7E-12	1.4E-13	2.7E-16	2.1E-17	-	-	-	-	-	-	-	-	-	-	-	-	2.0E-11	1.6E-12	4.6E-10	1.8E-11
2,3,4,6,7,8-HxCDF	3.6E-11	2.9E-12	3.1E-12	2.4E-13	4.7E-16	3.8E-17	-	-	-	-	-	-	-	-	-	-	-	-	3.9E-11	3.1E-12	8.9E-10	3.6E-11
1,2,3,7,8,9-HxCDF	2.2E-12	1.8E-13	1.9E-13	1.5E-14	2.9E-17	2.3E-18	-	-	-	-	-	-	-	-	-	-	-	-	4.2E-11	3.4E-12	9.6E-10	3.8E-11
1,2,3,4,6,7,8-HpCDF	6.4E-10	5.1E-11	5.4E-11	4.3E-12	8.2E-15	6.6E-16	-	-	-	-	-	-	-	-	-	-	-	-	9.3E-11	7.4E-12	2.1E-09	8.5E-11
1,2,3,4,7,8,9-HpCDF	5.4E-11	4.3E-12	4.6E-12	3.6E-13	7.0E-16	5.6E-17	-	-	-	-	-	-	-	-	-	-	-	-	2.6E-11	2.0E-12	5.8E-10	2.3E-11
OCDF	1.9E-09	1.5E-10	1.6E-10	1.3E-11	2.5E-14	2.0E-15	-	-	-	-	-	-	-	-	-	-	-	-	2.4E-10	2.0E-11	5.6E-09	2.2E-10
PCBs																						
Aroclor-1254	5.5E-06	4.4E-07	2.2E-06	1.7E-07	7.1E-11	5.7E-12	-	-	-	-	-	-	-	-	-	-	9.6E-06	1.1E-05	-	-	-	-
Aroclor-1260	9.8E-05	7.8E-06	3.8E-05	3.1E-06	1.3E-09	1.0E-10	-	-	-	-	-	-	-	-	-	-	8.4E-05	9.8E-05	-	-	-	-
PCB-105	8.0E-09	6.4E-10	3.1E-09	2.5E-10	1.0E-13	8.2E-15	-	-	-	-	-	-	-	-	-	-	1.3E-08	1.5E-08	-	-	-	-
PCB-114	1.4E-10	1.1E-11	5.6E-11	4.5E-12	1.8E-15	1.5E-16	-	-	-	-	-	-	-	-	-	-	2.2E-10	2.6E-10	-	-	-	-
PCB-118	1.6E-08	1.3E-09	6.3E-09	5.0E-10	2.1E-13	1.6E-14	-	-	-	-	-	-	-	-	-	-	2.5E-08	3.0E-08	-	-	-	-
PCB-123	2.3E-10	1.8E-11	8.9E-11	7.1E-12	2.9E-15	2.3E-16	-	-	-	-	-	-	-	-	-	-	3.6E-10	4.2E-10	-	-	-	-
PCB-126	6.2E-10	5.0E-11	2.4E-10	2.0E-11	8.0E-15	6.4E-16	-	-	-	-	-	-	-	-	-	-	9.8E-10	1.1E-09	-	-	-	-
PCB-156	5.3E-09	4.3E-10	2.1E-09	1.7E-10	6.9E-14	5.5E-15	-	-	-	-	-	-	-	-	-	-	8.4E-09	9.8E-09	-	-	-	-
PCB-157	2.4E-09	1.9E-10	9.4E-10	7.5E-11	3.1E-14	2.5E-15	-	-	-	-	-	-	-	-	-	-	3.8E-09	4.4E-09	-	-	-	-
PCB-167	4.2E-09	3.3E-10	1.6E-09	1.3E-10	5.4E-14	4.3E-15	-	-	-	-	-	-	-	-	-	-	6.6E-09	7.7E-09	-	-	-	-
PCB-169	6.2E-11	5.0E-12	2.4E-11	2.0E-12	8.0E-16	6.4E-17	-	-	-	-	-	-	-	-	-	-	9.8E-11	1.1E-10	-	-	-	-
PCB-189	6.2E-10	5.0E-11	2.4E-10	2.0E-11	8.0E-15	6.4E-16	-	-	-	-	-	-	-	-	-	-	9.8E-10	1.1E-09	-	-	-	-
PCB-77	1.2E-09	1.0E-10	4.9E-10	3.9E-11	1.6E-14	1.3E-15	-	-	-	-	-	-	-	-	-	-	1.1E-09	1.3E-09	-	-	-	-
PCB-81	2.2E-10	1.8E-11	8.6E-11	6.9E-12	2.8E-15	2.3E-16	-	-	-	-	-	-	-	-	-	-	2.0E-10	2.3E-10	-	-	-	-

Notes:
ADD - Average daily dose, as defined in the SRAM (MWH 2005).
LADD - Lifetime average daily dose, as defined in the SRAM (MWH 2005).
The chemicals presented in this table are comprehensive for all media sampled. Not all chemicals were analyzed for or detected in all media.
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCDD/PCDF - Polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.
PCB - polychlorinated biphenyls
COPC - chemical of potential concern
"-" indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
mg/kg-day - milligrams per kilogram day

Spreadsheet C3-36a (1 of 4)

Estimated Human Intake for the Child Resident - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Central Tendancy Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation of Indoor Air_s		Inhalation Ambient Air_s		Inhalation of Indoor Air_{gw}		Inhalation Ambient Air_{gw}		Domestic Groundwater Use		Plant Consumption	
	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)
Inorganic Compounds																		
Cadmium	3.2E-06	2.6E-07	5.5E-09	4.4E-10	5.6E-11	4.5E-12	-	-	-	-	-	-	-	-	-	-	1.9E-05	1.5E-06
Copper	1.3E-04	1.1E-05	2.3E-06	1.8E-07	2.3E-09	1.9E-10	-	-	-	-	-	-	-	-	8.6E-04	6.9E-05	1.2E-02	9.8E-04
Fluoride	-	-	-	-	-	-	-	-	-	-	-	-	-	-	2.7E-02	2.1E-03	-	-
Lead	1.0E-04	8.2E-06	1.7E-06	1.4E-07	1.8E-09	1.4E-10	-	-	-	-	-	-	-	-	-	-	4.5E-05	3.6E-06
Mercury	1.2E-05	9.8E-07	2.0E-07	1.6E-08	2.1E-10	1.7E-11	-	-	-	-	-	-	-	-	-	-	1.1E-04	8.8E-06
Methyl Mercury	1.1E-08	8.9E-10	1.9E-10	1.5E-11	1.9E-13	1.5E-14	-	-	-	-	-	-	-	-	-	-	1.7E-07	1.4E-08
Nitrate	-	-	-	-	-	-	-	-	-	-	-	-	-	-	6.8E-01	5.4E-02	-	-
Silver	4.9E-06	4.0E-07	8.3E-08	6.6E-09	8.5E-11	6.8E-12	-	-	-	-	-	-	-	-	-	-	1.5E-07	1.2E-08
Thallium	2.1E-06	1.7E-07	3.5E-08	2.8E-09	3.6E-11	2.9E-12	-	-	-	-	-	-	-	-	2.6E-05	2.1E-06	4.7E-05	3.7E-06
Zinc	1.1E-03	8.7E-05	1.8E-05	1.5E-06	1.9E-08	1.5E-09	-	-	-	-	-	-	-	-	-	-	2.4E-02	1.9E-03
VOCs																		
1,1,1-Trichloroethane	-	-	-	-	-	-	1.7E-04	1.3E-05	-	-	-	-	-	-	-	-	-	-
1,1,2-Trichloro-1,2,2-trifluoroethane	7.7E-08	6.1E-09	1.3E-08	1.0E-09	-	-	8.5E-04	6.8E-05	-	-	-	-	-	-	-	-	1.8E-05	1.4E-06
1,1-Dichloroethane	-	-	-	-	-	-	1.6E-04	1.3E-05	7.6E-07	6.1E-08	1.1E-06	9.0E-08	7.6E-07	6.1E-08	2.5E-04	2.0E-05	-	-
1,2-Dichloroethane	-	-	-	-	-	-	-	-	1.8E-07	1.4E-08	1.8E-07	1.5E-08	1.8E-07	1.4E-08	8.6E-05	6.9E-06	-	-
1,2-Dichloroethene (total)	1.8E-07	1.4E-08	3.0E-08	2.4E-09	-	-	-	-	-	-	-	-	-	-	-	-	2.9E-04	2.3E-05
1-Chlorohexane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
2-Butanone	2.4E-07	1.9E-08	4.0E-08	3.2E-09	-	-	-	-	-	-	-	-	-	-	-	-	2.5E-03	2.0E-04
2-Hexanone	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Acetone	4.3E-06	3.5E-07	7.3E-07	5.8E-08	-	-	-	-	6.6E-09	5.3E-10	7.5E-09	6.0E-10	6.6E-09	5.3E-10	1.5E-03	1.2E-04	9.2E-02	7.4E-03
Benzene	-	-	-	-	-	-	-	-	8.7E-07	7.0E-08	1.0E-06	8.2E-08	8.7E-07	7.0E-08	5.6E-05	4.4E-06	-	-
Carbon disulfide	-	-	-	-	-	-	-	-	-	-	5.6E-06	4.4E-07	6.0E-06	4.8E-07	2.5E-04	2.0E-05	-	-
Chloromethane	-	-	-	-	-	-	-	-	-	-	1.5E-06	1.2E-07	2.3E-06	1.8E-07	3.1E-05	2.5E-06	-	-
cis-1,2-Dichloroethene	-	-	-	-	-	-	-	-	5.4E-07	4.3E-08	6.0E-07	4.8E-08	5.4E-07	4.3E-08	4.9E-03	3.9E-04	-	-
Ethylbenzene	-	-	-	-	-	-	1.6E-04	1.3E-05	-	-	-	-	-	-	-	-	-	-
m,p-Xylene	-	-	-	-	-	-	3.2E-04	2.5E-05	-	-	-	-	-	-	-	-	-	-
Methylene chloride	8.3E-08	6.6E-09	1.4E-08	1.1E-09	-	-	4.8E-03	3.9E-04	4.1E-07	3.3E-08	3.2E-07	2.6E-08	4.1E-07	3.3E-08	6.1E-05	4.9E-06	3.9E-04	3.1E-05
Tetrachloroethene	1.3E-07	1.1E-08	2.2E-08	1.8E-09	-	-	1.6E-04	1.3E-05	-	-	-	-	-	-	-	-	2.2E-05	1.8E-06
Toluene	3.6E-07	2.9E-08	6.0E-08	4.8E-09	-	-	1.8E-04	1.4E-05	-	-	-	-	-	-	1.7E-04	1.4E-05	1.5E-04	1.2E-05
Trichloroethene	2.4E-07	1.9E-08	4.0E-08	3.2E-09	-	-	1.7E-04	1.4E-05	1.4E-06	1.1E-07	1.4E-06	1.1E-07	1.4E-06	1.1E-07	9.6E-04	7.7E-05	1.3E-04	1.0E-05
Xylenes (total)	1.6E-07	1.3E-08	2.7E-08	2.2E-09	-	-	-	-	-	-	-	-	-	-	-	-	4.0E-05	3.2E-06
SVOCs																		
2-Methylnaphthalene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Acenaphthene	2.8E-07	2.3E-08	6.2E-08	4.9E-09	4.8E-12	3.9E-13	-	-	-	-	-	-	-	-	-	-	2.2E-05	1.7E-06
Acenaphthylene	2.0E-07	1.6E-08	4.3E-08	3.4E-09	3.4E-12	2.7E-13	-	-	-	-	-	-	-	-	-	-	1.4E-05	1.1E-06
Anthracene	2.5E-07	2.0E-08	5.4E-08	4.3E-09	4.3E-12	3.4E-13	-	-	-	-	-	-	-	-	-	-	1.0E-05	8.2E-07
Benzo(a)anthracene	2.3E-07	1.8E-08	5.0E-08	4.0E-09	3.9E-12	3.2E-13	-	-	-	-	-	-	-	-	-	-	1.8E-06	1.4E-07
Benzo(a)pyrene	2.3E-07	1.8E-08	5.0E-08	4.0E-09	4.0E-12	3.2E-13	-	-	-	-	-	-	-	-	-	-	7.6E-07	6.1E-08
Benzo(e)pyrene	1.2E-07	9.5E-09	2.6E-08	2.1E-09	2.0E-12	1.6E-13	-	-	-	-	-	-	-	-	-	-	3.5E-07	2.8E-08
Benzo(b)fluoranthene	3.1E-07	2.5E-08	6.8E-08	5.5E-09	5.4E-12	4.3E-13	-	-	-	-	-	-	-	-	-	-	1.1E-06	8.9E-08
Benzo(g,h,i)perylene	2.6E-07	2.1E-08	5.7E-08	4.6E-09	4.5E-12	3.6E-13	-	-	-	-	-	-	-	-	-	-	7.0E-07	5.6E-08
Benzo(k)fluoranthene	1.9E-07	1.5E-08	4.1E-08	3.3E-09	3.3E-12	2.6E-13	-	-	-	-	-	-	-	-	-	-	9.1E-07	7.3E-08
Chrysene	2.8E-07	2.3E-08	6.2E-08	5.0E-09	4.9E-12	3.9E-13	-	-	-	-	-	-	-	-	-	-	2.1E-06	1.7E-07
Dibenz(a,h)anthracene	1.9E-07	1.5E-08	4.1E-08	3.3E-09	3.2E-12	2.6E-13	-	-	-	-	-	-	-	-	-	-	3.2E-07	2.5E-08
Dibenzofuran	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Fluoranthene	3.8E-07	3.1E-08	8.4E-08	6.7E-09	6.6E-12	5.3E-13	-	-	-	-	-	-	-	-	-	-	6.6E-06	5.3E-07
Fluorene	2.8E-07	2.2E-08	6.1E-08	4.9E-09	4.8E-12	3.9E-13	-	-	-	-	-	-	-	-	-	-	4.9E-06	3.9E-07
Indeno(1,2,3-cd)pyrene	2.2E-07	1.8E-08	4.8E-08	3.8E-09	3.8E-12	3.0E-13	-	-	-	-	-	-	-	-	-	-	2.2E-07	1.7E-08
Naphthalene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Perylene	6.8E-08	5.4E-09	1.5E-08	1.2E-09	1.2E-12	9.3E-14	-	-	-	-	-	-	-	-	-	-	4.5E-07	3.6E-08
Phenanthrene	5.1E-07	4.1E-08	1.1E-07	8.9E-09	8.7E-12	7.0E-13	-	-	-	-	-	-	-	-	-	-	1.8E-05	1.4E-06
Pyrene	3.4E-07	2.7E-08	7.4E-08	5.9E-09	5.8E-12	4.7E-13	-	-	-	-	-	-	-	-	-	-	6.6E-06	5.3E-07
Total Petroleum Hydrocarbons																		
C11-C14(Kerosene Range)	6.2E-05	4.9E-06	1.3E-05	1.1E-06	1.1E-09	8.5E-11	-	-	-	-	-	-	-	-	-	-	2.4E-03	1.9E-04
C14-C20(Diesel Range)	4.8E-05	3.8E-06	1.0E-05	8.3E-07	8.2E-10	6.5E-11	-	-	-	-	-	-	-	-	2.4E-03	1.9E-04	9.5E-04	7.6E-05
C20-C30(Lubricant Oil Range)	4.7E-04	3.7E-05	1.0E-04	8.2E-06	8.0E-09	6.4E-10	-	-	-	-	-	-	-	-	-	-	2.4E-03	2.0E-04

Spreadsheet C3-36a (2 of 4)

Estimated Human Intake for the Child Resident - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Central Tendancy Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation of Indoor Air_s		Inhalation Ambient Air_s		Inhalation of Indoor Air_{gw}		Inhalation Ambient Air_{gw}		Domestic Groundwater Use		Plant Consumption	
	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)
PCDD/PCDFs																		
2,3,7,8-TCDD	1.7E-12	1.4E-13	8.8E-14	7.0E-15	3.0E-17	2.4E-18	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,7,8-PeCDD	7.0E-12	5.6E-13	3.5E-13	2.8E-14	1.2E-16	9.7E-18	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,4,7,8-HxCDD	2.6E-11	2.1E-12	1.3E-12	1.1E-13	4.5E-16	3.6E-17	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,6,7,8-HxCDD	1.0E-10	8.1E-12	5.1E-12	4.1E-13	1.7E-15	1.4E-16	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,7,8,9-HxCDD	3.8E-11	3.0E-12	1.9E-12	1.5E-13	6.5E-16	5.2E-17	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,4,6,7,8-HpCDD	3.6E-09	2.9E-10	1.8E-10	1.5E-11	6.2E-14	5.0E-15	-	-	-	-	-	-	-	-	-	-	-	-
OCDD	5.3E-08	4.3E-09	2.7E-09	2.2E-10	9.2E-13	7.3E-14	-	-	-	-	-	-	-	-	-	-	-	-
2,3,7,8-TCDF	3.5E-12	2.8E-13	1.8E-13	1.4E-14	6.0E-17	4.8E-18	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,7,8-PeCDF	1.8E-12	1.4E-13	8.9E-14	7.1E-15	3.0E-17	2.4E-18	-	-	-	-	-	-	-	-	-	-	-	-
2,3,4,7,8-PeCDF	5.2E-12	4.2E-13	2.6E-13	2.1E-14	9.0E-17	7.2E-18	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,4,7,8-HxCDF	1.1E-11	9.1E-13	5.7E-13	4.6E-14	2.0E-16	1.6E-17	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,6,7,8-HxCDF	9.9E-12	7.9E-13	5.0E-13	4.0E-14	1.7E-16	1.4E-17	-	-	-	-	-	-	-	-	-	-	-	-
2,3,4,6,7,8-HxCDF	2.5E-11	2.0E-12	1.2E-12	9.9E-14	4.2E-16	3.4E-17	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,7,8,9-HxCDF	2.3E-12	1.8E-13	1.2E-13	9.3E-15	4.0E-17	3.2E-18	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,4,6,7,8-HpCDF	3.4E-10	2.7E-11	1.7E-11	1.4E-12	5.8E-15	4.6E-16	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,4,7,8,9-HpCDF	3.1E-11	2.5E-12	1.6E-12	1.3E-13	5.3E-16	4.3E-17	-	-	-	-	-	-	-	-	-	-	-	-
OCDF	8.6E-10	6.9E-11	4.3E-11	3.5E-12	1.5E-14	1.2E-15	-	-	-	-	-	-	-	-	-	-	-	-
PCBs																		
Aroclor-1254	1.0E-06	8.3E-08	2.4E-07	1.9E-08	1.8E-11	1.4E-12	-	-	-	-	-	-	-	-	-	-	3.6E-06	2.9E-07
Aroclor-1260	8.5E-06	6.8E-07	2.0E-06	1.6E-07	1.5E-10	1.2E-11	-	-	-	-	-	-	-	-	-	-	1.5E-05	1.2E-06
PCB-105	7.3E-10	5.8E-11	1.7E-10	1.4E-11	1.3E-14	1.0E-15	-	-	-	-	-	-	-	-	-	-	2.6E-09	2.0E-10
PCB-114	1.4E-11	1.1E-12	3.3E-12	2.6E-13	2.4E-16	1.9E-17	-	-	-	-	-	-	-	-	-	-	4.9E-11	3.9E-12
PCB-118	1.5E-09	1.2E-10	3.5E-10	2.8E-11	2.5E-14	2.0E-15	-	-	-	-	-	-	-	-	-	-	5.1E-09	4.1E-10
PCB-123	2.0E-11	1.6E-12	4.8E-12	3.9E-13	3.5E-16	2.8E-17	-	-	-	-	-	-	-	-	-	-	7.2E-11	5.7E-12
PCB-126	5.6E-11	4.5E-12	1.3E-11	1.1E-12	9.6E-16	7.7E-17	-	-	-	-	-	-	-	-	-	-	2.0E-10	1.6E-11
PCB-156	4.8E-10	3.8E-11	1.1E-10	9.0E-12	8.2E-15	6.6E-16	-	-	-	-	-	-	-	-	-	-	1.7E-09	1.3E-10
PCB-157	2.1E-10	1.7E-11	5.0E-11	4.0E-12	3.6E-15	2.9E-16	-	-	-	-	-	-	-	-	-	-	7.4E-10	5.9E-11
PCB-167	3.7E-10	2.9E-11	8.6E-11	6.9E-12	6.3E-15	5.0E-16	-	-	-	-	-	-	-	-	-	-	1.3E-09	1.0E-10
PCB-169	5.5E-12	4.4E-13	1.3E-12	1.0E-13	9.4E-17	7.5E-18	-	-	-	-	-	-	-	-	-	-	1.9E-11	1.5E-12
PCB-189	5.5E-11	4.4E-12	1.3E-11	1.0E-12	9.4E-16	7.5E-17	-	-	-	-	-	-	-	-	-	-	1.9E-10	1.5E-11
PCB-77	1.1E-10	9.0E-12	2.6E-11	2.1E-12	1.9E-15	1.5E-16	-	-	-	-	-	-	-	-	-	-	2.2E-10	1.8E-11
PCB-81	2.0E-11	1.6E-12	4.7E-12	3.7E-13	3.4E-16	2.7E-17	-	-	-	-	-	-	-	-	-	-	4.0E-11	3.2E-12

Spreadsheet C3-36a (3 of 4)

Estimated Human Intake for the Child Resident - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Reasonable Maximum Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation of Indoor Air_s		Inhalation Ambient Air_s		Inhalation of Indoor Air_{gw}		Inhalation Ambient Air_{gw}		Domestic Groundwater Use		Plant Consumption	
	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)
Inorganic Compounds																		
Cadmium	1.5E-05	1.2E-06	4.1E-08	3.3E-09	1.9E-10	1.5E-11	-	-	-	-	-	-	-	-	-	-	4.2E-05	5.0E-05
Copper	5.8E-04	4.7E-05	1.6E-05	1.3E-06	7.5E-09	6.0E-10	-	-	-	-	-	-	-	-	1.4E-03	1.2E-04	2.7E-02	3.1E-02
Fluoride	-	-	-	-	-	-	-	-	-	-	-	-	-	-	4.5E-02	3.6E-03	-	-
Lead	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Mercury	5.6E-05	4.5E-06	1.6E-06	1.3E-07	7.3E-10	5.8E-11	-	-	-	-	-	-	-	-	-	-	2.5E-04	3.0E-04
Methyl Mercury	4.6E-08	3.7E-09	1.3E-09	1.0E-10	6.0E-13	4.8E-14	-	-	-	-	-	-	-	-	-	-	3.6E-07	4.2E-07
Nitrate	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1.1E+00	9.1E-02	-	-
Silver	3.7E-05	2.9E-06	1.0E-06	8.2E-08	4.7E-10	3.8E-11	-	-	-	-	-	-	-	-	-	-	5.7E-07	6.7E-07
Thallium	4.2E-06	3.4E-07	1.2E-07	9.5E-09	5.4E-11	4.3E-12	-	-	-	-	-	-	-	-	4.3E-05	3.5E-06	4.7E-05	5.5E-05
Zinc	5.6E-03	4.5E-04	1.6E-04	1.3E-05	7.2E-08	5.8E-09	-	-	-	-	-	-	-	-	-	-	6.2E-02	7.2E-02
VOCs																		
1,1,1-Trichloroethane	-	-	-	-	-	-	2.5E-04	2.0E-05	-	-	-	-	-	-	-	-	-	-
1,1,2-Trichloro-1,2,2-trifluoroethane	1.5E-07	1.2E-08	4.3E-08	3.4E-09	-	-	1.5E-03	1.2E-04	-	-	-	-	-	-	-	-	1.8E-05	2.1E-05
1,1-Dichloroethane	-	-	-	-	-	-	2.5E-04	2.0E-05	1.1E-06	9.2E-08	1.7E-06	1.3E-07	1.1E-06	9.2E-08	4.2E-04	3.3E-05	-	-
1,2-Dichloroethane	-	-	-	-	-	-	-	-	2.7E-07	2.1E-08	2.8E-07	2.2E-08	2.7E-07	2.1E-08	1.4E-04	1.2E-05	-	-
1,2-Dichloroethene (total)	8.9E-07	7.2E-08	2.5E-07	2.0E-08	-	-	-	-	-	-	-	-	-	-	-	-	7.1E-04	8.3E-04
1-Chlorohexane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
2-Butanone	4.7E-07	3.8E-08	1.3E-07	1.1E-08	-	-	-	-	-	-	-	-	-	-	-	-	2.5E-03	3.0E-03
2-Hexanone	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Acetone	5.4E-05	4.3E-06	1.5E-05	1.2E-06	-	-	-	-	1.0E-08	8.0E-10	1.1E-08	9.0E-10	1.0E-08	8.0E-10	2.6E-03	2.0E-04	5.7E-01	6.6E-01
Benzene	-	-	-	-	-	-	-	-	1.3E-06	1.0E-07	1.5E-06	1.2E-07	1.3E-06	1.0E-07	9.3E-05	7.4E-06	-	-
Carbon disulfide	-	-	-	-	-	-	-	-	-	-	8.3E-06	6.7E-07	9.0E-06	7.2E-07	4.2E-04	3.3E-05	-	-
Chloromethane	-	-	-	-	-	-	-	-	-	-	2.3E-06	1.9E-07	3.4E-06	2.7E-07	5.1E-05	4.1E-06	-	-
cis-1,2-Dichloroethene	-	-	-	-	-	-	-	-	8.1E-07	6.5E-08	8.9E-07	7.1E-08	8.1E-07	6.5E-08	8.2E-03	6.5E-04	-	-
Ethylbenzene	-	-	-	-	-	-	2.5E-04	2.0E-05	-	-	-	-	-	-	-	-	-	-
m,p-Xylene	-	-	-	-	-	-	4.8E-04	3.8E-05	-	-	-	-	-	-	-	-	-	-
Methylene chloride	1.7E-07	1.3E-08	4.7E-08	3.7E-09	-	-	7.2E-03	5.8E-04	6.2E-07	4.9E-08	4.8E-07	3.9E-08	6.2E-07	4.9E-08	1.0E-04	8.2E-06	3.9E-04	4.6E-04
Tetrachloroethene	1.1E-06	9.0E-08	3.2E-07	2.5E-08	-	-	2.4E-04	1.9E-05	-	-	-	-	-	-	-	-	9.5E-05	1.1E-04
Toluene	4.4E-06	3.5E-07	1.2E-06	9.8E-08	-	-	2.7E-04	2.1E-05	-	-	-	-	-	-	2.9E-04	2.3E-05	9.0E-04	1.1E-03
Trichloroethene	2.6E-06	2.1E-07	7.2E-07	5.8E-08	-	-	2.5E-04	2.0E-05	2.1E-06	1.7E-07	2.1E-06	1.7E-07	2.1E-06	1.7E-07	1.6E-03	1.3E-04	7.1E-04	8.4E-04
Xylenes (total)	6.6E-07	5.2E-08	1.8E-07	1.5E-08	-	-	-	-	-	-	-	-	-	-	-	-	8.0E-05	9.4E-05
SVOCs																		
2-Methylnaphthalene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Acenaphthene	1.3E-06	1.0E-07	4.7E-07	3.7E-08	1.6E-11	1.3E-12	-	-	-	-	-	-	-	-	-	-	5.0E-05	5.8E-05
Acenaphthylene	1.1E-06	8.7E-08	4.0E-07	3.2E-08	1.4E-11	1.1E-12	-	-	-	-	-	-	-	-	-	-	3.7E-05	4.4E-05
Anthracene	1.0E-06	8.4E-08	3.8E-07	3.1E-08	1.3E-11	1.1E-12	-	-	-	-	-	-	-	-	-	-	2.2E-05	2.5E-05
Benzo(a)anthracene	1.9E-06	1.5E-07	6.9E-07	5.5E-08	2.4E-11	2.0E-12	-	-	-	-	-	-	-	-	-	-	7.4E-06	8.7E-06
Benzo(a)pyrene	1.9E-06	1.5E-07	6.9E-07	5.5E-08	2.4E-11	2.0E-12	-	-	-	-	-	-	-	-	-	-	3.1E-06	3.7E-06
Benzo(e)pyrene	8.0E-07	6.4E-08	2.9E-07	2.3E-08	1.0E-11	8.2E-13	-	-	-	-	-	-	-	-	-	-	1.2E-06	1.4E-06
Benzo(b)fluoranthene	3.4E-06	2.7E-07	1.2E-06	9.9E-08	4.4E-11	3.5E-12	-	-	-	-	-	-	-	-	-	-	6.1E-06	7.1E-06
Benzo(g,h,i)perylene	1.2E-06	9.2E-08	4.2E-07	3.3E-08	1.5E-11	1.2E-12	-	-	-	-	-	-	-	-	-	-	1.5E-06	1.8E-06
Benzo(k)fluoranthene	1.1E-06	8.7E-08	4.0E-07	3.2E-08	1.4E-11	1.1E-12	-	-	-	-	-	-	-	-	-	-	2.6E-06	3.1E-06
Chrysene	2.8E-06	2.2E-07	1.0E-06	8.1E-08	3.6E-11	2.9E-12	-	-	-	-	-	-	-	-	-	-	1.0E-05	1.2E-05
Dibenz(a,h)anthracene	1.1E-06	8.7E-08	4.0E-07	3.2E-08	1.4E-11	1.1E-12	-	-	-	-	-	-	-	-	-	-	9.2E-07	1.1E-06
Dibenzofuran	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Fluoranthene	4.8E-06	3.8E-07	1.7E-06	1.4E-07	6.2E-11	4.9E-12	-	-	-	-	-	-	-	-	-	-	4.1E-05	4.8E-05
Fluorene	1.3E-06	1.0E-07	4.6E-07	3.7E-08	1.6E-11	1.3E-12	-	-	-	-	-	-	-	-	-	-	1.1E-05	1.3E-05
Indeno(1,2,3-cd)pyrene	1.7E-06	1.4E-07	6.3E-07	5.0E-08	2.2E-11	1.8E-12	-	-	-	-	-	-	-	-	-	-	8.6E-07	1.0E-06
Naphthalene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Perylene	4.6E-07	3.6E-08	1.7E-07	1.3E-08	5.9E-12	4.7E-13	-	-	-	-	-	-	-	-	-	-	1.5E-06	1.8E-06
Phenanthrene	2.6E-06	2.1E-07	9.3E-07	7.5E-08	3.3E-11	2.6E-12	-	-	-	-	-	-	-	-	-	-	4.5E-05	5.3E-05
Pyrene	2.0E-06	1.6E-07	7.3E-07	5.8E-08	2.6E-11	2.1E-12	-	-	-	-	-	-	-	-	-	-	1.9E-05	2.3E-05
Total Petroleum Hydrocarbons																		
C11-C14(Kerosene Range)	5.1E-04	4.1E-05	1.9E-04	1.5E-05	6.6E-09	5.3E-10	-	-	-	-	-	-	-	-	-	-	9.8E-03	1.1E-02
C14-C20(Diesel Range)	9.5E-05	7.6E-06	3.5E-05	2.8E-06	1.2E-09	9.8E-11	-	-	-	-	-	-	-	-	4.0E-03	3.2E-04	9.5E-04	1.1E-03
C20-C30(Lubricant Oil Range)	6.0E-03	4.8E-04	2.2E-03	1.7E-04	7.7E-08	6.2E-09	-	-	-	-	-	-	-	-	-	-	1.6E-02	1.8E-02

Spreadsheet C3-36a (4 of 4)

Estimated Human Intake for the Child Resident - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Reasonable Maximum Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation of Indoor Air_s		Inhalation Ambient Air_s		Inhalation of Indoor Air_{gw}		Inhalation Ambient Air_{gw}		Domestic Groundwater Use		Plant Consumption	
	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)
PCDD/PCDFs																		
2,3,7,8-TCDD	6.8E-12	5.5E-13	5.7E-13	4.6E-14	8.8E-17	7.0E-18	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,7,8-PeCDD	2.8E-11	2.2E-12	2.3E-12	1.9E-13	3.6E-16	2.9E-17	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,4,7,8-HxCDD	1.2E-10	9.2E-12	9.7E-12	7.8E-13	1.5E-15	1.2E-16	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,6,7,8-HxCDD	3.8E-10	3.0E-11	3.2E-11	2.5E-12	4.9E-15	3.9E-16	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,7,8,9-HxCDD	1.3E-10	1.0E-11	1.1E-11	8.6E-13	1.6E-15	1.3E-16	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,4,6,7,8-HpCDD	1.5E-08	1.2E-09	1.3E-09	1.0E-10	2.0E-13	1.6E-14	-	-	-	-	-	-	-	-	-	-	-	-
OCDD	2.2E-07	1.7E-08	1.8E-08	1.4E-09	2.8E-12	2.2E-13	-	-	-	-	-	-	-	-	-	-	-	-
2,3,7,8-TCDF	1.0E-11	8.1E-13	8.5E-13	6.8E-14	1.3E-16	1.0E-17	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,7,8-PeCDF	7.3E-12	5.9E-13	6.2E-13	4.9E-14	9.4E-17	7.6E-18	-	-	-	-	-	-	-	-	-	-	-	-
2,3,4,7,8-PeCDF	2.0E-11	1.6E-12	1.7E-12	1.3E-13	2.6E-16	2.1E-17	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,4,7,8-HxCDF	4.3E-11	3.4E-12	3.6E-12	2.9E-13	5.5E-16	4.4E-17	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,6,7,8-HxCDF	4.0E-11	3.2E-12	3.4E-12	2.7E-13	5.2E-16	4.2E-17	-	-	-	-	-	-	-	-	-	-	-	-
2,3,4,6,7,8-HxCDF	1.1E-10	9.0E-12	9.4E-12	7.6E-13	1.4E-15	1.2E-16	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,7,8,9-HxCDF	1.2E-11	9.9E-13	1.0E-12	8.3E-14	1.6E-16	1.3E-17	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,4,6,7,8-HpCDF	1.2E-09	9.8E-11	1.0E-10	8.2E-12	1.6E-14	1.3E-15	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,4,7,8,9-HpCDF	1.2E-10	9.5E-12	9.9E-12	7.9E-13	1.5E-15	1.2E-16	-	-	-	-	-	-	-	-	-	-	-	-
OCDF	3.0E-09	2.4E-10	2.5E-10	2.0E-11	3.9E-14	3.1E-15	-	-	-	-	-	-	-	-	-	-	-	-
PCBs																		
Aroclor-1254	5.5E-06	4.4E-07	2.2E-06	1.7E-07	7.1E-11	5.7E-12	-	-	-	-	-	-	-	-	-	-	9.6E-06	1.1E-05
Aroclor-1260	9.3E-05	7.5E-06	3.7E-05	2.9E-06	1.2E-09	9.6E-11	-	-	-	-	-	-	-	-	-	-	8.4E-05	9.8E-05
PCB-105	7.2E-09	5.8E-10	2.8E-09	2.3E-10	9.3E-14	7.4E-15	-	-	-	-	-	-	-	-	-	-	1.3E-08	1.5E-08
PCB-114	1.3E-10	1.0E-11	5.0E-11	4.0E-12	1.7E-15	1.3E-16	-	-	-	-	-	-	-	-	-	-	2.2E-10	2.6E-10
PCB-118	1.4E-08	1.2E-09	5.7E-09	4.5E-10	1.9E-13	1.5E-14	-	-	-	-	-	-	-	-	-	-	2.5E-08	3.0E-08
PCB-123	2.0E-10	1.6E-11	8.0E-11	6.4E-12	2.6E-15	2.1E-16	-	-	-	-	-	-	-	-	-	-	3.6E-10	4.2E-10
PCB-126	5.6E-10	4.5E-11	2.2E-10	1.8E-11	7.2E-15	5.8E-16	-	-	-	-	-	-	-	-	-	-	9.8E-10	1.1E-09
PCB-156	4.8E-09	3.8E-10	1.9E-09	1.5E-10	6.2E-14	5.0E-15	-	-	-	-	-	-	-	-	-	-	8.4E-09	9.8E-09
PCB-157	2.2E-09	1.7E-10	8.5E-10	6.8E-11	2.8E-14	2.2E-15	-	-	-	-	-	-	-	-	-	-	3.8E-09	4.4E-09
PCB-167	3.8E-09	3.0E-10	1.5E-09	1.2E-10	4.9E-14	3.9E-15	-	-	-	-	-	-	-	-	-	-	6.6E-09	7.7E-09
PCB-169	5.6E-11	4.5E-12	2.2E-11	1.8E-12	7.2E-16	5.8E-17	-	-	-	-	-	-	-	-	-	-	9.8E-11	1.1E-10
PCB-189	5.6E-10	4.5E-11	2.2E-10	1.8E-11	7.2E-15	5.8E-16	-	-	-	-	-	-	-	-	-	-	9.8E-10	1.1E-09
PCB-77	1.1E-09	9.0E-11	4.4E-10	3.5E-11	1.4E-14	1.2E-15	-	-	-	-	-	-	-	-	-	-	1.1E-09	1.3E-09
PCB-81	2.0E-10	1.6E-11	7.8E-11	6.2E-12	2.6E-15	2.0E-16	-	-	-	-	-	-	-	-	-	-	2.0E-10	2.3E-10

Notes:
Inhalation Indoor Air_{s-gw} - Exposure associated with indoor air concentrations of COPCs modeled from soil vapor, soil, or groundwater.
Inhalation Ambient Air_{s-gw} - Exposure associated with ambient air concentrations of COPCs modeled from soil or groundwater.
ADD - Average daily dose, as defined in the SRAM (MWH 2005).
LADD - Lifetime average daily dose, as defined in the SRAM (MWH 2005).
The chemicals presented in this table are comprehensive for all media sampled. Not all chemicals were analyzed for or detected in all media.
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCDD/PCDF - Polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.
PCB - polychlorinated biphenyls
COPC - chemical of potential concern
"-" indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
mg/kg-day - milligrams per kilogram day

Spreadsheet C3-35b (1 of 4)
Estimated Human Intake for the Adult Resident - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Central Tendancy Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation of Indoor Air_s		Inhalation Ambient Air_s		Inhalation of Indoor Air_{gw}		Inhalation Ambient Air_{gw}		Domestic Groundwater Use		Plant Consumption		Surface Water Ingestion		Surface Water Dermal Contact	
	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)
Inorganic Compounds																						
Aluminum	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	5.0E-05	6.0E-06	9.1E-06	1.1E-06
Antimony	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	4.4E-08	5.3E-09	8.0E-09	9.6E-10
Arsenic	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	3.3E-07	4.0E-08	6.0E-08	7.2E-09
Cadmium	1.3E-07	1.6E-08	1.5E-10	1.8E-11	3.7E-12	4.5E-13	-	-	-	-	-	-	-	-	-	-	1.3E-05	1.5E-06	7.4E-09	8.9E-10	1.4E-09	1.6E-10
Chromium	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1.1E-07	1.4E-08	2.0E-08	2.5E-09
Copper	6.6E-06	8.0E-07	7.6E-08	9.1E-09	1.9E-10	2.3E-11	-	-	-	-	-	-	-	-	2.5E-04	3.0E-05	8.1E-03	9.8E-04	2.1E-07	2.6E-08	3.9E-08	4.7E-09
Fluoride	-	-	-	-	-	-	-	-	-	-	-	-	-	-	7.7E-03	9.2E-04	-	-	-	-	-	-
Lead	6.3E-06	7.5E-07	7.2E-08	8.6E-09	1.8E-10	2.2E-11	-	-	-	-	-	-	-	-	-	-	3.0E-05	3.6E-06	3.9E-08	4.7E-09	7.2E-10	8.6E-11
Mercury	1.2E-06	1.4E-07	1.4E-08	1.6E-09	3.4E-11	4.1E-12	-	-	-	-	-	-	-	-	-	-	7.3E-05	8.7E-06	5.8E-09	6.9E-10	1.1E-09	1.3E-10
Methyl Mercury	1.2E-09	1.4E-10	1.4E-11	1.6E-12	3.4E-14	4.1E-15	-	-	-	-	-	-	-	-	-	-	1.2E-07	1.4E-08	-	-	-	-
Nickel	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	2.0E-07	2.4E-08	7.3E-09	8.7E-10
Nitrate	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1.9E-01	2.3E-02	-	-	-	-	-	-
Silver	8.9E-07	1.1E-07	1.0E-08	1.2E-09	2.6E-11	3.1E-12	-	-	-	-	-	-	-	-	-	-	1.0E-07	1.2E-08	-	-	-	-
Thallium	6.8E-07	8.2E-08	7.8E-09	9.3E-10	2.0E-11	2.3E-12	-	-	-	-	-	-	-	-	7.4E-06	8.9E-07	3.1E-05	3.7E-06	1.0E-08	1.2E-09	1.9E-09	2.2E-10
Vanadium	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	2.0E-07	2.3E-08	3.6E-08	4.3E-09
Zinc	4.6E-05	5.6E-06	5.3E-07	6.3E-08	1.3E-09	1.6E-10	-	-	-	-	-	-	-	-	-	-	1.6E-02	1.9E-03	-	-	-	-
VOCs																						
1,1,1-Trichloroethane	-	-	-	-	-	-	3.0E-05	3.6E-06	-	-	-	-	-	-	-	-	-	-	3.7E-08	4.5E-09	0.0E+00	0.0E+00
1,1,2-Trichloro-1,2,2-trifluoroethane	8.2E-09	9.9E-10	9.4E-10	1.1E-10	2.4E-13	2.8E-14	1.5E-04	1.8E-05	-	-	-	-	-	-	-	-	1.2E-05	1.4E-06	-	-	-	-
1,1-Dichloroethane	-	-	-	-	-	-	2.9E-05	3.5E-06	1.4E-07	1.6E-08	2.0E-07	2.4E-08	1.4E-07	1.6E-08	7.1E-05	8.5E-06	-	-	-	-	-	-
1,2-Dichloroethane	-	-	-	-	-	-	-	-	3.2E-08	3.8E-09	3.3E-08	4.0E-09	3.2E-08	3.8E-09	2.5E-05	3.0E-06	-	-	-	-	-	-
1,2-Dichloroethene (total)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1.9E-04	2.3E-05	-	-	-	-
1-Chlorohexane	6.8E-10	8.2E-11	7.8E-11	9.4E-12	2.0E-14	2.4E-15	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
2-Butanone	1.3E-08	1.6E-09	1.5E-09	1.8E-10	3.7E-13	4.5E-14	-	-	-	-	-	-	-	-	-	-	1.7E-03	2.0E-04	-	-	-	-
2-Hexanone	2.1E-09	2.5E-10	2.3E-10	2.8E-11	5.9E-14	7.1E-15	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Acetone	4.2E-07	5.1E-08	4.8E-08	5.8E-09	1.2E-11	1.5E-12	-	-	1.2E-09	1.4E-10	1.3E-09	1.6E-10	1.2E-09	1.4E-10	4.4E-04	5.3E-05	6.1E-02	7.3E-03	-	-	-	-
Benzene	-	-	-	-	-	-	-	-	1.6E-07	1.9E-08	1.8E-07	2.2E-08	1.6E-07	1.9E-08	1.6E-05	1.9E-06	-	-	-	-	-	-
Carbon disulfide	-	-	-	-	-	-	-	-	-	-	9.9E-07	1.2E-07	1.1E-06	1.3E-07	7.1E-05	8.5E-06	-	-	-	-	-	-
Chloromethane	-	-	-	-	-	-	-	-	-	-	2.8E-07	3.3E-08	4.1E-07	4.9E-08	8.8E-06	1.1E-06	-	-	-	-	-	-
cis-1,2-Dichloroethene	-	-	-	-	-	-	-	-	9.7E-08	1.2E-08	1.1E-07	1.3E-08	9.7E-08	1.2E-08	1.4E-03	1.7E-04	-	-	-	-	-	-
Ethylbenzene	-	-	-	-	-	-	2.9E-05	3.5E-06	-	-	-	-	-	-	-	-	-	-	-	-	-	-
m,p-Xylene	-	-	-	-	-	-	5.7E-05	6.8E-06	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Methylene chloride	6.8E-09	8.1E-10	7.7E-10	9.3E-11	1.9E-13	2.3E-14	8.6E-04	1.0E-04	7.3E-08	8.8E-09	5.7E-08	6.9E-09	7.3E-08	8.8E-09	1.8E-05	2.1E-06	2.6E-04	3.1E-05	-	-	-	-
Tetrachloroethene	-	-	-	-	-	-	2.9E-05	3.5E-06	-	-	-	-	-	-	-	-	1.5E-05	1.8E-06	-	-	-	-
Toluene	-	-	-	-	-	-	3.2E-05	3.8E-06	-	-	-	-	-	-	4.9E-05	5.9E-06	9.8E-05	1.2E-05	-	-	-	-
Trichloroethene	-	-	-	-	-	-	3.0E-05	3.6E-06	2.6E-07	3.1E-08	2.5E-07	3.0E-08	2.6E-07	3.1E-08	2.7E-04	3.3E-05	8.7E-05	1.0E-05	3.2E-08	3.9E-09	7.0E-08	8.4E-09
Xylenes (total)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	2.6E-05	3.2E-06	-	-	-	-
SVOCs																						
2-Methylnaphthalene	1.5E-08	1.8E-09	2.2E-09	2.6E-10	4.2E-13	5.1E-14	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Acenaphthene	4.7E-08	5.6E-09	6.9E-09	8.3E-10	1.3E-12	1.6E-13	-	-	-	-	-	-	-	-	-	-	1.3E-05	1.6E-06	-	-	-	-
Acenaphthylene	3.4E-09	4.0E-10	5.0E-10	6.0E-11	9.6E-14	1.2E-14	-	-	-	-	-	-	-	-	-	-	9.2E-06	1.1E-06	-	-	-	-
Anthracene	1.3E-07	1.6E-08	2.0E-08	2.4E-09	3.8E-12	4.6E-13	-	-	-	-	-	-	-	-	-	-	8.6E-06	1.0E-06	-	-	-	-
Benzo(a)anthracene	5.6E-07	6.7E-08	8.3E-08	9.9E-09	1.6E-11	1.9E-12	-	-	-	-	-	-	-	-	-	-	1.2E-06	1.4E-07	-	-	-	-
Benzo(a)pyrene	6.0E-07	7.2E-08	8.9E-08	1.1E-08	1.7E-11	2.1E-12	-	-	-	-	-	-	-	-	-	-	5.0E-07	6.0E-08	-	-	-	-
Benzo(e)pyrene	1.3E-08	1.6E-09	2.0E-09	2.4E-10	3.9E-13	4.6E-14	-	-	-	-	-	-	-	-	-	-	1.7E-08	2.1E-09	-	-	-	-
Benzo(b)fluoranthene	5.3E-07	6.4E-08	7.9E-08	9.5E-09	1.5E-11	1.8E-12	-	-	-	-	-	-	-	-	-	-	7.3E-07	8.7E-08	-	-	-	-
Benzo(g,h,i)perylene	1.8E-07	2.2E-08	2.7E-08	3.2E-09	5.2E-12	6.2E-13	-	-	-	-	-	-	-	-	-	-	4.9E-07	5.8E-08	-	-	-	-
Benzo(k)fluoranthene	5.9E-07	7.1E-08	8.8E-08	1.1E-08	1.7E-11	2.0E-12	-	-	-	-	-	-	-	-	-	-	1.2E-07	1.5E-08	-	-	-	-
Chrysene	4.1E-07	4.9E-08	6.0E-08	7.3E-09	1.2E-11	1.4E-12	-	-	-	-	-	-	-	-	-	-	1.3E-06	1.6E-07	-	-	-	-
Dibenz(a,h)anthracene	7.9E-08	9.5E-09	1.2E-08	1.4E-09	2.3E-12	2.7E-13	-	-	-	-	-	-	-	-	-	-	2.1E-07	2.5E-08	-	-	-	-
Dibenzofuran	1.9E-07	2.3E-08	2.8E-08	3.4E-09	5.5E-12	6.6E-13	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Fluoranthene	1.0E-06	1.2E-07	1.5E-07	1.8E-08	2.9E-11	3.4E-12	-	-	-	-	-	-	-	-	-	-	4.4E-06	5.2E-07	-	-	-	-
Fluorene	4.8E-08	5.7E-09	7.1E-09	8.5E-10	1.4E-12	1.6E-13	-	-	-	-	-	-	-	-	-	-	3.3E-06	4.0E-07	-	-	-	-
Indeno(1,2,3-cd)pyrene	2.5E-07	3.0E-08	3.8E-08	4.5E-09	7.3E-12	8.7E-13	-	-	-	-	-	-	-	-	-	-	1.4E-07	1.7E-08	-	-	-	-
Naphthalene	1.3E-08	1.6E-09	2.0E-09	2.4E-10	3.8E-13	4.6E-14	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Perylene	7.6E-09	9.1E-10	1.1E-09	1.3E-10	2.2E-13	2.6E-14	-	-	-	-	-	-	-	-	-	-	2.7E-08	3.3E-09	-	-	-	-
Phenanthrene	4.8E-07	5.7E-08	7.1E-08	8.5E-09	1.4E-11	1.6E-12	-	-	-	-	-	-	-	-	-	-	1.0E-05	1.3E-06	-	-	-	-
Pyrene	8.3E-07	1.0E-07	1.2E-07	1.5E-08	2.4E-11	2.9E-12	-	-	-	-	-	-	-	-	-	-	4.5E-06	5.4E-07	-	-	-	-

Spreadsheet C3-35b (2 of 4)
Estimated Human Intake for the Adult Resident - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Central Tendancy Exposure

Chemical	Soil Ingestion ADD (mg/kg-day)	Soil Ingestion LADD (mg/kg-day)	Soil Dermal Contact ADD (mg/kg-day)	Soil Dermal Contact LADD (mg/kg-day)	Soil Particulate Inhalation ADD (mg/kg-day)	Soil Particulate Inhalation LADD (mg/kg-day)					Inhalation of Indoor Air$_{s-gw}$ ADD (mg/kg-day)	Inhalation of Indoor Air$_{s-gw}$ LADD (mg/kg-day)	Inhalation Ambient Air$_{s-gw}$ ADD (mg/kg-day)	Inhalation Ambient Air$_{s-gw}$ LADD (mg/kg-day)	Domestic Groundwater Use ADD (mg/kg-day)	Domestic Groundwater Use LADD (mg/kg-day)	Plant Consumption ADD (mg/kg-day)	Plant Consumption LADD (mg/kg-day)	Surface Water Ingestion ADD (mg/kg-day)	Surface Water Ingestion LADD (mg/kg-day)	Surface Water Dermal Contact ADD (mg/kg-day)	Surface Water Dermal Contact LADD (mg/kg-day)
Total Petroleum Hydrocarbons																						
C11-C14(Kerosene Range)	5.3E-06	6.4E-07	7.9E-07	9.5E-08	1.5E-10	1.8E-11	-	-	-	-	-	-	-	-	-	-	1.6E-03	1.9E-04	-	-	-	-
C14-C20(Diesel Range)	5.0E-06	6.0E-07	7.4E-07	8.9E-08	1.4E-10	1.7E-11	-	-	-	-	-	-	-	-	6.8E-04	8.2E-05	6.3E-04	7.5E-05	-	-	-	-
C20-C30(Lubricant Oil Range)	5.4E-05	6.5E-06	8.0E-06	9.6E-07	1.5E-09	1.9E-10	-	-	-	-	-	-	-	-	-	-	1.6E-03	1.9E-04	-	-	-	-
PCDD/PCDFs																						
2,3,7,8-TCDD	1.0E-13	1.2E-14	3.5E-15	4.2E-16	2.9E-18	3.5E-19	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,7,8-PeCDD	3.9E-13	4.6E-14	1.3E-14	1.6E-15	1.1E-17	1.3E-18	-	-	-	-	-	-	-	-	-	-	-	-	8.2E-14	9.9E-15	1.2E-11	1.5E-12
1,2,3,4,7,8-HxCDD	1.1E-12	1.3E-13	3.8E-14	4.6E-15	3.2E-17	3.8E-18	-	-	-	-	-	-	-	-	-	-	-	-	1.2E-13	1.5E-14	1.8E-11	2.1E-12
1,2,3,6,7,8-HxCDD	5.7E-12	6.8E-13	2.0E-13	2.3E-14	1.6E-16	2.0E-17	-	-	-	-	-	-	-	-	-	-	-	-	1.3E-12	1.6E-13	1.9E-10	2.3E-11
1,2,3,7,8,9-HxCDD	2.4E-12	2.8E-13	8.0E-14	9.7E-15	6.7E-17	8.1E-18	-	-	-	-	-	-	-	-	-	-	-	-	6.8E-13	8.2E-14	1.0E-10	1.2E-11
1,2,3,4,6,7,8-HpCDD	1.6E-10	1.9E-11	5.5E-12	6.6E-13	4.6E-15	5.5E-16	-	-	-	-	-	-	-	-	-	-	-	-	1.1E-11	1.3E-12	1.6E-09	1.9E-10
OCDD	2.5E-09	3.1E-10	8.7E-11	1.0E-11	7.3E-14	8.8E-15	-	-	-	-	-	-	-	-	-	-	-	-	8.7E-11	1.0E-11	1.3E-08	1.5E-09
2,3,7,8-TCDF	2.5E-13	3.0E-14	8.5E-15	1.0E-15	7.2E-18	8.6E-19	-	-	-	-	-	-	-	-	-	-	-	-	1.9E-13	2.3E-14	2.9E-11	3.4E-12
1,2,3,7,8-PeCDF	1.0E-13	1.2E-14	3.4E-15	4.1E-16	2.9E-18	3.5E-19	-	-	-	-	-	-	-	-	-	-	-	-	3.5E-13	4.3E-14	5.2E-11	6.2E-12
2,3,4,7,8-PeCDF	2.9E-13	3.5E-14	9.8E-15	1.2E-15	8.3E-18	9.9E-19	-	-	-	-	-	-	-	-	-	-	-	-	8.8E-13	1.1E-13	1.3E-10	1.6E-11
1,2,3,4,7,8-HxCDF	6.0E-13	7.2E-14	2.1E-14	2.5E-15	1.7E-17	2.1E-18	-	-	-	-	-	-	-	-	-	-	-	-	9.1E-13	1.1E-13	1.3E-10	1.6E-11
1,2,3,6,7,8-HxCDF	4.9E-13	5.9E-14	1.7E-14	2.0E-15	1.4E-17	1.7E-18	-	-	-	-	-	-	-	-	-	-	-	-	5.4E-13	6.5E-14	7.9E-11	9.5E-12
2,3,4,6,7,8-HxCDF	9.3E-13	1.1E-13	3.2E-14	3.8E-15	2.7E-17	3.2E-18	-	-	-	-	-	-	-	-	-	-	-	-	9.3E-13	1.1E-13	1.4E-10	1.6E-11
1,2,3,7,8,9-HxCDF	9.5E-14	1.1E-14	3.3E-15	3.9E-16	2.7E-18	3.3E-19	-	-	-	-	-	-	-	-	-	-	-	-	8.9E-13	1.1E-13	1.3E-10	1.6E-11
1,2,3,4,6,7,8-HpCDF	1.9E-11	2.3E-12	6.4E-13	7.7E-14	5.4E-16	6.5E-17	-	-	-	-	-	-	-	-	-	-	-	-	1.3E-12	1.6E-13	2.0E-10	2.4E-11
1,2,3,4,7,8,9-HpCDF	1.6E-12	2.0E-13	5.6E-14	6.7E-15	4.7E-17	5.6E-18	-	-	-	-	-	-	-	-	-	-	-	-	6.8E-13	8.2E-14	1.0E-10	1.2E-11
OCDF	5.1E-11	6.2E-12	1.8E-12	2.1E-13	1.5E-15	1.8E-16	-	-	-	-	-	-	-	-	-	-	-	-	3.5E-12	4.2E-13	5.2E-10	6.2E-11
Aroclor-1254	1.1E-07	1.3E-08	1.8E-08	2.1E-09	3.2E-12	3.8E-13	-	-	-	-	-	-	-	-	-	-	2.4E-06	2.9E-07	-	-	-	-
Aroclor-1260	9.6E-07	1.1E-07	1.5E-07	1.8E-08	2.7E-11	3.3E-12	-	-	-	-	-	-	-	-	-	-	1.0E-05	1.2E-06	-	-	-	-
PCB-105	8.2E-11	9.8E-12	1.3E-11	1.6E-12	2.3E-15	2.8E-16	-	-	-	-	-	-	-	-	-	-	1.7E-09	2.0E-10	-	-	-	-
PCB-114	1.6E-12	1.9E-13	2.5E-13	3.0E-14	4.5E-17	5.3E-18	-	-	-	-	-	-	-	-	-	-	3.2E-11	3.9E-12	-	-	-	-
PCB-118	1.6E-10	2.0E-11	2.6E-11	3.2E-12	4.7E-15	5.7E-16	-	-	-	-	-	-	-	-	-	-	3.4E-09	4.1E-10	-	-	-	-
PCB-123	2.3E-12	2.8E-13	3.7E-13	4.4E-14	6.6E-17	7.9E-18	-	-	-	-	-	-	-	-	-	-	4.8E-11	5.7E-12	-	-	-	-
PCB-126	6.3E-12	7.5E-13	1.0E-12	1.2E-13	1.8E-16	2.2E-17	-	-	-	-	-	-	-	-	-	-	1.3E-10	1.6E-11	-	-	-	-
PCB-156	5.4E-11	6.5E-12	8.6E-12	1.0E-12	1.5E-15	1.9E-16	-	-	-	-	-	-	-	-	-	-	1.1E-09	1.3E-10	-	-	-	-
PCB-157	2.4E-11	2.8E-12	3.8E-12	4.5E-13	6.8E-16	8.2E-17	-	-	-	-	-	-	-	-	-	-	4.9E-10	5.9E-11	-	-	-	-
PCB-167	4.1E-11	5.0E-12	6.6E-12	7.9E-13	1.2E-15	1.4E-16	-	-	-	-	-	-	-	-	-	-	8.5E-10	1.0E-10	-	-	-	-
PCB-169	6.2E-13	7.4E-14	9.8E-14	1.2E-14	1.8E-17	2.1E-18	-	-	-	-	-	-	-	-	-	-	1.3E-11	1.5E-12	-	-	-	-
PCB-189	6.1E-12	7.4E-13	9.8E-13	1.2E-13	1.8E-16	2.1E-17	-	-	-	-	-	-	-	-	-	-	1.3E-10	1.5E-11	-	-	-	-
PCB-77	1.3E-11	1.5E-12	2.0E-12	2.4E-13	3.6E-16	4.3E-17	-	-	-	-	-	-	-	-	-	-	1.5E-10	1.8E-11	-	-	-	-
PCB-81	2.2E-12	2.7E-13	3.6E-13	4.3E-14	6.4E-17	7.7E-18	-	-	-	-	-	-	-	-	-	-	2.6E-11	3.2E-12	-	-	-	-

Spreadsheet C3-35b (3 of 4)
Estimated Human Intake for the Adult Resident - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Reasonable Maximum Exposure

Chemical	Soil Ingestion ADD (mg/kg-day)	Soil Ingestion LADD (mg/kg-day)	Soil Dermal Contact ADD (mg/kg-day)	Soil Dermal Contact LADD (mg/kg-day)	Soil Particulate Inhalation ADD (mg/kg-day)	Soil Particulate Inhalation LADD (mg/kg-day)					Inhalation of Indoor Air$_{s-gw}$ ADD (mg/kg-day)	Inhalation of Indoor Air$_{s-gw}$ LADD (mg/kg-day)	Inhalation Ambient Air$_{s-gw}$ ADD (mg/kg-day)	Inhalation Ambient Air$_{s-gw}$ LADD (mg/kg-day)	Domestic Grounder Use ADD (mg/kg-day)	Domestic Grounder Use LADD (mg/kg-day)	Plant Consumption ADD (mg/kg-day)	Plant Consumption LADD (mg/kg-day)	Surface Water Ingestion ADD (mg/kg-day)	Surface Water Ingestion LADD (mg/kg-day)	Surface Water Dermal Contact ADD (mg/kg-day)	Surface Water Dermal Contact LADD (mg/kg-day)
Inorganic Compounds																						
Aluminum	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	3.3E-04	1.1E-04	1.2E-04	1.9E-05
Antimony	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	3.0E-07	9.6E-08	1.1E-07	1.8E-08
Arsenic	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	2.2E-06	6.9E-07	7.8E-07	1.3E-07
Barium	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Boron	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Cadmium	4.2E-07	1.3E-07	1.7E-09	5.3E-10	1.7E-11	5.4E-12	-	-	-	-	-	-	-	-	-	-	2.8E-05	1.8E-04	5.5E-08	1.8E-08	2.0E-08	3.2E-09
Chromium	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	6.7E-07	2.1E-07	2.4E-07	3.9E-08
Copper	2.4E-05	7.7E-06	9.6E-07	3.1E-07	9.7E-10	3.1E-10	-	-	-	-	-	-	-	-	3.8E-04	1.2E-04	1.8E-02	1.1E-01	1.1E-06	3.6E-07	4.1E-07	6.5E-08
Fluoride	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1.2E-02	3.8E-03	-	-	-	-	-	-
Lead	2.0E-05	6.4E-06	8.0E-07	2.6E-07	8.2E-10	2.6E-10	-	-	-	-	-	-	-	-	-	-	6.3E-05	4.0E-04	2.0E-07	6.5E-08	7.4E-09	1.2E-09
Mercury	5.2E-06	1.7E-06	2.1E-07	6.6E-08	2.1E-10	6.7E-11	-	-	-	-	-	-	-	-	-	-	1.7E-04	1.1E-03	2.7E-08	8.5E-09	9.7E-09	1.5E-09
Methyl Mercury	5.0E-09	1.6E-09	2.0E-10	6.3E-11	2.0E-13	6.4E-14	-	-	-	-	-	-	-	-	-	-	2.4E-07	1.5E-06	-	-	-	-
Nickel	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	8.0E-07	2.6E-07	5.8E-08	9.3E-09
Nitrate	-	-	-	-	-	-	-	-	-	-	-	-	-	-	3.0E-01	9.6E-02	-	-	-	-	-	-
Silver	3.7E-06	1.2E-06	1.5E-07	4.7E-08	1.5E-10	4.8E-11	-	-	-	-	-	-	-	-	-	-	3.8E-07	2.4E-06	-	-	-	-
Thallium	4.9E-06	1.6E-06	2.0E-07	6.3E-08	2.0E-10	6.4E-11	-	-	-	-	-	-	-	-	1.1E-05	3.6E-06	3.1E-05	2.0E-04	4.1E-08	1.3E-08	1.5E-08	2.4E-09
Zinc	3.0E-04	9.6E-05	1.2E-05	3.8E-06	1.2E-08	3.9E-09	-	-	-	-	-	-	-	-	-	-	4.1E-02	2.6E-01	-	-	-	-
VOCs																						
1,1,1-Trichloroethane	-	-	-	-	-	-	8.5E-05	2.7E-05	-	-	-	-	-	-	-	-	-	-	1.5E-07	4.8E-08	0.0E+00	0.0E+00
1,1,2-Trichloro-1,2,2-trifluoroethane	1.6E-08	5.3E-09	6.6E-09	2.1E-09	6.7E-13	2.1E-13	4.9E-04	1.6E-04	-	-	-	-	-	-	-	-	1.2E-05	7.5E-05	-	-	-	-
1,1-Dichloroethane	-	-	-	-	-	-	8.3E-05	2.7E-05	3.9E-07	1.2E-07	5.7E-07	1.8E-07	3.9E-07	1.2E-07	1.1E-04	3.5E-05	-	-	-	-	-	-
1,2-Dichloroethane	-	-	-	-	-	-	-	-	8.9E-08	2.9E-08	9.3E-08	3.0E-08	8.9E-08	2.9E-08	3.8E-05	1.2E-05	-	-	-	-	-	-
1,2-Dichloroethene (total)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	4.7E-04	3.0E-03	-	-	-	-
1-Chlorohexane	1.4E-09	4.4E-10	5.5E-10	1.7E-10	5.5E-14	1.8E-14	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
2-Butanone	3.7E-08	1.2E-08	1.5E-08	4.7E-09	1.5E-12	4.8E-13	-	-	-	-	-	-	-	-	-	-	1.7E-03	1.1E-02	-	-	-	-
2-Hexanone	4.1E-09	1.3E-09	1.6E-09	5.2E-10	1.7E-13	5.3E-14	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Acetone	7.1E-06	2.3E-06	2.8E-06	9.1E-07	2.9E-10	9.2E-11	-	-	3.4E-09	1.1E-09	3.8E-09	1.2E-09	3.4E-09	1.1E-09	6.8E-04	2.2E-04	3.8E-01	2.4E+00	-	-	-	-
Benzene	-	-	-	-	-	-	-	-	4.4E-07	1.4E-07	5.2E-07	1.7E-07	4.4E-07	1.4E-07	2.4E-05	7.8E-06	-	-	-	-	-	-
Carbon disulfide	-	-	-	-	-	-	-	-	-	-	2.8E-06	9.0E-07	3.0E-06	9.6E-07	1.1E-04	3.5E-05	-	-	-	-	-	-
Chloromethane	-	-	-	-	-	-	-	-	-	-	7.8E-07	2.5E-07	1.2E-06	3.7E-07	1.4E-05	4.3E-06	-	-	-	-	-	-
cis-1,2-Dichloroethene	-	-	-	-	-	-	-	-	2.7E-07	8.8E-08	3.0E-07	9.6E-08	2.7E-07	8.8E-08	2.2E-03	6.9E-04	-	-	-	-	-	-
Ethylbenzene	-	-	-	-	-	-	8.3E-05	2.7E-05	-	-	-	-	-	-	-	-	-	-	-	-	-	-
m,p-Xylene	-	-	-	-	-	-	1.6E-04	5.1E-05	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Methylene chloride	1.6E-08	5.1E-09	6.4E-09	2.0E-09	6.5E-13	2.1E-13	2.4E-03	7.8E-04	2.1E-07	6.6E-08	1.6E-07	5.2E-08	2.1E-07	6.6E-08	2.7E-05	8.6E-06	2.6E-04	1.7E-03	-	-	-	-
Tetrachloroethene	-	-	-	-	-	-	8.2E-05	2.6E-05	-	-	-	-	-	-	-	-	6.3E-05	4.0E-04	-	-	-	-
Toluene	-	-	-	-	-	-	8.9E-05	2.9E-05	-	-	-	-	-	-	7.6E-05	2.4E-05	6.0E-04	3.8E-03	-	-	-	-
Trichloroethene	-	-	-	-	-	-	8.5E-05	2.7E-05	7.2E-07	2.3E-07	7.0E-07	2.2E-07	7.2E-07	2.3E-07	4.2E-04	1.4E-04	4.7E-04	3.0E-03	1.3E-07	4.1E-08	5.6E-07	9.0E-08
Xylenes (total)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	5.3E-05	3.4E-04	-	-	-	-
SVOCs																						
2-Methylnaphthalene	3.4E-08	1.1E-08	1.8E-08	5.7E-09	1.4E-12	4.4E-13	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Acenaphthene	3.5E-07	1.1E-07	1.8E-07	5.8E-08	1.4E-11	4.5E-12	-	-	-	-	-	-	-	-	-	-	4.9E-05	3.1E-04	-	-	-	-
Acenaphthylene	1.9E-08	6.0E-09	9.7E-09	3.1E-09	7.6E-13	2.4E-13	-	-	-	-	-	-	-	-	-	-	1.4E-05	8.9E-05	-	-	-	-
Anthracene	1.3E-06	4.3E-07	7.0E-07	2.2E-07	5.5E-11	1.7E-11	-	-	-	-	-	-	-	-	-	-	2.2E-05	1.4E-04	-	-	-	-
Benzo(a)anthracene	1.9E-05	6.1E-06	9.9E-06	3.2E-06	7.8E-10	2.5E-10	-	-	-	-	-	-	-	-	-	-	2.3E-06	1.4E-05	-	-	-	-
Benzo(a)pyrene	2.1E-05	6.6E-06	1.1E-05	3.4E-06	8.3E-10	2.7E-10	-	-	-	-	-	-	-	-	-	-	2.1E-06	1.3E-05	-	-	-	-
Benzo(e)pyrene	7.6E-08	2.4E-08	3.9E-08	1.3E-08	3.1E-12	9.8E-13	-	-	-	-	-	-	-	-	-	-	9.8E-08	6.3E-07	-	-	-	-
Benzo(b)fluoranthene	9.4E-06	3.0E-06	4.9E-06	1.6E-06	3.8E-10	1.2E-10	-	-	-	-	-	-	-	-	-	-	3.2E-06	2.1E-05	-	-	-	-
Benzo(g,h,i)perylene	3.3E-06	1.1E-06	1.7E-06	5.5E-07	1.3E-10	4.3E-11	-	-	-	-	-	-	-	-	-	-	1.8E-06	1.1E-05	-	-	-	-
Benzo(k)fluoranthene	2.1E-05	6.6E-06	1.1E-05	3.4E-06	8.3E-10	2.7E-10	-	-	-	-	-	-	-	-	-	-	1.2E-07	7.8E-07	-	-	-	-
Chrysene	8.9E-06	2.8E-06	4.6E-06	1.5E-06	3.6E-10	1.1E-10	-	-	-	-	-	-	-	-	-	-	6.7E-06	4.3E-05	-	-	-	-
Dibenz(a,h)anthracene	1.5E-06	4.9E-07	7.9E-07	2.5E-07	6.2E-11	2.0E-11	-	-	-	-	-	-	-	-	-	-	5.2E-08	3.3E-07	-	-	-	-
Dibenzofuran	3.8E-07	1.2E-07	2.0E-07	6.4E-08	1.6E-11	5.0E-12	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Fluoranthene	1.8E-05	5.7E-06	9.3E-06	3.0E-06	7.2E-10	2.3E-10	-	-	-	-	-	-	-	-	-	-	2.8E-05	1.8E-04	-	-	-	-
Fluorene	3.5E-07	1.1E-07	1.8E-07	5.9E-08	1.4E-11	4.6E-12	-	-	-	-	-	-	-	-	-	-	1.3E-05	8.3E-05	-	-	-	-
Indeno(1,2,3-cd)pyrene	4.6E-06	1.5E-06	2.4E-06	7.6E-07	1.8E-10	5.9E-11	-	-	-	-	-	-	-	-	-	-	5.7E-07	3.6E-06	-	-	-	-
Naphthalene	7.9E-08	2.5E-08	4.1E-08	1.3E-08	3.2E-12	1.0E-12	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Perylene	4.3E-08	1.4E-08	2.2E-08	7.1E-09	1.7E-12	5.6E-13	-	-	-	-	-	-	-	-	-	-	1.6E-07	1.0E-06	-	-	-	-
Phenanthrene	8.0E-06	2.5E-06	4.1E-06	1.3E-06	3.2E-10	1.0E-10	-	-	-	-	-	-	-	-	-	-	2.8E-05	1.8E-04	-	-	-	-
Pyrene	1.5E-05	4.8E-06	7.8E-06	2.5E-06	6.1E-10	1.9E-10	-	-	-	-	-	-	-	-	-	-	2.4E-05	1.5E-04	-	-	-	-
Total Petroleum Hydrocarbons																						
C11-C14(Kerosene Range)	5.2E-05	1.7E-05	2.7E-05	8.7E-06	2.1E-09	6.8E-10	-	-	-	-	-	-	-	-	-	-	6.5E-03	4.2E-02	-	-	-	-
C14-C20(Diesel Range)	2.5E-05	7.9E-06	1.3E-05	4.1E-06	1.0E-09	3.2E-10	-	-	-	-	-	-	-	-	1.1E-03	3.4E-04	6.3E-04	4.0E-03	-	-	-	-
C20-C30(Lubricant Oil Range)	5.8E-04	1.9E-04	3.0E-04	9.7E-05	2.4E-08	7.6E-09	-	-	-	-	-	-	-	-	-	-	1.0E-02	6.6E-02	-	-	-	-

Spreadsheet C3-35b (4 of 4)
Estimated Human Intake for the Adult Resident - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Reasonable Maximum Exposure

Chemical	Soil Ingestion ADD (mg/kg-day)	Soil Ingestion LADD (mg/kg-day)	Soil Dermal Contact ADD (mg/kg-day)	Soil Dermal Contact LADD (mg/kg-day)	Soil Particulate Inhalation ADD (mg/kg-day)	Soil Particulate Inhalation LADD (mg/kg-day)					Inhalation of Indoor Air$_{s-gw}$ ADD (mg/kg-day)	Inhalation of Indoor Air$_{s-gw}$ LADD (mg/kg-day)	Inhalation Ambient Air$_{s-gw}$ ADD (mg/kg-day)	Inhalation Ambient Air$_{s-gw}$ LADD (mg/kg-day)	Domestic Grounder Use ADD (mg/kg-day)	Domestic Grounder Use LADD (mg/kg-day)	Plant Consumption ADD (mg/kg-day)	Plant Consumption LADD (mg/kg-day)	Surface Water Ingestion ADD (mg/kg-day)	Surface Water Ingestion LADD (mg/kg-day)	Surface Water Dermal Contact ADD (mg/kg-day)	Surface Water Dermal Contact LADD (mg/kg-day)
PCDD/PCDFs																						
2,3,7,8-TCDD	4.8E-13	1.5E-13	5.7E-14	1.8E-14	1.9E-17	6.2E-18	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,7,8-PeCDD	1.8E-12	5.8E-13	2.2E-13	6.9E-14	7.3E-17	2.3E-17	-	-	-	-	-	-	-	-	-	-	-	-	3.3E-13	1.1E-13	9.7E-11	1.5E-11
1,2,3,4,7,8-HxCDD	5.1E-12	1.6E-12	6.1E-13	2.0E-13	2.1E-16	6.6E-17	-	-	-	-	-	-	-	-	-	-	-	-	4.9E-13	1.6E-13	1.4E-10	2.3E-11
1,2,3,6,7,8-HxCDD	2.6E-11	8.2E-12	3.1E-12	9.8E-13	1.0E-15	3.3E-16	-	-	-	-	-	-	-	-	-	-	-	-	1.3E-11	4.1E-12	3.8E-09	6.1E-10
1,2,3,7,8,9-HxCDD	1.2E-11	3.8E-12	1.4E-12	4.6E-13	4.8E-16	1.5E-16	-	-	-	-	-	-	-	-	-	-	-	-	2.7E-12	8.8E-13	8.1E-10	1.3E-10
1,2,3,4,6,7,8-HpCDD	6.8E-10	2.2E-10	8.1E-11	2.6E-11	2.7E-14	8.8E-15	-	-	-	-	-	-	-	-	-	-	-	-	3.7E-10	1.2E-10	1.1E-07	1.8E-08
OCDD	1.0E-08	3.2E-09	1.2E-09	3.8E-10	4.1E-13	1.3E-13	-	-	-	-	-	-	-	-	-	-	-	-	5.2E-10	1.7E-10	1.5E-07	2.4E-08
2,3,7,8-TCDF	1.1E-12	3.4E-13	1.3E-13	4.1E-14	4.3E-17	1.4E-17	-	-	-	-	-	-	-	-	-	-	-	-	8.8E-13	2.8E-13	2.6E-10	4.1E-11
1,2,3,7,8-PeCDF	5.3E-13	1.7E-13	6.4E-14	2.0E-14	2.2E-17	6.9E-18	-	-	-	-	-	-	-	-	-	-	-	-	1.4E-12	4.5E-13	4.2E-10	6.7E-11
2,3,4,7,8-PeCDF	1.2E-12	3.9E-13	1.5E-13	4.7E-14	5.0E-17	1.6E-17	-	-	-	-	-	-	-	-	-	-	-	-	3.9E-12	1.3E-12	1.2E-09	1.8E-10
1,2,3,4,7,8-HxCDF	2.4E-12	7.6E-13	2.8E-13	9.1E-14	9.6E-17	3.1E-17	-	-	-	-	-	-	-	-	-	-	-	-	4.2E-12	1.3E-12	1.2E-09	2.0E-10
1,2,3,6,7,8-HxCDF	2.2E-12	7.1E-13	2.7E-13	8.5E-14	9.0E-17	2.9E-17	-	-	-	-	-	-	-	-	-	-	-	-	2.2E-12	6.9E-13	6.3E-10	1.0E-10
2,3,4,6,7,8-HxCDF	3.9E-12	1.2E-12	4.7E-13	1.5E-13	1.6E-16	5.1E-17	-	-	-	-	-	-	-	-	-	-	-	-	4.2E-12	1.3E-12	1.2E-09	2.0E-10
1,2,3,7,8,9-HxCDF	2.4E-13	7.7E-14	2.9E-14	9.2E-15	9.7E-18	3.1E-18	-	-	-	-	-	-	-	-	-	-	-	-	4.5E-12	1.4E-12	1.3E-09	2.1E-10
1,2,3,4,6,7,8-HpCDF	6.8E-11	2.2E-11	8.2E-12	2.6E-12	2.8E-15	8.9E-16	-	-	-	-	-	-	-	-	-	-	-	-	1.0E-11	3.2E-12	2.9E-09	4.7E-10
1,2,3,4,7,8,9-HpCDF	5.8E-12	1.9E-12	7.0E-13	2.2E-13	2.4E-16	7.5E-17	-	-	-	-	-	-	-	-	-	-	-	-	2.7E-12	8.8E-13	8.1E-10	1.3E-10
OCDF	2.1E-10	6.6E-11	2.5E-11	7.9E-12	8.3E-15	2.7E-15	-	-	-	-	-	-	-	-	-	-	-	-	2.6E-11	8.4E-12	7.7E-09	1.2E-09
PCBs																						
PCB-156	5.7E-10	1.8E-10	3.2E-10	1.0E-10	2.3E-14	7.4E-15	-	-	-	-	-	-	-	-	-	-	5.6E-09	3.6E-08	-	-	-	-
PCB-157	2.6E-10	8.2E-11	1.4E-10	4.6E-11	1.0E-14	3.3E-15	-	-	-	-	-	-	-	-	-	-	2.5E-09	1.6E-08	-	-	-	-
PCB-167	4.5E-10	1.4E-10	2.5E-10	8.0E-11	1.8E-14	5.8E-15	-	-	-	-	-	-	-	-	-	-	4.4E-09	2.8E-08	-	-	-	-
PCB-169	6.7E-12	2.1E-12	3.7E-12	1.2E-12	2.7E-16	8.6E-17	-	-	-	-	-	-	-	-	-	-	6.5E-11	4.2E-10	-	-	-	-
PCB-189	6.7E-11	2.1E-11	3.7E-11	1.2E-11	2.7E-15	8.6E-16	-	-	-	-	-	-	-	-	-	-	6.5E-10	4.2E-09	-	-	-	-
PCB-77	1.3E-10	4.3E-11	7.5E-11	2.4E-11	5.4E-15	1.7E-15	-	-	-	-	-	-	-	-	-	-	7.4E-10	4.7E-09	-	-	-	-
PCB-81	2.4E-11	7.5E-12	1.3E-11	4.2E-12	9.5E-16	3.1E-16	-	-	-	-	-	-	-	-	-	-	1.3E-10	8.4E-10	-	-	-	-

Notes:
Inhalation Indoor Air $_{s-gw}$ - Exposure associated with indoor air concentrations of COPCs modeled from soil vapor, soil, or groundwater.
Inhalation Ambient Air $_{s-gw}$ - Exposure associated with ambient air concentrations of COPCs modeled from soil or groundwater.
ADD - Average daily dose, as defined in the SRAM (MWH 2005).
LADD - Lifetime average daily dose, as defined in the SRAM (MWH 2005).
The chemicals presented in this table are comprehensive for all media sampled. Not all chemicals were analyzed for or detected in all media.
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCDD/PCDF - Polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.
PCB - polychlorinated biphenyls
COPC - chemical of potential concern
"-" indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
mg/kg-day - milligrams per kilogram day

Spreadsheet C3-35a (1 of 4)

Estimated Human Intake for the Adult Resident - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Central Tendancy Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation of Indoor Air_s		Inhalation Ambient Air_s		Inhalation of Indoor Air_{gw}		Inhalation Ambient Air_{gw}		Domestic Groundwater Use		Plant Consumption	
	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)
Inorganic Compounds																		
Cadmium	3.5E-07	4.2E-08	4.0E-10	4.8E-11	1.0E-11	1.2E-12	-	-	-	-	-	-	-	-	-	-	1.3E-05	1.5E-06
Copper	1.4E-05	1.7E-06	1.6E-07	2.0E-08	4.1E-10	5.0E-11	-	-	-	-	-	-	-	-	2.5E-04	3.0E-05	8.1E-03	9.8E-04
Fluoride	-	-	-	-	-	-	-	-	-	-	-	-	-	-	7.7E-03	9.2E-04	-	-
Lead	1.1E-05	1.3E-06	1.3E-07	1.5E-08	3.1E-10	3.8E-11	-	-	-	-	-	-	-	-	-	-	3.0E-05	3.6E-06
Mercury	1.3E-06	1.6E-07	1.5E-08	1.8E-09	3.7E-11	4.5E-12	-	-	-	-	-	-	-	-	-	-	7.3E-05	8.7E-06
Methyl Mercury	1.2E-09	1.4E-10	1.4E-11	1.6E-12	3.4E-14	4.1E-15	-	-	-	-	-	-	-	-	-	-	1.2E-07	1.4E-08
Nitrate	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1.9E-01	2.3E-02	-	-
Silver	5.3E-07	6.4E-08	6.0E-09	7.3E-10	1.5E-11	1.8E-12	-	-	-	-	-	-	-	-	-	-	1.0E-07	1.2E-08
Thallium	2.3E-07	2.7E-08	2.6E-09	3.1E-10	6.5E-12	7.8E-13	-	-	-	-	-	-	-	-	7.4E-06	8.9E-07	3.1E-05	3.7E-06
Zinc	1.2E-04	1.4E-05	1.3E-06	1.6E-07	3.3E-09	4.0E-10	-	-	-	-	-	-	-	-	-	-	1.6E-02	1.9E-03
VOCs																		
1,1,1-Trichloroethane	-	-	-	-	-	-	3.0E-05	3.6E-06	-	-	-	-	-	-	-	-	-	-
1,1,2-Trichloro-1,2,2-trifluoroethane	8.2E-09	9.9E-10	9.4E-10	1.1E-10	-	-	1.5E-04	1.8E-05	-	-	-	-	-	-	-	-	1.2E-05	1.4E-06
1,1-Dichloroethane	-	-	-	-	-	-	2.9E-05	3.5E-06	1.4E-07	1.6E-08	2.0E-07	2.4E-08	1.4E-07	1.6E-08	7.1E-05	8.5E-06	-	-
1,2-Dichloroethane	-	-	-	-	-	-	-	-	3.2E-08	3.8E-09	3.3E-08	4.0E-09	3.2E-08	3.8E-09	2.5E-05	3.0E-06	-	-
1,2-Dichloroethene (total)	1.9E-08	2.3E-09	2.2E-09	2.6E-10	-	-	-	-	-	-	-	-	-	-	-	-	1.9E-04	2.3E-05
1-Chlorohexane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
2-Butanone	2.5E-08	3.0E-09	2.9E-09	3.5E-10	-	-	-	-	-	-	-	-	-	-	-	-	1.7E-03	2.0E-04
2-Hexanone	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Acetone	4.6E-07	5.6E-08	5.3E-08	6.4E-09	-	-	-	-	1.2E-09	1.4E-10	1.3E-09	1.6E-10	1.2E-09	1.4E-10	4.4E-04	5.3E-05	6.1E-02	7.3E-03
Benzene	-	-	-	-	-	-	-	-	1.6E-07	1.9E-08	1.8E-07	2.2E-08	1.6E-07	1.9E-08	1.6E-05	1.9E-06	-	-
Carbon disulfide	-	-	-	-	-	-	-	-	-	-	9.9E-07	1.2E-07	1.1E-06	1.3E-07	7.1E-05	8.5E-06	-	-
Chloromethane	-	-	-	-	-	-	-	-	-	-	2.8E-07	3.3E-08	4.1E-07	4.9E-08	8.8E-06	1.1E-06	-	-
cis-1,2-Dichloroethene	-	-	-	-	-	-	-	-	9.7E-08	1.2E-08	1.1E-07	1.3E-08	9.7E-08	1.2E-08	1.4E-03	1.7E-04	-	-
Ethylbenzene	-	-	-	-	-	-	2.9E-05	3.5E-06	-	-	-	-	-	-	-	-	-	-
m,p-Xylene	-	-	-	-	-	-	5.7E-05	6.8E-06	-	-	-	-	-	-	-	-	-	-
Methylene chloride	8.9E-09	1.1E-09	1.0E-09	1.2E-10	-	-	8.6E-04	1.0E-04	7.3E-08	8.8E-09	5.7E-08	6.9E-09	7.3E-08	8.8E-09	1.8E-05	2.1E-06	2.6E-04	3.1E-05
Tetrachloroethene	1.4E-08	1.7E-09	1.6E-09	1.9E-10	-	-	2.9E-05	3.5E-06	-	-	-	-	-	-	-	-	1.5E-05	1.8E-06
Toluene	3.8E-08	4.6E-09	4.4E-09	5.3E-10	-	-	3.2E-05	3.8E-06	-	-	-	-	-	-	4.9E-05	5.9E-06	9.8E-05	1.2E-05
Trichloroethene	2.5E-08	3.0E-09	2.9E-09	3.5E-10	-	-	3.0E-05	3.6E-06	2.6E-07	3.1E-08	2.5E-07	3.0E-08	2.6E-07	3.1E-08	2.7E-04	3.3E-05	8.7E-05	1.0E-05
Xylenes (total)	1.7E-08	2.1E-09	2.0E-09	2.4E-10	-	-	-	-	-	-	-	-	-	-	-	-	2.6E-05	3.2E-06
SVOCs																		
2-Methylnaphthalene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Acenaphthene	3.0E-08	3.6E-09	4.5E-09	5.4E-10	8.7E-13	1.0E-13	-	-	-	-	-	-	-	-	-	-	1.5E-05	1.7E-06
Acenaphthylene	2.1E-08	2.5E-09	3.1E-09	3.8E-10	6.0E-13	7.3E-14	-	-	-	-	-	-	-	-	-	-	9.0E-06	1.1E-06
Anthracene	2.7E-08	3.2E-09	3.9E-09	4.7E-10	7.6E-13	9.1E-14	-	-	-	-	-	-	-	-	-	-	6.8E-06	8.2E-07
Benzo(a)anthracene	2.5E-08	3.0E-09	3.6E-09	4.4E-10	7.0E-13	8.5E-14	-	-	-	-	-	-	-	-	-	-	1.2E-06	1.4E-07
Benzo(a)pyrene	2.5E-08	3.0E-09	3.7E-09	4.4E-10	7.1E-13	8.5E-14	-	-	-	-	-	-	-	-	-	-	5.1E-07	6.1E-08
Benzo(e)pyrene	1.3E-08	1.5E-09	1.9E-09	2.3E-10	3.7E-13	4.4E-14	-	-	-	-	-	-	-	-	-	-	2.3E-07	2.8E-08
Benzo(b)fluoranthene	3.3E-08	4.0E-09	5.0E-09	5.9E-10	9.6E-13	1.1E-13	-	-	-	-	-	-	-	-	-	-	7.4E-07	8.9E-08
Benzo(g,h,i)perylene	2.8E-08	3.4E-09	4.2E-09	5.0E-10	8.1E-13	9.7E-14	-	-	-	-	-	-	-	-	-	-	4.7E-07	5.6E-08
Benzo(k)fluoranthene	2.0E-08	2.4E-09	3.0E-09	3.6E-10	5.8E-13	7.0E-14	-	-	-	-	-	-	-	-	-	-	6.1E-07	7.3E-08
Chrysene	3.0E-08	3.7E-09	4.5E-09	5.4E-10	8.7E-13	1.0E-13	-	-	-	-	-	-	-	-	-	-	1.4E-06	1.6E-07
Dibenz(a,h)anthracene	2.0E-08	2.4E-09	3.0E-09	3.5E-10	5.7E-13	6.9E-14	-	-	-	-	-	-	-	-	-	-	2.1E-07	2.5E-08
Dibenzofuran	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Fluoranthene	4.1E-08	4.9E-09	6.1E-09	7.3E-10	1.2E-12	1.4E-13	-	-	-	-	-	-	-	-	-	-	4.4E-06	5.3E-07
Fluorene	3.0E-08	3.6E-09	4.5E-09	5.4E-10	8.6E-13	1.0E-13	-	-	-	-	-	-	-	-	-	-	3.2E-06	3.9E-07
Indeno(1,2,3-cd)pyrene	2.3E-08	2.8E-09	3.5E-09	4.2E-10	6.7E-13	8.1E-14	-	-	-	-	-	-	-	-	-	-	1.4E-07	1.7E-08
Naphthalene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Perylene	7.3E-09	8.7E-10	1.1E-09	1.3E-10	2.1E-13	2.5E-14	-	-	-	-	-	-	-	-	-	-	3.0E-07	3.6E-08
Phenanthrene	5.4E-08	6.5E-09	8.1E-09	9.7E-10	1.6E-12	1.9E-13	-	-	-	-	-	-	-	-	-	-	1.2E-05	1.4E-06
Pyrene	3.6E-08	4.4E-09	5.4E-09	6.5E-10	1.0E-12	1.3E-13	-	-	-	-	-	-	-	-	-	-	4.4E-06	5.3E-07

Spreadsheet C3-35a (2 of 4)

Estimated Human Intake for the Adult Resident - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Central Tendancy Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation of Indoor Air_s		Inhalation Ambient Air_s		Inhalation of Indoor Air_{gw}		Inhalation Ambient Air_{gw}		Domestic Groundwater Use		Plant Consumption	
	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)
Total Petroleum Hydrocarbons																		
C11-C14(Kerosene Range)	6.6E-06	7.9E-07	9.8E-07	1.2E-07	1.9E-10	2.3E-11	-	-	-	-	-	-	-	-	-	-	1.6E-03	1.9E-04
C14-C20(Diesel Range)	5.1E-06	6.1E-07	7.6E-07	9.1E-08	1.5E-10	1.8E-11	-	-	-	-	-	-	-	-	6.8E-04	8.2E-05	6.3E-04	7.5E-05
C20-C30(Lubricant Oil Range)	5.0E-05	6.0E-06	7.4E-06	8.9E-07	1.4E-09	1.7E-10	-	-	-	-	-	-	-	-	-	-	1.6E-03	1.9E-04
							-	-	-	-	-	-	-	-				
PCDD/PCDFs							-	-	-	-	-	-	-	-				
2,3,7,8-TCDD	1.9E-13	2.2E-14	6.4E-15	7.7E-16	5.4E-18	6.4E-19	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,7,8-PeCDD	7.5E-13	9.0E-14	2.6E-14	3.1E-15	2.2E-17	2.6E-18	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,4,7,8-HxCDD	2.8E-12	3.4E-13	9.6E-14	1.2E-14	8.1E-17	9.7E-18	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,6,7,8-HxCDD	1.1E-11	1.3E-12	3.7E-13	4.4E-14	3.1E-16	3.7E-17	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,7,8,9-HxCDD	4.0E-12	4.9E-13	1.4E-13	1.7E-14	1.2E-16	1.4E-17	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,4,6,7,8-HpCDD	3.9E-10	4.6E-11	1.3E-11	1.6E-12	1.1E-14	1.3E-15	-	-	-	-	-	-	-	-	-	-	-	-
OCDD	5.7E-09	6.9E-10	2.0E-10	2.4E-11	1.6E-13	2.0E-14	-	-	-	-	-	-	-	-	-	-	-	-
2,3,7,8-TCDF	3.8E-13	4.5E-14	1.3E-14	1.5E-15	1.1E-17	1.3E-18	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,7,8-PeCDF	1.9E-13	2.3E-14	6.5E-15	7.8E-16	5.4E-18	6.5E-19	-	-	-	-	-	-	-	-	-	-	-	-
2,3,4,7,8-PeCDF	5.6E-13	6.7E-14	1.9E-14	2.3E-15	1.6E-17	1.9E-18	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,4,7,8-HxCDF	1.2E-12	1.5E-13	4.2E-14	5.0E-15	3.5E-17	4.2E-18	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,6,7,8-HxCDF	1.1E-12	1.3E-13	3.6E-14	4.4E-15	3.0E-17	3.7E-18	-	-	-	-	-	-	-	-	-	-	-	-
2,3,4,6,7,8-HxCDF	2.6E-12	3.2E-13	9.0E-14	1.1E-14	7.5E-17	9.0E-18	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,7,8,9-HxCDF	2.5E-13	3.0E-14	8.5E-15	1.0E-15	7.1E-18	8.5E-19	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,4,6,7,8-HpCDF	3.6E-11	4.3E-12	1.2E-12	1.5E-13	1.0E-15	1.2E-16	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,4,7,8,9-HpCDF	3.3E-12	4.0E-13	1.1E-13	1.4E-14	9.5E-17	1.1E-17	-	-	-	-	-	-	-	-	-	-	-	-
OCDF	9.2E-11	1.1E-11	3.2E-12	3.8E-13	2.6E-15	3.2E-16	-	-	-	-	-	-	-	-	-	-	-	-
PCBs																		
Aroclor-1254	1.1E-07	1.3E-08	1.8E-08	2.1E-09	3.2E-12	3.8E-13	-	-	-	-	-	-	-	-	-	-	2.4E-06	2.9E-07
Aroclor-1260	9.1E-07	1.1E-07	1.5E-07	1.7E-08	2.6E-11	3.1E-12	-	-	-	-	-	-	-	-	-	-	1.0E-05	1.2E-06
PCB-105	7.8E-11	9.4E-12	1.2E-11	1.5E-12	2.2E-15	2.7E-16	-	-	-	-	-	-	-	-	-	-	1.7E-09	2.0E-10
PCB-114	1.5E-12	1.8E-13	2.4E-13	2.9E-14	4.3E-17	5.1E-18	-	-	-	-	-	-	-	-	-	-	3.2E-11	3.9E-12
PCB-118	1.6E-10	1.9E-11	2.5E-11	3.0E-12	4.5E-15	5.4E-16	-	-	-	-	-	-	-	-	-	-	3.4E-09	4.1E-10
PCB-123	2.2E-12	2.6E-13	3.5E-13	4.2E-14	6.3E-17	7.5E-18	-	-	-	-	-	-	-	-	-	-	4.8E-11	5.7E-12
PCB-126	6.0E-12	7.2E-13	9.6E-13	1.1E-13	1.7E-16	2.1E-17	-	-	-	-	-	-	-	-	-	-	1.3E-10	1.6E-11
PCB-156	5.1E-11	6.2E-12	8.2E-12	9.8E-13	1.5E-15	1.8E-16	-	-	-	-	-	-	-	-	-	-	1.1E-09	1.3E-10
PCB-157	2.3E-11	2.7E-12	3.6E-12	4.3E-13	6.5E-16	7.8E-17	-	-	-	-	-	-	-	-	-	-	4.9E-10	5.9E-11
PCB-167	3.9E-11	4.7E-12	6.3E-12	7.5E-13	1.1E-15	1.4E-16	-	-	-	-	-	-	-	-	-	-	8.5E-10	1.0E-10
PCB-169	5.9E-13	7.0E-14	9.4E-14	1.1E-14	1.7E-17	2.0E-18	-	-	-	-	-	-	-	-	-	-	1.3E-11	1.5E-12
PCB-189	5.9E-12	7.0E-13	9.3E-13	1.1E-13	1.7E-16	2.0E-17	-	-	-	-	-	-	-	-	-	-	1.3E-10	1.5E-11
PCB-77	1.2E-11	1.4E-12	1.9E-12	2.3E-13	3.4E-16	4.1E-17	-	-	-	-	-	-	-	-	-	-	1.5E-10	1.8E-11
PCB-81	2.1E-12	2.6E-13	3.4E-13	4.1E-14	6.1E-17	7.3E-18	-	-	-	-	-	-	-	-	-	-	2.6E-11	3.2E-12

Spreadsheet C3-35a (3 of 4)

Estimated Human Intake for the Adult Resident - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Reasonable Maximum Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation of Indoor Air_s		Inhalation Ambient Air_s		Inhalation of Indoor Air_{gw}		Inhalation Ambient Air_{gw}		Domestic Grounder Use		Plant Consumption	
	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)
Inorganic Compounds																		
Cadmium	1.6E-06	5.0E-07	6.2E-09	2.0E-09	6.3E-11	2.0E-11	-	-	-	-	-	-	-	-	-	-	2.8E-05	1.8E-04
Copper	6.3E-05	2.0E-05	2.5E-06	8.0E-07	2.5E-09	8.1E-10	-	-	-	-	-	-	-	-	3.8E-04	1.2E-04	1.8E-02	1.1E-01
Fluoride	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1.2E-02	3.8E-03	-	-
Lead	4.6E-05	1.5E-05	1.9E-06	5.9E-07	1.9E-09	6.0E-10	-	-	-	-	-	-	-	-	-	-	6.3E-05	4.0E-04
Mercury	6.1E-06	1.9E-06	2.4E-07	7.7E-08	2.4E-10	7.8E-11	-	-	-	-	-	-	-	-	-	-	1.7E-04	1.1E-03
Methyl Mercury	5.0E-09	1.6E-09	2.0E-10	6.3E-11	2.0E-13	6.4E-14	-	-	-	-	-	-	-	-	-	-	2.4E-07	1.5E-06
Nitrate	-	-	-	-	-	-	-	-	-	-	-	-	-	-	3.0E-01	9.6E-02	-	-
Silver	3.9E-06	1.3E-06	1.6E-07	5.0E-08	1.6E-10	5.1E-11	-	-	-	-	-	-	-	-	-	-	3.8E-07	2.4E-06
Thallium	4.5E-07	1.4E-07	1.8E-08	5.8E-09	1.8E-11	5.9E-12	-	-	-	-	-	-	-	-	1.1E-05	3.6E-06	3.1E-05	2.0E-04
Zinc	6.0E-04	1.9E-04	2.4E-05	7.6E-06	2.4E-08	7.8E-09	-	-	-	-	-	-	-	-	-	-	4.1E-02	2.6E-01
VOCs																		
1,1,1-Trichloroethane	-	-	-	-	-	-	8.5E-05	2.7E-05	-	-	-	-	-	-	-	-	-	-
1,1,2-Trichloro-1,2,2-trifluoroethane	1.6E-08	5.3E-09	6.6E-09	2.1E-09	-	-	4.9E-04	1.6E-04	-	-	-	-	-	-	-	-	1.2E-05	7.5E-05
1,1-Dichloroethane	-	-	-	-	-	-	8.3E-05	2.7E-05	3.9E-07	1.2E-07	5.7E-07	1.8E-07	3.9E-07	1.2E-07	1.1E-04	3.5E-05	-	-
1,2-Dichloroethane	-	-	-	-	-	-	-	-	8.9E-08	2.9E-08	9.3E-08	3.0E-08	8.9E-08	2.9E-08	3.8E-05	1.2E-05	-	-
1,2-Dichloroethene (total)	9.6E-08	3.1E-08	3.8E-08	1.2E-08	-	-	-	-	-	-	-	-	-	-	-	-	4.7E-04	3.0E-03
1-Chlorohexane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
2-Butanone	5.1E-08	1.6E-08	2.0E-08	6.5E-09	-	-	-	-	-	-	-	-	-	-	-	-	1.7E-03	1.1E-02
2-Hexanone	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Acetone	5.7E-06	1.8E-06	2.3E-06	7.3E-07	-	-	-	-	3.4E-09	1.1E-09	3.8E-09	1.2E-09	3.4E-09	1.1E-09	6.8E-04	2.2E-04	3.8E-01	2.4E+00
Benzene	-	-	-	-	-	-	-	-	4.4E-07	1.4E-07	5.2E-07	1.7E-07	4.4E-07	1.4E-07	2.4E-05	7.8E-06	-	-
Carbon disulfide	-	-	-	-	-	-	-	-	-	-	2.8E-06	9.0E-07	3.0E-06	9.6E-07	1.1E-04	3.5E-05	-	-
Chloromethane	-	-	-	-	-	-	-	-	-	-	7.8E-07	2.5E-07	1.2E-06	3.7E-07	1.4E-05	4.3E-06	-	-
cis-1,2-Dichloroethene	-	-	-	-	-	-	-	-	2.7E-07	8.8E-08	3.0E-07	9.6E-08	2.7E-07	8.8E-08	2.2E-03	6.9E-04	-	-
Ethylbenzene	-	-	-	-	-	-	8.3E-05	2.7E-05	-	-	-	-	-	-	-	-	-	-
m,p-Xylene	-	-	-	-	-	-	1.6E-04	5.1E-05	-	-	-	-	-	-	-	-	-	-
Methylene chloride	1.8E-08	5.7E-09	7.1E-09	2.3E-09	-	-	2.4E-03	7.8E-04	2.1E-07	6.6E-08	1.6E-07	5.2E-08	2.1E-07	6.6E-08	2.7E-05	8.6E-06	2.6E-04	1.7E-03
Tetrachloroethene	1.2E-07	3.9E-08	4.8E-08	1.5E-08	-	-	8.2E-05	2.6E-05	-	-	-	-	-	-	-	-	6.3E-05	4.0E-04
Toluene	4.7E-07	1.5E-07	1.9E-07	6.0E-08	-	-	8.9E-05	2.9E-05	-	-	-	-	-	-	7.6E-05	2.4E-05	6.0E-04	3.8E-03
Trichloroethene	2.8E-07	8.9E-08	1.1E-07	3.5E-08	-	-	8.5E-05	2.7E-05	7.2E-07	2.3E-07	7.0E-07	2.2E-07	7.2E-07	2.3E-07	4.2E-04	1.4E-04	4.7E-04	3.0E-03
Xylenes (total)	7.0E-08	2.2E-08	2.8E-08	9.0E-09	-	-	-	-	-	-	-	-	-	-	-	-	5.3E-05	3.4E-04
SVOCs																		
2-Methylnaphthalene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Acenaphthene	1.4E-07	4.4E-08	7.1E-08	2.3E-08	5.5E-12	1.8E-12	-	-	-	-	-	-	-	-	-	-	3.3E-05	2.1E-04
Acenaphthylene	1.2E-07	3.7E-08	6.0E-08	1.9E-08	4.7E-12	1.5E-12	-	-	-	-	-	-	-	-	-	-	2.5E-05	1.6E-04
Anthracene	1.1E-07	3.6E-08	5.8E-08	1.9E-08	4.5E-12	1.5E-12	-	-	-	-	-	-	-	-	-	-	1.4E-05	9.2E-05
Benzo(a)anthracene	2.0E-07	6.5E-08	1.1E-07	3.4E-08	8.2E-12	2.6E-12	-	-	-	-	-	-	-	-	-	-	4.9E-06	3.1E-05
Benzo(a)pyrene	2.0E-07	6.5E-08	1.1E-07	3.4E-08	8.2E-12	2.6E-12	-	-	-	-	-	-	-	-	-	-	2.1E-06	1.3E-05
Benzo(e)pyrene	8.6E-08	2.7E-08	4.4E-08	1.4E-08	3.5E-12	1.1E-12	-	-	-	-	-	-	-	-	-	-	7.7E-07	4.9E-06
Benzo(b)fluoranthene	3.6E-07	1.2E-07	1.9E-07	6.0E-08	1.5E-11	4.7E-12	-	-	-	-	-	-	-	-	-	-	4.0E-06	2.6E-05
Benzo(g,h,i)perylene	1.2E-07	3.9E-08	6.4E-08	2.0E-08	5.0E-12	1.6E-12	-	-	-	-	-	-	-	-	-	-	1.0E-06	6.5E-06
Benzo(k)fluoranthene	1.2E-07	3.7E-08	6.0E-08	1.9E-08	4.7E-12	1.5E-12	-	-	-	-	-	-	-	-	-	-	1.7E-06	1.1E-05
Chrysene	3.0E-07	9.5E-08	1.5E-07	4.9E-08	1.2E-11	3.8E-12	-	-	-	-	-	-	-	-	-	-	6.7E-06	4.3E-05
Dibenz(a,h)anthracene	1.2E-07	3.7E-08	6.0E-08	1.9E-08	4.7E-12	1.5E-12	-	-	-	-	-	-	-	-	-	-	6.1E-07	3.9E-06
Dibenzofuran	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Fluoranthene	5.1E-07	1.6E-07	2.7E-07	8.5E-08	2.1E-11	6.7E-12	-	-	-	-	-	-	-	-	-	-	2.8E-05	1.8E-04
Fluorene	1.4E-07	4.4E-08	7.1E-08	2.3E-08	5.5E-12	1.8E-12	-	-	-	-	-	-	-	-	-	-	7.3E-06	4.7E-05
Indeno(1,2,3-cd)pyrene	1.9E-07	5.9E-08	9.6E-08	3.1E-08	7.5E-12	2.4E-12	-	-	-	-	-	-	-	-	-	-	5.7E-07	3.6E-06
Naphthalene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Perylene	4.9E-08	1.6E-08	2.5E-08	8.1E-09	2.0E-12	6.3E-13	-	-	-	-	-	-	-	-	-	-	1.0E-06	6.4E-06
Phenanthrene	2.7E-07	8.8E-08	1.4E-07	4.6E-08	1.1E-11	3.6E-12	-	-	-	-	-	-	-	-	-	-	3.0E-05	1.9E-04
Pyrene	2.1E-07	6.8E-08	1.1E-07	3.5E-08	8.6E-12	2.8E-12	-	-	-	-	-	-	-	-	-	-	1.3E-05	8.2E-05
Total Petroleum Hydrocarbons																		
C11-C14(Kerosene Range)	5.5E-05	1.8E-05	2.8E-05	9.1E-06	2.2E-09	7.1E-10	-	-	-	-	-	-	-	-	-	-	6.5E-03	4.2E-02
C14-C20(Diesel Range)	1.0E-05	3.3E-06	5.3E-06	1.7E-06	4.1E-10	1.3E-10	-	-	-	-	-	-	-	-	1.1E-03	3.4E-04	6.3E-04	4.0E-03
C20-C30(Lubricant Oil Range)	6.4E-04	2.1E-04	3.3E-04	1.1E-04	2.6E-08	8.3E-09	-	-	-	-	-	-	-	-	-	-	1.0E-02	6.6E-02

Spreadsheet C3-35a (4 of 4)

Estimated Human Intake for the Adult Resident - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Reasonable Maximum Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation of Indoor Air_s		Inhalation Ambient Air_s		Inhalation of Indoor Air_{gw}		Inhalation Ambient Air_{gw}		Domestic Grounder Use		Plant Consumption	
	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)
PCDD/PCDFs																		
2,3,7,8-TCDD	7.3E-13	2.3E-13	8.8E-14	2.8E-14	3.0E-17	9.5E-18	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,7,8-PeCDD	3.0E-12	9.5E-13	3.6E-13	1.1E-13	1.2E-16	3.9E-17	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,4,7,8-HxCDD	1.2E-11	4.0E-12	1.5E-12	4.7E-13	5.0E-16	1.6E-16	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,6,7,8-HxCDD	4.1E-11	1.3E-11	4.9E-12	1.6E-12	1.6E-15	5.2E-16	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,7,8,9-HxCDD	1.4E-11	4.4E-12	1.6E-12	5.2E-13	5.5E-16	1.8E-16	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,4,6,7,8-HpCDD	1.6E-09	5.2E-10	1.9E-10	6.2E-11	6.6E-14	2.1E-14	-	-	-	-	-	-	-	-	-	-	-	-
OCDD	2.3E-08	7.4E-09	2.8E-09	8.8E-10	9.3E-13	3.0E-13	-	-	-	-	-	-	-	-	-	-	-	-
2,3,7,8-TCDF	1.1E-12	3.5E-13	1.3E-13	4.1E-14	4.4E-17	1.4E-17	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,7,8-PeCDF	7.9E-13	2.5E-13	9.4E-14	3.0E-14	3.2E-17	1.0E-17	-	-	-	-	-	-	-	-	-	-	-	-
2,3,4,7,8-PeCDF	2.1E-12	6.9E-13	2.6E-13	8.2E-14	8.7E-17	2.8E-17	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,4,7,8-HxCDF	4.6E-12	1.5E-12	5.5E-13	1.8E-13	1.9E-16	5.9E-17	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,6,7,8-HxCDF	4.3E-12	1.4E-12	5.2E-13	1.7E-13	1.8E-16	5.6E-17	-	-	-	-	-	-	-	-	-	-	-	-
2,3,4,6,7,8-HxCDF	1.2E-11	3.9E-12	1.4E-12	4.6E-13	4.9E-16	1.6E-16	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,7,8,9-HxCDF	1.3E-12	4.2E-13	1.6E-13	5.1E-14	5.4E-17	1.7E-17	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,4,6,7,8-HpCDF	1.3E-10	4.2E-11	1.6E-11	5.0E-12	5.3E-15	1.7E-15	-	-	-	-	-	-	-	-	-	-	-	-
1,2,3,4,7,8,9-HpCDF	1.3E-11	4.1E-12	1.5E-12	4.8E-13	5.1E-16	1.6E-16	-	-	-	-	-	-	-	-	-	-	-	-
OCDF	3.2E-10	1.0E-10	3.9E-11	1.2E-11	1.3E-14	4.2E-15	-	-	-	-	-	-	-	-	-	-	-	-
PCBs																		
Aroclor-1254	5.9E-07	1.9E-07	3.3E-07	1.1E-07	2.4E-11	7.6E-12	-	-	-	-	-	-	-	-	-	-	6.4E-06	4.1E-05
Aroclor-1260	1.0E-05	3.2E-06	5.6E-06	1.8E-06	4.1E-10	1.3E-10	-	-	-	-	-	-	-	-	-	-	5.6E-05	3.5E-04
PCB-105	7.7E-10	2.5E-10	4.3E-10	1.4E-10	3.1E-14	1.0E-14	-	-	-	-	-	-	-	-	-	-	8.4E-09	5.3E-08
PCB-114	1.4E-11	4.4E-12	7.7E-12	2.5E-12	5.6E-16	1.8E-16	-	-	-	-	-	-	-	-	-	-	1.5E-10	9.5E-10
PCB-118	1.5E-09	4.9E-10	8.6E-10	2.8E-10	6.3E-14	2.0E-14	-	-	-	-	-	-	-	-	-	-	1.7E-08	1.1E-07
PCB-123	2.2E-11	7.0E-12	1.2E-11	3.9E-12	8.9E-16	2.8E-16	-	-	-	-	-	-	-	-	-	-	2.4E-10	1.5E-09
PCB-126	6.0E-11	1.9E-11	3.4E-11	1.1E-11	2.4E-15	7.8E-16	-	-	-	-	-	-	-	-	-	-	6.5E-10	4.2E-09
PCB-156	5.2E-10	1.6E-10	2.9E-10	9.2E-11	2.1E-14	6.7E-15	-	-	-	-	-	-	-	-	-	-	5.6E-09	3.6E-08
PCB-157	2.3E-10	7.4E-11	1.3E-10	4.1E-11	9.4E-15	3.0E-15	-	-	-	-	-	-	-	-	-	-	2.5E-09	1.6E-08
PCB-167	4.0E-10	1.3E-10	2.3E-10	7.2E-11	1.6E-14	5.2E-15	-	-	-	-	-	-	-	-	-	-	4.4E-09	2.8E-08
PCB-169	6.0E-12	1.9E-12	3.4E-12	1.1E-12	2.4E-16	7.8E-17	-	-	-	-	-	-	-	-	-	-	6.5E-11	4.2E-10
PCB-189	6.0E-11	1.9E-11	3.4E-11	1.1E-11	2.4E-15	7.8E-16	-	-	-	-	-	-	-	-	-	-	6.5E-10	4.2E-09
PCB-77	1.2E-10	3.8E-11	6.7E-11	2.2E-11	4.9E-15	1.6E-15	-	-	-	-	-	-	-	-	-	-	7.4E-10	4.7E-09
PCB-81	2.1E-11	6.8E-12	1.2E-11	3.8E-12	8.6E-16	2.8E-16	-	-	-	-	-	-	-	-	-	-	1.3E-10	8.4E-10

Notes:
Inhalation Indoor Air_{s-gw} - Exposure associated with indoor air concentrations of COPCs modeled from soil vapor, soil, or groundwater.
Inhalation Ambient Air_{s-gw} - Exposure associated with ambient air concentrations of COPCs modeled from soil or groundwater.
ADD - Average daily dose, as defined in the SRAM (MWH 2005).
LADD - Lifetime average daily dose, as defined in the SRAM (MWH 2005).
The chemicals presented in this table are comprehensive for all media sampled. Not all chemicals were analyzed for or detected in all media.
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCDD/PCDF - Polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.
PCB - polychlorinated biphenyls
COPC - chemical of potential concern
"-" indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
mg/kg-day - milligrams per kilogram day

Spreadsheet C3-34b (1 of 4)

Estimated Human Intake for the Child Recreator - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Central Tendancy Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation Ambient Air_s		Inhalation Ambient Air_{gw}		Surface Water Ingestion		Surface Water Dermal Contact	
	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)
Inorganic Compounds														
Aluminum	-	-	-	-	-	-	-	-	-	-	4.7E-04	3.7E-05	6.6E-06	5.3E-07
Antimony	-	-	-	-	-	-	-	-	-	-	4.1E-07	3.3E-08	5.8E-09	4.6E-10
Arsenic	-	-	-	-	-	-	-	-	-	-	3.1E-06	2.5E-07	4.3E-08	3.5E-09
Cadmium	2.2E-07	1.7E-08	3.7E-10	2.9E-11	3.9E-12	3.1E-13	-	-	-	-	6.9E-08	5.6E-09	9.8E-10	7.8E-11
Chromium	-	-	-	-	-	-	-	-	-	-	1.1E-06	8.4E-08	1.5E-08	1.2E-09
Copper	9.1E-06	7.3E-07	1.5E-07	1.2E-08	1.6E-10	1.3E-11	-	-	-	-	2.0E-06	1.6E-07	2.8E-08	2.2E-09
Fluoride	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Lead	8.5E-06	6.8E-07	1.4E-07	1.1E-08	1.5E-10	1.2E-11	-	-	-	-	3.7E-07	2.9E-08	5.2E-10	4.1E-11
Mercury	2.0E-06	1.6E-07	3.3E-08	2.6E-09	3.5E-11	2.8E-12	-	-	-	-	5.4E-08	4.3E-09	7.6E-10	6.1E-11
Methyl Mercury	1.6E-09	1.3E-10	2.7E-11	2.1E-12	2.9E-14	2.3E-15	-	-	-	-	-	-	-	-
Nickel	-	-	-	-	-	-	-	-	-	-	1.9E-06	1.5E-07	5.3E-09	4.2E-10
Nitrate	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Silver	9.3E-07	7.4E-08	1.6E-08	1.2E-09	1.7E-11	1.3E-12	-	-	-	-	-	-	-	-
Thallium	3.0E-07	2.4E-08	5.1E-09	4.1E-10	5.4E-12	4.3E-13	-	-	-	-	9.6E-08	7.7E-09	1.3E-09	1.1E-10
Vanadium	-	-	-	-	-	-	-	-	-	-	1.8E-06	1.5E-07	2.6E-08	2.1E-09
Zinc	7.7E-05	6.2E-06	1.3E-06	1.0E-07	1.4E-09	1.1E-10	-	-	-	-	-	-	-	-
VOCs														
1,1,1-Trichloroethane	-	-	-	-	-	-	-	-	-	-	3.5E-07	2.8E-08	0.0E+00	0.0E+00
1,1,2-Trichloro-1,2,2-trifluoroethane	1.1E-08	8.8E-10	1.8E-09	1.5E-10	-	-	-	-	-	-	-	-	-	-
1,1-Dichloroethane	-	-	-	-	-	-	1.1E-07	9.1E-09	1.1E-07	9.1E-09	-	-	-	-
1,2-Dichloroethane	-	-	-	-	-	-	2.6E-08	2.1E-09	2.6E-08	2.1E-09	-	-	-	-
1,2-Dichloroethene (total)	-	-	-	-	-	-	-	-	-	-	-	-	-	-
1-Chlorohexane	-	-	-	-	-	-	-	-	-	-	-	-	-	-
2-Butanone	2.0E-08	1.6E-09	3.3E-09	2.6E-10	-	-	-	-	-	-	-	-	-	-
2-Hexanone	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Acetone	1.0E-06	8.0E-08	1.7E-07	1.3E-08	-	-	9.9E-10	7.9E-11	9.9E-10	7.9E-11	-	-	-	-
Benzene	-	-	-	-	-	-	1.3E-07	1.0E-08	1.3E-07	1.0E-08	-	-	-	-
Carbon disulfide	-	-	-	-	-	-	-	-	8.9E-07	7.1E-08	-	-	-	-
Chloromethane	-	-	-	-	-	-	-	-	3.4E-07	2.7E-08	-	-	-	-
cis-1,2-Dichloroethene	-	-	-	-	-	-	8.1E-08	6.5E-09	8.1E-08	6.5E-09	-	-	-	-
Ethylbenzene	-	-	-	-	-	-	-	-	-	-	-	-	-	-
m,p-Xylene	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Methylene chloride	9.3E-09	7.5E-10	1.6E-09	1.3E-10	-	-	6.2E-08	4.9E-09	6.2E-08	4.9E-09	-	-	-	-
Tetrachloroethene	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Toluene	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Trichloroethene	-	-	-	-	-	-	2.1E-07	1.7E-08	2.1E-07	1.7E-08	3.0E-07	2.4E-08	5.1E-08	4.1E-09
Xylenes (total)	-	-	-	-	-	-	-	-	-	-	-	-	-	-
SVOCs														
2-Methylnaphthalene	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Acenaphthene	2.4E-08	1.9E-09	5.2E-09	4.2E-10	4.3E-13	3.5E-14	-	-	-	-	-	-	-	-
Acenaphthylene	4.2E-09	3.4E-10	9.3E-10	7.4E-11	7.6E-14	6.1E-15	-	-	-	-	-	-	-	-
Anthracene	1.6E-08	1.3E-09	3.5E-09	2.8E-10	2.9E-13	2.3E-14	-	-	-	-	-	-	-	-
Benzo(a)anthracene	2.6E-09	2.1E-10	5.7E-10	4.5E-11	4.7E-14	3.7E-15	-	-	-	-	-	-	-	-
Benzo(a)pyrene	2.7E-09	2.2E-10	6.0E-10	4.8E-11	4.9E-14	3.9E-15	-	-	-	-	-	-	-	-
Benzo(e)pyrene	1.8E-08	1.4E-09	4.0E-09	3.2E-10	3.3E-13	2.6E-14	-	-	-	-	-	-	-	-
Benzo(b)fluoranthene	3.9E-09	3.2E-10	8.6E-10	6.9E-11	7.1E-14	5.7E-15	-	-	-	-	-	-	-	-
Benzo(g,h,i)perylene	1.1E-08	8.7E-10	2.4E-09	1.9E-10	2.0E-13	1.6E-14	-	-	-	-	-	-	-	-
Benzo(k)fluoranthene	2.6E-09	2.0E-10	5.6E-10	4.5E-11	4.6E-14	3.7E-15	-	-	-	-	-	-	-	-
Chrysene	4.6E-09	3.7E-10	1.0E-09	8.1E-11	8.4E-14	6.7E-15	-	-	-	-	-	-	-	-
Dibenz(a,h)anthracene	1.7E-09	1.4E-10	3.7E-10	3.0E-11	3.1E-14	2.5E-15	-	-	-	-	-	-	-	-
Dibenzofuran	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Fluoranthene	5.2E-09	4.1E-10	1.1E-09	9.0E-11	9.3E-14	7.4E-15	-	-	-	-	-	-	-	-
Fluorene	2.4E-08	1.9E-09	5.2E-09	4.2E-10	4.3E-13	3.4E-14	-	-	-	-	-	-	-	-
Indeno(1,2,3-cd)pyrene	2.5E-09	2.0E-10	5.5E-10	4.4E-11	4.5E-14	3.6E-15	-	-	-	-	-	-	-	-
Naphthalene	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Perylene	1.0E-08	8.3E-10	2.3E-09	1.8E-10	1.9E-13	1.5E-14	-	-	-	-	-	-	-	-
Phenanthrene	6.5E-08	5.2E-09	1.4E-08	1.1E-09	1.2E-12	9.3E-14	-	-	-	-	-	-	-	-
Pyrene	7.5E-09	6.0E-10	1.6E-09	1.3E-10	1.4E-13	1.1E-14	-	-	-	-	-	-	-	-

Spreadsheet C3-34b (2 of 4)

Estimated Human Intake for the Child Recreator - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Central Tendancy Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation Ambient Air_s		Inhalation Ambient Air_{gw}		Surface Water Ingestion		Surface Water Dermal Contact	
	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)
Total Petroleum Hydrocarbons														
C11-C14(Kerosene Range)	9.1E-06	7.3E-07	2.0E-06	1.6E-07	1.6E-10	1.3E-11	-	-	-	-	-	-	-	-
C14-C20(Diesel Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-
C20-C30(Lubricant Oil Range)	7.2E-05	5.7E-06	1.6E-05	1.2E-06	1.3E-09	1.0E-10	-	-	-	-	-	-		
PCDD/PCDFs														
2,3,7,8-TCDD	1.7E-13	1.4E-14	8.6E-15	6.8E-16	3.1E-18	2.4E-19	-	-	-	-	-	-	-	-
1,2,3,7,8-PeCDD	6.7E-13	5.4E-14	3.4E-14	2.7E-15	1.2E-17	9.6E-19	-	-	-	-	7.7E-13	6.1E-14	8.7E-12	7.0E-13
1,2,3,4,7,8-HxCDD	2.0E-12	1.6E-13	9.8E-14	7.9E-15	3.5E-17	2.8E-18	-	-	-	-	1.1E-12	9.1E-14	1.3E-11	1.0E-12
1,2,3,6,7,8-HxCDD	1.0E-11	8.1E-13	5.1E-13	4.1E-14	1.8E-16	1.5E-17	-	-	-	-	1.2E-11	9.8E-13	1.4E-10	1.1E-11
1,2,3,7,8,9-HxCDD	4.2E-12	3.3E-13	2.1E-13	1.7E-14	7.5E-17	6.0E-18	-	-	-	-	6.4E-12	5.1E-13	7.3E-11	5.8E-12
1,2,3,4,6,7,8-HpCDD	2.9E-10	2.3E-11	1.4E-11	1.2E-12	5.1E-15	4.1E-16	-	-	-	-	1.0E-10	8.0E-12	1.1E-09	9.1E-11
OCDD	4.5E-09	3.6E-10	2.3E-10	1.8E-11	8.1E-14	6.5E-15	-	-	-	-	8.1E-10	6.5E-11	9.3E-09	7.4E-10
2,3,7,8-TCDF	4.3E-13	3.4E-14	2.2E-14	1.7E-15	7.7E-18	6.2E-19	-	-	-	-	1.8E-12	1.5E-13	2.1E-11	1.7E-12
1,2,3,7,8-PeCDF	1.6E-13	1.3E-14	8.1E-15	6.5E-16	2.9E-18	2.3E-19	-	-	-	-	3.3E-12	2.6E-13	3.8E-11	3.0E-12
2,3,4,7,8-PeCDF	4.9E-13	4.0E-14	2.5E-14	2.0E-15	8.9E-18	7.1E-19	-	-	-	-	8.2E-12	6.6E-13	9.4E-11	7.5E-12
1,2,3,4,7,8-HxCDF	1.1E-12	8.4E-14	5.3E-14	4.3E-15	1.9E-17	1.5E-18	-	-	-	-	8.5E-12	6.8E-13	9.7E-11	7.8E-12
1,2,3,6,7,8-HxCDF	8.6E-13	6.9E-14	4.3E-14	3.5E-15	1.6E-17	1.2E-18	-	-	-	-	5.0E-12	4.0E-13	5.7E-11	4.6E-12
2,3,4,6,7,8-HxCDF	1.6E-12	1.3E-13	8.2E-14	6.6E-15	2.9E-17	2.4E-18	-	-	-	-	8.7E-12	7.0E-13	9.9E-11	7.9E-12
1,2,3,7,8,9-HxCDF	1.5E-13	1.2E-14	7.3E-15	5.9E-16	2.6E-18	2.1E-19	-	-	-	-	8.3E-12	6.7E-13	9.5E-11	7.6E-12
1,2,3,4,6,7,8-HpCDF	3.3E-11	2.7E-12	1.7E-12	1.4E-13	6.0E-16	4.8E-17	-	-	-	-	1.2E-11	1.0E-12	1.4E-10	1.1E-11
1,2,3,4,7,8,9-HpCDF	2.9E-12	2.3E-13	1.4E-13	1.2E-14	5.2E-17	4.1E-18	-	-	-	-	6.4E-12	5.1E-13	7.3E-11	5.8E-12
OCDF	9.1E-11	7.3E-12	4.6E-12	3.7E-13	1.6E-15	1.3E-16	-	-	-	-	3.3E-11	2.6E-12	3.8E-10	3.0E-11
PCBs														
Aroclor-1254	1.6E-07	1.2E-08	3.7E-08	2.9E-09	2.8E-12	2.2E-13	-	-	-	-	-	-	-	-
Aroclor-1260	1.3E-06	1.1E-07	3.1E-07	2.5E-08	2.4E-11	1.9E-12	-	-	-	-	-	-	-	-
PCB-105	1.1E-10	9.2E-12	2.7E-11	2.2E-12	2.1E-15	1.7E-16	-	-	-	-	-	-	-	-
PCB-114	2.2E-12	1.7E-13	5.1E-13	4.1E-14	3.9E-17	3.1E-18	-	-	-	-	-	-	-	-
PCB-118	2.3E-10	1.8E-11	5.4E-11	4.3E-12	4.2E-15	3.3E-16	-	-	-	-	-	-	-	-
PCB-123	3.2E-12	2.6E-13	7.6E-13	6.1E-14	5.8E-17	4.6E-18	-	-	-	-	-	-	-	-
PCB-126	8.8E-12	7.0E-13	2.1E-12	1.7E-13	1.6E-16	1.3E-17	-	-	-	-	-	-	-	-
PCB-156	7.5E-11	6.0E-12	1.8E-11	1.4E-12	1.4E-15	1.1E-16	-	-	-	-	-	-	-	-
PCB-157	3.3E-11	2.7E-12	7.8E-12	6.3E-13	6.0E-16	4.8E-17	-	-	-	-	-	-	-	-
PCB-167	5.8E-11	4.6E-12	1.4E-11	1.1E-12	1.0E-15	8.3E-17	-	-	-	-	-	-	-	-
PCB-169	8.6E-13	6.9E-14	2.0E-13	1.6E-14	1.6E-17	1.2E-18	-	-	-	-	-	-	-	-
PCB-189	8.6E-12	6.9E-13	2.0E-12	1.6E-13	1.5E-16	1.2E-17	-	-	-	-	-	-	-	-
PCB-77	1.8E-11	1.4E-12	4.1E-12	3.3E-13	3.2E-16	2.5E-17	-	-	-	-	-	-	-	-
PCB-81	3.1E-12	2.5E-13	7.4E-13	5.9E-14	5.6E-17	4.5E-18	-	-	-	-	-	-	-	-

Spreadsheet C3-34b (3 of 4)

Estimated Human Intake for the Child Recreator - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Reasonable Maximum Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation Ambient Air_s		Inhalation Ambient Air_{gw}		Surface Water Ingestion		Surface Water Dermal Contact	
	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)
Inorganic Compounds														
Aluminum	-	-	-	-	-	-	-	-	-	-	3.1E-03	2.5E-04	8.7E-05	3.5E-06
Antimony	-	-	-	-	-	-	-	-	-	-	2.8E-06	2.3E-07	7.9E-08	3.2E-09
Arsenic	-	-	-	-	-	-	-	-	-	-	2.0E-05	1.6E-06	5.6E-07	2.3E-08
Barium	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Boron	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Cadmium	1.5E-06	1.2E-07	4.3E-09	3.4E-10	2.7E-11	2.2E-12	-	-	-	-	5.1E-07	4.1E-08	1.4E-08	5.8E-10
Chromium	-	-	-	-	-	-	-	-	-	-	6.2E-06	5.0E-07	1.7E-07	7.0E-09
Copper	7.3E-05	5.8E-06	2.0E-06	1.6E-07	1.3E-09	1.0E-10	-	-	-	-	1.0E-05	8.3E-07	2.9E-07	1.2E-08
Fluoride	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Lead	4.6E-05	3.7E-06	1.3E-06	1.0E-07	8.3E-10	6.7E-11	-	-	-	-	1.9E-06	1.5E-07	5.4E-09	2.1E-10
Mercury	2.0E-05	1.6E-06	5.6E-07	4.5E-08	3.6E-10	2.9E-11	-	-	-	-	2.5E-07	2.0E-08	7.0E-09	2.8E-10
Methyl Mercury	1.3E-08	1.1E-09	3.7E-10	3.0E-11	2.4E-13	1.9E-14	-	-	-	-	-	-	-	-
Nickel	-	-	-	-	-	-	-	-	-	-	7.5E-06	6.0E-07	4.2E-08	1.7E-09
Nitrate	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Silver	1.0E-05	8.0E-07	2.8E-07	2.2E-08	1.8E-10	1.4E-11	-	-	-	-	-	-	-	-
Thallium	1.2E-06	9.6E-08	3.4E-08	2.7E-09	2.2E-11	1.7E-12	-	-	-	-	3.8E-07	3.1E-08	1.1E-08	4.3E-10
Vanadium	-	-	-	-	-	-	-	-	-	-	1.0E-05	8.3E-07	2.9E-07	1.2E-08
Zinc	6.9E-04	5.5E-05	1.9E-05	1.5E-06	1.2E-08	9.9E-10	-	-	-	-	-	-	-	-
VOCs														
1,1,1-Trichloroethane	-	-	-	-	-	-	-	-	-	-	1.4E-06	1.1E-07	0.0E+00	0.0E+00
1,1,2-Trichloro-1,2,2-trifluoroethane	4.4E-08	3.5E-09	1.2E-08	9.8E-10	-	-	-	-	-	-	-	-	-	-
1,1-Dichloroethane	-	-	-	-	-	-	4.6E-07	3.7E-08	4.6E-07	3.7E-08	-	-	-	-
1,2-Dichloroethane	-	-	-	-	-	-	1.1E-07	8.5E-09	1.1E-07	8.5E-09	-	-	-	-
1,2-Dichloroethene (total)	-	-	-	-	-	-	-	-	-	-	-	-	-	-
1-Chlorohexane	-	-	-	-	-	-	-	-	-	-	-	-	-	-
2-Butanone	1.3E-07	1.0E-08	3.5E-08	2.8E-09	-	-	-	-	-	-	-	-	-	-
2-Hexanone	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Acetone	1.9E-05	1.5E-06	5.3E-06	4.2E-07	-	-	4.0E-09	3.2E-10	4.0E-09	3.2E-10	-	-	-	-
Benzene	-	-	-	-	-	-	5.2E-07	4.2E-08	5.2E-07	4.2E-08	-	-	-	-
Carbon disulfide	-	-	-	-	-	-	-	-	3.6E-06	2.9E-07	-	-	-	-
Chloromethane	-	-	-	-	-	-	-	-	1.4E-06	1.1E-07	-	-	-	-
cis-1,2-Dichloroethene	-	-	-	-	-	-	3.3E-07	2.6E-08	3.3E-07	2.6E-08	-	-	-	-
Ethylbenzene	-	-	-	-	-	-	-	-	-	-	-	-	-	-
m,p-Xylene	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Methylene chloride	4.7E-08	3.8E-09	1.3E-08	1.1E-09	-	-	2.5E-07	2.0E-08	2.5E-07	2.0E-08	-	-	-	-
Tetrachloroethene	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Toluene	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Trichloroethene	-	-	-	-	-	-	8.5E-07	6.8E-08	8.5E-07	6.8E-08	1.2E-06	9.6E-08	4.1E-07	1.6E-08
Xylenes (total)	-	-	-	-	-	-	-	-	-	-	-	-	-	-
SVOCs														
2-Methylnaphthalene	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Acenaphthene	4.0E-07	3.2E-08	1.5E-07	1.2E-08	7.3E-12	5.8E-13	-	-	-	-	-	-	-	-
Acenaphthylene	5.7E-08	4.5E-09	2.1E-08	1.7E-09	1.0E-12	8.2E-14	-	-	-	-	-	-	-	-
Anthracene	2.7E-07	2.1E-08	9.7E-08	7.7E-09	4.8E-12	3.8E-13	-	-	-	-	-	-	-	-
Benzo(a)anthracene	3.2E-08	2.6E-09	1.2E-08	9.3E-10	5.8E-13	4.6E-14	-	-	-	-	-	-	-	-
Benzo(a)pyrene	3.3E-08	2.6E-09	1.2E-08	9.5E-10	5.9E-13	4.7E-14	-	-	-	-	-	-	-	-
Benzo(b)fluoranthene	4.0E-08	3.2E-09	1.5E-08	1.2E-09	7.2E-13	5.8E-14	-	-	-	-	-	-	-	-
Benzo(g,h,i)perylene	1.6E-07	1.3E-08	5.9E-08	4.7E-09	2.9E-12	2.3E-13	-	-	-	-	-	-	-	-
Benzo(k)fluoranthene	3.0E-08	2.4E-09	1.1E-08	8.9E-10	5.5E-13	4.4E-14	-	-	-	-	-	-	-	-
Chrysene	4.5E-08	3.6E-09	1.6E-08	1.3E-09	8.0E-13	6.4E-14	-	-	-	-	-	-	-	-
Dibenz(a,h)anthracene	2.5E-08	2.0E-09	9.1E-09	7.3E-10	4.5E-13	3.6E-14	-	-	-	-	-	-	-	-
Dibenzofuran	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Fluoranthene	4.4E-08	3.5E-09	1.6E-08	1.3E-09	7.9E-13	6.3E-14	-	-	-	-	-	-	-	-
Fluorene	4.0E-07	3.2E-08	1.5E-07	1.2E-08	7.2E-12	5.8E-13	-	-	-	-	-	-	-	-
Indeno(1,2,3-cd)pyrene	3.1E-08	2.5E-09	1.1E-08	9.0E-10	5.6E-13	4.5E-14	-	-	-	-	-	-	-	-
Naphthalene	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Phenanthrene	1.1E-06	8.7E-08	3.9E-07	3.2E-08	2.0E-11	1.6E-12	-	-	-	-	-	-	-	-
Pyrene	1.0E-07	8.2E-09	3.7E-08	3.0E-09	1.9E-12	1.5E-13	-	-	-	-	-	-	-	-

Spreadsheet C3-34b (4 of 4)

Estimated Human Intake for the Child Recreator - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Reasonable Maximum Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation Ambient Air_s		Inhalation Ambient Air_{gw}		Surface Water Ingestion		Surface Water Dermal Contact	
	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)
Total Petroleum Hydrocarbons														
C11-C14(Kerosene Range)	1.5E-04	1.2E-05	5.3E-05	4.3E-06	2.6E-09	2.1E-10	-	-	-	-	-	-	-	-
C14-C20(Diesel Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-
C20-C30(Lubricant Oil Range)	1.7E-03	1.4E-04	6.2E-04	5.0E-05	3.1E-08	2.5E-09	-	-	-	-	-	-	-	-
PCDD/PCDFs														
2,3,7,8-TCDD	1.5E-12	1.2E-13	1.2E-13	9.8E-15	2.6E-17	2.1E-18	-	-	-	-	-	-	-	-
1,2,3,7,8-PeCDD	5.5E-12	4.4E-13	4.6E-13	3.7E-14	9.9E-17	7.9E-18	-	-	-	-	3.1E-12	2.5E-13	7.0E-11	2.8E-12
1,2,3,4,7,8-HxCDD	1.5E-11	1.2E-12	1.3E-12	1.0E-13	2.8E-16	2.2E-17	-	-	-	-	4.5E-12	3.6E-13	1.0E-10	4.1E-12
1,2,3,6,7,8-HxCDD	7.3E-11	5.8E-12	6.1E-12	4.9E-13	1.3E-15	1.1E-16	-	-	-	-	1.2E-10	9.7E-12	2.7E-09	1.1E-10
1,2,3,7,8,9-HxCDD	3.7E-11	2.9E-12	3.1E-12	2.5E-13	6.6E-16	5.3E-17	-	-	-	-	2.6E-11	2.0E-12	5.8E-10	2.3E-11
1,2,3,4,6,7,8-HpCDD	1.8E-09	1.5E-10	1.5E-10	1.2E-11	3.3E-14	2.6E-15	-	-	-	-	3.5E-09	2.8E-10	7.9E-08	3.2E-09
OCDD	2.7E-08	2.1E-09	2.2E-09	1.8E-10	4.8E-13	3.8E-14	-	-	-	-	4.8E-09	3.9E-10	1.1E-07	4.4E-09
2,3,7,8-TCDF	2.9E-12	2.3E-13	2.4E-13	1.9E-14	5.2E-17	4.1E-18	-	-	-	-	8.2E-12	6.5E-13	1.9E-10	7.5E-12
1,2,3,7,8-PeCDF	1.4E-12	1.1E-13	1.2E-13	9.5E-15	2.5E-17	2.0E-18	-	-	-	-	1.3E-11	1.1E-12	3.0E-10	1.2E-11
2,3,4,7,8-PeCDF	3.6E-12	2.9E-13	3.0E-13	2.4E-14	6.5E-17	5.2E-18	-	-	-	-	3.7E-11	2.9E-12	8.3E-10	3.3E-11
1,2,3,4,7,8-HxCDF	6.6E-12	5.3E-13	5.6E-13	4.4E-14	1.2E-16	9.5E-18	-	-	-	-	3.9E-11	3.1E-12	8.9E-10	3.6E-11
1,2,3,6,7,8-HxCDF	6.7E-12	5.3E-13	5.6E-13	4.5E-14	1.2E-16	9.6E-18	-	-	-	-	2.0E-11	1.6E-12	4.6E-10	1.8E-11
2,3,4,6,7,8-HxCDF	1.1E-11	8.8E-13	9.3E-13	7.4E-14	2.0E-16	1.6E-17	-	-	-	-	3.9E-11	3.1E-12	8.9E-10	3.6E-11
1,2,3,7,8,9-HxCDF	6.4E-13	5.1E-14	5.4E-14	4.3E-15	1.1E-17	9.2E-19	-	-	-	-	4.2E-11	3.4E-12	9.6E-10	3.8E-11
1,2,3,4,6,7,8-HpCDF	1.8E-10	1.5E-11	1.5E-11	1.2E-12	3.3E-15	2.6E-16	-	-	-	-	9.3E-11	7.4E-12	2.1E-09	8.5E-11
1,2,3,4,7,8,9-HpCDF	1.5E-11	1.2E-12	1.3E-12	1.0E-13	2.8E-16	2.2E-17	-	-	-	-	2.6E-11	2.0E-12	5.8E-10	2.3E-11
OCDF	5.5E-10	4.4E-11	4.6E-11	3.7E-12	9.9E-15	7.9E-16	-	-	-	-	2.4E-10	2.0E-11	5.6E-09	2.2E-10
PCBs														
Aroclor-1254	1.6E-06	1.3E-07	6.2E-07	4.9E-08	2.8E-11	2.3E-12	-	-	-	-	-	-	-	-
Aroclor-1260	2.8E-05	2.3E-06	1.1E-05	8.9E-07	5.1E-10	4.1E-11	-	-	-	-	-	-	-	-
PCB-105	2.3E-09	1.9E-10	9.1E-10	7.3E-11	4.2E-14	3.4E-15	-	-	-	-	-	-	-	-
PCB-114	4.1E-11	3.3E-12	1.6E-11	1.3E-12	7.5E-16	6.0E-17	-	-	-	-	-	-	-	-
PCB-118	4.7E-09	3.7E-10	1.8E-09	1.5E-10	8.4E-14	6.7E-15	-	-	-	-	-	-	-	-
PCB-123	6.6E-11	5.3E-12	2.6E-11	2.1E-12	1.2E-15	9.5E-17	-	-	-	-	-	-	-	-
PCB-126	1.8E-10	1.5E-11	7.1E-11	5.7E-12	3.3E-15	2.6E-16	-	-	-	-	-	-	-	-
PCB-156	1.6E-09	1.2E-10	6.1E-10	4.9E-11	2.8E-14	2.2E-15	-	-	-	-	-	-	-	-
PCB-157	7.0E-10	5.6E-11	2.7E-10	2.2E-11	1.3E-14	1.0E-15	-	-	-	-	-	-	-	-
PCB-167	1.2E-09	9.7E-11	4.8E-10	3.8E-11	2.2E-14	1.8E-15	-	-	-	-	-	-	-	-
PCB-169	1.8E-11	1.5E-12	7.1E-12	5.7E-13	3.3E-16	2.6E-17	-	-	-	-	-	-	-	-
PCB-189	1.8E-10	1.5E-11	7.1E-11	5.7E-12	3.3E-15	2.6E-16	-	-	-	-	-	-	-	-
PCB-77	3.6E-10	2.9E-11	1.4E-10	1.1E-11	6.5E-15	5.2E-16	-	-	-	-	-	-	-	-
PCB-81	6.4E-11	5.1E-12	2.5E-11	2.0E-12	1.2E-15	9.2E-17	-	-	-	-	-	-	-	-

Notes:
Inhalation Ambient $Air_{s\text{-}gw}$ - Exposure associated with ambient air concentrations of COPCs modeled from soil or groundwater.
ADD - Average daily dose, as defined in the SRAM (MWH 2005).
LADD - Lifetime average daily dose, as defined in the SRAM (MWH 2005).
The chemicals presented in this table are comprehensive for all media sampled. Not all chemicals were analyzed for or detected in all media.
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCDD/PCDF - Polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.
PCB - polychlorinated biphenyls
COPC - chemical of potential concern
"-" indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
mg/kg-day - milligrams per kilogram per day

Spreadsheet C3-34a (1 of 4)

Estimated Human Intake for the Child Recreator - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Central Tendancy Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation Ambient Air_s		Inhalation Ambient Air_{gw}	
	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)
Inorganic Compounds										
Cadmium	4.6E-07	3.7E-08	7.8E-10	6.2E-11	8.4E-12	6.7E-13	-	-	-	-
Copper	1.9E-05	1.5E-06	3.2E-07	2.6E-08	3.5E-10	2.8E-11	-	-	-	-
Fluoride	-	-	-	-	-	-	-	-	-	-
Lead	1.5E-05	1.2E-06	2.5E-07	2.0E-08	2.6E-10	2.1E-11	-	-	-	-
Mercury	1.7E-06	1.4E-07	2.9E-08	2.3E-09	3.1E-11	2.5E-12	-	-	-	-
Methyl Mercury	1.6E-09	1.3E-10	2.7E-11	2.1E-12	2.9E-14	2.3E-15	-	-	-	-
Nitrate	-	-	-	-	-	-	-	-	-	-
Silver	7.1E-07	5.7E-08	1.2E-08	9.5E-10	1.3E-11	1.0E-12	-	-	-	-
Thallium	3.0E-07	2.4E-08	5.1E-09	4.1E-10	5.4E-12	4.3E-13	-	-	-	-
Zinc	1.6E-04	1.2E-05	2.6E-06	2.1E-07	2.8E-09	2.2E-10	-	-	-	-
VOCs										
1,1,1-Trichloroethane	-	-	-	-	-	-	-	-	-	-
1,1,2-Trichloro-1,2,2-trifluoroethane	1.1E-08	8.8E-10	1.8E-09	1.5E-10	-	-	-	-	-	-
1,1-Dichloroethane	-	-	-	-	-	-	1.1E-07	9.1E-09	1.1E-07	9.1E-09
1,2-Dichloroethane	-	-	-	-	-	-	2.6E-08	2.1E-09	2.6E-08	2.1E-09
1,2-Dichloroethene (total)	2.6E-08	2.1E-09	4.3E-09	3.5E-10	-	-	-	-	-	-
1-Chlorohexane	-	-	-	-	-	-	-	-	-	-
2-Butanone	3.4E-08	2.7E-09	5.7E-09	4.5E-10	-	-	-	-	-	-
2-Hexanone	-	-	-	-	-	-	-	-	-	-
Acetone	6.2E-07	5.0E-08	1.0E-07	8.3E-09	-	-	9.9E-10	7.9E-11	9.9E-10	7.9E-11
Benzene	-	-	-	-	-	-	1.3E-07	1.0E-08	1.3E-07	1.0E-08
Carbon disulfide	-	-	-	-	-	-	-	-	8.9E-07	7.1E-08
Chloromethane	-	-	-	-	-	-	-	-	3.4E-07	2.7E-08
cis-1,2-Dichloroethene	-	-	-	-	-	-	8.1E-08	6.5E-09	8.1E-08	6.5E-09
Ethylbenzene	-	-	-	-	-	-	-	-	-	-
m,p-Xylene	-	-	-	-	-	-	-	-	-	-
Methylene chloride	1.2E-08	9.5E-10	2.0E-09	1.6E-10	-	-	6.2E-08	4.9E-09	6.2E-08	4.9E-09
Tetrachloroethene	1.9E-08	1.5E-09	3.2E-09	2.6E-10	-	-	-	-	-	-
Toluene	5.1E-08	4.1E-09	8.6E-09	6.9E-10	-	-	-	-	-	-
Trichloroethene	3.4E-08	2.7E-09	5.7E-09	4.5E-10	-	-	2.1E-07	1.7E-08	2.1E-07	1.7E-08
Xylenes (total)	2.3E-08	1.8E-09	3.9E-09	3.1E-10	-	-	-	-	-	-
SVOCs										
2-Methylnaphthalene	-	-	-	-	-	-	-	-	-	-
Acenaphthene	4.0E-08	3.2E-09	8.8E-09	7.0E-10	7.2E-13	5.8E-14	-	-	-	-
Acenaphthylene	2.8E-08	2.3E-09	6.1E-09	4.9E-10	5.1E-13	4.0E-14	-	-	-	-
Anthracene	3.5E-08	2.8E-09	7.7E-09	6.2E-10	6.4E-13	5.1E-14	-	-	-	-
Benzo(a)anthracene	3.3E-08	2.6E-09	7.2E-09	5.7E-10	5.9E-13	4.7E-14	-	-	-	-
Benzo(a)pyrene	3.3E-08	2.6E-09	7.2E-09	5.7E-10	5.9E-13	4.7E-14	-	-	-	-
Benzo(e)pyrene	1.7E-08	1.4E-09	3.7E-09	3.0E-10	3.1E-13	2.5E-14	-	-	-	-
Benzo(b)fluoranthene	4.5E-08	3.6E-09	9.7E-09	7.8E-10	8.0E-13	6.4E-14	-	-	-	-
Benzo(g,h,i)perylene	3.8E-08	3.0E-09	8.2E-09	6.6E-10	6.8E-13	5.4E-14	-	-	-	-
Benzo(k)fluoranthene	2.7E-08	2.2E-09	5.9E-09	4.7E-10	4.9E-13	3.9E-14	-	-	-	-
Chrysene	4.1E-08	3.2E-09	8.9E-09	7.1E-10	7.3E-13	5.8E-14	-	-	-	-
Dibenz(a,h)anthracene	2.7E-08	2.1E-09	5.8E-09	4.6E-10	4.8E-13	3.8E-14	-	-	-	-
Dibenzofuran	-	-	-	-	-	-	-	-	-	-
Fluoranthene	5.5E-08	4.4E-09	1.2E-08	9.6E-10	9.9E-13	7.9E-14	-	-	-	-
Fluorene	4.0E-08	3.2E-09	8.8E-09	7.0E-10	7.2E-13	5.8E-14	-	-	-	-
Indeno(1,2,3-cd)pyrene	3.1E-08	2.5E-09	6.8E-09	5.5E-10	5.6E-13	4.5E-14	-	-	-	-
Naphthalene	-	-	-	-	-	-	-	-	-	-
Perylene	9.7E-09	7.8E-10	2.1E-09	1.7E-10	1.7E-13	1.4E-14	-	-	-	-
Phenanthrene	7.3E-08	5.8E-09	1.6E-08	1.3E-09	1.3E-12	1.0E-13	-	-	-	-
Pyrene	4.9E-08	3.9E-09	1.1E-08	8.5E-10	8.7E-13	7.0E-14	-	-	-	-
Total Petroleum Hydrocarbons										
C11-C14(Kerosene Range)	8.8E-06	7.1E-07	1.9E-06	1.5E-07	1.6E-10	1.3E-11	-	-	-	-
C14-C20(Diesel Range)	6.8E-06	5.4E-07	1.5E-06	1.2E-07	1.2E-10	9.8E-12	-	-	-	-
C20-C30(Lubricant Oil Range)	6.7E-05	5.3E-06	1.5E-05	1.2E-06	1.2E-09	9.6E-11	-	-	-	-

Spreadsheet C3-34a (2 of 4)

Estimated Human Intake for the Child Recreator - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Central Tendancy Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation of Indoor Air		Inhalation Ambient Air$_{s-gw}$	
	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)
PCDD/PCDFs										
2,3,7,8-TCDD	2.5E-13	2.0E-14	1.3E-14	1.0E-15	4.5E-18	3.6E-19	-	-	-	-
1,2,3,7,8-PeCDD	1.0E-12	8.0E-14	5.1E-14	4.0E-15	1.8E-17	1.4E-18	-	-	-	-
1,2,3,4,7,8-HxCDD	3.7E-12	3.0E-13	1.9E-13	1.5E-14	6.7E-17	5.4E-18	-	-	-	-
1,2,3,6,7,8-HxCDD	1.4E-11	1.2E-12	7.3E-13	5.8E-14	2.6E-16	2.1E-17	-	-	-	-
1,2,3,7,8,9-HxCDD	5.4E-12	4.3E-13	2.7E-13	2.2E-14	9.7E-17	7.8E-18	-	-	-	-
1,2,3,4,6,7,8-HpCDD	5.2E-10	4.1E-11	2.6E-11	2.1E-12	9.3E-15	7.4E-16	-	-	-	-
OCDD	7.6E-09	6.1E-10	3.9E-10	3.1E-11	1.4E-13	1.1E-14	-	-	-	-
2,3,7,8-TCDF	5.0E-13	4.0E-14	2.5E-14	2.0E-15	9.0E-18	7.2E-19	-	-	-	-
1,2,3,7,8-PeCDF	2.5E-13	2.0E-14	1.3E-14	1.0E-15	4.5E-18	3.6E-19	-	-	-	-
2,3,4,7,8-PeCDF	7.4E-13	6.0E-14	3.8E-14	3.0E-15	1.3E-17	1.1E-18	-	-	-	-
1,2,3,4,7,8-HxCDF	1.6E-12	1.3E-13	8.2E-14	6.5E-15	2.9E-17	2.3E-18	-	-	-	-
1,2,3,6,7,8-HxCDF	1.4E-12	1.1E-13	7.1E-14	5.7E-15	2.5E-17	2.0E-18	-	-	-	-
2,3,4,6,7,8-HxCDF	3.5E-12	2.8E-13	1.8E-13	1.4E-14	6.3E-17	5.0E-18	-	-	-	-
1,2,3,7,8,9-HxCDF	3.3E-13	2.6E-14	1.7E-14	1.3E-15	5.9E-18	4.7E-19	-	-	-	-
1,2,3,4,6,7,8-HpCDF	4.8E-11	3.8E-12	2.4E-12	1.9E-13	8.6E-16	6.9E-17	-	-	-	-
1,2,3,4,7,8,9-HpCDF	4.4E-12	3.6E-13	2.2E-13	1.8E-14	8.0E-17	6.4E-18	-	-	-	-
OCDF	1.2E-10	9.9E-12	6.2E-12	5.0E-13	2.2E-15	1.8E-16	-	-	-	-
PCBs										
Aroclor-1254	1.5E-07	1.2E-08	3.5E-08	2.8E-09	2.7E-12	2.1E-13	-	-	-	-
Aroclor-1260	1.2E-06	9.7E-08	2.9E-07	2.3E-08	2.2E-11	1.7E-12	-	-	-	-
PCB-105	1.0E-10	8.3E-12	2.5E-11	2.0E-12	1.9E-15	1.5E-16	-	-	-	-
PCB-114	2.0E-12	1.6E-13	4.7E-13	3.7E-14	3.6E-17	2.9E-18	-	-	-	-
PCB-118	2.1E-10	1.7E-11	4.9E-11	3.9E-12	3.8E-15	3.0E-16	-	-	-	-
PCB-123	2.9E-12	2.3E-13	6.9E-13	5.5E-14	5.3E-17	4.2E-18	-	-	-	-
PCB-126	8.0E-12	6.4E-13	1.9E-12	1.5E-13	1.4E-16	1.1E-17	-	-	-	-
PCB-156	6.8E-11	5.5E-12	1.6E-11	1.3E-12	1.2E-15	9.8E-17	-	-	-	-
PCB-157	3.0E-11	2.4E-12	7.1E-12	5.7E-13	5.4E-16	4.3E-17	-	-	-	-
PCB-167	5.2E-11	4.2E-12	1.2E-11	9.9E-13	9.4E-16	7.5E-17	-	-	-	-
PCB-169	7.8E-13	6.3E-14	1.8E-13	1.5E-14	1.4E-17	1.1E-18	-	-	-	-
PCB-189	7.8E-12	6.2E-13	1.8E-12	1.5E-13	1.4E-16	1.1E-17	-	-	-	-
PCB-77	1.6E-11	1.3E-12	3.8E-12	3.0E-13	2.9E-16	2.3E-17	-	-	-	-
PCB-81	2.8E-12	2.3E-13	6.7E-13	5.4E-14	5.1E-17	4.1E-18	-	-	-	-

Spreadsheet C3-34a (3 of 4)

Estimated Human Intake for the Child Recreator - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Reasonable Maximum Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation of Indoor Air		Inhalation Ambient Air$_{v-gw}$	
	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)
Inorganic Compounds										
Cadmium	4.1E-06	3.3E-07	1.2E-08	9.3E-10	7.5E-11	6.0E-12	-	-	-	-
Copper	1.7E-04	1.3E-05	4.7E-06	3.7E-07	3.0E-09	2.4E-10	-	-	-	-
Fluoride	-	-	-	-	-	-	-	-	-	-
Lead	1.2E-04	9.9E-06	3.5E-06	2.8E-07	2.2E-09	1.8E-10	-	-	-	-
Mercury	1.6E-05	1.3E-06	4.5E-07	3.6E-08	2.9E-10	2.3E-11	-	-	-	-
Methyl Mercury	1.3E-08	1.1E-09	3.7E-10	3.0E-11	2.4E-13	1.9E-14	-	-	-	-
Nitrate	-	-	-	-	-	-	-	-	-	-
Silver	1.0E-05	8.4E-07	2.9E-07	2.3E-08	1.9E-10	1.5E-11	-	-	-	-
Thallium	1.2E-06	9.6E-08	3.4E-08	2.7E-09	2.2E-11	1.7E-12	-	-	-	-
Zinc	1.6E-03	1.3E-04	4.5E-05	3.6E-06	2.9E-08	2.3E-09	-	-	-	-
VOCs										
1,1,1-Trichloroethane	-	-	-	-	-	-	-	-	-	-
1,1,2-Trichloro-1,2,2-trifluoroethane	4.4E-08	3.5E-09	1.2E-08	9.8E-10	-	-	-	-	-	-
1,1-Dichloroethane	-	-	-	-	-	-	4.6E-07	3.7E-08	4.6E-07	3.7E-08
1,2-Dichloroethane	-	-	-	-	-	-	1.1E-07	8.5E-09	1.1E-07	8.5E-09
1,2-Dichloroethene (total)	2.6E-07	2.0E-08	7.2E-08	5.7E-09	-	-	-	-	-	-
1-Chlorohexane	-	-	-	-	-	-	-	-	-	-
2-Butanone	1.4E-07	1.1E-08	3.8E-08	3.0E-09	-	-	-	-	-	-
2-Hexanone	-	-	-	-	-	-	-	-	-	-
Acetone	1.5E-05	1.2E-06	4.3E-06	3.4E-07	-	-	4.0E-09	3.2E-10	4.0E-09	3.2E-10
Benzene	-	-	-	-	-	-	5.2E-07	4.2E-08	5.2E-07	4.2E-08
Carbon disulfide	-	-	-	-	-	-	-	-	3.6E-06	2.9E-07
Chloromethane	-	-	-	-	-	-	-	-	1.4E-06	1.1E-07
cis-1,2-Dichloroethene	-	-	-	-	-	-	3.3E-07	2.6E-08	3.3E-07	2.6E-08
Ethylbenzene	-	-	-	-	-	-	-	-	-	-
m,p-Xylene	-	-	-	-	-	-	-	-	-	-
Methylene chloride	4.7E-08	3.8E-09	1.3E-08	1.1E-09	-	-	2.5E-07	2.0E-08	2.5E-07	2.0E-08
Tetrachloroethene	3.2E-07	2.6E-08	9.0E-08	7.2E-09	-	-	-	-	-	-
Toluene	1.2E-06	1.0E-07	3.5E-07	2.8E-08	-	-	-	-	-	-
Trichloroethene	7.4E-07	5.9E-08	2.1E-07	1.7E-08	-	-	8.5E-07	6.8E-08	8.5E-07	6.8E-08
Xylenes (total)	1.9E-07	1.5E-08	5.2E-08	4.2E-09	-	-	-	-	-	-
SVOCs										
2-Methylnaphthalene	-	-	-	-	-	-	-	-	-	-
Acenaphthene	3.7E-07	2.9E-08	1.3E-07	1.1E-08	6.6E-12	5.3E-13	-	-	-	-
Acenaphthylene	3.1E-07	2.5E-08	1.1E-07	9.0E-09	5.6E-12	4.5E-13	-	-	-	-
Anthracene	3.0E-07	2.4E-08	1.1E-07	8.7E-09	5.4E-12	4.3E-13	-	-	-	-
Benzo(a)anthracene	5.4E-07	4.3E-08	2.0E-07	1.6E-08	9.8E-12	7.8E-13	-	-	-	-
Benzo(a)pyrene	5.4E-07	4.3E-08	2.0E-07	1.6E-08	9.8E-12	7.8E-13	-	-	-	-
Benzo(b)fluoranthene	9.7E-07	7.8E-08	3.5E-07	2.8E-08	1.7E-11	1.4E-12	-	-	-	-
Benzo(g,h,i)perylene	3.3E-07	2.6E-08	1.2E-07	9.6E-09	5.9E-12	4.7E-13	-	-	-	-
Benzo(k)fluoranthene	3.1E-07	2.5E-08	1.1E-07	9.0E-09	5.6E-12	4.5E-13	-	-	-	-
Chrysene	7.9E-07	6.3E-08	2.9E-07	2.3E-08	1.4E-11	1.1E-12	-	-	-	-
Dibenz(a,h)anthracene	3.1E-07	2.5E-08	1.1E-07	9.0E-09	5.6E-12	4.5E-13	-	-	-	-
Dibenzofuran	-	-	-	-	-	-	-	-	-	-
Fluoranthene	1.4E-06	1.1E-07	5.0E-07	4.0E-08	2.5E-11	2.0E-12	-	-	-	-
Fluorene	3.6E-07	2.9E-08	1.3E-07	1.1E-08	6.5E-12	5.2E-13	-	-	-	-
Indeno(1,2,3-cd)pyrene	4.9E-07	4.0E-08	1.8E-07	1.4E-08	8.9E-12	7.1E-13	-	-	-	-
Naphthalene	-	-	-	-	-	-	-	-	-	-
Phenanthrene	7.3E-07	5.9E-08	2.7E-07	2.1E-08	1.3E-11	1.1E-12	-	-	-	-
Pyrene	5.7E-07	4.6E-08	2.1E-07	1.7E-08	1.0E-11	8.2E-13	-	-	-	-
Total Petroleum Hydrocarbons										
C11-C14(Kerosene Range)	1.5E-04	1.2E-05	5.3E-05	4.3E-06	2.6E-09	2.1E-10	-	-	-	-
C14-C20(Diesel Range)	2.7E-05	2.2E-06	9.9E-06	7.9E-07	4.9E-10	3.9E-11	-	-	-	-
C20-C30(Lubricant Oil Range)	1.7E-03	1.4E-04	6.2E-04	5.0E-05	3.1E-08	2.5E-09	-	-	-	-

Spreadsheet C3-34a (4 of 4)

Estimated Human Intake for the Child Recreator - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Reasonable Maximum Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation of Indoor Air		Inhalation Ambient Air$_{s\text{-}gw}$	
	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)
PCDD/PCDFs										
2,3,7,8-TCDD	2.0E-12	1.6E-13	1.6E-13	1.3E-14	3.5E-17	2.8E-18	-	-	-	-
1,2,3,7,8-PeCDD	7.9E-12	6.4E-13	6.7E-13	5.3E-14	1.4E-16	1.1E-17	-	-	-	-
1,2,3,4,7,8-HxCDD	3.3E-11	2.6E-12	2.8E-12	2.2E-13	5.9E-16	4.8E-17	-	-	-	-
1,2,3,6,7,8-HxCDD	1.1E-10	8.6E-12	9.1E-12	7.3E-13	1.9E-15	1.6E-16	-	-	-	-
1,2,3,7,8,9-HxCDD	3.7E-11	2.9E-12	3.1E-12	2.5E-13	6.6E-16	5.3E-17	-	-	-	-
1,2,3,4,6,7,8-HpCDD	4.3E-09	3.5E-10	3.6E-10	2.9E-11	7.8E-14	6.2E-15	-	-	-	-
OCDD	6.2E-08	4.9E-09	5.2E-09	4.1E-10	1.1E-12	8.9E-14	-	-	-	-
2,3,7,8-TCDF	2.9E-12	2.3E-13	2.4E-13	1.9E-14	5.2E-17	4.1E-18	-	-	-	-
1,2,3,7,8-PeCDF	2.1E-12	1.7E-13	1.8E-13	1.4E-14	3.8E-17	3.0E-18	-	-	-	-
2,3,4,7,8-PeCDF	5.7E-12	4.6E-13	4.8E-13	3.9E-14	1.0E-16	8.2E-18	-	-	-	-
1,2,3,4,7,8-HxCDF	1.2E-11	9.8E-13	1.0E-12	8.2E-14	2.2E-16	1.8E-17	-	-	-	-
1,2,3,6,7,8-HxCDF	1.2E-11	9.2E-13	9.7E-13	7.8E-14	2.1E-16	1.7E-17	-	-	-	-
2,3,4,6,7,8-HxCDF	3.2E-11	2.6E-12	2.7E-12	2.2E-13	5.8E-16	4.6E-17	-	-	-	-
1,2,3,7,8,9-HxCDF	3.5E-12	2.8E-13	3.0E-13	2.4E-14	6.4E-17	5.1E-18	-	-	-	-
1,2,3,4,6,7,8-HpCDF	3.5E-10	2.8E-11	2.9E-11	2.4E-12	6.3E-15	5.0E-16	-	-	-	-
1,2,3,4,7,8,9-HpCDF	3.4E-11	2.7E-12	2.8E-12	2.3E-13	6.1E-16	4.9E-17	-	-	-	-
OCDF	8.7E-10	6.9E-11	7.3E-11	5.8E-12	1.6E-14	1.2E-15	-	-	-	-
PCBs										
Aroclor-1254	1.6E-06	1.3E-07	6.2E-07	4.9E-08	2.8E-11	2.3E-12	-	-	-	-
Aroclor-1260	2.7E-05	2.1E-06	1.0E-05	8.4E-07	4.8E-10	3.8E-11	-	-	-	-
PCB-105	2.1E-09	1.6E-10	8.1E-10	6.5E-11	3.7E-14	3.0E-15	-	-	-	-
PCB-114	3.7E-11	2.9E-12	1.4E-11	1.1E-12	6.6E-16	5.3E-17	-	-	-	-
PCB-118	4.1E-09	3.3E-10	1.6E-09	1.3E-10	7.4E-14	5.9E-15	-	-	-	-
PCB-123	5.8E-11	4.7E-12	2.3E-11	1.8E-12	1.1E-15	8.4E-17	-	-	-	-
PCB-126	1.6E-10	1.3E-11	6.3E-11	5.0E-12	2.9E-15	2.3E-16	-	-	-	-
PCB-156	1.4E-09	1.1E-10	5.4E-10	4.3E-11	2.5E-14	2.0E-15	-	-	-	-
PCB-157	6.2E-10	4.9E-11	2.4E-10	1.9E-11	1.1E-14	8.9E-16	-	-	-	-
PCB-167	1.1E-09	8.6E-11	4.2E-10	3.4E-11	1.9E-14	1.5E-15	-	-	-	-
PCB-169	1.6E-11	1.3E-12	6.3E-12	5.0E-13	2.9E-16	2.3E-17	-	-	-	-
PCB-189	1.6E-10	1.3E-11	6.3E-11	5.0E-12	2.9E-15	2.3E-16	-	-	-	-
PCB-77	3.2E-10	2.6E-11	1.3E-10	1.0E-11	5.8E-15	4.6E-16	-	-	-	-
PCB-81	5.7E-11	4.5E-12	2.2E-11	1.8E-12	1.0E-15	8.2E-17	-	-	-	-

Notes:
Inhalation Ambient Air $_{s\text{-}gw}$ - Exposure associated with ambient air concentrations of COPCs modeled from soil or groundwater.
ADD - Average daily dose, as defined in the SRAM (MWH 2005).
LADD - Lifetime average daily dose, as defined in the SRAM (MWH 2005).
The chemicals presented in this table are comprehensive for all media sampled. Not all chemicals were analyzed for or detected in all media.
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCDD/PCDF - Polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.
PCB - polychlorinated biphenyls
COPC - chemical of potential concern
"-" indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
mg/kg-day - milligrams per kilogram per day

Spreadsheet C3-33b (1 of 4)

Estimated Human Intake for the Adult Recreator - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Central Tendancy Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation Ambient Air_s		Inhalation Ambient Air_{gw}		Surface Water Ingestion		Surface Water Dermal Contact	
	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)
Inorganic Compounds														
Aluminum	-	-	-	-	-	-	-	-	-	-	5.0E-05	6.0E-06	9.1E-06	1.1E-06
Antimony	-	-	-	-	-	-	-	-	-	-	4.4E-08	5.3E-09	8.0E-09	9.6E-10
Arsenic	-	-	-	-	-	-	-	-	-	-	3.3E-07	4.0E-08	6.0E-08	7.2E-09
Barium	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Boron	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Cadmium	1.2E-08	1.4E-09	1.3E-11	1.6E-12	5.1E-13	6.1E-14	-	-	-	-	7.4E-09	8.9E-10	1.4E-09	1.6E-10
Chromium	-	-	-	-	-	-	-	-	-	-	1.1E-07	1.4E-08	2.0E-08	2.5E-09
Copper	4.9E-07	5.8E-08	5.5E-09	6.6E-10	2.1E-11	2.5E-12	-	-	-	-	2.1E-07	2.6E-08	3.9E-08	4.7E-09
Fluoride	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Lead	4.5E-07	5.5E-08	5.2E-09	6.2E-10	2.0E-11	2.4E-12	-	-	-	-	3.9E-08	4.7E-09	7.2E-10	8.6E-11
Mercury	1.0E-07	1.3E-08	1.2E-09	1.4E-10	4.5E-12	5.4E-13	-	-	-	-	5.8E-09	6.9E-10	1.1E-09	1.3E-10
Methyl Mercury	8.5E-11	1.0E-11	9.7E-13	1.2E-13	3.7E-15	4.4E-16	-	-	-	-	-	-	-	-
Nickel	-	-	-	-	-	-	-	-	-	-	2.0E-07	2.4E-08	7.3E-09	8.7E-10
Nitrate	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Silver	5.0E-08	6.0E-09	5.7E-10	6.8E-11	2.2E-12	2.6E-13	-	-	-	-	-	-	-	-
Thallium	1.6E-08	1.9E-09	1.8E-10	2.2E-11	7.0E-13	8.4E-14	-	-	-	-	1.0E-08	1.2E-09	1.9E-09	2.2E-10
Vanadium	-	-	-	-	-	-	-	-	-	-	2.0E-07	2.3E-08	3.6E-08	4.3E-09
Zinc	4.1E-06	4.9E-07	4.7E-08	5.6E-09	-	-	-	-	-	-	-	-	-	-
VOCs														
1,1,1-Trichloroethane	-	-	-	-	-	-	-	-	-	-	3.7E-08	4.5E-09	0.0E+00	0.0E+00
1,1,2-Trichloro-1,2,2-trifluoroethane	5.9E-10	7.0E-11	6.7E-11	8.0E-12	-	-	-	-	-	-	-	-	-	-
1,1-Dichloroethane	-	-	-	-	-	-	1.4E-08	1.7E-09	1.4E-08	1.7E-09	-	-	-	-
1,2-Dichloroethane	-	-	-	-	-	-	3.4E-09	4.0E-10	3.4E-09	4.0E-10	-	-	-	-
1,2-Dichloroethene (total)	-	-	-	-	-	-	-	-	-	-	-	-	-	-
1-Chlorohexane	-	-	-	-	-	-	-	-	-	-	-	-	-	-
2-Butanone	1.0E-09	1.3E-10	1.2E-10	1.4E-11	-	-	-	-	-	-	-	-	-	-
2-Hexanone	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Acetone	5.4E-08	6.4E-09	6.1E-09	7.3E-10	-	-	1.3E-10	1.5E-11	1.3E-10	1.5E-11	-	-	-	-
Benzene	-	-	-	-	-	-	1.6E-08	2.0E-09	1.6E-08	2.0E-09	-	-	-	-
Carbon disulfide	-	-	-	-	-	-	-	-	1.1E-07	1.4E-08	-	-	-	-
Chloromethane	-	-	-	-	-	-	-	-	4.3E-08	5.2E-09	-	-	-	-
cis-1,2-Dichloroethene	-	-	-	-	-	-	1.0E-08	1.2E-09	1.0E-08	1.2E-09	-	-	-	-
Ethylbenzene	-	-	-	-	-	-	-	-	-	-	-	-	-	-
m,p-Xylene	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Methylene chloride	5.0E-10	6.0E-11	5.7E-11	6.8E-12	-	-	7.8E-09	9.3E-10	7.8E-09	9.3E-10	-	-	-	-
Tetrachloroethene	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Toluene	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Trichloroethene	-	-	-	-	-	-	2.7E-08	3.2E-09	2.7E-08	3.2E-09	3.2E-08	3.9E-09	7.0E-08	8.4E-09
Xylenes (total)	-	-	-	-	-	-	-	-	-	-	-	-	-	-
SVOCs														
2-Methylnaphthalene	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Acenaphthene	1.3E-09	1.5E-10	1.9E-10	2.3E-11	5.6E-14	6.7E-15	-	-	-	-	-	-	-	-
Acenaphthylene	2.3E-10	2.7E-11	3.4E-11	4.0E-12	9.8E-15	1.2E-15	-	-	-	-	-	-	-	-
Anthracene	8.7E-10	1.0E-10	1.3E-10	1.5E-11	3.8E-14	4.5E-15	-	-	-	-	-	-	-	-
Benzo(a)anthracene	1.4E-10	1.7E-11	2.1E-11	2.5E-12	6.0E-15	7.2E-16	-	-	-	-	-	-	-	-
Benzo(a)pyrene	1.5E-10	1.8E-11	2.2E-11	2.6E-12	6.3E-15	7.6E-16	-	-	-	-	-	-	-	-
Benzo(e)pyrene	9.7E-10	1.2E-10	1.4E-10	1.7E-11	4.2E-14	5.0E-15	-	-	-	-	-	-	-	-
Benzo(b)fluoranthene	2.1E-10	2.5E-11	3.1E-11	3.8E-12	9.2E-15	1.1E-15	-	-	-	-	-	-	-	-
Benzo(g,h,i)perylene	5.8E-10	7.0E-11	8.7E-11	1.0E-11	2.5E-14	3.0E-15	-	-	-	-	-	-	-	-
Benzo(k)fluoranthene	1.4E-10	1.6E-11	2.0E-11	2.4E-12	5.9E-15	7.1E-16	-	-	-	-	-	-	-	-
Chrysene	2.5E-10	3.0E-11	3.7E-11	4.4E-12	1.1E-14	1.3E-15	-	-	-	-	-	-	-	-
Dibenz(a,h)anthracene	9.2E-11	1.1E-11	1.4E-11	1.6E-12	4.0E-15	4.8E-16	-	-	-	-	-	-	-	-
Dibenzofuran	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Fluoranthene	2.8E-10	3.3E-11	4.1E-11	4.9E-12	1.2E-14	1.4E-15	-	-	-	-	-	-	-	-
Fluorene	1.3E-09	1.5E-10	1.9E-10	2.3E-11	5.5E-14	6.6E-15	-	-	-	-	-	-	-	-
Indeno(1,2,3-cd)pyrene	1.3E-10	1.6E-11	2.0E-11	2.4E-12	5.8E-15	7.0E-16	-	-	-	-	-	-	-	-
Naphthalene	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Perylene	5.5E-10	6.6E-11	8.2E-11	9.8E-12	2.4E-14	2.9E-15	-	-	-	-	-	-	-	-
Phenanthrene	3.5E-09	4.2E-10	5.1E-10	6.2E-11	1.5E-13	1.8E-14	-	-	-	-	-	-	-	-
Pyrene	4.0E-10	4.8E-11	6.0E-11	7.2E-12	1.7E-14	2.1E-15	-	-	-	-	-	-	-	-

Spreadsheet C3-33b (2 of 4)

Estimated Human Intake for the Adult Recreator - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Central Tendancy Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation Ambient Air_s		Inhalation Ambient Air_{gw}		Surface Water Ingestion		Surface Water Dermal Contact	
	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)
Total Petroleum Hydrocarbons														
C11-C14(Kerosene Range)	4.9E-07	5.9E-08	7.2E-08	8.7E-09	2.1E-11	2.5E-12	-	-	-	-	-	-	-	-
C14-C20(Diesel Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-
C20-C30(Lubricant Oil Range)	3.8E-06	4.6E-07	5.7E-07	6.8E-08	1.7E-10	2.0E-11	-	-	-	-	-	-	-	-
PCDD/PCDFs														
2,3,7,8-TCDD	9.1E-15	1.1E-15	3.1E-16	3.7E-17	3.9E-19	4.7E-20	-	-	-	-	-	-	-	-
1,2,3,7,8-PeCDD	3.6E-14	4.3E-15	1.2E-15	1.5E-16	1.6E-18	1.9E-19	-	-	-	-	8.2E-14	9.9E-15	1.2E-11	1.5E-12
1,2,3,4,7,8-HxCDD	1.0E-13	1.3E-14	3.6E-15	4.3E-16	4.5E-18	5.4E-19	-	-	-	-	1.2E-13	1.5E-14	1.8E-11	2.1E-12
1,2,3,6,7,8-HxCDD	5.4E-13	6.5E-14	1.9E-14	2.2E-15	2.3E-17	2.8E-18	-	-	-	-	1.3E-12	1.6E-13	1.9E-10	2.3E-11
1,2,3,7,8,9-HxCDD	2.2E-13	2.7E-14	7.6E-15	9.1E-16	9.6E-18	1.2E-18	-	-	-	-	6.8E-13	8.2E-14	1.0E-10	1.2E-11
1,2,3,4,6,7,8-HpCDD	1.5E-11	1.8E-12	5.2E-13	6.3E-14	6.6E-16	8.0E-17	-	-	-	-	1.1E-11	1.3E-12	1.6E-09	1.9E-10
OCDD	2.4E-10	2.9E-11	8.3E-12	1.0E-12	1.1E-14	1.3E-15	-	-	-	-	8.7E-11	1.0E-11	1.3E-08	1.5E-09
2,3,7,8-TCDF	2.3E-14	2.8E-15	7.9E-16	9.4E-17	1.0E-18	1.2E-19	-	-	-	-	1.9E-13	2.3E-14	2.9E-11	3.4E-12
1,2,3,7,8-PeCDF	8.6E-15	1.0E-15	2.9E-16	3.5E-17	3.7E-19	4.5E-20	-	-	-	-	3.5E-13	4.3E-14	5.2E-11	6.2E-12
2,3,4,7,8-PeCDF	2.6E-14	3.2E-15	9.0E-16	1.1E-16	1.1E-18	1.4E-19	-	-	-	-	8.8E-13	1.1E-13	1.3E-10	1.6E-11
1,2,3,4,7,8-HxCDF	5.7E-14	6.8E-15	1.9E-15	2.3E-16	2.4E-18	2.9E-19	-	-	-	-	9.1E-13	1.1E-13	1.3E-10	1.6E-11
1,2,3,6,7,8-HxCDF	4.6E-14	5.5E-15	1.6E-15	1.9E-16	2.0E-18	2.4E-19	-	-	-	-	5.4E-13	6.5E-14	7.9E-11	9.5E-12
2,3,4,6,7,8-HxCDF	8.8E-14	1.1E-14	3.0E-15	3.6E-16	3.8E-18	4.6E-19	-	-	-	-	9.3E-13	1.1E-13	1.4E-10	1.6E-11
1,2,3,7,8,9-HxCDF	7.8E-15	9.3E-16	2.7E-16	3.2E-17	3.4E-19	4.0E-20	-	-	-	-	8.9E-13	1.1E-13	1.3E-10	1.6E-11
1,2,3,4,6,7,8-HpCDF	1.8E-12	2.2E-13	6.1E-14	7.4E-15	7.8E-17	9.3E-18	-	-	-	-	1.3E-12	1.6E-13	2.0E-10	2.4E-11
1,2,3,4,7,8,9-HpCDF	1.5E-13	1.8E-14	5.3E-15	6.3E-16	6.7E-18	8.0E-19	-	-	-	-	6.8E-13	8.2E-14	1.0E-10	1.2E-11
OCDF	4.9E-12	5.9E-13	1.7E-13	2.0E-14	2.1E-16	2.5E-17	-	-	-	-	3.5E-12	4.2E-13	5.2E-10	6.2E-11
PCBs														
Aroclor-1254	8.4E-09	1.0E-09	1.3E-09	1.6E-10	3.6E-13	4.3E-14	-	-	-	-	-	-	-	-
Aroclor-1260	7.2E-08	8.6E-09	1.1E-08	1.4E-09	3.1E-12	3.7E-13	-	-	-	-	-	-	-	-
PCB-105	6.1E-12	7.4E-13	9.8E-13	1.2E-13	2.7E-16	3.2E-17	-	-	-	-	-	-	-	-
PCB-114	1.2E-13	1.4E-14	1.9E-14	2.2E-15	5.1E-18	6.1E-19	-	-	-	-	-	-	-	-
PCB-118	1.2E-11	1.5E-12	2.0E-12	2.4E-13	5.4E-16	6.4E-17	-	-	-	-	-	-	-	-
PCB-123	1.7E-13	2.1E-14	2.8E-14	3.3E-15	7.5E-18	9.0E-19	-	-	-	-	-	-	-	-
PCB-126	4.7E-13	5.7E-14	7.5E-14	9.0E-15	2.0E-17	2.5E-18	-	-	-	-	-	-	-	-
PCB-156	4.0E-12	4.8E-13	6.4E-13	7.7E-14	1.7E-16	2.1E-17	-	-	-	-	-	-	-	-
PCB-157	1.8E-12	2.1E-13	2.8E-13	3.4E-14	7.7E-17	9.3E-18	-	-	-	-	-	-	-	-
PCB-167	3.1E-12	3.7E-13	4.9E-13	5.9E-14	1.3E-16	1.6E-17	-	-	-	-	-	-	-	-
PCB-169	4.6E-14	5.5E-15	7.4E-15	8.9E-16	2.0E-18	2.4E-19	-	-	-	-	-	-	-	-
PCB-189	4.6E-13	5.5E-14	7.4E-14	8.8E-15	2.0E-17	2.4E-18	-	-	-	-	-	-	-	-
PCB-77	9.4E-13	1.1E-13	1.5E-13	1.8E-14	4.1E-17	4.9E-18	-	-	-	-	-	-	-	-
PCB-81	1.7E-13	2.0E-14	2.7E-14	3.2E-15	7.3E-18	8.7E-19	-	-	-	-	-	-	-	-

Spreadsheet C3-33b (3 of 4)

Estimated Human Intake for the Adult Recreator - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Reasonable Maximum Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation Ambient Air_s		Inhalation Ambient Air_{gw}		Surface Water Ingestion		Surface Water Dermal Contact	
	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)
Inorganic Compounds														
Aluminum	-	-	-	-	-	-	-	-	-	-	3.3E-04	1.1E-04	1.2E-04	1.9E-05
Antimony	-	-	-	-	-	-	-	-	-	-	3.0E-07	9.6E-08	1.1E-07	1.8E-08
Arsenic	-	-	-	-	-	-	-	-	-	-	2.2E-06	6.9E-07	7.8E-07	1.3E-07
Barium	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Boron	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Cadmium	8.1E-08	2.6E-08	4.2E-09	1.3E-09	1.8E-12	5.6E-13	-	-	-	-	5.5E-08	1.8E-08	2.0E-08	3.2E-09
Chromium	-	-	-	-	-	-	-	-	-	-	6.7E-07	2.1E-07	2.4E-07	3.9E-08
Copper	3.9E-06	1.2E-06	2.0E-06	6.4E-07	8.4E-11	2.7E-11	-	-	-	-	1.1E-06	3.6E-07	4.1E-07	6.5E-08
Fluoride	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Lead	2.5E-06	7.9E-07	1.3E-06	4.1E-07	5.4E-11	1.7E-11	-	-	-	-	2.0E-07	6.5E-08	7.4E-09	1.2E-09
Mercury	1.1E-06	3.4E-07	5.5E-07	1.8E-07	2.3E-11	7.4E-12	-	-	-	-	2.7E-08	8.5E-09	9.7E-09	1.5E-09
Methyl Mercury	7.1E-10	2.3E-10	3.6E-10	1.2E-10	1.5E-14	4.9E-15	-	-	-	-	-	-	-	-
Nickel	-	-	-	-	-	-	-	-	-	-	8.0E-07	2.6E-07	5.8E-08	9.3E-09
Nitrate	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Silver	5.4E-07	1.7E-07	2.7E-07	8.8E-08	1.2E-11	3.7E-12	-	-	-	-	-	-	-	-
Thallium	6.5E-08	2.1E-08	3.3E-08	1.1E-08	1.4E-12	4.5E-13	-	-	-	-	4.1E-08	1.3E-08	1.5E-08	2.4E-09
Vanadium	-	-	-	-	-	-	-	-	-	-	1.1E-06	3.6E-07	4.0E-07	6.5E-08
Zinc	3.7E-05	1.2E-05	1.9E-05	6.1E-06	-	-	-	-	-	-	-	-	-	-
VOCs														
1,1,1-Trichloroethane	-	-	-	-	-	-	-	-	-	-	1.5E-07	4.8E-08	0.0E+00	0.0E+00
1,1,2-Trichloro-1,2,2-trifluoroethane	2.3E-09	7.5E-10	1.2E-08	3.9E-09	-	-	-	-	-	-	-	-	-	-
1,1-Dichloroethane	-	-	-	-	-	-	2.9E-08	9.3E-09	2.9E-08	9.3E-09	-	-	-	-
1,2-Dichloroethane	-	-	-	-	-	-	6.7E-09	2.1E-09	6.7E-09	2.1E-09	-	-	-	-
1,2-Dichloroethene (total)	-	-	-	-	-	-	-	-	-	-	-	-	-	-
1-Chlorohexane	-	-	-	-	-	-	-	-	-	-	-	-	-	-
2-Butanone	6.8E-09	2.2E-09	3.5E-08	1.1E-08	-	-	-	-	-	-	-	-	-	-
2-Hexanone	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Acetone	1.0E-06	3.3E-07	5.2E-06	1.7E-06	-	-	2.5E-10	8.0E-11	2.5E-10	8.0E-11	-	-	-	-
Benzene	-	-	-	-	-	-	3.3E-08	1.1E-08	3.3E-08	1.1E-08	-	-	-	-
Carbon disulfide	-	-	-	-	-	-	-	-	2.3E-07	7.2E-08	-	-	-	-
Chloromethane	-	-	-	-	-	-	-	-	8.6E-08	2.8E-08	-	-	-	-
cis-1,2-Dichloroethene	-	-	-	-	-	-	2.1E-08	6.6E-09	2.1E-08	6.6E-09	-	-	-	-
Ethylbenzene	-	-	-	-	-	-	-	-	-	-	-	-	-	-
m,p-Xylene	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Methylene chloride	2.5E-09	8.1E-10	1.3E-08	4.2E-09	-	-	1.6E-08	5.0E-09	1.6E-08	5.0E-09	-	-	-	-
Tetrachloroethene	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Toluene	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Trichloroethene	-	-	-	-	-	-	5.4E-08	1.7E-08	5.4E-08	1.7E-08	1.3E-07	4.1E-08	5.6E-07	9.0E-08
Xylenes (total)	-	-	-	-	-	-	-	-	-	-	-	-	-	-
SVOCs														
2-Methylnaphthalene	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Acenaphthene	2.2E-08	6.9E-09	1.4E-07	4.6E-08	4.7E-13	1.5E-13	-	-	-	-	-	-	-	-
Acenaphthylene	3.0E-09	9.7E-10	2.0E-08	6.5E-09	6.6E-14	2.1E-14	-	-	-	-	-	-	-	-
Anthracene	1.4E-08	4.6E-09	9.5E-08	3.0E-08	3.1E-13	9.9E-14	-	-	-	-	-	-	-	-
Benzo(a)anthracene	1.7E-09	5.5E-10	1.1E-08	3.7E-09	3.7E-14	1.2E-14	-	-	-	-	-	-	-	-
Benzo(a)pyrene	1.7E-09	5.6E-10	1.2E-08	3.7E-09	3.8E-14	1.2E-14	-	-	-	-	-	-	-	-
Benzo(e)pyrene	1.3E-08	4.2E-09	8.7E-08	2.8E-08	2.8E-13	9.1E-14	-	-	-	-	-	-	-	-
Benzo(b)fluoranthene	2.2E-09	6.9E-10	1.4E-08	4.6E-09	4.7E-14	1.5E-14	-	-	-	-	-	-	-	-
Benzo(g,h,i)perylene	8.7E-09	2.8E-09	5.8E-08	1.9E-08	1.9E-13	6.0E-14	-	-	-	-	-	-	-	-
Benzo(k)fluoranthene	1.6E-09	5.2E-10	1.1E-08	3.5E-09	3.5E-14	1.1E-14	-	-	-	-	-	-	-	-
Chrysene	2.4E-09	7.6E-10	1.6E-08	5.1E-09	5.2E-14	1.7E-14	-	-	-	-	-	-	-	-
Dibenz(a,h)anthracene	1.3E-09	4.3E-10	8.9E-09	2.9E-09	2.9E-14	9.3E-15	-	-	-	-	-	-	-	-
Dibenzofuran	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Fluoranthene	2.4E-09	7.5E-10	1.6E-08	5.0E-09	5.1E-14	1.6E-14	-	-	-	-	-	-	-	-
Fluorene	2.1E-08	6.9E-09	1.4E-07	4.6E-08	4.7E-13	1.5E-13	-	-	-	-	-	-	-	-
Indeno(1,2,3-cd)pyrene	1.7E-09	5.3E-10	1.1E-08	3.5E-09	3.6E-14	1.1E-14	-	-	-	-	-	-	-	-
Naphthalene	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Perylene	7.5E-09	2.4E-09	5.0E-08	1.6E-08	1.6E-13	5.2E-14	-	-	-	-	-	-	-	-
Phenanthrene	5.8E-08	1.9E-08	3.9E-07	1.2E-07	1.3E-12	4.0E-13	-	-	-	-	-	-	-	-
Pyrene	5.5E-09	1.8E-09	3.7E-08	1.2E-08	1.2E-13	3.8E-14	-	-	-	-	-	-	-	-

Spreadsheet C3-33b (4 of 4)

Estimated Human Intake for the Adult Recreator - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Reasonable Maximum Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation Ambient Air_s		Inhalation Ambient Air_{gw}		Surface Water Ingestion		Surface Water Dermal Contact	
	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)
Total Petroleum Hydrocarbons														
C11-C14(Kerosene Range)	7.8E-06	2.5E-06	5.2E-05	1.7E-05	1.7E-10	5.4E-11	-	-	-	-	-	-	-	-
C14-C20(Diesel Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-
C20-C30(Lubricant Oil Range)	9.2E-05	2.9E-05	6.1E-04	2.0E-04	2.0E-09	6.4E-10	-	-	-	-	-	-	-	-
PCDD/PCDFs														
2,3,7,8-TCDD	7.8E-14	2.5E-14	1.2E-13	3.9E-14	1.7E-18	5.4E-19	-	-	-	-	-	-	-	-
1,2,3,7,8-PeCDD	2.9E-13	9.4E-14	4.5E-13	1.4E-13	6.4E-18	2.0E-18	-	-	-	-	3.3E-13	1.1E-13	9.7E-11	1.5E-11
1,2,3,4,7,8-HxCDD	8.2E-13	2.6E-13	1.3E-12	4.0E-13	1.8E-17	5.7E-18	-	-	-	-	4.9E-13	1.6E-13	1.4E-10	2.3E-11
1,2,3,6,7,8-HxCDD	3.9E-12	1.3E-12	6.0E-12	1.9E-12	8.5E-17	2.7E-17	-	-	-	-	1.3E-11	4.1E-12	3.8E-09	6.1E-10
1,2,3,7,8,9-HxCDD	2.0E-12	6.3E-13	3.0E-12	9.6E-13	4.2E-17	1.4E-17	-	-	-	-	2.7E-12	8.8E-13	8.1E-10	1.3E-10
1,2,3,4,6,7,8-HpCDD	9.8E-11	3.1E-11	1.5E-10	4.8E-11	2.1E-15	6.8E-16	-	-	-	-	3.7E-10	1.2E-10	1.1E-07	1.8E-08
OCDD	1.4E-09	4.6E-10	2.2E-09	7.0E-10	3.1E-14	9.9E-15	-	-	-	-	5.2E-10	1.7E-10	1.5E-07	2.4E-08
2,3,7,8-TCDF	1.5E-13	4.9E-14	2.4E-13	7.6E-14	3.3E-18	1.1E-18	-	-	-	-	8.8E-13	2.8E-13	2.6E-10	4.1E-11
1,2,3,7,8-PeCDF	7.6E-14	2.4E-14	1.2E-13	3.7E-14	1.6E-18	5.3E-19	-	-	-	-	1.4E-12	4.5E-13	4.2E-10	6.7E-11
2,3,4,7,8-PeCDF	1.9E-13	6.2E-14	3.0E-13	9.6E-14	4.2E-18	1.3E-18	-	-	-	-	3.9E-12	1.3E-12	1.2E-09	1.8E-10
1,2,3,4,7,8-HxCDF	3.5E-13	1.1E-13	5.5E-13	1.7E-13	7.7E-18	2.5E-18	-	-	-	-	4.2E-12	1.3E-12	1.2E-09	2.0E-10
1,2,3,6,7,8-HxCDF	3.6E-13	1.1E-13	5.5E-13	1.8E-13	7.8E-18	2.5E-18	-	-	-	-	2.2E-12	6.9E-13	6.3E-10	1.0E-10
2,3,4,6,7,8-HxCDF	5.9E-13	1.9E-13	9.1E-13	2.9E-13	1.3E-17	4.1E-18	-	-	-	-	4.2E-12	1.3E-12	1.2E-09	2.0E-10
1,2,3,7,8,9-HxCDF	3.4E-14	1.1E-14	5.3E-14	1.7E-14	7.4E-19	2.4E-19	-	-	-	-	4.5E-12	1.4E-12	1.3E-09	2.1E-10
1,2,3,4,6,7,8-HpCDF	9.8E-12	3.1E-12	1.5E-11	4.8E-12	2.1E-16	6.8E-17	-	-	-	-	1.0E-11	3.2E-12	2.9E-09	4.7E-10
1,2,3,4,7,8,9-HpCDF	8.3E-13	2.7E-13	1.3E-12	4.1E-13	1.8E-17	5.8E-18	-	-	-	-	2.7E-12	8.8E-13	8.1E-10	1.3E-10
OCDF	2.9E-11	9.4E-12	4.5E-11	1.4E-11	6.4E-16	2.0E-16	-	-	-	-	2.6E-11	8.4E-12	7.7E-09	1.2E-09
PCBs														
Aroclor-1254	8.4E-08	2.7E-08	6.0E-07	1.9E-07	1.8E-12	5.8E-13	-	-	-	-	-	-	-	-
Aroclor-1260	1.5E-06	4.9E-07	1.1E-05	3.5E-06	3.3E-11	1.1E-11	-	-	-	-	-	-	-	-
PCB-105	1.2E-10	4.0E-11	9.0E-10	2.9E-10	2.7E-15	8.7E-16	-	-	-	-	-	-	-	-
PCB-114	2.2E-12	7.1E-13	1.6E-11	5.1E-12	4.8E-17	1.5E-17	-	-	-	-	-	-	-	-
PCB-118	2.5E-10	8.0E-11	1.8E-09	5.7E-10	5.4E-15	1.7E-15	-	-	-	-	-	-	-	-
PCB-123	3.5E-12	1.1E-12	2.5E-11	8.1E-12	7.7E-17	2.5E-17	-	-	-	-	-	-	-	-
PCB-126	9.7E-12	3.1E-12	7.0E-11	2.2E-11	2.1E-16	6.7E-17	-	-	-	-	-	-	-	-
PCB-156	8.3E-11	2.7E-11	6.0E-10	1.9E-10	1.8E-15	5.8E-16	-	-	-	-	-	-	-	-
PCB-157	3.7E-11	1.2E-11	2.7E-10	8.6E-11	8.1E-16	2.6E-16	-	-	-	-	-	-	-	-
PCB-167	6.5E-11	2.1E-11	4.7E-10	1.5E-10	1.4E-15	4.5E-16	-	-	-	-	-	-	-	-
PCB-169	9.7E-13	3.1E-13	7.0E-12	2.2E-12	2.1E-17	6.7E-18	-	-	-	-	-	-	-	-
PCB-189	9.7E-12	3.1E-12	7.0E-11	2.2E-11	2.1E-16	6.7E-17	-	-	-	-	-	-	-	-
PCB-77	1.9E-11	6.2E-12	1.4E-10	4.5E-11	4.2E-16	1.3E-16	-	-	-	-	-	-	-	-
PCB-81	3.4E-12	1.1E-12	2.5E-11	7.9E-12	7.4E-17	2.4E-17	-	-	-	-	-	-	-	-

Notes:
Inhalation Ambient Air_{s-gw} - Exposure associated with ambient air concentrations of COPCs modeled from soil or groundwater.
ADD - Average daily dose, as defined in the SRAM (MWH 2005).
LADD - Lifetime average daily dose, as defined in the SRAM (MWH 2005).
The chemicals presented in this table are comprehensive for all media sampled. Not all chemicals were analyzed for or detected in all media.
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCDD/PCDF - Polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.
PCB - polychlorinated biphenyls
COPC - chemical of potential concern
"-" indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
mg/kg-day - milligrams per kilogram per day

Spreadsheet C3-33a (1 of 4)

Estimated Human Intake for the Adult Recreator - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Central Tendancy Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation Ambient Air_s		Inhalation Ambient Air_{gw}	
	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)
Inorganic Compounds										
Cadmium	2.5E-08	3.0E-09	2.8E-11	3.4E-12	1.1E-12	1.3E-13	-	-	-	-
Copper	1.0E-06	1.2E-07	1.2E-08	1.4E-09	4.4E-11	5.3E-12	-	-	-	-
Fluoride	-	-	-	-	-	-	-	-	-	-
Lead	7.8E-07	9.4E-08	8.9E-09	1.1E-09	3.3E-11	4.0E-12	-	-	-	-
Mercury	9.3E-08	1.1E-08	1.1E-09	1.3E-10	4.0E-12	4.8E-13	-	-	-	-
Methyl Mercury	8.5E-11	1.0E-11	9.7E-13	1.2E-13	3.6E-15	4.4E-16	-	-	-	-
Nitrate	-	-	-	-	-	-	-	-	-	-
Silver	3.8E-08	4.5E-09	4.3E-10	5.2E-11	1.6E-12	1.9E-13	-	-	-	-
Thallium	1.6E-08	1.9E-09	1.8E-10	2.2E-11	6.9E-13	8.2E-14	-	-	-	-
Zinc	8.3E-06	1.0E-06	9.5E-08	1.1E-08	-	-	-	-	-	-
VOCs										
1,1,1-Trichloroethane	-	-	-	-	-	-	-	-	-	-
1,1,2-Trichloro-1,2,2-trifluoroethane	5.9E-10	7.0E-11	6.7E-11	8.0E-12	-	-	-	-	-	-
1,1-Dichloroethane	-	-	-	-	-	-	1.4E-08	1.7E-09	1.4E-08	1.7E-09
1,2-Dichloroethane	-	-	-	-	-	-	3.4E-09	4.0E-10	3.4E-09	4.0E-10
1,2-Dichloroethene (total)	1.4E-09	1.7E-10	1.6E-10	1.9E-11	-	-	-	-	-	-
1-Chlorohexane	-	-	-	-	-	-	-	-	-	-
2-Butanone	1.8E-09	2.2E-10	2.1E-10	2.5E-11	-	-	-	-	-	-
2-Hexanone	-	-	-	-	-	-	-	-	-	-
Acetone	3.3E-08	4.0E-09	3.8E-09	4.5E-10	-	-	1.3E-10	1.5E-11	1.3E-10	1.5E-11
Benzene	-	-	-	-	-	-	1.6E-08	2.0E-09	1.6E-08	2.0E-09
Carbon disulfide	-	-	-	-	-	-	-	-	1.1E-07	1.4E-08
Chloromethane	-	-	-	-	-	-	-	-	4.3E-08	5.2E-09
cis-1,2-Dichloroethene	-	-	-	-	-	-	1.0E-08	1.2E-09	1.0E-08	1.2E-09
Ethylbenzene	-	-	-	-	-	-	-	-	-	-
m,p-Xylene	-	-	-	-	-	-	-	-	-	-
Methylene chloride	6.4E-10	7.6E-11	7.3E-11	8.7E-12	-	-	7.8E-09	9.3E-10	7.8E-09	9.3E-10
Tetrachloroethene	1.0E-09	1.2E-10	1.2E-10	1.4E-11	-	-	-	-	-	-
Toluene	2.7E-09	3.3E-10	3.1E-10	3.8E-11	-	-	-	-	-	-
Trichloroethene	1.8E-09	2.2E-10	2.1E-10	2.5E-11	-	-	2.7E-08	3.2E-09	2.7E-08	3.2E-09
Xylenes (total)	1.2E-09	1.5E-10	1.4E-10	1.7E-11	-	-	-	-	-	-
SVOCs										
2-Methylnaphthalene	-	-	-	-	-	-	-	-	-	-
Acenaphthene	2.2E-09	2.6E-10	3.2E-10	3.8E-11	9.2E-14	1.1E-14	-	-	-	-
Acenaphthylene	1.5E-09	1.8E-10	2.2E-10	2.7E-11	6.4E-14	7.7E-15	-	-	-	-
Anthracene	1.9E-09	2.3E-10	2.8E-10	3.4E-11	8.1E-14	9.7E-15	-	-	-	-
Benzo(a)anthracene	1.8E-09	2.1E-10	2.6E-10	3.1E-11	7.5E-14	9.0E-15	-	-	-	-
Benzo(a)pyrene	1.8E-09	2.1E-10	2.6E-10	3.1E-11	7.5E-14	9.0E-15	-	-	-	-
Benzo(e)pyrene	9.1E-10	1.1E-10	1.4E-10	1.6E-11	3.9E-14	4.7E-15	-	-	-	-
Benzo(b)fluoranthene	2.4E-09	2.9E-10	3.5E-10	4.2E-11	1.0E-13	1.2E-14	-	-	-	-
Benzo(g,h,i)perylene	2.0E-09	2.4E-10	3.0E-10	3.6E-11	8.5E-14	1.0E-14	-	-	-	-
Benzo(k)fluoranthene	1.5E-09	1.7E-10	2.2E-10	2.6E-11	6.2E-14	7.4E-15	-	-	-	-
Chrysene	2.2E-09	2.6E-10	3.2E-10	3.9E-11	9.3E-14	1.1E-14	-	-	-	-
Dibenz(a,h)anthracene	1.4E-09	1.7E-10	2.1E-10	2.5E-11	6.1E-14	7.3E-15	-	-	-	-
Dibenzofuran	-	-	-	-	-	-	-	-	-	-
Fluoranthene	2.9E-09	3.5E-10	4.4E-10	5.2E-11	1.2E-13	1.5E-14	-	-	-	-
Fluorene	2.2E-09	2.6E-10	3.2E-10	3.8E-11	9.1E-14	1.1E-14	-	-	-	-
Indeno(1,2,3-cd)pyrene	1.7E-09	2.0E-10	2.5E-10	3.0E-11	7.1E-14	8.5E-15	-	-	-	-
Naphthalene	-	-	-	-	-	-	-	-	-	-
Perylene	5.2E-10	6.2E-11	7.7E-11	9.3E-12	2.2E-14	2.7E-15	-	-	-	-
Phenanthrene	3.9E-09	4.7E-10	5.8E-10	6.9E-11	1.7E-13	2.0E-14	-	-	-	-
Pyrene	2.6E-09	3.1E-10	3.9E-10	4.6E-11	1.1E-13	1.3E-14	-	-	-	-
Total Petroleum Hydrocarbons										
C11-C14(Kerosene Range)	4.7E-07	5.7E-08	7.0E-08	8.4E-09	2.0E-11	2.4E-12	-	-	-	-
C14-C20(Diesel Range)	3.6E-07	4.4E-08	5.4E-08	6.5E-09	1.6E-11	1.9E-12	-	-	-	-
C20-C30(Lubricant Oil Range)	3.6E-06	4.3E-07	5.3E-07	6.4E-08	1.5E-10	1.8E-11	-	-	-	-

Spreadsheet C3-33a (2 of 4)

Estimated Human Intake for the Adult Recreator - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Central Tendancy Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation Ambient Air_s		Inhalation Ambient Air_{gw}	
	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)
PCDD/PCDFs										
2,3,7,8-TCDD	1.3E-14	1.6E-15	4.6E-16	5.5E-17	5.7E-19	6.8E-20	-	-	-	-
1,2,3,7,8-PeCDD	5.4E-14	6.5E-15	1.8E-15	2.2E-16	2.3E-18	2.7E-19	-	-	-	-
1,2,3,4,7,8-HxCDD	2.0E-13	2.4E-14	6.9E-15	8.2E-16	8.5E-18	1.0E-18	-	-	-	-
1,2,3,6,7,8-HxCDD	7.7E-13	9.3E-14	2.6E-14	3.2E-15	3.3E-17	3.9E-18	-	-	-	-
1,2,3,7,8,9-HxCDD	2.9E-13	3.5E-14	9.9E-15	1.2E-15	1.2E-17	1.5E-18	-	-	-	-
1,2,3,4,6,7,8-HpCDD	2.8E-11	3.3E-12	9.5E-13	1.1E-13	1.2E-15	1.4E-16	-	-	-	-
OCDD	4.1E-10	4.9E-11	1.4E-11	1.7E-12	1.7E-14	2.1E-15	-	-	-	-
2,3,7,8-TCDF	2.7E-14	3.2E-15	9.2E-16	1.1E-16	1.1E-18	1.4E-19	-	-	-	-
1,2,3,7,8-PeCDF	1.4E-14	1.6E-15	4.6E-16	5.6E-17	5.8E-19	6.9E-20	-	-	-	-
2,3,4,7,8-PeCDF	4.0E-14	4.8E-15	1.4E-15	1.6E-16	1.7E-18	2.0E-19	-	-	-	-
1,2,3,4,7,8-HxCDF	8.7E-14	1.0E-14	3.0E-15	3.6E-16	3.7E-18	4.4E-19	-	-	-	-
1,2,3,6,7,8-HxCDF	7.6E-14	9.1E-15	2.6E-15	3.1E-16	3.2E-18	3.9E-19	-	-	-	-
2,3,4,6,7,8-HxCDF	1.9E-13	2.3E-14	6.4E-15	7.7E-16	8.0E-18	9.6E-19	-	-	-	-
1,2,3,7,8,9-HxCDF	1.8E-14	2.1E-15	6.0E-16	7.3E-17	7.5E-19	9.0E-20	-	-	-	-
1,2,3,4,6,7,8-HpCDF	2.6E-12	3.1E-13	8.8E-14	1.1E-14	1.1E-16	1.3E-17	-	-	-	-
1,2,3,4,7,8,9-HpCDF	2.4E-13	2.9E-14	8.1E-15	9.8E-16	1.0E-17	1.2E-18	-	-	-	-
OCDF	6.6E-12	7.9E-13	2.3E-13	2.7E-14	2.8E-16	3.4E-17	-	-	-	-
PCBs										
Aroclor-1254	7.9E-09	9.5E-10	1.3E-09	1.5E-10	3.4E-13	4.0E-14	-	-	-	-
Aroclor-1260	6.5E-08	7.8E-09	1.0E-08	1.2E-09	2.8E-12	3.3E-13	-	-	-	-
PCB-105	5.6E-12	6.7E-13	8.9E-13	1.1E-13	2.4E-16	2.8E-17	-	-	-	-
PCB-114	1.1E-13	1.3E-14	1.7E-14	2.0E-15	4.5E-18	5.4E-19	-	-	-	-
PCB-118	1.1E-11	1.3E-12	1.8E-12	2.2E-13	4.8E-16	5.7E-17	-	-	-	-
PCB-123	1.6E-13	1.9E-14	2.5E-14	3.0E-15	6.7E-18	8.0E-19	-	-	-	-
PCB-126	4.3E-13	5.1E-14	6.8E-14	8.2E-15	1.8E-17	2.2E-18	-	-	-	-
PCB-156	3.7E-12	4.4E-13	5.8E-13	7.0E-14	1.6E-16	1.9E-17	-	-	-	-
PCB-157	1.6E-12	1.9E-13	2.6E-13	3.1E-14	6.9E-17	8.2E-18	-	-	-	-
PCB-167	2.8E-12	3.4E-13	4.5E-13	5.4E-14	1.2E-16	1.4E-17	-	-	-	-
PCB-169	4.2E-14	5.0E-15	6.7E-15	8.0E-16	1.8E-18	2.1E-19	-	-	-	-
PCB-189	4.2E-13	5.0E-14	6.7E-14	8.0E-15	1.8E-17	2.1E-18	-	-	-	-
PCB-77	8.6E-13	1.0E-13	1.4E-13	1.6E-14	3.6E-17	4.4E-18	-	-	-	-
PCB-81	1.5E-13	1.8E-14	2.4E-14	2.9E-15	6.5E-18	7.8E-19	-	-	-	-

Spreadsheet C3-33a (3 of 4)

Estimated Human Intake for the Adult Recreator - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Reasonable Maximum Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation Ambient Air_s		Inhalation Ambient Air_{gw}	
	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)
Inorganic Compounds										
Cadmium	2.2E-07	7.1E-08	1.1E-08	3.6E-09	4.7E-12	1.5E-12	-	-	-	-
Copper	8.9E-06	2.9E-06	4.6E-06	1.5E-06	1.9E-10	6.1E-11	-	-	-	-
Fluoride	-	-	-	-	-	-	-	-	-	-
Lead	6.6E-06	2.1E-06	3.4E-06	1.1E-06	1.4E-10	4.5E-11	-	-	-	-
Mercury	8.6E-07	2.8E-07	4.4E-07	1.4E-07	1.8E-11	5.9E-12	-	-	-	-
Methyl Mercury	7.1E-10	2.3E-10	3.6E-10	1.2E-10	1.5E-14	4.8E-15	-	-	-	-
Nitrate	-	-	-	-	-	-	-	-	-	-
Silver	5.6E-07	1.8E-07	2.9E-07	9.2E-08	1.2E-11	3.8E-12	-	-	-	-
Thallium	6.5E-08	2.1E-08	3.3E-08	1.1E-08	1.4E-12	4.4E-13	-	-	-	-
Zinc	8.6E-05	2.7E-05	4.4E-05	1.4E-05	-	-	-	-	-	-
VOCs										
1,1,1-Trichloroethane	-	-	-	-	-	-	-	-	-	-
1,1,2-Trichloro-1,2,2-trifluoroethane	2.3E-09	7.5E-10	1.2E-08	3.9E-09	-	-	-	-	-	-
1,1-Dichloroethane	-	-	-	-	-	-	2.9E-08	9.3E-09	2.9E-08	9.3E-09
1,2-Dichloroethane	-	-	-	-	-	-	6.7E-09	2.1E-09	6.7E-09	2.1E-09
1,2-Dichloroethene (total)	1.4E-08	4.4E-09	7.0E-08	2.2E-08	-	-	-	-	-	-
1-Chlorohexane	-	-	-	-	-	-	-	-	-	-
2-Butanone	7.2E-09	2.3E-09	3.7E-08	1.2E-08	-	-	-	-	-	-
2-Hexanone	-	-	-	-	-	-	-	-	-	-
Acetone	8.2E-07	2.6E-07	4.2E-06	1.3E-06	-	-	2.5E-10	8.0E-11	2.5E-10	8.0E-11
Benzene	-	-	-	-	-	-	3.3E-08	1.1E-08	3.3E-08	1.1E-08
Carbon disulfide	-	-	-	-	-	-	-	-	2.3E-07	7.2E-08
Chloromethane	-	-	-	-	-	-	-	-	8.6E-08	2.8E-08
cis-1,2-Dichloroethene	-	-	-	-	-	-	2.1E-08	6.6E-09	2.1E-08	6.6E-09
Ethylbenzene	-	-	-	-	-	-	-	-	-	-
m,p-Xylene	-	-	-	-	-	-	-	-	-	-
Methylene chloride	2.5E-09	8.1E-10	1.3E-08	4.2E-09	-	-	1.6E-08	5.0E-09	1.6E-08	5.0E-09
Tetrachloroethene	1.7E-08	5.5E-09	8.9E-08	2.8E-08	-	-	-	-	-	-
Toluene	6.7E-08	2.1E-08	3.4E-07	1.1E-07	-	-	-	-	-	-
Trichloroethene	4.0E-08	1.3E-08	2.0E-07	6.5E-08	-	-	5.4E-08	1.7E-08	5.4E-08	1.7E-08
Xylenes (total)	1.0E-08	3.2E-09	5.2E-08	1.6E-08	-	-	-	-	-	-
SVOCs										
2-Methylnaphthalene	-	-	-	-	-	-	-	-	-	-
Acenaphthene	2.0E-08	6.3E-09	1.3E-07	4.2E-08	4.2E-13	1.3E-13	-	-	-	-
Acenaphthylene	1.7E-08	5.3E-09	1.1E-07	3.5E-08	3.5E-13	1.1E-13	-	-	-	-
Anthracene	1.6E-08	5.1E-09	1.1E-07	3.4E-08	3.4E-13	1.1E-13	-	-	-	-
Benzo(a)anthracene	2.9E-08	9.3E-09	1.9E-07	6.2E-08	6.2E-13	2.0E-13	-	-	-	-
Benzo(a)pyrene	2.9E-08	9.3E-09	1.9E-07	6.2E-08	6.2E-13	2.0E-13	-	-	-	-
Benzo(e)pyrene	1.2E-08	3.9E-09	8.2E-08	2.6E-08	2.6E-13	8.3E-14	-	-	-	-
Benzo(b)fluoranthene	5.2E-08	1.7E-08	3.5E-07	1.1E-07	1.1E-12	3.5E-13	-	-	-	-
Benzo(g,h,i)perylene	1.8E-08	5.6E-09	1.2E-07	3.8E-08	3.7E-13	1.2E-13	-	-	-	-
Benzo(k)fluoranthene	1.7E-08	5.3E-09	1.1E-07	3.5E-08	3.5E-13	1.1E-13	-	-	-	-
Chrysene	4.2E-08	1.4E-08	2.8E-07	9.0E-08	9.0E-13	2.9E-13	-	-	-	-
Dibenz(a,h)anthracene	1.7E-08	5.3E-09	1.1E-07	3.5E-08	3.5E-13	1.1E-13	-	-	-	-
Dibenzofuran	-	-	-	-	-	-	-	-	-	-
Fluoranthene	7.3E-08	2.4E-08	4.9E-07	1.6E-07	1.6E-12	5.0E-13	-	-	-	-
Fluorene	1.9E-08	6.2E-09	1.3E-07	4.2E-08	4.1E-13	1.3E-13	-	-	-	-
Indeno(1,2,3-cd)pyrene	2.7E-08	8.5E-09	1.8E-07	5.7E-08	5.6E-13	1.8E-13	-	-	-	-
Naphthalene	-	-	-	-	-	-	-	-	-	-
Perylene	7.0E-09	2.2E-09	4.7E-08	1.5E-08	1.5E-13	4.7E-14	-	-	-	-
Phenanthrene	3.9E-08	1.3E-08	2.6E-07	8.4E-08	8.3E-13	2.7E-13	-	-	-	-
Pyrene	3.1E-08	9.8E-09	2.0E-07	6.5E-08	6.5E-13	2.1E-13	-	-	-	-
Total Petroleum Hydrocarbons										
C11-C14(Kerosene Range)	7.8E-06	2.5E-06	5.2E-05	1.7E-05	1.7E-10	5.3E-11	-	-	-	-
C14-C20(Diesel Range)	1.5E-06	4.7E-07	9.7E-06	3.1E-06	3.1E-11	9.9E-12	-	-	-	-
C20-C30(Lubricant Oil Range)	9.2E-05	2.9E-05	6.1E-04	2.0E-04	2.0E-09	6.3E-10	-	-	-	-

Spreadsheet C3-33a (4 of 4)

Estimated Human Intake for the Adult Recreator - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Reasonable Maximum Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation Ambient Air_s		Inhalation Ambient Air_{gw}	
	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)
PCDD/PCDFs										
2,3,7,8-TCDD	1.0E-13	3.3E-14	1.6E-13	5.1E-14	2.2E-18	7.1E-19	-	-	-	-
1,2,3,7,8-PeCDD	4.3E-13	1.4E-13	6.5E-13	2.1E-13	9.0E-18	2.9E-18	-	-	-	-
1,2,3,4,7,8-HxCDD	1.8E-12	5.7E-13	2.7E-12	8.7E-13	3.8E-17	1.2E-17	-	-	-	-
1,2,3,6,7,8-HxCDD	5.8E-12	1.9E-12	8.9E-12	2.9E-12	1.2E-16	3.9E-17	-	-	-	-
1,2,3,7,8,9-HxCDD	2.0E-12	6.3E-13	3.0E-12	9.6E-13	4.2E-17	1.3E-17	-	-	-	-
1,2,3,4,6,7,8-HpCDD	2.3E-10	7.4E-11	3.6E-10	1.1E-10	4.9E-15	1.6E-15	-	-	-	-
OCDD	3.3E-09	1.1E-09	5.1E-09	1.6E-09	7.0E-14	2.2E-14	-	-	-	-
2,3,7,8-TCDF	1.5E-13	4.9E-14	2.4E-13	7.6E-14	3.3E-18	1.1E-18	-	-	-	-
1,2,3,7,8-PeCDF	1.1E-13	3.6E-14	1.7E-13	5.5E-14	2.4E-18	7.6E-19	-	-	-	-
2,3,4,7,8-PeCDF	3.1E-13	9.8E-14	4.7E-13	1.5E-13	6.5E-18	2.1E-18	-	-	-	-
1,2,3,4,7,8-HxCDF	6.5E-13	2.1E-13	1.0E-12	3.2E-13	1.4E-17	4.5E-18	-	-	-	-
1,2,3,6,7,8-HxCDF	6.2E-13	2.0E-13	9.5E-13	3.0E-13	1.3E-17	4.2E-18	-	-	-	-
2,3,4,6,7,8-HxCDF	1.7E-12	5.5E-13	2.6E-12	8.5E-13	3.7E-17	1.2E-17	-	-	-	-
1,2,3,7,8,9-HxCDF	1.9E-13	6.1E-14	2.9E-13	9.3E-14	4.0E-18	1.3E-18	-	-	-	-
1,2,3,4,6,7,8-HpCDF	1.9E-11	6.0E-12	2.9E-11	9.2E-12	4.0E-16	1.3E-16	-	-	-	-
1,2,3,4,7,8,9-HpCDF	1.8E-12	5.8E-13	2.8E-12	8.9E-13	3.8E-17	1.2E-17	-	-	-	-
OCDF	4.6E-11	1.5E-11	7.1E-11	2.3E-11	9.9E-16	3.2E-16	-	-	-	-
PCBs										
Aroclor-1254	8.4E-08	2.7E-08	6.0E-07	1.9E-07	1.8E-12	5.7E-13	-	-	-	-
Aroclor-1260	1.4E-06	4.6E-07	1.0E-05	3.3E-06	3.0E-11	9.7E-12	-	-	-	-
Aroclor-1262	-	-	-	-	-	-	-	-	-	-
PCB-105	1.1E-10	3.5E-11	7.9E-10	2.5E-10	2.3E-15	7.5E-16	-	-	-	-
PCB-114	2.0E-12	6.3E-13	1.4E-11	4.5E-12	4.2E-17	1.3E-17	-	-	-	-
PCB-118	2.2E-10	7.1E-11	1.6E-09	5.1E-10	4.7E-15	1.5E-15	-	-	-	-
PCB-123	3.1E-12	1.0E-12	2.2E-11	7.2E-12	6.7E-17	2.1E-17	-	-	-	-
PCB-126	8.6E-12	2.7E-12	6.2E-11	2.0E-11	1.8E-16	5.8E-17	-	-	-	-
PCB-156	7.4E-11	2.4E-11	5.3E-10	1.7E-10	1.6E-15	5.0E-16	-	-	-	-
PCB-157	3.3E-11	1.1E-11	2.4E-10	7.6E-11	7.0E-16	2.3E-16	-	-	-	-
PCB-167	5.8E-11	1.8E-11	4.1E-10	1.3E-10	1.2E-15	3.9E-16	-	-	-	-
PCB-169	8.6E-13	2.7E-13	6.2E-12	2.0E-12	1.8E-17	5.8E-18	-	-	-	-
PCB-189	8.6E-12	2.7E-12	6.2E-11	2.0E-11	1.8E-16	5.8E-17	-	-	-	-
PCB-77	1.7E-11	5.5E-12	1.2E-10	3.9E-11	3.7E-16	1.2E-16	-	-	-	-
PCB-81	3.0E-12	9.7E-13	2.2E-11	7.0E-12	6.5E-17	2.1E-17	-	-	-	-

Notes:
Inhalation Ambient Air_{s-gw} - Exposure associated with ambient air concentrations of COPCs modeled from soil or groundwater.
ADD - Average daily dose, as defined in the SRAM (MWH 2005).
LADD - Lifetime average daily dose, as defined in the SRAM (MWH 2005).
The chemicals presented in this table are comprehensive for all media sampled. Not all chemicals were analyzed for or detected in all media.
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCDD/PCDF - Polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.
PCB - polychlorinated biphenyls
COPC - chemical of potential concern
"-" indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
mg/kg-day - milligrams per kilogram per day

Estimated Human Intake for the Adult Worker - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Central Tendancy Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation of Indoor Air_s		Inhalation Ambient Air_s		Inhalation of Indoor Air_{gw}		Inhalation Ambient Air_{gw}	
	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)
Inorganic Compounds														
Aluminum	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Antimony	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Arsenic	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Cadmium	8.2E-08	9.8E-09	8.2E-11	9.8E-12	3.5E-12	4.2E-13	-	-	-	-	-	-	-	-
Chromium	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Copper	4.1E-06	5.0E-07	4.1E-08	5.0E-09	1.8E-10	2.1E-11	-	-	-	-	-	-	-	-
Fluoride	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Lead	3.9E-06	4.7E-07	3.9E-08	4.7E-09	1.7E-10	2.0E-11	-	-	-	-	-	-	-	-
Mercury	7.5E-07	9.0E-08	7.5E-09	9.0E-10	3.2E-11	3.8E-12	-	-	-	-	-	-	-	-
Methyl Mercury	7.5E-10	9.0E-11	7.5E-12	9.0E-13	3.2E-14	3.8E-15	-	-	-	-	-	-	-	-
Nickel	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Nitrate	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Silver	5.6E-07	6.7E-08	5.6E-09	6.7E-10	2.4E-11	2.9E-12	-	-	-	-	-	-	-	-
Thallium	4.3E-07	5.1E-08	4.3E-09	5.1E-10	1.8E-11	2.2E-12	-	-	-	-	-	-	-	-
Vanadium	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Zinc	2.9E-05	3.5E-06	2.9E-07	3.5E-08	1.2E-09	1.5E-10	-	-	-	-	-	-	-	-
1,1,1-Trichloroethane	-	-	-	-	-	-	9.3E-06	1.1E-06	-	-	-	-	-	-
1,1,2-Trichloro-1,2,2-trifluoroethane	5.1E-09	6.2E-10	5.1E-10	6.2E-11	-	-	4.7E-05	5.7E-06	-	-	-	-	-	-
1,1-Dichloroethane	-	-	-	-	-	-	9.1E-06	1.1E-06	1.3E-07	1.5E-08	6.0E-08	7.2E-09	1.3E-07	1.5E-08
1,2-Dichloroethane	-	-	-	-	-	-	-	-	2.9E-08	3.5E-09	9.8E-09	1.2E-09	2.9E-08	3.5E-09
1,2-Dichloroethene (total)	-	-	-	-	-	-	-	-	-	-	-	-	-	-
1-Chlorohexane	4.3E-10	5.1E-11	4.3E-11	5.1E-12	-	-	-	-	-	-	-	-	-	-
2-Butanone	8.1E-09	9.7E-10	8.1E-10	9.7E-11	-	-	-	-	-	-	-	-	-	-
2-Hexanone	1.3E-09	1.5E-10	1.3E-10	1.5E-11	-	-	-	-	-	-	-	-	-	-
Acetone	2.6E-07	3.2E-08	2.6E-08	3.2E-09	-	-	-	-	1.1E-09	1.3E-10	4.0E-10	4.8E-11	1.1E-09	1.3E-10
Benzene	-	-	-	-	-	-	-	-	1.4E-07	1.7E-08	5.5E-08	6.5E-09	1.4E-07	1.7E-08
Chloromethane	-	-	-	-	-	-	-	-	-	-	8.2E-08	9.9E-09	3.8E-07	4.5E-08
cis-1,2-Dichloroethene	-	-	-	-	-	-	-	-	9.0E-08	1.1E-08	3.2E-08	3.8E-09	9.0E-08	1.1E-08
Ethylbenzene	-	-	-	-	-	-	9.1E-06	1.1E-06	-	-	-	-	-	-
m,p-Xylene	1.5E-09	1.8E-10	1.5E-10	1.8E-11	-	-	1.8E-05	2.1E-06	-	-	-	-	-	-
Methylene chloride	4.2E-09	5.1E-10	4.2E-10	5.1E-11	-	-	2.7E-04	3.2E-05	6.8E-08	8.2E-09	1.7E-08	2.1E-09	6.8E-08	8.2E-09
Tetrachloroethene	-	-	-	-	-	-	8.9E-06	1.1E-06	-	-	-	-	-	-
Toluene	-	-	-	-	-	-	9.8E-06	1.2E-06	-	-	-	-	-	-
Trichloroethene	-	-	-	-	-	-	9.4E-06	1.1E-06	2.4E-07	2.8E-08	7.3E-08	8.8E-09	2.4E-07	2.8E-08
Xylenes (total)	-	-	-	-	-	-	-	-	-	-	-	-	-	-
2-Methylnaphthalene	9.2E-09	1.1E-09	1.2E-09	1.4E-10	3.9E-13	4.7E-14	-	-	-	-	-	-	-	-
Acenaphthene	2.9E-08	3.5E-09	3.8E-09	4.6E-10	1.2E-12	1.5E-13	-	-	-	-	-	-	-	-
Acenaphthylene	2.1E-09	2.5E-10	2.7E-10	3.3E-11	9.0E-14	1.1E-14	-	-	-	-	-	-	-	-
Anthracene	8.3E-08	1.0E-08	1.1E-08	1.3E-09	3.5E-12	4.3E-13	-	-	-	-	-	-	-	-
Benzo(a)anthracene	3.5E-07	4.2E-08	4.5E-08	5.5E-09	1.5E-11	1.8E-12	-	-	-	-	-	-	-	-
Benzo(a)pyrene	3.8E-07	4.5E-08	4.9E-08	5.9E-09	1.6E-11	1.9E-12	-	-	-	-	-	-	-	-
Benzo(e)pyrene	8.4E-09	1.0E-09	1.1E-09	1.3E-10	3.6E-13	4.3E-14	-	-	-	-	-	-	-	-
Benzo(b)fluoranthene	3.3E-07	4.0E-08	4.3E-08	5.2E-09	1.4E-11	1.7E-12	-	-	-	-	-	-	-	-
Benzo(g,h,i)perylene	1.1E-07	1.4E-08	1.5E-08	1.8E-09	4.8E-12	5.8E-13	-	-	-	-	-	-	-	-
Benzo(k)fluoranthene	3.7E-07	4.5E-08	4.8E-08	5.8E-09	1.6E-11	1.9E-12	-	-	-	-	-	-	-	-
Chrysene	2.6E-07	3.1E-08	3.3E-08	4.0E-09	1.1E-11	1.3E-12	-	-	-	-	-	-	-	-
Dibenz(a,h)anthracene	5.0E-08	5.9E-09	6.4E-09	7.7E-10	2.1E-12	2.5E-13	-	-	-	-	-	-	-	-
Dibenzofuran	1.2E-07	1.4E-08	1.6E-08	1.9E-09	5.1E-12	6.1E-13	-	-	-	-	-	-	-	-
Fluoranthene	6.3E-07	7.5E-08	8.1E-08	9.8E-09	2.7E-11	3.2E-12	-	-	-	-	-	-	-	-
Fluorene	3.0E-08	3.6E-09	3.9E-09	4.7E-10	1.3E-12	1.5E-13	-	-	-	-	-	-	-	-
Indeno(1,2,3-cd)pyrene	1.6E-07	1.9E-08	2.1E-08	2.5E-09	6.8E-12	8.1E-13	-	-	-	-	-	-	-	-
Naphthalene	8.4E-09	1.0E-09	1.1E-09	1.3E-10	3.6E-13	4.3E-14	-	-	-	-	-	-	-	-
Perylene	4.7E-09	5.7E-10	6.2E-10	7.4E-11	2.0E-13	2.4E-14	-	-	-	-	-	-	-	-
Phenanthrene	3.0E-07	3.6E-08	3.9E-08	4.7E-09	1.3E-11	1.5E-12	-	-	-	-	-	-	-	-
Pyrene	5.2E-07	6.3E-08	6.8E-08	8.1E-09	2.2E-11	2.7E-12	-	-	-	-	-	-	-	-

Spreadsheet C3-32b (2 of 4)

Estimated Human Intake for the Adult Worker - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Central Tendancy Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation of Indoor Air_s		Inhalation Ambient Air_s		Inhalation of Indoor Air_{gw}		Inhalation Ambient Air_{gw}	
	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)
Total Petroleum Hydrocarbons														
C11-C14(Kerosene Range)	3.3E-06	4.0E-07	4.3E-07	5.2E-08	1.4E-10	1.7E-11	-	-	-	-	-	-	-	-
C14-C20(Diesel Range)	3.1E-06	3.8E-07	4.1E-07	4.9E-08	1.3E-10	1.6E-11	-	-	-	-	-	-	-	-
C20-C30(Lubricant Oil Range)	3.4E-05	4.1E-06	4.4E-06	5.3E-07	1.4E-09	1.7E-10	-	-	-	-	-	-	-	-
PCDD/PCDFs														
2,3,7,8-TCDD	6.4E-14	7.7E-15	1.9E-15	2.3E-16	2.7E-18	3.3E-19	-	-	-	-	-	-	-	-
1,2,3,7,8-PeCDD	2.4E-13	2.9E-14	7.2E-15	8.7E-16	1.0E-17	1.2E-18	-	-	-	-	-	-	-	-
1,2,3,4,7,8-HxCDD	7.0E-13	8.4E-14	2.1E-14	2.5E-15	3.0E-17	3.6E-18	-	-	-	-	-	-	-	-
1,2,3,6,7,8-HxCDD	3.6E-12	4.3E-13	1.1E-13	1.3E-14	1.5E-16	1.8E-17	-	-	-	-	-	-	-	-
1,2,3,7,8,9-HxCDD	1.5E-12	1.8E-13	4.4E-14	5.3E-15	6.3E-17	7.5E-18	-	-	-	-	-	-	-	-
1,2,3,4,6,7,8-HpCDD	1.0E-10	1.2E-11	3.0E-12	3.6E-13	4.3E-15	5.1E-16	-	-	-	-	-	-	-	-
OCDD	1.6E-09	1.9E-10	4.8E-11	5.7E-12	6.8E-14	8.1E-15	-	-	-	-	-	-	-	-
2,3,7,8-TCDF	1.6E-13	1.9E-14	4.7E-15	5.6E-16	6.6E-18	8.0E-19	-	-	-	-	-	-	-	-
1,2,3,7,8-PeCDF	6.3E-14	7.6E-15	1.9E-15	2.3E-16	2.7E-18	3.2E-19	-	-	-	-	-	-	-	-
2,3,4,7,8-PeCDF	1.8E-13	2.2E-14	5.4E-15	6.5E-16	7.7E-18	9.2E-19	-	-	-	-	-	-	-	-
1,2,3,4,7,8-HxCDF	3.8E-13	4.5E-14	1.1E-14	1.4E-15	1.6E-17	1.9E-18	-	-	-	-	-	-	-	-
1,2,3,6,7,8-HxCDF	3.1E-13	3.7E-14	9.2E-15	1.1E-15	1.3E-17	1.6E-18	-	-	-	-	-	-	-	-
2,3,4,6,7,8-HxCDF	5.8E-13	7.0E-14	1.7E-14	2.1E-15	2.5E-17	3.0E-18	-	-	-	-	-	-	-	-
1,2,3,7,8,9-HxCDF	6.0E-14	7.1E-15	1.8E-15	2.1E-16	2.5E-18	3.0E-19	-	-	-	-	-	-	-	-
1,2,3,4,6,7,8-HpCDF	1.2E-11	1.4E-12	3.5E-13	4.2E-14	5.0E-16	6.0E-17	-	-	-	-	-	-	-	-
1,2,3,4,7,8,9-HpCDF	1.0E-12	1.2E-13	3.1E-14	3.7E-15	4.3E-17	5.2E-18	-	-	-	-	-	-	-	-
OCDF	3.2E-11	3.9E-12	9.6E-13	1.2E-13	1.4E-15	1.6E-16	-	-	-	-	-	-	-	-
PCBs														
Aroclor-1254	7.0E-08	8.4E-09	9.8E-09	1.2E-09	3.0E-12	3.6E-13	-	-	-	-	-	-	-	-
Aroclor-1260	6.0E-07	7.2E-08	8.4E-08	1.0E-08	2.5E-11	3.1E-12	-	-	-	-	-	-	-	-
PCB-105	5.1E-11	6.2E-12	7.2E-12	8.6E-13	2.2E-15	2.6E-16	-	-	-	-	-	-	-	-
PCB-114	9.7E-13	1.2E-13	1.4E-13	1.6E-14	4.1E-17	5.0E-18	-	-	-	-	-	-	-	-
PCB-118	1.0E-10	1.2E-11	1.4E-11	1.7E-12	4.4E-15	5.3E-16	-	-	-	-	-	-	-	-
PCB-123	1.4E-12	1.7E-13	2.0E-13	2.4E-14	6.1E-17	7.3E-18	-	-	-	-	-	-	-	-
PCB-126	3.9E-12	4.7E-13	5.5E-13	6.6E-14	1.7E-16	2.0E-17	-	-	-	-	-	-	-	-
PCB-156	3.4E-11	4.0E-12	4.7E-12	5.7E-13	1.4E-15	1.7E-16	-	-	-	-	-	-	-	-
PCB-157	1.5E-11	1.8E-12	2.1E-12	2.5E-13	6.3E-16	7.6E-17	-	-	-	-	-	-	-	-
PCB-167	2.6E-11	3.1E-12	3.6E-12	4.3E-13	1.1E-15	1.3E-16	-	-	-	-	-	-	-	-
PCB-169	3.9E-13	4.6E-14	5.4E-14	6.5E-15	1.6E-17	2.0E-18	-	-	-	-	-	-	-	-
PCB-189	3.8E-12	4.6E-13	5.4E-13	6.5E-14	1.6E-16	2.0E-17	-	-	-	-	-	-	-	-
PCB-77	7.9E-12	9.5E-13	1.1E-12	1.3E-13	3.3E-16	4.0E-17	-	-	-	-	-	-	-	-
PCB-81	1.4E-12	1.7E-13	2.0E-13	2.4E-14	6.0E-17	7.1E-18	-	-	-	-	-	-	-	-

Spreadsheet C3-32b (3 of 4)

Estimated Human Intake for the Adult Worker - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Reasonable Maximum Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation of Indoor Air_s		Inhalation Ambient Air_s		Inhalation of Indoor Air_{gw}		Inhalation Ambient Air_{gw}	
	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)
Inorganic Compounds														
Aluminum	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Antimony	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Arsenic	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Cadmium	5.9E-07	2.0E-07	1.5E-09	5.0E-10	1.5E-11	4.9E-12	-	-	-	-	-	-	-	-
Chromium	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Copper	3.4E-05	1.1E-05	8.6E-07	2.9E-07	8.4E-10	2.8E-10	-	-	-	-	-	-	-	-
Fluoride	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Lead	2.9E-05	9.6E-06	7.2E-07	2.4E-07	7.1E-10	2.4E-10	-	-	-	-	-	-	-	-
Mercury	7.4E-06	2.5E-06	1.9E-07	6.2E-08	1.8E-10	6.1E-11	-	-	-	-	-	-	-	-
Methyl Mercury	7.1E-09	2.4E-09	1.8E-10	5.9E-11	1.7E-13	5.8E-14	-	-	-	-	-	-	-	-
Nickel	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Nitrate	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Silver	5.2E-06	1.7E-06	1.3E-07	4.4E-08	1.3E-10	4.3E-11	-	-	-	-	-	-	-	-
Thallium	7.0E-06	2.3E-06	1.8E-07	5.8E-08	1.7E-10	5.7E-11	-	-	-	-	-	-	-	-
Vanadium	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Zinc	4.3E-04	1.4E-04	1.1E-05	3.6E-06	1.1E-08	3.5E-09	-	-	-	-	-	-	-	-
1,1,1-Trichloroethane	-	-	-	-	-	-	2.5E-05	8.2E-06	-	-	-	-	-	-
1,1,2-Trichloro-1,2,2-trifluoroethane	2.3E-08	7.8E-09	5.9E-09	2.0E-09	-	-	1.4E-04	4.7E-05	-	-	-	-	-	-
1,1-Dichloroethane	-	-	-	-	-	-	2.4E-05	8.0E-06	3.3E-07	1.1E-07	1.6E-07	5.3E-08	3.3E-07	1.1E-07
1,2-Dichloroethane	-	-	-	-	-	-	-	-	7.7E-08	2.6E-08	2.6E-08	8.6E-09	7.7E-08	2.6E-08
1,2-Dichloroethene (total)	-	-	-	-	-	-	-	-	-	-	-	-	-	-
1-Chlorohexane	2.0E-09	6.5E-10	4.9E-10	1.6E-10	-	-	-	-	-	-	-	-	-	-
2-Butanone	5.3E-08	1.8E-08	1.3E-08	4.4E-09	-	-	-	-	-	-	-	-	-	-
2-Hexanone	5.9E-09	2.0E-09	1.5E-09	4.9E-10	-	-	-	-	-	-	-	-	-	-
Acetone	1.0E-05	3.4E-06	2.5E-06	8.5E-07	-	-	-	-	2.9E-09	9.7E-10	1.1E-09	3.5E-10	2.9E-09	9.7E-10
Benzene	-	-	-	-	-	-	-	-	3.8E-07	1.3E-07	1.4E-07	4.8E-08	3.8E-07	1.3E-07
Carbon disulfide	-	-	-	-	-	-	-	-	-	-	7.8E-07	2.6E-07	2.6E-06	8.7E-07
Chloromethane	-	-	-	-	-	-	-	-	-	-	2.2E-07	7.2E-08	1.0E-06	3.3E-07
cis-1,2-Dichloroethene	-	-	-	-	-	-	-	-	2.4E-07	7.9E-08	8.4E-08	2.8E-08	2.4E-07	7.9E-08
Ethylbenzene	-	-	-	-	-	-	2.4E-05	8.0E-06	-	-	-	-	-	-
m,p-Xylene	0.0E+00	0.0E+00	0.0E+00	0.0E+00	-	-	4.6E-05	1.5E-05	-	-	-	-	-	-
Methylene chloride	2.3E-08	7.6E-09	5.7E-09	1.9E-09	-	-	7.0E-04	2.3E-04	1.8E-07	6.0E-08	4.5E-08	1.5E-08	1.8E-07	6.0E-08
Tetrachloroethene	-	-	-	-	-	-	2.4E-05	7.8E-06	-	-	-	-	-	-
Toluene	-	-	-	-	-	-	2.6E-05	8.6E-06	-	-	-	-	-	-
Trichloroethene	-	-	-	-	-	-	2.5E-05	8.2E-06	6.2E-07	2.1E-07	1.9E-07	6.5E-08	6.2E-07	2.1E-07
Xylenes (total)	-	-	-	-	-	-	-	-	-	-	-	-	-	-
2-Methylnaphthalene	4.9E-08	1.6E-08	1.6E-08	5.3E-09	1.2E-12	4.0E-13	-	-	-	-	-	-	-	-
Acenaphthene	5.0E-07	1.7E-07	1.6E-07	5.4E-08	1.2E-11	4.1E-12	-	-	-	-	-	-	-	-
Acenaphthylene	2.7E-08	8.9E-09	8.7E-09	2.9E-09	6.5E-13	2.2E-13	-	-	-	-	-	-	-	-
Anthracene	1.9E-06	6.4E-07	6.3E-07	2.1E-07	4.7E-11	1.6E-11	-	-	-	-	-	-	-	-
Benzo(a)anthracene	2.7E-05	9.1E-06	8.9E-06	3.0E-06	6.7E-10	2.2E-10	-	-	-	-	-	-	-	-
Benzo(a)pyrene	2.9E-05	9.8E-06	9.5E-06	3.2E-06	7.2E-10	2.4E-10	-	-	-	-	-	-	-	-
Benzo(e)pyrene	1.1E-07	3.6E-08	3.5E-08	1.2E-08	2.6E-12	8.8E-13	-	-	-	-	-	-	-	-
Benzo(b)fluoranthene	1.3E-05	4.5E-06	4.4E-06	1.5E-06	3.3E-10	1.1E-10	-	-	-	-	-	-	-	-
Benzo(g,h,i)perylene	4.7E-06	1.6E-06	1.5E-06	5.1E-07	1.2E-10	3.9E-11	-	-	-	-	-	-	-	-
Benzo(k)fluoranthene	2.9E-05	9.8E-06	9.5E-06	3.2E-06	7.2E-10	2.4E-10	-	-	-	-	-	-	-	-
Chrysene	1.3E-05	4.2E-06	4.1E-06	1.4E-06	3.1E-10	1.0E-10	-	-	-	-	-	-	-	-
Dibenz(a,h)anthracene	2.2E-06	7.3E-07	7.1E-07	2.4E-07	5.3E-11	1.8E-11	-	-	-	-	-	-	-	-
Dibenzofuran	5.5E-07	1.8E-07	1.8E-07	5.9E-08	1.3E-11	4.5E-12	-	-	-	-	-	-	-	-
Fluoranthene	2.6E-05	8.5E-06	8.3E-06	2.8E-06	6.3E-10	2.1E-10	-	-	-	-	-	-	-	-
Fluorene	5.1E-07	1.7E-07	1.6E-07	5.5E-08	1.2E-11	4.1E-12	-	-	-	-	-	-	-	-
Indeno(1,2,3-cd)pyrene	6.5E-06	2.2E-06	2.1E-06	7.1E-07	1.6E-10	5.3E-11	-	-	-	-	-	-	-	-
Naphthalene	1.1E-07	3.8E-08	3.7E-08	1.2E-08	2.8E-12	9.3E-13	-	-	-	-	-	-	-	-
Perylene	6.1E-08	2.0E-08	2.0E-08	6.7E-09	1.5E-12	5.0E-13	-	-	-	-	-	-	-	-
Phenanthrene	1.1E-05	3.8E-06	3.7E-06	1.2E-06	2.8E-10	9.3E-11	-	-	-	-	-	-	-	-
Pyrene	2.1E-05	7.1E-06	6.9E-06	2.3E-06	5.2E-10	1.7E-10	-	-	-	-	-	-	-	-

Spreadsheet C3-32b (4 of 4)

Estimated Human Intake for the Adult Worker - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Reasonable Maximum Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation of Indoor Air_s		Inhalation Ambient Air_s		Inhalation of Indoor Air_{gw}		Inhalation Ambient Air_{gw}	
	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)
Total Petroleum Hydrocarbons														
C11-C14(Kerosene Range)	7.5E-05	2.5E-05	2.4E-05	8.1E-06	1.8E-09	6.1E-10	-	-	-	-	-	-	-	-
C14-C20(Diesel Range)	3.5E-05	1.2E-05	1.1E-05	3.8E-06	8.6E-10	2.9E-10	-	-	-	-	-	-	-	-
C20-C30(Lubricant Oil Range)	8.3E-04	2.8E-04	2.7E-04	9.0E-05	2.0E-08	6.8E-09	-	-	-	-	-	-	-	-
PCDD/PCDFs														
2,3,7,8-TCDD	6.8E-13	2.3E-13	5.1E-14	1.7E-14	1.7E-17	5.6E-18	-	-	-	-	-	-	-	-
1,2,3,7,8-PeCDD	2.6E-12	8.6E-13	1.9E-13	6.4E-14	6.3E-17	2.1E-17	-	-	-	-	-	-	-	-
1,2,3,4,7,8-HxCDD	7.3E-12	2.4E-12	5.5E-13	1.8E-13	1.8E-16	6.0E-17	-	-	-	-	-	-	-	-
1,2,3,6,7,8-HxCDD	3.7E-11	1.2E-11	2.7E-12	9.1E-13	9.0E-16	3.0E-16	-	-	-	-	-	-	-	-
1,2,3,7,8,9-HxCDD	1.7E-11	5.7E-12	1.3E-12	4.2E-13	4.2E-16	1.4E-16	-	-	-	-	-	-	-	-
1,2,3,4,6,7,8-HpCDD	9.7E-10	3.2E-10	7.3E-11	2.4E-11	2.4E-14	7.9E-15	-	-	-	-	-	-	-	-
OCDD	1.4E-08	4.8E-09	1.1E-09	3.6E-10	3.5E-13	1.2E-13	-	-	-	-	-	-	-	-
2,3,7,8-TCDF	1.5E-12	5.1E-13	1.1E-13	3.8E-14	3.7E-17	1.2E-17	-	-	-	-	-	-	-	-
1,2,3,7,8-PeCDF	7.6E-13	2.5E-13	5.7E-14	1.9E-14	1.9E-17	6.2E-18	-	-	-	-	-	-	-	-
2,3,4,7,8-PeCDF	1.8E-12	5.9E-13	1.3E-13	4.4E-14	4.3E-17	1.4E-17	-	-	-	-	-	-	-	-
1,2,3,4,7,8-HxCDF	3.4E-12	1.1E-12	2.5E-13	8.5E-14	8.3E-17	2.8E-17	-	-	-	-	-	-	-	-
1,2,3,6,7,8-HxCDF	3.2E-12	1.1E-12	2.4E-13	8.0E-14	7.8E-17	2.6E-17	-	-	-	-	-	-	-	-
2,3,4,6,7,8-HxCDF	5.6E-12	1.9E-12	4.2E-13	1.4E-13	1.4E-16	4.6E-17	-	-	-	-	-	-	-	-
1,2,3,7,8,9-HxCDF	3.4E-13	1.1E-13	2.6E-14	8.6E-15	8.4E-18	2.8E-18	-	-	-	-	-	-	-	-
1,2,3,4,6,7,8-HpCDF	9.8E-11	3.3E-11	7.3E-12	2.4E-12	2.4E-15	8.0E-16	-	-	-	-	-	-	-	-
1,2,3,4,7,8,9-HpCDF	8.3E-12	2.8E-12	6.2E-13	2.1E-13	2.0E-16	6.8E-17	-	-	-	-	-	-	-	-
OCDF	2.9E-10	9.8E-11	2.2E-11	7.3E-12	7.2E-15	2.4E-15	-	-	-	-	-	-	-	-
PCBs														
Aroclor-1254	8.4E-07	2.8E-07	2.9E-07	9.8E-08	2.1E-11	6.9E-12	-	-	-	-	-	-	-	-
Aroclor-1260	1.5E-05	5.0E-06	5.2E-06	1.7E-06	3.7E-10	1.2E-10	-	-	-	-	-	-	-	-
PCB-105	1.2E-09	4.1E-10	4.3E-10	1.4E-10	3.0E-14	1.0E-14	-	-	-	-	-	-	-	-
PCB-114	2.2E-11	7.3E-12	7.6E-12	2.5E-12	5.3E-16	1.8E-16	-	-	-	-	-	-	-	-
PCB-118	2.5E-09	8.2E-10	8.6E-10	2.9E-10	6.0E-14	2.0E-14	-	-	-	-	-	-	-	-
PCB-123	3.5E-11	1.2E-11	1.2E-11	4.1E-12	8.5E-16	2.8E-16	-	-	-	-	-	-	-	-
PCB-126	9.5E-11	3.2E-11	3.3E-11	1.1E-11	2.3E-15	7.8E-16	-	-	-	-	-	-	-	-
PCB-156	8.2E-10	2.7E-10	2.9E-10	9.5E-11	2.0E-14	6.7E-15	-	-	-	-	-	-	-	-
PCB-157	3.7E-10	1.2E-10	1.3E-10	4.3E-11	9.0E-15	3.0E-15	-	-	-	-	-	-	-	-
PCB-167	6.4E-10	2.1E-10	2.2E-10	7.5E-11	1.6E-14	5.2E-15	-	-	-	-	-	-	-	-
PCB-169	9.5E-12	3.2E-12	3.3E-12	1.1E-12	2.3E-16	7.8E-17	-	-	-	-	-	-	-	-
PCB-189	9.5E-11	3.2E-11	3.3E-11	1.1E-11	2.3E-15	7.8E-16	-	-	-	-	-	-	-	-
PCB-77	1.9E-10	6.4E-11	6.7E-11	2.2E-11	4.7E-15	1.6E-15	-	-	-	-	-	-	-	-
PCB-81	3.4E-11	1.1E-11	1.2E-11	3.9E-12	8.3E-16	2.8E-16	-	-	-	-	-	-	-	-

Notes:
Inhalation Indoor Air $_{s\text{-}gw}$ - Exposure associated with indoor air concentrations of COPCs modeled from soil vapor, soil, or groundwater.
Inhalation Ambient Air $_{s\text{-}gw}$ - Exposure associated with ambient air concentrations of COPCs modeled from soil or groundwater.
ADD - Average daily dose, as defined in the SRAM (Ogden 2000).
LADD - Lifetime average daily dose, as defined in the SRAM (Ogden 2000).
The chemicals presented in this table are comprehensive for all media sampled. Not all chemicals were analyzed for or detected in all media.
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCDD/PCDF - Polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.
PCB - polychlorinated biphenyls
COPC - chemical of potential concern
"-" indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
mg/kg-day - milligrams per kilogram per day

Estimated Human Intake for the Adult Worker - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Central Tendancy Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation of Indoor Air_s		Inhalation Ambient Air_s		Inhalation of Indoor Air_{gw}		Inhalation Ambient Air_{gw}	
	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)
Inorganic Compounds														
Cadmium	2.2E-07	2.6E-08	2.2E-10	2.6E-11	9.3E-12	1.1E-12	-	-	-	-	-	-	-	-
Copper	9.0E-06	1.1E-06	9.0E-08	1.1E-08	3.8E-10	4.6E-11	-	-	-	-	-	-	-	-
Fluoride	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Lead	6.9E-06	8.2E-07	6.9E-08	8.2E-09	2.9E-10	3.5E-11	-	-	-	-	-	-	-	-
Mercury	8.2E-07	9.8E-08	8.2E-09	9.8E-10	3.5E-11	4.2E-12	-	-	-	-	-	-	-	-
Methyl Mercury	7.5E-10	9.0E-11	7.5E-12	9.0E-13	3.2E-14	3.8E-15	-	-	-	-	-	-	-	-
Nitrate	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Silver	3.3E-07	4.0E-08	3.3E-09	4.0E-10	1.4E-11	1.7E-12	-	-	-	-	-	-	-	-
Thallium	1.4E-07	1.7E-08	1.4E-09	1.7E-10	6.0E-12	7.2E-13	-	-	-	-	-	-	-	-
Zinc	7.3E-05	8.7E-06	7.3E-07	8.7E-08	3.1E-09	3.7E-10	-	-	-	-	-	-	-	-
VOCs														
1,1,1-Trichloroethane	-	-	-	-	-	-	9.3E-06	1.1E-06	-	-	-	-	-	-
1,1,2-Trichloro-1,2,2-trifluoroethane	5.1E-09	6.2E-10	5.1E-10	6.2E-11	-	-	4.7E-05	5.7E-06	-	-	-	-	-	-
1,1-Dichloroethane	-	-	-	-	-	-	9.1E-06	1.1E-06	1.3E-07	1.5E-08	6.0E-08	7.2E-09	1.3E-07	1.5E-08
1,2-Dichloroethane	-	-	-	-	-	-	-	-	2.9E-08	3.5E-09	9.8E-09	1.2E-09	2.9E-08	3.5E-09
1,2-Dichloroethene (total)	1.2E-08	1.5E-09	1.2E-09	1.5E-10	-	-	-	-	-	-	-	-	-	-
1-Chlorohexane	-	-	-	-	-	-	-	-	-	-	-	-	-	-
2-Butanone	1.6E-08	1.9E-09	1.6E-09	1.9E-10	-	-	-	-	-	-	-	-	-	-
2-Hexanone	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Acetone	2.9E-07	3.5E-08	2.9E-08	3.5E-09	-	-	-	-	1.1E-09	1.3E-10	4.0E-10	4.8E-11	1.1E-09	1.3E-10
Benzene	-	-	-	-	-	-	-	-	1.4E-07	1.7E-08	5.5E-08	6.5E-09	1.4E-07	1.7E-08
Carbon disulfide	-	-	-	-	-	-	-	-	-	-	3.0E-07	3.5E-08	9.9E-07	1.2E-07
Chloromethane	-	-	-	-	-	-	-	-	-	-	8.2E-08	9.9E-09	3.8E-07	4.5E-08
cis-1,2-Dichloroethene	-	-	-	-	-	-	-	-	9.0E-08	1.1E-08	3.2E-08	3.8E-09	9.0E-08	1.1E-08
Ethylbenzene	-	-	-	-	-	-	9.1E-06	1.1E-06	-	-	-	-	-	-
m,p-Xylene	-	-	-	-	-	-	1.8E-05	2.1E-06	-	-	-	-	-	-
Methylene chloride	5.6E-09	6.7E-10	5.6E-10	6.7E-11	-	-	2.7E-04	3.2E-05	6.8E-08	8.2E-09	1.7E-08	2.1E-09	6.8E-08	8.2E-09
Tetrachloroethene	8.9E-09	1.1E-09	8.9E-10	1.1E-10	-	-	8.9E-06	1.1E-06	-	-	-	-	-	-
Toluene	2.4E-08	2.9E-09	2.4E-09	2.9E-10	-	-	9.8E-06	1.2E-06	-	-	-	-	-	-
Trichloroethene	1.6E-08	1.9E-09	1.6E-09	1.9E-10	-	-	9.4E-06	1.1E-06	2.4E-07	2.8E-08	7.3E-08	8.8E-09	2.4E-07	2.8E-08
Xylenes (total)	1.1E-08	1.3E-09	1.1E-09	1.3E-10	-	-	-	-	-	-	-	-	-	-
SVOCs														
2-Methylnaphthalene	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Acenaphthene	1.9E-08	2.3E-09	2.5E-09	2.9E-10	8.0E-13	9.6E-14	-	-	-	-	-	-	-	-
Acenaphthylene	1.3E-08	1.6E-09	1.7E-09	2.1E-10	5.6E-13	6.7E-14	-	-	-	-	-	-	-	-
Anthracene	1.7E-08	2.0E-09	2.2E-09	2.6E-10	7.1E-13	8.5E-14	-	-	-	-	-	-	-	-
Benzo(a)anthracene	1.5E-08	1.8E-09	2.0E-09	2.4E-10	6.5E-13	7.9E-14	-	-	-	-	-	-	-	-
Benzo(a)pyrene	1.5E-08	1.9E-09	2.0E-09	2.4E-10	6.6E-13	7.9E-14	-	-	-	-	-	-	-	-
Benzo(e)pyrene	8.0E-09	9.6E-10	1.0E-09	1.2E-10	3.4E-13	4.1E-14	-	-	-	-	-	-	-	-
Benzo(b)fluoranthene	2.1E-08	2.5E-09	2.7E-09	3.3E-10	8.9E-13	1.1E-13	-	-	-	-	-	-	-	-
Benzo(g,h,i)perylene	1.8E-08	2.1E-09	2.3E-09	2.7E-10	7.5E-13	9.0E-14	-	-	-	-	-	-	-	-
Benzo(k)fluoranthene	1.3E-08	1.5E-09	1.7E-09	2.0E-10	5.4E-13	6.5E-14	-	-	-	-	-	-	-	-
Chrysene	1.9E-08	2.3E-09	2.5E-09	3.0E-10	8.1E-13	9.7E-14	-	-	-	-	-	-	-	-
Dibenz(a,h)anthracene	1.2E-08	1.5E-09	1.6E-09	1.9E-10	5.3E-13	6.4E-14	-	-	-	-	-	-	-	-
Dibenzofuran	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Fluoranthene	2.6E-08	3.1E-09	3.3E-09	4.0E-10	1.1E-12	1.3E-13	-	-	-	-	-	-	-	-
Fluorene	1.9E-08	2.3E-09	2.5E-09	2.9E-10	8.0E-13	9.6E-14	-	-	-	-	-	-	-	-
Indeno(1,2,3-cd)pyrene	1.5E-08	1.8E-09	1.9E-09	2.3E-10	6.2E-13	7.5E-14	-	-	-	-	-	-	-	-
Naphthalene	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Perylene	4.6E-09	5.5E-10	5.9E-10	7.1E-11	1.9E-13	2.3E-14	-	-	-	-	-	-	-	-
Phenanthrene	3.4E-08	4.1E-09	4.4E-09	5.3E-10	1.4E-12	1.7E-13	-	-	-	-	-	-	-	-
Pyrene	2.3E-08	2.7E-09	3.0E-09	3.6E-10	9.7E-13	1.2E-13	-	-	-	-	-	-	-	-
Total Petroleum Hydrocarbons														
C11-C14(Kerosene Range)	4.1E-06	5.0E-07	5.4E-07	6.5E-08	1.8E-10	2.1E-11	-	-	-	-	-	-	-	-
C14-C20(Diesel Range)	3.2E-06	3.8E-07	4.2E-07	5.0E-08	1.4E-10	1.6E-11	-	-	-	-	-	-	-	-
C20-C30(Lubricant Oil Range)	3.1E-05	3.8E-06	4.1E-06	4.9E-07	1.3E-09	1.6E-10	-	-	-	-	-	-	-	-

Spreadsheet C3-32a (2 of 4)

Estimated Human Intake for the Adult Worker - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Central Tendancy Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation of Indoor Air_s		Inhalation Ambient Air_s		Inhalation of Indoor Air_{gw}		Inhalation Ambient Air_{gw}	
	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)
PCDD/PCDFs														
2,3,7,8-TCDD	1.2E-13	1.4E-14	3.5E-15	4.2E-16	5.0E-18	6.0E-19	-	-	-	-	-	-	-	-
1,2,3,7,8-PeCDD	4.7E-13	5.7E-14	1.4E-14	1.7E-15	2.0E-17	2.4E-18	-	-	-	-	-	-	-	-
1,2,3,4,7,8-HxCDD	1.8E-12	2.1E-13	5.3E-14	6.3E-15	7.5E-17	9.0E-18	-	-	-	-	-	-	-	-
1,2,3,6,7,8-HxCDD	6.8E-12	8.1E-13	2.0E-13	2.4E-14	2.9E-16	3.5E-17	-	-	-	-	-	-	-	-
1,2,3,7,8,9-HxCDD	2.5E-12	3.0E-13	7.6E-14	9.1E-15	1.1E-16	1.3E-17	-	-	-	-	-	-	-	-
1,2,3,4,6,7,8-HpCDD	2.4E-10	2.9E-11	7.3E-12	8.7E-13	1.0E-14	1.2E-15	-	-	-	-	-	-	-	-
OCDD	3.6E-09	4.3E-10	1.1E-10	1.3E-11	1.5E-13	1.8E-14	-	-	-	-	-	-	-	-
2,3,7,8-TCDF	2.4E-13	2.8E-14	7.1E-15	8.5E-16	1.0E-17	1.2E-18	-	-	-	-	-	-	-	-
1,2,3,7,8-PeCDF	1.2E-13	1.4E-14	3.6E-15	4.3E-16	5.0E-18	6.0E-19	-	-	-	-	-	-	-	-
2,3,4,7,8-PeCDF	3.5E-13	4.2E-14	1.0E-14	1.3E-15	1.5E-17	1.8E-18	-	-	-	-	-	-	-	-
1,2,3,4,7,8-HxCDF	7.6E-13	9.1E-14	2.3E-14	2.7E-15	3.2E-17	3.9E-18	-	-	-	-	-	-	-	-
1,2,3,6,7,8-HxCDF	6.6E-13	8.0E-14	2.0E-14	2.4E-15	2.8E-17	3.4E-18	-	-	-	-	-	-	-	-
2,3,4,6,7,8-HxCDF	1.6E-12	2.0E-13	4.9E-14	5.9E-15	7.0E-17	8.4E-18	-	-	-	-	-	-	-	-
1,2,3,7,8,9-HxCDF	1.5E-13	1.9E-14	4.6E-15	5.6E-16	6.6E-18	7.9E-19	-	-	-	-	-	-	-	-
1,2,3,4,6,7,8-HpCDF	2.3E-11	2.7E-12	6.8E-13	8.1E-14	9.6E-16	1.1E-16	-	-	-	-	-	-	-	-
1,2,3,4,7,8,9-HpCDF	2.1E-12	2.5E-13	6.3E-14	7.5E-15	8.9E-17	1.1E-17	-	-	-	-	-	-	-	-
OCDF	5.8E-11	6.9E-12	1.7E-12	2.1E-13	2.5E-15	3.0E-16	-	-	-	-	-	-	-	-
PCBs														
Aroclor-1254	6.9E-08	8.3E-09	9.7E-09	1.2E-09	2.9E-12	3.5E-13	-	-	-	-	-	-	-	-
Aroclor-1260	5.7E-07	6.8E-08	8.0E-08	9.6E-09	2.4E-11	2.9E-12	-	-	-	-	-	-	-	-
PCB-105	4.9E-11	5.9E-12	6.8E-12	8.2E-13	2.1E-15	2.5E-16	-	-	-	-	-	-	-	-
PCB-114	9.3E-13	1.1E-13	1.3E-13	1.6E-14	4.0E-17	4.8E-18	-	-	-	-	-	-	-	-
PCB-118	9.8E-11	1.2E-11	1.4E-11	1.7E-12	4.2E-15	5.0E-16	-	-	-	-	-	-	-	-
PCB-123	1.4E-12	1.6E-13	1.9E-13	2.3E-14	5.8E-17	7.0E-18	-	-	-	-	-	-	-	-
PCB-126	3.8E-12	4.5E-13	5.3E-13	6.3E-14	1.6E-16	1.9E-17	-	-	-	-	-	-	-	-
PCB-156	3.2E-11	3.9E-12	4.5E-12	5.4E-13	1.4E-15	1.6E-16	-	-	-	-	-	-	-	-
PCB-157	1.4E-11	1.7E-12	2.0E-12	2.4E-13	6.0E-16	7.2E-17	-	-	-	-	-	-	-	-
PCB-167	2.5E-11	3.0E-12	3.4E-12	4.1E-13	1.0E-15	1.3E-16	-	-	-	-	-	-	-	-
PCB-169	3.7E-13	4.4E-14	5.1E-14	6.2E-15	1.6E-17	1.9E-18	-	-	-	-	-	-	-	-
PCB-189	3.7E-12	4.4E-13	5.1E-13	6.2E-14	1.6E-16	1.9E-17	-	-	-	-	-	-	-	-
PCB-77	7.5E-12	9.0E-13	1.1E-12	1.3E-13	3.2E-16	3.8E-17	-	-	-	-	-	-	-	-
PCB-81	1.3E-12	1.6E-13	1.9E-13	2.2E-14	5.7E-17	6.8E-18	-	-	-	-	-	-	-	-

Spreadsheet C3-32a (3 of 4)

Estimated Human Intake for the Adult Worker - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Reasonable Maximum Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation of Indoor Air_s		Inhalation Ambient Air_s		Inhalation of Indoor Air_{gw}		Inhalation Ambient Air_{gw}	
	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)
Inorganic Compounds														
Cadmium	2.2E-06	7.4E-07	5.6E-09	1.9E-09	5.5E-11	1.8E-11	-	-	-	-	-	-	-	-
Copper	8.9E-05	3.0E-05	2.2E-06	7.5E-07	2.2E-09	7.3E-10	-	-	-	-	-	-	-	-
Fluoride	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Lead	6.6E-05	2.2E-05	1.7E-06	5.5E-07	1.6E-09	5.4E-10	-	-	-	-	-	-	-	-
Mercury	8.6E-06	2.9E-06	2.2E-07	7.2E-08	2.1E-10	7.1E-11	-	-	-	-	-	-	-	-
Methyl Mercury	7.1E-09	2.4E-09	1.8E-10	5.9E-11	1.7E-13	5.8E-14	-	-	-	-	-	-	-	-
Nitrate	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Silver	5.6E-06	1.9E-06	1.4E-07	4.7E-08	1.4E-10	4.6E-11	-	-	-	-	-	-	-	-
Thallium	6.5E-07	2.2E-07	1.6E-08	5.4E-09	1.6E-11	5.3E-12	-	-	-	-	-	-	-	-
Zinc	8.6E-04	2.9E-04	2.1E-05	7.1E-06	2.1E-08	7.0E-09	-	-	-	-	-	-	-	-
VOCs														
1,1,1-Trichloroethane	-	-	-	-	-	-	2.5E-05	8.2E-06	-	-	-	-	-	-
1,1,2-Trichloro-1,2,2-trifluoroethane	2.3E-08	7.8E-09	5.9E-09	2.0E-09	-	-	1.4E-04	4.7E-05	-	-	-	-	-	-
1,1-Dichloroethane	-	-	-	-	-	-	2.4E-05	8.0E-06	3.3E-07	1.1E-07	1.6E-07	5.3E-08	3.3E-07	1.1E-07
1,2-Dichloroethane	-	-	-	-	-	-	-	-	7.7E-08	2.6E-08	2.6E-08	8.6E-09	7.7E-08	2.6E-08
1,2-Dichloroethene (total)	1.4E-07	4.6E-08	3.4E-08	1.1E-08	-	-	-	-	-	-	-	-	-	-
1-Chlorohexane	-	-	-	-	-	-	-	-	-	-	-	-	-	-
2-Butanone	7.2E-08	2.4E-08	1.8E-08	6.0E-09	-	-	-	-	-	-	-	-	-	-
2-Hexanone	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Acetone	8.2E-06	2.7E-06	2.0E-06	6.8E-07	-	-	-	-	2.9E-09	9.7E-10	1.1E-09	3.5E-10	2.9E-09	9.7E-10
Benzene	-	-	-	-	-	-	-	-	3.8E-07	1.3E-07	1.4E-07	4.8E-08	3.8E-07	1.3E-07
Carbon disulfide	-	-	-	-	-	-	-	-	-	-	7.8E-07	2.6E-07	2.6E-06	8.7E-07
Chloromethane	-	-	-	-	-	-	-	-	-	-	2.2E-07	7.2E-08	1.0E-06	3.3E-07
cis-1,2-Dichloroethene	-	-	-	-	-	-	-	-	2.4E-07	7.9E-08	8.4E-08	2.8E-08	2.4E-07	7.9E-08
Ethylbenzene	-	-	-	-	-	-	2.4E-05	8.0E-06	-	-	-	-	-	-
m,p-Xylene	-	-	-	-	-	-	4.6E-05	1.5E-05	-	-	-	-	-	-
Methylene chloride	2.5E-08	8.5E-09	6.4E-09	2.1E-09	-	-	7.0E-04	2.3E-04	1.8E-07	6.0E-08	4.5E-08	1.5E-08	1.8E-07	6.0E-08
Tetrachloroethene	1.7E-07	5.8E-08	4.3E-08	1.4E-08	-	-	2.4E-05	7.8E-06	-	-	-	-	-	-
Toluene	6.7E-07	2.2E-07	1.7E-07	5.6E-08	-	-	2.6E-05	8.6E-06	-	-	-	-	-	-
Trichloroethene	4.0E-07	1.3E-07	9.9E-08	3.3E-08	-	-	2.5E-05	8.2E-06	6.2E-07	2.1E-07	1.9E-07	6.5E-08	6.2E-07	2.1E-07
Xylenes (total)	1.0E-07	3.3E-08	2.5E-08	8.4E-09	-	-	-	-	-	-	-	-	-	-
SVOCs														
2-Methylnaphthalene	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Acenaphthene	2.0E-07	6.5E-08	6.4E-08	2.1E-08	4.8E-12	1.6E-12	-	-	-	-	-	-	-	-
Acenaphthylene	1.7E-07	5.5E-08	5.4E-08	1.8E-08	4.1E-12	1.4E-12	-	-	-	-	-	-	-	-
Anthracene	1.6E-07	5.3E-08	5.2E-08	1.7E-08	3.9E-12	1.3E-12	-	-	-	-	-	-	-	-
Benzo(a)anthracene	2.9E-07	9.7E-08	9.4E-08	3.1E-08	7.1E-12	2.4E-12	-	-	-	-	-	-	-	-
Benzo(a)pyrene	2.9E-07	9.7E-08	9.4E-08	3.1E-08	7.1E-12	2.4E-12	-	-	-	-	-	-	-	-
Benzo(e)pyrene	1.2E-07	4.1E-08	4.0E-08	1.3E-08	3.0E-12	1.0E-12	-	-	-	-	-	-	-	-
Benzo(b)fluoranthene	5.2E-07	1.7E-07	1.7E-07	5.6E-08	1.3E-11	4.2E-12	-	-	-	-	-	-	-	-
Benzo(g,h,i)perylene	1.8E-07	5.9E-08	5.7E-08	1.9E-08	4.3E-12	1.4E-12	-	-	-	-	-	-	-	-
Benzo(k)fluoranthene	1.7E-07	5.5E-08	5.4E-08	1.8E-08	4.1E-12	1.4E-12	-	-	-	-	-	-	-	-
Chrysene	4.2E-07	1.4E-07	1.4E-07	4.6E-08	1.0E-11	3.5E-12	-	-	-	-	-	-	-	-
Dibenz(a,h)anthracene	1.7E-07	5.5E-08	5.4E-08	1.8E-08	4.1E-12	1.4E-12	-	-	-	-	-	-	-	-
Dibenzofuran	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Fluoranthene	7.3E-07	2.4E-07	2.4E-07	8.0E-08	1.8E-11	6.0E-12	-	-	-	-	-	-	-	-
Fluorene	1.9E-07	6.5E-08	6.3E-08	2.1E-08	4.8E-12	1.6E-12	-	-	-	-	-	-	-	-
Indeno(1,2,3-cd)pyrene	2.7E-07	8.8E-08	8.6E-08	2.9E-08	6.5E-12	2.2E-12	-	-	-	-	-	-	-	-
Naphthalene	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Perylene	7.0E-08	2.3E-08	2.3E-08	7.6E-09	1.7E-12	5.7E-13	-	-	-	-	-	-	-	-
Phenanthrene	3.9E-07	1.3E-07	1.3E-07	4.3E-08	9.6E-12	3.2E-12	-	-	-	-	-	-	-	-
Pyrene	3.1E-07	1.0E-07	9.9E-08	3.3E-08	7.5E-12	2.5E-12	-	-	-	-	-	-	-	-
Total Petroleum Hydrocarbons														
C11-C14(Kerosene Range)	7.8E-05	2.6E-05	2.5E-05	8.5E-06	1.9E-09	6.4E-10	-	-	-	-	-	-	-	-
C14-C20(Diesel Range)	1.5E-05	4.9E-06	4.7E-06	1.6E-06	3.6E-10	1.2E-10	-	-	-	-	-	-	-	-
C20-C30(Lubricant Oil Range)	9.2E-04	3.1E-04	3.0E-04	1.0E-04	2.3E-08	7.5E-09	-	-	-	-	-	-	-	-

Spreadsheet C3-32a (4 of 4)

Estimated Human Intake for the Adult Worker - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Reasonable Maximum Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation of Indoor Air_s		Inhalation Ambient Air_s		Inhalation of Indoor Air_{gw}		Inhalation Ambient Air_{gw}	
	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)
PCDD/PCDFs														
2,3,7,8-TCDD	1.0E-12	3.5E-13	7.8E-14	2.6E-14	2.6E-17	8.5E-18	-	-	-	-	-	-	-	-
1,2,3,7,8-PeCDD	4.3E-12	1.4E-12	3.2E-13	1.1E-13	1.0E-16	3.5E-17	-	-	-	-	-	-	-	-
1,2,3,4,7,8-HxCDD	1.8E-11	5.9E-12	1.3E-12	4.4E-13	4.3E-16	1.4E-16	-	-	-	-	-	-	-	-
1,2,3,6,7,8-HxCDD	5.8E-11	1.9E-11	4.3E-12	1.4E-12	1.4E-15	4.7E-16	-	-	-	-	-	-	-	-
1,2,3,7,8,9-HxCDD	2.0E-11	6.5E-12	1.5E-12	4.9E-13	4.8E-16	1.6E-16	-	-	-	-	-	-	-	-
1,2,3,4,6,7,8-HpCDD	2.3E-09	7.7E-10	1.7E-10	5.8E-11	5.7E-14	1.9E-14	-	-	-	-	-	-	-	-
OCDD	3.3E-08	1.1E-08	2.5E-09	8.2E-10	8.1E-13	2.7E-13	-	-	-	-	-	-	-	-
2,3,7,8-TCDF	1.5E-12	5.1E-13	1.2E-13	3.9E-14	3.8E-17	1.3E-17	-	-	-	-	-	-	-	-
1,2,3,7,8-PeCDF	1.1E-12	3.7E-13	8.4E-14	2.8E-14	2.8E-17	9.2E-18	-	-	-	-	-	-	-	-
2,3,4,7,8-PeCDF	3.1E-12	1.0E-12	2.3E-13	7.7E-14	7.5E-17	2.5E-17	-	-	-	-	-	-	-	-
1,2,3,4,7,8-HxCDF	6.5E-12	2.2E-12	4.9E-13	1.6E-13	1.6E-16	5.4E-17	-	-	-	-	-	-	-	-
1,2,3,6,7,8-HxCDF	6.2E-12	2.1E-12	4.6E-13	1.5E-13	1.5E-16	5.1E-17	-	-	-	-	-	-	-	-
2,3,4,6,7,8-HxCDF	1.7E-11	5.7E-12	1.3E-12	4.3E-13	4.2E-16	1.4E-16	-	-	-	-	-	-	-	-
1,2,3,7,8,9-HxCDF	1.9E-12	6.3E-13	1.4E-13	4.7E-14	4.6E-17	1.5E-17	-	-	-	-	-	-	-	-
1,2,3,4,6,7,8-HpCDF	1.9E-10	6.3E-11	1.4E-11	4.7E-12	4.6E-15	1.5E-15	-	-	-	-	-	-	-	-
1,2,3,4,7,8,9-HpCDF	1.8E-11	6.0E-12	1.4E-12	4.5E-13	4.4E-16	1.5E-16	-	-	-	-	-	-	-	-
OCDF	4.6E-10	1.5E-10	3.5E-11	1.2E-11	1.1E-14	3.8E-15	-	-	-	-	-	-	-	-
PCBs														
Aroclor-1254	8.4E-07	2.8E-07	2.9E-07	9.8E-08	2.1E-11	6.9E-12	-	-	-	-	-	-	-	-
Aroclor-1260	1.4E-05	4.8E-06	5.0E-06	1.7E-06	3.5E-10	1.2E-10	-	-	-	-	-	-	-	-
PCB-105	1.1E-09	3.7E-10	3.9E-10	1.3E-10	2.7E-14	9.0E-15	-	-	-	-	-	-	-	-
PCB-114	2.0E-11	6.5E-12	6.9E-12	2.3E-12	4.8E-16	1.6E-16	-	-	-	-	-	-	-	-
PCB-118	2.2E-09	7.4E-10	7.7E-10	2.6E-10	5.4E-14	1.8E-14	-	-	-	-	-	-	-	-
PCB-123	3.1E-11	1.0E-11	1.1E-11	3.7E-12	7.7E-16	2.6E-16	-	-	-	-	-	-	-	-
PCB-126	8.6E-11	2.9E-11	3.0E-11	1.0E-11	2.1E-15	7.0E-16	-	-	-	-	-	-	-	-
PCB-156	7.4E-10	2.5E-10	2.6E-10	8.6E-11	1.8E-14	6.0E-15	-	-	-	-	-	-	-	-
PCB-157	3.3E-10	1.1E-10	1.2E-10	3.9E-11	8.1E-15	2.7E-15	-	-	-	-	-	-	-	-
PCB-167	5.8E-10	1.9E-10	2.0E-10	6.7E-11	1.4E-14	4.7E-15	-	-	-	-	-	-	-	-
PCB-169	8.6E-12	2.9E-12	3.0E-12	1.0E-12	2.1E-16	7.0E-17	-	-	-	-	-	-	-	-
PCB-189	8.6E-11	2.9E-11	3.0E-11	1.0E-11	2.1E-15	7.0E-16	-	-	-	-	-	-	-	-
PCB-77	1.7E-10	5.7E-11	6.0E-11	2.0E-11	4.2E-15	1.4E-15	-	-	-	-	-	-	-	-
PCB-81	3.0E-11	1.0E-11	1.1E-11	3.5E-12	7.5E-16	2.5E-16	-	-	-	-	-	-	-	-

Notes:
Inhalation Indoor Air $_{s-gw}$ - Exposure associated with indoor air concentrations of COPCs modeled from soil vapor, soil, or groundwater.
Inhalation Ambient Air $_{s-gw}$ - Exposure associated with ambient air concentrations of COPCs modeled from soil or groundwater.
ADD - Average daily dose, as defined in the SRAM (MWH 2005).
LADD - Lifetime average daily dose, as defined in the SRAM (MWH 2005).
The chemicals presented in this table are comprehensive for all media sampled. Not all chemicals were analyzed for or detected in all media.
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCDD/PCDF - Polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.
PCB - polychlorinated biphenyls
COPC - chemical of potential concern
"-" indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
mg/kg-day - milligrams per kilogram per day

Concentration-Toxicity Screen for Soil Depth Intervals - Wet Pond Scenario[a]
Sodium Reactor Experiment (SRE) Area

Central Tendancy Exposure

Chemical	Soil (0-2 feet bgs)		Soil (0-10 feet bgs)	
	Noncancer (unitless)	Cancer (unitless)	Noncancer (unitless)	Cancer (unitless)
Inorganic Compounds				
Aluminum	NC	NC	NC	NC
Antimony	NC	NC	NC	NC
Arsenic	NC	NC	NC	NC
Cadmium	2.4E+02	9.1E-02	1.9E+02	7.3E-02
Chromium	NC	NC	NC	NC
Copper	2.5E+02	NTV	2.4E+02	NTV
Fluoride	NC	NC	NC	NC
Lead	NTV	NTV	NTV	NTV
Mercury	7.1E+03	NTV	5.8E+03	NTV
Methyl Mercury	1.7E+01	NTV	1.7E+01	NTV
Nickel	NC	NC	NC	NC
Nitrate	NC	NC	NC	NC
Silver	2.0E+02	NTV	2.6E+02	NTV
Thallium	4.1E+03	NTV	1.2E+04	NTV
Vanadium	NC	NC	NC	NC
Zinc	2.8E+02	NTV	2.3E+02	NTV
VOCs				
1,1,1-Trichloroethane	NC	NC	NC	NC
1,1,2-Trichloro-1,2,2-trifluoroethane	4.0E-04	NTV	4.0E-04	NTV
1,1-Dichloroethane	NC	NC	NC	NC
1,2-Dichloroethane	NC	NC	NC	NC
1,2-Dichloroethene (total)	NC	NC	NC	NC
1-Chlorohexane	NC	NC	NTV	NTV
2-Butanone	3.6E-02	NTV	3.2E-02	NTV
2-Hexanone	NC	NC	NTV	NTV
Acetone	1.2E+00	NTV	6.9E-01	NTV
Benzene	NC	NC	NC	NC
Chloromethane	NC	NC	NC	NC
cis-1,2-Dichloroethene	NC	NC	NC	NC
Ethylbenzene	NC	NC	NC	NC
m,p-Xylene	NC	NC	1.7E-02	NTV
Methylene chloride	1.7E-01	1.4E-04	1.6E-01	1.4E-04
Tetrachloroethene	NC	NC	NC	NC
Toluene	NC	NC	NC	NC
Trichloroethene	NC	NC	NC	NC
Xylenes (total)	NC	NC	NC	NC
SVOCs				
2-Methylnaphthalene	NC	NC	5.4E+00	NTV
Acenaphthene	4.4E-01	NTV	1.1E+00	NTV
Acenaphthylene	1.5E-01	NTV	1.6E-01	NTV
Anthracene	5.9E-02	NTV	6.5E-01	NTV
Benzo(a)anthracene	NTV	3.4E-03	NTV	9.8E-01
Benzo(a)pyrene	NTV	3.6E-02	NTV	1.1E+01
Benzo(e)pyrene	NTV	NTV	NTV	NTV
Benzo(b)fluoranthene	NTV	5.2E-03	NTV	9.4E-01
Benzo(g,h,i)perylene	NTV	NTV	NTV	NTV
Benzo(k)fluoranthene	NTV	3.4E-03	NTV	1.0E+00
Chrysene	NTV	6.1E-04	NTV	7.1E-02
Dibenz(a,h)anthracene	NTV	7.7E-03	NTV	4.7E-01
Dibenzofuran	NC	NC	1.4E+02	NTV
Fluoranthene	1.4E-01	NTV	3.6E+01	NTV
Fluorene	6.5E-01	NTV	1.7E+00	NTV
Indeno(1,2,3-cd)pyrene	NTV	3.3E-03	NTV	4.4E-01
Naphthalene	NC	NC	9.8E-01	NTV
Perylene	NTV	NTV	NTV	NTV
Phenanthrene	2.4E+00	NTV	2.3E+01	NTV
Pyrene	2.7E-01	NTV	4.1E+01	NTV

Concentration-Toxicity Screen for Soil Depth Intervals - Wet Pond Scenario[a]
Sodium Reactor Experiment (SRE) Area

Central Tendancy Exposure

Chemical	Soil (0-2 ft)		Soil (0-10 ft)	
	Noncancer (unitless)	Cancer (unitless)	Noncancer (unitless)	Cancer (unitless)
Total Petroleum Hydrocarbons				
C11-C14(Kerosene Range)	NTV	NTV	NTV	NTV
C14-C20(Diesel Range)	NC	NC	NTV	NTV
C20-C30(Lubricant Oil Range)	NTV	NTV	NTV	NTV
PCDD/PCDFs				
2,3,7,8-TCDD	NTV	2.4E-02	NTV	1.9E-02
1,2,3,7,8-PeCDD	NTV	9.5E-02	NTV	7.3E-02
1,2,3,4,7,8-HxCDD	NTV	2.8E-02	NTV	2.1E-02
1,2,3,6,7,8-HxCDD	NTV	1.4E-01	NTV	1.1E-01
1,2,3,7,8,9-HxCDD	NTV	5.9E-02	NTV	4.5E-02
1,2,3,4,6,7,8-HpCDD	NTV	1.2E-01	NTV	9.2E-02
OCDD	NTV	1.9E-01	NTV	1.5E-01
2,3,7,8-TCDF	NTV	6.1E-03	NTV	4.7E-03
1,2,3,7,8-PeCDF	NTV	2.1E-04	NTV	1.7E-04
2,3,4,7,8-PeCDF	NTV	2.1E-02	NTV	1.6E-02
1,2,3,4,7,8-HxCDF	NTV	1.5E-02	NTV	1.1E-02
1,2,3,6,7,8-HxCDF	NTV	1.2E-02	NTV	9.3E-03
2,3,4,6,7,8-HxCDF	NTV	2.3E-02	NTV	1.8E-02
1,2,3,7,8,9-HxCDF	NTV	2.1E-03	NTV	1.8E-03
1,2,3,4,6,7,8-HpCDF	NTV	4.8E-02	NTV	3.6E-02
1,2,3,4,7,8,9-HpCDF	NTV	4.1E-03	NTV	3.1E-03
OCDF	NTV	3.9E-03	NTV	2.9E-03
PCBs				
Aroclor-1254	8.5E+03	3.4E-01	8.2E+03	3.3E-01
Aroclor-1260	NTV	2.9E+00	NTV	2.8E+00
PCB-105	NTV	4.9E-04	NTV	4.7E-04
PCB-114	NTV	9.3E-06	NTV	8.9E-06
PCB-118	NTV	9.9E-04	NTV	9.4E-04
PCB-123	NTV	1.4E-05	NTV	1.3E-05
PCB-126	NTV	1.3E-01	NTV	1.2E-01
PCB-156	NTV	3.2E-04	NTV	3.1E-04
PCB-157	NTV	1.4E-04	NTV	1.4E-04
PCB-167	NTV	2.5E-04	NTV	2.4E-04
PCB-169	NTV	3.7E-03	NTV	3.5E-03
PCB-189	NTV	3.7E-05	NTV	3.5E-05
PCB-77	NTV	2.5E-04	NTV	2.4E-04
PCB-81	NTV	1.3E-04	NTV	1.3E-04
Cumulative Risk	2.1E+04	4.4E+00	2.8E+04	1.8E+01

Concentration-Toxicity Screen for Soil Depth Intervals - Wet Pond Scenario[a]
Sodium Reactor Experiment (SRE) Area

Reasonable Maximum Exposure

Chemical	Soil (0-2 feet bgs)		Soil (0-10 feet bgs)	
	Noncancer (unitless)	Cancer (unitless)	Noncancer (unitless)	Cancer (unitless)
Inorganic Compounds				
Aluminum	NC	NC	NC	NC
Antimony	NC	NC	NC	NC
Arsenic	NC	NC	NC	NC
Cadmium	4.2E+02	1.6E-01	3.0E+02	1.2E-01
Chromium	NC	NC	NC	NC
Copper	5.0E+02	NTV	4.4E+02	NTV
Fluoride	NC	NC	NC	NC
Lead	NTV	NTV	NTV	NTV
Mercury	1.8E+04	NTV	1.3E+04	NTV
Methyl Mercury	3.6E+01	NTV	3.6E+01	NTV
Nickel	NC	NC	NC	NC
Nitrate	NC	NC	NC	NC
Silver	5.5E+02	NTV	5.4E+02	NTV
Thallium	4.1E+03	NTV	4.5E+04	NTV
Vanadium	NC	NC	NC	NC
Zinc	6.3E+02	NTV	7.3E+02	NTV
VOCs				
1,1,1-Trichloroethane	NC	NC	NC	NC
1,1,2-Trichloro-1,2,2-trifluoroethane	4.0E-04	NTV	4.0E-04	NTV
1,1-Dichloroethane	NC	NC	NC	NC
1,2-Dichloroethane	NC	NC	NC	NC
1,2-Dichloroethene (total)	NC	NC	NC	NC
1-Chlorohexane	NC	NC	NTV	NTV
2-Butanone	5.8E-02	NTV	4.5E-02	NTV
2-Hexanone	NC	NC	NTV	NTV
Acetone	5.8E+00	NTV	5.8E+00	NTV
Benzene	NC	NC	NC	NC
Carbon disulfide	NC	NC	NC	NC
Chloromethane	NC	NC	NC	NC
cis-1,2-Dichloroethene	NC	NC	NC	NC
Ethylbenzene	NC	NC	NC	NC
m,p-Xylene	NC	NC	0.0E+00	NTV
Methylene chloride	2.2E-01	1.8E-04	1.9E-01	1.6E-04
Tetrachloroethene	NC	NC	NC	NC
Toluene	NC	NC	NC	NC
Trichloroethene	NC	NC	NC	NC
Xylenes (total)	NC	NC	NC	NC
SVOCs				
2-Methylnaphthalene	NC	NC	6.3E+00	NTV
Acenaphthene	1.8E+00	NTV	4.2E+00	NTV
Acenaphthylene	5.2E-01	NTV	4.5E-01	NTV
Anthracene	2.4E-01	NTV	3.3E+00	NTV
Benzo(a)anthracene	NTV	1.1E-02	NTV	1.7E+01
Benzo(a)pyrene	NTV	1.1E-01	NTV	1.8E+02
Benzo(e)pyrene	NTV	NTV	NTV	NTV
Benzo(b)fluoranthene	NTV	1.3E-02	NTV	8.2E+00
Benzo(g,h,i)perylene	NTV	NTV	NTV	NTV
Benzo(k)fluoranthene	NTV	1.0E-02	NTV	1.8E+01
Chrysene	NTV	1.5E-03	NTV	7.8E-01
Dibenz(a,h)anthracene	NTV	2.8E-02	NTV	4.6E+00
Dibenzofuran	NC	NC	1.4E+02	NTV
Fluoranthene	3.0E-01	NTV	3.3E+02	NTV
Fluorene	2.7E+00	NTV	6.5E+00	NTV
Indeno(1,2,3-cd)pyrene	NTV	1.0E-02	NTV	4.0E+00
Naphthalene	NC	NC	2.9E+00	NTV
Perylene	NTV	NTV	NTV	NTV
Phenanthrene	9.9E+00	NTV	1.9E+02	NTV
Pyrene	9.4E-01	NTV	3.6E+02	NTV

Concentration-Toxicity Screen for Soil Depth Intervals - Wet Pond Scenario[a]
Sodium Reactor Experiment (SRE) Area

Reasonable Maximum Exposure

Chemical	Soil (0-2 ft)		Soil (0-10 ft)	
	Noncancer (unitless)	Cancer (unitless)	Noncancer (unitless)	Cancer (unitless)
Total Petroleum Hydrocarbons				
C11-C14(Kerosene Range)	NTV	NTV	NTV	NTV
C14-C20(Diesel Range)	NC	NC	NTV	NTV
C20-C30(Lubricant Oil Range)	NTV	NTV	NTV	NTV
PCDD/PCDFs				
2,3,7,8-TCDD	NTV	5.2E-02	NTV	4.5E-02
1,2,3,7,8-PeCDD	NTV	2.0E-01	NTV	1.7E-01
1,2,3,4,7,8-HxCDD	NTV	5.5E-02	NTV	4.8E-02
1,2,3,6,7,8-HxCDD	NTV	2.6E-01	NTV	2.4E-01
1,2,3,7,8,9-HxCDD	NTV	1.3E-01	NTV	1.1E-01
1,2,3,4,6,7,8-HpCDD	NTV	2.0E-01	NTV	1.9E-01
OCDD	NTV	2.9E-01	NTV	2.9E-01
2,3,7,8-TCDF	NTV	1.0E-02	NTV	1.0E-02
1,2,3,7,8-PeCDF	NTV	4.5E-04	NTV	4.5E-04
2,3,4,7,8-PeCDF	NTV	3.9E-02	NTV	3.5E-02
1,2,3,4,7,8-HxCDF	NTV	2.4E-02	NTV	2.3E-02
1,2,3,6,7,8-HxCDF	NTV	2.4E-02	NTV	2.1E-02
2,3,4,6,7,8-HxCDF	NTV	3.9E-02	NTV	3.7E-02
1,2,3,7,8,9-HxCDF	NTV	2.3E-03	NTV	2.3E-03
1,2,3,4,6,7,8-HpCDF	NTV	6.5E-02	NTV	6.5E-02
1,2,3,4,7,8,9-HpCDF	NTV	5.5E-03	NTV	5.5E-03
OCDF	NTV	5.9E-03	NTV	5.9E-03
PCBs				
Aroclor-1254	2.2E+04	8.6E-01	2.2E+04	8.6E-01
Aroclor-1260	NTV	1.6E+01	NTV	1.5E+01
PCB-105	NTV	2.5E-03	NTV	2.4E-03
PCB-114	NTV	4.4E-05	NTV	4.3E-05
PCB-118	NTV	5.0E-03	NTV	4.9E-03
PCB-123	NTV	7.1E-05	NTV	6.9E-05
PCB-126	NTV	6.5E-01	NTV	6.3E-01
PCB-156	NTV	1.7E-03	NTV	1.6E-03
PCB-157	NTV	7.5E-04	NTV	7.3E-04
PCB-167	NTV	1.3E-03	NTV	1.3E-03
PCB-169	NTV	1.9E-02	NTV	1.9E-02
PCB-189	NTV	1.9E-04	NTV	1.9E-04
PCB-77	NTV	1.3E-03	NTV	1.3E-03
PCB-81	NTV	6.8E-04	NTV	6.7E-04
Cumulative Risk	4.6E+04	1.9E+01	8.2E+04	2.5E+02

Notes:

a. Cancer concentration-toxicity screen value = soil concentration x oral cancer slope factor. Noncancer concentration-toxicity screen value = soil concentration / oral reference dose. Concentration-toxicity screen values are for comparative purposes only and are not an indication of risk.

NTV - indicates that adequate toxicity data were not available for a chemical.

NC - indicates that a chemical was not selected as a soil COPC at the specified depth interval.

VOC - volatile organic compound

SVOC - semi-volatile organic compound

PCDD/PCDF - Polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.

PCB - polychlorinated biphenyls

bgs - below ground surface

Concentration-Toxicity Screen for Soil Depth Intervals - Dry Pond Scenario[a]
Sodium Reactor Experiment (SRE) Area

Central Tendancy Exposure

Chemical	Soil (0-2 feet bgs)		Soil (0-10 feet bgs)	
	Noncancer (unitless)	Cancer (unitless)	Noncancer (unitless)	Cancer (unitless)
Inorganic Compounds				
Cadmium	5.1E+02	1.9E-01	3.7E+02	1.4E-01
Copper	5.3E+02	NTV	4.2E+02	NTV
Fluoride	NC	NC	NC	NC
Lead	3.7E+04	NTV	2.9E+04	NTV
Mercury	6.4E+03	NTV	4.8E+03	NTV
Methyl Mercury	1.7E+01	NTV	1.7E+01	NTV
Nitrate	NC	NC	NC	NC
Silver	1.5E+02	NTV	1.9E+02	NTV
Thallium	4.1E+03	NTV	1.3E+04	NTV
Zinc	5.7E+02	NTV	4.0E+02	NTV
VOCs				
1,1,1-Trichloroethane	NC	NC	1.5E-01	NTV
1,1,2-Trichloro-1,2,2-trifluoroethane	4.0E-04	NTV	4.0E-04	NTV
1,1-Dichloroethane	NC	NC	2.0E-01	1.2E-04
1,2-Dichloroethane	NC	NC	NC	NC
1,2-Dichloroethene (total)	1.4E+00	NTV	1.3E+00	NTV
1-Chlorohexane	NC	NC	NTV	NTV
2-Butanone	6.2E-02	NTV	6.2E-02	NTV
2-Hexanone	NC	NC	NTV	NTV
Acetone	7.5E-01	NTV	5.2E-01	NTV
Benzene	NC	NC	NC	NC
Chloromethane	NC	NC	NC	NC
cis-1,2-Dichloroethene	NC	NC	NC	NC
Ethylbenzene	NC	NC	1.7E-01	NTV
m,p-Xylene	NC	NC	1.6E-02	NTV
Methylene chloride	2.2E-01	1.8E-04	6.1E+00	5.1E-03
Tetrachloroethene	2.1E+00	1.1E-02	3.7E+00	2.0E-02
Toluene	7.0E-01	NTV	3.5E+00	NTV
Trichloroethene	1.2E+02	4.8E-04	3.0E+02	1.2E-03
Xylenes (total)	1.3E-01	NTV	3.2E-01	NTV
SVOCs				
2-Methylnaphthalene	NC	NC	6.3E+00	NTV
Acenaphthene	7.4E-01	NTV	1.1E+00	NTV
Acenaphthylene	1.0E+00	NTV	1.1E+00	NTV
Anthracene	1.3E-01	NTV	4.4E-01	NTV
Benzo(a)anthracene	NTV	4.3E-02	NTV	5.5E-01
Benzo(a)pyrene	NTV	4.3E-01	NTV	5.9E+00
Benzo(e)pyrene	NTV	NTV	NTV	NTV
Benzo(b)fluoranthene	NTV	5.9E-02	NTV	5.4E-01
Benzo(g,h,i)perylene	NTV	NTV	NTV	NTV
Benzo(k)fluoranthene	NTV	3.6E-02	NTV	5.8E-01
Chrysene	NTV	5.3E-03	NTV	4.2E-02
Dibenz(a,h)anthracene	NTV	1.2E-01	NTV	3.7E-01
Dibenzofuran	NC	NC	4.9E+01	NTV
Fluoranthene	1.5E+00	NTV	2.0E+01	NTV
Fluorene	1.1E+00	NTV	1.7E+00	NTV
Indeno(1,2,3-cd)pyrene	NTV	4.1E-02	NTV	2.7E-01
Naphthalene	NC	NC	2.4E+00	NTV
Perylene	NTV	NTV	NTV	NTV
Phenanthrene	2.6E+00	NTV	1.3E+01	NTV
Pyrene	1.8E+00	NTV	2.3E+01	NTV

Concentration-Toxicity Screen for Soil Depth Intervals - Dry Pond Scenario[a]
Sodium Reactor Experiment (SRE) Area

Central Tendancy Exposure

Chemical	Soil (0-2 ft)		Soil (0-10 ft)	
	Noncancer (unitless)	Cancer (unitless)	Noncancer (unitless)	Cancer (unitless)
Total Petroleum Hydrocarbons				
C11-C14(Kerosene Range)	NTV	NTV	NTV	NTV
C14-C20(Diesel Range)	NTV	NTV	NTV	NTV
C20-C30(Lubricant Oil Range)	NTV	NTV	NTV	NTV
PCDD/PCDFs				
2,3,7,8-TCDD	NTV	3.5E-02	NTV	2.9E-02
1,2,3,7,8-PeCDD	NTV	1.4E-01	NTV	1.2E-01
1,2,3,4,7,8-HxCDD	NTV	5.3E-02	NTV	4.3E-02
1,2,3,6,7,8-HxCDD	NTV	2.1E-01	NTV	1.6E-01
1,2,3,7,8,9-HxCDD	NTV	7.7E-02	NTV	6.2E-02
1,2,3,4,6,7,8-HpCDD	NTV	2.2E-01	NTV	1.8E-01
OCDD	NTV	3.3E-01	NTV	2.6E-01
2,3,7,8-TCDF	NTV	7.2E-03	NTV	5.8E-03
1,2,3,7,8-PeCDF	NTV	3.2E-04	NTV	2.7E-04
2,3,4,7,8-PeCDF	NTV	3.2E-02	NTV	2.6E-02
1,2,3,4,7,8-HxCDF	NTV	2.3E-02	NTV	1.9E-02
1,2,3,6,7,8-HxCDF	NTV	2.0E-02	NTV	1.6E-02
2,3,4,6,7,8-HxCDF	NTV	5.0E-02	NTV	4.0E-02
1,2,3,7,8,9-HxCDF	NTV	4.7E-03	NTV	4.0E-03
1,2,3,4,6,7,8-HpCDF	NTV	6.8E-02	NTV	5.5E-02
1,2,3,4,7,8,9-HpCDF	NTV	6.3E-03	NTV	5.1E-03
OCDF	NTV	5.3E-03	NTV	4.2E-03
PCBs				
Aroclor-1254	8.1E+03	3.2E-01	7.8E+03	3.1E-01
Aroclor-1260	NTV	2.7E+00	NTV	2.5E+00
PCB-105	NTV	4.5E-04	NTV	4.3E-04
PCB-114	NTV	8.5E-06	NTV	8.1E-06
PCB-118	NTV	8.9E-04	NTV	8.6E-04
PCB-123	NTV	1.2E-05	NTV	1.2E-05
PCB-126	NTV	1.1E-01	NC	NC
PCB-156	NTV	2.9E-04	NC	NC
PCB-157	NTV	1.3E-04	NC	NC
PCB-167	NTV	2.2E-04	NC	NC
PCB-169	NTV	3.3E-03	NC	NC
PCB-189	NTV	3.3E-05	NC	NC
PCB-77	NTV	2.3E-04	NC	NC
PCB-81	NTV	1.2E-04	NC	NC
Cumulative Risk	5.8E+04	5.3E+00	5.6E+04	1.2E+01

Concentration-Toxicity Screen for Soil Depth Intervals - Dry Pond Scenario[a]
Sodium Reactor Experiment (SRE) Area

Reasonable Maximum Exposure

Chemical	Soil (0-2 feet bgs)		Soil (0-10 feet bgs)	
	Noncancer (unitless)	Cancer (unitless)	Noncancer (unitless)	Cancer (unitless)
Inorganic Compounds				
Cadmium	1.1E+03	4.3E-01	1.5E+03	5.6E-01
Copper	1.1E+03	NTV	7.8E+02	NTV
Fluoride	NC	NC	NC	NC
Lead	7.9E+04	NTV	5.3E+04	NTV
Mercury	1.5E+04	NTV	1.5E+04	NTV
Methyl Mercury	3.6E+01	NTV	3.6E+01	NTV
Nitrate	NC	NC	NC	NC
Silver	5.7E+02	NTV	7.4E+02	NTV
Thallium	4.1E+03	NTV	3.5E+04	NTV
Zinc	1.5E+03	NTV	1.6E+03	NTV
VOCs				
1,1,1-Trichloroethane	NC	NC	8.6E-01	NTV
1,1,2-Trichloro-1,2,2-trifluoroethane	4.0E-04	NTV	4.0E-04	NTV
1,1-Dichloroethane	NC	NC	7.5E-01	4.3E-04
1,2-Dichloroethane	NC	NC	NC	NC
1,2-Dichloroethene (total)	3.5E+00	NTV	2.5E+00	NTV
1-Chlorohexane	NC	NC	NTV	NTV
2-Butanone	6.2E-02	NTV	6.2E-02	NTV
2-Hexanone	NC	NC	NTV	NTV
Acetone	4.7E+00	NTV	2.6E+00	NTV
Benzene	NC	NC	NC	NC
Carbon disulfide	NC	NC	NC	NC
Chloromethane	NC	NC	NC	NC
cis-1,2-Dichloroethene	NC	NC	NC	NC
Ethylbenzene	NC	NC	5.5E-01	NTV
m,p-Xylene	NC	NC	3.0E-03	NTV
Methylene chloride	2.2E-01	1.8E-04	3.9E+01	3.3E-02
Tetrachloroethene	8.8E+00	4.8E-02	1.8E+01	9.9E-02
Toluene	4.3E+00	NTV	2.5E+01	NTV
Trichloroethene	6.7E+02	2.6E-03	1.8E+03	7.2E-03
Xylenes (total)	2.6E-01	NTV	1.8E+00	NTV
SVOCs				
2-Methylnaphthalene	NC	NC	6.3E+00	NTV
Acenaphthene	1.7E+00	NTV	2.7E+00	NTV
Acenaphthylene	2.8E+00	NTV	2.8E+00	NTV
Anthracene	2.7E-01	NTV	1.8E+00	NTV
Benzo(a)anthracene	NTV	1.8E-01	NTV	4.6E+00
Benzo(a)pyrene	NTV	1.8E+00	NTV	5.0E+01
Benzo(e)pyrene	NTV	NTV	NTV	NTV
Benzo(b)fluoranthene	NTV	3.2E-01	NTV	4.4E+00
Benzo(g,h,i)perylene	NTV	NTV	NTV	NTV
Benzo(k)fluoranthene	NTV	1.0E-01	NTV	5.0E+00
Chrysene	NTV	2.6E-02	NTV	4.1E-01
Dibenz(a,h)anthracene	NTV	3.5E-01	NTV	2.5E+00
Dibenzofuran	NC	NC	6.0E+01	NTV
Fluoranthene	9.4E+00	NTV	1.7E+02	NTV
Fluorene	2.5E+00	NTV	4.1E+00	NTV
Indeno(1,2,3-cd)pyrene	NTV	1.6E-01	NTV	2.1E+00
Naphthalene	NC	NC	2.9E+00	NTV
Perylene	NTV	NTV	NTV	NTV
Phenanthrene	6.7E+00	NTV	5.3E+01	NTV
Pyrene	5.2E+00	NTV	1.9E+02	NTV

Concentration-Toxicity Screen for Soil Depth Intervals - Dry Pond Scenario[a]
Sodium Reactor Experiment (SRE) Area

Reasonable Maximum Exposure

Chemical	Soil (0-2 ft)		Soil (0-10 ft)	
	Noncancer (unitless)	Cancer (unitless)	Noncancer (unitless)	Cancer (unitless)
Total Petroleum Hydrocarbons				
C11-C14(Kerosene Range)	NTV	NTV	NTV	NTV
C14-C20(Diesel Range)	NTV	NTV	NTV	NTV
C20-C30(Lubricant Oil Range)	NTV	NTV	NTV	NTV
PCDD/PCDFs				
2,3,7,8-TCDD	NTV	6.9E-02	NTV	5.7E-02
1,2,3,7,8-PeCDD	NTV	2.8E-01	NTV	2.3E-01
1,2,3,4,7,8-HxCDD	NTV	1.2E-01	NTV	9.3E-02
1,2,3,6,7,8-HxCDD	NTV	3.8E-01	NTV	3.2E-01
1,2,3,7,8,9-HxCDD	NTV	1.3E-01	NTV	1.2E-01
1,2,3,4,6,7,8-HpCDD	NTV	4.6E-01	NTV	3.7E-01
OCDD	NTV	6.6E-01	NTV	5.3E-01
2,3,7,8-TCDF	NTV	1.0E-02	NTV	1.0E-02
1,2,3,7,8-PeCDF	NTV	6.7E-04	NTV	5.4E-04
2,3,4,7,8-PeCDF	NTV	6.1E-02	NTV	5.0E-02
1,2,3,4,7,8-HxCDF	NTV	4.4E-02	NTV	3.6E-02
1,2,3,6,7,8-HxCDF	NTV	4.1E-02	NTV	3.3E-02
2,3,4,6,7,8-HxCDF	NTV	1.1E-01	NTV	9.0E-02
1,2,3,7,8,9-HxCDF	NTV	1.3E-02	NTV	1.3E-02
1,2,3,4,6,7,8-HpCDF	NTV	1.2E-01	NTV	1.0E-01
1,2,3,4,7,8,9-HpCDF	NTV	1.2E-02	NTV	9.9E-03
OCDF	NTV	9.2E-03	NTV	7.8E-03
PCBs				
Aroclor-1254	2.2E+04	8.6E-01	2.2E+04	8.6E-01
Aroclor-1260	NTV	1.5E+01	NTV	1.4E+01
Aroclor-1262	NC	NC	NC	NC
PCB-105	NTV	2.2E-03	NTV	2.2E-03
PCB-114	NTV	3.9E-05	NTV	4.0E-05
PCB-118	NTV	4.4E-03	NTV	4.5E-03
PCB-123	NTV	6.2E-05	NTV	6.3E-05
PCB-126	NTV	5.7E-01	NC	NC
PCB-156	NTV	1.5E-03	NC	NC
PCB-157	NTV	6.6E-04	NC	NC
PCB-167	NTV	1.1E-03	NC	NC
PCB-169	NTV	1.7E-02	NC	NC
PCB-189	NTV	1.7E-04	NC	NC
PCB-77	NTV	1.1E-03	NC	NC
PCB-81	NTV	6.1E-04	NC	NC
Cumulative Risk	1.2E+05	2.2E+01	1.3E+05	8.6E+01

Notes:

a. Cancer concentration-toxicity screen value = soil concentration x oral cancer slope factor. Noncancer concentration-toxicity screen value = soil concentration / oral reference dose. Concentration-toxicity screen values are for comparative purposes only and are not an indication of risk.

NTV - indicates that adequate toxicity data were not available for a chemical.

NC - indicates that a chemical was not selected as a soil COPC at the specified depth interval.

VOC - volatile organic compound

SVOC - semi-volatile organic compound

PCDD/PCDF - Polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.

PCB - polychlorinated biphenyls

bgs - below ground surface

Exposure Point Concentrations in Plants

Sodium Reactor Experiment (SRE) Area

Chemical	Soil Concentrations at 0 to 2 Feet bgs		Soil to Plant Biotransfer Factors[a]		Below Ground Plant Concentrations[b]		Above Ground Plant Concentrations[b]		
	CTE (mg/kg)	RME (mg/kg)	Below Ground Plants (unitless)	Above Ground Plants (unitless)	CTE (mg/kg)	RME (mg/kg)	CTE (mg/kg)	RME (mg/kg)	
Inorganic Compounds									
Cadmium	5.1E-01	1.1E+00	3.3E-02	6.9E-02	1.7E-02	3.8E-02	3.5E-02	7.9E-02	
Copper	2.1E+01	4.6E+01	8.0E-01	8.0E-01	1.7E+01	3.7E+01	1.7E+01	3.7E+01	
Lead	1.6E+01	3.4E+01	2.0E-03	5.7E-03	3.2E-02	6.8E-02	9.1E-02	1.9E-01	
Mercury	1.9E+00	4.4E+00	4.4E-02	1.1E-01	8.5E-02	2.0E-01	2.2E-01	5.0E-01	
Methyl Mercury	1.7E-03	3.6E-03	1.4E-01	1.4E-01	2.4E-04	5.0E-04	2.4E-04	5.0E-04	
Silver	7.7E-01	2.9E+00	4.4E-05	5.0E-04	3.4E-05	1.3E-04	3.9E-04	1.4E-03	
Thallium	3.3E-01	3.3E-01	2.0E-01	1.9E-01	6.6E-02	6.6E-02	6.2E-02	6.2E-02	
Zinc	1.7E+02	4.4E+02	2.0E-01	1.9E-01	3.4E+01	8.7E+01	3.2E+01	8.3E+01	
VOCs									
1,1,2-Trichloro-1,2,2-trifluoroethane	1.2E-02	1.2E-02	4.0E+00	1.1E-01	4.8E-02	4.8E-02	1.4E-03	1.4E-03	
1,2-Dichloroethene (total)	2.8E-02	7.0E-02	2.7E+01	7.8E-01	7.7E-01	1.9E+00	2.2E-02	5.4E-02	
2-Butanone	3.7E-02	3.7E-02	1.8E+02	5.2E+00	6.8E+00	6.8E+00	1.9E-01	1.9E-01	c
Acetone	6.8E-01	4.2E+00	3.6E+02	1.0E+01	2.5E+02	1.5E+03	7.0E+00	4.3E+01	d
Methylene chloride	1.3E-02	1.3E-02	8.1E+01	2.3E+00	1.0E+00	1.0E+00	3.0E-02	3.0E-02	d
Tetrachloroethene	2.1E-02	8.8E-02	2.9E+00	8.2E-02	6.0E-02	2.5E-01	1.7E-03	7.2E-03	c
Toluene	5.6E-02	3.4E-01	7.0E+00	2.0E-01	3.9E-01	2.4E+00	1.1E-02	6.9E-02	c
Trichloroethene	3.7E-02	2.0E-01	9.5E+00	2.7E-01	3.5E-01	1.9E+00	1.0E-02	5.5E-02	d
Xylenes (total)	2.5E-02	5.1E-02	4.2E+00	1.2E-01	1.1E-01	2.1E-01	3.0E-03	6.1E-03	c
SVOCs									
Acenaphthene	4.1E-02	1.5E-01	1.3E+00	3.8E-02	5.4E-02	2.0E-01	1.5E-03	5.6E-03	c
Acenaphthylene	3.1E-02	4.8E-02	1.2E+00	3.4E-02	3.7E-02	5.7E-02	1.1E-03	1.6E-03	c
Anthracene	4.9E-02	1.3E-01	7.1E-01	2.0E-02	3.5E-02	8.8E-02	9.9E-04	2.5E-03	d
Benzo(a)anthracene	3.5E-02	6.8E-02	1.3E-01	3.8E-03	4.7E-03	9.1E-03	1.4E-04	2.6E-04	d
Benzo(a)pyrene	3.6E-02	1.5E-01	5.7E-02	1.6E-03	2.0E-03	8.4E-03	5.7E-05	2.4E-04	d
Benzo(e)pyrene	1.4E-03	8.0E-03	5.0E-02	1.4E-03	6.9E-05	4.0E-04	2.0E-06	1.1E-05	c
Benzo(b)fluoranthene	4.8E-02	2.1E-01	6.1E-02	1.8E-03	2.9E-03	1.3E-02	8.3E-05	3.7E-04	d
Benzo(g,h,i)perylene	4.3E-02	1.6E-01	4.6E-02	1.3E-03	2.0E-03	7.2E-03	5.6E-05	2.1E-04	e
Benzo(k)fluoranthene	6.0E-03	6.0E-03	8.2E-02	2.4E-03	4.9E-04	4.9E-04	1.4E-05	1.4E-05	c
Chrysene	4.3E-02	2.2E-01	1.2E-01	3.6E-03	5.4E-03	2.7E-02	1.5E-04	7.7E-04	d
Dibenz(a,h)anthracene	2.9E-02	7.1E-03	2.9E-02	8.3E-04	8.5E-04	2.1E-04	2.4E-05	5.9E-06	c
Fluoranthene	5.9E-02	3.8E-01	3.0E-01	8.4E-03	1.8E-02	1.1E-01	5.0E-04	3.2E-03	d
Fluorene	4.5E-02	1.8E-01	3.0E-01	8.4E-03	1.3E-02	5.2E-02	3.8E-04	1.5E-03	f
Indeno(1,2,3-cd)pyrene	3.4E-02	1.4E-01	1.7E-02	4.8E-04	5.8E-04	2.3E-03	1.6E-05	6.6E-05	d
Perylene	9.7E-04	5.6E-03	1.1E-01	3.2E-03	1.1E-04	6.3E-04	3.2E-06	1.8E-05	c

Exposure Point Concentrations in Plants

Sodium Reactor Experiment (SRE) Area

Chemical	Soil Concentrations at 0 to 2 Feet bgs		Soil to Plant Biotransfer Factors[a]		Below Ground Plant Concentrations[b]		Above Ground Plant Concentrations[b]		
	CTE (mg/kg)	RME (mg/kg)	Below Ground Plants (unitless)	Above Ground Plants (unitless)	CTE (mg/kg)	RME (mg/kg)	CTE (mg/kg)	RME (mg/kg)	
Phenanthrene	7.0E-02	1.8E-01	6.0E-01	1.7E-02	4.2E-02	1.1E-01	1.2E-03	3.2E-03	c
Pyrene	5.5E-02	2.9E-01	3.3E-01	9.5E-03	1.8E-02	9.6E-02	5.2E-04	2.7E-03	d
Total Petroleum Hydrocarbons									
C11-C14(Kerosene Range)	9.7E+00	4.0E+01	6.6E-01	1.9E-02	6.4E+00	2.6E+01	1.8E-01	7.5E-01	
C14-C20(Diesel Range)	7.5E+00	7.5E+00	3.4E-01	9.7E-03	2.5E+00	2.5E+00	7.2E-02	7.2E-02	
C20-C30(Lubricant Oil Range)	7.3E+01	4.7E+02	8.9E-02	2.5E-03	6.5E+00	4.2E+01	1.9E-01	1.2E+00	
PCDD/PCDFs									
2,3,7,8-TCDD	2.7E-07	5.3E-07	2.3E-02	6.7E-04	6.4E-09	1.3E-08	1.8E-10	3.6E-10	g
1,2,3,7,8-PeCDD	1.1E-06	2.2E-06	3.8E-02	1.1E-03	4.2E-08	8.3E-08	1.2E-09	2.4E-09	g
1,2,3,4,7,8-HxCDD	4.1E-06	9.0E-06	1.1E-04	3.2E-06	4.6E-10	1.0E-09	1.3E-11	2.9E-11	g
1,2,3,6,7,8-HxCDD	1.6E-05	3.0E-05	1.6E-02	4.5E-04	2.5E-07	4.7E-07	7.1E-09	1.3E-08	g
1,2,3,7,8,9-HxCDD	5.9E-06	1.0E-05	1.6E-02	4.5E-04	9.3E-08	1.6E-07	2.7E-09	4.5E-09	g
1,2,3,4,6,7,8-HpCDD	5.7E-04	1.2E-03	3.0E-05	8.4E-07	1.7E-08	3.5E-08	4.8E-10	1.0E-09	g
OCDD	8.4E-03	1.7E-02	7.8E-06	2.2E-07	6.5E-08	1.3E-07	1.9E-09	3.7E-09	g
2,3,7,8-TCDF	5.5E-07	7.9E-07	4.4E-02	1.3E-03	2.4E-08	3.5E-08	6.9E-10	9.9E-10	g
1,2,3,7,8-PeCDF	2.8E-07	5.7E-07	3.1E-02	8.9E-04	8.6E-09	1.8E-08	2.5E-10	5.1E-10	g
2,3,4,7,8-PeCDF	8.2E-07	1.6E-06	2.6E-02	7.5E-04	2.1E-08	4.1E-08	6.1E-10	1.2E-09	g
1,2,3,4,7,8-HxCDF	1.8E-06	3.3E-06	1.1E-04	3.2E-06	2.0E-10	3.8E-10	5.7E-12	1.1E-11	g
1,2,3,6,7,8-HxCDF	1.6E-06	3.2E-06	1.6E-02	4.5E-04	2.4E-08	5.0E-08	7.0E-10	1.4E-09	g
2,3,4,6,7,8-HxCDF	3.8E-06	8.8E-06	1.6E-02	4.5E-04	6.0E-08	1.4E-07	1.7E-09	4.0E-09	g
1,2,3,7,8,9-HxCDF	3.6E-07	9.7E-07	1.6E-02	4.5E-04	5.7E-09	1.5E-08	1.6E-10	4.3E-10	g
1,2,3,4,6,7,8-HpCDF	5.3E-05	9.6E-05	7.1E-03	2.0E-04	3.7E-07	6.8E-07	1.1E-08	1.9E-08	g
1,2,3,4,7,8,9-HpCDF	4.9E-06	9.2E-06	7.1E-03	2.0E-04	3.4E-08	6.5E-08	9.8E-10	1.9E-09	g
OCDF	1.4E-04	2.4E-04	7.8E-06	2.2E-07	1.0E-09	1.8E-09	3.0E-11	5.3E-11	g
PCBs									
Aroclor-1254	1.6E-01	4.3E-01	6.0E-02	1.7E-03	9.7E-03	2.6E-02	2.8E-04	7.3E-04	c
Aroclor-1260	1.3E+00	7.3E+00	3.1E-02	8.8E-04	4.1E-02	2.2E-01	1.2E-03	6.4E-03	c
PCB-105	1.1E-04	5.6E-04	6.0E-02	1.7E-03	6.8E-06	3.4E-05	1.9E-07	9.6E-07	h
PCB-114	2.2E-06	1.0E-05	6.0E-02	1.7E-03	1.3E-07	6.0E-07	3.7E-09	1.7E-08	h
PCB-118	2.3E-04	1.1E-03	6.0E-02	1.7E-03	1.4E-05	6.7E-05	3.9E-07	1.9E-06	h
PCB-123	3.2E-06	1.6E-05	6.0E-02	1.7E-03	1.9E-07	9.6E-07	5.5E-09	2.7E-08	h
PCB-126	8.8E-06	4.4E-05	6.0E-02	1.7E-03	5.2E-07	2.6E-06	1.5E-08	7.5E-08	h
PCB-156	7.5E-05	3.8E-04	6.0E-02	1.7E-03	4.5E-06	2.2E-05	1.3E-07	6.4E-07	h
PCB-157	3.3E-05	1.7E-04	6.0E-02	1.7E-03	2.0E-06	1.0E-05	5.6E-08	2.9E-07	h

Exposure Point Concentrations in Plants

Sodium Reactor Experiment (SRE) Area

Chemical	Soil Concentrations at 0 to 2 Feet bgs		Soil to Plant Biotransfer Factors[a]		Below Ground Plant Concentrations[b]		Above Ground Plant Concentrations[b]		
	CTE (mg/kg)	RME (mg/kg)	Below Ground Plants (unitless)	Above Ground Plants (unitless)	CTE (mg/kg)	RME (mg/kg)	CTE (mg/kg)	RME (mg/kg)	
PCB-167	5.7E-05	2.9E-04	6.0E-02	1.7E-03	3.4E-06	1.8E-05	9.8E-08	5.0E-07	h
PCB-169	8.6E-07	4.4E-06	6.0E-02	1.7E-03	5.1E-08	2.6E-07	1.5E-09	7.5E-09	h
PCB-189	8.6E-06	4.4E-05	6.0E-02	1.7E-03	5.1E-07	2.6E-06	1.5E-08	7.5E-08	h
PCB-77	1.8E-05	8.8E-05	3.4E-02	9.7E-04	6.0E-07	3.0E-06	1.7E-08	8.6E-08	c
PCB-81	3.1E-06	1.6E-05	3.4E-02	9.7E-04	1.1E-07	5.3E-07	3.0E-09	1.5E-08	I

a. Soil to plant biotransfer factors (PBF) for organic chemicals were estimated using the procedures described by DTSC (1994). For above-ground plants, PBF = 7.7Kow-0.58. For below-ground plants, PBF = 35(7.7Kow-0.58). PBFs reported by Baes et al (1984) were used for inorganic chemicals.
c. Kow value otained from the Hazardous Substance Data Base (HSDB).
d. Kow value obtained from DTSC (1994).
e. Kow value obtained from ATSDR.
f. Fluoranthene Kow used as surrogate.
g. Kow value obtained from USEPA (1994 -Dioxin Reassessment)
h. Arolcor 1254 Kow used as surrogate.
I. PCB-77 Kow used as surrogate.
CTE- Central Tendency Exposure
RME- Reasonable Maximum Exposure
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyl
PCDD/PCDF - polychlorinated dibenzo-p-dioxins and dibenzofurans
mg/kg - milligrams per kilogram
bgs - below ground surface
mg/kg - milligram per kilogram

Spreadsheet C3-29 (1 of 2)

Migration of Volatile COPC from Chatsworth Groundwater to Residential Building Indoor Air
Sodium Reactor Experiment (SRE) Area

Chemical -Specific Values [a]	CTE Groundwater Concentration[b] C_r^{CTE} (mg/L)	RME Groundwater Concentration[b] C_r^{RME} (mg/L)	CTE Indoor Air Concentration[c] $C_{building}^{CTE}$ (µg/m3)	RME Indoor Air Concentration[c] $C_{building}^{RME}$ (µg/m3)
VOCs				
1,1-Dichloroethane	2.6E-03	2.6E-03	4.2E-03	4.2E-03
1,2-Dichloroethane	9.0E-04	9.0E-04	6.9E-04	6.9E-04
Acetone	8.8E-03	8.8E-03	2.8E-05	2.8E-05
Benzene	5.8E-04	5.8E-04	3.8E-03	3.8E-03
Carbon disulfide	2.6E-03	2.6E-03	2.1E-02	2.1E-02
Chloromethane	3.0E-04	3.0E-04	5.8E-03	5.8E-03
cis-1,2-Dichloroethene	5.1E-02	5.1E-02	2.2E-03	2.2E-03
Methylene chloride	6.4E-04	6.4E-04	1.2E-03	1.2E-03
Trichloroethene	1.0E-02	1.0E-02	5.1E-03	5.1E-03

Site-Specific and Default Values			
Average soil Temperature (T_s)	1.8E+01	C°	Region-specific, estimated from graph presented in USEPA (200
Depth below grade to bottom of enclosed space floor (L_f)	1.5E+01	cm	USEPA (2002) default for slab-on-grade construction.
Depth below grade to water table (L_w^t)	1.9E+03	cm	See note (d)
Thickness of soil stratum A (h_A)	3.0E+02	cm	As defined by USEPA (2002), equal to Lwt.
Soil Stratum A SCS soil type	SL		Site-specific - sandy loam
Soil bulk density for soil stratum A (P_b^A)	1.7E+00	g/cm³	Site-specific - as per SRAM (MWH, 2005)
Soil porosity for soil stratum A (n^A)	3.7E-01	cm^3/cm^3	Site-specific - as per SRAM (MWH, 2005)
Soil water filled porosity for soil stratum A (0_w^A)	1.1E-01	cm³/cm³	Site-specific - as per SRAM (MWH, 2005)
Thickness of soil stratum B (h_B)	3.0E+02	cm	Conservatively assumed to be 10 feet
Soil Stratum B SCS soil type	Weathered Bedrock		
Soil bulk density for soil stratum B (P_b^B)	1.7E+00	g/cm³	Site-specific - as per SRAM (MWH, 2005)
Soil porosity for soil stratum B (n^B)	2.0E-01	cm^3/cm^3	Site-specific - as per SRAM (MWH, 2005)
Soil water filled porosity for soil stratum B (0_w^B)	5.3E-02	cm³/cm³	Site-specific - as per SRAM (MWH, 2005)
Weathered bedrock fractures (ϕwbr)	1.0E-04	cm^3/cm^3	MWH (2003)
Thickness of soil stratum C (h_C)	1.2E+03	cm	L_w-h_A - h_B
Soil Stratum C SCS soil type	nweathered Bedrock		
Soil bulk density for soil stratum C (P_b^C)	1.7E+00	g/cm³	Site-specific - as per SRAM (MWH, 2005)
Soil porosity for soil stratum C (n^C)	1.3E-01	cm^3/cm^3	Site-specific - as per SRAM (MWH, 2005)
Soil water filled porosity for soil stratum C (0_w^C)	5.1E-02	cm³/cm³	Site-specific - as per SRAM (MWH, 2005)
Unweathered bedrock fractures (ϕubr)	5.0E-05	cm^3/cm^3	MWH (2003)
Enclosed space floor thickness (L_{crack})	1.5E+01	cm	USEPA (2002) default value.
Soil building pressure differential (^P)	4.0E+01	(g/cm-s²)	USEPA (2002) default value.
Enclosed space floor length (L_B)	1.0E+03	cm	USEPA (2002) default value.
Enclosed space floor width (W_B)	1.0E+03	cm	USEPA (2002) default value.
Enclosed space height (H_B)	2.4E+02	cm	USEPA (2002) default value.
Floor-wall seam crack width (w)	1.0E-01	cm	USEPA (2002) default value.
Indoor air exchange rate (ER)	5.0E-01	(1/hour)	DTSC (2005) default value.

Spreadsheet C3-29 (2 of 2)

Migration of Volatile COPC from Chatsworth Groundwater to Residential Building Indoor Air
Sodium Reactor Experiment (SRE) Area

Notes:

a. USEPA (2004) chemical-specific physical/chemical property values used to model soil to indoor air COPC concentrations.

b. Exposure point concentrations (EPC) as presented in Spreadsheet D-13.

c. Indoor air concentrations estimated using USEPA (2004) Johnson and Ettinger Indoor Air Model as modified as per the SRAM (MWH 2005).

d. Depth below grade to water table estimated as the average depth to groundwater.

COPC - chemical of potential concern

UCL - upper confidence limit

CTE - Central Tendency Exposure

RME - Reasonable Maximum Exposure

Migration of Volatile COPC from Chatsworth Groundwater to Commercial Building Indoor Air
Sodium Reactor Experiment (SRE) Area

Chemical -Specific Values [a]	CTE Groundwater Concentration[b] C_{rCTE} (mg/L)	RME Groundwater Concentration[b] C_{rRME} (mg/L)	CTE Indoor Air Concentration[c] $C_{buildingCTE}$ (µg/m3)	RME Indoor Air Concentration[c] $C_{buildingRME}$ (µg/m3)
VOCs				
1,1-Dichloroethane	2.6E-03	2.6E-03	1.3E-03	1.3E-03
1,2-Dichloroethane	9.0E-04	9.0E-04	2.2E-04	2.2E-04
Acetone	8.8E-03	8.8E-03	9.0E-06	9.0E-06
Benzene	5.8E-04	5.8E-04	1.2E-03	1.2E-03
Carbon disulfide	2.6E-03	2.6E-03	6.6E-03	6.6E-03
Chloromethane	3.0E-04	3.0E-04	1.8E-03	1.8E-03
cis-1,2-Dichloroethene	5.1E-02	5.1E-02	7.1E-04	7.1E-04
Methylene chloride	6.4E-04	6.4E-04	3.8E-04	3.8E-04
Trichloroethene	1.0E-02	1.0E-02	1.6E-03	1.6E-03

Site-Specific and Default Values			
Average soil Temperature (T_s)	1.8E+01	C°	Region-specific, estimated from graph presented in USEPA (2002)
Depth below grade to bottom of enclosed space floor (L_f)	1.5E+01	cm	USEPA (2002) default for slab-on-grade construction.
Depth below grade to water table (L_w^t)	1.9E+03	cm	See note (d)
Thickness of soil stratum A (h_A)	3.0E+02	cm	Conservatively assumed to be 10 feet
Soil Stratum A SCS soil type	SL		Site-specific - sandy loam
Soil bulk density for soil stratum A (P_b^A)	1.7E+00	g/cm³	Site-specific - as per SRAM (MWH, 2005)
Soil porosity for soil stratum A (n^A)	3.7E-01	cm^3/cm^3	Site-specific - as per SRAM (MWH, 2005)
Soil water filled porosity for soil stratum A (0_w^A)	1.1E-01	cm³/cm³	Site-specific - as per SRAM (MWH, 2005)
Thickness of soil stratum B (h_B)	3.0E+02	cm	Conservatively assumed to be 10 feet
Soil Stratum B SCS soil type	Weathered Bedrock		
Soil bulk density for soil stratum B (P_b^B)	1.7E+00	g/cm³	Site-specific - as per SRAM (MWH, 2005)
Soil porosity for soil stratum B (n^B)	2.0E-01	cm^3/cm^3	Site-specific - as per SRAM (MWH, 2005)
Soil water filled porosity for soil stratum B (0_w^B)	5.3E-02	cm³/cm³	Site-specific - as per SRAM (MWH, 2005)
Weathered bedrock fractures (ϕwbr)	1.0E-04	cm^3/cm^3	MWH (2003)
Thickness of soil stratum C (h_C)	1.2E+03	cm	L_w-h_A - h_B
Soil Stratum C SCS soil type	nweathered Bedrock		
Soil bulk density for soil stratum C (P_b^C)	1.7E+00	g/cm³	Site-specific - as per SRAM (MWH, 2005)
Soil porosity for soil stratum C (n^C)	1.3E-01	cm^3/cm^3	Site-specific - as per SRAM (MWH, 2005)
Soil water filled porosity for soil stratum C (0_w^C)	5.1E-02	cm³/cm³	Site-specific - as per SRAM (MWH, 2005)
Unweathered bedrock fractures (ϕubr)	5.0E-05	cm^3/cm^3	MWH (2003)
Enclosed space floor thickness (L_{crack})	1.5E+01	cm	USEPA (2002) default value.
Soil building pressure differential (^P)	2.0E+01	(g/cm-s²)	Mid-point of range presented in USEPA (1997), to account for slab-on-grade
Enclosed space floor length (L_B)	3.0E+03	cm	Site-specific - based on 10,000 ft² commercial building.
Enclosed space floor width (W_B)	3.0E+03	cm	Site-specific - based on 10,000 ft² commercial building.
Enclosed space height (H_B)	3.7E+02	cm	Site-specific - based single story building with 12 foot ceilings.
Floor-wall seam crack width (w)	1.0E-01	cm	USEPA (2002) default value.
Indoor air exchange rate (ER)	1.0E+00	(1/hour)	DTSC (2005) default value.

Migration of Volatile COPC from Chatsworth Groundwater to Commercial Building Indoor Air
Sodium Reactor Experiment (SRE) Area

Notes:

a. USEPA (2004) chemical-specific physical/chemical property values used to model soil to indoor air COPC concentrations.

b. Exposure point concentrations (EPC) as presented in Spreadsheet D-13.

c. Indoor air concentrations estimated using USEPA (2004) Johnson and Ettinger Indoor Air Model as modified as per the SRAM (MWH 2005).

d. Depth below grade to water table estimated as the average depth to groundwater.

Spreadsheet C3-27 (1 of 2)

Migration of Volatile COPC from Soil Vapor to Residential Building Indoor Air
Sodium Reactor Experiment (SRE) Area

Chemical -Specific Values [a]	CTE Soil Soil Vapor Concentration[b] C_r^{CTE} (µg/L)	RME Soil Vapor Concentration[b] C_r^{RME} (µg/L)	CTE Indoor Air Concentration[c] $C_{building}^{CTE}$ (µg/m3)	RME Indoor Air Concentration[c] $C_{building}^{RME}$ (µg/m3)
VOCs				
1,1,1-Trichloroethane	5.0E-01 [d]	5.0E-01 [d]	6.3E-01	6.3E-01
1,1,2-Trichloro-1,2,2-trifluoroethane	2.5E+00	2.9E+00	3.2E+00	3.6E+00
1,1-Dichloroethane	5.0E-01 [d]	5.0E-01 [d]	6.1E-01	6.1E-01
Ethylbenzene	5.0E-01 [d]	5.0E-01 [d]	6.1E-01	6.1E-01
m,p-Xylene	1.0E+00 [d]	1.0E+00 [d]	1.2E+00	1.2E+00
Methylene chloride	1.3E+01 [d]	1.3E+01 [d]	1.8E+01	1.8E+01
Tetrachloroethene	5.0E-01 [d]	5.0E-01 [d]	6.0E-01	6.0E-01
Toluene	5.0E-01 [d]	5.0E-01 [d]	6.6E-01	6.6E-01
Trichloroethene	5.0E-01 [d]	5.0E-01 [d]	6.3E-01	6.3E-01

Site-Specific and Default Values			
Average soil Temperature (T_s)	1.8E+01	C°	Region-specific, estimated from graph presented in USEPA
Depth below grade to bottom of enclosed space floor (L_f)	1.5E+01	cm	USEPA (2002) default for slab-on-grade construction.
Depth below grade to top of contamination (L_t)	9.1E+01	cm	Site specific. All chemicals ND 1.5 or 2.5 feet, first
Thickness of soil stratum A (h_A)	1.5E+01	cm	As defined by USEPA (2002), equal to Lt.
Soil Stratum A SCS soil type	SL		Site-specific - sandy loam
Soil bulk density for soil stratum A (P_b^A)	1.7E+00	g/cm³	Site-specific - as per SRAM (MWH, 2005)
Soil porosity for soil stratum A (n^A)	3.7E-01	cm^3/cm^3	Site-specific - as per SRAM (MWH, 2005)
Soil water filled porosity for soil stratum A (0_w^A)	1.1E-01	cm³/cm³	Site-specific - as per SRAM (MWH, 2005)
Enclosed space floor thickness (L_{crack})	1.5E+01	cm	USEPA (2002) default value.
Soil building pressure differential (^P)	4.0E+01	($g/cm\text{-}s^2$)	USEPA (2002) default value.
Enclosed space floor length (L_B)	1.0E+03	cm	USEPA (2002) default value.
Enclosed space floor width (W_B)	1.0E+03	cm	USEPA (2002) default value.
Enclosed space height (H_B)	2.4E+02	cm	USEPA (2002) default value.
Floor-wall seam crack width (w)	1.0E-01	cm	USEPA (2002) default value.
Indoor air exchange rate (ER)	5.0E-01	(1/hour)	DTSC (2005) default value.

Spreadsheet C3-27 (2 of 2)

Migration of Volatile COPC from Soil Vapor to Residential Building Indoor Air
Sodium Reactor Experiment (SRE) Area

Notes:

a. USEPA (2004) chemical-specific physical/chemical property values used to model soil to indoor air COPC concentrations, with the exception of p-isopropylbenzen
Physical/chemical property values for n-propylbenzene were used.

b. Exposure point concentrations (EPC) for soil vapor 0 to 10 feet bgs, as presented in Spreadsheet D-12.

c. Indoor air concentrations estimated using USEPA (2004) Johnson and Ettinger Indoor Air Model as modified by USEPA (2004), Version 3.1.

d. EPC based on 1/2 the DL for soil vapor since chemical was detected in soil and tested for in soil vapor.

e. EPCs estimated by application of the soil to soil vapor partitioning component of the Johnson and Ettinger (1991) model to EPCs in soil at 0 to 10 feet bgs.

UCL - upper confidence limit

CTE - Central Tendency Exposure

VOC - volatile organic compound

µg/L - micrograms per liter

µg/m3 - micrograms per cubic meter

Spreadsheet C3-26 (1 of 2)

Migration of Volatile COPC from Soil Vapor to Commercial Building Indoor Air
Sodium Reactor Experiment (SRE) Area

Chemical -Specific Values [a]	CTE Soil Vapor Concentration[b] C_r^{CTE} (µg/L)		RME Soil Vapor Concentration[b] C_r^{RME} (µg/L)		CTE Indoor Air Concentration[c] $C_{building}^{CTE}$ (µg/m3)	RME Indoor Air Concentration[c] $C_{building}^{RME}$ (µg/m3)
VOCs						
1,1,1-Trichloroethane	5.0E-01	d	5.0E-01	d	2.1E-01	2.1E-01
1,1,2-Trichloro-1,2,2-trifluoroethane	2.5E+00		2.9E+00		1.1E+00	1.2E+00
1,1-Dichloroethane	5.0E-01	d	5.0E-01	d	2.0E-01	2.0E-01
Ethylbenzene	5.0E-01	d	5.0E-01	d	2.0E-01	2.0E-01
m,p-Xylene	1.0E+00	d	1.0E+00	d	4.0E-01	4.0E-01
Methylene chloride	1.3E+01	d	1.3E+01	d	6.0E+00	6.0E+00
Tetrachloroethene	5.0E-01	d	5.0E-01	d	2.0E-01	2.0E-01
Toluene	5.0E-01	d	5.0E-01	d	2.2E-01	2.2E-01
Trichloroethene	5.0E-01	d	5.0E-01	d	2.1E-01	2.1E-01

Site-Specific and Default Values			
Average soil Temperature (T_s)	1.8E+01	C°	Region-specific, estimated from graph presented
Depth below grade to bottom of enclosed space floor (L_f)	1.5E+01	cm	USEPA (2002) default for slab-on-grade construc
Depth below grade to top of contamination (L_t)	9.1E+01	cm	Site specific. All chemicals ND 1.5 or 2.5 feet,
Thickness of soil stratum A (h_A)	9.1E+01	cm	As defined by USEPA (2002), equal to Lt.
Soil Stratum A SCS soil type	SL		Site-specific - sandy loam
Soil bulk density for soil stratum A (P_b^A)	1.7E+00	g/cm³	Site-specific - as per SRAM (MWH, 2005)
Soil porosity for soil stratum A (n^A)	3.7E-01	cm^3/cm^3	Site-specific - as per SRAM (MWH, 2005)
Soil water filled porosity for soil stratum A (0_w^A)	1.1E-01	cm³/cm³	Site-specific - as per SRAM (MWH, 2005)
Enclosed space floor thickness (L_{crack})	1.5E+01	cm	USEPA (2002) default value.
Soil building pressure differential (^P)	4.0E+01	($g/cm\text{-}s^2$)	USEPA (2002) default value.
Enclosed space floor length (L_B)	3.0E+03	cm	Site-specific - based on 10,000 ft² commercial bu
Enclosed space floor width (W_B)	3.0E+03	cm	Site-specific - based on 10,000 ft² commercial bu
Enclosed space height (H_B)	3.7E+02	cm	Site-specific - based single story building with 12
Floor-wall seam crack width (w)	1.0E-01	cm	USEPA (2002) default value.
Indoor air exchange rate (ER)	1.0E+00	(1/hour)	DTSC (2005) default value.

Spreadsheet C3-26 (2 of 2)

Migration of Volatile COPC from Soil Vapor to Commercial Building Indoor Air
Sodium Reactor Experiment (SRE) Area

Notes:

a. USEPA (2004) chemical-specific physical/chemical property values used to model soil to indoor air COPC concentrations, with the exception of p-isopropylbenzene. Physical/chemical property values for n-propylbenzene were used.

b. Exposure point concentrations (EPC) for soil vapor 0 to 10 feet bgs, as presented in Spreadsheet C3-13.

c. Indoor air concentrations estimated using USEPA (2004) Johnson and Ettinger Indoor Air Model as modified by USEPA (2004), Version 3.1.

d. EPC based on 1/2 the DL for soil vapor since chemical was detected in soil and tested for in soil vapor.

e. EPCs estimated by application of the soil to soil vapor partitioning component of the Johnson and Ettinger (1991) model to EPCs in soil at 0 to 10 feet bgs.

CTE - Central Tendency Exposure

RME - Reasonable Maximum Exposure

COPC - chemical of potential concern

VOC - volatile organic compound

µg/L - micrograms per liter

µg/m3 - micrograms per cubic meter

Flux Rates and Ambient Air Concentrations Estimated for Volatile COPC in Chatsworth Groundwater
Sodium Reactor Experiment (SRE) Area

Volatile COPC	6-Year[a] Exposure Flux Rate Js (mg/sec-m^2)	9-Year[b] Exposure Flux Rate Js (mg/sec-m^2)	24-Year[c] Exposure Flux Rate Js (mg/sec-m^2)	25-Year[d] Exposure Flux Rate Js (mg/sec-m^2)	6-Year[a] Time-Averaged Air Concentration Ca (mg/m^3)	9-Year[b] Time-Averaged Air Concentration Ca (mg/m^3)	Time-Averaged Air Concentration Ca (mg/m^3)	Time-Averaged Air Concentration Ca (mg/m^3)
VOCs								
1,1-Dichloroethane	5.5E-06	5.5E-06	5.5E-06	5.5E-06	1.3E-07	1.3E-07	1.3E-07	1.3E-07
1,2-Dichloroethane	1.0E-06	1.0E-06	1.0E-06	1.0E-06	2.5E-08	2.5E-08	2.5E-08	2.5E-08
Acetone	1.1E-11	1.1E-11	1.1E-11	1.1E-11	2.6E-13	2.6E-13	2.6E-13	2.6E-13
Benzene	6.2E-06	6.2E-06	6.2E-06	6.2E-06	1.5E-07	1.5E-07	1.5E-07	1.5E-07
cis-1,2-Dichloroethene	8.4E-05	8.4E-05	8.4E-05	8.4E-05	2.0E-06	2.0E-06	2.0E-06	2.0E-06
Methylene chloride	2.8E-06	2.8E-06	2.8E-06	2.8E-06	6.7E-08	6.7E-08	6.7E-08	6.7E-08

Site-Specific Values		
Length of box (L)	193 m	[e]
Mixing height (H)	2 m	[f]
Wind speed (WS)	2 m/s	[g]

Notes:

a. 6-year exposure is applicable to average and RME residential and recreational child scenario.
b. 9-year exposure is applicable to average worker scenario.
c. 24-year exposure is applicable to average and RME residential and recreational adult scenario.
d. 25-year exposure is applicable to RME worker scenario.
e. Site-specific; equal to the square root of the total area of the RFI site.
f. EPA default value.
g. Site-specific value, as presented in the SRAM (MWH 2005).

VOC - volatile organic compound
COPC - chemical of potential concern
VOC - volatile organic compound
mg/sec-m^2 - milligram per second per square meter
mg/m^3 - milligram per cubic meter

Parameter Values Used for Migration of Volatile COPC from Chatsworth Groundwater to Ambient Air
Sodium Reactor Experiment (SRE) Area

Constituent	RME Soil Vapor Concentration Cs (ug/m^3)	Diffusivity in air D_a (cm^2/s)	Diffusivity in water D_w (cm^2/s)	Henry's law constant at reference temperature H ($atm\text{-}m^3/mol$)	Organic carbon partition coefficient K_{oc} (cm^3/g)	Effective diffusion coefficient D^{eff}_A (cm^2/s)
1,1-Dichloroethane	174	7.42E-02	1.05E-05	5.61E-03	3.16E+01	6.26E-03
1,2-Dichloroethane	29	1.04E-01	9.90E-06	9.77E-04	1.74E+01	8.78E-03
Acetone	1.2	1.24E-01	1.14E-05	3.87E-05	5.75E-01	1.05E-02
Benzene	167	8.80E-02	9.80E-06	5.54E-03	5.89E+01	7.43E-03
cis-1,2-Dichloroethene	125	7.36E-02	1.13E-05	4.07E-03	3.55E+01	6.21E-03
Methylene chloride	69	1.01E-01	1.17E-05	2.18E-03	1.17E+01	8.52E-03
Trichloroethene	305	7.90E-02	9.10E-06	1.03E-02	1.66E+02	6.67E-03
Carbon disulfide	967	1.04E-01	1.00E-05	3.02E-02	4.57E+01	8.78E-03
Chloromethane	305	1.26E-01	6.50E-06	8.80E-03	2.12E+00	1.06E-02

Site-Specific and Default Values

Organic carbon content of soil (f_{oc})	2.3E-03	fraction	Site-specific - as per SRAM (MWH, 2005)
Soil bulk density for soil stratum (P_b)	1.7E+00	g/cm^3	Site-specific - as per SRAM (MWH, 2005)
Soil porosity (n)	3.7E-01	cm^3/cm^3	Site-specific - as per SRAM (MWH, 2005)
Soil water filled porosity (0_w)	1.1E-01	cm^3/cm^3	Site-specific - as per SRAM (MWH, 2005)
Depth to groundwater (L)	1859	cm	Site-specific
Site Area (A)	9.2	acres	Site-specific
Q/C coefficient A	12	unitless	USEPA (2002) default
Q/C coefficient B	18	unitless	USEPA (2002) default
Q/C coefficient C	210	unitless	USEPA (2002) default
Q/C	42	g/m2-s/kg/m3	USEPA (2002)
Water recharge (R)	1.0E-09	m/s	Site-specific - as per SRAM (MWH, 2005)

Flux Rates and Ambient Air Concentrations Estimated for Volatile COPC in Soils/Sediments at 0 to 10 Feet bgs
Sodium Reactor Experiment (SRE) Area

Volatile COPC	6-Year[a] Exposure Flux Rate Js (mg/sec-m^2)	9-Year[b] Exposure Flux Rate Js (mg/sec-m^2)	24-Year[c] Exposure Flux Rate Js (mg/sec-m^2)	25-Year[d] Exposure Flux Rate Js (mg/sec-m^2)	6-Year[a] Time-Averaged Air Concentration Ca (mg/m^3)	9-Year[b] Time-Averaged Air Concentration Ca (mg/m^3)	24-Year[c] Time-Averaged Air Concentration Ca (mg/m^3)	25-Year[d] Time-Averaged Air Concentration Ca (mg/m^3)
VOCs								
1,1,1-Trichloroethane	3.6E-04	3.6E-04	3.6E-04	3.6E-04	8.6E-06	8.6E-06	8.6E-06	8.6E-06
1,1,2-Trichloro-1,2,2-trifluoroethane	2.1E-03	2.1E-03	2.1E-03	2.1E-03	5.0E-05	5.0E-05	5.0E-05	5.0E-05
1,1-Dichloroethane	3.4E-04	3.4E-04	3.4E-04	3.4E-04	8.2E-06	8.2E-06	8.2E-06	8.2E-06
Ethylbenzene	3.5E-04	3.5E-04	3.5E-04	3.5E-04	8.3E-06	8.3E-06	8.3E-06	8.3E-06
m,p-Xylene	7.1E-04	7.1E-04	7.1E-04	7.1E-04	1.7E-05	1.7E-05	1.7E-05	1.7E-05
Methylene chloride	1.2E-02	1.2E-02	1.2E-02	1.2E-02	2.8E-04	2.8E-04	2.8E-04	2.8E-04
Tetrachloroethene	3.3E-04	3.3E-04	3.3E-04	3.3E-04	8.0E-06	8.0E-06	8.0E-06	8.0E-06
Toluene	4.0E-04	4.0E-04	4.0E-04	4.0E-04	9.6E-06	9.6E-06	9.6E-06	9.6E-06
Trichloroethene	3.6E-04	3.6E-04	3.6E-04	3.6E-04	8.7E-06	8.7E-06	8.7E-06	8.7E-06

Site-Specific Values		
Length of box (L)	193 m	[e]
Mixing height (H)	2 m	[f]
Wind speed (WS)	2 m/s	[g]

a. 6-year exposure is applicable to average and RME residential and recreational child scenario.
b. 9-year exposure is applicable to average worker scenario.
c. 24-year exposure is applicable to CTE and RME residential and recreational adult scenario.
d. 25-year exposure is applicable to RME worker scenario.
e. Site-specific; equal to the square root of the total area of the RFI site.
f. USEPA default value.
h. Exposure point concentration values are 1/2 the sample quantitation limit for soil at 0-10 feet bgs since it was detected in soil vapor.
VOC - volatile organic compound
COPC - chemical of potential concern
bgs - below ground surface
mg/sec-m^2 - milligram per second per square meter

Parameter Values Used for Migration of Volatile COPC from Soil to Ambient Air
Sodium Reactor Experiment (SRE) Area

Constituent	RME Soil Vapor Concentration Cs (ug/m^3)	Diffusivity in air D_a (cm^2/s)	Diffusivity in water D_w (cm^2/s)	Henry's law constant at reference temperature H (atm-m^3/mol)	Organic carbon partition coefficient K_{oc} (cm^3/g)	Effective diffusion coefficient D^{eff}_A (cm^2/s)
1,1,1-Trichloroethane	500	7.80E-02	8.80E-06	1.72E-02	1.10E+02	6.58E-03
1,1,2-Trichloro-1,2,2-trifluoroethane	2901	7.80E-02	8.20E-06	4.80E-01	1.11E+04	6.58E-03
1,1-Dichloroethane	500	7.42E-02	1.05E-05	5.61E-03	3.16E+01	6.26E-03
Ethylbenzene	500	7.50E-02	7.80E-06	7.86E-03	3.63E+02	6.33E-03
m,p-Xylene	1000	7.69E-02	8.44E-06	7.64E-03	3.89E+02	6.49E-03
Methylene chloride	12750	1.01E-01	1.17E-05	2.18E-03	1.17E+01	8.52E-03
Tetrachloroethene	500	7.20E-02	8.20E-06	1.84E-02	1.55E+02	6.08E-03
Toluene	500	8.70E-02	8.60E-06	6.62E-03	1.82E+02	7.34E-03
Trichloroethene	500	7.90E-02	9.10E-06	1.03E-02	1.66E+02	6.67E-03

Site-Specific and Default Values			
Organic carbon content of soil (f_{oc})	2.3E-03	fraction	Site-specific - as per SRAM (MWH, 2005)
Soil bulk density for soil stratum (P_b)	1.7E+00	g/cm^3	Site-specific - as per SRAM (MWH, 2005)
Soil porosity (n)	3.7E-01	cm^3/cm^3	Site-specific - as per SRAM (MWH, 2005)
Soil water filled porosity (θ_w)	1.1E-01	cm^3/cm^3	Site-specific - as per SRAM (MWH, 2005)
Soil depth (L)	91	cm	Site-specific
Site Area (A)	9.2	acres	Site-specific
Q/C coefficient A	12	unitless	USEPA (2002) default
Q/C coefficient B	18	unitless	USEPA (2002) default
Q/C coefficient C	210	unitless	USEPA (2002) default
Q/C	41	g/m2-	USEPA (2002)
Water recharge (R)	1.0E-09	m/s	Site-specific - as per SRAM (MWH, 2005)

Spreadsheet C3-21 (1 of 2)

Estimation of Fugitive Dust Exposure Point Concentrations
Sodium Reactor Experiment (SRE) Area

$$Ca = \frac{Cs}{PEF}$$

Where,

Ca = concentration of COPC in air (mg/m^3)
Cs = concentration of COPC in soil (mg/kg)
PEF = particulate emission factor (m^3/kg)

Chemical	CTE Soil Concentration [a] (mg/kg)	RME Soil Concentration [a] (mg/kg)	CTE Air Concentration (mg/m^3)	RME Air Concentration (mg/m^3)
Non-Volatile COPCs in Soils (0-2 feet bgs)				
Inorganic Compounds				
Cadmium	5.1E-01	1.1E+00	2.1E-10	4.6E-10
Copper	2.1E+01	4.6E+01	8.6E-09	1.9E-08
Lead	1.6E+01	3.4E+01	6.6E-09	1.4E-08
Mercury	1.9E+00	4.4E+00	7.8E-10	1.8E-09
Silver	7.7E-01	2.9E+00	3.2E-10	1.2E-09
Thallium	3.3E-01	3.3E-01	1.3E-10	1.3E-10
Zinc	1.7E+02	4.4E+02	6.9E-08	1.8E-07
SVOCs				
Acenaphthene	4.4E-02	1.0E-01	1.8E-11	4.1E-11
Acenaphthylene	3.1E-02	8.5E-02	1.3E-11	3.5E-11
Anthracene	3.9E-02	8.2E-02	1.6E-11	3.3E-11
Benzo(a)anthracene	3.6E-02	1.5E-01	1.5E-11	6.1E-11
Benzo(a)pyrene	3.6E-02	1.5E-01	1.5E-11	6.1E-11
Benzo(b)fluoranthene	4.9E-02	2.7E-01	2.0E-11	1.1E-10
Benzo(e)pyrene	1.9E-02	6.3E-02	7.6E-12	2.6E-11
Benzo(g,h,i)perylene	4.1E-02	9.0E-02	1.7E-11	3.7E-11
Benzo(k)fluoranthene	3.0E-02	8.5E-02	1.2E-11	3.5E-11
Chrysene	4.4E-02	2.2E-01	1.8E-11	8.8E-11
Dibenz(a,h)anthracene	2.9E-02	8.5E-02	1.2E-11	3.5E-11
Fluoranthene	6.0E-02	3.8E-01	2.5E-11	1.5E-10
Fluorene	4.4E-02	1.0E-01	1.8E-11	4.1E-11
Indeno(1,2,3-cd)pyrene	3.4E-02	1.4E-01	1.4E-11	5.5E-11
Perylene	1.1E-02	3.6E-02	4.4E-12	1.5E-11
Phenanthrene	7.9E-02	2.0E-01	3.2E-11	8.2E-11
Pyrene	5.3E-02	1.6E-01	2.2E-11	6.4E-11
Total Petroleum Hydrocarbons				
C11-C14(Kerosene Range)	9.7E+00	4.0E+01	4.0E-09	1.6E-08
C14-C20(Diesel Range)	7.5E+00	7.5E+00	3.0E-09	3.0E-09
C20-C30(Lubricant Oil Range)	7.3E+01	4.7E+02	3.0E-08	1.9E-07
PCDD/PCDFs				
2,3,7,8-TCDD	2.7E-07	5.3E-07	1.1E-16	2.2E-16
1,2,3,7,8-PeCDD	1.1E-06	2.2E-06	4.5E-16	8.9E-16
1,2,3,4,7,8-HxCDD	4.1E-06	9.0E-06	1.7E-15	3.7E-15
1,2,3,6,7,8-HxCDD	1.6E-05	3.0E-05	6.5E-15	1.2E-14
1,2,3,7,8,9-HxCDD	5.9E-06	1.0E-05	2.4E-15	4.1E-15
1,2,3,4,6,7,8-HpCDD	5.7E-04	1.2E-03	2.3E-13	4.8E-13
OCDD	8.4E-03	1.7E-02	3.4E-12	6.9E-12
2,3,7,8-TCDF	5.5E-07	7.9E-07	2.2E-16	3.2E-16
1,2,3,7,8-PeCDF	2.8E-07	5.7E-07	1.1E-16	2.3E-16
2,3,4,7,8-PeCDF	8.2E-07	1.6E-06	3.3E-16	6.4E-16
1,2,3,4,7,8-HxCDF	1.8E-06	3.3E-06	7.3E-16	1.4E-15
1,2,3,6,7,8-HxCDF	1.6E-06	3.2E-06	6.3E-16	1.3E-15
2,3,4,6,7,8-HxCDF	3.8E-06	8.8E-06	1.6E-15	3.6E-15
1,2,3,7,8,9-HxCDF	3.6E-07	9.7E-07	1.5E-16	4.0E-16
1,2,3,4,6,7,8-HpCDF	5.3E-05	9.6E-05	2.1E-14	3.9E-14
1,2,3,4,7,8,9-HpCDF	4.9E-06	9.2E-06	2.0E-15	3.8E-15
OCDF	1.4E-04	2.4E-04	5.5E-14	9.7E-14
PCBs				
Aroclor-1254	1.6E-01	4.3E-01	6.6E-11	1.8E-10
Aroclor-1260	1.3E+00	7.3E+00	5.4E-10	3.0E-09
PCB-105	1.1E-04	5.6E-04	4.7E-14	2.3E-13
PCB-114	2.2E-06	1.0E-05	8.9E-16	4.1E-15
PCB-118	2.3E-04	1.1E-03	9.4E-14	4.6E-13
PCB-123	3.2E-06	1.6E-05	1.3E-15	6.5E-15
PCB-126	8.8E-06	4.4E-05	3.6E-15	1.8E-14
PCB-156	7.5E-05	3.8E-04	3.1E-14	1.5E-13
PCB-157	3.3E-05	1.7E-04	1.3E-14	6.9E-14
PCB-167	5.7E-05	2.9E-04	2.3E-14	1.2E-13
PCB-169	8.6E-07	4.4E-06	3.5E-16	1.8E-15
PCB-189	8.6E-06	4.4E-05	3.5E-15	1.8E-14
PCB-77	1.8E-05	8.8E-05	7.2E-15	3.6E-14
PCB-81	3.1E-06	1.6E-05	1.3E-15	6.3E-15

Estimation of Fugitive Dust Exposure Point Concentrations
Sodium Reactor Experiment (SRE) Area
Spreadsheet C3-21 (2 of 2)

Estimation of Fugitive Dust Exposure Point Concentrations
Sodium Reactor Experiment (SRE) Area

Chemical	CTE Soil (mg/kg)	RME Soil (mg/kg)	CTE Air (m^3/kg)	RME Air (m^3/kg)
Non-Volatile COPCs in Soils (0-10 feet bgs)				
Inorganic Compounds				
Cadmium	3.7E-01	1.5E+00	1.5E-10	6.1E-10
Copper	1.7E+01	3.1E+01	6.8E-09	1.3E-08
Lead	1.2E+01	2.3E+01	5.1E-09	9.3E-09
Mercury	1.4E+00	4.5E+00	5.9E-10	1.9E-09
Silver	9.3E-01	3.7E+00	3.8E-10	1.5E-09
Thallium	1.0E+00	2.8E+00	4.1E-10	1.2E-09
Zinc	1.2E+02	4.7E+02	4.9E-08	1.9E-07
SVOCs				
2-Methylnaphthalene	2.5E-02	2.5E-02	1.0E-11	1.0E-11
Acenaphthene	6.6E-02	1.6E-01	2.7E-11	6.7E-11
Acenaphthylene	3.2E-02	8.5E-02	1.3E-11	3.5E-11
Anthracene	1.3E-01	5.4E-01	5.4E-11	2.2E-10
Benzo(a)anthracene	4.6E-01	3.9E+00	1.9E-10	1.6E-09
Benzo(a)pyrene	4.9E-01	4.1E+00	2.0E-10	1.7E-09
Benzo(b)fluoranthene	4.5E-01	3.6E+00	1.8E-10	1.5E-09
Benzo(e)pyrene	1.7E-02	4.6E-02	6.8E-12	1.9E-11
Benzo(g,h,i)perylene	1.7E-01	1.3E+00	7.0E-11	5.3E-10
Benzo(k)fluoranthene	4.8E-01	4.1E+00	2.0E-10	1.7E-09
Chrysene	3.5E-01	3.4E+00	1.4E-10	1.4E-09
Dibenz(a,h)anthracene	9.0E-02	6.1E-01	3.7E-11	2.5E-10
Dibenzofuran	9.8E-02	1.2E-01	4.0E-11	4.9E-11
Fluoranthene	8.1E-01	6.9E+00	3.3E-10	2.8E-09
Fluorene	6.6E-02	1.7E-01	2.7E-11	6.8E-11
Indeno(1,2,3-cd)pyrene	2.3E-01	1.8E+00	9.2E-11	7.3E-10
Naphthalene	4.9E-02	5.8E-02	2.0E-11	2.4E-11
Perylene	9.4E-03	2.6E-02	3.8E-12	1.1E-11
Phenanthrene	4.0E-01	1.6E+00	1.6E-10	6.5E-10
Pyrene	6.8E-01	5.8E+00	2.8E-10	2.4E-09
Total Petroleum Hydrocarbons				
C11-C14(Kerosene Range)	7.1E+00	1.8E+01	2.9E-09	7.4E-09
C14-C20(Diesel Range)	6.7E+00	1.6E+01	2.7E-09	6.5E-09
C20-C30(Lubricant Oil Range)	6.6E+01	3.6E+02	2.7E-08	1.5E-07
PCDD/PCDFs				
2,3,7,8-TCDD	2.3E-07	4.4E-07	9.2E-17	1.8E-16
1,2,3,7,8-PeCDD	8.9E-07	1.8E-06	3.6E-16	7.2E-16
1,2,3,4,7,8-HxCDD	3.3E-06	7.2E-06	1.4E-15	2.9E-15
1,2,3,6,7,8-HxCDD	1.3E-05	2.4E-05	5.2E-15	1.0E-14
1,2,3,7,8,9-HxCDD	4.7E-06	9.4E-06	1.9E-15	3.8E-15
1,2,3,4,6,7,8-HpCDD	4.5E-04	9.5E-04	1.8E-13	3.9E-13
OCDD	6.7E-03	1.4E-02	2.7E-12	5.6E-12
2,3,7,8-TCDF	4.5E-07	7.9E-07	1.8E-16	3.2E-16
1,2,3,7,8-PeCDF	2.3E-07	4.6E-07	9.6E-17	1.9E-16
2,3,4,7,8-PeCDF	6.6E-07	1.3E-06	2.7E-16	5.2E-16
1,2,3,4,7,8-HxCDF	1.4E-06	2.8E-06	5.8E-16	1.1E-15
1,2,3,6,7,8-HxCDF	1.2E-06	2.5E-06	5.1E-16	1.0E-15
2,3,4,6,7,8-HxCDF	3.1E-06	6.9E-06	1.3E-15	2.8E-15
1,2,3,7,8,9-HxCDF	3.0E-07	9.7E-07	1.2E-16	4.0E-16
1,2,3,4,6,7,8-HpCDF	4.2E-05	8.0E-05	1.7E-14	3.3E-14
1,2,3,4,7,8,9-HpCDF	3.9E-06	7.6E-06	1.6E-15	3.1E-15
OCDF	1.1E-04	2.0E-04	4.4E-14	8.2E-14
PCBs				
Aroclor-1254	1.6E-01	4.3E-01	6.3E-11	1.8E-10
Aroclor-1260	1.3E+00	7.0E+00	5.2E-10	2.9E-09
PCB-105	1.1E-04	5.7E-04	4.5E-14	2.3E-13
PCB-114	2.1E-06	1.0E-05	8.5E-16	4.2E-15
PCB-118	2.2E-04	1.1E-03	9.0E-14	4.7E-13
PCB-123	3.1E-06	1.6E-05	1.3E-15	6.6E-15
PCB-126	8.4E-06	4.4E-05	3.4E-15	1.8E-14
PCB-156	7.2E-05	3.8E-04	2.9E-14	1.6E-13
PCB-157	3.2E-05	1.7E-04	1.3E-14	7.0E-14
PCB-167	5.5E-05	3.0E-04	2.2E-14	1.2E-13
PCB-169	8.2E-07	4.4E-06	3.4E-16	1.8E-15
PCB-189	8.2E-06	4.4E-05	3.3E-15	1.8E-14
PCB-77	1.7E-05	8.9E-05	6.9E-15	3.6E-14
PCB-81	3.0E-06	1.6E-05	1.2E-15	6.4E-15

Notes:
a. Exposure point concentrations as presented in Spreadsheets C3-11 and C3-12 for soil at 0 to 2 and 0 to 10 feet bgs, respectively.
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyl
PCDD/PCDF - polychlorinated dibenzo-p-dioxins and dibenzofurans
CTE - Central Tendency Exposure
RME - Reasonable Maximum Exposure
bgs - below ground surface
mg/kg - milligram per kilogram
mg/m^3 - milligram per cubic meter

Spreadsheet C3-20 (1 of 1)

Estimation of Particulate Emission Factor (PEF)
Sodium Reactor Experiment (SRE) Area

$$PEF = \frac{LS\,x\,V\,x\,3{,}600\,\mathrm{sec}/hour}{A}\,x\,\frac{1{,}000\,g/kg}{0.036\,x\,(1-G)\,x\left(\frac{U_m}{U_t}\right)3\,x\,F(x)}$$

PEF Parameters	Value	Units
PEF = particulate emission factor	2.4E+09	m^3/kg
LS = width of the contaminated area (site-specific) [a]	193	m
V = wind speed in the mixing zone (site specific) [b]	1.78	m/s
A = area of contaminated area (site-specific)[a]	37,231	m^2
G = fraction of vegetative/paved road/building cover (USEPA default)[t]	0.50	unitless
0.036 = respirable fraction (USEPA default)[b]	0.036	g/m^2-hr
U_m = annual windspeed (site-specific) [b]	1.78	m/s
U_t = equivalent threshold of windspeed at 7 m (USEPA default)[b]	11.32	m/s
F(x) = function dependent on Um/Ut (USEPA default)[b]	0.19	unitless

Notes:

a. Based on the total area of non-volatile COPC contamination.

b. SRAM (MWH 2005)

COPC - chemical of potential concern

TPH to Petroleum Constituent Extrapolation (0-10 feet bgs)
Sodium Reactor Experiment (SRE) Area

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
C08-C11 (Gasoline Range)	MJ630	5.40E+00	2.7E+00	U		-	-
C11-C14 (Kerosene Range)	MJ630	5.40E+00	2.7E+00	U		-	-
C14-C20 (Diesel Range)	MJ630	5.40E+00	2.7E+00	U		-	-
C20-C30 (Lubricant Oil Range)	MJ630	5.40E+00	2.7E+00	U		-	-
C11-C30	MJ630		8.1E+00			-	-
Benzene	MJ630	-	-	-	1.2E-04	-	-
Ethylbenzene	MJ630	-	-	-	1.2E-04	-	-
Toluene	MJ630	-	-	-	1.2E-04	-	-
m,p-Xylene	MJ630	-	-	-	3.6E-04	-	-
o-Xylene	MJ630	-	-	-	8.0E-05	-	-
Xylene (total)	MJ630	-	-	-	4.4E-04	-	-
2-Methylnaphthalene	MJ630	-	-	-	2.8E-02	-	-
Acenaphthene	MJ630	-	-	-	5.7E-04	4.6E-03	4.6E-03
Acenaphthylene	MJ630	-	-	-	7.0E-05	5.7E-04	5.7E-04
Anthracene	MJ630	-	-	-	3.7E-04	3.0E-03	3.0E-03
Benzo(a)anthracene	MJ630	-	-	-	2.7E-05	2.2E-04	2.2E-04
Benzo(a)pyrene	MJ630	-	-	-	2.7E-05	2.2E-04	2.2E-04
Benzo(b)fluoranthene	MJ630	-	-	-	4.3E-05	3.5E-04	3.5E-04
Benzo(e)pyrene	MJ630	-	-	-	2.1E-04	1.7E-03	1.7E-03
Benzo(g,h,i)perylene	MJ630	-	-	-	2.2E-04	1.8E-03	1.8E-03
Benzo(k)fluoranthene	MJ630	-	-	-	2.1E-05	1.7E-04	1.7E-04
Chrysene	MJ630	-	-	-	5.9E-05	4.8E-04	4.8E-04
Dibenz(a,h)anthracene	MJ630	-	-	-	1.1E-05	9.0E-05	9.0E-05
Fluoranthene	MJ630	-	-	-	7.5E-05	6.1E-04	6.1E-04
Fluorene	MJ630	-	-	-	5.7E-04	4.6E-03	4.6E-03
Indeno(1,2,3-cd)pyrene	MJ630	-	-	-	2.4E-05	1.9E-04	1.9E-04
Naphthalene	MJ630	-	-	-	6.9E-03	-	-
Perylene	MJ630	-	-	-	1.2E-04	9.6E-04	9.6E-04
Phenanthrene	MJ630	-	-	-	1.5E-03	1.2E-02	1.2E-02
Pyrene	MJ630	-	-	-	1.4E-04	1.1E-03	1.1E-03
C08-C11 (Gasoline Range)	MJ631	5.30E+00	2.7E+00	U		-	-
C11-C14 (Kerosene Range)	MJ631	5.30E+00	2.7E+00	U		-	-
C14-C20 (Diesel Range)	MJ631	5.30E+00	2.7E+00	U		-	-
C20-C30 (Lubricant Oil Range)	MJ631	1.10E+01	1.1E+01			-	-
C11-C30	MJ631		1.6E+01			-	-
Benzene	MJ631	-	-	-	1.2E-04	-	-
Ethylbenzene	MJ631	-	-	-	1.2E-04	-	-
Toluene	MJ631	-	-	-	1.2E-04	-	-
m,p-Xylene	MJ631	-	-	-	3.6E-04	-	-
o-Xylene	MJ631	-	-	-	8.0E-05	-	-
Xylene (total)	MJ631	-	-	-	4.4E-04	-	-
2-Methylnaphthalene	MJ631	-	-	-	2.8E-02	-	-
Acenaphthene	MJ631	-	-	-	5.7E-04	9.3E-03	9.3E-03
Acenaphthylene	MJ631	-	-	-	7.0E-05	1.1E-03	1.1E-03
Anthracene	MJ631	-	-	-	3.7E-04	6.1E-03	6.1E-03
Benzo(a)anthracene	MJ631	-	-	-	2.7E-05	4.4E-04	4.4E-04
Benzo(a)pyrene	MJ631	-	-	-	2.7E-05	4.4E-04	4.4E-04
Benzo(b)fluoranthene	MJ631	-	-	-	4.3E-05	7.1E-04	7.1E-04
Benzo(e)pyrene	MJ631	-	-	-	2.1E-04	3.4E-03	3.4E-03
Benzo(g,h,i)perylene	MJ631	-	-	-	2.2E-04	3.6E-03	3.6E-03
Benzo(k)fluoranthene	MJ631	-	-	-	2.1E-05	3.3E-04	3.3E-04
Chrysene	MJ631	-	-	-	5.9E-05	9.6E-04	9.6E-04
Dibenz(a,h)anthracene	MJ631	-	-	-	1.1E-05	1.8E-04	1.8E-04
Fluoranthene	MJ631	-	-	-	7.5E-05	1.2E-03	1.2E-03

TPH to Petroleum Constituent Extrapolation (0-10 feet bgs)
Sodium Reactor Experiment (SRE) Area

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Fluorene	MJ631	-	-	-	5.7E-04	9.3E-03	9.3E-03
Indeno(1,2,3-cd)pyrene	MJ631	-	-	-	2.4E-05	3.9E-04	3.9E-04
Naphthalene	MJ631	-	-	-	6.9E-03	-	-
Perylene	MJ631	-	-	-	1.2E-04	1.9E-03	1.9E-03
Phenanthrene	MJ631	-	-	-	1.5E-03	2.5E-02	2.5E-02
Pyrene	MJ631	-	-	-	1.4E-04	2.2E-03	2.2E-03
C08-C11 (Gasoline Range)	MJ661	1.20E+01	6.0E+00	U		-	-
C11-C14 (Kerosene Range)	MJ661	1.20E+01	6.0E+00	U		-	-
C14-C20 (Diesel Range)	MJ661	1.20E+01	6.0E+00	U		-	-
C20-C30 (Lubricant Oil Range)	MJ661	1.20E+01	6.0E+00	U		-	-
C11-C30	MJ661		1.8E+01			-	-
Benzene	MJ661	-	-	-	1.2E-04	-	-
Ethylbenzene	MJ661	-	-	-	1.2E-04	-	-
Toluene	MJ661	-	-	-	1.2E-04	-	-
m,p-Xylene	MJ661	-	-	-	3.6E-04	-	-
o-Xylene	MJ661	-	-	-	8.0E-05	-	-
Xylene (total)	MJ661	-	-	-	4.4E-04	-	-
2-Methylnaphthalene	MJ661	-	-	-	2.8E-02	-	-
Acenaphthene	MJ661	-	-	-	5.7E-04	1.0E-02	1.0E-02
Acenaphthylene	MJ661	-	-	-	7.0E-05	1.3E-03	1.3E-03
Anthracene	MJ661	-	-	-	3.7E-04	6.7E-03	6.7E-03
Benzo(a)anthracene	MJ661	-	-	-	2.7E-05	4.9E-04	4.9E-04
Benzo(a)pyrene	MJ661	-	-	-	2.7E-05	4.9E-04	4.9E-04
Benzo(b)fluoranthene	MJ661	-	-	-	4.3E-05	7.8E-04	7.8E-04
Benzo(e)pyrene	MJ661	-	-	-	2.1E-04	3.7E-03	3.7E-03
Benzo(g,h,i)perylene	MJ661	-	-	-	2.2E-04	4.0E-03	4.0E-03
Benzo(k)fluoranthene	MJ661	-	-	-	2.1E-05	3.7E-04	3.7E-04
Chrysene	MJ661	-	-	-	5.9E-05	1.1E-03	1.1E-03
Dibenz(a,h)anthracene	MJ661	-	-	-	1.1E-05	2.0E-04	2.0E-04
Fluoranthene	MJ661	-	-	-	7.5E-05	1.3E-03	1.3E-03
Fluorene	MJ661	-	-	-	5.7E-04	1.0E-02	1.0E-02
Indeno(1,2,3-cd)pyrene	MJ661	-	-	-	2.4E-05	4.3E-04	4.3E-04
Naphthalene	MJ661	-	-	-	6.9E-03	-	-
Perylene	MJ661	-	-	-	1.2E-04	2.1E-03	2.1E-03
Phenanthrene	MJ661	-	-	-	1.5E-03	2.8E-02	2.8E-02
Pyrene	MJ661	-	-	-	1.4E-04	2.5E-03	2.5E-03
C08-C11 (Gasoline Range)	MJ662	1.10E+01	5.5E+00	U		-	-
C11-C14 (Kerosene Range)	MJ662	1.10E+01	5.5E+00	U		-	-
C14-C20 (Diesel Range)	MJ662	1.10E+01	5.5E+00	U		-	-
C20-C30 (Lubricant Oil Range)	MJ662	1.10E+01	5.5E+00	U		-	-
C11-C30	MJ662		1.7E+01			-	-
Benzene	MJ662	-	-	-	1.2E-04	-	-
Ethylbenzene	MJ662	-	-	-	1.2E-04	-	-
Toluene	MJ662	-	-	-	1.2E-04	-	-
m,p-Xylene	MJ662	-	-	-	3.6E-04	-	-
o-Xylene	MJ662	-	-	-	8.0E-05	-	-
Xylene (total)	MJ662	-	-	-	4.4E-04	-	-
2-Methylnaphthalene	MJ662	-	-	-	2.8E-02	-	-
Acenaphthene	MJ662	-	-	-	5.7E-04	9.5E-03	9.5E-03
Acenaphthylene	MJ662	-	-	-	7.0E-05	1.2E-03	1.2E-03
Anthracene	MJ662	-	-	-	3.7E-04	6.2E-03	6.2E-03
Benzo(a)anthracene	MJ662	-	-	-	2.7E-05	4.4E-04	4.4E-04
Benzo(a)pyrene	MJ662	-	-	-	2.7E-05	4.5E-04	4.5E-04
Benzo(b)fluoranthene	MJ662	-	-	-	4.3E-05	7.1E-04	7.1E-04
Benzo(e)pyrene	MJ662	-	-	-	2.1E-04	3.4E-03	3.4E-03

TPH to Petroleum Constituent Extrapolation (0-10 feet bgs)
Sodium Reactor Experiment (SRE) Area

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Benzo(g,h,i)perylene	MJ662	-	-	-	2.2E-04	3.6E-03	3.6E-03
Benzo(k)fluoranthene	MJ662	-	-	-	2.1E-05	3.4E-04	3.4E-04
Chrysene	MJ662	-	-	-	5.9E-05	9.7E-04	9.7E-04
Dibenz(a,h)anthracene	MJ662	-	-	-	1.1E-05	1.8E-04	1.8E-04
Fluoranthene	MJ662	-	-	-	7.5E-05	1.2E-03	1.2E-03
Fluorene	MJ662	-	-	-	5.7E-04	9.4E-03	9.4E-03
Indeno(1,2,3-cd)pyrene	MJ662	-	-	-	2.4E-05	4.0E-04	4.0E-04
Naphthalene	MJ662	-	-	-	6.9E-03	-	-
Perylene	MJ662	-	-	-	1.2E-04	1.9E-03	1.9E-03
Phenanthrene	MJ662	-	-	-	1.5E-03	2.5E-02	2.5E-02
Pyrene	MJ662	-	-	-	1.4E-04	2.2E-03	2.2E-03
C08-C11 (Gasoline Range)	MJ663	1.10E+01	5.5E+00	U		-	-
C11-C14 (Kerosene Range)	MJ663	1.10E+01	5.5E+00	U		-	-
C14-C20 (Diesel Range)	MJ663	1.10E+01	5.5E+00	U		-	-
C20-C30 (Lubricant Oil Range)	MJ663	5.00E+00	5.0E+00	J		-	-
C11-C30	MJ663		1.6E+01			-	-
Benzene	MJ663	-	-	-	1.2E-04	-	-
Ethylbenzene	MJ663	-	-	-	1.2E-04	-	-
Toluene	MJ663	-	-	-	1.2E-04	-	-
m,p-Xylene	MJ663	-	-	-	3.6E-04	-	-
o-Xylene	MJ663	-	-	-	8.0E-05	-	-
Xylene (total)	MJ663	-	-	-	4.4E-04	-	-
2-Methylnaphthalene	MJ663	-	-	-	2.8E-02	-	-
Acenaphthene	MJ663	-	-	-	5.7E-04	9.2E-03	9.2E-03
Acenaphthylene	MJ663	-	-	-	7.0E-05	1.1E-03	1.1E-03
Anthracene	MJ663	-	-	-	3.7E-04	6.0E-03	6.0E-03
Benzo(a)anthracene	MJ663	-	-	-	2.7E-05	4.3E-04	4.3E-04
Benzo(a)pyrene	MJ663	-	-	-	2.7E-05	4.4E-04	4.4E-04
Benzo(b)fluoranthene	MJ663	-	-	-	4.3E-05	6.9E-04	6.9E-04
Benzo(e)pyrene	MJ663	-	-	-	2.1E-04	3.3E-03	3.3E-03
Benzo(g,h,i)perylene	MJ663	-	-	-	2.2E-04	3.5E-03	3.5E-03
Benzo(k)fluoranthene	MJ663	-	-	-	2.1E-05	3.3E-04	3.3E-04
Chrysene	MJ663	-	-	-	5.9E-05	9.4E-04	9.4E-04
Dibenz(a,h)anthracene	MJ663	-	-	-	1.1E-05	1.8E-04	1.8E-04
Fluoranthene	MJ663	-	-	-	7.5E-05	1.2E-03	1.2E-03
Fluorene	MJ663	-	-	-	5.7E-04	9.1E-03	9.1E-03
Indeno(1,2,3-cd)pyrene	MJ663	-	-	-	2.4E-05	3.8E-04	3.8E-04
Naphthalene	MJ663	-	-	-	6.9E-03	-	-
Perylene	MJ663	-	-	-	1.2E-04	1.9E-03	1.9E-03
Phenanthrene	MJ663	-	-	-	1.5E-03	2.5E-02	2.5E-02
Pyrene	MJ663	-	-	-	1.4E-04	2.2E-03	2.2E-03
C08-C11 (Gasoline Range)	MJ664	1.10E+01	5.5E+00	U		-	-
C11-C14 (Kerosene Range)	MJ664	1.10E+01	5.5E+00	U		-	-
C14-C20 (Diesel Range)	MJ664	1.10E+01	5.5E+00	U		-	-
C20-C30 (Lubricant Oil Range)	MJ664	6.30E+00	6.3E+00	J		-	-
C11-C30	MJ664		1.7E+01			-	-
Benzene	MJ664	-	-	-	1.2E-04	-	-
Ethylbenzene	MJ664	-	-	-	1.2E-04	-	-
Toluene	MJ664	-	-	-	1.2E-04	-	-
m,p-Xylene	MJ664	-	-	-	3.6E-04	-	-
o-Xylene	MJ664	-	-	-	8.0E-05	-	-
Xylene (total)	MJ664	-	-	-	4.4E-04	-	-
2-Methylnaphthalene	MJ664	-	-	-	2.8E-02	-	-
Acenaphthene	MJ664	-	-	-	5.7E-04	9.9E-03	9.9E-03
Acenaphthylene	MJ664	-	-	-	7.0E-05	1.2E-03	1.2E-03

TPH to Petroleum Constituent Extrapolation (0-10 feet bgs)
Sodium Reactor Experiment (SRE) Area

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Anthracene	MJ664	-	-	-	3.7E-04	6.5E-03	6.5E-03
Benzo(a)anthracene	MJ664	-	-	-	2.7E-05	4.7E-04	4.7E-04
Benzo(a)pyrene	MJ664	-	-	-	2.7E-05	4.7E-04	4.7E-04
Benzo(b)fluoranthene	MJ664	-	-	-	4.3E-05	7.5E-04	7.5E-04
Benzo(e)pyrene	MJ664	-	-	-	2.1E-04	3.6E-03	3.6E-03
Benzo(g,h,i)perylene	MJ664	-	-	-	2.2E-04	3.8E-03	3.8E-03
Benzo(k)fluoranthene	MJ664	-	-	-	2.1E-05	3.5E-04	3.5E-04
Chrysene	MJ664	-	-	-	5.9E-05	1.0E-03	1.0E-03
Dibenz(a,h)anthracene	MJ664	-	-	-	1.1E-05	1.9E-04	1.9E-04
Fluoranthene	MJ664	-	-	-	7.5E-05	1.3E-03	1.3E-03
Fluorene	MJ664	-	-	-	5.7E-04	9.8E-03	9.8E-03
Indeno(1,2,3-cd)pyrene	MJ664	-	-	-	2.4E-05	4.2E-04	4.2E-04
Naphthalene	MJ664	-	-	-	6.9E-03	-	-
Perylene	MJ664	-	-	-	1.2E-04	2.0E-03	2.0E-03
Phenanthrene	MJ664	-	-	-	1.5E-03	2.7E-02	2.7E-02
Pyrene	MJ664	-	-	-	1.4E-04	2.4E-03	2.4E-03
C08-C11 (Gasoline Range)	RD977	1.10E+01	5.5E+00	UJ		-	-
C11-C14 (Kerosene Range)	RD977	1.10E+01	5.5E+00	UJ		-	-
C14-C20 (Diesel Range)	RD977	1.10E+01	5.5E+00	UJ		-	-
C20-C30 (Lubricant Oil Range)	RD977	1.10E+01	5.5E+00	UJ		-	-
C11-C30	RD977		1.7E+01			-	-
Benzene	RD977	5.00E-03	2.5E-03	U	1.2E-04	-	2.5E-03
Ethylbenzene	RD977	5.00E-03	2.5E-03	U	1.2E-04	-	2.5E-03
Toluene	RD977	5.00E-03	2.5E-03	U	1.2E-04	-	2.5E-03
m,p-Xylene	RD977	5.00E-03	2.5E-03	U	3.6E-04	-	2.5E-03
o-Xylene	RD977	5.00E-03	2.5E-03	U	8.0E-05	-	2.5E-03
Xylene (total)	RD977	-	-	-	4.4E-04	-	-
2-Methylnaphthalene	RD977	-	-	-	2.8E-02	-	-
Acenaphthene	RD977	-	-	-	5.7E-04	9.5E-03	9.5E-03
Acenaphthylene	RD977	-	-	-	7.0E-05	1.2E-03	1.2E-03
Anthracene	RD977	-	-	-	3.7E-04	6.2E-03	6.2E-03
Benzo(a)anthracene	RD977	-	-	-	2.7E-05	4.4E-04	4.4E-04
Benzo(a)pyrene	RD977	-	-	-	2.7E-05	4.5E-04	4.5E-04
Benzo(b)fluoranthene	RD977	-	-	-	4.3E-05	7.1E-04	7.1E-04
Benzo(e)pyrene	RD977	-	-	-	2.1E-04	3.4E-03	3.4E-03
Benzo(g,h,i)perylene	RD977	-	-	-	2.2E-04	3.6E-03	3.6E-03
Benzo(k)fluoranthene	RD977	-	-	-	2.1E-05	3.4E-04	3.4E-04
Chrysene	RD977	-	-	-	5.9E-05	9.7E-04	9.7E-04
Dibenz(a,h)anthracene	RD977	-	-	-	1.1E-05	1.8E-04	1.8E-04
Fluoranthene	RD977	-	-	-	7.5E-05	1.2E-03	1.2E-03
Fluorene	RD977	-	-	-	5.7E-04	9.4E-03	9.4E-03
Indeno(1,2,3-cd)pyrene	RD977	-	-	-	2.4E-05	4.0E-04	4.0E-04
Naphthalene	RD977	-	-	-	6.9E-03	-	-
Perylene	RD977	-	-	-	1.2E-04	1.9E-03	1.9E-03
Phenanthrene	RD977	-	-	-	1.5E-03	2.5E-02	2.5E-02
Pyrene	RD977	-	-	-	1.4E-04	2.2E-03	2.2E-03
C08-C11 (Gasoline Range)	RD979	1.10E+01	5.5E+00	UJ		-	-
C11-C14 (Kerosene Range)	RD979	1.10E+01	5.5E+00	UJ		-	-
C14-C20 (Diesel Range)	RD979	1.10E+01	5.5E+00	UJ		-	-
C20-C30 (Lubricant Oil Range)	RD979	1.10E+01	5.5E+00	UJ		-	-
C11-C30	RD979		1.7E+01			-	-
Benzene	RD979	5.00E-03	2.5E-03	U	1.2E-04	-	2.5E-03
Ethylbenzene	RD979	5.00E-03	2.5E-03	U	1.2E-04	-	2.5E-03
Toluene	RD979	5.00E-03	2.5E-03	U	1.2E-04	-	2.5E-03
m,p-Xylene	RD979	5.00E-03	2.5E-03	U	3.6E-04	-	2.5E-03

TPH to Petroleum Constituent Extrapolation (0-10 feet bgs)
Sodium Reactor Experiment (SRE) Area

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
o-Xylene	RD979	5.00E-03	2.5E-03	U	8.0E-05	-	2.5E-03
Xylene (total)	RD979	-	-	-	4.4E-04	-	-
2-Methylnaphthalene	RD979	-	-	-	2.8E-02	-	-
Acenaphthene	RD979	-	-	-	5.7E-04	9.5E-03	9.5E-03
Acenaphthylene	RD979	-	-	-	7.0E-05	1.2E-03	1.2E-03
Anthracene	RD979	-	-	-	3.7E-04	6.2E-03	6.2E-03
Benzo(a)anthracene	RD979	-	-	-	2.7E-05	4.4E-04	4.4E-04
Benzo(a)pyrene	RD979	-	-	-	2.7E-05	4.5E-04	4.5E-04
Benzo(b)fluoranthene	RD979	-	-	-	4.3E-05	7.1E-04	7.1E-04
Benzo(e)pyrene	RD979	-	-	-	2.1E-04	3.4E-03	3.4E-03
Benzo(g,h,i)perylene	RD979	-	-	-	2.2E-04	3.6E-03	3.6E-03
Benzo(k)fluoranthene	RD979	-	-	-	2.1E-05	3.4E-04	3.4E-04
Chrysene	RD979	-	-	-	5.9E-05	9.7E-04	9.7E-04
Dibenz(a,h)anthracene	RD979	-	-	-	1.1E-05	1.8E-04	1.8E-04
Fluoranthene	RD979	-	-	-	7.5E-05	1.2E-03	1.2E-03
Fluorene	RD979	-	-	-	5.7E-04	9.4E-03	9.4E-03
Indeno(1,2,3-cd)pyrene	RD979	-	-	-	2.4E-05	4.0E-04	4.0E-04
Naphthalene	RD979	-	-	-	6.9E-03	-	-
Perylene	RD979	-	-	-	1.2E-04	1.9E-03	1.9E-03
Phenanthrene	RD979	-	-	-	1.5E-03	2.5E-02	2.5E-02
Pyrene	RD979	-	-	-	1.4E-04	2.2E-03	2.2E-03
C08-C11 (Gasoline Range)	RD980	1.10E+01	5.5E+00	UJ		-	-
C11-C14 (Kerosene Range)	RD980	1.10E+01	5.5E+00	UJ		-	-
C14-C20 (Diesel Range)	RD980	1.10E+01	5.5E+00	UJ		-	-
C20-C30 (Lubricant Oil Range)	RD980	1.10E+01	5.5E+00	UJ		-	-
C11-C30	RD980		1.7E+01			-	-
Benzene	RD980	5.00E-03	2.5E-03	U	1.2E-04	-	2.5E-03
Ethylbenzene	RD980	5.00E-03	2.5E-03	U	1.2E-04	-	2.5E-03
Toluene	RD980	5.00E-03	2.5E-03	U	1.2E-04	-	2.5E-03
m,p-Xylene	RD980	5.00E-03	2.5E-03	U	3.6E-04	-	2.5E-03
o-Xylene	RD980	5.00E-03	2.5E-03	U	8.0E-05	-	2.5E-03
Xylene (total)	RD980	-	-	-	4.4E-04	-	-
2-Methylnaphthalene	RD980	-	-	-	2.8E-02	-	-
Acenaphthene	RD980	-	-	-	5.7E-04	9.5E-03	9.5E-03
Acenaphthylene	RD980	-	-	-	7.0E-05	1.2E-03	1.2E-03
Anthracene	RD980	-	-	-	3.7E-04	6.2E-03	6.2E-03
Benzo(a)anthracene	RD980	-	-	-	2.7E-05	4.4E-04	4.4E-04
Benzo(a)pyrene	RD980	-	-	-	2.7E-05	4.5E-04	4.5E-04
Benzo(b)fluoranthene	RD980	-	-	-	4.3E-05	7.1E-04	7.1E-04
Benzo(e)pyrene	RD980	-	-	-	2.1E-04	3.4E-03	3.4E-03
Benzo(g,h,i)perylene	RD980	-	-	-	2.2E-04	3.6E-03	3.6E-03
Benzo(k)fluoranthene	RD980	-	-	-	2.1E-05	3.4E-04	3.4E-04
Chrysene	RD980	-	-	-	5.9E-05	9.7E-04	9.7E-04
Dibenz(a,h)anthracene	RD980	-	-	-	1.1E-05	1.8E-04	1.8E-04
Fluoranthene	RD980	-	-	-	7.5E-05	1.2E-03	1.2E-03
Fluorene	RD980	-	-	-	5.7E-04	9.4E-03	9.4E-03
Indeno(1,2,3-cd)pyrene	RD980	-	-	-	2.4E-05	4.0E-04	4.0E-04
Naphthalene	RD980	-	-	-	6.9E-03	-	-
Perylene	RD980	-	-	-	1.2E-04	1.9E-03	1.9E-03
Phenanthrene	RD980	-	-	-	1.5E-03	2.5E-02	2.5E-02
Pyrene	RD980	-	-	-	1.4E-04	2.2E-03	2.2E-03
C08-C11 (Gasoline Range)	RJ152	4.00E+00	2.0E+00	U		-	-
C11-C14 (Kerosene Range)	RJ152	4.00E+00	2.0E+00	U		-	-
C14-C20 (Diesel Range)	RJ152	4.00E+00	2.0E+00	U		-	-
C20-C30 (Lubricant Oil Range)	RJ152	4.00E+00	2.0E+00	U		-	-

TPH to Petroleum Constituent Extrapolation (0-10 feet bgs)
Sodium Reactor Experiment (SRE) Area

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
C11-C30	RJ152		6.0E+00			-	-
Benzene	RJ152	5.00E-03	2.5E-03	U	1.2E-04	-	2.5E-03
Ethylbenzene	RJ152	5.00E-03	2.5E-03	U	1.2E-04	-	2.5E-03
Toluene	RJ152	5.00E-03	2.5E-03	U	1.2E-04	-	2.5E-03
m,p-Xylene	RJ152	6.00E-04	6.0E-04	J	3.6E-04	-	6.0E-04
o-Xylene	RJ152	5.00E-03	2.5E-03	U	8.0E-05	-	2.5E-03
Xylene (total)	RJ152	6.00E-04	6.0E-04	J	4.4E-04	-	6.0E-04
2-Methylnaphthalene	RJ152	-	-	-	2.8E-02	-	-
Acenaphthene	RJ152	-	-	-	5.7E-04	3.4E-03	3.4E-03
Acenaphthylene	RJ152	-	-	-	7.0E-05	4.2E-04	4.2E-04
Anthracene	RJ152	-	-	-	3.7E-04	2.2E-03	2.2E-03
Benzo(a)anthracene	RJ152	-	-	-	2.7E-05	1.6E-04	1.6E-04
Benzo(a)pyrene	RJ152	-	-	-	2.7E-05	1.6E-04	1.6E-04
Benzo(b)fluoranthene	RJ152	-	-	-	4.3E-05	2.6E-04	2.6E-04
Benzo(e)pyrene	RJ152	-	-	-	2.1E-04	1.2E-03	1.2E-03
Benzo(g,h,i)perylene	RJ152	-	-	-	2.2E-04	1.3E-03	1.3E-03
Benzo(k)fluoranthene	RJ152	-	-	-	2.1E-05	1.2E-04	1.2E-04
Chrysene	RJ152	-	-	-	5.9E-05	3.5E-04	3.5E-04
Dibenz(a,h)anthracene	RJ152	-	-	-	1.1E-05	6.6E-05	6.6E-05
Fluoranthene	RJ152	-	-	-	7.5E-05	4.5E-04	4.5E-04
Fluorene	RJ152	-	-	-	5.7E-04	3.4E-03	3.4E-03
Indeno(1,2,3-cd)pyrene	RJ152	-	-	-	2.4E-05	1.4E-04	1.4E-04
Naphthalene	RJ152	-	-	-	6.9E-03	-	-
Perylene	RJ152	-	-	-	1.2E-04	7.1E-04	7.1E-04
Phenanthrene	RJ152	-	-	-	1.5E-03	9.2E-03	9.2E-03
Pyrene	RJ152	-	-	-	1.4E-04	8.2E-04	8.2E-04
C08-C11 (Gasoline Range)	RJ202	4.00E+00	2.0E+00	UJ		-	-
C11-C14 (Kerosene Range)	RJ202	4.00E+00	2.0E+00	UJ		-	-
C14-C20 (Diesel Range)	RJ202	4.00E+00	2.0E+00	UJ		-	-
C20-C30 (Lubricant Oil Range)	RJ202	6.25E+00	6.3E+00	J		-	-
C11-C30	RJ202		1.0E+01			-	-
Benzene	RJ202	-	-	-	1.2E-04	-	-
Ethylbenzene	RJ202	-	-	-	1.2E-04	-	-
Toluene	RJ202	-	-	-	1.2E-04	-	-
m,p-Xylene	RJ202	-	-	-	3.6E-04	-	-
o-Xylene	RJ202	-	-	-	8.0E-05	-	-
Xylene (total)	RJ202	-	-	-	4.4E-04	-	-
2-Methylnaphthalene	RJ202	-	-	-	2.8E-02	-	-
Acenaphthene	RJ202	-	-	-	5.7E-04	5.9E-03	5.9E-03
Acenaphthylene	RJ202	-	-	-	7.0E-05	7.2E-04	7.2E-04
Anthracene	RJ202	-	-	-	3.7E-04	3.8E-03	3.8E-03
Benzo(a)anthracene	RJ202	-	-	-	2.7E-05	2.8E-04	2.8E-04
Benzo(a)pyrene	RJ202	-	-	-	2.7E-05	2.8E-04	2.8E-04
Benzo(b)fluoranthene	RJ202	-	-	-	4.3E-05	4.4E-04	4.4E-04
Benzo(e)pyrene	RJ202	-	-	-	2.1E-04	2.1E-03	2.1E-03
Benzo(g,h,i)perylene	RJ202	-	-	-	2.2E-04	2.3E-03	2.3E-03
Benzo(k)fluoranthene	RJ202	-	-	-	2.1E-05	2.1E-04	2.1E-04
Chrysene	RJ202	-	-	-	5.9E-05	6.0E-04	6.0E-04
Dibenz(a,h)anthracene	RJ202	-	-	-	1.1E-05	1.1E-04	1.1E-04
Fluoranthene	RJ202	-	-	-	7.5E-05	7.7E-04	7.7E-04
Fluorene	RJ202	-	-	-	5.7E-04	5.8E-03	5.8E-03
Indeno(1,2,3-cd)pyrene	RJ202	-	-	-	2.4E-05	2.5E-04	2.5E-04
Naphthalene	RJ202	-	-	-	6.9E-03	-	-
Perylene	RJ202	-	-	-	1.2E-04	1.2E-03	1.2E-03
Phenanthrene	RJ202	-	-	-	1.5E-03	1.6E-02	1.6E-02

TPH to Petroleum Constituent Extrapolation (0-10 feet bgs)
Sodium Reactor Experiment (SRE) Area

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Pyrene	RJ202	-	-	-	1.4E-04	1.4E-03	1.4E-03
C08-C11 (Gasoline Range)	RJ251	4.00E+00	2.0E+00	U		-	-
C11-C14 (Kerosene Range)	RJ251	4.00E+00	2.0E+00	U		-	-
C14-C20 (Diesel Range)	RJ251	4.00E+00	2.0E+00	U		-	-
C20-C30 (Lubricant Oil Range)	RJ251	3.40E+00	3.4E+00	J		-	-
C11-C30	RJ251		7.4E+00			-	-
Benzene	RJ251	-	-	-	1.2E-04	-	-
Ethylbenzene	RJ251	-	-	-	1.2E-04	-	-
Toluene	RJ251	-	-	-	1.2E-04	-	-
m,p-Xylene	RJ251	-	-	-	3.6E-04	-	-
o-Xylene	RJ251	-	-	-	8.0E-05	-	-
Xylene (total)	RJ251	-	-	-	4.4E-04	-	-
2-Methylnaphthalene	RJ251	4.00E-03	2.0E-03	U	2.8E-02	-	2.0E-03
Acenaphthene	RJ251	4.00E-03	2.0E-03	U	5.7E-04	4.2E-03	2.0E-03
Acenaphthylene	RJ251	4.00E-03	2.0E-03	U	7.0E-05	5.2E-04	5.2E-04
Anthracene	RJ251	2.00E-03	2.0E-03	J	3.7E-04	2.8E-03	2.0E-03
Benzo(a)anthracene	RJ251	1.10E-02	1.1E-02		2.7E-05	2.0E-04	1.1E-02
Benzo(a)pyrene	RJ251	9.00E-03	9.0E-03		2.7E-05	2.0E-04	9.0E-03
Benzo(b)fluoranthene	RJ251	7.00E-03	7.0E-03		4.3E-05	3.2E-04	7.0E-03
Benzo(e)pyrene	RJ251	6.00E-03	6.0E-03		2.1E-04	1.5E-03	6.0E-03
Benzo(g,h,i)perylene	RJ251	-	-	-	2.2E-04	1.6E-03	1.6E-03
Benzo(k)fluoranthene	RJ251	7.00E-03	7.0E-03		2.1E-05	1.5E-04	7.0E-03
Chrysene	RJ251	9.00E-03	9.0E-03		5.9E-05	4.3E-04	9.0E-03
Dibenz(a,h)anthracene	RJ251	5.00E-03	5.0E-03		1.1E-05	8.2E-05	5.0E-03
Fluoranthene	RJ251	1.70E-02	1.7E-02		7.5E-05	5.5E-04	1.7E-02
Fluorene	RJ251	4.00E-03	2.0E-03	U	5.7E-04	4.2E-03	2.0E-03
Indeno(1,2,3-cd)pyrene	RJ251	8.00E-03	8.0E-03		2.4E-05	1.8E-04	8.0E-03
Naphthalene	RJ251	4.00E-03	2.0E-03	U	6.9E-03	-	2.0E-03
Perylene	RJ251	-	-	-	1.2E-04	8.7E-04	8.7E-04
Phenanthrene	RJ251	8.00E-03	8.0E-03		1.5E-03	1.1E-02	8.0E-03
Pyrene	RJ251	1.30E-02	1.3E-02		1.4E-04	1.0E-03	1.3E-02
C08-C11 (Gasoline Range)	RJ253	4.00E+00	2.0E+00	U		-	-
C11-C14 (Kerosene Range)	RJ253	4.00E+00	2.0E+00	U		-	-
C14-C20 (Diesel Range)	RJ253	4.00E+00	2.0E+00	U		-	-
C20-C30 (Lubricant Oil Range)	RJ253	4.00E+00	2.0E+00	U		-	-
C11-C30	RJ253		6.0E+00			-	-
Benzene	RJ253	-	-	-	1.2E-04	-	-
Ethylbenzene	RJ253	-	-	-	1.2E-04	-	-
Toluene	RJ253	-	-	-	1.2E-04	-	-
m,p-Xylene	RJ253	-	-	-	3.6E-04	-	-
o-Xylene	RJ253	-	-	-	8.0E-05	-	-
Xylene (total)	RJ253	-	-	-	4.4E-04	-	-
2-Methylnaphthalene	RJ253	4.00E-03	2.0E-03	U	2.8E-02	-	2.0E-03
Acenaphthene	RJ253	3.00E-03	3.0E-03	J	5.7E-04	3.4E-03	3.0E-03
Acenaphthylene	RJ253	4.00E-03	2.0E-03	U	7.0E-05	4.2E-04	4.2E-04
Anthracene	RJ253	4.00E-03	2.0E-03	U	3.7E-04	2.2E-03	2.0E-03
Benzo(a)anthracene	RJ253	4.00E-03	2.0E-03	U	2.7E-05	1.6E-04	1.6E-04
Benzo(a)pyrene	RJ253	4.00E-03	2.0E-03	U	2.7E-05	1.6E-04	1.6E-04
Benzo(b)fluoranthene	RJ253	4.00E-03	2.0E-03	U	4.3E-05	2.6E-04	2.6E-04
Benzo(e)pyrene	RJ253	-	-	-	2.1E-04	1.2E-03	1.2E-03
Benzo(g,h,i)perylene	RJ253	4.00E-03	2.0E-03	U	2.2E-04	1.3E-03	1.3E-03
Benzo(k)fluoranthene	RJ253	4.00E-03	2.0E-03	U	2.1E-05	1.2E-04	1.2E-04
Chrysene	RJ253	4.00E-03	2.0E-03	U	5.9E-05	3.5E-04	3.5E-04
Dibenz(a,h)anthracene	RJ253	4.00E-03	2.0E-03	U	1.1E-05	6.6E-05	6.6E-05
Fluoranthene	RJ253	4.00E-03	2.0E-03	U	7.5E-05	4.5E-04	4.5E-04

TPH to Petroleum Constituent Extrapolation (0-10 feet bgs)
Sodium Reactor Experiment (SRE) Area

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Fluorene	RJ253	4.00E-03	2.0E-03	U	5.7E-04	3.4E-03	2.0E-03
Indeno(1,2,3-cd)pyrene	RJ253	4.00E-03	2.0E-03	U	2.4E-05	1.4E-04	1.4E-04
Naphthalene	RJ253	4.00E-03	2.0E-03	U	6.9E-03	-	2.0E-03
Perylene	RJ253	-	-	-	1.2E-04	7.1E-04	7.1E-04
Phenanthrene	RJ253	4.00E-03	2.0E-03	U	1.5E-03	9.2E-03	2.0E-03
Pyrene	RJ253	4.00E-03	2.0E-03	U	1.4E-04	8.2E-04	8.2E-04
C08-C11 (Gasoline Range)	RJ271	4.00E+00	2.0E+00	U		-	-
C11-C14 (Kerosene Range)	RJ271	4.00E+00	2.0E+00	U		-	-
C14-C20 (Diesel Range)	RJ271	4.00E+00	2.0E+00	U		-	-
C20-C30 (Lubricant Oil Range)	RJ271	4.00E+00	2.0E+00	U		-	-
C11-C30	RJ271		6.0E+00			-	-
Benzene	RJ271	-	-	-	1.2E-04	-	-
Ethylbenzene	RJ271	-	-	-	1.2E-04	-	-
Toluene	RJ271	-	-	-	1.2E-04	-	-
m,p-Xylene	RJ271	-	-	-	3.6E-04	-	-
o-Xylene	RJ271	-	-	-	8.0E-05	-	-
Xylene (total)	RJ271	-	-	-	4.4E-04	-	-
2-Methylnaphthalene	RJ271	3.00E-03	1.5E-03	U	2.8E-02	-	1.5E-03
Acenaphthene	RJ271	3.00E-03	1.5E-03	U	5.7E-04	3.4E-03	1.5E-03
Acenaphthylene	RJ271	3.00E-03	1.5E-03	U	7.0E-05	4.2E-04	4.2E-04
Anthracene	RJ271	3.00E-03	1.5E-03	U	3.7E-04	2.2E-03	1.5E-03
Benzo(a)anthracene	RJ271	3.00E-03	1.5E-03	U	2.7E-05	1.6E-04	1.6E-04
Benzo(a)pyrene	RJ271	3.00E-03	1.5E-03	U	2.7E-05	1.6E-04	1.6E-04
Benzo(b)fluoranthene	RJ271	3.00E-03	1.5E-03	U	4.3E-05	2.6E-04	2.6E-04
Benzo(e)pyrene	RJ271	-	-	-	2.1E-04	1.2E-03	1.2E-03
Benzo(g,h,i)perylene	RJ271	3.00E-03	1.5E-03	U	2.2E-04	1.3E-03	1.3E-03
Benzo(k)fluoranthene	RJ271	3.00E-03	1.5E-03	U	2.1E-05	1.2E-04	1.2E-04
Chrysene	RJ271	3.00E-03	1.5E-03	U	5.9E-05	3.5E-04	3.5E-04
Dibenz(a,h)anthracene	RJ271	3.00E-03	1.5E-03	U	1.1E-05	6.6E-05	6.6E-05
Fluoranthene	RJ271	3.00E-03	1.5E-03	U	7.5E-05	4.5E-04	4.5E-04
Fluorene	RJ271	3.00E-03	1.5E-03	U	5.7E-04	3.4E-03	1.5E-03
Indeno(1,2,3-cd)pyrene	RJ271	3.00E-03	1.5E-03	U	2.4E-05	1.4E-04	1.4E-04
Naphthalene	RJ271	3.00E-03	3.0E-03	J	6.9E-03	-	3.0E-03
Perylene	RJ271	-	-	-	1.2E-04	7.1E-04	7.1E-04
Phenanthrene	RJ271	3.00E-03	1.5E-03	U	1.5E-03	9.2E-03	1.5E-03
Pyrene	RJ271	3.00E-03	1.5E-03	U	1.4E-04	8.2E-04	8.2E-04
C08-C11 (Gasoline Range)	RJ398	4.00E+00	2.0E+00	U		-	-
C11-C14 (Kerosene Range)	RJ398	4.00E+00	2.0E+00	U		-	-
C14-C20 (Diesel Range)	RJ398	4.00E+00	2.0E+00	U		-	-
C20-C30 (Lubricant Oil Range)	RJ398	4.00E+00	2.0E+00	UJ		-	-
C11-C30	RJ398		6.0E+00			-	-
Benzene	RJ398	5.00E-03	2.5E-03	UJ	1.2E-04	-	2.5E-03
Ethylbenzene	RJ398	5.00E-03	2.5E-03	UJ	1.2E-04	-	2.5E-03
Toluene	RJ398	5.00E-03	2.5E-03	UJ	1.2E-04	-	2.5E-03
m,p-Xylene	RJ398	1.00E-02	5.0E-03	UJ	3.6E-04	-	5.0E-03
o-Xylene	RJ398	5.00E-03	2.5E-03	UJ	8.0E-05	-	2.5E-03
Xylene (total)	RJ398	1.50E-02	7.5E-03	UJ	4.4E-04	-	7.5E-03
2-Methylnaphthalene	RJ398	-	-	-	2.8E-02	-	-
Acenaphthene	RJ398	-	-	-	5.7E-04	3.4E-03	3.4E-03
Acenaphthylene	RJ398	-	-	-	7.0E-05	4.2E-04	4.2E-04
Anthracene	RJ398	-	-	-	3.7E-04	2.2E-03	2.2E-03
Benzo(a)anthracene	RJ398	-	-	-	2.7E-05	1.6E-04	1.6E-04
Benzo(a)pyrene	RJ398	-	-	-	2.7E-05	1.6E-04	1.6E-04
Benzo(b)fluoranthene	RJ398	-	-	-	4.3E-05	2.6E-04	2.6E-04
Benzo(e)pyrene	RJ398	-	-	-	2.1E-04	1.2E-03	1.2E-03

TPH to Petroleum Constituent Extrapolation (0-10 feet bgs)
Sodium Reactor Experiment (SRE) Area

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Benzo(g,h,i)perylene	RJ398	-	-	-	2.2E-04	1.3E-03	1.3E-03
Benzo(k)fluoranthene	RJ398	-	-	-	2.1E-05	1.2E-04	1.2E-04
Chrysene	RJ398	-	-	-	5.9E-05	3.5E-04	3.5E-04
Dibenz(a,h)anthracene	RJ398	-	-	-	1.1E-05	6.6E-05	6.6E-05
Fluoranthene	RJ398	-	-	-	7.5E-05	4.5E-04	4.5E-04
Fluorene	RJ398	-	-	-	5.7E-04	3.4E-03	3.4E-03
Indeno(1,2,3-cd)pyrene	RJ398	-	-	-	2.4E-05	1.4E-04	1.4E-04
Naphthalene	RJ398	-	-	-	6.9E-03	-	-
Perylene	RJ398	-	-	-	1.2E-04	7.1E-04	7.1E-04
Phenanthrene	RJ398	-	-	-	1.5E-03	9.2E-03	9.2E-03
Pyrene	RJ398	-	-	-	1.4E-04	8.2E-04	8.2E-04
C08-C11 (Gasoline Range)	RJ513	3.00E+00	1.5E+00	UJ		-	-
C11-C14 (Kerosene Range)	RJ513	3.00E+00	1.5E+00	UJ		-	-
C14-C20 (Diesel Range)	RJ513	3.00E+00	1.5E+00	U		-	-
C20-C30 (Lubricant Oil Range)	RJ513	6.60E+01	6.6E+01			-	-
C11-C30	RJ513		6.9E+01			-	-
Benzene	RJ513	-	-	-	1.2E-04	-	-
Ethylbenzene	RJ513	-	-	-	1.2E-04	-	-
Toluene	RJ513	-	-	-	1.2E-04	-	-
m,p-Xylene	RJ513	-	-	-	3.6E-04	-	-
o-Xylene	RJ513	-	-	-	8.0E-05	-	-
Xylene (total)	RJ513	-	-	-	4.4E-04	-	-
2-Methylnaphthalene	RJ513	7.00E-03	3.5E-03	UJ	2.8E-02	-	3.5E-03
Acenaphthene	RJ513	7.00E-03	3.5E-03	UJ	5.7E-04	4.0E-02	3.5E-03
Acenaphthylene	RJ513	7.00E-03	3.5E-03	UJ	7.0E-05	4.8E-03	3.5E-03
Anthracene	RJ513	7.00E-03	3.5E-03	UJ	3.7E-04	2.6E-02	3.5E-03
Benzo(a)anthracene	RJ513	7.00E-03	3.5E-03	UJ	2.7E-05	1.9E-03	1.9E-03
Benzo(a)pyrene	RJ513	-	-	-	2.7E-05	1.9E-03	1.9E-03
Benzo(b)fluoranthene	RJ513	-	-	-	4.3E-05	3.0E-03	3.0E-03
Benzo(e)pyrene	RJ513	-	-	-	2.1E-04	1.4E-02	1.4E-02
Benzo(g,h,i)perylene	RJ513	-	-	-	2.2E-04	1.5E-02	1.5E-02
Benzo(k)fluoranthene	RJ513	-	-	-	2.1E-05	1.4E-03	1.4E-03
Chrysene	RJ513	7.00E-03	3.5E-03	U	5.9E-05	4.0E-03	3.5E-03
Dibenz(a,h)anthracene	RJ513	-	-	-	1.1E-05	7.6E-04	7.6E-04
Fluoranthene	RJ513	7.00E-03	3.5E-03	UJ	7.5E-05	5.2E-03	3.5E-03
Fluorene	RJ513	7.00E-03	3.5E-03	UJ	5.7E-04	3.9E-02	3.5E-03
Indeno(1,2,3-cd)pyrene	RJ513	-	-	-	2.4E-05	1.7E-03	1.7E-03
Naphthalene	RJ513	7.00E-03	3.5E-03	UJ	6.9E-03	-	3.5E-03
Perylene	RJ513	-	-	-	1.2E-04	8.1E-03	8.1E-03
Phenanthrene	RJ513	5.40E-02	5.4E-02		1.5E-03	1.1E-01	5.4E-02
Pyrene	RJ513	7.00E-03	3.5E-03	UJ	1.4E-04	9.4E-03	3.5E-03
C08-C11 (Gasoline Range)	RJ516	9.90E+01	5.0E+01	U		-	-
C11-C14 (Kerosene Range)	RJ516	9.90E+01	5.0E+01	U		-	-
C14-C20 (Diesel Range)	RJ516	9.90E+01	5.0E+01	U		-	-
C20-C30 (Lubricant Oil Range)	RJ516	4.20E+02	4.2E+02			-	-
C11-C30	RJ516		5.2E+02			-	-
Benzene	RJ516	5.00E-03	2.5E-03	U	1.2E-04	-	2.5E-03
Ethylbenzene	RJ516	5.00E-03	2.5E-03	U	1.2E-04	-	2.5E-03
Toluene	RJ516	5.00E-03	2.5E-03	U	1.2E-04	-	2.5E-03
m,p-Xylene	RJ516	1.00E-02	5.0E-03	U	3.6E-04	-	5.0E-03
o-Xylene	RJ516	5.00E-03	2.5E-03	U	8.0E-05	-	2.5E-03
Xylene (total)	RJ516	-	-	-	4.4E-04	-	-
2-Methylnaphthalene	RJ516	3.00E-03	1.5E-03	U	2.8E-02	-	1.5E-03
Acenaphthene	RJ516	3.00E-03	1.5E-03	U	5.7E-04	3.0E-01	1.5E-03
Acenaphthylene	RJ516	3.00E-03	1.5E-03	U	7.0E-05	3.6E-02	1.5E-03

TPH to Petroleum Constituent Extrapolation (0-10 feet bgs)
Sodium Reactor Experiment (SRE) Area

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Anthracene	RJ516	3.00E-03	1.5E-03	U	3.7E-04	1.9E-01	1.5E-03
Benzo(a)anthracene	RJ516	2.00E-03	2.0E-03	J	2.7E-05	1.4E-02	2.0E-03
Benzo(a)pyrene	RJ516	4.00E-03	4.0E-03		2.7E-05	1.4E-02	4.0E-03
Benzo(b)fluoranthene	RJ516	5.00E-03	5.0E-03		4.3E-05	2.2E-02	5.0E-03
Benzo(e)pyrene	RJ516	-	-	-	2.1E-04	1.1E-01	1.1E-01
Benzo(g,h,i)perylene	RJ516	3.00E-03	1.5E-03	U	2.2E-04	1.1E-01	1.5E-03
Benzo(k)fluoranthene	RJ516	4.00E-03	4.0E-03		2.1E-05	1.1E-02	4.0E-03
Chrysene	RJ516	5.00E-03	5.0E-03		5.9E-05	3.0E-02	5.0E-03
Dibenz(a,h)anthracene	RJ516	3.00E-03	1.5E-03	U	1.1E-05	5.7E-03	1.5E-03
Fluoranthene	RJ516	4.00E-03	4.0E-03		7.5E-05	3.9E-02	4.0E-03
Fluorene	RJ516	3.00E-03	1.5E-03	U	5.7E-04	2.9E-01	1.5E-03
Indeno(1,2,3-cd)pyrene	RJ516	5.00E-03	5.0E-03		2.4E-05	1.2E-02	5.0E-03
Naphthalene	RJ516	3.00E-03	1.5E-03	U	6.9E-03	-	1.5E-03
Perylene	RJ516	-	-	-	1.2E-04	6.1E-02	6.1E-02
Phenanthrene	RJ516	2.00E-03	2.0E-03	J	1.5E-03	8.0E-01	2.0E-03
Pyrene	RJ516	5.00E-03	5.0E-03		1.4E-04	7.1E-02	5.0E-03
C08-C11 (Gasoline Range)	RJ517	3.00E+00	1.5E+00	U		-	-
C11-C14 (Kerosene Range)	RJ517	3.00E+00	1.5E+00	U		-	-
C14-C20 (Diesel Range)	RJ517	3.00E+00	1.5E+00	U		-	-
C20-C30 (Lubricant Oil Range)	RJ517	1.20E+01	1.2E+01			-	-
C11-C30	RJ517		1.5E+01			-	-
Benzene	RJ517	5.00E-03	2.5E-03	U	1.2E-04	-	2.5E-03
Ethylbenzene	RJ517	5.00E-03	2.5E-03	U	1.2E-04	-	2.5E-03
Toluene	RJ517	3.00E-03	1.5E-03	U	1.2E-04	-	1.5E-03
m,p-Xylene	RJ517	1.00E-02	5.0E-03	U	3.6E-04	-	5.0E-03
o-Xylene	RJ517	5.00E-03	2.5E-03	U	8.0E-05	-	2.5E-03
Xylene (total)	RJ517	1.50E-02	7.5E-03	U	4.4E-04	-	7.5E-03
2-Methylnaphthalene	RJ517	3.00E-03	1.5E-03	U	2.8E-02	-	1.5E-03
Acenaphthene	RJ517	3.00E-03	1.5E-03	U	5.7E-04	8.6E-03	1.5E-03
Acenaphthylene	RJ517	3.00E-03	1.5E-03	U	7.0E-05	1.1E-03	1.1E-03
Anthracene	RJ517	3.00E-03	1.5E-03	U	3.7E-04	5.6E-03	1.5E-03
Benzo(a)anthracene	RJ517	3.00E-03	1.5E-03	U	2.7E-05	4.0E-04	4.0E-04
Benzo(a)pyrene	RJ517	3.00E-03	1.5E-03	U	2.7E-05	4.1E-04	4.1E-04
Benzo(b)fluoranthene	RJ517	3.00E-03	3.0E-03	J	4.3E-05	6.5E-04	3.0E-03
Benzo(e)pyrene	RJ517	-	-	-	2.1E-04	3.1E-03	3.1E-03
Benzo(g,h,i)perylene	RJ517	3.00E-03	1.5E-03	U	2.2E-04	3.3E-03	1.5E-03
Benzo(k)fluoranthene	RJ517	3.00E-03	1.5E-03	U	2.1E-05	3.1E-04	3.1E-04
Chrysene	RJ517	5.00E-03	5.0E-03		5.9E-05	8.8E-04	5.0E-03
Dibenz(a,h)anthracene	RJ517	3.00E-03	1.5E-03	U	1.1E-05	1.7E-04	1.7E-04
Fluoranthene	RJ517	4.00E-03	4.0E-03		7.5E-05	1.1E-03	4.0E-03
Fluorene	RJ517	3.00E-03	1.5E-03	U	5.7E-04	8.5E-03	1.5E-03
Indeno(1,2,3-cd)pyrene	RJ517	3.00E-03	1.5E-03	U	2.4E-05	3.6E-04	3.6E-04
Naphthalene	RJ517	3.00E-03	1.5E-03	U	6.9E-03	-	1.5E-03
Perylene	RJ517	-	-	-	1.2E-04	1.8E-03	1.8E-03
Phenanthrene	RJ517	3.00E-03	1.5E-03	U	1.5E-03	2.3E-02	1.5E-03
Pyrene	RJ517	3.00E-03	3.0E-03	J	1.4E-04	2.0E-03	3.0E-03
C08-C11 (Gasoline Range)	RJ627	4.00E+00	2.0E+00	U		-	-
C11-C14 (Kerosene Range)	RJ627	4.00E+00	2.0E+00	U		-	-
C14-C20 (Diesel Range)	RJ627	4.00E+00	2.0E+00	U		-	-
C20-C30 (Lubricant Oil Range)	RJ627	4.00E+00	2.0E+00	U		-	-
C11-C30	RJ627		6.0E+00			-	-
Benzene	RJ627	-	-	-	1.2E-04	-	-
Ethylbenzene	RJ627	-	-	-	1.2E-04	-	-
Toluene	RJ627	-	-	-	1.2E-04	-	-
m,p-Xylene	RJ627	-	-	-	3.6E-04	-	-

TPH to Petroleum Constituent Extrapolation (0-10 feet bgs)
Sodium Reactor Experiment (SRE) Area

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
o-Xylene	RJ627	-	-	-	8.0E-05	-	-
Xylene (total)	RJ627	-	-	-	4.4E-04	-	-
2-Methylnaphthalene	RJ627	-	-	-	2.8E-02	-	-
Acenaphthene	RJ627	-	-	-	5.7E-04	3.4E-03	3.4E-03
Acenaphthylene	RJ627	-	-	-	7.0E-05	4.2E-04	4.2E-04
Anthracene	RJ627	-	-	-	3.7E-04	2.2E-03	2.2E-03
Benzo(a)anthracene	RJ627	-	-	-	2.7E-05	1.6E-04	1.6E-04
Benzo(a)pyrene	RJ627	-	-	-	2.7E-05	1.6E-04	1.6E-04
Benzo(b)fluoranthene	RJ627	-	-	-	4.3E-05	2.6E-04	2.6E-04
Benzo(e)pyrene	RJ627	-	-	-	2.1E-04	1.2E-03	1.2E-03
Benzo(g,h,i)perylene	RJ627	-	-	-	2.2E-04	1.3E-03	1.3E-03
Benzo(k)fluoranthene	RJ627	-	-	-	2.1E-05	1.2E-04	1.2E-04
Chrysene	RJ627	-	-	-	5.9E-05	3.5E-04	3.5E-04
Dibenz(a,h)anthracene	RJ627	-	-	-	1.1E-05	6.6E-05	6.6E-05
Fluoranthene	RJ627	-	-	-	7.5E-05	4.5E-04	4.5E-04
Fluorene	RJ627	-	-	-	5.7E-04	3.4E-03	3.4E-03
Indeno(1,2,3-cd)pyrene	RJ627	-	-	-	2.4E-05	1.4E-04	1.4E-04
Naphthalene	RJ627	-	-	-	6.9E-03	-	-
Perylene	RJ627	-	-	-	1.2E-04	7.1E-04	7.1E-04
Phenanthrene	RJ627	-	-	-	1.5E-03	9.2E-03	9.2E-03
Pyrene	RJ627	-	-	-	1.4E-04	8.2E-04	8.2E-04
C08-C11 (Gasoline Range)	RJ786	1.80E+01	9.0E+00	U		-	-
C11-C14 (Kerosene Range)	RJ786	4.00E+01	4.0E+01			-	-
C14-C20 (Diesel Range)	RJ786	1.80E+01	9.0E+00	U		-	-
C20-C30 (Lubricant Oil Range)	RJ786	4.70E+02	4.7E+02			-	-
C11-C30	RJ786		5.2E+02			-	-
Benzene	RJ786	-	-	-	1.2E-04	-	-
Ethylbenzene	RJ786	-	-	-	1.2E-04	-	-
Toluene	RJ786	-	-	-	1.2E-04	-	-
m,p-Xylene	RJ786	-	-	-	3.6E-04	-	-
o-Xylene	RJ786	-	-	-	8.0E-05	-	-
Xylene (total)	RJ786	-	-	-	4.4E-04	-	-
2-Methylnaphthalene	RJ786	-	-	-	2.8E-02	-	-
Acenaphthene	RJ786	-	-	-	5.7E-04	3.0E-01	3.0E-01
Acenaphthylene	RJ786	-	-	-	7.0E-05	3.6E-02	3.6E-02
Anthracene	RJ786	-	-	-	3.7E-04	1.9E-01	1.9E-01
Benzo(a)anthracene	RJ786	-	-	-	2.7E-05	1.4E-02	1.4E-02
Benzo(a)pyrene	RJ786	-	-	-	2.7E-05	1.4E-02	1.4E-02
Benzo(b)fluoranthene	RJ786	-	-	-	4.3E-05	2.2E-02	2.2E-02
Benzo(e)pyrene	RJ786	-	-	-	2.1E-04	1.1E-01	1.1E-01
Benzo(g,h,i)perylene	RJ786	-	-	-	2.2E-04	1.1E-01	1.1E-01
Benzo(k)fluoranthene	RJ786	-	-	-	2.1E-05	1.1E-02	1.1E-02
Chrysene	RJ786	-	-	-	5.9E-05	3.0E-02	3.0E-02
Dibenz(a,h)anthracene	RJ786	-	-	-	1.1E-05	5.7E-03	5.7E-03
Fluoranthene	RJ786	-	-	-	7.5E-05	3.9E-02	3.9E-02
Fluorene	RJ786	-	-	-	5.7E-04	2.9E-01	2.9E-01
Indeno(1,2,3-cd)pyrene	RJ786	-	-	-	2.4E-05	1.2E-02	1.2E-02
Naphthalene	RJ786	-	-	-	6.9E-03	-	-
Perylene	RJ786	-	-	-	1.2E-04	6.1E-02	6.1E-02
Phenanthrene	RJ786	-	-	-	1.5E-03	8.0E-01	8.0E-01
Pyrene	RJ786	-	-	-	1.4E-04	7.1E-02	7.1E-02
C08-C11 (Gasoline Range)	RJ788	3.00E+00	1.5E+00	U		-	-
C11-C14 (Kerosene Range)	RJ788	3.00E+00	1.5E+00	U		-	-
C14-C20 (Diesel Range)	RJ788	1.40E+01	1.4E+01	J		-	-
C20-C30 (Lubricant Oil Range)	RJ788	1.30E+02	1.3E+02	J		-	-

TPH to Petroleum Constituent Extrapolation (0-10 feet bgs)
Sodium Reactor Experiment (SRE) Area

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
C11-C30	RJ788		1.5E+02			-	-
Benzene	RJ788	-	-	-	1.2E-04	-	-
Ethylbenzene	RJ788	-	-	-	1.2E-04	-	-
Toluene	RJ788	-	-	-	1.2E-04	-	-
m,p-Xylene	RJ788	-	-	-	3.6E-04	-	-
o-Xylene	RJ788	-	-	-	8.0E-05	-	-
Xylene (total)	RJ788	-	-	-	4.4E-04	-	-
2-Methylnaphthalene	RJ788	2.50E-02	2.5E-02		2.8E-02	-	2.5E-02
Acenaphthene	RJ788	2.00E-01	2.0E-01		5.7E-04	8.3E-02	2.0E-01
Acenaphthylene	RJ788	1.80E-02	9.0E-03	U	7.0E-05	1.0E-02	9.0E-03
Anthracene	RJ788	1.80E-02	9.0E-03	U	3.7E-04	5.4E-02	9.0E-03
Benzo(a)anthracene	RJ788	3.90E+00	3.9E+00	J	2.7E-05	3.9E-03	3.9E+00
Benzo(a)pyrene	RJ788	4.20E+00	4.2E+00		2.7E-05	4.0E-03	4.2E+00
Benzo(b)fluoranthene	RJ788	4.10E+00	4.1E+00		4.3E-05	6.3E-03	4.1E+00
Benzo(e)pyrene	RJ788	-	-	-	2.1E-04	3.0E-02	3.0E-02
Benzo(g,h,i)perylene	RJ788	9.50E-01	9.5E-01		2.2E-04	3.2E-02	9.5E-01
Benzo(k)fluoranthene	RJ788	4.00E+00	4.0E+00		2.1E-05	3.0E-03	4.0E+00
Chrysene	RJ788	1.80E-02	9.0E-03	UJ	5.9E-05	8.5E-03	8.5E-03
Dibenz(a,h)anthracene	RJ788	3.10E-01	3.1E-01		1.1E-05	1.6E-03	3.1E-01
Fluoranthene	RJ788	7.00E+00	7.0E+00		7.5E-05	1.1E-02	7.0E+00
Fluorene	RJ788	2.10E-01	2.1E-01		5.7E-04	8.3E-02	2.1E-01
Indeno(1,2,3-cd)pyrene	RJ788	1.70E+00	1.7E+00	J	2.4E-05	3.5E-03	1.7E+00
Naphthalene	RJ788	5.80E-02	5.8E-02		6.9E-03	-	5.8E-02
Perylene	RJ788	-	-	-	1.2E-04	1.7E-02	1.7E-02
Phenanthrene	RJ788	3.30E+00	3.3E+00		1.5E-03	2.2E-01	3.3E+00
Pyrene	RJ788	5.60E+00	5.6E+00	J	1.4E-04	2.0E-02	5.6E+00
C08-C11 (Gasoline Range)	RJ790	1.70E+01	8.5E+00	U		-	-
C11-C14 (Kerosene Range)	RJ790	1.70E+01	8.5E+00	U		-	-
C14-C20 (Diesel Range)	RJ790	1.80E+01	1.8E+01	J		-	-
C20-C30 (Lubricant Oil Range)	RJ790	3.40E+02	3.4E+02	J		-	-
C11-C30	RJ790		3.7E+02			-	-
Benzene	RJ790	-	-	-	1.2E-04	-	-
Ethylbenzene	RJ790	-	-	-	1.2E-04	-	-
Toluene	RJ790	-	-	-	1.2E-04	-	-
m,p-Xylene	RJ790	-	-	-	3.6E-04	-	-
o-Xylene	RJ790	-	-	-	8.0E-05	-	-
Xylene (total)	RJ790	-	-	-	4.4E-04	-	-
2-Methylnaphthalene	RJ790	3.50E-01	1.8E-01	U	2.8E-02	-	1.8E-01
Acenaphthene	RJ790	9.00E-01	9.0E-01		5.7E-04	2.1E-01	9.0E-01
Acenaphthylene	RJ790	3.50E-01	1.8E-01	U	7.0E-05	2.6E-02	2.6E-02
Anthracene	RJ790	4.00E+00	4.0E+00		3.7E-04	1.4E-01	4.0E+00
Benzo(a)anthracene	RJ790	1.40E+01	1.4E+01	J	2.7E-05	9.9E-03	1.4E+01
Benzo(a)pyrene	RJ790	1.50E+01	1.5E+01		2.7E-05	1.0E-02	1.5E+01
Benzo(b)fluoranthene	RJ790	1.30E+01	1.3E+01		4.3E-05	1.6E-02	1.3E+01
Benzo(e)pyrene	RJ790	-	-	-	2.1E-04	7.6E-02	7.6E-02
Benzo(g,h,i)perylene	RJ790	4.70E+00	4.7E+00		2.2E-04	8.1E-02	4.7E+00
Benzo(k)fluoranthene	RJ790	1.50E+01	1.5E+01		2.1E-05	7.5E-03	1.5E+01
Chrysene	RJ790	1.30E+01	1.3E+01	J	5.9E-05	2.1E-02	1.3E+01
Dibenz(a,h)anthracene	RJ790	2.20E+00	2.2E+00		1.1E-05	4.1E-03	2.2E+00
Fluoranthene	RJ790	2.50E+01	2.5E+01		7.5E-05	2.7E-02	2.5E+01
Fluorene	RJ790	9.20E-01	9.2E-01		5.7E-04	2.1E-01	9.2E-01
Indeno(1,2,3-cd)pyrene	RJ790	6.40E+00	6.4E+00	J	2.4E-05	8.8E-03	6.4E+00
Naphthalene	RJ790	3.50E-01	1.8E-01	U	6.9E-03	-	1.8E-01
Perylene	RJ790	-	-	-	1.2E-04	4.3E-02	4.3E-02
Phenanthrene	RJ790	1.10E+01	1.1E+01		1.5E-03	5.6E-01	1.1E+01

TPH to Petroleum Constituent Extrapolation (0-10 feet bgs)
Sodium Reactor Experiment (SRE) Area

Chemical	EPA ID	Measured Concentration (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Pyrene	RJ790	2.10E+01	2.1E+01	J	1.4E-04	5.0E-02	2.1E+01
C08-C11 (Gasoline Range)	RJ842	4.00E+00	2.0E+00	U		-	-
C11-C14 (Kerosene Range)	RJ842	4.00E+00	2.0E+00	U		-	-
C14-C20 (Diesel Range)	RJ842	4.00E+00	2.0E+00	U		-	-
C20-C30 (Lubricant Oil Range)	RJ842	4.00E+00	2.0E+00	U		-	-
C11-C30	RJ842		6.0E+00			-	-
Benzene	RJ842	5.00E-03	2.5E-03	U	1.2E-04	-	2.5E-03
Ethylbenzene	RJ842	5.00E-03	2.5E-03	U	1.2E-04	-	2.5E-03
Toluene	RJ842	5.00E-03	2.5E-03	U	1.2E-04	-	2.5E-03
m,p-Xylene	RJ842	1.00E-02	5.0E-03	U	3.6E-04	-	5.0E-03
o-Xylene	RJ842	5.00E-03	2.5E-03	U	8.0E-05	-	2.5E-03
Xylene (total)	RJ842	1.50E-02	7.5E-03	U	4.4E-04	-	7.5E-03
2-Methylnaphthalene	RJ842	-	-	-	2.8E-02	-	-
Acenaphthene	RJ842	-	-	-	5.7E-04	3.4E-03	3.4E-03
Acenaphthylene	RJ842	-	-	-	7.0E-05	4.2E-04	4.2E-04
Anthracene	RJ842	-	-	-	3.7E-04	2.2E-03	2.2E-03
Benzo(a)anthracene	RJ842	-	-	-	2.7E-05	1.6E-04	1.6E-04
Benzo(a)pyrene	RJ842	-	-	-	2.7E-05	1.6E-04	1.6E-04
Benzo(b)fluoranthene	RJ842	-	-	-	4.3E-05	2.6E-04	2.6E-04
Benzo(e)pyrene	RJ842	-	-	-	2.1E-04	1.2E-03	1.2E-03
Benzo(g,h,i)perylene	RJ842	-	-	-	2.2E-04	1.3E-03	1.3E-03
Benzo(k)fluoranthene	RJ842	-	-	-	2.1E-05	1.2E-04	1.2E-04
Chrysene	RJ842	-	-	-	5.9E-05	3.5E-04	3.5E-04
Dibenz(a,h)anthracene	RJ842	-	-	-	1.1E-05	6.6E-05	6.6E-05
Fluoranthene	RJ842	-	-	-	7.5E-05	4.5E-04	4.5E-04
Fluorene	RJ842	-	-	-	5.7E-04	3.4E-03	3.4E-03
Indeno(1,2,3-cd)pyrene	RJ842	-	-	-	2.4E-05	1.4E-04	1.4E-04
Naphthalene	RJ842	-	-	-	6.9E-03	-	-
Perylene	RJ842	-	-	-	1.2E-04	7.1E-04	7.1E-04
Phenanthrene	RJ842	-	-	-	1.5E-03	9.2E-03	9.2E-03
Pyrene	RJ842	-	-	-	1.4E-04	8.2E-04	8.2E-04

Notes:

a. Petroleum constituent concentrations estimated and selected as described in Section 2.8 of the SRAM.

"-" not applicable

EF - extrapolation factor

mg/kg - milligrams per kilogram

Aroclor to PCB Congener Extrapolation for Soil/Sediment (0-10 feet bgs)
Sodium Reactor Experiment (SRE) Area

Chemical	EPA ID	Measured Concentrations (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF_{1254}	EF_{1260}	Estimated Concentrations Aroclor-1254 (mg/kg)	Estimated Concentrations Aroclor-1260 (mg/kg)	Estimated Concentrations PCB_{MAX} (mg/kg)
Aroclor-1254	MJ248	1.2E-01	1.2E-01	J	-	-	-	-	-
Aroclor-1260	MJ248	3.7E-02	1.9E-02	UJ	-	-	-	-	-
PCB-105	MJ248	-	-	-	1.2E-01	8.2E-02	1.5E-05	1.5E-06	1.5E-05
PCB-114	MJ248	-	-	-	4.5E-03	1.5E-03	5.4E-07	2.7E-08	5.4E-07
PCB-118	MJ248	-	-	-	2.7E-01	1.6E-01	3.2E-05	3.0E-06	3.2E-05
PCB-123	MJ248	-	-	-	3.0E-03	2.3E-03	3.6E-07	4.3E-08	3.6E-07
PCB-126	MJ248	-	-	-	7.5E-03	6.4E-03	9.0E-07	1.2E-07	9.0E-07
PCB-156	MJ248	-	-	-	6.3E-02	5.5E-02	7.5E-06	1.0E-06	7.5E-06
PCB-157	MJ248	-	-	-	1.2E-02	2.5E-02	1.5E-06	4.5E-07	1.5E-06
PCB-167	MJ248	-	-	-	2.1E-02	4.3E-02	2.5E-06	7.9E-07	2.5E-06
PCB-169	MJ248	-	-	-	3.7E-04	6.4E-04	4.4E-08	1.2E-08	4.4E-08
PCB-189	MJ248	-	-	-	3.0E-03	6.4E-03	3.6E-07	1.2E-07	3.6E-07
PCB-77	MJ248	-	-	-	1.5E-02	1.3E-02	1.9E-06	2.4E-07	1.9E-06
PCB-81	MJ248	-	-	-	3.0E-03	2.3E-03	3.6E-07	4.2E-08	3.6E-07
Aroclor-1254	MJ623	1.1E+00	5.5E-01	U	-	-	-	-	-
Aroclor-1260	MJ623	6.9E+00	6.9E+00		-	-	-	-	-
PCB-105	MJ623	-	-	-	1.2E-01	8.2E-02	6.8E-05	5.6E-04	5.6E-04
PCB-114	MJ623	-	-	-	4.5E-03	1.5E-03	2.5E-06	1.0E-05	1.0E-05
PCB-118	MJ623	-	-	-	2.7E-01	1.6E-01	1.5E-04	1.1E-03	1.1E-03
PCB-123	MJ623	-	-	-	3.0E-03	2.3E-03	1.6E-06	1.6E-05	1.6E-05
PCB-126	MJ623	-	-	-	7.5E-03	6.4E-03	4.1E-06	4.4E-05	4.4E-05
PCB-156	MJ623	-	-	-	6.3E-02	5.5E-02	3.5E-05	3.8E-04	3.8E-04
PCB-157	MJ623	-	-	-	1.2E-02	2.5E-02	6.8E-06	1.7E-04	1.7E-04
PCB-167	MJ623	-	-	-	2.1E-02	4.3E-02	1.1E-05	2.9E-04	2.9E-04
PCB-169	MJ623	-	-	-	3.7E-04	6.4E-04	2.0E-07	4.4E-06	4.4E-06
PCB-189	MJ623	-	-	-	3.0E-03	6.4E-03	1.6E-06	4.4E-05	4.4E-05
PCB-77	MJ623	-	-	-	1.5E-02	1.3E-02	8.5E-06	8.8E-05	8.8E-05
PCB-81	MJ623	-	-	-	3.0E-03	2.3E-03	1.6E-06	1.6E-05	1.6E-05
Aroclor-1254	MJ624	1.1E+00	5.5E-01	U	-	-	-	-	-
Aroclor-1260	MJ624	6.4E+00	6.4E+00		-	-	-	-	-
PCB-105	MJ624	-	-	-	1.2E-01	8.2E-02	6.8E-05	5.2E-04	5.2E-04
PCB-114	MJ624	-	-	-	4.5E-03	1.5E-03	2.5E-06	9.3E-06	9.3E-06
PCB-118	MJ624	-	-	-	2.7E-01	1.6E-01	1.5E-04	1.0E-03	1.0E-03
PCB-123	MJ624	-	-	-	3.0E-03	2.3E-03	1.6E-06	1.5E-05	1.5E-05
PCB-126	MJ624	-	-	-	7.5E-03	6.4E-03	4.1E-06	4.1E-05	4.1E-05
PCB-156	MJ624	-	-	-	6.3E-02	5.5E-02	3.5E-05	3.5E-04	3.5E-04
PCB-157	MJ624	-	-	-	1.2E-02	2.5E-02	6.8E-06	1.6E-04	1.6E-04
PCB-167	MJ624	-	-	-	2.1E-02	4.3E-02	1.1E-05	2.7E-04	2.7E-04
PCB-169	MJ624	-	-	-	3.7E-04	6.4E-04	2.0E-07	4.1E-06	4.1E-06
PCB-189	MJ624	-	-	-	3.0E-03	6.4E-03	1.6E-06	4.1E-05	4.1E-05
PCB-77	MJ624	-	-	-	1.5E-02	1.3E-02	8.5E-06	8.1E-05	8.1E-05
PCB-81	MJ624	-	-	-	3.0E-03	2.3E-03	1.6E-06	1.4E-05	1.4E-05
Aroclor-1254	MJ625	5.4E-01	2.7E-01	U	-	-	-	-	-
Aroclor-1260	MJ625	4.8E+00	4.8E+00		-	-	-	-	-
PCB-105	MJ625	-	-	-	1.2E-01	8.2E-02	3.3E-05	3.9E-04	3.9E-04
PCB-114	MJ625	-	-	-	4.5E-03	1.5E-03	1.2E-06	7.0E-06	7.0E-06
PCB-118	MJ625	-	-	-	2.7E-01	1.6E-01	7.2E-05	7.9E-04	7.9E-04
PCB-123	MJ625	-	-	-	3.0E-03	2.3E-03	8.1E-07	1.1E-05	1.1E-05
PCB-126	MJ625	-	-	-	7.5E-03	6.4E-03	2.0E-06	3.1E-05	3.1E-05
PCB-156	MJ625	-	-	-	6.3E-02	5.5E-02	1.7E-05	2.6E-04	2.6E-04
PCB-157	MJ625	-	-	-	1.2E-02	2.5E-02	3.3E-06	1.2E-04	1.2E-04
PCB-167	MJ625	-	-	-	2.1E-02	4.3E-02	5.6E-06	2.1E-04	2.1E-04
PCB-169	MJ625	-	-	-	3.7E-04	6.4E-04	9.9E-08	3.1E-06	3.1E-06
PCB-189	MJ625	-	-	-	3.0E-03	6.4E-03	8.1E-07	3.1E-05	3.1E-05
PCB-77	MJ625	-	-	-	1.5E-02	1.3E-02	4.2E-06	6.1E-05	6.1E-05
PCB-81	MJ625	-	-	-	3.0E-03	2.3E-03	8.1E-07	1.1E-05	1.1E-05

Aroclor to PCB Congener Extrapolation for Soil/Sediment (0-10 feet bgs)
Sodium Reactor Experiment (SRE) Area

Chemical	EPA ID	Measured Concentrations (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF_{1254}	EF_{1260}	Estimated Concentrations Aroclor-1254 (mg/kg)	Estimated Concentrations Aroclor-1260 (mg/kg)	Estimated Concentrations PCB_{MAX} (mg/kg)
Aroclor-1254	MJ626	1.1E+00	5.5E-01	U	-	-	-	-	-
Aroclor-1260	MJ626	7.8E+00	7.8E+00		-	-	-	-	-
PCB-105	MJ626	-	-	-	1.2E-01	8.2E-02	6.8E-05	6.4E-04	6.4E-04
PCB-114	MJ626	-	-	-	4.5E-03	1.5E-03	2.5E-06	1.1E-05	1.1E-05
PCB-118	MJ626	-	-	-	2.7E-01	1.6E-01	1.5E-04	1.3E-03	1.3E-03
PCB-123	MJ626	-	-	-	3.0E-03	2.3E-03	1.6E-06	1.8E-05	1.8E-05
PCB-126	MJ626	-	-	-	7.5E-03	6.4E-03	4.1E-06	5.0E-05	5.0E-05
PCB-156	MJ626	-	-	-	6.3E-02	5.5E-02	3.5E-05	4.3E-04	4.3E-04
PCB-157	MJ626	-	-	-	1.2E-02	2.5E-02	6.8E-06	1.9E-04	1.9E-04
PCB-167	MJ626	-	-	-	2.1E-02	4.3E-02	1.1E-05	3.3E-04	3.3E-04
PCB-169	MJ626	-	-	-	3.7E-04	6.4E-04	2.0E-07	5.0E-06	5.0E-06
PCB-189	MJ626	-	-	-	3.0E-03	6.4E-03	1.6E-06	5.0E-05	5.0E-05
PCB-77	MJ626	-	-	-	1.5E-02	1.3E-02	8.5E-06	9.9E-05	9.9E-05
PCB-81	MJ626	-	-	-	3.0E-03	2.3E-03	1.6E-06	1.8E-05	1.8E-05
Aroclor-1254	MJ627	5.6E-02	2.8E-02	U	-	-	-	-	-
Aroclor-1260	MJ627	1.4E-01	1.4E-01		-	-	-	-	-
PCB-105	MJ627	-	-	-	1.2E-01	8.2E-02	3.5E-06	1.1E-05	1.1E-05
PCB-114	MJ627	-	-	-	4.5E-03	1.5E-03	1.3E-07	2.0E-07	2.0E-07
PCB-118	MJ627	-	-	-	2.7E-01	1.6E-01	7.5E-06	2.3E-05	2.3E-05
PCB-123	MJ627	-	-	-	3.0E-03	2.3E-03	8.4E-08	3.2E-07	3.2E-07
PCB-126	MJ627	-	-	-	7.5E-03	6.4E-03	2.1E-07	8.9E-07	8.9E-07
PCB-156	MJ627	-	-	-	6.3E-02	5.5E-02	1.8E-06	7.6E-06	7.6E-06
PCB-157	MJ627	-	-	-	1.2E-02	2.5E-02	3.5E-07	3.4E-06	3.4E-06
PCB-167	MJ627	-	-	-	2.1E-02	4.3E-02	5.8E-07	6.0E-06	6.0E-06
PCB-169	MJ627	-	-	-	3.7E-04	6.4E-04	1.0E-08	8.9E-08	8.9E-08
PCB-189	MJ627	-	-	-	3.0E-03	6.4E-03	8.4E-08	8.9E-07	8.9E-07
PCB-77	MJ627	-	-	-	1.5E-02	1.3E-02	4.3E-07	1.8E-06	1.8E-06
PCB-81	MJ627	-	-	-	3.0E-03	2.3E-03	8.4E-08	3.2E-07	3.2E-07
Aroclor-1254	MJ628	4.3E-01	4.3E-01		-	-	-	-	-
Aroclor-1260	MJ628	5.3E-02	2.7E-02	U	-	-	-	-	-
PCB-105	MJ628	-	-	-	1.2E-01	8.2E-02	5.3E-05	2.2E-06	5.3E-05
PCB-114	MJ628	-	-	-	4.5E-03	1.5E-03	2.0E-06	3.9E-08	2.0E-06
PCB-118	MJ628	-	-	-	2.7E-01	1.6E-01	1.2E-04	4.3E-06	1.2E-04
PCB-123	MJ628	-	-	-	3.0E-03	2.3E-03	1.3E-06	6.1E-08	1.3E-06
PCB-126	MJ628	-	-	-	7.5E-03	6.4E-03	3.2E-06	1.7E-07	3.2E-06
PCB-156	MJ628	-	-	-	6.3E-02	5.5E-02	2.7E-05	1.4E-06	2.7E-05
PCB-157	MJ628	-	-	-	1.2E-02	2.5E-02	5.3E-06	6.5E-07	5.3E-06
PCB-167	MJ628	-	-	-	2.1E-02	4.3E-02	8.9E-06	1.1E-06	8.9E-06
PCB-169	MJ628	-	-	-	3.7E-04	6.4E-04	1.6E-07	1.7E-08	1.6E-07
PCB-189	MJ628	-	-	-	3.0E-03	6.4E-03	1.3E-06	1.7E-07	1.3E-06
PCB-77	MJ628	-	-	-	1.5E-02	1.3E-02	6.6E-06	3.4E-07	6.6E-06
PCB-81	MJ628	-	-	-	3.0E-03	2.3E-03	1.3E-06	6.0E-08	1.3E-06
Aroclor-1254	MJ629	1.6E-01	1.6E-01		-	-	-	-	-
Aroclor-1260	MJ629	8.2E-02	4.1E-02	U	-	-	-	-	-
PCB-105	MJ629	-	-	-	1.2E-01	8.2E-02	2.0E-05	3.4E-06	2.0E-05
PCB-114	MJ629	-	-	-	4.5E-03	1.5E-03	7.3E-07	6.0E-08	7.3E-07
PCB-118	MJ629	-	-	-	2.7E-01	1.6E-01	4.3E-05	6.7E-06	4.3E-05
PCB-123	MJ629	-	-	-	3.0E-03	2.3E-03	4.8E-07	9.5E-08	4.8E-07
PCB-126	MJ629	-	-	-	7.5E-03	6.4E-03	1.2E-06	2.6E-07	1.2E-06
PCB-156	MJ629	-	-	-	6.3E-02	5.5E-02	1.0E-05	2.2E-06	1.0E-05
PCB-157	MJ629	-	-	-	1.2E-02	2.5E-02	2.0E-06	1.0E-06	2.0E-06
PCB-167	MJ629	-	-	-	2.1E-02	4.3E-02	3.3E-06	1.8E-06	3.3E-06
PCB-169	MJ629	-	-	-	3.7E-04	6.4E-04	5.9E-08	2.6E-08	5.9E-08
PCB-189	MJ629	-	-	-	3.0E-03	6.4E-03	4.8E-07	2.6E-07	4.8E-07
PCB-77	MJ629	-	-	-	1.5E-02	1.3E-02	2.5E-06	5.2E-07	2.5E-06
PCB-81	MJ629	-	-	-	3.0E-03	2.3E-03	4.8E-07	9.2E-08	4.8E-07

Aroclor to PCB Congener Extrapolation for Soil/Sediment (0-10 feet bgs)
Sodium Reactor Experiment (SRE) Area

Chemical	EPA ID	Measured Concentrations (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF_{1254}	EF_{1260}	Estimated Concentrations Aroclor-1254 (mg/kg)	Estimated Concentrations Aroclor-1260 (mg/kg)	Estimated Concentrations PCB_{MAX} (mg/kg)
Aroclor-1254	MJ630	5.4E-02	2.7E-02	U	-	-	-	-	-
Aroclor-1260	MJ630	5.4E-02	2.7E-02	U	-	-	-	-	-
PCB-105	MJ630	-	-	-	1.2E-01	8.2E-02	3.3E-06	2.2E-06	3.3E-06
PCB-114	MJ630	-	-	-	4.5E-03	1.5E-03	1.2E-07	3.9E-08	1.2E-07
PCB-118	MJ630	-	-	-	2.7E-01	1.6E-01	7.2E-06	4.4E-06	7.2E-06
PCB-123	MJ630	-	-	-	3.0E-03	2.3E-03	8.1E-08	6.3E-08	8.1E-08
PCB-126	MJ630	-	-	-	7.5E-03	6.4E-03	2.0E-07	1.7E-07	2.0E-07
PCB-156	MJ630	-	-	-	6.3E-02	5.5E-02	1.7E-06	1.5E-06	1.7E-06
PCB-157	MJ630	-	-	-	1.2E-02	2.5E-02	3.3E-07	6.6E-07	6.6E-07
PCB-167	MJ630	-	-	-	2.1E-02	4.3E-02	5.6E-07	1.2E-06	1.2E-06
PCB-169	MJ630	-	-	-	3.7E-04	6.4E-04	9.9E-09	1.7E-08	1.7E-08
PCB-189	MJ630	-	-	-	3.0E-03	6.4E-03	8.1E-08	1.7E-07	1.7E-07
PCB-77	MJ630	-	-	-	1.5E-02	1.3E-02	4.2E-07	3.4E-07	4.2E-07
PCB-81	MJ630	-	-	-	3.0E-03	2.3E-03	8.1E-08	6.1E-08	8.1E-08
Aroclor-1254	MJ631	5.3E-02	2.7E-02	U	-	-	-	-	-
Aroclor-1260	MJ631	5.3E-02	2.7E-02	U	-	-	-	-	-
PCB-105	MJ631	-	-	-	1.2E-01	8.2E-02	3.3E-06	2.2E-06	3.3E-06
PCB-114	MJ631	-	-	-	4.5E-03	1.5E-03	1.2E-07	3.9E-08	1.2E-07
PCB-118	MJ631	-	-	-	2.7E-01	1.6E-01	7.1E-06	4.3E-06	7.1E-06
PCB-123	MJ631	-	-	-	3.0E-03	2.3E-03	7.9E-08	6.1E-08	7.9E-08
PCB-126	MJ631	-	-	-	7.5E-03	6.4E-03	2.0E-07	1.7E-07	2.0E-07
PCB-156	MJ631	-	-	-	6.3E-02	5.5E-02	1.7E-06	1.4E-06	1.7E-06
PCB-157	MJ631	-	-	-	1.2E-02	2.5E-02	3.3E-07	6.5E-07	6.5E-07
PCB-167	MJ631	-	-	-	2.1E-02	4.3E-02	5.5E-07	1.1E-06	1.1E-06
PCB-169	MJ631	-	-	-	3.7E-04	6.4E-04	9.7E-09	1.7E-08	1.7E-08
PCB-189	MJ631	-	-	-	3.0E-03	6.4E-03	7.9E-08	1.7E-07	1.7E-07
PCB-77	MJ631	-	-	-	1.5E-02	1.3E-02	4.1E-07	3.4E-07	4.1E-07
PCB-81	MJ631	-	-	-	3.0E-03	2.3E-03	7.9E-08	6.0E-08	7.9E-08
Aroclor-1254	MJ635	1.1E-01	1.1E-01	J	-	-	-	-	-
Aroclor-1260	MJ635	1.8E-01	1.8E-01	J	-	-	-	-	-
PCB-105	MJ635	-	-	-	1.2E-01	8.2E-02	1.4E-05	1.5E-05	1.5E-05
PCB-114	MJ635	-	-	-	4.5E-03	1.5E-03	5.0E-07	2.6E-07	5.0E-07
PCB-118	MJ635	-	-	-	2.7E-01	1.6E-01	2.9E-05	2.9E-05	2.9E-05
PCB-123	MJ635	-	-	-	3.0E-03	2.3E-03	3.3E-07	4.2E-07	4.2E-07
PCB-126	MJ635	-	-	-	7.5E-03	6.4E-03	8.3E-07	1.1E-06	1.1E-06
PCB-156	MJ635	-	-	-	6.3E-02	5.5E-02	6.9E-06	9.8E-06	9.8E-06
PCB-157	MJ635	-	-	-	1.2E-02	2.5E-02	1.4E-06	4.4E-06	4.4E-06
PCB-167	MJ635	-	-	-	2.1E-02	4.3E-02	2.3E-06	7.7E-06	7.7E-06
PCB-169	MJ635	-	-	-	3.7E-04	6.4E-04	4.0E-08	1.1E-07	1.1E-07
PCB-189	MJ635	-	-	-	3.0E-03	6.4E-03	3.3E-07	1.1E-06	1.1E-06
PCB-77	MJ635	-	-	-	1.5E-02	1.3E-02	1.7E-06	2.3E-06	2.3E-06
PCB-81	MJ635	-	-	-	3.0E-03	2.3E-03	3.3E-07	4.1E-07	4.1E-07
Aroclor-1254	MJ644	9.1E-02	4.6E-02	UJ	-	-	-	-	-
Aroclor-1260	MJ644	9.1E-02	4.6E-02	UJ	-	-	-	-	-
PCB-105	MJ644	-	-	-	1.2E-01	8.2E-02	5.6E-06	3.7E-06	5.6E-06
PCB-114	MJ644	-	-	-	4.5E-03	1.5E-03	2.1E-07	6.6E-08	2.1E-07
PCB-118	MJ644	-	-	-	2.7E-01	1.6E-01	1.2E-05	7.4E-06	1.2E-05
PCB-123	MJ644	-	-	-	3.0E-03	2.3E-03	1.4E-07	1.1E-07	1.4E-07
PCB-126	MJ644	-	-	-	7.5E-03	6.4E-03	3.4E-07	2.9E-07	3.4E-07
PCB-156	MJ644	-	-	-	6.3E-02	5.5E-02	2.9E-06	2.5E-06	2.9E-06
PCB-157	MJ644	-	-	-	1.2E-02	2.5E-02	5.6E-07	1.1E-06	1.1E-06
PCB-167	MJ644	-	-	-	2.1E-02	4.3E-02	9.4E-07	1.9E-06	1.9E-06
PCB-169	MJ644	-	-	-	3.7E-04	6.4E-04	1.7E-08	2.9E-08	2.9E-08
PCB-189	MJ644	-	-	-	3.0E-03	6.4E-03	1.4E-07	2.9E-07	2.9E-07
PCB-77	MJ644	-	-	-	1.5E-02	1.3E-02	7.0E-07	5.8E-07	7.0E-07
PCB-81	MJ644	-	-	-	3.0E-03	2.3E-03	1.4E-07	1.0E-07	1.4E-07

Aroclor to PCB Congener Extrapolation for Soil/Sediment (0-10 feet bgs)
Sodium Reactor Experiment (SRE) Area

Chemical	EPA ID	Measured Concentrations (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF_{1254}	EF_{1260}	Estimated Concentrations Aroclor-1254 (mg/kg)	Estimated Concentrations Aroclor-1260 (mg/kg)	Estimated Concentrations PCB_{MAX} (mg/kg)
Aroclor-1254	MJ652	5.4E-02	2.7E-02	U	-	-	-	-	-
Aroclor-1260	MJ652	5.4E-02	2.7E-02	U	-	-	-	-	-
PCB-105	MJ652	-	-	-	1.2E-01	8.2E-02	3.3E-06	2.2E-06	3.3E-06
PCB-114	MJ652	-	-	-	4.5E-03	1.5E-03	1.2E-07	3.9E-08	1.2E-07
PCB-118	MJ652	-	-	-	2.7E-01	1.6E-01	7.2E-06	4.4E-06	7.2E-06
PCB-123	MJ652	-	-	-	3.0E-03	2.3E-03	8.1E-08	6.3E-08	8.1E-08
PCB-126	MJ652	-	-	-	7.5E-03	6.4E-03	2.0E-07	1.7E-07	2.0E-07
PCB-156	MJ652	-	-	-	6.3E-02	5.5E-02	1.7E-06	1.5E-06	1.7E-06
PCB-157	MJ652	-	-	-	1.2E-02	2.5E-02	3.3E-07	6.6E-07	6.6E-07
PCB-167	MJ652	-	-	-	2.1E-02	4.3E-02	5.6E-07	1.2E-06	1.2E-06
PCB-169	MJ652	-	-	-	3.7E-04	6.4E-04	9.9E-09	1.7E-08	1.7E-08
PCB-189	MJ652	-	-	-	3.0E-03	6.4E-03	8.1E-08	1.7E-07	1.7E-07
PCB-77	MJ652	-	-	-	1.5E-02	1.3E-02	4.2E-07	3.4E-07	4.2E-07
PCB-81	MJ652	-	-	-	3.0E-03	2.3E-03	8.1E-08	6.1E-08	8.1E-08
Aroclor-1254	MJ653	5.3E-02	2.7E-02	U	-	-	-	-	-
Aroclor-1260	MJ653	5.3E-02	2.7E-02	U	-	-	-	-	-
PCB-105	MJ653	-	-	-	1.2E-01	8.2E-02	3.3E-06	2.2E-06	3.3E-06
PCB-114	MJ653	-	-	-	4.5E-03	1.5E-03	1.2E-07	3.9E-08	1.2E-07
PCB-118	MJ653	-	-	-	2.7E-01	1.6E-01	7.1E-06	4.3E-06	7.1E-06
PCB-123	MJ653	-	-	-	3.0E-03	2.3E-03	7.9E-08	6.1E-08	7.9E-08
PCB-126	MJ653	-	-	-	7.5E-03	6.4E-03	2.0E-07	1.7E-07	2.0E-07
PCB-156	MJ653	-	-	-	6.3E-02	5.5E-02	1.7E-06	1.4E-06	1.7E-06
PCB-157	MJ653	-	-	-	1.2E-02	2.5E-02	3.3E-07	6.5E-07	6.5E-07
PCB-167	MJ653	-	-	-	2.1E-02	4.3E-02	5.5E-07	1.1E-06	1.1E-06
PCB-169	MJ653	-	-	-	3.7E-04	6.4E-04	9.7E-09	1.7E-08	1.7E-08
PCB-189	MJ653	-	-	-	3.0E-03	6.4E-03	7.9E-08	1.7E-07	1.7E-07
PCB-77	MJ653	-	-	-	1.5E-02	1.3E-02	4.1E-07	3.4E-07	4.1E-07
PCB-81	MJ653	-	-	-	3.0E-03	2.3E-03	7.9E-08	6.0E-08	7.9E-08
Aroclor-1254	MJ664	8.2E-02	4.1E-02	U	-	-	-	-	-
Aroclor-1260	MJ664	8.2E-02	4.1E-02	U	-	-	-	-	-
PCB-105	MJ664	-	-	-	1.2E-01	8.2E-02	5.1E-06	3.4E-06	5.1E-06
PCB-114	MJ664	-	-	-	4.5E-03	1.5E-03	1.9E-07	6.0E-08	1.9E-07
PCB-118	MJ664	-	-	-	2.7E-01	1.6E-01	1.1E-05	6.7E-06	1.1E-05
PCB-123	MJ664	-	-	-	3.0E-03	2.3E-03	1.2E-07	9.5E-08	1.2E-07
PCB-126	MJ664	-	-	-	7.5E-03	6.4E-03	3.1E-07	2.6E-07	3.1E-07
PCB-156	MJ664	-	-	-	6.3E-02	5.5E-02	2.6E-06	2.2E-06	2.6E-06
PCB-157	MJ664	-	-	-	1.2E-02	2.5E-02	5.1E-07	1.0E-06	1.0E-06
PCB-167	MJ664	-	-	-	2.1E-02	4.3E-02	8.5E-07	1.8E-06	1.8E-06
PCB-169	MJ664	-	-	-	3.7E-04	6.4E-04	1.5E-08	2.6E-08	2.6E-08
PCB-189	MJ664	-	-	-	3.0E-03	6.4E-03	1.2E-07	2.6E-07	2.6E-07
PCB-77	MJ664	-	-	-	1.5E-02	1.3E-02	6.3E-07	5.2E-07	6.3E-07
PCB-81	MJ664	-	-	-	3.0E-03	2.3E-03	1.2E-07	9.2E-08	1.2E-07
Aroclor-1254	MJ765	1.8E-01	9.0E-02	U	-	-	-	-	-
Aroclor-1260	MJ765	1.8E-01	9.0E-02	U	-	-	-	-	-
PCB-105	MJ765	-	-	-	1.2E-01	8.2E-02	1.1E-05	7.4E-06	1.1E-05
PCB-114	MJ765	-	-	-	4.5E-03	1.5E-03	4.1E-07	1.3E-07	4.1E-07
PCB-118	MJ765	-	-	-	2.7E-01	1.6E-01	2.4E-05	1.5E-05	2.4E-05
PCB-123	MJ765	-	-	-	3.0E-03	2.3E-03	2.7E-07	2.1E-07	2.7E-07
PCB-126	MJ765	-	-	-	7.5E-03	6.4E-03	6.8E-07	5.7E-07	6.8E-07
PCB-156	MJ765	-	-	-	6.3E-02	5.5E-02	5.7E-06	4.9E-06	5.7E-06
PCB-157	MJ765	-	-	-	1.2E-02	2.5E-02	1.1E-06	2.2E-06	2.2E-06
PCB-167	MJ765	-	-	-	2.1E-02	4.3E-02	1.9E-06	3.8E-06	3.8E-06
PCB-169	MJ765	-	-	-	3.7E-04	6.4E-04	3.3E-08	5.7E-08	5.7E-08
PCB-189	MJ765	-	-	-	3.0E-03	6.4E-03	2.7E-07	5.7E-07	5.7E-07
PCB-77	MJ765	-	-	-	1.5E-02	1.3E-02	1.4E-06	1.1E-06	1.4E-06
PCB-81	MJ765	-	-	-	3.0E-03	2.3E-03	2.7E-07	2.0E-07	2.7E-07

Aroclor to PCB Congener Extrapolation for Soil/Sediment (0-10 feet bgs)
Sodium Reactor Experiment (SRE) Area

Chemical	EPA ID	Measured Concentrations (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF_{1254}	EF_{1260}	Estimated Concentrations Aroclor-1254 (mg/kg)	Estimated Concentrations Aroclor-1260 (mg/kg)	Estimated Concentrations PCB_{MAX} (mg/kg)
Aroclor-1254	MJ768	8.5E-02	4.3E-02	U	-	-	-	-	-
Aroclor-1260	MJ768	8.5E-02	4.3E-02	U	-	-	-	-	-
PCB-105	MJ768	-	-	-	1.2E-01	8.2E-02	5.3E-06	3.5E-06	5.3E-06
PCB-114	MJ768	-	-	-	4.5E-03	1.5E-03	1.9E-07	6.2E-08	1.9E-07
PCB-118	MJ768	-	-	-	2.7E-01	1.6E-01	1.1E-05	7.0E-06	1.1E-05
PCB-123	MJ768	-	-	-	3.0E-03	2.3E-03	1.3E-07	9.9E-08	1.3E-07
PCB-126	MJ768	-	-	-	7.5E-03	6.4E-03	3.2E-07	2.7E-07	3.2E-07
PCB-156	MJ768	-	-	-	6.3E-02	5.5E-02	2.7E-06	2.3E-06	2.7E-06
PCB-157	MJ768	-	-	-	1.2E-02	2.5E-02	5.3E-07	1.0E-06	1.0E-06
PCB-167	MJ768	-	-	-	2.1E-02	4.3E-02	8.8E-07	1.8E-06	1.8E-06
PCB-169	MJ768	-	-	-	3.7E-04	6.4E-04	1.6E-08	2.7E-08	2.7E-08
PCB-189	MJ768	-	-	-	3.0E-03	6.4E-03	1.3E-07	2.7E-07	2.7E-07
PCB-77	MJ768	-	-	-	1.5E-02	1.3E-02	6.6E-07	5.4E-07	6.6E-07
PCB-81	MJ768	-	-	-	3.0E-03	2.3E-03	1.3E-07	9.6E-08	1.3E-07
Aroclor-1254	MJ776	8.8E-02	4.4E-02	U	-	-	-	-	-
Aroclor-1260	MJ776	8.8E-02	4.4E-02	U	-	-	-	-	-
PCB-105	MJ776	-	-	-	1.2E-01	8.2E-02	5.4E-06	3.6E-06	5.4E-06
PCB-114	MJ776	-	-	-	4.5E-03	1.5E-03	2.0E-07	6.4E-08	2.0E-07
PCB-118	MJ776	-	-	-	2.7E-01	1.6E-01	1.2E-05	7.2E-06	1.2E-05
PCB-123	MJ776	-	-	-	3.0E-03	2.3E-03	1.3E-07	1.0E-07	1.3E-07
PCB-126	MJ776	-	-	-	7.5E-03	6.4E-03	3.3E-07	2.8E-07	3.3E-07
PCB-156	MJ776	-	-	-	6.3E-02	5.5E-02	2.8E-06	2.4E-06	2.8E-06
PCB-157	MJ776	-	-	-	1.2E-02	2.5E-02	5.4E-07	1.1E-06	1.1E-06
PCB-167	MJ776	-	-	-	2.1E-02	4.3E-02	9.1E-07	1.9E-06	1.9E-06
PCB-169	MJ776	-	-	-	3.7E-04	6.4E-04	1.6E-08	2.8E-08	2.8E-08
PCB-189	MJ776	-	-	-	3.0E-03	6.4E-03	1.3E-07	2.8E-07	2.8E-07
PCB-77	MJ776	-	-	-	1.5E-02	1.3E-02	6.8E-07	5.6E-07	6.8E-07
PCB-81	MJ776	-	-	-	3.0E-03	2.3E-03	1.3E-07	9.9E-08	1.3E-07
Aroclor-1254	MJ777	8.8E-02	4.4E-02	U	-	-	-	-	-
Aroclor-1260	MJ777	8.8E-02	4.4E-02	U	-	-	-	-	-
PCB-105	MJ777	-	-	-	1.2E-01	8.2E-02	5.4E-06	3.6E-06	5.4E-06
PCB-114	MJ777	-	-	-	4.5E-03	1.5E-03	2.0E-07	6.4E-08	2.0E-07
PCB-118	MJ777	-	-	-	2.7E-01	1.6E-01	1.2E-05	7.2E-06	1.2E-05
PCB-123	MJ777	-	-	-	3.0E-03	2.3E-03	1.3E-07	1.0E-07	1.3E-07
PCB-126	MJ777	-	-	-	7.5E-03	6.4E-03	3.3E-07	2.8E-07	3.3E-07
PCB-156	MJ777	-	-	-	6.3E-02	5.5E-02	2.8E-06	2.4E-06	2.8E-06
PCB-157	MJ777	-	-	-	1.2E-02	2.5E-02	5.4E-07	1.1E-06	1.1E-06
PCB-167	MJ777	-	-	-	2.1E-02	4.3E-02	9.1E-07	1.9E-06	1.9E-06
PCB-169	MJ777	-	-	-	3.7E-04	6.4E-04	1.6E-08	2.8E-08	2.8E-08
PCB-189	MJ777	-	-	-	3.0E-03	6.4E-03	1.3E-07	2.8E-07	2.8E-07
PCB-77	MJ777	-	-	-	1.5E-02	1.3E-02	6.8E-07	5.6E-07	6.8E-07
PCB-81	MJ777	-	-	-	3.0E-03	2.3E-03	1.3E-07	9.9E-08	1.3E-07
Aroclor-1254	RJ627	3.5E-02	1.8E-02	U	-	-	-	-	-
Aroclor-1260	RJ627	3.5E-02	1.8E-02	U	-	-	-	-	-
PCB-105	RJ627	-	-	-	1.2E-01	8.2E-02	2.2E-06	1.4E-06	2.2E-06
PCB-114	RJ627	-	-	-	4.5E-03	1.5E-03	7.9E-08	2.5E-08	7.9E-08
PCB-118	RJ627	-	-	-	2.7E-01	1.6E-01	4.7E-06	2.9E-06	4.7E-06
PCB-123	RJ627	-	-	-	3.0E-03	2.3E-03	5.2E-08	4.1E-08	5.2E-08
PCB-126	RJ627	-	-	-	7.5E-03	6.4E-03	1.3E-07	1.1E-07	1.3E-07
PCB-156	RJ627	-	-	-	6.3E-02	5.5E-02	1.1E-06	9.5E-07	1.1E-06
PCB-157	RJ627	-	-	-	1.2E-02	2.5E-02	2.2E-07	4.3E-07	4.3E-07
PCB-167	RJ627	-	-	-	2.1E-02	4.3E-02	3.6E-07	7.5E-07	7.5E-07
PCB-169	RJ627	-	-	-	3.7E-04	6.4E-04	6.4E-09	1.1E-08	1.1E-08
PCB-189	RJ627	-	-	-	3.0E-03	6.4E-03	5.2E-08	1.1E-07	1.1E-07
PCB-77	RJ627	-	-	-	1.5E-02	1.3E-02	2.7E-07	2.2E-07	2.7E-07
PCB-81	RJ627	-	-	-	3.0E-03	2.3E-03	5.2E-08	3.9E-08	5.2E-08

Aroclor to PCB Congener Extrapolation for Soil/Sediment (0-10 feet bgs)
Sodium Reactor Experiment (SRE) Area

Chemical	EPA ID	Measured Concentrations (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF_{1254}	EF_{1260}	Estimated Concentrations Aroclor-1254 (mg/kg)	Estimated Concentrations Aroclor-1260 (mg/kg)	Estimated Concentrations PCB_{MAX} (mg/kg)
Aroclor-1254	RJ786	6.0E-02	6.0E-02	J	-	-	-	-	-
Aroclor-1260	RJ786	3.6E-02	1.8E-02	UJ	-	-	-	-	-
PCB-105	RJ786	-	-	-	1.2E-01	8.2E-02	7.4E-06	1.5E-06	7.4E-06
PCB-114	RJ786	-	-	-	4.5E-03	1.5E-03	2.7E-07	2.6E-08	2.7E-07
PCB-118	RJ786	-	-	-	2.7E-01	1.6E-01	1.6E-05	2.9E-06	1.6E-05
PCB-123	RJ786	-	-	-	3.0E-03	2.3E-03	1.8E-07	4.2E-08	1.8E-07
PCB-126	RJ786	-	-	-	7.5E-03	6.4E-03	4.5E-07	1.1E-07	4.5E-07
PCB-156	RJ786	-	-	-	6.3E-02	5.5E-02	3.8E-06	9.8E-07	3.8E-06
PCB-157	RJ786	-	-	-	1.2E-02	2.5E-02	7.4E-07	4.4E-07	7.4E-07
PCB-167	RJ786	-	-	-	2.1E-02	4.3E-02	1.2E-06	7.7E-07	1.2E-06
PCB-169	RJ786	-	-	-	3.7E-04	6.4E-04	2.2E-08	1.1E-08	2.2E-08
PCB-189	RJ786	-	-	-	3.0E-03	6.4E-03	1.8E-07	1.1E-07	1.8E-07
PCB-77	RJ786	-	-	-	1.5E-02	1.3E-02	9.3E-07	2.3E-07	9.3E-07
PCB-81	RJ786	-	-	-	3.0E-03	2.3E-03	1.8E-07	4.1E-08	1.8E-07

Notes:
PCBs - polychlorinated biphenyls
EF- Extrapolation Factor (ng congener/kg soil)/(µg Aroclor/kg soil)
"-" not applicable
mg/kg - milligrams per kilogram
ug/kg - micrograms per kilogram
ng/kg - nanograms per kilogram
bgs- below ground surface
PCB_{MAX} = the maximum of the extrapolated 1254 and 1260 concentrations

TPH to Petroleum Constituent Extrapolation for Soil/Sediment (0-2 feet bgs)
Sodium Reactor Experiment (SRE) Area

Chemical	EPA ID	Measured Concentration[a] (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
C08-C11 (Gasoline Range)	MJ630	5.40E+00	2.7E+00	U		-	-
C11-C14 (Kerosene Range)	MJ630	5.40E+00	2.7E+00	U		-	-
C14-C20 (Diesel Range)	MJ630	5.40E+00	2.7E+00	U		-	-
C20-C30 (Lubricant Oil Range)	MJ630	5.40E+00	2.7E+00	U		-	-
C11-C30	MJ630		8.1E+00			-	-
Benzene	MJ630	-	-	-	1.2E-04	-	-
Ethylbenzene	MJ630	-	-	-	1.2E-04	-	-
Toluene	MJ630	-	-	-	1.2E-04	-	-
m,p-Xylene	MJ630	-	-	-	3.6E-04	-	-
o-Xylene	MJ630	-	-	-	8.0E-05	-	-
Xylene (total)	MJ630	-	-	-	4.4E-04	-	-
2-Methylnaphthalene	MJ630	-	-	-	2.8E-02	-	-
Acenaphthene	MJ630	-	-	-	5.7E-04	4.6E-03	4.6E-03
Acenaphthylene	MJ630	-	-	-	7.0E-05	5.7E-04	5.7E-04
Anthracene	MJ630	-	-	-	3.7E-04	3.0E-03	3.0E-03
Benzo(a)anthracene	MJ630	-	-	-	2.7E-05	2.2E-04	2.2E-04
Benzo(a)pyrene	MJ630	-	-	-	2.7E-05	2.2E-04	2.2E-04
Benzo(b)fluoranthene	MJ630	-	-	-	4.3E-05	3.5E-04	3.5E-04
Benzo(e)pyrene	MJ630	-	-	-	2.1E-04	1.7E-03	1.7E-03
Benzo(g,h,i)perylene	MJ630	-	-	-	2.2E-04	1.8E-03	1.8E-03
Benzo(k)fluoranthene	MJ630	-	-	-	2.1E-05	1.7E-04	1.7E-04
Chrysene	MJ630	-	-	-	5.9E-05	4.8E-04	4.8E-04
Dibenz(a,h)anthracene	MJ630	-	-	-	1.1E-05	9.0E-05	9.0E-05
Fluoranthene	MJ630	-	-	-	7.5E-05	6.1E-04	6.1E-04
Fluorene	MJ630	-	-	-	5.7E-04	4.6E-03	4.6E-03
Indeno(1,2,3-cd)pyrene	MJ630	-	-	-	2.4E-05	1.9E-04	1.9E-04
Naphthalene	MJ630	-	-	-	6.9E-03	-	-
Perylene	MJ630	-	-	-	1.2E-04	9.6E-04	9.6E-04
Phenanthrene	MJ630	-	-	-	1.5E-03	1.2E-02	1.2E-02
Pyrene	MJ630	-	-	-	1.4E-04	1.1E-03	1.1E-03
C08-C11 (Gasoline Range)	MJ631	5.30E+00	2.7E+00	U		-	-
C11-C14 (Kerosene Range)	MJ631	5.30E+00	2.7E+00	U		-	-
C14-C20 (Diesel Range)	MJ631	5.30E+00	2.7E+00	U		-	-
C20-C30 (Lubricant Oil Range)	MJ631	1.10E+01	1.1E+01			-	-
C11-C30	MJ631		1.6E+01			-	-
Benzene	MJ631	-	-	-	1.2E-04	-	-
Ethylbenzene	MJ631	-	-	-	1.2E-04	-	-
Toluene	MJ631	-	-	-	1.2E-04	-	-
m,p-Xylene	MJ631	-	-	-	3.6E-04	-	-
o-Xylene	MJ631	-	-	-	8.0E-05	-	-
Xylene (total)	MJ631	-	-	-	4.4E-04	-	-
2-Methylnaphthalene	MJ631	-	-	-	2.8E-02	-	-
Acenaphthene	MJ631	-	-	-	5.7E-04	9.3E-03	9.3E-03
Acenaphthylene	MJ631	-	-	-	7.0E-05	1.1E-03	1.1E-03
Anthracene	MJ631	-	-	-	3.7E-04	6.1E-03	6.1E-03
Benzo(a)anthracene	MJ631	-	-	-	2.7E-05	4.4E-04	4.4E-04
Benzo(a)pyrene	MJ631	-	-	-	2.7E-05	4.4E-04	4.4E-04
Benzo(b)fluoranthene	MJ631	-	-	-	4.3E-05	7.1E-04	7.1E-04
Benzo(e)pyrene	MJ631	-	-	-	2.1E-04	3.4E-03	3.4E-03
Benzo(g,h,i)perylene	MJ631	-	-	-	2.2E-04	3.6E-03	3.6E-03
Benzo(k)fluoranthene	MJ631	-	-	-	2.1E-05	3.3E-04	3.3E-04
Chrysene	MJ631	-	-	-	5.9E-05	9.6E-04	9.6E-04
Dibenz(a,h)anthracene	MJ631	-	-	-	1.1E-05	1.8E-04	1.8E-04
Fluoranthene	MJ631	-	-	-	7.5E-05	1.2E-03	1.2E-03

TPH to Petroleum Constituent Extrapolation for Soil/Sediment (0-2 feet bgs)
Sodium Reactor Experiment (SRE) Area

Chemical	EPA ID	Measured Concentration[a] (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Fluorene	MJ631	-	-	-	5.7E-04	9.3E-03	9.3E-03
Indeno(1,2,3-cd)pyrene	MJ631	-	-	-	2.4E-05	3.9E-04	3.9E-04
Naphthalene	MJ631	-	-	-	6.9E-03	-	-
Perylene	MJ631	-	-	-	1.2E-04	1.9E-03	1.9E-03
Phenanthrene	MJ631	-	-	-	1.5E-03	2.5E-02	2.5E-02
Pyrene	MJ631	-	-	-	1.4E-04	2.2E-03	2.2E-03
C08-C11 (Gasoline Range)	MJ661	1.20E+01	6.0E+00	U		-	-
C11-C14 (Kerosene Range)	MJ661	1.20E+01	6.0E+00	U		-	-
C14-C20 (Diesel Range)	MJ661	1.20E+01	6.0E+00	U		-	-
C20-C30 (Lubricant Oil Range)	MJ661	1.20E+01	6.0E+00	U		-	-
C11-C30	MJ661		1.8E+01			-	-
Benzene	MJ661	-	-	-	1.2E-04	-	-
Ethylbenzene	MJ661	-	-	-	1.2E-04	-	-
Toluene	MJ661	-	-	-	1.2E-04	-	-
m,p-Xylene	MJ661	-	-	-	3.6E-04	-	-
o-Xylene	MJ661	-	-	-	8.0E-05	-	-
Xylene (total)	MJ661	-	-	-	4.4E-04	-	-
2-Methylnaphthalene	MJ661	-	-	-	2.8E-02	-	-
Acenaphthene	MJ661	-	-	-	5.7E-04	1.0E-02	1.0E-02
Acenaphthylene	MJ661	-	-	-	7.0E-05	1.3E-03	1.3E-03
Anthracene	MJ661	-	-	-	3.7E-04	6.7E-03	6.7E-03
Benzo(a)anthracene	MJ661	-	-	-	2.7E-05	4.9E-04	4.9E-04
Benzo(a)pyrene	MJ661	-	-	-	2.7E-05	4.9E-04	4.9E-04
Benzo(b)fluoranthene	MJ661	-	-	-	4.3E-05	7.8E-04	7.8E-04
Benzo(e)pyrene	MJ661	-	-	-	2.1E-04	3.7E-03	3.7E-03
Benzo(g,h,i)perylene	MJ661	-	-	-	2.2E-04	4.0E-03	4.0E-03
Benzo(k)fluoranthene	MJ661	-	-	-	2.1E-05	3.7E-04	3.7E-04
Chrysene	MJ661	-	-	-	5.9E-05	1.1E-03	1.1E-03
Dibenz(a,h)anthracene	MJ661	-	-	-	1.1E-05	2.0E-04	2.0E-04
Fluoranthene	MJ661	-	-	-	7.5E-05	1.3E-03	1.3E-03
Fluorene	MJ661	-	-	-	5.7E-04	1.0E-02	1.0E-02
Indeno(1,2,3-cd)pyrene	MJ661	-	-	-	2.4E-05	4.3E-04	4.3E-04
Naphthalene	MJ661	-	-	-	6.9E-03	-	-
Perylene	MJ661	-	-	-	1.2E-04	2.1E-03	2.1E-03
Phenanthrene	MJ661	-	-	-	1.5E-03	2.8E-02	2.8E-02
Pyrene	MJ661	-	-	-	1.4E-04	2.5E-03	2.5E-03
C08-C11 (Gasoline Range)	MJ662	1.10E+01	5.5E+00	U		-	-
C11-C14 (Kerosene Range)	MJ662	1.10E+01	5.5E+00	U		-	-
C14-C20 (Diesel Range)	MJ662	1.10E+01	5.5E+00	U		-	-
C20-C30 (Lubricant Oil Range)	MJ662	1.10E+01	5.5E+00	U		-	-
C11-C30	MJ662		1.7E+01			-	-
Benzene	MJ662	-	-	-	1.2E-04	-	-
Ethylbenzene	MJ662	-	-	-	1.2E-04	-	-
Toluene	MJ662	-	-	-	1.2E-04	-	-
m,p-Xylene	MJ662	-	-	-	3.6E-04	-	-
o-Xylene	MJ662	-	-	-	8.0E-05	-	-
Xylene (total)	MJ662	-	-	-	4.4E-04	-	-
2-Methylnaphthalene	MJ662	-	-	-	2.8E-02	-	-
Acenaphthene	MJ662	-	-	-	5.7E-04	9.5E-03	9.5E-03
Acenaphthylene	MJ662	-	-	-	7.0E-05	1.2E-03	1.2E-03
Anthracene	MJ662	-	-	-	3.7E-04	6.2E-03	6.2E-03
Benzo(a)anthracene	MJ662	-	-	-	2.7E-05	4.4E-04	4.4E-04
Benzo(a)pyrene	MJ662	-	-	-	2.7E-05	4.5E-04	4.5E-04
Benzo(b)fluoranthene	MJ662	-	-	-	4.3E-05	7.1E-04	7.1E-04
Benzo(e)pyrene	MJ662	-	-	-	2.1E-04	3.4E-03	3.4E-03

TPH to Petroleum Constituent Extrapolation for Soil/Sediment (0-2 feet bgs)
Sodium Reactor Experiment (SRE) Area

Chemical	EPA ID	Measured Concentration[a] (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Benzo(g,h,i)perylene	MJ662	-	-	-	2.2E-04	3.6E-03	3.6E-03
Benzo(k)fluoranthene	MJ662	-	-	-	2.1E-05	3.4E-04	3.4E-04
Chrysene	MJ662	-	-	-	5.9E-05	9.7E-04	9.7E-04
Dibenz(a,h)anthracene	MJ662	-	-	-	1.1E-05	1.8E-04	1.8E-04
Fluoranthene	MJ662	-	-	-	7.5E-05	1.2E-03	1.2E-03
Fluorene	MJ662	-	-	-	5.7E-04	9.4E-03	9.4E-03
Indeno(1,2,3-cd)pyrene	MJ662	-	-	-	2.4E-05	4.0E-04	4.0E-04
Naphthalene	MJ662	-	-	-	6.9E-03	-	-
Perylene	MJ662	-	-	-	1.2E-04	1.9E-03	1.9E-03
Phenanthrene	MJ662	-	-	-	1.5E-03	2.5E-02	2.5E-02
Pyrene	MJ662	-	-	-	1.4E-04	2.2E-03	2.2E-03
C08-C11 (Gasoline Range)	MJ663	1.10E+01	5.5E+00	U		-	-
C11-C14 (Kerosene Range)	MJ663	1.10E+01	5.5E+00	U		-	-
C14-C20 (Diesel Range)	MJ663	1.10E+01	5.5E+00	U		-	-
C20-C30 (Lubricant Oil Range)	MJ663	5.00E+00	5.0E+00	J		-	-
C11-C30	MJ663		1.6E+01			-	-
Benzene	MJ663	-	-	-	1.2E-04	-	-
Ethylbenzene	MJ663	-	-	-	1.2E-04	-	-
Toluene	MJ663	-	-	-	1.2E-04	-	-
m,p-Xylene	MJ663	-	-	-	3.6E-04	-	-
o-Xylene	MJ663	-	-	-	8.0E-05	-	-
Xylene (total)	MJ663	-	-	-	4.4E-04	-	-
2-Methylnaphthalene	MJ663	-	-	-	2.8E-02	-	-
Acenaphthene	MJ663	-	-	-	5.7E-04	9.2E-03	9.2E-03
Acenaphthylene	MJ663	-	-	-	7.0E-05	1.1E-03	1.1E-03
Anthracene	MJ663	-	-	-	3.7E-04	6.0E-03	6.0E-03
Benzo(a)anthracene	MJ663	-	-	-	2.7E-05	4.3E-04	4.3E-04
Benzo(a)pyrene	MJ663	-	-	-	2.7E-05	4.4E-04	4.4E-04
Benzo(b)fluoranthene	MJ663	-	-	-	4.3E-05	6.9E-04	6.9E-04
Benzo(e)pyrene	MJ663	-	-	-	2.1E-04	3.3E-03	3.3E-03
Benzo(g,h,i)perylene	MJ663	-	-	-	2.2E-04	3.5E-03	3.5E-03
Benzo(k)fluoranthene	MJ663	-	-	-	2.1E-05	3.3E-04	3.3E-04
Chrysene	MJ663	-	-	-	5.9E-05	9.4E-04	9.4E-04
Dibenz(a,h)anthracene	MJ663	-	-	-	1.1E-05	1.8E-04	1.8E-04
Fluoranthene	MJ663	-	-	-	7.5E-05	1.2E-03	1.2E-03
Fluorene	MJ663	-	-	-	5.7E-04	9.1E-03	9.1E-03
Indeno(1,2,3-cd)pyrene	MJ663	-	-	-	2.4E-05	3.8E-04	3.8E-04
Naphthalene	MJ663	-	-	-	6.9E-03	-	-
Perylene	MJ663	-	-	-	1.2E-04	1.9E-03	1.9E-03
Phenanthrene	MJ663	-	-	-	1.5E-03	2.5E-02	2.5E-02
Pyrene	MJ663	-	-	-	1.4E-04	2.2E-03	2.2E-03
C08-C11 (Gasoline Range)	MJ664	1.10E+01	5.5E+00	U		-	-
C11-C14 (Kerosene Range)	MJ664	1.10E+01	5.5E+00	U		-	-
C14-C20 (Diesel Range)	MJ664	1.10E+01	5.5E+00	U		-	-
C20-C30 (Lubricant Oil Range)	MJ664	6.30E+00	6.3E+00	J		-	-
C11-C30	MJ664		1.7E+01			-	-
Benzene	MJ664	-	-	-	1.2E-04	-	-
Ethylbenzene	MJ664	-	-	-	1.2E-04	-	-
Toluene	MJ664	-	-	-	1.2E-04	-	-
m,p-Xylene	MJ664	-	-	-	3.6E-04	-	-
o-Xylene	MJ664	-	-	-	8.0E-05	-	-
Xylene (total)	MJ664	-	-	-	4.4E-04	-	-
2-Methylnaphthalene	MJ664	-	-	-	2.8E-02	-	-
Acenaphthene	MJ664	-	-	-	5.7E-04	9.9E-03	9.9E-03
Acenaphthylene	MJ664	-	-	-	7.0E-05	1.2E-03	1.2E-03

TPH to Petroleum Constituent Extrapolation for Soil/Sediment (0-2 feet bgs)
Sodium Reactor Experiment (SRE) Area

Chemical	EPA ID	Measured Concentration[a] (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Anthracene	MJ664	-	-	-	3.7E-04	6.5E-03	6.5E-03
Benzo(a)anthracene	MJ664	-	-	-	2.7E-05	4.7E-04	4.7E-04
Benzo(a)pyrene	MJ664	-	-	-	2.7E-05	4.7E-04	4.7E-04
Benzo(b)fluoranthene	MJ664	-	-	-	4.3E-05	7.5E-04	7.5E-04
Benzo(e)pyrene	MJ664	-	-	-	2.1E-04	3.6E-03	3.6E-03
Benzo(g,h,i)perylene	MJ664	-	-	-	2.2E-04	3.8E-03	3.8E-03
Benzo(k)fluoranthene	MJ664	-	-	-	2.1E-05	3.5E-04	3.5E-04
Chrysene	MJ664	-	-	-	5.9E-05	1.0E-03	1.0E-03
Dibenz(a,h)anthracene	MJ664	-	-	-	1.1E-05	1.9E-04	1.9E-04
Fluoranthene	MJ664	-	-	-	7.5E-05	1.3E-03	1.3E-03
Fluorene	MJ664	-	-	-	5.7E-04	9.8E-03	9.8E-03
Indeno(1,2,3-cd)pyrene	MJ664	-	-	-	2.4E-05	4.2E-04	4.2E-04
Naphthalene	MJ664	-	-	-	6.9E-03	-	-
Perylene	MJ664	-	-	-	1.2E-04	2.0E-03	2.0E-03
Phenanthrene	MJ664	-	-	-	1.5E-03	2.7E-02	2.7E-02
Pyrene	MJ664	-	-	-	1.4E-04	2.4E-03	2.4E-03
C08-C11 (Gasoline Range)	RD977	1.10E+01	5.5E+00	UJ		-	-
C11-C14 (Kerosene Range)	RD977	1.10E+01	5.5E+00	UJ		-	-
C14-C20 (Diesel Range)	RD977	1.10E+01	5.5E+00	UJ		-	-
C20-C30 (Lubricant Oil Range)	RD977	1.10E+01	5.5E+00	UJ		-	-
C11-C30	RD977		1.7E+01			-	-
Benzene	RD977	5.00E-03	2.5E-03	U	1.2E-04	-	2.5E-03
Ethylbenzene	RD977	5.00E-03	2.5E-03	U	1.2E-04	-	2.5E-03
Toluene	RD977	5.00E-03	2.5E-03	U	1.2E-04	-	2.5E-03
m,p-Xylene	RD977	5.00E-03	2.5E-03	U	3.6E-04	-	2.5E-03
o-Xylene	RD977	5.00E-03	2.5E-03	U	8.0E-05	-	2.5E-03
Xylene (total)	RD977	-	-	-	4.4E-04	-	-
2-Methylnaphthalene	RD977	-	-	-	2.8E-02	-	-
Acenaphthene	RD977	-	-	-	5.7E-04	9.5E-03	9.5E-03
Acenaphthylene	RD977	-	-	-	7.0E-05	1.2E-03	1.2E-03
Anthracene	RD977	-	-	-	3.7E-04	6.2E-03	6.2E-03
Benzo(a)anthracene	RD977	-	-	-	2.7E-05	4.4E-04	4.4E-04
Benzo(a)pyrene	RD977	-	-	-	2.7E-05	4.5E-04	4.5E-04
Benzo(b)fluoranthene	RD977	-	-	-	4.3E-05	7.1E-04	7.1E-04
Benzo(e)pyrene	RD977	-	-	-	2.1E-04	3.4E-03	3.4E-03
Benzo(g,h,i)perylene	RD977	-	-	-	2.2E-04	3.6E-03	3.6E-03
Benzo(k)fluoranthene	RD977	-	-	-	2.1E-05	3.4E-04	3.4E-04
Chrysene	RD977	-	-	-	5.9E-05	9.7E-04	9.7E-04
Dibenz(a,h)anthracene	RD977	-	-	-	1.1E-05	1.8E-04	1.8E-04
Fluoranthene	RD977	-	-	-	7.5E-05	1.2E-03	1.2E-03
Fluorene	RD977	-	-	-	5.7E-04	9.4E-03	9.4E-03
Indeno(1,2,3-cd)pyrene	RD977	-	-	-	2.4E-05	4.0E-04	4.0E-04
Naphthalene	RD977	-	-	-	6.9E-03	-	-
Perylene	RD977	-	-	-	1.2E-04	1.9E-03	1.9E-03
Phenanthrene	RD977	-	-	-	1.5E-03	2.5E-02	2.5E-02
Pyrene	RD977	-	-	-	1.4E-04	2.2E-03	2.2E-03
C08-C11 (Gasoline Range)	RD979	1.10E+01	5.5E+00	UJ		-	-
C11-C14 (Kerosene Range)	RD979	1.10E+01	5.5E+00	UJ		-	-
C14-C20 (Diesel Range)	RD979	1.10E+01	5.5E+00	UJ		-	-
C20-C30 (Lubricant Oil Range)	RD979	1.10E+01	5.5E+00	UJ		-	-
C11-C30	RD979		1.7E+01			-	-
Benzene	RD979	5.00E-03	2.5E-03	U	1.2E-04	-	2.5E-03
Ethylbenzene	RD979	5.00E-03	2.5E-03	U	1.2E-04	-	2.5E-03
Toluene	RD979	5.00E-03	2.5E-03	U	1.2E-04	-	2.5E-03
m,p-Xylene	RD979	5.00E-03	2.5E-03	U	3.6E-04	-	2.5E-03

TPH to Petroleum Constituent Extrapolation for Soil/Sediment (0-2 feet bgs)
Sodium Reactor Experiment (SRE) Area

Chemical	EPA ID	Measured Concentration[a] (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
o-Xylene	RD979	5.00E-03	2.5E-03	U	8.0E-05	-	2.5E-03
Xylene (total)	RD979	-	-	-	4.4E-04	-	-
2-Methylnaphthalene	RD979	-	-	-	2.8E-02	-	-
Acenaphthene	RD979	-	-	-	5.7E-04	9.5E-03	9.5E-03
Acenaphthylene	RD979	-	-	-	7.0E-05	1.2E-03	1.2E-03
Anthracene	RD979	-	-	-	3.7E-04	6.2E-03	6.2E-03
Benzo(a)anthracene	RD979	-	-	-	2.7E-05	4.4E-04	4.4E-04
Benzo(a)pyrene	RD979	-	-	-	2.7E-05	4.5E-04	4.5E-04
Benzo(b)fluoranthene	RD979	-	-	-	4.3E-05	7.1E-04	7.1E-04
Benzo(e)pyrene	RD979	-	-	-	2.1E-04	3.4E-03	3.4E-03
Benzo(g,h,i)perylene	RD979	-	-	-	2.2E-04	3.6E-03	3.6E-03
Benzo(k)fluoranthene	RD979	-	-	-	2.1E-05	3.4E-04	3.4E-04
Chrysene	RD979	-	-	-	5.9E-05	9.7E-04	9.7E-04
Dibenz(a,h)anthracene	RD979	-	-	-	1.1E-05	1.8E-04	1.8E-04
Fluoranthene	RD979	-	-	-	7.5E-05	1.2E-03	1.2E-03
Fluorene	RD979	-	-	-	5.7E-04	9.4E-03	9.4E-03
Indeno(1,2,3-cd)pyrene	RD979	-	-	-	2.4E-05	4.0E-04	4.0E-04
Naphthalene	RD979	-	-	-	6.9E-03	-	-
Perylene	RD979	-	-	-	1.2E-04	1.9E-03	1.9E-03
Phenanthrene	RD979	-	-	-	1.5E-03	2.5E-02	2.5E-02
Pyrene	RD979	-	-	-	1.4E-04	2.2E-03	2.2E-03
C08-C11 (Gasoline Range)	RJ202	4.00E+00	2.0E+00	UJ		-	-
C11-C14 (Kerosene Range)	RJ202	4.00E+00	2.0E+00	UJ		-	-
C14-C20 (Diesel Range)	RJ202	4.00E+00	2.0E+00	UJ		-	-
C20-C30 (Lubricant Oil Range)	RJ202	6.25E+00	6.3E+00	J		-	-
C11-C30	RJ202		1.0E+01			-	-
Benzene	RJ202	-	-	-	1.2E-04	-	-
Ethylbenzene	RJ202	-	-	-	1.2E-04	-	-
Toluene	RJ202	-	-	-	1.2E-04	-	-
m,p-Xylene	RJ202	-	-	-	3.6E-04	-	-
o-Xylene	RJ202	-	-	-	8.0E-05	-	-
Xylene (total)	RJ202	-	-	-	4.4E-04	-	-
2-Methylnaphthalene	RJ202	-	-	-	2.8E-02	-	-
Acenaphthene	RJ202	-	-	-	5.7E-04	5.9E-03	5.9E-03
Acenaphthylene	RJ202	-	-	-	7.0E-05	7.2E-04	7.2E-04
Anthracene	RJ202	-	-	-	3.7E-04	3.8E-03	3.8E-03
Benzo(a)anthracene	RJ202	-	-	-	2.7E-05	2.8E-04	2.8E-04
Benzo(a)pyrene	RJ202	-	-	-	2.7E-05	2.8E-04	2.8E-04
Benzo(b)fluoranthene	RJ202	-	-	-	4.3E-05	4.4E-04	4.4E-04
Benzo(e)pyrene	RJ202	-	-	-	2.1E-04	2.1E-03	2.1E-03
Benzo(g,h,i)perylene	RJ202	-	-	-	2.2E-04	2.3E-03	2.3E-03
Benzo(k)fluoranthene	RJ202	-	-	-	2.1E-05	2.1E-04	2.1E-04
Chrysene	RJ202	-	-	-	5.9E-05	6.0E-04	6.0E-04
Dibenz(a,h)anthracene	RJ202	-	-	-	1.1E-05	1.1E-04	1.1E-04
Fluoranthene	RJ202	-	-	-	7.5E-05	7.7E-04	7.7E-04
Fluorene	RJ202	-	-	-	5.7E-04	5.8E-03	5.8E-03
Indeno(1,2,3-cd)pyrene	RJ202	-	-	-	2.4E-05	2.5E-04	2.5E-04
Naphthalene	RJ202	-	-	-	6.9E-03	-	-
Perylene	RJ202	-	-	-	1.2E-04	1.2E-03	1.2E-03
Phenanthrene	RJ202	-	-	-	1.5E-03	1.6E-02	1.6E-02
Pyrene	RJ202	-	-	-	1.4E-04	1.4E-03	1.4E-03
C08-C11 (Gasoline Range)	RJ513	3.00E+00	1.5E+00	UJ		-	-
C11-C14 (Kerosene Range)	RJ513	3.00E+00	1.5E+00	UJ		-	-
C14-C20 (Diesel Range)	RJ513	3.00E+00	1.5E+00	U		-	-
C20-C30 (Lubricant Oil Range)	RJ513	6.60E+01	6.6E+01			-	-

TPH to Petroleum Constituent Extrapolation for Soil/Sediment (0-2 feet bgs)
Sodium Reactor Experiment (SRE) Area

Chemical	EPA ID	Measured Concentration[a] (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
C11-C30	RJ513		6.9E+01			-	-
Benzene	RJ513	-	-	-	1.2E-04	-	-
Ethylbenzene	RJ513	-	-	-	1.2E-04	-	-
Toluene	RJ513	-	-	-	1.2E-04	-	-
m,p-Xylene	RJ513	-	-	-	3.6E-04	-	-
o-Xylene	RJ513	-	-	-	8.0E-05	-	-
Xylene (total)	RJ513	-	-	-	4.4E-04	-	-
2-Methylnaphthalene	RJ513	7.00E-03	3.5E-03	UJ	2.8E-02	-	3.5E-03
Acenaphthene	RJ513	7.00E-03	3.5E-03	UJ	5.7E-04	4.0E-02	3.5E-03
Acenaphthylene	RJ513	7.00E-03	3.5E-03	UJ	7.0E-05	4.8E-03	3.5E-03
Anthracene	RJ513	7.00E-03	3.5E-03	UJ	3.7E-04	2.6E-02	3.5E-03
Benzo(a)anthracene	RJ513	7.00E-03	3.5E-03	UJ	2.7E-05	1.9E-03	1.9E-03
Benzo(a)pyrene	RJ513	-	-	-	2.7E-05	1.9E-03	1.9E-03
Benzo(b)fluoranthene	RJ513	-	-	-	4.3E-05	3.0E-03	3.0E-03
Benzo(e)pyrene	RJ513	-	-	-	2.1E-04	1.4E-02	1.4E-02
Benzo(g,h,i)perylene	RJ513	-	-	-	2.2E-04	1.5E-02	1.5E-02
Benzo(k)fluoranthene	RJ513	-	-	-	2.1E-05	1.4E-03	1.4E-03
Chrysene	RJ513	7.00E-03	3.5E-03	U	5.9E-05	4.0E-03	3.5E-03
Dibenz(a,h)anthracene	RJ513	-	-	-	1.1E-05	7.6E-04	7.6E-04
Fluoranthene	RJ513	7.00E-03	3.5E-03	UJ	7.5E-05	5.2E-03	3.5E-03
Fluorene	RJ513	7.00E-03	3.5E-03	UJ	5.7E-04	3.9E-02	3.5E-03
Indeno(1,2,3-cd)pyrene	RJ513	-	-	-	2.4E-05	1.7E-03	1.7E-03
Naphthalene	RJ513	7.00E-03	3.5E-03	UJ	6.9E-03	-	3.5E-03
Perylene	RJ513	-	-	-	1.2E-04	8.1E-03	8.1E-03
Phenanthrene	RJ513	5.40E-02	5.4E-02		1.5E-03	1.1E-01	5.4E-02
Pyrene	RJ513	7.00E-03	3.5E-03	UJ	1.4E-04	9.4E-03	3.5E-03
C08-C11 (Gasoline Range)	RJ516	9.90E+01	5.0E+01	U		-	-
C11-C14 (Kerosene Range)	RJ516	9.90E+01	5.0E+01	U		-	-
C14-C20 (Diesel Range)	RJ516	9.90E+01	5.0E+01	U		-	-
C20-C30 (Lubricant Oil Range)	RJ516	4.20E+02	4.2E+02			-	-
C11-C30	RJ516		5.2E+02			-	-
Benzene	RJ516	5.00E-03	2.5E-03	U	1.2E-04	-	2.5E-03
Ethylbenzene	RJ516	5.00E-03	2.5E-03	U	1.2E-04	-	2.5E-03
Toluene	RJ516	5.00E-03	2.5E-03	U	1.2E-04	-	2.5E-03
m,p-Xylene	RJ516	1.00E-02	5.0E-03	U	3.6E-04	-	5.0E-03
o-Xylene	RJ516	5.00E-03	2.5E-03	U	8.0E-05	-	2.5E-03
Xylene (total)	RJ516	-	-	-	4.4E-04	-	-
2-Methylnaphthalene	RJ516	3.00E-03	1.5E-03	U	2.8E-02	-	1.5E-03
Acenaphthene	RJ516	3.00E-03	1.5E-03	U	5.7E-04	3.0E-01	1.5E-03
Acenaphthylene	RJ516	3.00E-03	1.5E-03	U	7.0E-05	3.6E-02	1.5E-03
Anthracene	RJ516	3.00E-03	1.5E-03	U	3.7E-04	1.9E-01	1.5E-03
Benzo(a)anthracene	RJ516	2.00E-03	2.0E-03	J	2.7E-05	1.4E-02	2.0E-03
Benzo(a)pyrene	RJ516	4.00E-03	4.0E-03		2.7E-05	1.4E-02	4.0E-03
Benzo(b)fluoranthene	RJ516	5.00E-03	5.0E-03		4.3E-05	2.2E-02	5.0E-03
Benzo(e)pyrene	RJ516	-	-	-	2.1E-04	1.1E-01	1.1E-01
Benzo(g,h,i)perylene	RJ516	3.00E-03	1.5E-03	U	2.2E-04	1.1E-01	1.5E-03
Benzo(k)fluoranthene	RJ516	4.00E-03	4.0E-03		2.1E-05	1.1E-02	4.0E-03
Chrysene	RJ516	5.00E-03	5.0E-03		5.9E-05	3.0E-02	5.0E-03
Dibenz(a,h)anthracene	RJ516	3.00E-03	1.5E-03	U	1.1E-05	5.7E-03	1.5E-03
Fluoranthene	RJ516	4.00E-03	4.0E-03		7.5E-05	3.9E-02	4.0E-03
Fluorene	RJ516	3.00E-03	1.5E-03	U	5.7E-04	2.9E-01	1.5E-03
Indeno(1,2,3-cd)pyrene	RJ516	5.00E-03	5.0E-03		2.4E-05	1.2E-02	5.0E-03
Naphthalene	RJ516	3.00E-03	1.5E-03	U	6.9E-03	-	1.5E-03
Perylene	RJ516	-	-	-	1.2E-04	6.1E-02	6.1E-02
Phenanthrene	RJ516	2.00E-03	2.0E-03	J	1.5E-03	8.0E-01	2.0E-03

TPH to Petroleum Constituent Extrapolation for Soil/Sediment (0-2 feet bgs)
Sodium Reactor Experiment (SRE) Area

Chemical	EPA ID	Measured Concentration[a] (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Pyrene	RJ516	5.00E-03	5.0E-03		1.4E-04	7.1E-02	5.0E-03
C08-C11 (Gasoline Range)	RJ517	3.00E+00	1.5E+00	U		-	-
C11-C14 (Kerosene Range)	RJ517	3.00E+00	1.5E+00	U		-	-
C14-C20 (Diesel Range)	RJ517	3.00E+00	1.5E+00	U		-	-
C20-C30 (Lubricant Oil Range)	RJ517	1.20E+01	1.2E+01			-	-
C11-C30	RJ517		1.5E+01			-	-
Benzene	RJ517	5.00E-03	2.5E-03	U	1.2E-04	-	2.5E-03
Ethylbenzene	RJ517	5.00E-03	2.5E-03	U	1.2E-04	-	2.5E-03
Toluene	RJ517	3.00E-03	1.5E-03	U	1.2E-04	-	1.5E-03
m,p-Xylene	RJ517	1.00E-02	5.0E-03	U	3.6E-04	-	5.0E-03
o-Xylene	RJ517	5.00E-03	2.5E-03	U	8.0E-05	-	2.5E-03
Xylene (total)	RJ517	1.50E-02	7.5E-03	U	4.4E-04	-	7.5E-03
2-Methylnaphthalene	RJ517	3.00E-03	1.5E-03	U	2.8E-02	-	1.5E-03
Acenaphthene	RJ517	3.00E-03	1.5E-03	U	5.7E-04	8.6E-03	1.5E-03
Acenaphthylene	RJ517	3.00E-03	1.5E-03	U	7.0E-05	1.1E-03	1.1E-03
Anthracene	RJ517	3.00E-03	1.5E-03	U	3.7E-04	5.6E-03	1.5E-03
Benzo(a)anthracene	RJ517	3.00E-03	1.5E-03	U	2.7E-05	4.0E-04	4.0E-04
Benzo(a)pyrene	RJ517	3.00E-03	1.5E-03	U	2.7E-05	4.1E-04	4.1E-04
Benzo(b)fluoranthene	RJ517	3.00E-03	3.0E-03	J	4.3E-05	6.5E-04	3.0E-03
Benzo(e)pyrene	RJ517	-	-	-	2.1E-04	3.1E-03	3.1E-03
Benzo(g,h,i)perylene	RJ517	3.00E-03	1.5E-03	U	2.2E-04	3.3E-03	1.5E-03
Benzo(k)fluoranthene	RJ517	3.00E-03	1.5E-03	U	2.1E-05	3.1E-04	3.1E-04
Chrysene	RJ517	5.00E-03	5.0E-03		5.9E-05	8.8E-04	5.0E-03
Dibenz(a,h)anthracene	RJ517	3.00E-03	1.5E-03	U	1.1E-05	1.7E-04	1.7E-04
Fluoranthene	RJ517	4.00E-03	4.0E-03		7.5E-05	1.1E-03	4.0E-03
Fluorene	RJ517	3.00E-03	1.5E-03	U	5.7E-04	8.5E-03	1.5E-03
Indeno(1,2,3-cd)pyrene	RJ517	3.00E-03	1.5E-03	U	2.4E-05	3.6E-04	3.6E-04
Naphthalene	RJ517	3.00E-03	1.5E-03	U	6.9E-03	-	1.5E-03
Perylene	RJ517	-	-	-	1.2E-04	1.8E-03	1.8E-03
Phenanthrene	RJ517	3.00E-03	1.5E-03	U	1.5E-03	2.3E-02	1.5E-03
Pyrene	RJ517	3.00E-03	3.0E-03	J	1.4E-04	2.0E-03	3.0E-03
C08-C11 (Gasoline Range)	RJ627	4.00E+00	2.0E+00	U		-	-
C11-C14 (Kerosene Range)	RJ627	4.00E+00	2.0E+00	U		-	-
C14-C20 (Diesel Range)	RJ627	4.00E+00	2.0E+00	U		-	-
C20-C30 (Lubricant Oil Range)	RJ627	4.00E+00	2.0E+00	U		-	-
C11-C30	RJ627		6.0E+00			-	-
Benzene	RJ627	-	-	-	1.2E-04	-	-
Ethylbenzene	RJ627	-	-	-	1.2E-04	-	-
Toluene	RJ627	-	-	-	1.2E-04	-	-
m,p-Xylene	RJ627	-	-	-	3.6E-04	-	-
o-Xylene	RJ627	-	-	-	8.0E-05	-	-
Xylene (total)	RJ627	-	-	-	4.4E-04	-	-
2-Methylnaphthalene	RJ627	-	-	-	2.8E-02	-	-
Acenaphthene	RJ627	-	-	-	5.7E-04	3.4E-03	3.4E-03
Acenaphthylene	RJ627	-	-	-	7.0E-05	4.2E-04	4.2E-04
Anthracene	RJ627	-	-	-	3.7E-04	2.2E-03	2.2E-03
Benzo(a)anthracene	RJ627	-	-	-	2.7E-05	1.6E-04	1.6E-04
Benzo(a)pyrene	RJ627	-	-	-	2.7E-05	1.6E-04	1.6E-04
Benzo(b)fluoranthene	RJ627	-	-	-	4.3E-05	2.6E-04	2.6E-04
Benzo(e)pyrene	RJ627	-	-	-	2.1E-04	1.2E-03	1.2E-03
Benzo(g,h,i)perylene	RJ627	-	-	-	2.2E-04	1.3E-03	1.3E-03
Benzo(k)fluoranthene	RJ627	-	-	-	2.1E-05	1.2E-04	1.2E-04
Chrysene	RJ627	-	-	-	5.9E-05	3.5E-04	3.5E-04
Dibenz(a,h)anthracene	RJ627	-	-	-	1.1E-05	6.6E-05	6.6E-05
Fluoranthene	RJ627	-	-	-	7.5E-05	4.5E-04	4.5E-04

TPH to Petroleum Constituent Extrapolation for Soil/Sediment (0-2 feet bgs)
Sodium Reactor Experiment (SRE) Area

Chemical	EPA ID	Measured Concentration[a] (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF	Estimated Concentration (mg/kg)	Selected Concentration (mg/kg)
Fluorene	RJ627	-	-	-	5.7E-04	3.4E-03	3.4E-03
Indeno(1,2,3-cd)pyrene	RJ627	-	-	-	2.4E-05	1.4E-04	1.4E-04
Naphthalene	RJ627	-	-	-	6.9E-03	-	-
Perylene	RJ627	-	-	-	1.2E-04	7.1E-04	7.1E-04
Phenanthrene	RJ627	-	-	-	1.5E-03	9.2E-03	9.2E-03
Pyrene	RJ627	-	-	-	1.4E-04	8.2E-04	8.2E-04
C08-C11 (Gasoline Range)	RJ786	1.80E+01	9.0E+00	U		-	-
C11-C14 (Kerosene Range)	RJ786	4.00E+01	4.0E+01			-	-
C14-C20 (Diesel Range)	RJ786	1.80E+01	9.0E+00	U		-	-
C20-C30 (Lubricant Oil Range)	RJ786	4.70E+02	4.7E+02			-	-
C11-C30	RJ786		5.2E+02			-	-
Benzene	RJ786	-	-	-	1.2E-04	-	-
Ethylbenzene	RJ786	-	-	-	1.2E-04	-	-
Toluene	RJ786	-	-	-	1.2E-04	-	-
m,p-Xylene	RJ786	-	-	-	3.6E-04	-	-
o-Xylene	RJ786	-	-	-	8.0E-05	-	-
Xylene (total)	RJ786	-	-	-	4.4E-04	-	-
2-Methylnaphthalene	RJ786	-	-	-	2.8E-02	-	-
Acenaphthene	RJ786	-	-	-	5.7E-04	3.0E-01	3.0E-01
Acenaphthylene	RJ786	-	-	-	7.0E-05	3.6E-02	3.6E-02
Anthracene	RJ786	-	-	-	3.7E-04	1.9E-01	1.9E-01
Benzo(a)anthracene	RJ786	-	-	-	2.7E-05	1.4E-02	1.4E-02
Benzo(a)pyrene	RJ786	-	-	-	2.7E-05	1.4E-02	1.4E-02
Benzo(b)fluoranthene	RJ786	-	-	-	4.3E-05	2.2E-02	2.2E-02
Benzo(e)pyrene	RJ786	-	-	-	2.1E-04	1.1E-01	1.1E-01
Benzo(g,h,i)perylene	RJ786	-	-	-	2.2E-04	1.1E-01	1.1E-01
Benzo(k)fluoranthene	RJ786	-	-	-	2.1E-05	1.1E-02	1.1E-02
Chrysene	RJ786	-	-	-	5.9E-05	3.0E-02	3.0E-02
Dibenz(a,h)anthracene	RJ786	-	-	-	1.1E-05	5.7E-03	5.7E-03
Fluoranthene	RJ786	-	-	-	7.5E-05	3.9E-02	3.9E-02
Fluorene	RJ786	-	-	-	5.7E-04	2.9E-01	2.9E-01
Indeno(1,2,3-cd)pyrene	RJ786	-	-	-	2.4E-05	1.2E-02	1.2E-02
Naphthalene	RJ786	-	-	-	6.9E-03	-	-
Perylene	RJ786	-	-	-	1.2E-04	6.1E-02	6.1E-02
Phenanthrene	RJ786	-	-	-	1.5E-03	8.0E-01	8.0E-01
Pyrene	RJ786	-	-	-	1.4E-04	7.1E-02	7.1E-02

Notes:
a. Petroleum constituent concentrations estimated and selected as described in Section 2.8 of the SRAM.
"-" not applicable
EF - extrapolation factor
mg/kg - milligrams per kilogram

Aroclor to PCB Congener Extrapolation for Soil/Sediment (0-2 feet bgs)
Sodium Reactor Experiment (SRE) Area

Chemical	EPA ID	Measured Concentrations (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF_{1254}	EF_{1260}	Estimated Concentrations Aroclor 1254 (mg/kg)	Estimated Concentrations Aroclor 1260 (mg/kg)	Estimated Concentrations PCB_{MAX} (mg/kg)
Aroclor-1254	MJ248	1.2E-01	1.2E-01	J	-	-	-	-	-
Aroclor-1260	MJ248	3.7E-02	1.9E-02	UJ	-	-	-	-	-
PCB-105	MJ248	-	-	-	1.2E-01	8.2E-02	1.5E-05	1.5E-06	1.5E-05
PCB-114	MJ248	-	-	-	4.5E-03	1.5E-03	5.4E-07	2.7E-08	5.4E-07
PCB-118	MJ248	-	-	-	2.7E-01	1.6E-01	3.2E-05	3.0E-06	3.2E-05
PCB-123	MJ248	-	-	-	3.0E-03	2.3E-03	3.6E-07	4.3E-08	3.6E-07
PCB-126	MJ248	-	-	-	7.5E-03	6.4E-03	9.0E-07	1.2E-07	9.0E-07
PCB-156	MJ248	-	-	-	6.3E-02	5.5E-02	7.5E-06	1.0E-06	7.5E-06
PCB-157	MJ248	-	-	-	1.2E-02	2.5E-02	1.5E-06	4.5E-07	1.5E-06
PCB-167	MJ248	-	-	-	2.1E-02	4.3E-02	2.5E-06	7.9E-07	2.5E-06
PCB-169	MJ248	-	-	-	3.7E-04	6.4E-04	4.4E-08	1.2E-08	4.4E-08
PCB-189	MJ248	-	-	-	3.0E-03	6.4E-03	3.6E-07	1.2E-07	3.6E-07
PCB-77	MJ248	-	-	-	1.5E-02	1.3E-02	1.9E-06	2.4E-07	1.9E-06
PCB-81	MJ248	-	-	-	3.0E-03	2.3E-03	3.6E-07	4.2E-08	3.6E-07
Aroclor-1254	MJ623	1.1E+00	5.5E-01	U	-	-	-	-	-
Aroclor-1260	MJ623	6.9E+00	6.9E+00		-	-	-	-	-
PCB-105	MJ623	-	-	-	1.2E-01	8.2E-02	6.8E-05	5.6E-04	5.6E-04
PCB-114	MJ623	-	-	-	4.5E-03	1.5E-03	2.5E-06	1.0E-05	1.0E-05
PCB-118	MJ623	-	-	-	2.7E-01	1.6E-01	1.5E-04	1.1E-03	1.1E-03
PCB-123	MJ623	-	-	-	3.0E-03	2.3E-03	1.6E-06	1.6E-05	1.6E-05
PCB-126	MJ623	-	-	-	7.5E-03	6.4E-03	4.1E-06	4.4E-05	4.4E-05
PCB-156	MJ623	-	-	-	6.3E-02	5.5E-02	3.5E-05	3.8E-04	3.8E-04
PCB-157	MJ623	-	-	-	1.2E-02	2.5E-02	6.8E-06	1.7E-04	1.7E-04
PCB-167	MJ623	-	-	-	2.1E-02	4.3E-02	1.1E-05	2.9E-04	2.9E-04
PCB-169	MJ623	-	-	-	3.7E-04	6.4E-04	2.0E-07	4.4E-06	4.4E-06
PCB-189	MJ623	-	-	-	3.0E-03	6.4E-03	1.6E-06	4.4E-05	4.4E-05
PCB-77	MJ623	-	-	-	1.5E-02	1.3E-02	8.5E-06	8.8E-05	8.8E-05
PCB-81	MJ623	-	-	-	3.0E-03	2.3E-03	1.6E-06	1.6E-05	1.6E-05
Aroclor-1254	MJ624	1.1E+00	5.5E-01	U	-	-	-	-	-
Aroclor-1260	MJ624	6.4E+00	6.4E+00		-	-	-	-	-
PCB-105	MJ624	-	-	-	1.2E-01	8.2E-02	6.8E-05	5.2E-04	5.2E-04
PCB-114	MJ624	-	-	-	4.5E-03	1.5E-03	2.5E-06	9.3E-06	9.3E-06
PCB-118	MJ624	-	-	-	2.7E-01	1.6E-01	1.5E-04	1.0E-03	1.0E-03
PCB-123	MJ624	-	-	-	3.0E-03	2.3E-03	1.6E-06	1.5E-05	1.5E-05
PCB-126	MJ624	-	-	-	7.5E-03	6.4E-03	4.1E-06	4.1E-05	4.1E-05
PCB-156	MJ624	-	-	-	6.3E-02	5.5E-02	3.5E-05	3.5E-04	3.5E-04
PCB-157	MJ624	-	-	-	1.2E-02	2.5E-02	6.8E-06	1.6E-04	1.6E-04
PCB-167	MJ624	-	-	-	2.1E-02	4.3E-02	1.1E-05	2.7E-04	2.7E-04
PCB-169	MJ624	-	-	-	3.7E-04	6.4E-04	2.0E-07	4.1E-06	4.1E-06
PCB-189	MJ624	-	-	-	3.0E-03	6.4E-03	1.6E-06	4.1E-05	4.1E-05
PCB-77	MJ624	-	-	-	1.5E-02	1.3E-02	8.5E-06	8.1E-05	8.1E-05
PCB-81	MJ624	-	-	-	3.0E-03	2.3E-03	1.6E-06	1.4E-05	1.4E-05
Aroclor-1254	MJ625	5.4E-01	2.7E-01	U	-	-	-	-	-
Aroclor-1260	MJ625	4.8E+00	4.8E+00		-	-	-	-	-
PCB-105	MJ625	-	-	-	1.2E-01	8.2E-02	3.3E-05	3.9E-04	3.9E-04
PCB-114	MJ625	-	-	-	4.5E-03	1.5E-03	1.2E-06	7.0E-06	7.0E-06
PCB-118	MJ625	-	-	-	2.7E-01	1.6E-01	7.2E-05	7.9E-04	7.9E-04
PCB-123	MJ625	-	-	-	3.0E-03	2.3E-03	8.1E-07	1.1E-05	1.1E-05
PCB-126	MJ625	-	-	-	7.5E-03	6.4E-03	2.0E-06	3.1E-05	3.1E-05
PCB-156	MJ625	-	-	-	6.3E-02	5.5E-02	1.7E-05	2.6E-04	2.6E-04
PCB-157	MJ625	-	-	-	1.2E-02	2.5E-02	3.3E-06	1.2E-04	1.2E-04
PCB-167	MJ625	-	-	-	2.1E-02	4.3E-02	5.6E-06	2.1E-04	2.1E-04
PCB-169	MJ625	-	-	-	3.7E-04	6.4E-04	9.9E-08	3.1E-06	3.1E-06
PCB-189	MJ625	-	-	-	3.0E-03	6.4E-03	8.1E-07	3.1E-05	3.1E-05
PCB-77	MJ625	-	-	-	1.5E-02	1.3E-02	4.2E-06	6.1E-05	6.1E-05
PCB-81	MJ625	-	-	-	3.0E-03	2.3E-03	8.1E-07	1.1E-05	1.1E-05

Aroclor to PCB Congener Extrapolation for Soil/Sediment (0-2 feet bgs)
Sodium Reactor Experiment (SRE) Area

Chemical	EPA ID	Measured Concentrations (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF_{1254}	EF_{1260}	Estimated Concentrations Aroclor 1254 (mg/kg)	Estimated Concentrations Aroclor 1260 (mg/kg)	Estimated Concentrations PCB_{MAX} (mg/kg)
Aroclor-1254	MJ626	1.1E+00	5.5E-01	U	-	-	-	-	-
Aroclor-1260	MJ626	7.8E+00	7.8E+00		-	-	-	-	-
PCB-105	MJ626	-	-	-	1.2E-01	8.2E-02	6.8E-05	6.4E-04	6.4E-04
PCB-114	MJ626	-	-	-	4.5E-03	1.5E-03	2.5E-06	1.1E-05	1.1E-05
PCB-118	MJ626	-	-	-	2.7E-01	1.6E-01	1.5E-04	1.3E-03	1.3E-03
PCB-123	MJ626	-	-	-	3.0E-03	2.3E-03	1.6E-06	1.8E-05	1.8E-05
PCB-126	MJ626	-	-	-	7.5E-03	6.4E-03	4.1E-06	5.0E-05	5.0E-05
PCB-156	MJ626	-	-	-	6.3E-02	5.5E-02	3.5E-05	4.3E-04	4.3E-04
PCB-157	MJ626	-	-	-	1.2E-02	2.5E-02	6.8E-06	1.9E-04	1.9E-04
PCB-167	MJ626	-	-	-	2.1E-02	4.3E-02	1.1E-05	3.3E-04	3.3E-04
PCB-169	MJ626	-	-	-	3.7E-04	6.4E-04	2.0E-07	5.0E-06	5.0E-06
PCB-189	MJ626	-	-	-	3.0E-03	6.4E-03	1.6E-06	5.0E-05	5.0E-05
PCB-77	MJ626	-	-	-	1.5E-02	1.3E-02	8.5E-06	9.9E-05	9.9E-05
PCB-81	MJ626	-	-	-	3.0E-03	2.3E-03	1.6E-06	1.8E-05	1.8E-05
Aroclor-1254	MJ628	4.3E-01	4.3E-01		-	-	-	-	-
Aroclor-1260	MJ628	5.3E-02	2.7E-02	U	-	-	-	-	-
PCB-105	MJ628	-	-	-	1.2E-01	8.2E-02	5.3E-05	2.2E-06	5.3E-05
PCB-114	MJ628	-	-	-	4.5E-03	1.5E-03	2.0E-06	3.9E-08	2.0E-06
PCB-118	MJ628	-	-	-	2.7E-01	1.6E-01	1.2E-04	4.3E-06	1.2E-04
PCB-123	MJ628	-	-	-	3.0E-03	2.3E-03	1.3E-06	6.1E-08	1.3E-06
PCB-126	MJ628	-	-	-	7.5E-03	6.4E-03	3.2E-06	1.7E-07	3.2E-06
PCB-156	MJ628	-	-	-	6.3E-02	5.5E-02	2.7E-05	1.4E-06	2.7E-05
PCB-157	MJ628	-	-	-	1.2E-02	2.5E-02	5.3E-06	6.5E-07	5.3E-06
PCB-167	MJ628	-	-	-	2.1E-02	4.3E-02	8.9E-06	1.1E-06	8.9E-06
PCB-169	MJ628	-	-	-	3.7E-04	6.4E-04	1.6E-07	1.7E-08	1.6E-07
PCB-189	MJ628	-	-	-	3.0E-03	6.4E-03	1.3E-06	1.7E-07	1.3E-06
PCB-77	MJ628	-	-	-	1.5E-02	1.3E-02	6.6E-06	3.4E-07	6.6E-06
PCB-81	MJ628	-	-	-	3.0E-03	2.3E-03	1.3E-06	6.0E-08	1.3E-06
Aroclor-1254	MJ629	1.6E-01	1.6E-01		-	-	-	-	-
Aroclor-1260	MJ629	8.2E-02	4.1E-02	U	-	-	-	-	-
PCB-105	MJ629	-	-	-	1.2E-01	8.2E-02	2.0E-05	3.4E-06	2.0E-05
PCB-114	MJ629	-	-	-	4.5E-03	1.5E-03	7.3E-07	6.0E-08	7.3E-07
PCB-118	MJ629	-	-	-	2.7E-01	1.6E-01	4.3E-05	6.7E-06	4.3E-05
PCB-123	MJ629	-	-	-	3.0E-03	2.3E-03	4.8E-07	9.5E-08	4.8E-07
PCB-126	MJ629	-	-	-	7.5E-03	6.4E-03	1.2E-06	2.6E-07	1.2E-06
PCB-156	MJ629	-	-	-	6.3E-02	5.5E-02	1.0E-05	2.2E-06	1.0E-05
PCB-157	MJ629	-	-	-	1.2E-02	2.5E-02	2.0E-06	1.0E-06	2.0E-06
PCB-167	MJ629	-	-	-	2.1E-02	4.3E-02	3.3E-06	1.8E-06	3.3E-06
PCB-169	MJ629	-	-	-	3.7E-04	6.4E-04	5.9E-08	2.6E-08	5.9E-08
PCB-189	MJ629	-	-	-	3.0E-03	6.4E-03	4.8E-07	2.6E-07	4.8E-07
PCB-77	MJ629	-	-	-	1.5E-02	1.3E-02	2.5E-06	5.2E-07	2.5E-06
PCB-81	MJ629	-	-	-	3.0E-03	2.3E-03	4.8E-07	9.2E-08	4.8E-07
Aroclor-1254	MJ630	5.4E-02	2.7E-02	U	-	-	-	-	-
Aroclor-1260	MJ630	5.4E-02	2.7E-02	U	-	-	-	-	-
PCB-105	MJ630	-	-	-	1.2E-01	8.2E-02	3.3E-06	2.2E-06	3.3E-06
PCB-114	MJ630	-	-	-	4.5E-03	1.5E-03	1.2E-07	3.9E-08	1.2E-07
PCB-118	MJ630	-	-	-	2.7E-01	1.6E-01	7.2E-06	4.4E-06	7.2E-06
PCB-123	MJ630	-	-	-	3.0E-03	2.3E-03	8.1E-08	6.3E-08	8.1E-08
PCB-126	MJ630	-	-	-	7.5E-03	6.4E-03	2.0E-07	1.7E-07	2.0E-07
PCB-156	MJ630	-	-	-	6.3E-02	5.5E-02	1.7E-06	1.5E-06	1.7E-06
PCB-157	MJ630	-	-	-	1.2E-02	2.5E-02	3.3E-07	6.6E-07	6.6E-07
PCB-167	MJ630	-	-	-	2.1E-02	4.3E-02	5.6E-07	1.2E-06	1.2E-06
PCB-169	MJ630	-	-	-	3.7E-04	6.4E-04	9.9E-09	1.7E-08	1.7E-08
PCB-189	MJ630	-	-	-	3.0E-03	6.4E-03	8.1E-08	1.7E-07	1.7E-07
PCB-77	MJ630	-	-	-	1.5E-02	1.3E-02	4.2E-07	3.4E-07	4.2E-07
PCB-81	MJ630	-	-	-	3.0E-03	2.3E-03	8.1E-08	6.1E-08	8.1E-08

Aroclor to PCB Congener Extrapolation for Soil/Sediment (0-2 feet bgs)
Sodium Reactor Experiment (SRE) Area

Chemical	EPA ID	Measured Concentrations (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF_{1254}	EF_{1260}	Estimated Concentrations Aroclor 1254 (mg/kg)	Estimated Concentrations Aroclor 1260 (mg/kg)	Estimated Concentrations PCB_{MAX} (mg/kg)
Aroclor-1254	MJ631	5.3E-02	2.7E-02	U	-	-	-	-	-
Aroclor-1260	MJ631	5.3E-02	2.7E-02	U	-	-	-	-	-
PCB-105	MJ631	-	-	-	1.2E-01	8.2E-02	3.3E-06	2.2E-06	3.3E-06
PCB-114	MJ631	-	-	-	4.5E-03	1.5E-03	1.2E-07	3.9E-08	1.2E-07
PCB-118	MJ631	-	-	-	2.7E-01	1.6E-01	7.1E-06	4.3E-06	7.1E-06
PCB-123	MJ631	-	-	-	3.0E-03	2.3E-03	7.9E-08	6.1E-08	7.9E-08
PCB-126	MJ631	-	-	-	7.5E-03	6.4E-03	2.0E-07	1.7E-07	2.0E-07
PCB-156	MJ631	-	-	-	6.3E-02	5.5E-02	1.7E-06	1.4E-06	1.7E-06
PCB-157	MJ631	-	-	-	1.2E-02	2.5E-02	3.3E-07	6.5E-07	6.5E-07
PCB-167	MJ631	-	-	-	2.1E-02	4.3E-02	5.5E-07	1.1E-06	1.1E-06
PCB-169	MJ631	-	-	-	3.7E-04	6.4E-04	9.7E-09	1.7E-08	1.7E-08
PCB-189	MJ631	-	-	-	3.0E-03	6.4E-03	7.9E-08	1.7E-07	1.7E-07
PCB-77	MJ631	-	-	-	1.5E-02	1.3E-02	4.1E-07	3.4E-07	4.1E-07
PCB-81	MJ631	-	-	-	3.0E-03	2.3E-03	7.9E-08	6.0E-08	7.9E-08
Aroclor-1254	MJ635	1.1E-01	1.1E-01	J	-	-	-	-	-
Aroclor-1260	MJ635	1.8E-01	1.8E-01	J	-	-	-	-	-
PCB-105	MJ635	-	-	-	1.2E-01	8.2E-02	1.4E-05	1.5E-05	1.5E-05
PCB-114	MJ635	-	-	-	4.5E-03	1.5E-03	5.0E-07	2.6E-07	5.0E-07
PCB-118	MJ635	-	-	-	2.7E-01	1.6E-01	2.9E-05	2.9E-05	2.9E-05
PCB-123	MJ635	-	-	-	3.0E-03	2.3E-03	3.3E-07	4.2E-07	4.2E-07
PCB-126	MJ635	-	-	-	7.5E-03	6.4E-03	8.3E-07	1.1E-06	1.1E-06
PCB-156	MJ635	-	-	-	6.3E-02	5.5E-02	6.9E-06	9.8E-06	9.8E-06
PCB-157	MJ635	-	-	-	1.2E-02	2.5E-02	1.4E-06	4.4E-06	4.4E-06
PCB-167	MJ635	-	-	-	2.1E-02	4.3E-02	2.3E-06	7.7E-06	7.7E-06
PCB-169	MJ635	-	-	-	3.7E-04	6.4E-04	4.0E-08	1.1E-07	1.1E-07
PCB-189	MJ635	-	-	-	3.0E-03	6.4E-03	3.3E-07	1.1E-06	1.1E-06
PCB-77	MJ635	-	-	-	1.5E-02	1.3E-02	1.7E-06	2.3E-06	2.3E-06
PCB-81	MJ635	-	-	-	3.0E-03	2.3E-03	3.3E-07	4.1E-07	4.1E-07
Aroclor-1254	MJ644	9.1E-02	4.6E-02	UJ	-	-	-	-	-
Aroclor-1260	MJ644	9.1E-02	4.6E-02	UJ	-	-	-	-	-
PCB-105	MJ644	-	-	-	1.2E-01	8.2E-02	5.6E-06	3.7E-06	5.6E-06
PCB-114	MJ644	-	-	-	4.5E-03	1.5E-03	2.1E-07	6.6E-08	2.1E-07
PCB-118	MJ644	-	-	-	2.7E-01	1.6E-01	1.2E-05	7.4E-06	1.2E-05
PCB-123	MJ644	-	-	-	3.0E-03	2.3E-03	1.4E-07	1.1E-07	1.4E-07
PCB-126	MJ644	-	-	-	7.5E-03	6.4E-03	3.4E-07	2.9E-07	3.4E-07
PCB-156	MJ644	-	-	-	6.3E-02	5.5E-02	2.9E-06	2.5E-06	2.9E-06
PCB-157	MJ644	-	-	-	1.2E-02	2.5E-02	5.6E-07	1.1E-06	1.1E-06
PCB-167	MJ644	-	-	-	2.1E-02	4.3E-02	9.4E-07	1.9E-06	1.9E-06
PCB-169	MJ644	-	-	-	3.7E-04	6.4E-04	1.7E-08	2.9E-08	2.9E-08
PCB-189	MJ644	-	-	-	3.0E-03	6.4E-03	1.4E-07	2.9E-07	2.9E-07
PCB-77	MJ644	-	-	-	1.5E-02	1.3E-02	7.0E-07	5.8E-07	7.0E-07
PCB-81	MJ644	-	-	-	3.0E-03	2.3E-03	1.4E-07	1.0E-07	1.4E-07
Aroclor-1254	MJ652	5.4E-02	2.7E-02	U	-	-	-	-	-
Aroclor-1260	MJ652	5.4E-02	2.7E-02	U	-	-	-	-	-
PCB-105	MJ652	-	-	-	1.2E-01	8.2E-02	3.3E-06	2.2E-06	3.3E-06
PCB-114	MJ652	-	-	-	4.5E-03	1.5E-03	1.2E-07	3.9E-08	1.2E-07
PCB-118	MJ652	-	-	-	2.7E-01	1.6E-01	7.2E-06	4.4E-06	7.2E-06
PCB-123	MJ652	-	-	-	3.0E-03	2.3E-03	8.1E-08	6.3E-08	8.1E-08
PCB-126	MJ652	-	-	-	7.5E-03	6.4E-03	2.0E-07	1.7E-07	2.0E-07
PCB-156	MJ652	-	-	-	6.3E-02	5.5E-02	1.7E-06	1.5E-06	1.7E-06
PCB-157	MJ652	-	-	-	1.2E-02	2.5E-02	3.3E-07	6.6E-07	6.6E-07
PCB-167	MJ652	-	-	-	2.1E-02	4.3E-02	5.6E-07	1.2E-06	1.2E-06
PCB-169	MJ652	-	-	-	3.7E-04	6.4E-04	9.9E-09	1.7E-08	1.7E-08
PCB-189	MJ652	-	-	-	3.0E-03	6.4E-03	8.1E-08	1.7E-07	1.7E-07
PCB-77	MJ652	-	-	-	1.5E-02	1.3E-02	4.2E-07	3.4E-07	4.2E-07
PCB-81	MJ652	-	-	-	3.0E-03	2.3E-03	8.1E-08	6.1E-08	8.1E-08

Aroclor to PCB Congener Extrapolation for Soil/Sediment (0-2 feet bgs)
Sodium Reactor Experiment (SRE) Area

Chemical	EPA ID	Measured Concentrations (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF_{1254}	EF_{1260}	Estimated Concentrations Aroclor 1254 (mg/kg)	Estimated Concentrations Aroclor 1260 (mg/kg)	Estimated Concentrations PCB_{MAX} (mg/kg)
Aroclor-1254	MJ653	5.3E-02	2.7E-02	U	-	-	-	-	-
Aroclor-1260	MJ653	5.3E-02	2.7E-02	U	-	-	-	-	-
PCB-105	MJ653	-	-	-	1.2E-01	8.2E-02	3.3E-06	2.2E-06	3.3E-06
PCB-114	MJ653	-	-	-	4.5E-03	1.5E-03	1.2E-07	3.9E-08	1.2E-07
PCB-118	MJ653	-	-	-	2.7E-01	1.6E-01	7.1E-06	4.3E-06	7.1E-06
PCB-123	MJ653	-	-	-	3.0E-03	2.3E-03	7.9E-08	6.1E-08	7.9E-08
PCB-126	MJ653	-	-	-	7.5E-03	6.4E-03	2.0E-07	1.7E-07	2.0E-07
PCB-156	MJ653	-	-	-	6.3E-02	5.5E-02	1.7E-06	1.4E-06	1.7E-06
PCB-157	MJ653	-	-	-	1.2E-02	2.5E-02	3.3E-07	6.5E-07	6.5E-07
PCB-167	MJ653	-	-	-	2.1E-02	4.3E-02	5.5E-07	1.1E-06	1.1E-06
PCB-169	MJ653	-	-	-	3.7E-04	6.4E-04	9.7E-09	1.7E-08	1.7E-08
PCB-189	MJ653	-	-	-	3.0E-03	6.4E-03	7.9E-08	1.7E-07	1.7E-07
PCB-77	MJ653	-	-	-	1.5E-02	1.3E-02	4.1E-07	3.4E-07	4.1E-07
PCB-81	MJ653	-	-	-	3.0E-03	2.3E-03	7.9E-08	6.0E-08	7.9E-08
Aroclor-1254	MJ664	8.2E-02	4.1E-02	U	-	-	-	-	-
Aroclor-1260	MJ664	8.2E-02	4.1E-02	U	-	-	-	-	-
PCB-105	MJ664	-	-	-	1.2E-01	8.2E-02	5.1E-06	3.4E-06	5.1E-06
PCB-114	MJ664	-	-	-	4.5E-03	1.5E-03	1.9E-07	6.0E-08	1.9E-07
PCB-118	MJ664	-	-	-	2.7E-01	1.6E-01	1.1E-05	6.7E-06	1.1E-05
PCB-123	MJ664	-	-	-	3.0E-03	2.3E-03	1.2E-07	9.5E-08	1.2E-07
PCB-126	MJ664	-	-	-	7.5E-03	6.4E-03	3.1E-07	2.6E-07	3.1E-07
PCB-156	MJ664	-	-	-	6.3E-02	5.5E-02	2.6E-06	2.2E-06	2.6E-06
PCB-157	MJ664	-	-	-	1.2E-02	2.5E-02	5.1E-07	1.0E-06	1.0E-06
PCB-167	MJ664	-	-	-	2.1E-02	4.3E-02	8.5E-07	1.8E-06	1.8E-06
PCB-169	MJ664	-	-	-	3.7E-04	6.4E-04	1.5E-08	2.6E-08	2.6E-08
PCB-189	MJ664	-	-	-	3.0E-03	6.4E-03	1.2E-07	2.6E-07	2.6E-07
PCB-77	MJ664	-	-	-	1.5E-02	1.3E-02	6.3E-07	5.2E-07	6.3E-07
PCB-81	MJ664	-	-	-	3.0E-03	2.3E-03	1.2E-07	9.2E-08	1.2E-07
Aroclor-1254	MJ765	1.8E-01	9.0E-02	U	-	-	-	-	-
Aroclor-1260	MJ765	1.8E-01	9.0E-02	U	-	-	-	-	-
PCB-105	MJ765	-	-	-	1.2E-01	8.2E-02	1.1E-05	7.4E-06	1.1E-05
PCB-114	MJ765	-	-	-	4.5E-03	1.5E-03	4.1E-07	1.3E-07	4.1E-07
PCB-118	MJ765	-	-	-	2.7E-01	1.6E-01	2.4E-05	1.5E-05	2.4E-05
PCB-123	MJ765	-	-	-	3.0E-03	2.3E-03	2.7E-07	2.1E-07	2.7E-07
PCB-126	MJ765	-	-	-	7.5E-03	6.4E-03	6.8E-07	5.7E-07	6.8E-07
PCB-156	MJ765	-	-	-	6.3E-02	5.5E-02	5.7E-06	4.9E-06	5.7E-06
PCB-157	MJ765	-	-	-	1.2E-02	2.5E-02	1.1E-06	2.2E-06	2.2E-06
PCB-167	MJ765	-	-	-	2.1E-02	4.3E-02	1.9E-06	3.8E-06	3.8E-06
PCB-169	MJ765	-	-	-	3.7E-04	6.4E-04	3.3E-08	5.7E-08	5.7E-08
PCB-189	MJ765	-	-	-	3.0E-03	6.4E-03	2.7E-07	5.7E-07	5.7E-07
PCB-77	MJ765	-	-	-	1.5E-02	1.3E-02	1.4E-06	1.1E-06	1.4E-06
PCB-81	MJ765	-	-	-	3.0E-03	2.3E-03	2.7E-07	2.0E-07	2.7E-07
Aroclor-1254	MJ768	8.5E-02	4.3E-02	U	-	-	-	-	-
Aroclor-1260	MJ768	8.5E-02	4.3E-02	U	-	-	-	-	-
PCB-105	MJ768	-	-	-	1.2E-01	8.2E-02	5.3E-06	3.5E-06	5.3E-06
PCB-114	MJ768	-	-	-	4.5E-03	1.5E-03	1.9E-07	6.2E-08	1.9E-07
PCB-118	MJ768	-	-	-	2.7E-01	1.6E-01	1.1E-05	7.0E-06	1.1E-05
PCB-123	MJ768	-	-	-	3.0E-03	2.3E-03	1.3E-07	9.9E-08	1.3E-07
PCB-126	MJ768	-	-	-	7.5E-03	6.4E-03	3.2E-07	2.7E-07	3.2E-07
PCB-156	MJ768	-	-	-	6.3E-02	5.5E-02	2.7E-06	2.3E-06	2.7E-06
PCB-157	MJ768	-	-	-	1.2E-02	2.5E-02	5.3E-07	1.0E-06	1.0E-06
PCB-167	MJ768	-	-	-	2.1E-02	4.3E-02	8.8E-07	1.8E-06	1.8E-06
PCB-169	MJ768	-	-	-	3.7E-04	6.4E-04	1.6E-08	2.7E-08	2.7E-08
PCB-189	MJ768	-	-	-	3.0E-03	6.4E-03	1.3E-07	2.7E-07	2.7E-07
PCB-77	MJ768	-	-	-	1.5E-02	1.3E-02	6.6E-07	5.4E-07	6.6E-07
PCB-81	MJ768	-	-	-	3.0E-03	2.3E-03	1.3E-07	9.6E-08	1.3E-07

Aroclor to PCB Congener Extrapolation for Soil/Sediment (0-2 feet bgs)
Sodium Reactor Experiment (SRE) Area

Chemical	EPA ID	Measured Concentrations (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF_{1254}	EF_{1260}	Estimated Concentrations Aroclor 1254 (mg/kg)	Estimated Concentrations Aroclor 1260 (mg/kg)	Estimated Concentrations PCB_{MAX} (mg/kg)
Aroclor-1254	MJ776	8.8E-02	4.4E-02	U	-	-	-	-	-
Aroclor-1260	MJ776	8.8E-02	4.4E-02	U	-	-	-	-	-
PCB-105	MJ776	-	-	-	1.2E-01	8.2E-02	5.4E-06	3.6E-06	5.4E-06
PCB-114	MJ776	-	-	-	4.5E-03	1.5E-03	2.0E-07	6.4E-08	2.0E-07
PCB-118	MJ776	-	-	-	2.7E-01	1.6E-01	1.2E-05	7.2E-06	1.2E-05
PCB-123	MJ776	-	-	-	3.0E-03	2.3E-03	1.3E-07	1.0E-07	1.3E-07
PCB-126	MJ776	-	-	-	7.5E-03	6.4E-03	3.3E-07	2.8E-07	3.3E-07
PCB-156	MJ776	-	-	-	6.3E-02	5.5E-02	2.8E-06	2.4E-06	2.8E-06
PCB-157	MJ776	-	-	-	1.2E-02	2.5E-02	5.4E-07	1.1E-06	1.1E-06
PCB-167	MJ776	-	-	-	2.1E-02	4.3E-02	9.1E-07	1.9E-06	1.9E-06
PCB-169	MJ776	-	-	-	3.7E-04	6.4E-04	1.6E-08	2.8E-08	2.8E-08
PCB-189	MJ776	-	-	-	3.0E-03	6.4E-03	1.3E-07	2.8E-07	2.8E-07
PCB-77	MJ776	-	-	-	1.5E-02	1.3E-02	6.8E-07	5.6E-07	6.8E-07
PCB-81	MJ776	-	-	-	3.0E-03	2.3E-03	1.3E-07	9.9E-08	1.3E-07
Aroclor-1254	MJ777	8.8E-02	4.4E-02	U	-	-	-	-	-
Aroclor-1260	MJ777	8.8E-02	4.4E-02	U	-	-	-	-	-
PCB-105	MJ777	-	-	-	1.2E-01	8.2E-02	5.4E-06	3.6E-06	5.4E-06
PCB-114	MJ777	-	-	-	4.5E-03	1.5E-03	2.0E-07	6.4E-08	2.0E-07
PCB-118	MJ777	-	-	-	2.7E-01	1.6E-01	1.2E-05	7.2E-06	1.2E-05
PCB-123	MJ777	-	-	-	3.0E-03	2.3E-03	1.3E-07	1.0E-07	1.3E-07
PCB-126	MJ777	-	-	-	7.5E-03	6.4E-03	3.3E-07	2.8E-07	3.3E-07
PCB-156	MJ777	-	-	-	6.3E-02	5.5E-02	2.8E-06	2.4E-06	2.8E-06
PCB-157	MJ777	-	-	-	1.2E-02	2.5E-02	5.4E-07	1.1E-06	1.1E-06
PCB-167	MJ777	-	-	-	2.1E-02	4.3E-02	9.1E-07	1.9E-06	1.9E-06
PCB-169	MJ777	-	-	-	3.7E-04	6.4E-04	1.6E-08	2.8E-08	2.8E-08
PCB-189	MJ777	-	-	-	3.0E-03	6.4E-03	1.3E-07	2.8E-07	2.8E-07
PCB-77	MJ777	-	-	-	1.5E-02	1.3E-02	6.8E-07	5.6E-07	6.8E-07
PCB-81	MJ777	-	-	-	3.0E-03	2.3E-03	1.3E-07	9.9E-08	1.3E-07
Aroclor-1254	RJ627	3.5E-02	1.8E-02	U	-	-	-	-	-
Aroclor-1260	RJ627	3.5E-02	1.8E-02	U	-	-	-	-	-
PCB-105	RJ627	-	-	-	1.2E-01	8.2E-02	2.2E-06	1.4E-06	2.2E-06
PCB-114	RJ627	-	-	-	4.5E-03	1.5E-03	7.9E-08	2.5E-08	7.9E-08
PCB-118	RJ627	-	-	-	2.7E-01	1.6E-01	4.7E-06	2.9E-06	4.7E-06
PCB-123	RJ627	-	-	-	3.0E-03	2.3E-03	5.2E-08	4.1E-08	5.2E-08
PCB-126	RJ627	-	-	-	7.5E-03	6.4E-03	1.3E-07	1.1E-07	1.3E-07
PCB-156	RJ627	-	-	-	6.3E-02	5.5E-02	1.1E-06	9.5E-07	1.1E-06
PCB-157	RJ627	-	-	-	1.2E-02	2.5E-02	2.2E-07	4.3E-07	4.3E-07
PCB-167	RJ627	-	-	-	2.1E-02	4.3E-02	3.6E-07	7.5E-07	7.5E-07
PCB-169	RJ627	-	-	-	3.7E-04	6.4E-04	6.4E-09	1.1E-08	1.1E-08
PCB-189	RJ627	-	-	-	3.0E-03	6.4E-03	5.2E-08	1.1E-07	1.1E-07
PCB-77	RJ627	-	-	-	1.5E-02	1.3E-02	2.7E-07	2.2E-07	2.7E-07
PCB-81	RJ627	-	-	-	3.0E-03	2.3E-03	5.2E-08	3.9E-08	5.2E-08
Aroclor-1254	RJ786	6.0E-02	6.0E-02	J	-	-	-	-	-
Aroclor-1260	RJ786	3.6E-02	1.8E-02	UJ	-	-	-	-	-
PCB-105	RJ786	-	-	-	1.2E-01	8.2E-02	7.4E-06	1.5E-06	7.4E-06
PCB-114	RJ786	-	-	-	4.5E-03	1.5E-03	2.7E-07	2.6E-08	2.7E-07
PCB-118	RJ786	-	-	-	2.7E-01	1.6E-01	1.6E-05	2.9E-06	1.6E-05
PCB-123	RJ786	-	-	-	3.0E-03	2.3E-03	1.8E-07	4.2E-08	1.8E-07
PCB-126	RJ786	-	-	-	7.5E-03	6.4E-03	4.5E-07	1.1E-07	4.5E-07
PCB-156	RJ786	-	-	-	6.3E-02	5.5E-02	3.8E-06	9.8E-07	3.8E-06
PCB-157	RJ786	-	-	-	1.2E-02	2.5E-02	7.4E-07	4.4E-07	7.4E-07
PCB-167	RJ786	-	-	-	2.1E-02	4.3E-02	1.2E-06	7.7E-07	1.2E-06
PCB-169	RJ786	-	-	-	3.7E-04	6.4E-04	2.2E-08	1.1E-08	2.2E-08
PCB-189	RJ786	-	-	-	3.0E-03	6.4E-03	1.8E-07	1.1E-07	1.8E-07
PCB-77	RJ786	-	-	-	1.5E-02	1.3E-02	9.3E-07	2.3E-07	9.3E-07
PCB-81	RJ786	-	-	-	3.0E-03	2.3E-03	1.8E-07	4.1E-08	1.8E-07

Aroclor to PCB Congener Extrapolation for Soil/Sediment (0-2 feet bgs)
Sodium Reactor Experiment (SRE) Area

Chemical	EPA ID	Measured Concentrations (mg/kg)	Adjusted Concentration (mg/kg)	Qualifier	EF_{1254}	EF_{1260}	Estimated Concentrations Aroclor 1254 (mg/kg)	Estimated Concentrations Aroclor 1260 (mg/kg)	Estimated Concentrations PCB_{MAX} (mg/kg)

Notes:
PCBs - polychlorinated biphenyls
EF- Extrapolation Factor (ng congener/kg soil)/(µg Aroclor/kg soil)
"-" not applicable
mg/kg - milligrams per kilogram
µg/kg - micrograms per kilogram
ng/kg - nanograms per kilogram
bgs- below ground surface
PCB_{MAX} = the maximum of the extrapolated Aroclor 1254 and 1260 concentrations

Exposure Point Concentrations for COPCs in Surface Water
Sodium Reactor Experiment (SRE) Area

Chemical	Distribution Type	EPCs		
		CTE[a] (µg/L)	RME[b] (µg/L)	
Inorganic Compounds				
Aluminum	NT	1.0E+03	1.7E+03	
Antimony	NP	9.0E-01	1.5E+00	
Arsenic	NT	6.8E+00	1.1E+01	
Cadmium	NP	1.5E-01	2.8E-01	
Chromium	NT	2.3E+00	3.4E+00	
Copper	G	4.4E+00	5.7E+00	
Lead	G	8.1E-01	1.0E+00	
Mercury	G	1.2E-01	1.4E-01	
Nickel	NT	4.1E+00	4.1E+00	c
Thallium	NP	2.1E-01	2.1E-01	c
Vanadium	NT	4.0E+00	5.7E+00	
VOCs				
1,1,1-Trichloroethane	NT	7.6E-01	7.6E-01	c
Trichloroethene	NT	6.6E-01	6.6E-01	c
PCDD/PCDFs				
1,2,3,7,8-PeCDD	NP	1.7E-06	1.7E-06	c
1,2,3,4,7,8-HxCDD	NP	2.5E-06	2.5E-06	c
1,2,3,6,7,8-HxCDD	NP	2.7E-05	6.6E-05	
1,2,3,7,8,9-HxCDD	NP	1.4E-05	1.4E-05	c
1,2,3,4,6,7,8-HpCDD	NP	2.2E-04	1.9E-03	
OCDD	LN	1.8E-03	2.7E-03	
2,3,7,8-TCDF	NP	4.0E-06	4.5E-06	
1,2,3,7,8-PeCDF	NP	7.2E-06	7.2E-06	c
2,3,4,7,8-PeCDF	NP	1.8E-05	2.0E-05	
1,2,3,4,7,8-HxCDF	NP	1.9E-05	2.1E-05	
1,2,3,6,7,8-HxCDF	NP	1.1E-05	1.1E-05	c
2,3,4,6,7,8-HxCDF	NP	1.9E-05	2.1E-05	
1,2,3,7,8,9-HxCDF	NP	1.8E-05	2.3E-05	
1,2,3,4,6,7,8-HpCDF	LN	2.7E-05	5.1E-05	
1,2,3,4,7,8,9-HpCDF	NP	1.4E-05	1.4E-05	c
OCDF	LN	7.2E-05	1.3E-04	

Exposure Point Concentrations for COPCs in Surface Water
Sodium Reactor Experiment (SRE) Area

Chemical	Distribution Type	EPCs	
		CTE[a] (µg/L)	RME[b] (µg/L)

Notes:

a. Either the arithmetic mean concentration for two or more samples or the reported concentration for a single sample.

b. Either the 95% upper confidence limit (95% UCL) on the arithmetic mean for three or more samples, or the maximum concentration for less than three samples, or the maximum concentration in cases where the 95% UCL exceeds the maximum concentration.

c. CTE exposure point concentrations estimated to equal the RME because the mean is greater than RME exposure point concentration.

COPC - chemical of potential concern
EPC - exposure point concentration
CTE - Central Tendency Exposure
RME - Reasonable Maximum Exposure
VOC - volatile organic compound
PCDD/PCDF - Polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.
N - normal distribution
LN - lognormal distribution
NP - non-parametric distribution
G - gamma distribution
NT - data not tested for distribution due to sample size
µg/L - milligrams per liter

Exposure Point Concentrations for COPCs in Chatsworth Formation Groundwater
Sodium Reactor Experiment (SRE) Area

Chemical	Distribution Type	EPCs	
		CTE[a] (mg/L)	RME[b] (mg/L)
VOCs			
1,1-Dichloroethane	NT	2.6E-03	2.6E-03
1,2-Dichloroethane	NT	9.0E-04	9.0E-04
Acetone	NT	8.8E-03	8.8E-03
Benzene	NT	5.8E-04	5.8E-04
Carbon disulfide	NT	2.6E-03	2.6E-03
Chloromethane	NT	3.0E-04	3.0E-04
cis-1,2-Dichloroethene	NT	5.1E-02	5.1E-02
Methylene chloride	NT	6.4E-04	6.4E-04
Trichloroethene	NT	1.0E-02	1.0E-02

Notes:

a. Either the arithmetic mean concentration for two or more samples or the reported concentration for a single sample.

b. The maximum detected concentration.

COPC - chemical of potential concern

EPC - exposure point concentration

CTE - Central Tendency Exposure

RME - Reasonable Maximum Exposure

VOC - volatile organic compound

NT - data not tested for distribution due to sample size

"-" not applicable

mg/L - milligrams per liter

bgs - below ground surface

Exposure Point Concentrations for COPCs in Chatsworth Formation Groundwater
Group 6 Reporting Area

Chemical	Distribution Type	EPCs	
		CTE[a] (mg/L)	RME[b] (mg/L)
Inorganic Compounds			
Copper	NT	1.8E-02	1.8E-02
Fluoride	NT	5.6E-01	5.6E-01
Nitrate	NT	1.4E+01	1.4E+01
Thallium	NT	5.4E-04	5.4E-04
VOCs			
1,1-Dichloroethane	NT	2.6E-03	2.6E-03
1,2-Dichloroethane	NT	9.0E-04	9.0E-04
Acetone	NT	1.6E-02	1.6E-02
Benzene	NT	5.8E-04	5.8E-04
Carbon disulfide	NT	2.6E-03	2.6E-03
Chloromethane	NT	3.2E-04	3.2E-04
cis-1,2-Dichloroethene	NT	5.1E-02	5.1E-02
Methylene chloride	NT	6.4E-04	6.4E-04
Toluene	NT	1.8E-03	1.8E-03
Trichloroethene	NT	1.0E-02	1.0E-02
Total Petroleum Hydrocarbons			
C14-C20(Diesel Range)	NT	5.0E-02	5.0E-02

Notes:

a. Either the arithmetic mean concentration for two or more samples or the reported concentration for a single sample.

b. The maximum detected concentration.

COPC - chemical of potential concern

EPC - exposure point concentration

CTE - Central Tendency Exposure

RME - Reasonable Maximum Exposure

VOC - volatile organic compound

NT - data not tested for distribution due to sample size

"-" not applicable

mg/L - milligrams per liter

bgs - below ground surface

Exposure Point Concentrations for COPCs in Soil Vapor (0-10 feet bgs)
Sodium Reactor Experiment (SRE) Area

Chemical	Distribution Type	CTE [a] (µg/L)	RME [b] (µg/L)	
1,1,1-Trichloroethane	NT	5.0E-01	5.0E-01	c
1,1,2-Trichloro-1,2,2-trifluoroethane	NT	2.5E+00	2.9E+00	
1,1-Dichloroethane	NT	5.0E-01	5.0E-01	c
Ethylbenzene	NT	5.0E-01	5.0E-01	c
Methylene chloride	NT	1.3E+01	1.3E+01	c
Tetrachloroethene	NT	5.0E-01	5.0E-01	c
Toluene	NT	5.0E-01	5.0E-01	c
Trichloroethene	NT	5.0E-01	5.0E-01	c
m,p-Xylene	NT	1.0E+00	1.0E+00	c

Notes:

a. Either the arithmetic mean concentration for two or more samples or the reported concentration for a single sample.

b. Either the 95% upper confidence limit (95% UCL) on the arithmetic mean for three or more samples, or the maximum concentration for less than three samples, or the maximum concentration in cases where the 95% UCL exceeds the maximum concentration.

c. Exposure point concentrations estimated at one-half the soil vapor sample quantitation limit

µg/L - micrograms per liter volume

CTE- Central Tendency Exposure

RME- Reasonable Maximum Exposure

bgs- below ground surface

Exposure Point Concentrations for COPCs in Soil ONLY (0-10 feet bgs) - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Chemical	Distribution Type	EPCs		
		CTE[a] (mg/kg)	RME[b] (mg/kg)	
Inorganic Compounds				
Cadmium	NP	1.9E-01	3.0E-01	
Copper	NP	9.7E+00	1.8E+01	
Lead	NP	9.2E+00	1.5E+01	
Mercury	NP	1.7E+00	3.8E+00	
Methyl mercury	NT	1.7E-03	3.6E-03	
Silver	NP	1.3E+00	2.7E+00	
Thallium	NP	9.9E-01	3.6E+00	
Zinc	NP	6.8E+01	2.2E+02	
VOCs				
1,1,2-Trichloro-1,2,2-trifluoroethane	NP	1.2E-02	1.2E-02	c
2-Butanone	NP	1.9E-02	2.7E-02	
2-Hexanone	NP	3.0E-03	3.0E-03	e
1-Chlorohexane	NT	1.0E-03	1.0E-03	
Acetone	NP	6.2E-01	5.2E+00	
Methylene chloride	NP	9.9E-03	1.2E-02	
SVOCs				
2-Methylnaphthalene	NP	2.2E-02	2.5E-02	
Acenaphthene	NP	6.8E-02	2.5E-01	d
Acenaphthylene	NP	4.9E-03	1.4E-02	d
Anthracene	NP	1.9E-01	9.9E-01	d
Benzo(a)anthracene	NP	8.2E-01	1.4E+01	d
Benzo(a)pyrene	NP	8.8E-01	1.5E+01	d
Benzo(b)fluoranthene	NP	7.8E-01	6.9E+00	d
Benzo(e)pyrene	NP	2.0E-02	5.5E-02	d
Benzo(g,h,i)perylene	NP	2.7E-01	2.4E+00	d
Benzo(k)fluoranthene	NP	8.7E-01	1.5E+01	d
Chrysene	NP	6.0E-01	6.5E+00	d
Dibenz(a,h)anthracene	NP	1.2E-01	1.1E+00	d
Dibenzofuran	NP	2.8E-01	2.8E-01	
Fluoranthene	NP	1.5E+00	1.3E+01	d
Fluorene	NP	7.0E-02	2.6E-01	d
Indeno(1,2,3-cd)pyrene	NP	3.7E-01	3.3E+00	d
Naphthalene	NP	2.0E-02	5.8E-02	
Perylene	NP	1.1E-02	3.1E-02	d
Phenanthrene	NP	7.0E-01	5.8E+00	d
Pyrene	NP	1.2E+00	1.1E+01	d
Total Petroleum Hydrocarbons				
C11-C14(Kerosene Range)	NP	7.8E+00	3.8E+01	
C14-C20(Diesel Range)	NP	7.3E+00	1.8E+01	
C20-C30(Lubricant Oil Range)	NP	7.9E+01	4.3E+02	

Exposure Point Concentrations for COPCs in Soil ONLY (0-10 feet bgs) - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Chemical	Distribution Type	EPCs	
		CTE[a] (mg/kg)	RME[b] (mg/kg)
PCDD/PCDFs			
2,3,7,8-TCDD	N	1.5E-07	3.5E-07
1,2,3,7,8-PeCDD	N	5.6E-07	1.3E-06
1,2,3,4,7,8-HxCDD	N	1.6E-06	3.7E-06
1,2,3,6,7,8-HxCDD	N	8.3E-06	1.9E-05
1,2,3,7,8,9-HxCDD	N	3.4E-06	8.7E-06
1,2,3,4,6,7,8-HpCDD	N	2.4E-04	4.9E-04
OCDD	N	3.7E-03	7.3E-03
2,3,7,8-TCDF	N	3.6E-07	7.8E-07
1,2,3,7,8-PeCDF	N	1.5E-07	3.9E-07
2,3,4,7,8-PeCDF	N	4.2E-07	9.0E-07
1,2,3,4,7,8-HxCDF	N	8.8E-07	1.7E-06
1,2,3,6,7,8-HxCDF	N	7.2E-07	1.6E-06
2,3,4,6,7,8-HxCDF	N	1.4E-06	2.8E-06
1,2,3,7,8,9-HxCDF	G	1.4E-07	1.8E-07
1,2,3,4,6,7,8-HpCDF	N	2.8E-05	5.0E-05
1,2,3,4,7,8,9-HpCDF	N	2.4E-06	4.2E-06
OCDF	N	7.5E-05	1.5E-04
PCBs			
Aroclor-1254	NP	1.6E-01	4.3E-01
Aroclor-1260	NP	1.4E+00	7.7E+00
PCB-105	NP	1.2E-04	6.3E-04
PCB-114	NP	2.3E-06	1.1E-05
PCB-118	NP	2.4E-04	1.3E-03
PCB-123	NP	3.4E-06	1.8E-05
PCB-126	NP	9.2E-06	4.9E-05
PCB-156	NP	7.9E-05	4.2E-04
PCB-157	NP	3.5E-05	1.9E-04
PCB-167	NP	6.0E-05	3.3E-04
PCB-169	NP	9.0E-07	4.9E-06
PCB-189	NP	9.0E-06	4.9E-05
PCB-77	NP	1.8E-05	9.7E-05
PCB-81	NP	3.3E-06	1.7E-05

Notes:

a. Either the arithmetic mean concentration for two or more samples or the reported concentration for a single sample.

b. Either the 95% upper confidence limit (95% UCL) on the arithmetic mean for three or more samples, or the maximum concentration for less than three samples, or the maximum concentration in cases where the 95% UCL exceeds the maximum concentration.

c. Exposure point concentrations estimated by application of the soil to soil vapor

c. Exposure point concentrations estimated at one-half the sample quantitation limit for soil at 0 to 10 feet bgs.

d. Exposure point concentrations estimated in part following the methods for extrapolation of total petroleum hydrocarbons to petroleum constituents as described in Section 2.8 of the SRAM and as presented in Spreadsheet D-15.

e. CTE exposure point concentrations estimated to equal the RME because the mean is greater than RME exposure point concentration.

Exposure Point Concentrations for COPCs in Soil ONLY (0-10 feet bgs) - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Chemical	Distribution Type	EPCs	
		CTE[a] (mg/kg)	RME[b] (mg/kg)

COPC - chemical of potential concern
EPC - exposure point concentration
CTE - Central Tendency Exposure
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCDD/PCDF - polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.
Type - distribution based on Omnibus test
N - normal distribution
LN - lognormal distribution
NP - non-parametric distribution
G - gamma distribution
NT - data not tested for distribution due to sample size
mg/kg - milligrams per kilogram
bgs - below ground surface

Exposure Point Concentrations for COPCs in Soil/Sediment (0-10 feet bgs) - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Chemical	Distribution Type	EPCs		
		CTE[a] (mg/kg)	RME[b] (mg/kg)	
Inorganic Compounds				
Cadmium	NP	3.7E-01	1.5E+00	
Copper	NP	1.7E+01	3.1E+01	
Lead	NP	1.2E+01	2.3E+01	
Mercury	NP	1.4E+00	4.5E+00	
Methyl mercury	NT	1.7E-03	3.6E-03	
Silver	NP	9.3E-01	3.7E+00	
Thallium	NP	1.0E+00	2.8E+00	
Zinc	NP	1.2E+02	4.7E+02	
VOCs				
1,1,1-Trichloroethane	NP	4.2E-02	2.4E-01	
1,1,2-Trichloro-1,2,2-trifluoroethane	NP	1.2E-02	1.2E-02	c
1,1-Dichloroethane	NP	2.0E-02	7.5E-02	
1,2-Dichloroethene (total)	NP	2.5E-02	5.0E-02	
2-Butanone	NP	3.7E-02	3.7E-02	e
2-Hexanone	NP	3.0E-03	3.0E-03	e
1-Chlorohexane	NT	1.0E-03	1.0E-03	e
Acetone	NP	4.7E-01	2.3E+00	
Ethylbenzene	NP	1.7E-02	5.5E-02	
Methylene chloride	NP	3.6E-01	2.4E+00	
Tetrachloroethene	NP	3.7E-02	1.8E-01	
Toluene	NP	2.8E-01	2.0E+00	
Trichloroethene	NP	9.0E-02	5.5E-01	
Xylenes (total)	NP	6.4E-02	3.6E-01	
SVOCs				
2-Methylnaphthalene	NP	2.5E-02	2.5E-02	e
Acenaphthene	NP	6.6E-02	1.6E-01	d
Acenaphthylene	NP	3.2E-02	8.5E-02	d
Anthracene	NP	1.3E-01	5.4E-01	d
Benzo(a)anthracene	NP	4.6E-01	3.9E+00	d
Benzo(a)pyrene	NP	4.9E-01	4.1E+00	d
Benzo(b)fluoranthene	NP	4.5E-01	3.6E+00	d
Benzo(e)pyrene	NP	1.7E-02	4.6E-02	d
Benzo(g,h,i)perylene	NP	1.7E-01	1.3E+00	d
Benzo(k)fluoranthene	NP	4.8E-01	4.1E+00	d
Chrysene	NP	3.5E-01	3.4E+00	d
Dibenz(a,h)anthracene	NP	9.0E-02	6.1E-01	d
Dibenzofuran	NP	9.8E-02	1.2E-01	
Fluoranthene	NP	8.1E-01	6.9E+00	d
Fluorene	NP	6.6E-02	1.7E-01	d
Indeno(1,2,3-cd)pyrene	NP	2.3E-01	1.8E+00	d
Naphthalene	NP	4.9E-02	5.8E-02	
Perylene	NP	9.4E-03	2.6E-02	d
Phenanthrene	NP	4.0E-01	1.6E+00	d
Pyrene	NP	6.8E-01	5.8E+00	d

Exposure Point Concentrations for COPCs in Soil/Sediment (0-10 feet bgs) - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Chemical	Distribution Type	EPCs	
		CTE[a] (mg/kg)	RME[b] (mg/kg)
Total Petroleum Hydrocarbons			
C11-C14(Kerosene Range)	NP	7.1E+00	1.8E+01
C14-C20(Diesel Range)	NP	6.7E+00	1.6E+01
C20-C30(Lubricant Oil Range)	NP	6.6E+01	3.6E+02
Hydrocarbons	NT	2.5E+00	2.5E+00
PCDD/PCDFs			
2,3,7,8-TCDD	N	2.3E-07	4.4E-07
1,2,3,7,8-PeCDD	N	8.9E-07	1.8E-06
1,2,3,4,7,8-HxCDD	N	3.3E-06	7.2E-06
1,2,3,6,7,8-HxCDD	N	1.3E-05	2.4E-05
1,2,3,7,8,9-HxCDD	N	4.7E-06	9.4E-06
1,2,3,4,6,7,8-HpCDD	N	4.5E-04	9.5E-04
OCDD	N	6.7E-03	1.4E-02
2,3,7,8-TCDF	N	4.5E-07	7.9E-07
1,2,3,7,8-PeCDF	N	2.3E-07	4.6E-07
2,3,4,7,8-PeCDF	N	6.6E-07	1.3E-06
1,2,3,4,7,8-HxCDF	N	1.4E-06	2.8E-06
1,2,3,6,7,8-HxCDF	N	1.2E-06	2.5E-06
2,3,4,6,7,8-HxCDF	N	3.1E-06	6.9E-06
1,2,3,7,8,9-HxCDF	G	3.0E-07	9.7E-07
1,2,3,4,6,7,8-HpCDF	N	4.2E-05	8.0E-05
1,2,3,4,7,8,9-HpCDF	N	3.9E-06	7.6E-06
OCDF	N	1.1E-04	2.0E-04
PCBs			
Aroclor-1254	NP	1.6E-01	4.3E-01
Aroclor-1260	NP	1.3E+00	7.0E+00
PCB-105	NP	1.1E-04	5.7E-04
PCB-114	NP	2.1E-06	1.0E-05
PCB-118	NP	2.2E-04	1.1E-03
PCB-123	NP	3.1E-06	1.6E-05
PCB-126	NP	8.4E-06	4.4E-05
PCB-156	NP	7.2E-05	3.8E-04
PCB-157	NP	3.2E-05	1.7E-04
PCB-167	NP	5.5E-05	3.0E-04
PCB-169	NP	8.2E-07	4.4E-06
PCB-189	NP	8.2E-06	4.4E-05
PCB-77	NP	1.7E-05	8.9E-05
PCB-81	NP	3.0E-06	1.6E-05

Notes:

a. Either the arithmetic mean concentration for two or more samples or the reported concentration for a single sample.

b. Either the 95% upper confidence limit (95% UCL) on the arithmetic mean for three or more samples, or the maximum concentration for less than three samples, or the maximum concentration in cases where the 95% UCL exceeds the maximum concentration.

c. Exposure point concentrations estimated by application of the soil to soil vapor

c. Exposure point concentrations estimated at one-half the sample quantitation limit for soil at 0 to 10 feet bgs.

Exposure Point Concentrations for COPCs in Soil/Sediment (0-10 feet bgs) - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Chemical	Distribution Type	EPCs	
		CTE[a] (mg/kg)	RME[b] (mg/kg)

d. Exposure point concentrations estimated in part following the methods for extrapolation of total petroleum hydrocarbons to petroleum constituents as described in Section 2.8 of the SRAM and as presented in Spreadsheet D-15.
e. CTE exposure point concentrations estimated to equal the RME because the mean is greater than RME exposure point concentration.
COPC - chemical of potential concern
EPC - exposure point concentration
CTE - Central Tendency Exposure
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCDD/PCDF - polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.
Type - distribution based on Omnibus test
N - normal distribution
LN - lognormal distribution
NP - non-parametric distribution
G - gamma distribution
NT - data not tested for distribution due to sample size
mg/kg - milligrams per kilogram
bgs - below ground surface

Exposure Point Concentrations for COPCs in Soil ONLY (0-2 feet bgs) - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Chemical	Distribution Type	EPCs		
		CTE[a] (mg/kg)	RME[b] (mg/kg)	
Inorganic Compounds				
Cadmium	G	2.4E-01	4.2E-01	
Copper	NP	9.9E+00	2.0E+01	
Lead	G	9.3E+00	1.3E+01	
Mercury	LN	2.1E+00	5.5E+00	
Methyl mercury	NT	1.7E-03	3.6E-03	
Silver	G	1.0E+00	2.7E+00	
Thallium	NP	3.3E-01	3.3E-01	d
Zinc	NP	8.4E+01	1.9E+02	
VOCs				
1,1,2-Trichloro-1,2,2-trifluoroethane	NT	1.2E-02	1.2E-02	c
2-Butanone	N	2.1E-02	3.5E-02	
Acetone	LN	1.1E+00	5.2E+00	
Methylene chloride	N	1.0E-02	1.3E-02	d
SVOCs				
Acenaphthene	NP	2.6E-02	1.1E-01	e
Acenaphthylene	NP	4.6E-03	1.6E-02	e
Anthracene	NP	1.8E-02	7.3E-02	e
Benzo(a)anthracene	NP	2.8E-03	8.8E-03	e
Benzo(a)pyrene	NP	3.0E-03	8.9E-03	e
Benzo(b)fluoranthene	LN	4.3E-03	1.1E-02	e
Benzo(e)pyrene	NP	2.0E-02	6.7E-02	e
Benzo(g,h,i)perylene	NP	1.2E-02	4.4E-02	e
Benzo(k)fluoranthene	NP	2.8E-03	8.3E-03	e
Chrysene	LN	5.1E-03	1.2E-02	e
Dibenz(a,h)anthracene	NP	1.9E-03	6.9E-03	e
Fluoranthene	LN	5.6E-03	1.2E-02	e
Fluorene	NP	2.6E-02	1.1E-01	e
Indeno(1,2,3-cd)pyrene	NP	2.7E-03	8.5E-03	e
Perylene	NP	1.1E-02	3.8E-02	e
Phenanthrene	NP	7.1E-02	3.0E-01	e
Pyrene	NP	8.2E-03	2.8E-02	e
Total Petroleum Hydrocarbons				
C11-C14(Kerosene Range)	NP	1.0E+01	4.0E+01	
C20-C30(Lubricant Oil Range)	NP	7.8E+01	4.7E+02	

Exposure Point Concentrations for COPCs in Soil ONLY (0-2 feet bgs) - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Chemical	Distribution Type	EPCs	
		CTE[a] (mg/kg)	RME[b] (mg/kg)
PCDD/PCDFs			
2,3,7,8-TCDD	NT	1.9E-07	4.0E-07
1,2,3,7,8-PeCDD	NT	7.3E-07	1.5E-06
1,2,3,4,7,8-HxCDD	NT	2.1E-06	4.2E-06
1,2,3,6,7,8-HxCDD	NT	1.1E-05	2.0E-05
1,2,3,7,8,9-HxCDD	NT	4.5E-06	1.0E-05
1,2,3,4,6,7,8-HpCDD	NT	3.1E-04	5.0E-04
OCDD	NT	5.0E-03	7.3E-03
2,3,7,8-TCDF	NT	4.7E-07	7.9E-07
1,2,3,7,8-PeCDF	NT	1.8E-07	3.9E-07
2,3,4,7,8-PeCDF	NT	5.4E-07	9.9E-07
1,2,3,4,7,8-HxCDF	NT	1.2E-06	1.8E-06
1,2,3,6,7,8-HxCDF	NT	9.5E-07	1.8E-06
2,3,4,6,7,8-HxCDF	NT	1.8E-06	3.0E-06
1,2,3,7,8,9-HxCDF	NT	1.6E-07	1.8E-07
1,2,3,4,6,7,8-HpCDF	NT	3.7E-05	5.0E-05
1,2,3,4,7,8,9-HpCDF	NT	3.2E-06	4.2E-06
OCDF	NT	1.0E-04	1.5E-04
PCBs			
Aroclor-1254	NP	1.7E-01	4.3E-01
Aroclor-1260	NP	1.5E+00	7.8E+00
PCB-105	NP	1.3E-04	6.4E-04
PCB-114	NP	2.4E-06	1.1E-05
PCB-118	NP	2.5E-04	1.3E-03
PCB-123	NP	3.5E-06	1.8E-05
PCB-126	NP	9.6E-06	5.0E-05
PCB-156	NP	8.3E-05	4.3E-04
PCB-157	NP	3.6E-05	1.9E-04
PCB-167	NP	6.3E-05	3.3E-04
PCB-169	NP	9.4E-07	5.0E-06
PCB-189	NP	9.4E-06	5.0E-05
PCB-77	NP	1.9E-05	9.9E-05
PCB-81	NP	3.4E-06	1.8E-05

Notes:

a. Either the arithmetic mean concentration for two or more samples or the reported concentration for a single sample.

b. Either the 95% upper confidence limit (95% UCL) on the arithmetic mean for three or more samples, or the maximum concentration for less than three samples, or the maximum concentration in cases where the 95% UCL exceeds the maximum concentration.

c. Exposure point concentrations estimated at one-half the sample quantitation limit for soil at 0 to 2 feet bgs.

d. CTE exposure point concentrations estimated to equal the RME because the mean is greater than RME exposure point concentration.

e. Exposure point concentrations estimated in part following the methods for extrapolation of total petroleum hydrocarbons to petroleum constituents as described in Section 2.8 of the SRAM and as presented in Spreadsheet D-15.

COPC - chemical of potential concern

Exposure Point Concentrations for COPCs in Soil ONLY (0-2 feet bgs) - Wet Pond Scenario
Sodium Reactor Experiment (SRE) Area

Chemical	Distribution Type	EPCs	
		CTE[a] (mg/kg)	RME[b] (mg/kg)

EPC - exposure point concentration
CTE - central tendency exposure
RME - reasonable maximum exposure
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCDD/PCDF - polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.
N - normal distribution
LN - lognormal distribution
NP - non-parametric distribution
G - gamma distribution
NT - data not tested for distribution due to sample size
mg/kg - milligrams per kilogram
bgs - below ground surface

Exposure Point Concentrations for COPCs in Soil/Sediment (0-2 feet bgs) - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Chemical	Distribution Type	EPCs CTE[a] (mg/kg)	EPCs RME[b] (mg/kg)	
Inorganic Compounds				
Cadmium	LN	5.1E-01	1.1E+00	
Copper	NP	2.1E+01	4.6E+01	
Lead	NP	1.6E+01	3.4E+01	
Mercury	LN	1.9E+00	4.4E+00	
Methyl mercury	NT	1.7E-03	3.6E-03	
Silver	NP	7.7E-01	2.9E+00	
Thallium	NP	3.3E-01	3.3E-01	d
Zinc	NP	1.7E+02	4.4E+02	
VOCs				
1,1,2-Trichloro-1,2,2-trifluoroethane	NT	1.2E-02	1.2E-02	c
1,2-Dichloroethene (total)	NP	2.8E-02	7.0E-02	
2-Butanone	NP	3.7E-02	3.7E-02	d
Acetone	NP	6.8E-01	4.2E+00	
Methylene chloride	NP	1.3E-02	1.3E-02	d
Tetrachloroethene	NP	2.1E-02	8.8E-02	
Toluene	NP	5.6E-02	3.4E-01	
Trichloroethene	NP	3.7E-02	2.0E-01	
Xylenes (total)	NP	2.5E-02	5.1E-02	
SVOCs				
Acenaphthene	NP	4.4E-02	1.0E-01	e
Acenaphthylene	NP	3.1E-02	8.5E-02	e
Anthracene	NP	3.9E-02	8.2E-02	e
Benzo(a)anthracene	NP	3.6E-02	1.5E-01	e
Benzo(a)pyrene	NP	3.6E-02	1.5E-01	e
Benzo(b)fluoranthene	NP	4.9E-02	2.7E-01	e
Benzo(e)pyrene	NP	1.9E-02	6.3E-02	e
Benzo(g,h,i)perylene	NP	4.1E-02	9.0E-02	e
Benzo(k)fluoranthene	NP	3.0E-02	8.5E-02	e
Chrysene	NP	4.4E-02	2.2E-01	e
Dibenz(a,h)anthracene	NP	2.9E-02	8.5E-02	e
Fluoranthene	NP	6.0E-02	3.8E-01	e
Fluorene	NP	4.4E-02	1.0E-01	e
Indeno(1,2,3-cd)pyrene	NP	3.4E-02	1.4E-01	e
Perylene	NP	1.1E-02	3.6E-02	e
Phenanthrene	LN	7.9E-02	2.0E-01	e
Pyrene	NP	5.3E-02	1.6E-01	e
Total Petroleum Hydrocarbons				
C11-C14(Kerosene Range)	NP	9.7E+00	4.0E+01	
C14-C20(Diesel Range)	NP	7.5E+00	7.5E+00	c
C20-C30(Lubricant Oil Range)	NP	7.3E+01	4.7E+02	

Exposure Point Concentrations for COPCs in Soil/Sediment (0-2 feet bgs) - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Chemical	Distribution Type	EPCs	
		CTE[a] (mg/kg)	RME[b] (mg/kg)
PCDD/PCDFs			
2,3,7,8-TCDD	N	2.7E-07	5.3E-07
1,2,3,7,8-PeCDD	N	1.1E-06	2.2E-06
1,2,3,4,7,8-HxCDD	N	4.1E-06	9.0E-06
1,2,3,6,7,8-HxCDD	N	1.6E-05	3.0E-05
1,2,3,7,8,9-HxCDD	N	5.9E-06	1.0E-05
1,2,3,4,6,7,8-HpCDD	N	5.7E-04	1.2E-03
OCDD	N	8.4E-03	1.7E-02
2,3,7,8-TCDF	N	5.5E-07	7.9E-07
1,2,3,7,8-PeCDF	N	2.8E-07	5.7E-07
2,3,4,7,8-PeCDF	N	8.2E-07	1.6E-06
1,2,3,4,7,8-HxCDF	N	1.8E-06	3.3E-06
1,2,3,6,7,8-HxCDF	N	1.6E-06	3.2E-06
2,3,4,6,7,8-HxCDF	N	3.8E-06	8.8E-06
1,2,3,7,8,9-HxCDF	G	3.6E-07	9.7E-07
1,2,3,4,6,7,8-HpCDF	N	5.3E-05	9.6E-05
1,2,3,4,7,8,9-HpCDF	N	4.9E-06	9.2E-06
OCDF	N	1.4E-04	2.4E-04
PCBs			
Aroclor-1254	NP	1.6E-01	4.3E-01
Aroclor-1260	NP	1.3E+00	7.3E+00
PCB-105	NP	1.1E-04	5.6E-04
PCB-114	NP	2.2E-06	1.0E-05
PCB-118	NP	2.3E-04	1.1E-03
PCB-123	NP	3.2E-06	1.6E-05
PCB-126	NP	8.8E-06	4.4E-05
PCB-156	NP	7.5E-05	3.8E-04
PCB-157	NP	3.3E-05	1.7E-04
PCB-167	NP	5.7E-05	2.9E-04
PCB-169	NP	8.6E-07	4.4E-06
PCB-189	NP	8.6E-06	4.4E-05
PCB-77	NP	1.8E-05	8.8E-05
PCB-81	NP	3.1E-06	1.6E-05

Notes:

a. Either the arithmetic mean concentration for two or more samples or the reported concentration for a single sample.

b. Either the 95% upper confidence limit (95% UCL) on the arithmetic mean for three or more samples, or the maximum concentration for less than three samples, or the maximum concentration in cases where the 95% UCL exceeds the maximum concentration.

c. Exposure point concentrations estimated at one-half the sample quantitation limit for soil at 0 to 2 feet bgs.

d. CTE exposure point concentrations estimated to equal the RME because the mean is greater than RME exposure point concentration.

e. Exposure point concentrations estimated in part following the methods for extrapolation of total petroleum hydrocarbons to petroleum constituents as described in Section 2.8 of the SRAM and as presented in Spreadsheet D-15.

COPC - chemical of potential concern

Exposure Point Concentrations for COPCs in Soil/Sediment (0-2 feet bgs) - Dry Pond Scenario
Sodium Reactor Experiment (SRE) Area

Chemical	Distribution Type	EPCs	
		CTE[a] (mg/kg)	RME[b] (mg/kg)

EPC - exposure point concentration
CTE - central tendency exposure
RME - reasonable maximum exposure
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCDD/PCDF - polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.
N - normal distribution
LN - lognormal distribution
NP - non-parametric distribution
G - gamma distribution
NT - data not tested for distribution due to sample size
mg/kg - milligrams per kilogram
bgs - below ground surface

PCDD/PCDF Congener Group Summation for Soil/Sediment (0-10 feet bgs)
Sodium Reactor Experiment (SRE) Area

EPA ID	PCDD/PCDF Congener	Measured Concentration [a] (mg/kg)	Data Qualifier	Adjusted Concentration [b] (mg/kg)	Sum of PCDD/PCDF Congener Concentrations				
					Total Tetra (mg/kg)	Total Penta (mg/kg)	Total Hexa (mg/kg)	Total Hepta (mg/kg)	Total Octa (mg/kg)
MJ636	1,2,3,4,6,7,8-HpCDD	1.3E-03		1.3E-03	1.3E-06	4.4E-06	6.8E-05	1.4E-03	1.9E-02
MJ636	1,2,3,4,6,7,8-HpCDF	1.0E-04	J	1.0E-04					
MJ636	1,2,3,4,7,8,9-HpCDF	1.0E-05		1.0E-05					
MJ636	1,2,3,4,7,8-HxCDD	1.0E-05		1.0E-05					
MJ636	1,2,3,4,7,8-HxCDF	3.7E-06		3.7E-06					
MJ636	1,2,3,6,7,8-HxCDD	3.0E-05		3.0E-05					
MJ636	1,2,3,6,7,8-HxCDF	3.4E-06		3.4E-06					
MJ636	1,2,3,7,8,9-HxCDD	1.0E-05		1.0E-05					
MJ636	1,2,3,7,8,9-HxCDF	9.7E-07	J	9.7E-07					
MJ636	1,2,3,7,8-PeCDD	2.2E-06	J	2.2E-06					
MJ636	1,2,3,7,8-PeCDF	5.8E-07	J	5.8E-07					
MJ636	2,3,4,6,7,8-HxCDF	1.0E-05		1.0E-05					
MJ636	2,3,4,7,8-PeCDF	1.6E-06	J	1.6E-06					
MJ636	2,3,7,8-TCDD	5.3E-07		5.3E-07					
MJ636	2,3,7,8-TCDF	7.9E-07	J	7.9E-07					
MJ636	OCDD	1.9E-02		1.9E-02					
MJ636	OCDF	2.4E-04		2.4E-04					
MJ637	1,2,3,4,6,7,8-HpCDD	1.0E-06	J	1.0E-06	8.6E-08	1.7E-07	5.2E-07	1.2E-06	1.0E-05
MJ637	1,2,3,4,6,7,8-HpCDF	2.0E-07	UJ	9.8E-08					
MJ637	1,2,3,4,7,8,9-HpCDF	1.3E-07	U	6.6E-08					
MJ637	1,2,3,4,7,8-HxCDD	2.1E-07	U	1.0E-07					
MJ637	1,2,3,4,7,8-HxCDF	7.8E-08	U	3.9E-08					
MJ637	1,2,3,6,7,8-HxCDD	2.2E-07	U	1.1E-07					
MJ637	1,2,3,6,7,8-HxCDF	7.8E-08	U	3.9E-08					
MJ637	1,2,3,7,8,9-HxCDD	2.1E-07	U	1.0E-07					
MJ637	1,2,3,7,8,9-HxCDF	1.6E-07	U	7.9E-08					
MJ637	1,2,3,7,8-PeCDD	1.0E-07	U	5.2E-08					
MJ637	1,2,3,7,8-PeCDF	1.3E-07	U	6.3E-08					
MJ637	2,3,4,6,7,8-HxCDF	9.2E-08	U	4.6E-08					
MJ637	2,3,4,7,8-PeCDF	1.2E-07	U	6.0E-08					
MJ637	2,3,7,8-TCDD	7.5E-08	U	3.8E-08					
MJ637	2,3,7,8-TCDF	9.7E-08	U	4.9E-08					
MJ637	OCDD	1.0E-05		1.0E-05					
MJ637	OCDF	2.8E-07	U	1.4E-07					
MJ645	1,2,3,4,6,7,8-HpCDD	1.2E-04		1.2E-04	5.8E-07	8.1E-07	7.9E-06	1.3E-04	1.8E-03
MJ645	1,2,3,4,6,7,8-HpCDF	1.0E-05		1.0E-05					
MJ645	1,2,3,4,7,8,9-HpCDF	1.1E-06	J	1.1E-06					
MJ645	1,2,3,4,7,8-HxCDD	1.1E-06	J	1.1E-06					
MJ645	1,2,3,4,7,8-HxCDF	7.5E-07	J	7.5E-07					
MJ645	1,2,3,6,7,8-HxCDD	3.2E-06		3.2E-06					
MJ645	1,2,3,6,7,8-HxCDF	4.5E-07	J	4.5E-07					
MJ645	1,2,3,7,8,9-HxCDD	1.5E-06	J	1.5E-06					
MJ645	1,2,3,7,8,9-HxCDF	4.1E-07	U	2.0E-07					
MJ645	1,2,3,7,8-PeCDD	3.2E-07	J	3.2E-07					
MJ645	1,2,3,7,8-PeCDF	1.7E-07	UJ	8.3E-08					
MJ645	2,3,4,6,7,8-HxCDF	8.0E-07	J	8.0E-07					
MJ645	2,3,4,7,8-PeCDF	4.1E-07	J	4.1E-07					
MJ645	2,3,7,8-TCDD	1.3E-07	U	6.4E-08					
MJ645	2,3,7,8-TCDF	5.2E-07	J	5.2E-07					
MJ645	OCDD	1.8E-03		1.8E-03					
MJ645	OCDF	3.0E-05		3.0E-05					

PCDD/PCDF Congener Group Summation for Soil/Sediment (0-10 feet bgs)
Sodium Reactor Experiment (SRE) Area

EPA ID	PCDD/PCDF Congener	Measured Concentration [a] (mg/kg)	Data Qualifier	Adjusted Concentration [b] (mg/kg)	Sum of PCDD/PCDF Congener Concentrations				
					Total Tetra (mg/kg)	Total Penta (mg/kg)	Total Hexa (mg/kg)	Total Hepta (mg/kg)	Total Octa (mg/kg)
MJ776	1,2,3,4,6,7,8-HpCDD	3.2E-04		3.2E-04	2.0E-07	6.5E-07	1.6E-05	3.7E-04	7.5E-03
MJ776	1,2,3,4,6,7,8-HpCDF	5.0E-05		5.0E-05					
MJ776	1,2,3,4,7,8,9-HpCDF	4.1E-06		4.1E-06					
MJ776	1,2,3,4,7,8-HxCDD	1.2E-06	J	1.2E-06					
MJ776	1,2,3,4,7,8-HxCDF	9.1E-07	J	9.1E-07					
MJ776	1,2,3,6,7,8-HxCDD	1.0E-05		1.0E-05					
MJ776	1,2,3,6,7,8-HxCDF	5.6E-07	J	5.6E-07					
MJ776	1,2,3,7,8,9-HxCDD	2.2E-06	J	2.2E-06					
MJ776	1,2,3,7,8,9-HxCDF	2.0E-07	U	9.8E-08					
MJ776	1,2,3,7,8-PeCDD	3.8E-07	J	3.8E-07					
MJ776	1,2,3,7,8-PeCDF	1.1E-07	U	5.6E-08					
MJ776	2,3,4,6,7,8-HxCDF	1.6E-06	J	1.6E-06					
MJ776	2,3,4,7,8-PeCDF	2.2E-07	J	2.2E-07					
MJ776	2,3,7,8-TCDD	1.9E-07	UJ	9.4E-08					
MJ776	2,3,7,8-TCDF	2.2E-07	U	1.1E-07					
MJ776	OCDD	7.3E-03		7.3E-03					
MJ776	OCDF	1.5E-04		1.5E-04					
MJ777	1,2,3,4,6,7,8-HpCDD	5.0E-04		5.0E-04	1.2E-06	2.9E-06	4.1E-05	5.5E-04	5.9E-03
MJ777	1,2,3,4,6,7,8-HpCDF	5.0E-05		5.0E-05					
MJ777	1,2,3,4,7,8,9-HpCDF	4.2E-06		4.2E-06					
MJ777	1,2,3,4,7,8-HxCDD	4.2E-06		4.2E-06					
MJ777	1,2,3,4,7,8-HxCDF	1.8E-06	J	1.8E-06					
MJ777	1,2,3,6,7,8-HxCDD	2.0E-05		2.0E-05					
MJ777	1,2,3,6,7,8-HxCDF	1.8E-06	J	1.8E-06					
MJ777	1,2,3,7,8,9-HxCDD	1.0E-05		1.0E-05					
MJ777	1,2,3,7,8,9-HxCDF	1.8E-07	J	1.8E-07					
MJ777	1,2,3,7,8-PeCDD	1.5E-06	J	1.5E-06					
MJ777	1,2,3,7,8-PeCDF	3.9E-07	J	3.9E-07					
MJ777	2,3,4,6,7,8-HxCDF	3.0E-06		3.0E-06					
MJ777	2,3,4,7,8-PeCDF	9.9E-07	J	9.9E-07					
MJ777	2,3,7,8-TCDD	4.0E-07	J	4.0E-07					
MJ777	2,3,7,8-TCDF	7.9E-07	J	7.9E-07					
MJ777	OCDD	5.8E-03		5.8E-03					
MJ777	OCDF	1.2E-04		1.2E-04					

Maximum of Total Summed Congener Concentrations	
Total Tetra	1.3E-06
Total Penta	4.4E-06
Total Hexa	6.8E-05
Total Hepta	1.4E-03
Total Octa	1.9E-02

Notes:

a. Measured concentration - concentration reported by the analytical laboratory

b. Adjusted concentration - concentration reported by the analytical laboratory if the chemical was detected, or estimated at one-half the sample quantitation limit (SQL) limit if not detected.

PCDD/PCDF - polychlorinated dibenzo-p-dioxins and dibenzofurans

Total Tetra - sum of the 2,3,7,8-substituted tetraclorinated dibenzo-p-dioxin and dibenzofuran congeners.

Total Penta - sum of the 2,3,7,8-substituted pentaclorinated dibenzo-p-dioxin and dibenzofuran congeners.

Total Hexa - sum of the 2,3,7,8-substituted hexaclorinated dibenzo-p-dioxin and dibenzofuran congeners.

Total Hepta - sum of the 2,3,7,8-substituted heptaclorinated dibenzo-p-dioxin and dibenzofuran congeners.

Total Octa - sum of the 2,3,7,8-substituted Octaclorinated dibenzo-p-dioxin and dibenzofuran congeners.

J - concentration estimated

U - not detected. Concentration shown is the SQL.

UJ - not detected. Concentration shown is the estimated SQL.

mg/kg - milligrams per kilogram

bgs- below ground surface

PCDD/PCDF Congener Group Summation for Soil/Sediment (0-2 feet bgs)
Sodium Reactor Experiment (SRE) Area

EPA ID	PCDD/PCDF Congener	Measured Concentration [a] (mg/kg)	Data Qualifier	Adjusted Concentration [b] (mg/kg)	Sum of PCDD/PCDF Congener Concentrations				
					Total Tetra (mg/kg)	Total Penta (mg/kg)	Total Hexa (mg/kg)	Total Hepta (mg/kg)	Total Octa (mg/kg)
MJ636	1,2,3,4,6,7,8-HpCDD	1.3E-03		1.3E-03	1.3E-06	4.4E-06	6.8E-05	1.4E-03	1.9E-02
MJ636	1,2,3,4,6,7,8-HpCDF	1.0E-04	J	1.0E-04					
MJ636	1,2,3,4,7,8,9-HpCDF	1.0E-05		1.0E-05					
MJ636	1,2,3,4,7,8-HxCDD	1.0E-05		1.0E-05					
MJ636	1,2,3,4,7,8-HxCDF	3.7E-06		3.7E-06					
MJ636	1,2,3,6,7,8-HxCDD	3.0E-05		3.0E-05					
MJ636	1,2,3,6,7,8-HxCDF	3.4E-06		3.4E-06					
MJ636	1,2,3,7,8,9-HxCDD	1.0E-05		1.0E-05					
MJ636	1,2,3,7,8,9-HxCDF	9.7E-07	J	9.7E-07					
MJ636	1,2,3,7,8-PeCDD	2.2E-06	J	2.2E-06					
MJ636	1,2,3,7,8-PeCDF	5.8E-07	J	5.8E-07					
MJ636	2,3,4,6,7,8-HxCDF	1.0E-05		1.0E-05					
MJ636	2,3,4,7,8-PeCDF	1.6E-06	J	1.6E-06					
MJ636	2,3,7,8-TCDD	5.3E-07		5.3E-07					
MJ636	2,3,7,8-TCDF	7.9E-07	J	7.9E-07					
MJ636	OCDD	1.9E-02		1.9E-02					
MJ636	OCDF	2.4E-04		2.4E-04					
MJ645	1,2,3,4,6,7,8-HpCDD	1.2E-04		1.2E-04	5.8E-07	8.1E-07	7.9E-06	1.3E-04	1.8E-03
MJ645	1,2,3,4,6,7,8-HpCDF	1.0E-05		1.0E-05					
MJ645	1,2,3,4,7,8,9-HpCDF	1.1E-06	J	1.1E-06					
MJ645	1,2,3,4,7,8-HxCDD	1.1E-06	J	1.1E-06					
MJ645	1,2,3,4,7,8-HxCDF	7.5E-07	J	7.5E-07					
MJ645	1,2,3,6,7,8-HxCDD	3.2E-06		3.2E-06					
MJ645	1,2,3,6,7,8-HxCDF	4.5E-07	J	4.5E-07					
MJ645	1,2,3,7,8,9-HxCDD	1.5E-06	J	1.5E-06					
MJ645	1,2,3,7,8,9-HxCDF	4.1E-07	U	2.0E-07					
MJ645	1,2,3,7,8-PeCDD	3.2E-07	J	3.2E-07					
MJ645	1,2,3,7,8-PeCDF	1.7E-07	UJ	8.3E-08					
MJ645	2,3,4,6,7,8-HxCDF	8.0E-07	J	8.0E-07					
MJ645	2,3,4,7,8-PeCDF	4.1E-07	J	4.1E-07					
MJ645	2,3,7,8-TCDD	1.3E-07	U	6.4E-08					
MJ645	2,3,7,8-TCDF	5.2E-07	J	5.2E-07					
MJ645	OCDD	1.8E-03		1.8E-03					
MJ645	OCDF	3.0E-05		3.0E-05					
MJ776	1,2,3,4,6,7,8-HpCDD	3.2E-04		3.2E-04	2.0E-07	6.5E-07	1.6E-05	3.7E-04	7.5E-03
MJ776	1,2,3,4,6,7,8-HpCDF	5.0E-05		5.0E-05					
MJ776	1,2,3,4,7,8,9-HpCDF	4.1E-06		4.1E-06					
MJ776	1,2,3,4,7,8-HxCDD	1.2E-06	J	1.2E-06					
MJ776	1,2,3,4,7,8-HxCDF	9.1E-07	J	9.1E-07					
MJ776	1,2,3,6,7,8-HxCDD	1.0E-05		1.0E-05					
MJ776	1,2,3,6,7,8-HxCDF	5.6E-07	J	5.6E-07					
MJ776	1,2,3,7,8,9-HxCDD	2.2E-06	J	2.2E-06					
MJ776	1,2,3,7,8,9-HxCDF	2.0E-07	U	9.8E-08					
MJ776	1,2,3,7,8-PeCDD	3.8E-07	J	3.8E-07					
MJ776	1,2,3,7,8-PeCDF	1.1E-07	U	5.6E-08					
MJ776	2,3,4,6,7,8-HxCDF	1.6E-06	J	1.6E-06					
MJ776	2,3,4,7,8-PeCDF	2.2E-07	J	2.2E-07					
MJ776	2,3,7,8-TCDD	1.9E-07	UJ	9.4E-08					
MJ776	2,3,7,8-TCDF	2.2E-07	U	1.1E-07					
MJ776	OCDD	7.3E-03		7.3E-03					
MJ776	OCDF	1.5E-04		1.5E-04					

PCDD/PCDF Congener Group Summation for Soil/Sediment (0-2 feet bgs)
Sodium Reactor Experiment (SRE) Area

EPA ID	PCDD/PCDF Congener	Measured Concentration [a] (mg/kg)	Data Qualifier	Adjusted Concentration [b] (mg/kg)	Sum of PCDD/PCDF Congener Concentrations				
					Total Tetra (mg/kg)	Total Penta (mg/kg)	Total Hexa (mg/kg)	Total Hepta (mg/kg)	Total Octa (mg/kg)
MJ777	1,2,3,4,6,7,8-HpCDD	5.0E-04		5.0E-04	1.2E-06	2.9E-06	4.1E-05	5.5E-04	5.9E-03
MJ777	1,2,3,4,6,7,8-HpCDF	5.0E-05		5.0E-05					
MJ777	1,2,3,4,7,8,9-HpCDF	4.2E-06		4.2E-06					
MJ777	1,2,3,4,7,8-HxCDD	4.2E-06		4.2E-06					
MJ777	1,2,3,4,7,8-HxCDF	1.8E-06	J	1.8E-06					
MJ777	1,2,3,6,7,8-HxCDD	2.0E-05		2.0E-05					
MJ777	1,2,3,6,7,8-HxCDF	1.8E-06	J	1.8E-06					
MJ777	1,2,3,7,8,9-HxCDD	1.0E-05		1.0E-05					
MJ777	1,2,3,7,8,9-HxCDF	1.8E-07	J	1.8E-07					
MJ777	1,2,3,7,8-PeCDD	1.5E-06	J	1.5E-06					
MJ777	1,2,3,7,8-PeCDF	3.9E-07	J	3.9E-07					
MJ777	2,3,4,6,7,8-HxCDF	3.0E-06		3.0E-06					
MJ777	2,3,4,7,8-PeCDF	9.9E-07	J	9.9E-07					
MJ777	2,3,7,8-TCDD	4.0E-07	J	4.0E-07					
MJ777	2,3,7,8-TCDF	7.9E-07	J	7.9E-07					
MJ777	OCDD	5.8E-03		5.8E-03					
MJ777	OCDF	1.2E-04		1.2E-04					
				MAX	1.3E-06	4.4E-06	6.8E-05	1.4E-03	1.9E-02

Maximum of Total Summed Congener Concentrations

Total Tetra	1.3E-06
Total Penta	4.4E-06
Total Hexa	6.8E-05
Total Hepta	1.4E-03
Total Octa	1.9E-02

Notes:

a. Measured concentration - concentration reported by the analytial laboratory

b. Adjusted concentration - concentration reported by the analytical laboratory if the chemical was detected, or estimated at one-half the sample quantitation limit (SQL) if not detected.

PCDD/PCDF - polychlorinated dibenzo-p-dioxins and dibenzofurans

Total Tetra - sum of the 2,3,7,8-substituted tetraclorinated dibenzo-p-dioxin and dibenzofuran congeners.

Total Penta - sum of the 2,3,7,8-substituted pentaclorinated dibenzo-p-dioxin and dibenzofuran congeners.

Total Hexa - sum of the 2,3,7,8-substituted hexaclorinated dibenzo-p-dioxin and dibenzofuran congeners.

Total Hepta - sum of the 2,3,7,8-substituted heptaclorinated dibenzo-p-dioxin and dibenzofuran congeners.

Total Octa - sum of the 2,3,7,8-substituted Octaclorinated dibenzo-p-dioxin and dibenzofuran congeners.

J - concentration estimated

U - not detected. Concentration shown is the SQL.

UJ - not detected. Concentration shown is the estimated SQL.

mg/kg - milligrams per kilogram

bgs- below ground surface

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Comparison of Inorganic Compound Concentrations in Near-Surface Groundwater Against Background
Sodium Reactor Experiment (SRE) Area

Inorganic Compounds	Maximum Background [a] (mg/L)	95% UCL Background (mg/L)	Maximum RFI Site (mg/L)	RFI Site Ever Detected?	RFI Site Exceeds Background?
Aluminum	-	-	-	No	No
Antimony	2.6E-03	2.6E-03	-	No	No
Arsenic	1.1E-02	1.1E-02	-	No	No
Barium	3.2E-01	3.2E-01	-	No	No
Beryllium	6.0E-04	6.0E-04	-	No	No
Boron	3.4E-01	3.4E-01	-	No	No
Cadmium	3.0E-03	3.0E-03	-	No	No
Chromium	1.4E-02	1.4E-02	-	No	No
Cobalt	3.7E-03	3.7E-03	-	No	No
Copper	1.0E-02	1.0E-02	1.8E-02	Yes	Yes
Fluoride	-	-	5.6E-01	Yes	Yes
Lead	1.8E-02	1.8E-02	-	No	No
Manganese	5.5E-01	5.5E-01	-	No	No
Mercury	3.2E-04	3.2E-04	-	No	No
Molybdenum	2.5E-03	2.5E-03	-	No	No
Nickel	2.5E-02	2.5E-02	-	No	No
Nitrate	-	-	1.4E+01	Yes	Yes
Selenium	6.0E-03	6.0E-03	-	No	No
Silver	3.5E-03	3.5E-03	-	No	No
Thallium	5.1E-04	5.1E-04	5.4E-04	Yes	Yes
Vanadium	4.7E-03	4.7E-03	-	No	No
Zinc	5.3E+00	5.3E+00	-	No	No

Notes:

a. The concentrations of inorganic compounds for which background data are not available are considered to be above background concentrations if they are detected and are potentially site-related.

mg/L - milligrams per liter

bgs- below ground surface

Comparison of Inorganic Compound and PCDD/PCDF Concentrations in Soil/Sediment (0-10 feet bgs) Against Background [a]
Sodium Reactor Experiment (SRE) Area

PCDD/PCDF Congener Groups	Maximum Background (mg/kg)	Maximum RFI Site (mg/kg)	Results of Wilcoxon-Rank Sum Test	RFI Site Ever Detected?	RFI Site Exceeds Background?	
Total Tetra	9.5E-07	1.3E-06	No	Yes	Yes	b,e
Total Penta	8.7E-07	4.4E-06	No	Yes	Yes	b,e
Total Hexa	5.1E-06	6.8E-05	No	Yes	Yes	b,e
Total Hepta	1.6E-05	1.4E-03	No	Yes	Yes	b,e
Total Octa	1.5E-04	1.9E-02	No	Yes	Yes	b,e

Inorganic Compounds	Maximum Background [a] (mg/kg)	Maximum RFI Site (mg/kg)	Results of Wilcoxon-Rank Sum Test	RFI Site Ever Detected?	RFI Site Exceeds Background?	
Aluminum	2.0E+04	2.2E+04	No	Yes	No	d
Antimony	8.7E+00	9.3E-01	No	Yes	No	d
Arsenic	1.5E+01	9.0E+00	No	Yes	No	d
Barium	1.4E+02	2.0E+02	No	Yes	No	d
Beryllium	1.1E+00	1.4E+00	No	Yes	No	d
Boron	9.7E+00	1.0E+01	No	Yes	No	d
Cadmium	1.0E+00	4.6E+00	No	Yes	Yes	c,e
Chromium	3.7E+01	4.1E+01	No	Yes	No	d
Hexavalent chromium		5.5E-01	Yes	No	No	c
Cobalt	2.1E+01	1.5E+01	No	Yes	No	d
Copper	2.9E+01	1.3E+02	No	Yes	Yes	c,e
Lead	3.4E+01	9.0E+01	No	Yes	Yes	c,e
Manganese	5.0E+02	9.1E+02	No	Yes	No	d
Methyl mercury		3.6E-03	Yes	Yes	Yes	
Mercury	9.0E-02	3.5E+01	Yes	Yes	Yes	
Molybdenum	5.3E+00	7.1E-01	No	Yes	No	d
Nickel	2.9E+01	2.4E+01	No	Yes	No	d
Selenium	6.6E-01	1.0E+00	No	Yes	No	d
Silver	7.9E-01	1.1E+01	No	Yes	Yes	c,e
Thallium	4.6E-01	4.0E+00	No	Yes	Yes	c,e
Vanadium	6.2E+01	7.7E+01	No	Yes	No	d
Zinc	1.1E+02	1.5E+03	No	Yes	Yes	c,e

Notes:

a. The concentrations of inorganic compounds for which soil background data are not available are considered to be above background concentrations if they are detected and are potentially site-related.

b. Determined be within the range of background since the RFI site sample population for soils at 0 to 10 feet bgs was found to be no different than the background sample population at p=0.01 based on the Wilcoxon Rank Sum Test.

c. Maximum RFI Site concentration is equal to half the maximum detection limit.

d. Determined be within the range of background since the RFI site sample population for soils at 0 to 10 feet bgs was found to be no different than the background sample population at p=0.05 based on the Wilcoxon Rank Sum Test.

e. Determined to be within the range of background but was selected as a COPC because of spatial extent of the highest detections.

PCDD/PCDF - polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.

Total Tetra - sum of the 2,3,7,8-substituted tetrachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations.

Total Penta - sum of the 2,3,7,8-substituted pentachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations.

Total Hexa - sum of the 2,3,7,8-substituted hexachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations.

Total Hepta - sum of the 2,3,7,8-substituted heptachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations.

Total Octa - sum of the octachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations.

95% UCL - 95 percent upper confidence limit on the mean

mg/kg - milligrams per kilogram

bgs- below ground surface

Comparison of Inorganic Compound and PCDD/PCDF Concentrations in Soil/Sediment (0-2 feet bgs) Against Background [a]
Sodium Reactor Experiment (SRE) Area

PCDD/PCDF Congener Groups	Maximum Background (mg/kg)	Maximum RFI Site (mg/kg)	Results of Wilcoxon-Rank Sum Test	RFI Site Ever Detected?	RFI Site Exceeds Background?	
Total Tetra	9.5E-07	1.3E-06	No	Yes	No	b
Total Penta	8.7E-07	4.4E-06	No	Yes	No	b
Total Hexa	5.1E-06	6.8E-05	No	Yes	No	b
Total Hepta	1.6E-05	1.4E-03	Yes	Yes	Yes	
Total Octa	1.5E-04	1.9E-02	Yes	Yes	Yes	

Inorganic Compounds	Maximum Background [a] (mg/kg)	Maximum RFI Site (mg/kg)	Results of Wilcoxon-Rank Sum Test	RFI Site Ever Detected?	RFI Site Exceeds Background?	
Aluminum	2.0E+04	1.5E+04	No	Yes	No	c
Antimony	8.7E+00	8.6E-01	No	Yes	No	c
Arsenic	1.5E+01	9.0E+00	No	Yes	No	c
Barium	1.4E+02	2.0E+02	No	Yes	No	c
Beryllium	1.1E+00	1.4E+00	No	Yes	No	c
Boron	9.7E+00	1.0E+01	No	Yes	No	c
Cadmium	1.0E+00	4.6E+00	No	Yes	Yes	c,e
Chromium	3.7E+01	4.1E+01	No	Yes	No	c
Hexavalent chromium		5.5E-01	Yes	No	No	d
Cobalt	2.1E+01	1.5E+01	No	Yes	No	c
Copper	2.9E+01	1.3E+02	No	Yes	Yes	c,e
Lead	3.4E+01	9.0E+01	No	Yes	Yes	c,e
Manganese	5.0E+02	9.1E+02	No	Yes	No	c
Methyl mercury	9.0E-02	3.6E-03	Yes	Yes	Yes	
Mercury	9.0E-02	3.5E+01	Yes	Yes	Yes	
Molybdenum	5.3E+00	6.5E-01	No	Yes	No	c
Nickel	2.9E+01	2.4E+01	No	Yes	No	c
Selenium	6.6E-01	7.7E-01	No	Yes	No	c
Silver	7.9E-01	4.8E+00	No	Yes	Yes	c,e
Thallium	4.6E-01	3.3E-01	No	Yes	Yes	c,e
Vanadium	6.2E+01	7.7E+01	No	Yes	No	c
Zinc	1.1E+02	1.5E+03	No	Yes	Yes	c,e

Notes:

a. The concentrations of inorganic compounds for which soil background data are not available are considered to be above background concentrations if they are detected and are potentially site-related.

b. Determined be within the range of background since the RFI site sample population for soils at 0 to 2 feet bgs was found to be no different than the background sample population at p=0.01 based on the Wilcoxon Rank Sum Test.

c. Determined be within the range of background since the RFI site sample population for soils at 0 to 2 feet bgs was found to be no different than the background sample population at p=0.05 based on the Wilcoxon Rank Sum Test.

d. Maximum RFI Site concentration is equal to half the maximum detection limit.

e. Determined to be within the range of background but was selected as a COPC because of spatial extent of the highest detections.

PCDD/PCDF - Polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.

Total Tetra - sum of the 2,3,7,8-substituted tetrachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations.

Total Penta - sum of the 2,3,7,8-substituted pentachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations.

Total Hexa - sum of the 2,3,7,8-substituted hexachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations.

Total Hepta - sum of the 2,3,7,8-substituted heptachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations.

Total Octa - sum of the octachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations.

mg/kg - milligrams per kilogram

bgs- below ground surface

Selection of Chemicals of Potential Concern in Surface Water
Sodium Reactor Experiment (SRE) Area

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (µg/L)	Potentially Site Related	Chemical Detected in Laboratory Blanks [a]	COPC
Inorganic Compounds							
Aluminum	2	2	100	1.7E+03	Yes	No	Yes
Antimony	24	20	83	4.0E+00	Yes	No	Yes
Arsenic	2	1	50	1.1E+01	Yes	No	Yes
Beryllium	2	0	0	0.0E+00	Yes	No	No
Boron	2	0	0	0.0E+00	Yes	No	No
Cadmium	24	20	83	2.8E-01	Yes	No	Yes
Chromium	2	2	100	3.4E+00	Yes	No	Yes
Copper	24	24	100	1.5E+01	Yes	No	Yes
Cyanide	2	0	0	0.0E+00	No	No	No
Lead	24	24	100	2.8E+00	Yes	No	Yes
Mercury	24	16	67	2.3E-01	Yes	No	Yes
Nickel	2	1	50	4.1E+00	Yes	No	Yes
Nitrate/Nitrite-N	24	24	100	7.4E+03	Yes	No	No
Perchlorate	3	0	0	0.0E+00	Yes	No	No
Selenium	2	0	0	0.0E+00	Yes	No	No
Silver	2	0	0	0.0E+00	Yes	No	No
Thallium	8	2	25	2.1E-01	Yes	No	Yes
Vanadium	2	2	100	5.7E+00	Yes	No	Yes
Zinc	2	0	0	0.0E+00	Yes	No	No
VOCs							
1,1,1-Trichloroethane	2	1	50	7.6E-01	Yes	No	Yes
1,1,2,2-Tetrachloroethane	2	0	0	0.0E+00	Yes	No	No
1,1,2-Trichloro-1,2,2-trifluoroethane	1	0	0	0.0E+00	Yes	No	No
1,1,2-Trichloroethane	2	0	0	0.0E+00	Yes	No	No
1,1-Dichloroethane	2	0	0	0.0E+00	Yes	No	No
1,1-Dichloroethene	2	0	0	0.0E+00	Yes	No	No
1,2,4-Trichlorobenzene	2	0	0	0.0E+00	Yes	No	No
1,2-Dichlorobenzene	2	0	0	0.0E+00	Yes	No	No
1,2-Dichloroethane	2	0	0	0.0E+00	Yes	No	No
1,2-Dichloropropane	2	0	0	0.0E+00	Yes	No	No
1,3-Dichlorobenzene	2	0	0	0.0E+00	Yes	No	No
1,4-Dichlorobenzene	2	0	0	0.0E+00	Yes	No	No
2-Chloroethylvinylether	2	0	0	0.0E+00	Yes	No	No
Acrylonitrile	2	0	0	0.0E+00	Yes	No	No
Benzene	2	0	0	0.0E+00	Yes	No	No
Benzidine	2	0	0	0.0E+00	Yes	No	No
Bromodichloromethane	2	0	0	0.0E+00	Yes	No	No
Bromoform	2	0	0	0.0E+00	Yes	No	No
Bromomethane	2	0	0	0.0E+00	Yes	No	No
Carbon tetrachloride	2	0	0	0.0E+00	Yes	No	No
Chlorobenzene	2	0	0	0.0E+00	Yes	No	No
Chloroethane	2	0	0	0.0E+00	Yes	No	No
Chloroform	2	0	0	0.0E+00	Yes	No	No
Chloromethane	2	0	0	0.0E+00	Yes	No	No
cis-1,3-Dichloropropene	2	0	0	0.0E+00	Yes	No	No
Dibromochloromethane	2	0	0	0.0E+00	Yes	No	No

Selection of Chemicals of Potential Concern in Surface Water
Sodium Reactor Experiment (SRE) Area

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (µg/L)	Potentially Site Related	Chemical Detected in Laboratory Blanks [a]	COPC
Ethylbenzene	2	0	0	0.0E+00	Yes	No	No
Methylene chloride	2	0	0	0.0E+00	Yes	No	No
Tetrachloroethene	2	0	0	0.0E+00	Yes	No	No
Toluene	2	0	0	0.0E+00	Yes	No	No
trans-1,2-Dichloroethene	2	0	0	0.0E+00	Yes	No	No
trans-1,3-Dichloropropene	2	0	0	0.0E+00	Yes	No	No
Trichloroethene	2	1	50	6.6E-01	Yes	No	Yes
Trichlorofluoromethane	2	0	0	0.0E+00	Yes	No	No
Vinyl chloride	2	0	0	0.0E+00	Yes	No	No
SVOCs							
1,2-Diphenylhydrazine	2	0	0	0.0E+00	No	No	No
2,4,5-Trichlorophenol	2	0	0	0.0E+00	No	No	No
2,4,6-Trichlorophenol	2	0	0	0.0E+00	No	No	No
2,4-Dichlorophenol	2	0	0	0.0E+00	No	No	No
2,4-Dimethylphenol	2	0	0	0.0E+00	No	No	No
2,4-Dinitrophenol	2	0	0	0.0E+00	No	No	No
2,4-Dinitrotoluene	2	0	0	0.0E+00	No	No	No
2,6-Dinitrotoluene	2	0	0	0.0E+00	No	No	No
2-Chloronaphthalene	2	0	0	0.0E+00	No	No	No
2-Chlorophenol	2	0	0	0.0E+00	No	No	No
2-Methylnaphthalene	2	0	0	0.0E+00	No	No	No
2-Methylphenol	2	0	0	0.0E+00	No	No	No
2-Nitroaniline	2	0	0	0.0E+00	No	No	No
2-Nitrophenol	2	0	0	0.0E+00	No	No	No
4-Methylphenol	2	0	0	0.0E+00	No	No	No
3,3'-Dichlorobenzidine	2	0	0	0.0E+00	No	No	No
3-Nitroaniline	2	0	0	0.0E+00	No	No	No
4,6-Dinitro-2-methylphenol	2	0	0	0.0E+00	No	No	No
4-Bromophenyl phenyl ether	2	0	0	0.0E+00	No	No	No
4-Chloro-3-methylphenol	2	0	0	0.0E+00	No	No	No
4-Chloroaniline	2	0	0	0.0E+00	No	No	No
4-Chlorophenyl phenyl ether	2	0	0	0.0E+00	No	No	No
4-Nitroaniline	2	0	0	0.0E+00	No	No	No
4-Nitrophenol	2	0	0	0.0E+00	No	No	No
Acenaphthene	2	0	0	0.0E+00	Yes	No	No
Acenaphthylene	2	0	0	0.0E+00	Yes	No	No
Aniline	2	0	0	0.0E+00	No	No	No
Anthracene	2	0	0	0.0E+00	Yes	No	No
Benzo(a)anthracene	2	0	0	0.0E+00	Yes	No	No
Benzo(a)pyrene	2	0	0	0.0E+00	Yes	No	No
Benzo(b)fluoranthene	2	0	0	0.0E+00	Yes	No	No
Benzo(g,h,i)perylene	2	0	0	0.0E+00	Yes	No	No
Benzo(k)fluoranthene	2	0	0	0.0E+00	Yes	No	No
Benzoic acid	2	0	0	0.0E+00	No	No	No
Benzyl alcohol	2	0	0	0.0E+00	No	No	No
bis(2-Chloroethoxy)methane	2	0	0	0.0E+00	No	No	No
bis(2-Chloroethyl)ether	2	0	0	0.0E+00	No	No	No

Selection of Chemicals of Potential Concern in Surface Water
Sodium Reactor Experiment (SRE) Area

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (µg/L)	Potentially Site Related	Chemical Detected in Laboratory Blanks [a]	COPC
bis(2-Chloroisopropyl) ether	2	0	0	0.0E+00	No	No	No
bis(2-Ethylhexyl)phthalate	2	0	0	0.0E+00	No	No	No
Butyl benzyl phthalate	2	0	0	0.0E+00	No	No	No
Chrysene	2	0	0	0.0E+00	Yes	No	No
Dibenz(a,h)anthracene	2	0	0	0.0E+00	Yes	No	No
Dibenzofuran	2	0	0	0.0E+00	No	No	No
Diethylphthalate	2	0	0	0.0E+00	No	No	No
Dimethyl phthalate	2	0	0	0.0E+00	No	No	No
Di-n-butylphthalate	2	0	0	0.0E+00	No	No	No
Di-n-octyl phthalate	2	0	0	0.0E+00	No	No	No
Fluoranthene	2	0	0	0.0E+00	Yes	No	No
Fluorene	2	0	0	0.0E+00	Yes	No	No
Hexachlorobenzene	2	0	0	0.0E+00	No	No	No
Hexachlorobutadiene	2	0	0	0.0E+00	No	No	No
Hexachlorocyclopentadiene	2	0	0	0.0E+00	No	No	No
Hexachloroethane	2	0	0	0.0E+00	No	No	No
Indeno(1,2,3-cd)pyrene	2	0	0	0.0E+00	Yes	No	No
Isophorone	2	0	0	0.0E+00	No	No	No
Naphthalene	2	0	0	0.0E+00	Yes	No	No
Nitrobenzene	2	0	0	0.0E+00	No	No	No
N-Nitrosodimethylamine	2	0	0	0.0E+00	No	No	No
N-Nitrosodi-n-propylamine	2	0	0	0.0E+00	No	No	No
N-Nitrosodiphenylamine	2	0	0	0.0E+00	No	No	No
Pentachlorophenol	2	0	0	0.0E+00	No	No	No
Phenanthrene	2	0	0	0.0E+00	Yes	No	No
Phenol	2	0	0	0.0E+00	No	No	No
Pyrene	2	0	0	0.0E+00	Yes	No	No
Total Petroleum Hydrocarbons							
Oil & Grease	24	9	38	6.2E+03	Yes	No	No
Pesticides							
4,4'-DDD	2	0	0	0.0E+00	No	No	No
4,4'-DDE	2	0	0	0.0E+00	No	No	No
4,4'-DDT	2	0	0	0.0E+00	No	No	No
a-BHC	2	0	0	0.0E+00	No	No	No
Aldrin	2	0	0	0.0E+00	No	No	No
b-BHC	2	0	0	0.0E+00	No	No	No
Chlordane	2	0	0	0.0E+00	No	No	No
d-BHC	2	0	0	0.0E+00	No	No	No
Dieldrin	2	0	0	0.0E+00	No	No	No
Endosulfan I	2	0	0	0.0E+00	No	No	No
Endosulfan II	2	0	0	0.0E+00	No	No	No
Endosulfan sulfate	2	0	0	0.0E+00	No	No	No
Endrin	2	0	0	0.0E+00	No	No	No
Endrin aldehyde	2	0	0	0.0E+00	No	No	No
Endrin ketone	2	0	0	0.0E+00	No	No	No
Heptachlor	2	0	0	0.0E+00	No	No	No

Selection of Chemicals of Potential Concern in Surface Water
Sodium Reactor Experiment (SRE) Area

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (µg/L)	Potentially Site Related	Chemical Detected in Laboratory Blanks [a]	COPC
Heptachlor epoxide	2	0	0	0.0E+00	No	No	No
Lindane (gamma-BHC)	2	0	0	0.0E+00	No	No	No
Methoxychlor	2	0	0	0.0E+00	No	No	No
Toxaphene	2	0	0	0.0E+00	No	No	No
PCDD/PCDFs							
2,3,7,8-TCDD	24	0	0	0.0E+00	Yes	No	No
1,2,3,7,8-PeCDD	24	1	4	1.7E-06	Yes	No	Yes
1,2,3,4,7,8-HxCDD	24	1	4	2.5E-06	Yes	No	Yes
1,2,3,6,7,8-HxCDD	24	5	21	2.3E-04	Yes	No	Yes
1,2,3,7,8,9-HxCDD	24	2	8	1.4E-05	Yes	No	Yes
1,2,3,4,6,7,8-HpCDD	24	18	75	4.1E-03	Yes	No	Yes
OCDD	24	21	88	3.0E-02	Yes	No	Yes
2,3,7,8-TCDF	24	2	8	7.4E-06	Yes	No	Yes
1,2,3,7,8-PeCDF	24	2	8	7.2E-06	Yes	No	Yes
2,3,4,7,8-PeCDF	24	2	8	2.0E-05	Yes	No	Yes
1,2,3,4,7,8-HxCDF	24	3	13	3.6E-05	Yes	No	Yes
1,2,3,6,7,8-HxCDF	24	1	4	1.1E-05	Yes	No	Yes
2,3,4,6,7,8-HxCDF	24	2	8	2.7E-05	Yes	No	Yes
1,2,3,7,8,9-HxCDF	24	1	4	2.3E-05	Yes	No	Yes
1,2,3,4,6,7,8-HpCDF	24	16	67	3.8E-04	Yes	No	Yes
1,2,3,4,7,8,9-HpCDF	24	1	4	1.4E-05	Yes	No	Yes
OCDF	24	15	63	1.0E-03	Yes	No	Yes
PCBs							
Aroclor-1016	2	0	0	0.0E+00	No	No	No
Aroclor-1221	2	0	0	0.0E+00	No	No	No
Aroclor-1232	2	0	0	0.0E+00	No	No	No
Aroclor-1242	2	0	0	0.0E+00	No	No	No
Aroclor-1248	2	0	0	0.0E+00	No	No	No
Aroclor-1254	2	0	0	0.0E+00	Yes	No	No
Aroclor-1260	2	0	0	0.0E+00	Yes	No	No

Notes:
a. Any chemical eliminated as COPC due to laboratory blank contamination is discussed in Section 3.0.
COPC - chemical of potential concern
VOC - volatile organic chemicals
SVOC - semivolatile organic chemicals
PCBs - polychlorinated biphenyls
PCDD/PDDFs - polychlorinated dibenzo-p-dioxins and dibenzofurans
"-" not applicable
µg/L - milligrams per liter

Selection of Chemicals of Potential Concern in Chatsworth Formation Groundwater
Sodium Reactor Experiment (SRE) Area

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (mg/L)	Potentially Site Related	Chemical Detected in Laboratory Blanks [a]	Maximum Detected Concentration Exceeds Background [b]	COPC	
Inorganic Compounds									
Copper	10	9	90	1.8E-02	No	No	Yes	Yes	
Fluoride	10	10	100	5.6E-01	No	No	Yes	Yes	
Nitrate	10	5	50	1.4E+01	No	No	Yes	Yes	
Thallium	8	2	25	5.4E-04	No	No	Yes	Yes	
VOCs									
1,1,1-Trichloroethane	34	0	0	0.0E+00	No	No	-	No	
1,1,2-Trichloro-1,2,2-trifluoroethane	28	0	0	0.0E+00	No	No	-	No	
1,1-Dichloroethane	34	1	3	2.6E-03	No	No	-	Yes	c
1,1-Dichloroethene	34	0	0	0.0E+00	No	No	-	No	
1,2-Dichloroethane	34	1	3	9.0E-04	No	No	-	Yes	c
2-Butanone	27	0	0	0.0E+00	No	No	-	No	
2-Hexanone	26	0	0	0.0E+00	No	No	-	No	
4-Isopropyltoluene	1	0	0	0.0E+00	No	No	-	No	
Acetone	28	7	25	1.6E-02	No	No	-	Yes	
Benzene	29	1	3	5.8E-04	No	No	-	Yes	c
Carbon disulfide	26	1	4	2.6E-03	No	No	-	Yes	c
Chloromethane	34	3	9	3.2E-04	No	No	-	Yes	
cis-1,2-Dichloroethene	32	5	16	5.1E-02	No	No	-	Yes	
Ethylbenzene	29	0	0	0.0E+00	No	No	-	No	
m,p-Xylene	26	0	0	0.0E+00	No	No	-	No	
Methylene chloride	34	1	3	6.4E-04	No	No	-	Yes	c
o-Xylene	26	0	0	0.0E+00	No	No	-	No	
Tetrachloroethene	34	0	0	0.0E+00	No	No	-	No	
Toluene	29	1	3	1.8E-03	No	No	-	Yes	c
trans-1,2-Dichloroethene	34	0	0	0.0E+00	No	No	-	No	
Trichloroethene	34	12	35	1.0E-02	No	No	-	Yes	
SVOCs									
2,4-Dinitrophenol	11	0	0	0.0E+00	No	No	-	No	
2-Methylnaphthalene	1	0	0	0.0E+00	No	No	-	No	
Acenaphthene	7	0	0	0.0E+00	No	No	-	No	
Acenaphthylene	7	0	0	0.0E+00	No	No	-	No	
Anthracene	7	0	0	0.0E+00	No	No	-	No	
Benzo(a)anthracene	7	0	0	0.0E+00	No	No	-	No	
Benzo(a)pyrene	7	0	0	0.0E+00	No	No	-	No	
Benzo(b)fluoranthene	7	0	0	0.0E+00	No	No	-	No	
Benzo(g,h,i)perylene	7	0	0	0.0E+00	No	No	-	No	
Benzo(k)fluoranthene	7	0	0	0.0E+00	No	No	-	No	
Chrysene	7	0	0	0.0E+00	No	No	-	No	
Dibenz(a,h)anthracene	7	0	0	0.0E+00	No	No	-	No	
Dibenzofuran	1	0	0	0.0E+00	No	No	-	No	
Fluoranthene	7	0	0	0.0E+00	No	No	-	No	
Fluorene	7	0	0	0.0E+00	No	No	-	No	
Indeno(1,2,3-cd)pyrene	7	0	0	0.0E+00	No	No	-	No	
Naphthalene	7	0	0	0.0E+00	No	No	-	No	
Phenanthrene	7	0	0	0.0E+00	No	No	-	No	
Pyrene	4	0	0	0.0E+00	No	No	-	No	

Selection of Chemicals of Potential Concern in Chatsworth Formation Groundwater
Sodium Reactor Experiment (SRE) Area

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (mg/L)	Potentially Site Related	Chemical Detected in Laboratory Blanks [a]	Maximum Detected Concentration Exceeds Background [b]	COPC
Total Petroleum Hydrocarbons								
C14-C20(Diesel Range)	1	1	100	5.0E-02	No	No	-	Yes
PCDD/PCDFs								
2,3,7,8-TCDD	1	0	0	0.0E+00	No	No	-	No
1,2,3,7,8-PeCDD	1	0	0	0.0E+00	No	No	-	No
1,2,3,4,7,8-HxCDD	1	0	0	0.0E+00	No	No	-	No
1,2,3,6,7,8-HxCDD	1	0	0	0.0E+00	No	No	-	No
1,2,3,7,8,9-HxCDD	1	0	0	0.0E+00	No	No	-	No
1,2,3,4,6,7,8-HpCDD	1	0	0	0.0E+00	No	No	-	No
OCDD	1	0	0	0.0E+00	No	No	-	No
2,3,7,8-TCDF	1	0	0	0.0E+00	No	No	-	No
1,2,3,7,8-PeCDF	1	0	0	0.0E+00	No	No	-	No
2,3,4,7,8-PeCDF	1	0	0	0.0E+00	No	No	-	No
1,2,3,4,7,8-HxCDF	1	0	0	0.0E+00	No	No	-	No
1,2,3,6,7,8-HxCDF	1	0	0	0.0E+00	No	No	-	No
2,3,4,6,7,8-HxCDF	1	0	0	0.0E+00	No	No	-	No
1,2,3,7,8,9-HxCDF	1	0	0	0.0E+00	No	No	-	No
1,2,3,4,6,7,8-HpCDF	1	0	0	0.0E+00	No	No	-	No
1,2,3,4,7,8,9-HpCDF	1	0	0	0.0E+00	No	No	-	No
OCDF	1	0	0	0.0E+00	No	No	-	No
PCBs								
Aroclor-1248	1	0	0	0.0E+00	No	No	-	No
Aroclor-1254	1	0	0	0.0E+00	No	No	-	No
Aroclor-1260	1	0	0	0.0E+00	No	No	-	No

Notes:
a. Any chemical eliminated as COPC due to laboratory blank contamination is discussed in Section 3.0.
b. Background comparision for inorganic compounds presented in Attachment 1 Spreadsheet D-7.
c. Selected as a near-surface groundwater COPC since it was selected as a COPC in soil at 0 to 10 feet bgs.
COPC - chemical of potential concern
VOC - volatile organic chemicals
SVOC - semivolatile organic chemicals
PCDD/PDDFs - polychlorinated dibenzo-p-dioxins and dibenzofurans
"-" not applicable
mg/L - milligrams per liter
bgs- below ground surface

Spreadsheet C3-3 (1 of 1)

Selection of Chemicals of Potential Concern in Soil Vapor (0-10 feet bgs)
Sodium Reactor Experiment (SRE) Area

Chemical	Number of Samples	Number of Detects	Precent Frequency of Detection	Maximum Detected Concentration (ug/L)	Chemical Detected in Laboratory Blanks[a]	COPC
1,1,1,2-Tetrachloroethane	8	0	0	-	No	No
1,1,1-Trichloroethane	8	0	0	-	No	Yes [b]
1,1,2,2-Tetrachloroethane	8	0	0	-	No	No
1,1,2-Trichloro-1,2,2-trifluoroethane	8	4	50	3.8	No	Yes
1,1,2-Trichloroethane	8	0	0	-	No	No
1,1-Dichloroethane	8	0	0	-	No	Yes [b]
1,1-Dichloroethene	8	0	0	-	No	No
1,2-Dichloroethane	8	0	0	-	No	No
Benzene	8	0	0	-	No	No
Carbon tetrachloride	8	0	0	-	No	No
Chloroethane	8	0	0	-	No	No
Chloroform	8	0	0	-	No	No
Dichlorodifluoromethane	8	0	0	-	No	No
Ethylbenzene	8	0	0	-	No	Yes [b]
Methylene chloride	8	0	0	-	No	Yes [b]
Tetrachloroethene	8	0	0	-	No	Yes [b]
Toluene	8	0	0	-	No	Yes [b]
Trichloroethene	8	0	0	-	No	Yes [b]
Trichlorofluoromethane	8	0	0	-	No	No
Vinyl chloride	8	0	0	-	No	No
cis-1,2-Dichloroethene	8	0	0	-	No	No
m,p-Xylene	8	0	0	-	No	Yes [b]
o-Xylene	8	0	0	-	No	No
trans-1,2-Dichloroethene	8	0	0	-	No	No

Notes:

a. Any chemical eliminated as COPC due to laboratory blank contamination is discussed in Section 3.0.

b. Selected as a soil vapor COPC since it was detected in soil.

c. Selected as a soil vapor COPC since total petrolum hydrocarbon fraction C08-C11 was detected in soil.

COPC - chemical of potential concern

VOC - volatile organic chemicals

ug/L - micrograms per liter vapor by volume.

"-" not applicable

bgs- below ground surface

Selection of Chemicals of Potential Concern in Soil/Sediment (0-10 feet bgs)
Sodium Reactor Experiment (SRE) Area

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (mg/kg)	Potentially Site Related	Chemical Detected in Laboratory Blanks [a]	Maximum Detected Concentration Exceeds Background [b]	COPC
Inorganic Compounds								
Aluminum	24	23	96	2.2E+04	Yes	No	No	No [c]
Antimony	35	12	34	9.3E-01	Yes	No	No	No [c]
Arsenic	43	37	86	9.0E+00	Yes	No	No	No [c]
Barium	43	42	98	2.0E+02	Yes	No	No	No [c]
Beryllium	43	26	60	1.4E+00	Yes	No	No	No [c]
Boron	24	6	25	1.0E+01	Yes	No	No	No [c]
Cadmium	43	11	26	4.6E+00	Yes	No	Yes	Yes
Chromium	43	42	98	4.1E+01	Yes	No	No	No [c]
Hexavalent chromium	5	0	0	0.0E+00	Yes	No	No	No
Cobalt	43	42	98	1.5E+01	Yes	No	No	No [c]
Copper	43	42	98	1.3E+02	Yes	No	Yes	Yes
Lead	43	43	100	9.0E+01	Yes	No	Yes	Yes
Manganese	15	15	100	9.1E+02	Yes	No	No	No [c]
Methyl mercury	3	2	67	3.6E-03	Yes	No	Yes	Yes
Mercury	91	58	64	3.5E+01	Yes	No	Yes	Yes
Molybdenum	43	7	16	7.1E-01	Yes	No	No	No [c]
Nickel	43	37	86	2.4E+01	Yes	No	No	No [c]
Selenium	44	7	16	1.0E+00	Yes	No	No	No [c]
Silver	46	5	11	1.1E+01	Yes	No	Yes	Yes
Thallium	44	13	30	4.0E+00	Yes	No	Yes	Yes
Vanadium	43	42	98	7.7E+01	Yes	No	No	No [c]
Zinc	43	42	98	1.5E+03	Yes	No	Yes	Yes
VOCs								
1,1,1,2-Tetrachloroethane	13	0	0	-	Yes	No	-	No
1,1,1-Trichloroethane	27	2	7	4.0E-01	Yes	No	-	Yes
1,1,2,2-Tetrachloroethane	27	0	0	-	Yes	No	-	No
1,1,2-Trichloro-1,2,2-trifluoroethan	10	0	0	-	Yes	No	-	Yes [d]
1,1,2-Trichloroethane	27	0	0	-	Yes	No	-	No
1,1-Dichloroethane	27	2	7	1.3E-01	Yes	No	-	Yes
1,1-Dichloroethene	27	0	0	-	Yes	No	-	No
1,1-Dichloropropene	4	0	0	-	Yes	No	-	No
1,2,3-Trichlorobenzene	3	0	0	-	Yes	No	-	No
1,2,3-Trichloropropane	4	0	0	-	Yes	No	-	No
1,2,4-Trichlorobenzene	19	0	0	-	Yes	No	-	No
1,2,4-Trimethylbenzene	13	0	0	-	Yes	No	-	No
1,2-Dibromo-3-chloropropane	13	0	0	-	Yes	No	-	No
1,2-Dibromoethane	4	0	0	-	Yes	No	-	No
1,2-Dichlorobenzene	28	0	0	-	Yes	No	-	No
1,2-Dichloroethane	27	0	0	-	Yes	No	-	No
1,2-Dichloroethene (total)	20	2	10	1.2E-01	Yes	No	-	Yes
1,2-Dichloropropane	23	0	0	-	Yes	No	-	No
1,3,5-Trimethylbenzene	13	0	0	-	Yes	No	-	No
1,3-Dichlorobenzene	28	0	0	-	Yes	No	-	No
1,3-Dichloropropane	4	0	0	-	Yes	No	-	No
1,4-Dichlorobenzene	28	0	0	-	Yes	No	-	No
1-Chlorohexane	2	1	50	1.0E-03	Yes	no	-	Yes
2-Butanone	27	4	15	3.7E-02	Yes	No	-	Yes
2-Chloroethylvinylether	10	0	0	-	Yes	No	-	No
2-Chlorotoluene	4	0	0	-	Yes	No	-	No

Selection of Chemicals of Potential Concern in Soil/Sediment (0-10 feet bgs)
Sodium Reactor Experiment (SRE) Area

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (mg/kg)	Potentially Site Related	Chemical Detected in Laboratory Blanks [a]	Maximum Detected Concentration Exceeds Background [b]	COPC
2-Chloro-1,1,1-trifluoroethane	5	0	0	-	Yes	No	-	No
2,2-Dichloropropane	4	0	0	-	Yes	No	-	No
2-Hexanone	18	1	6	3.0E-03	Yes	No	-	Yes
4-Chlorotoluene	4	0	0	-	Yes	No	-	No
4-Isopropyltoluene	4	0	0	-	Yes	No	-	No
4-Methyl-2-pentanone	18	0	0	-	Yes	No	-	No
Acetone	27	7	26	5.2E+00	Yes	No	-	Yes
Benzene	27	0	0	-	Yes	No	-	No
Bromobenzene	4	0	0	-	Yes	No	-	No
Bromochloromethane	4	0	0	-	Yes	No	-	No
Bromodichloromethane	27	0	0	-	Yes	No	-	No
Bromoform	27	0	0	-	Yes	No	-	No
Bromomethane	27	0	0	-	Yes	No	-	No
Carbon disulfide	16	0	0	-	Yes	No	-	No
Carbon tetrachloride	27	0	0	-	Yes	No	-	No
Chlorobenzene	27	0	0	-	Yes	No	-	No
Chloroethane	27	0	0	-	Yes	No	-	No
Chloroform	27	0	0	-	Yes	No	-	No
Chloromethane	27	0	0	-	Yes	No	-	No
Chlorotrifluoroethene	8	0	0	-	Yes	No	-	No
cis-1,2-Dichloroethene	13	0	0	-	Yes	No	-	No
cis-1,3-Dichloropropene	23	0	0	-	Yes	No	-	No
Dibromochloromethane	18	0	0	-	Yes	No	-	No
Dibromomethane	4	0	0	-	Yes	No	-	No
Dichlorodifluoromethane	13	0	0	-	Yes	No	-	No
Ethylbenzene	27	1	4	1.0E-01	Yes	No	-	Yes
Isopropylbenzene	4	0	0	-	Yes	No	-	No
m,p-Xylene	13	1	8	6.0E-04	Yes	No	-	Yes
Methyl tert-butyl ether	4	0	0	-	Yes	No	-	No
Methylene chloride	27	5	19	4.2E+00	Yes	No	-	Yes
n-Butylbenzene	4	0	0	-	Yes	No	-	No
n-Propylbenzene	4	0	0	-	Yes	No	-	No
o-Xylene	13	0	0	-	Yes	No	-	No
sec-Butylbenzene	4	0	0	-	Yes	No	-	No
Styrene	18	0	0	-	Yes	No	-	No
tert-Butylbenzene	4	0	0	-	Yes	No	-	No
Tetrachloroethene	27	3	11	3.3E-01	Yes	No	-	Yes
Toluene	27	3	11	3.6E+00	Yes	No	-	Yes
trans-1,2-Dichloroethene	13	0	0	-	Yes	No	-	No
trans-1,3-Dichloropropene	27	0	0	-	Yes	No	-	No
Trichloroethene	27	4	15	1.0E+00	Yes	No	-	Yes
Trichlorofluoromethane	13	0	0	-	Yes	No	-	No
Vinyl acetate	14	0	0	-	Yes	No	-	No
Vinyl chloride	27	0	0	-	Yes	No	-	No
Xylenes (total)	20	4	20	5.2E-01	Yes	No	-	Yes
SVOCs								
2,4,5-Trichlorophenol	15	0	0	-	No	No	-	No
2,4,6-Trichlorophenol	15	0	0	-	No	No	-	No
2,4-Dichlorophenol	15	0	0	-	No	No	-	No
2,4-Dimethylphenol	15	0	0	-	No	No	-	No

Selection of Chemicals of Potential Concern in Soil/Sediment (0-10 feet bgs)
Sodium Reactor Experiment (SRE) Area

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (mg/kg)	Potentially Site Related	Chemical Detected in Laboratory Blanks [a]	Maximum Detected Concentration Exceeds Background [b]	COPC
2,4-Dinitrophenol	15	0	0	-	No	No	-	No
2,4-Dinitrotoluene	15	0	0	-	No	No	-	No
2,6-Dinitrotoluene	15	0	0	-	No	No	-	No
2-Chloronaphthalene	15	0	0	-	No	No	-	No
2-Chlorophenol	15	0	0	-	No	No	-	No
2-Methylnaphthalene	24	2	8	2.5E-02	No	No	-	Yes
2-Methylphenol	15	0	0	-	No	No	-	No
2-Nitroaniline	15	0	0	-	No	No	-	No
2-Nitrophenol	15	0	0	-	No	No	-	No
Methylphenol	1	0	0	-	No	No	-	No
4-Methylphenol	14	0	0	-	No	No	-	No
3,3'-Dichlorobenzidine	15	0	0	-	No	No	-	No
3-Nitroaniline	15	0	0	-	No	No	-	No
4,6-Dinitro-2-methylphenol	15	0	0	-	No	No	-	No
4-Bromophenyl phenyl ether	15	0	0	-	No	No	-	No
4-Chloro-3-methylphenol	15	0	0	-	No	No	-	No
4-Chloroaniline	15	0	0	-	No	No	-	No
4-Chlorophenyl phenyl ether	15	0	0	-	No	No	-	No
4-Nitroaniline	15	0	0	-	No	No	-	No
4-Nitrophenol	15	0	0	-	No	No	-	No
Acenaphthene	27	4	15	9.0E-01	Yes	No	-	Yes
Acenaphthylene	27	0	0	-	Yes	No	-	Yes [e]
Aniline	14	0	0	-	No	No	-	No
Anthracene	27	2	7	4.0E+00	Yes	No	-	Yes
Benzidine	14	0	0	-	No	No	-	No
Benzo(a)anthracene	27	6	22	1.4E+01	Yes	No	-	Yes
Benzo(a)pyrene	26	6	23	1.5E+01	Yes	No	-	Yes
Benzo(b)fluoranthene	26	7	27	1.3E+01	Yes	No	-	Yes
Benzo(e)pyrene	-	-	-	-	Yes	No	-	Yes [e]
Benzo(g,h,i)perylene	26	4	15	4.7E+00	Yes	No	-	Yes
Benzo(k)fluoranthene	26	5	19	1.5E+01	Yes	No	-	Yes
Benzoic acid	14	0	0	-	No	No	-	No
Benzyl alcohol	15	0	0	-	No	No	-	No
bis(2-Chloroethoxy)methane	15	0	0	-	No	No	-	No
bis(2-Chloroethyl)ether	15	0	0	-	No	No	-	No
bis(2-Chloroisopropyl) ether	15	0	0	-	No	No	-	No
bis(2-Ethylhexyl)phthalate	18	0	0	-	No	No	-	No
Butyl benzyl phthalate	15	0	0	-	No	No	-	No
Chrysene	27	6	22	1.3E+01	Yes	No	-	Yes
Dibenz(a,h)anthracene	26	3	12	2.2E+00	Yes	No	-	Yes
Dibenzofuran	15	1	7	2.8E-01	No	No	-	Yes
Diethylphthalate	18	0	0	-	No	No	-	No
Dimethyl phthalate	15	0	0	-	No	No	-	No
Di-n-butylphthalate	18	0	0	-	No	No	-	No
Di-n-octyl phthalate	15	0	0	-	No	No	-	No
Fluoranthene	27	7	26	2.5E+01	Yes	No	-	Yes
Fluorene	27	2	7	9.2E-01	Yes	No	-	Yes
Hexachlorobenzene	15	0	0	-	No	No	-	No
Hexachlorobutadiene	19	0	0	-	No	No	-	No
Hexachlorocyclopentadiene	15	0	0	-	No	No	-	No
Hexachloroethane	15	0	0	-	No	No	-	No

Selection of Chemicals of Potential Concern in Soil/Sediment (0-10 feet bgs)
Sodium Reactor Experiment (SRE) Area

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (mg/kg)	Potentially Site Related	Chemical Detected in Laboratory Blanks [a]	Maximum Detected Concentration Exceeds Background [b]	COPC
Indeno(1,2,3-cd)pyrene	26	5	19	6.4E+00	No	No	-	Yes
Isophorone	15	0	0	-	No	No	-	No
Naphthalene	31	2	6	5.8E-02	No	No	-	Yes
Nitrobenzene	15	0	0	-	No	No	-	No
N-Nitrosodimethylamine	25	0	0	-	No	No	-	No
N-Nitrosodi-n-propylamine	15	0	0	-	No	No	-	No
N-Nitrosodiphenylamine	18	0	0	-	No	No	-	No
Pentachlorophenol	15	0	0	-	No	No	-	No
Perylene	-	-	-	-	Yes	No	-	Yes [e]
Phenanthrene	27	7	26	1.1E+01	Yes	No	-	Yes
Phenol	15	0	0	-	No	No	-	No
Pyrene	27	7	26	2.1E+01	Yes	No	-	Yes
Total Petroleum Hydrocarbons								
C08-C11(Gasoline Range)	23	0	0	-	Yes	No	-	No
C11-C14(Kerosene Range)	23	1	4	4.0E+01	Yes	No	-	Yes
C14-C20(Diesel Range)	23	2	9	1.8E+01	Yes	No	-	Yes
C20-C30(Lubricant Oil Range)	23	11	48	4.7E+02	Yes	No	-	Yes
Hydrocarbons	1	0	0	-	Yes	No	-	Yes
PCDD/PCDFs								
2,3,7,8-TCDD	5	2	40	5.3E-07	Yes	No	-	Yes
1,2,3,7,8-PeCDD	5	4	80	2.2E-06	Yes	No	-	Yes
1,2,3,4,7,8-HxCDD	5	4	80	1.0E-05	Yes	No	-	Yes
1,2,3,6,7,8-HxCDD	5	4	80	3.0E-05	Yes	No	-	Yes
1,2,3,7,8,9-HxCDD	5	4	80	1.0E-05	Yes	No	-	Yes
1,2,3,4,6,7,8-HpCDD	5	5	100	1.3E-03	Yes	No	-	Yes
OCDD	5	5	100	1.9E-02	Yes	No	-	Yes
2,3,7,8-TCDF	5	3	60	7.9E-07	Yes	No	-	Yes
1,2,3,7,8-PeCDF	5	2	40	5.8E-07	Yes	No	-	Yes
2,3,4,7,8-PeCDF	5	4	80	1.6E-06	Yes	No	-	Yes
1,2,3,4,7,8-HxCDF	5	4	80	3.7E-06	Yes	No	-	Yes
1,2,3,6,7,8-HxCDF	5	4	80	3.4E-06	Yes	No	-	Yes
2,3,4,6,7,8-HxCDF	5	4	80	1.0E-05	Yes	No	-	Yes
1,2,3,7,8,9-HxCDF	5	2	40	9.7E-07	Yes	No	-	Yes
1,2,3,4,6,7,8-HpCDF	5	4	80	1.0E-04	Yes	No	-	Yes
1,2,3,4,7,8,9-HpCDF	5	4	80	1.0E-05	Yes	No	-	Yes
OCDF	5	4	80	2.4E-04	Yes	No	-	Yes
Total Tetra	-	-	-	-	-	-	Yes	-
Total Penta	-	-	-	-	-	-	Yes	-
Total Hexa	-	-	-	-	-	-	Yes	-
Total Hepta	-	-	-	-	-	-	Yes	-
Total Octa	-	-	-	-	-	-	Yes	-
PCDD/PCDF	-	-	-	-	-	-	Yes	Yes
PCBs								
Aroclor-1016	21	0	0	-	No	No	-	No
Aroclor-1221	21	0	0	-	No	No	-	No
Aroclor-1232	21	0	0	-	No	No	-	No
Aroclor-1242	21	0	0	-	No	No	-	No
Aroclor-1248	21	0	0	-	No	No	-	No
Aroclor-1254	21	5	24	4.3E-01	Yes	No	-	Yes

Selection of Chemicals of Potential Concern in Soil/Sediment (0-10 feet bgs)
Sodium Reactor Experiment (SRE) Area

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (mg/kg)	Potentially Site Related	Chemical Detected in Laboratory Blanks [a]	Maximum Detected Concentration Exceeds Background [b]	COPC
Aroclor-1260	21	6	29	7.8E+00	Yes	No	-	Yes
PCB-105	-	-	-	-	Yes	No	-	Yes
PCB-114	-	-	-	-	Yes	No	-	Yes
PCB-118	-	-	-	-	Yes	No	-	Yes
PCB-123	-	-	-	-	Yes	No	-	Yes
PCB-126	-	-	-	-	Yes	No	-	Yes
PCB-156	-	-	-	-	Yes	No	-	Yes
PCB-157	-	-	-	-	Yes	No	-	Yes
PCB-167	-	-	-	-	Yes	No	-	Yes
PCB-169	-	-	-	-	Yes	No	-	Yes
PCB-189	-	-	-	-	Yes	No	-	Yes
PCB-77	-	-	-	-	Yes	No	-	Yes
PCB-81	-	-	-	-	Yes	No	-	Yes

Notes:

a. Any chemical eliminated as COPC due to laboratory blank contamination is discussed in Section 3.0.

b. Background comparision for inorganic compounds presented in Attachment 1 Spreadsheet D-5.

c. Not selected as COPC since the RFI site sample population for soils at 0 to 10 feet bgs was found to be no different than the background sample population at p=0.05 based on the Wilcoxon Rank Sum Test.

d. Selected as a soil COPC since it was selected as a COPC in soil vapor at 0 to 10 feet bgs.

e. Selected as a soil COPC since either petroleum hydrocarbon fraction C11-C14, C14-C20, or C20-C30 was selected as a COPC.

f. Not selected as COPC since the RFI site sample population for soils at 0 to 10 feet bgs was found to be no different than the background sample population at p=0.01 based on the Wilcoxon Rank Sum Test.

VOC - volatile organic chemicals
SVOC - semivolatile organic chemicals
PCBs - polychlorinated biphenyls
Total Tetra - sum of the 2,3,7,8-substituted tetrachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations
Total Penta - sum of the 2,3,7,8-substituted pentachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations
Total Hexa - sum of the 2,3,7,8-substituted hexachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations
Total Hepta - sum of the 2,3,7,8-substituted heptachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations
Total Octa - sum of the octachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations concentrations
PCDD/PDDFs - polychlorinated dibenzo-p-dioxins and dibenzofurans
"-" not applicable
mg/kg - milligrams per kilogram
bgs - below ground surface

Selection of Chemicals of Potential Concern in Soil/Sediment (0-2 feet bgs)
Sodium Reactor Experiment (SRE) Area

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (mg/kg)	Potentially Site Related	Chemical Detected in Laboratory Blanks [a]	Maximum Detected Concentration Exceeds Background [b]	COPC
Inorganic Compounds								
Aluminum	13	13	100	1.5E+04	Yes	No	No	No [c]
Antimony	20	8	40	8.6E-01	Yes	No	No	No [c]
Arsenic	24	21	88	9.0E+00	Yes	No	No	No [c]
Barium	24	24	100	2.0E+02	Yes	No	No	No [c]
Beryllium	24	14	58	1.4E+00	Yes	No	No	No [c]
Boron	13	1	8	1.0E+01	Yes	No	No	No [c]
Cadmium	24	9	38	4.6E+00	Yes	No	Yes	Yes
Chromium	24	24	100	4.1E+01	Yes	No	No	No [c]
Hexavalent chromium	3	0	0	0.0E+00	Yes	No	No	No
Cobalt	24	24	100	1.5E+01	Yes	No	No	No [c]
Copper	24	24	100	1.3E+02	Yes	No	Yes	Yes
Lead	24	24	100	9.0E+01	Yes	No	Yes	Yes
Manganese	7	7	100	9.1E+02	Yes	No	No	No [c]
Methyl mercury	3	2	67	3.6E-03	Yes	No	Yes	Yes
Mercury	67	51	76	3.5E+01	Yes	No	Yes	Yes
Molybdenum	24	4	17	6.5E-01	Yes	No	No	No [c]
Nickel	24	21	88	2.4E+01	Yes	No	No	No [c]
Selenium	26	1	4	7.7E-01	Yes	No	No	No [c]
Silver	27	3	11	4.8E+00	Yes	No	Yes	Yes
Thallium	26	7	27	3.3E-01	Yes	No	Yes	Yes
Vanadium	24	24	100	7.7E+01	Yes	No	No	No [c]
Zinc	24	24	100	1.5E+03	Yes	No	Yes	Yes
VOCs								
1,1,1,2-Tetrachloroethane	6	0	0	-	Yes	No	-	No
1,1,1-Trichloroethane	14	0	0	-	Yes	No	-	No
1,1,2,2-Tetrachloroethane	14	0	0	-	Yes	No	-	No
1,1,2-Trichloro-1,2,2-trifluoroethane	3	0	0	-	Yes	No	-	Yes [d]
1,1,2-Trichloroethane	14	0	0	-	Yes	No	-	No
1,1-Dichloroethane	14	0	0	-	Yes	No	-	No
1,1-Dichloroethene	14	0	0	-	Yes	No	-	No
1,2,4-Trichlorobenzene	8	0	0	-	Yes	No	-	No
1,2,4-Trimethylbenzene	6	0	0	-	Yes	No	-	No
1,2-Dibromo-3-chloropropane	6	0	0	-	Yes	No	-	No
1,2-Dichlorobenzene	14	0	0	-	Yes	No	-	No
1,2-Dichloroethane	14	0	0	-	Yes	No	-	No
1,2-Dichloroethene (total)	11	1	9	1.2E-01	Yes	No	-	Yes
1,2-Dichloropropane	11	0	0	-	Yes	No	-	No
1,3,5-Trimethylbenzene	6	0	0	-	Yes	No	-	No
1,3-Dichlorobenzene	14	0	0	-	Yes	No	-	No
1,4-Dichlorobenzene	14	0	0	-	Yes	No	-	No
2-Butanone	14	3	21	3.7E-02	Yes	No	-	Yes
2-Chloroethylvinylether	3	0	0	-	Yes	No	-	No
2-Chloro-1,1,1-trifluoroethane	3	0	0	-	Yes	No	-	No
2-Hexanone	8	0	0	-	Yes	No	-	No
4-Methyl-2-pentanone	8	0	0	-	Yes	No	-	No
Acetone	14	3	21	5.2E+00	Yes	No	-	Yes
Benzene	14	0	0	-	Yes	No	-	No
Bromodichloromethane	14	0	0	-	Yes	No	-	No
Bromoform	14	0	0	-	Yes	No	-	No

Selection of Chemicals of Potential Concern in Soil/Sediment (0-2 feet bgs)
Sodium Reactor Experiment (SRE) Area

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (mg/kg)	Potentially Site Related	Chemical Detected in Laboratory Blanks [a]	Maximum Detected Concentration Exceeds Background [b]	COPC
Bromomethane	14	0	0	-	Yes	No	-	No
Carbon disulfide	8	0	0	-	Yes	No	-	No
Carbon tetrachloride	14	0	0	-	Yes	No	-	No
Chlorobenzene	14	0	0	-	Yes	No	-	No
Chloroethane	14	0	0	-	Yes	No	-	No
Chloroform	14	0	0	-	Yes	No	-	No
Chloromethane	14	0	0	-	Yes	No	-	No
Chlorotrifluoroethene	3	0	0	-	Yes	No	-	No
cis-1,2-Dichloroethene	6	0	0	-	Yes	No	-	No
cis-1,3-Dichloropropene	11	0	0	-	Yes	No	-	No
Dibromochloromethane	8	0	0	-	Yes	No	-	No
Dichlorodifluoromethane	6	0	0	-	Yes	No	-	No
Ethylbenzene	14	0	0	-	Yes	No	-	No
m,p-Xylene	6	0	0	-	Yes	No	-	No
Methylene chloride	14	2	14	1.3E-02	Yes	No	-	Yes
o-Xylene	6	0	0	-	Yes	No	-	No
Styrene	8	0	0	-	Yes	No	-	No
Tetrachloroethene	14	1	7	1.0E-01	Yes	No	-	Yes
Toluene	14	1	7	4.2E-01	Yes	No	-	Yes
trans-1,2-Dichloroethene	6	0	0	-	Yes	No	-	No
trans-1,3-Dichloropropene	14	0	0	-	Yes	No	-	No
Trichloroethene	14	2	14	2.2E-01	Yes	No	-	Yes
Trichlorofluoromethane	6	0	0	-	Yes	No	-	No
Vinyl acetate	8	0	0	-	Yes	No	-	No
Vinyl chloride	14	0	0	-	Yes	No	-	No
Xylenes (total)	11	1	9	8.0E-02	Yes	No	-	Yes
SVOCs								
2,4,5-Trichlorophenol	8	0	0	-	No	No	-	No
2,4,6-Trichlorophenol	8	0	0	-	No	No	-	No
2,4-Dichlorophenol	8	0	0	-	No	No	-	No
2,4-Dimethylphenol	8	0	0	-	No	No	-	No
2,4-Dinitrophenol	8	0	0	-	No	No	-	No
2,4-Dinitrotoluene	8	0	0	-	No	No	-	No
2,6-Dinitrotoluene	8	0	0	-	No	No	-	No
2-Chloronaphthalene	8	0	0	-	No	No	-	No
2-Chlorophenol	8	0	0	-	No	No	-	No
2-Methylnaphthalene	12	0	0	-	No	No	-	No
2-Methylphenol	8	0	0	-	No	No	-	No
2-Nitroaniline	8	0	0	-	No	No	-	No
2-Nitrophenol	8	0	0	-	No	No	-	No
Methylphenol	1	0	0	-	No	No	-	No
4-Methylphenol	7	0	0	-	No	No	-	No
3,3'-Dichlorobenzidine	8	0	0	-	No	No	-	No
3-Nitroaniline	8	0	0	-	No	No	-	No
4,6-Dinitro-2-methylphenol	8	0	0	-	No	No	-	No
4-Bromophenyl phenyl ether	8	0	0	-	No	No	-	No
4-Chloro-3-methylphenol	8	0	0	-	No	No	-	No
4-Chloroaniline	8	0	0	-	No	No	-	No
4-Chlorophenyl phenyl ether	8	0	0	-	No	No	-	No
4-Nitroaniline	8	0	0	-	No	No	-	No

Selection of Chemicals of Potential Concern in Soil/Sediment (0-2 feet bgs)
Sodium Reactor Experiment (SRE) Area

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (mg/kg)	Potentially Site Related	Chemical Detected in Laboratory Blanks [a]	Maximum Detected Concentration Exceeds Background [b]	COPC
4-Nitrophenol	8	0	0	-	No	No	-	No
Acenaphthene	14	0	0	-	Yes	No	-	Yes [e]
Acenaphthylene	14	0	0	-	Yes	No	-	Yes [e]
Aniline	8	0	0	-	No	No	-	No
Anthracene	14	0	0	-	Yes	No	-	Yes [e]
Benzidine	8	0	0	-	No	No	-	No
Benzo(a)anthracene	14	3	21	2.4E-01	Yes	No	-	Yes
Benzo(a)pyrene	13	3	23	2.4E-01	Yes	No	-	Yes
Benzo(b)fluoranthene	13	4	31	5.4E-01	Yes	No	-	Yes
Benzo(g,h,i)perylene	13	1	8	2.3E-01	Yes	No	-	Yes
Benzo(k)fluoranthene	13	2	15	6.0E-03	Yes	No	-	Yes
Benzoic acid	8	0	0	-	No	No	-	No
Benzyl alcohol	8	0	0	-	No	No	-	No
bis(2-Chloroethoxy)methane	8	0	0	-	No	No	-	No
bis(2-Chloroethyl)ether	8	0	0	-	No	No	-	No
bis(2-Chloroisopropyl) ether	8	0	0	-	No	No	-	No
bis(2-Ethylhexyl)phthalate	10	0	0	-	No	No	-	No
Butyl benzyl phthalate	8	0	0	-	No	No	-	No
Chrysene	14	4	29	4.2E-01	Yes	No	-	Yes
Dibenz(a,h)anthracene	13	0	0	-	Yes	No	-	Yes
Dibenzofuran	8	0	0	-	No	No	-	No
Diethylphthalate	10	0	0	-	No	No	-	No
Dimethyl phthalate	8	0	0	-	No	No	-	No
Di-n-butylphthalate	10	0	0	-	No	No	-	No
Di-n-octyl phthalate	8	0	0	-	No	No	-	No
Fluoranthene	14	4	29	8.0E-01	Yes	No	-	Yes
Fluorene	14	0	0	-	Yes	No	-	Yes [e]
Hexachlorobenzene	8	0	0	-	No	No	-	No
Hexachlorobutadiene	8	0	0	-	No	No	-	No
Hexachlorocyclopentadiene	8	0	0	-	No	No	-	No
Hexachloroethane	8	0	0	-	No	No	-	No
Indeno(1,2,3-cd)pyrene	13	2	15	2.0E-01	No	No	-	Yes
Isophorone	8	0	0	-	No	No	-	No
Naphthalene	14	0	0	-	No	No	-	No
Nitrobenzene	8	0	0	-	No	No	-	No
N-Nitrosodimethylamine	13	0	0	-	No	No	-	No
N-Nitrosodi-n-propylamine	8	0	0	-	No	No	-	No
N-Nitrosodiphenylamine	10	0	0	-	No	No	-	No
Pentachlorophenol	8	0	0	-	No	No	-	No
Perylene	-	-	-	-	Yes	No	-	Yes [e]
Phenanthrene	14	4	29	2.8E-01	Yes	No	-	Yes
Phenol	8	0	0	-	No	No	-	No
Pyrene	14	4	29	5.9E-01	Yes	No	-	Yes
Total Petroleum Hydrocarbons								
C08-C11(Gasoline Range)	14	0	0	-	No	No	-	No
C11-C14(Kerosene Range)	14	1	7	4.0E+01	Yes	No	-	Yes
C14-C20(Diesel Range)	14	0	0	-	Yes	No	-	Yes
C20-C30(Lubricant Oil Range)	14	8	57	4.7E+02	Yes	No	-	Yes
Hydrocarbons	1	0	0	-	Yes	No	-	Yes

Selection of Chemicals of Potential Concern in Soil/Sediment (0-2 feet bgs)
Sodium Reactor Experiment (SRE) Area

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (mg/kg)	Potentially Site Related	Chemical Detected in Laboratory Blanks [a]	Maximum Detected Concentration Exceeds Background [b]	COPC
PCDD/PCDFs								
2,3,7,8-TCDD	4	2	50	5.3E-07	Yes	No	-	Yes
1,2,3,7,8-PeCDD	4	4	100	2.2E-06	Yes	No	-	Yes
1,2,3,4,7,8-HxCDD	4	4	100	1.0E-05	Yes	No	-	Yes
1,2,3,6,7,8-HxCDD	4	4	100	3.0E-05	Yes	No	-	Yes
1,2,3,7,8,9-HxCDD	4	4	100	1.0E-05	Yes	No	-	Yes
1,2,3,4,6,7,8-HpCDD	4	4	100	1.3E-03	Yes	No	-	Yes
OCDD	4	4	100	1.9E-02	Yes	No	-	Yes
2,3,7,8-TCDF	4	3	75	7.9E-07	Yes	No	-	Yes
1,2,3,7,8-PeCDF	4	2	50	5.8E-07	Yes	No	-	Yes
2,3,4,7,8-PeCDF	4	4	100	1.6E-06	Yes	No	-	Yes
1,2,3,4,7,8-HxCDF	4	4	100	3.7E-06	Yes	No	-	Yes
1,2,3,6,7,8-HxCDF	4	4	100	3.4E-06	Yes	No	-	Yes
2,3,4,6,7,8-HxCDF	4	4	100	1.0E-05	Yes	No	-	Yes
1,2,3,7,8,9-HxCDF	4	2	50	9.7E-07	Yes	No	-	Yes
1,2,3,4,6,7,8-HpCDF	4	4	100	1.0E-04	Yes	No	-	Yes
1,2,3,4,7,8,9-HpCDF	4	4	100	1.0E-05	Yes	No	-	Yes
OCDF	4	4	100	2.4E-04	Yes	No	-	Yes
Total Tetra	-	-	-	-	-	-	No	-
Total Penta	-	-	-	-	-	-	No	-
Total Hexa	-	-	-	-	-	-	No	-
Total Hepta	-	-	-	-	-	-	Yes	-
Total Octa	-	-	-	-	-	-	Yes	-
PCDD/PCDF	-	-	-	-	-	-	-	Yes
PCBs								
Aroclor-1016	20	0	0	-	No	No	-	No
Aroclor-1221	20	0	0	-	No	No	-	No
Aroclor-1232	20	0	0	-	No	No	-	No
Aroclor-1242	20	0	0	-	No	No	-	No
Aroclor-1248	20	0	0	-	No	No	-	No
Aroclor-1254	20	5	25	4.3E-01	Yes	No	-	Yes
Aroclor-1260	20	5	25	7.8E+00	Yes	No	-	Yes
PCB-105	-	-	-	-	Yes	No	-	Yes
PCB-114	-	-	-	-	Yes	No	-	Yes
PCB-118	-	-	-	-	Yes	No	-	Yes
PCB-123	-	-	-	-	Yes	No	-	Yes
PCB-126	-	-	-	-	Yes	No	-	Yes
PCB-156	-	-	-	-	Yes	No	-	Yes
PCB-157	-	-	-	-	Yes	No	-	Yes
PCB-167	-	-	-	-	Yes	No	-	Yes
PCB-169	-	-	-	-	Yes	No	-	Yes
PCB-189	-	-	-	-	Yes	No	-	Yes
PCB-77	-	-	-	-	Yes	No	-	Yes
PCB-81	-	-	-	-	Yes	No	-	Yes

Notes:

a. Any chemical eliminated as COPC due to laboratory blank contamination is discussed in Section 3.0.

b. Background comparision for inorganic compounds presented in Attachment 1 Spreadsheet D-5.

c. Not selected as COPC since the RFI site sample population for soil/sediment at 0 to 2 feet bgs was found to be no different than the background sample population based on the Wilcoxon Rank Sum Test.

d. Selected as a soil COPC since it was selected as a COPC in soil vapor.

Selection of Chemicals of Potential Concern in Soil/Sediment (0-2 feet bgs)
Sodium Reactor Experiment (SRE) Area

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (mg/kg)	Potentially Site Related	Chemical Detected in Laboratory Blanks [a]	Maximum Detected Concentration Exceeds Background [b]	COPC

e. Selected as a soil COPC since either petroleum hydrocarbon fraction C11-C14, C14-C20, or C20-C30 was selected as a COPC.
COPC - chemical of potential concern
PAH - polycyclic aromatic hydrocarbon
SVOC - semivolatile organic chemicals
PCBs - polychlorinated biphenyls
Total Tetra - sum of the 2,3,7,8-substituted tetrachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations
Total Penta - sum of the 2,3,7,8-substituted pentachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations
Total Hexa - sum of the 2,3,7,8-substituted hexachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations
Total Hepta - sum of the 2,3,7,8-substituted heptachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations
Total Octa - sum of the octachlorinated dibenzo-p-dioxin and dibenzofuran congener concentrations concentrations
PCDD/PDDFs - polychlorinated dibenzo-p-dioxins and dibenzofurans
"-" not applicable
mg/kg - milligrams per kilogram
bgs - below ground surface

APPENDIX C, ATTACHMENT C8

B064 LF Risk Assessment Calculation Tables

Spreadsheet C4-89 (1 of 1)

Assessment and Measurement Endpoints
Building 64 Leach Fields RFI Site

Assessment Goal	Assessment Endpoint	Measurement Endpoint	Measure of Effect
Protect wildlife populations and plant communities from acute or chronic health effects resulting from exposure to site contaminants	Protect avian species from acute or chronic health effects (direct and/or secondary effects) related to CPEC exposure	Calculate daily dosage to red-tailed hawk and thrush using exposure model	Compare NOAEL dosages for the red-tailed hawk or similar raptor species
	Protect bobcat from acute or chronic health effects related to CPEC exposure	Calculate daily dosage to bobcat using exposure model	Compare NOAEL dosages for bobcat or similar species
	Protect deer from acute or chronic health effects related to secondary exposures to CPEC	Calculate daily dosage to mule deer using exposure model	Compare NOAEL dosages for mule deer or similar species
	Protect prey abundance of avian and bobcat prey items (rodents, invertebrates) from direct exposure to CPEC	Measure contaminant concentrations in surface soil. Extrapolate prey concentrations using BAF	Compare to NOAEL concentrations in soil

Notes:
BAF = Bioaccumulation factor
CPEC = chemicals of potential ecological concern
NOAEL = no observable adverse effect level

Spreadsheet C4-88 (1 of 1)

Summary of Habitats
Building 64 Leach Fields RFI Site

Habitat	Species Potentially Present	Observed Species[a]	Relative Occurrrence	Status[b]	Representative Ecological Receptor
Nonnative grassland	invertebrates	invertebrates	common	none	earthworm
	rodents	rodents	common	none	deer mouse
	small birds		common	none	thrush
	raptors	raptors	uncommon	none	red-tailed hawk
	deer	mule deer	common	none	mule deer
			uncommon	none	bobcat
Scrub	invertebrates	invertebrates	common	none	earthworm
	rodents		common	none	deer mouse
	small birds		common	none	thrush
	raptors		uncommon	none	red-tailed hawk
	deer		common	none	mule deer
			uncommon	none	bobcat
Ruderal habitat	invertebrates	invertebrates	common	none	earth worm
	rodents	rodents	common	none	deer mouse

Notes:
a. Relative to other habitat types within the RFI site.
b. Listed state or federal threatened or endangered species, or proposed for listing.

Spreadsheet C4-82 (1 of 1)

Comparison of Inorganic Compound Concentrations in Soil (0-2 feet bgs) Against Background
Building 64 Leach Fields

Inorganic Compounds	Maximum Background [a] (mg/kg)	Maximum RFI Site (mg/kg)	Results of Wilcoxon-Rank Sum Test	RFI Site Ever Detected?	RFI Site Exceeds Background?	
Aluminum	2.0E+04	1.4E+04	No	Yes	No	b
Antimony	8.7E+00	1.6E-01	No	Yes	No	b
Arsenic	1.5E+01	3.4E+00	No	Yes	No	b
Barium	1.4E+02	7.9E+01	No	Yes	No	b
Beryllium	1.1E+00	5.6E-01	No	Yes	No	b
Boron	9.7E+00	3.5E+00	No	Yes	No	b
Cadmium	1.0E+00	3.9E-01	No	Yes	No	b
Chromium	3.7E+01	2.4E+01	No	Yes	No	b
Cobalt	2.1E+01	6.5E+00	No	Yes	No	b
Copper	2.9E+01	1.5E+01	No	Yes	No	b
Lead	3.4E+01	4.0E+01	No	Yes	No	b
Manganese	5.0E+02	2.9E+02	No	Yes	No	b
Mercury	9.0E-02	2.4E-02	No	Yes	No	b
Molybdenum	5.3E+00	3.4E-01	No	No	No	b
Nickel	2.9E+01	1.4E+01	No	Yes	No	b
Selenium	6.6E-01	4.1E-01	No	Yes	No	b
Silver	7.9E-01	1.5E-01	No	Yes	No	b
Thallium	4.6E-01	4.8E-01	Yes	Yes	Yes	c
Vanadium	6.2E+01	3.6E+01	No	Yes	No	b
Zinc	1.1E+02	1.2E+02	No	Yes	No	b

Notes:

a. The concentrations of inorganic compounds for which soil background data are not available are considered to be above background concentrations if they are detected and are potentially site-related.

b. Determined be within the range of background since the RFI site sample population for soils at 0 to 2 feet bgs was found to be no different than the background sample population at p=0.05 based on the Wilcoxon Rank Sum Test.

c. Although the WRS test indicates site concentrations may be different from background, the detected concentrations are generally consistent with the range of detected background concentrations, the maximum detect is only marginally above the maximum detected background (by 4% which is well within analytical variability), and the chemical was detected in the laboratory blank.

mg/kg - milligrams per kilogram

bgs- below ground surface

Comparison of Sample Quantitation Limits in Soil (0-2 feet bgs) Against Ecological Screening Levels
Building 64 Leach Fields

Chemical	Number of Samples	Percent Frequency of Detection	Frequency of Detection Between 0% and 5% ?	Minimum SQL for Chemicals Never Detected or Detected at Frequency of < 5% (mg/kg)	Maximum SQL for Chemicals Never Detected or Detected at Frequency of < 5% (mg/kg)	Lowest ESL (mg/kg)	Percentage of SQLs Exceeding ESL	Greater than 50% of SQLs Exceeds ESL ?
Inorganic Compounds								
Aluminum	3	100	No			1.2E+01	0	No
Antimony	3	67	No			1.0E-01	100	Yes
Arsenic	3	100	No			1.9E+00	100	Yes
Barium	3	100	No			2.0E+01	100	Yes
Beryllium	3	100	No			5.0E+00	0	No
Boron	3	100	No			8.0E+00	0	No
Cadmium	3	100	No			2.3E-02	100	Yes
Chromium	3	100	No			7.3E+02	0	No
Cobalt	3	100	No			8.4E+00	0	No
Copper	3	100	No			1.1E+00	100	Yes
Lead	3	100	No			6.3E-02	100	Yes
Manganese	3	100	No			7.3E+01	0	No
Mercury	3	100	No			1.0E-01	0	No
Molybdenum	3	0	Yes	--	6.8E-01	8.8E-02	100	Yes
Nickel	3	100	No			8.1E-02	100	Yes
Selenium	3	67	No			2.1E-01	100	Yes
Silver	3	100	No			8.3E-01	0	No
Thallium	3	100	No			3.9E+00	0	No
Vanadium	3	100	No			1.4E+00	100	Yes

Notes:
SQL - sample quantitation limit
ESL - ecological screening level
mg/kg - milligrams per kilogram
bgs- below ground surface

Selection of Chemicals of Potential Ecological Concern in Soil (0-2 feet bgs)
Building 64 Leach Fields

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (mg/kg)	Chemical Detected in Laboratory Blanks [a]	WRS Indicates Exceeds Background[b]	Maximum SQL (mg/kg)	SQLs Exceed Background	SQLs Exceed ESLs	Potentially Site Related	CPEC
Inorganic Compounds											
Aluminum	3	3	100	1.4E+04	Yes	No		-	No	Yes	No [c]
Antimony	3	2	67	1.6E-01	Yes	No	1.6E-01	-	Yes	Yes	No [c]
Arsenic	3	3	100	3.4E+00	No	No	3.4E+00	-	Yes	Yes	No [c]
Barium	3	3	100	7.9E+01	Yes	No	7.9E+01	-	Yes	Yes	No [c]
Beryllium	3	3	100	5.6E-01	No	No	5.6E-01	-	No	Yes	No [c]
Boron	3	3	100	3.5E+00	No	No		-	No	Yes	No [c]
Cadmium	3	3	100	3.9E-01	Yes	No	3.9E-01	-	Yes	Yes	No [c]
Chromium	3	3	100	2.4E+01	Yes	No	2.4E+01	-	No	Yes	No [c]
Cobalt	3	3	100	6.5E+00	Yes	No	6.5E+00	-	No	Yes	No [c]
Copper	3	3	100	1.5E+01	Yes	No	1.5E+01	-	Yes	Yes	No [c]
Lead	3	3	100	4.0E+01	Yes	No	6.6E+00	-	Yes	Yes	No [c]
Manganese	3	3	100	2.9E+02	No	No		-	No	Yes	No [c]
Mercury	3	3	100	2.4E-02	No	No		-	No	Yes	No [c]
Molybdenum	3	0	0	-	No	No	6.8E-01	Yes	Yes	Yes	No [c]
Nickel	3	3	100	1.4E+01	Yes	No	1.4E+01	-	Yes	Yes	No [c]
Selenium	3	2	67	2.6E-01	No	No	8.1E-01	-	Yes	Yes	No [c]
Silver	3	3	100	1.5E-01	No	No	1.5E-01	-	No	Yes	No [c]
Thallium	3	3	100	4.8E-01	Yes	Yes	4.3E-01	-	No	Yes	No [c]
Vanadium	3	3	100	3.6E+01	No	No	3.6E+01	-	Yes	Yes	No [c]
Zinc	3	3	100	1.2E+02	Yes	No	1.2E+02	-	Yes	Yes	No [c]

Notes:

a. Any chemical eliminated as CPEC due to laboratory blank contamination is discussed in Section 3.0.

b. Background comparision for inorganic compounds presented in Attachment 1 Spreadsheet C2-82.

c. Not selected as CPEC since the RFI site sample population for soils at 0 to 2 feet bgs was found to be no different than the background sample population at p=0.05 based on the Wilcoxon Rank Sum Test.

d. Although the WRS test indicates site concentrations may be different from background, the chemical is not selected as a CPEC for quantitative analysis because the detected concentrations are generally consistent with the range of detected background concentrations, the maximum detect is only marginally above the maximum background (4% which is well within analytical variability), and the chemical was detected in the laboratory blank. Therefore, it will not be further evaluated quantitatively, but will be discussed in the uncertainty analysis.

CPEC - chemical of potential ecological concern

ESL - ecological screening level

SQL - sample quantitation limit

"-" not applicable

mg/kg - milligrams per kilogram

bgs- below ground surface

Estimates of Human Intake
Domestic Groundwater Use for Child Resident
Building 64 Leach Field

Intake Equation: Dosage = $\frac{C \times IR \times FT \times EF \times ED \times B}{BW \times AT}$

Exposure Parameters		Units	Typical	RME
Groundwater concentration	C	mg/L	CS	CS
Groundwater ingestion rate$_{voc}$	IR	L/day	1.5	2.5
Groundwater ingestion rate$_{non\text{-}vocs}$	IR	L/day	0.75	1.25
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	6	6
Bioavailability	B	fraction	CS	CS
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/L)	RME EPC (mg/L)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
Inorganic Compounds							
Copper	1.8E-02	1.8E-02	8.6E-04	1.4E-03	6.9E-05	1.2E-04	1
Fluoride	5.6E-01	5.6E-01	2.7E-02	4.5E-02	2.1E-03	3.6E-03	1
Nitrate	1.4E+01	1.4E+01	6.8E-01	1.1E+00	5.4E-02	9.1E-02	1
Thallium	5.4E-04	5.4E-04	2.6E-05	4.3E-05	2.1E-06	3.5E-06	1
VOCs							
1,1-Dichloroethane	2.6E-03	2.6E-03	2.5E-04	4.2E-04	2.0E-05	3.3E-05	1
Acetone	1.6E-02	1.6E-02	1.5E-03	2.6E-03	1.2E-04	2.0E-04	1
Benzene	5.8E-04	5.8E-04	5.6E-05	9.3E-05	4.4E-06	7.4E-06	1
Carbon disulfide	2.6E-03	2.6E-03	2.5E-04	4.2E-04	2.0E-05	3.3E-05	1
Chloromethane	3.2E-04	3.2E-04	3.1E-05	5.1E-05	2.5E-06	4.1E-06	1
cis-1,2-Dichloroethene	5.1E-02	5.1E-02	4.9E-03	8.2E-03	3.9E-04	6.5E-04	1
Methylene chloride	6.4E-04	6.4E-04	6.1E-05	1.0E-04	4.9E-06	8.2E-06	1
Toluene	1.8E-03	1.8E-03	1.7E-04	2.9E-04	1.4E-05	2.3E-05	1
Trichloroethene	1.0E-02	1.0E-02	9.6E-04	1.6E-03	7.7E-05	1.3E-04	1
Total Petroleum Hydrocarbons							
C14-C20(Diesel Range)	5.0E-02	5.0E-02	2.4E-03	4.0E-03	1.9E-04	3.2E-04	1

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
mg/kg-day - milligrams per kilogram per day
mg/L - milligrams per liter

Estimates of Human Intake
Groundwater to Indoor Air Pathway for Child Resident
Building 64 Leach Field

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	8.4	8.4
Fraction of time indoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	6	6
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Inorganic Compounds						
Copper	NC	NC	NA	NA	NA	NA
Fluoride	NC	NC	NA	NA	NA	NA
Nitrate	NC	NC	NA	NA	NA	NA
Thallium	NC	NC	NA	NA	NA	NA
VOCs						
1,1-Dichloroethane	NC	NC	NA	NA	NA	NA
Acetone	2.0E-07	2.0E-07	5.4E-08	8.0E-08	4.3E-09	6.4E-09
Benzene	NC	NC	NA	NA	NA	NA
Carbon disulfide	NC	NC	NA	NA	NA	NA
Chloromethane	NC	NC	NA	NA	NA	NA
cis-1,2-Dichloroethene	NC	NC	NA	NA	NA	NA
Methylene chloride	NC	NC	NA	NA	NA	NA
Toluene	1.1E-05	1.1E-05	3.1E-06	4.6E-06	2.5E-07	3.7E-07
Trichloroethene	NC	NC	NA	NA	NA	NA
Total Petroleum Hydrocarbons						
C14-C20(Diesel Range)	NC	NC	NA	NA	NA	NA

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
mg/kg-day - milligrams per kilogram per day
mg/m^3 - milligrams per cubic meter

Estimates of Human Intake
Groundwater to Ambient Air Pathway for Child Resident
Building 64 Leach Field

Intake Equation: Dosage = $\frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	8.4	8.4
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	6	6
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Inorganic Compounds						
Copper	NC	NC	NA	NA	NA	NA
Fluoride	NC	NC	NA	NA	NA	NA
Nitrate	NC	NC	NA	NA	NA	NA
Thallium	NC	NC	NA	NA	NA	NA
VOCs						
1,1-Dichloroethane	NC	NC	NA	NA	NA	NA
Acetone	8.5E-13	8.5E-13	2.3E-13	3.4E-13	1.8E-14	2.7E-14
Benzene	NC	NC	NA	NA	NA	NA
Carbon disulfide	NC	NC	NA	NA	NA	NA
Chloromethane	NC	NC	NA	NA	NA	NA
cis-1,2-Dichloroethene	NC	NC	NA	NA	NA	NA
Methylene chloride	NC	NC	NA	NA	NA	NA
Toluene	1.7E-07	1.7E-07	4.6E-08	6.9E-08	3.7E-09	5.5E-09
Trichloroethene	NC	NC	NA	NA	NA	NA
Total Petroleum Hydrocarbons						
C14-C20(Diesel Range)	NC	NC	NA	NA	NA	NA

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
mg/kg-day - milligrams per kilogram per day
mg/m^3 - milligrams per cubic meter

Estimates of Human Intake
Domestic Groundwater Use for Adult Resident
Building 64 Leach Field

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED \times B}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Groundwater concentration	C	mg/L	CS	CS
Groundwater ingestion rate$_{vocs}$	IR	L/day	2.0	3.1
Groundwater ingestion rate$_{non\text{-}vocs}$	IR	L/day	1.0	1.5
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	9	24
Bioavailability	B	fraction	CS	CS
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/L)	RME EPC (mg/L)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)	Bioavailability (fraction)
Inorganic Compounds							
Copper	1.8E-02	1.8E-02	2.5E-04	3.8E-04	3.0E-05	1.2E-04	1
Fluoride	5.6E-01	5.6E-01	7.7E-03	1.2E-02	9.2E-04	3.8E-03	1
Nitrate	1.4E+01	1.4E+01	1.9E-01	3.0E-01	2.3E-02	9.6E-02	1
Thallium	5.4E-04	5.4E-04	7.4E-06	1.1E-05	8.9E-07	3.6E-06	1
VOCs							
1,1-Dichloroethane	2.6E-03	2.6E-03	7.1E-05	1.1E-04	8.5E-06	3.5E-05	1
Acetone	1.6E-02	1.6E-02	4.4E-04	6.8E-04	5.3E-05	2.2E-04	1
Benzene	5.8E-04	5.8E-04	1.6E-05	2.4E-05	1.9E-06	7.8E-06	1
Carbon disulfide	2.6E-03	2.6E-03	7.1E-05	1.1E-04	8.5E-06	3.5E-05	1
Chloromethane	3.2E-04	3.2E-04	8.8E-06	1.4E-05	1.1E-06	4.3E-06	1
cis-1,2-Dichloroethene	5.1E-02	5.1E-02	1.4E-03	2.2E-03	1.7E-04	6.9E-04	1
Methylene chloride	6.4E-04	6.4E-04	1.8E-05	2.7E-05	2.1E-06	8.6E-06	1
Toluene	1.8E-03	1.8E-03	4.9E-05	7.6E-05	5.9E-06	2.4E-05	1
Trichloroethene	1.0E-02	1.0E-02	2.7E-04	4.2E-04	3.3E-05	1.4E-04	1
Total Petroleum Hydrocarbons							
C14-C20(Diesel Range)	5.0E-02	5.0E-02	6.8E-04	1.1E-03	8.2E-05	3.4E-04	1

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
mg/kg-day - milligrams per kilogram per day
mg/L - milligrams per liter

Estimates of Human Intake
Groundwater to Indoor Air Pathway for Adult Resident
Building 64 Leach Field

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	7.0	13.2
Fraction of time indoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	9	24
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Inorganic Compounds						
Copper	NC	NC	NA	NA	NA	NA
Fluoride	NC	NC	NA	NA	NA	NA
Nitrate	NC	NC	NA	NA	NA	NA
Thallium	NC	NC	NA	NA	NA	NA
VOCs						
1,1-Dichloroethane	NC	NC	NA	NA	NA	NA
Acetone	2.0E-07	2.0E-07	9.6E-09	2.7E-08	1.1E-09	8.7E-09
Benzene	NC	NC	NA	NA	NA	NA
Carbon disulfide	NC	NC	NA	NA	NA	NA
Chloromethane	NC	NC	NA	NA	NA	NA
cis-1,2-Dichloroethene	NC	NC	NA	NA	NA	NA
Methylene chloride	NC	NC	NA	NA	NA	NA
Toluene	1.1E-05	1.1E-05	5.5E-07	1.5E-06	6.6E-08	5.0E-07
Trichloroethene	NC	NC	NA	NA	NA	NA
Total Petroleum Hydrocarbons						
C14-C20(Diesel Range)	NC	NC	NA	NA	NA	NA

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
mg/kg-day - milligrams per kilogram per day
mg/m^3 - milligrams per cubic meter

Estimates of Human Intake
Groundwater to Ambient Air Pathway for Adult Resident
Building 64 Leach Field

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	7.0	13.2
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	350	350
Exposure duration	ED	years	9	24
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Inorganic Compounds						
Copper	NC	NC	NA	NA	NA	NA
Fluoride	NC	NC	NA	NA	NA	NA
Nitrate	NC	NC	NA	NA	NA	NA
Thallium	NC	NC	NA	NA	NA	NA
VOCs						
1,1-Dichloroethane	NC	NC	NA	NA	NA	NA
Acetone	8.5E-13	8.5E-13	4.1E-14	1.2E-13	4.9E-15	3.7E-14
Benzene	NC	NC	NA	NA	NA	NA
Carbon disulfide	NC	NC	NA	NA	NA	NA
Chloromethane	NC	NC	NA	NA	NA	NA
cis-1,2-Dichloroethene	NC	NC	NA	NA	NA	NA
Methylene chloride	NC	NC	NA	NA	NA	NA
Toluene	1.7E-07	1.7E-07	8.3E-09	2.3E-08	9.9E-10	7.5E-09
Trichloroethene	NC	NC	NA	NA	NA	NA
Total Petroleum Hydrocarbons						
C14-C20(Diesel Range)	NC	NC	NA	NA	NA	NA

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
mg/kg-day - milligrams per kilogram per day
mg/m^3 - milligrams per cubic meter

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Estimates of Human Intake
Groundwater to Ambient Air Pathway for Child Recreator
Building 64 Leach Field

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	4.4	8.8
Fraction of time outdoors	FT	fraction	1.0	1.0
Exposure frequency	EF	days/year	50	100
Exposure duration	ED	years	6	6
Body weight	BW	kg	15	15
Averaging time (noncancer)	AT	days	2190	2190
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Inorganic Compounds						
Copper	NC	NC	NA	NA	NA	NA
Nitrate	NC	NC	NA	NA	NA	NA
Thallium	NC	NC	NA	NA	NA	NA
VOCs						
1,1-Dichloroethane	NC	NC	NA	NA	NA	NA
Acetone	8.5E-13	8.5E-13	3.4E-14	1.4E-13	2.7E-15	1.1E-14
Benzene	NC	NC	NA	NA	NA	NA
Carbon disulfide	NC	NC	NA	NA	NA	NA
Chloromethane	NC	NC	NA	NA	NA	NA
cis-1,2-Dichloroethene	NC	NC	NA	NA	NA	NA
Methylene chloride	NC	NC	NA	NA	NA	NA
Toluene	1.7E-07	1.7E-07	6.9E-09	2.8E-08	5.5E-10	2.2E-09
Trichloroethene	NC	NC	NA	NA	NA	NA
Total Petroleum Hydrocarbons						
C14-C20(Diesel Range)	NC	NC	NA	NA	NA	NA

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
mg/kg-day - milligrams per kilogram per day
mg/m^3 - milligrams per cubic meter

Estimates of Human Intake
Groundwater to Ambient Air Pathway for Adult Recreator
Building 64 Leach Field

Intake Equation: Dosage = $\frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	5.2	5.2
Fraction of time outdoors	FT	fraction	1.0	1.0
Exposure frequency	EF	days/year	25	50
Exposure duration	ED	years	9	24
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	8760
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Inorganic Compounds						
Copper	NC	NC	NA	NA	NA	NA
Nitrate	NC	NC	NA	NA	NA	NA
Thallium	NC	NC	NA	NA	NA	NA
VOCs						
1,1-Dichloroethane	NC	NC	NA	NA	NA	NA
Acetone	8.5E-13	8.5E-13	4.3E-15	8.7E-15	5.2E-16	2.8E-15
Benzene	NC	NC	NA	NA	NA	NA
Carbon disulfide	NC	NC	NA	NA	NA	NA
Chloromethane	NC	NC	NA	NA	NA	NA
cis-1,2-Dichloroethene	NC	NC	NA	NA	NA	NA
Methylene chloride	NC	NC	NA	NA	NA	NA
Toluene	1.7E-07	1.7E-07	8.8E-10	1.8E-09	1.1E-10	5.6E-10
Trichloroethene	NC	NC	NA	NA	NA	NA
Total Petroleum Hydrocarbons						
C14-C20(Diesel Range)	NC	NC	NA	NA	NA	NA

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
mg/kg-day - milligrams per kilogram per day
mg/m^3 - milligrams per cubic meter

Estimates of Human Intake
Groundwater to Indoor Air Pathway for Adult Worker
Building 64 Leach Field

Intake Equation:

$$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	10.4	16.0
Fraction of time indoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	219	250
Exposure duration	ED	years	9	25
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	9125
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Inorganic Compounds						
Copper	NC	NC	NA	NA	NA	NA
Nitrate	NC	NC	NA	NA	NA	NA
Thallium	NC	NC	NA	NA	NA	NA
VOCs						
1,1-Dichloroethane	NC	NC	NA	NA	NA	NA
Acetone	6.4E-08	6.4E-08	2.9E-09	7.5E-09	3.4E-10	2.5E-09
Benzene	NC	NC	NA	NA	NA	NA
Carbon disulfide	NC	NC	NA	NA	NA	NA
Chloromethane	NC	NC	NA	NA	NA	NA
cis-1,2-Dichloroethene	NC	NC	NA	NA	NA	NA
Methylene chloride	NC	NC	NA	NA	NA	NA
Toluene	3.7E-06	3.7E-06	1.6E-07	4.3E-07	2.0E-08	1.4E-07
Trichloroethene	NC	NC	NA	NA	NA	NA
Total Petroleum Hydrocarbons						
C14-C20(Diesel Range)	NC	NC	NA	NA	NA	NA

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
mg/kg-day - milligrams per kilogram per day
mg/m^3 - milligrams per cubic meter

Spreadsheet C4-41 (1 of 1)

Estimates of Human Intake
Groundwater to Ambient Air Pathway for Adult Worker
Building 64 Leach Field

Intake Equation: $$\text{Dosage} = \frac{C \times IR \times FT \times EF \times ED}{BW \times AT}$$

Exposure Parameters		Units	Typical	RME
Indoor air concentration	C	mg/m^3	CS	CS
Inhalation rate	IR	m^3/day	10.4	16.0
Fraction of time outdoors	FT	fraction	0.50	0.75
Exposure frequency	EF	days/year	219	250
Exposure duration	ED	years	9	25
Body weight	BW	kg	70	70
Averaging time (noncancer)	AT	days	3285	9125
Averaging time (cancer)	AT	days	27375	27375

Chemical Specific Parameters	Typical EPC (mg/m^3)	RME EPC (mg/m^3)	Typical ADD (mg/kg-day)	RME ADD (mg/kg-day)	Typical LADD (mg/kg-day)	RME LADD (mg/kg-day)
Inorganic Compounds						
Copper	NC	NC	NA	NA	NA	NA
Nitrate	NC	NC	NA	NA	NA	NA
Thallium	NC	NC	NA	NA	NA	NA
VOCs						
1,1-Dichloroethane	NC	NC	NA	NA	NA	NA
Acetone	8.5E-13	8.5E-13	3.8E-14	1.0E-13	4.6E-15	3.3E-14
Benzene	NC	NC	NA	NA	NA	NA
Carbon disulfide	NC	NC	NA	NA	NA	NA
Chloromethane	NC	NC	NA	NA	NA	NA
cis-1,2-Dichloroethene	NC	NC	NA	NA	NA	NA
Methylene chloride	NC	NC	NA	NA	NA	NA
Toluene	1.7E-07	1.7E-07	7.7E-09	2.0E-08	9.2E-10	6.7E-09
Trichloroethene	NC	NC	NA	NA	NA	NA
Total Petroleum Hydrocarbons						
C14-C20(Diesel Range)	NC	NC	NA	NA	NA	NA

Notes:
CS - chemical specific
NC - not selected as a COPC in the indicated media, per the SRAM (MWH 2005).
NA - indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
Typical - typical or average exposure as defined in the SRAM (MWH 2005)
RME - reasonable maximum exposure as defined in the SRAM (MWH 2005)
EPC - exposure point concentration
ADD - average daily dose
LADD - lifefime average daily dose
All exposure parameter values are taken from or calculated using the methods described in the SRAM (MWH 2005).
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCDD/PCDF - Polychlorinated dibenzo-p-dioxins and polychlorinated dibenzofurans.
PCB - polychlorinated biphenyls
mg/kg-day - milligrams per kilogram per day
mg/m^3 - milligrams per cubic meter

Estimated Human Intake for the Child Resident
Building 64 Leach Field

Central Tendancy Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation of Indoor Air_s		Inhalation Ambient Air_s		Inhalation of Indoor Air_{gw}		Inhalation Ambient Air_{gw}		Domestic Groundwater Use		Plant Consumption	
	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)
Inorganic Compounds																		
Copper	-	-	-	-	-	-	-	-	-	-	-	-	-	-	8.6E-04	6.9E-05	-	-
Fluoride	-	-	-	-	-	-	-	-	-	-	-	-	-	-	2.7E-02	2.1E-03	-	-
Nitrate	-	-	-	-	-	-	-	-	-	-	-	-	-	-	6.8E-01	5.4E-02	-	-
Thallium	-	-	-	-	-	-	-	-	-	-	-	-	-	-	2.6E-05	2.1E-06	-	-
VOCs																		
1,1-Dichloroethane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	2.5E-04	2.0E-05	-	-
Acetone	-	-	-	-	-	-	-	-	-	-	5.4E-08	4.3E-09	2.3E-13	1.8E-14	1.5E-03	1.2E-04	-	-
Benzene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	5.6E-05	4.4E-06	-	-
Carbon disulfide	-	-	-	-	-	-	-	-	-	-	-	-	-	-	2.5E-04	2.0E-05	-	-
Chloromethane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	3.1E-05	2.5E-06	-	-
cis-1,2-Dichloroethene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	4.9E-03	3.9E-04	-	-
Methylene chloride	-	-	-	-	-	-	-	-	-	-	-	-	-	-	6.1E-05	4.9E-06	-	-
Toluene	-	-	-	-	-	-	-	-	-	-	3.1E-06	2.5E-07	4.6E-08	3.7E-09	1.7E-04	1.4E-05	-	-
Trichloroethene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	9.6E-04	7.7E-05	-	-
Total Petroleum Hydrocarbons																		
C14-C20(Diesel Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	2.4E-03	1.9E-04	-	-

Reasonable Maximum Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation of Indoor Air_s		Inhalation Ambient Air_s		Inhalation of Indoor Air_{gw}		Inhalation Ambient Air_{gw}		Domestic Groundwater Use		Plant Consumption	
	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)
Inorganic Compounds																		
Copper	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1.4E-03	1.2E-04	-	-
Fluoride	-	-	-	-	-	-	-	-	-	-	-	-	-	-	4.5E-02	3.6E-03	-	-
Nitrate	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1.1E+00	9.1E-02	-	-
Thallium	-	-	-	-	-	-	-	-	-	-	-	-	-	-	4.3E-05	3.5E-06	-	-
VOCs																		
1,1-Dichloroethane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	4.2E-04	3.3E-05	-	-
Acetone	-	-	-	-	-	-	-	-	-	-	8.0E-08	6.4E-09	3.4E-13	2.7E-14	2.6E-03	2.0E-04	-	-
Benzene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	9.3E-05	7.4E-06	-	-
Carbon disulfide	-	-	-	-	-	-	-	-	-	-	-	-	-	-	4.2E-04	3.3E-05	-	-
Chloromethane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	5.1E-05	4.1E-06	-	-
cis-1,2-Dichloroethene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	8.2E-03	6.5E-04	-	-
Methylene chloride	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1.0E-04	8.2E-06	-	-
Toluene	-	-	-	-	-	-	-	-	-	-	4.6E-06	3.7E-07	6.9E-08	5.5E-09	2.9E-04	2.3E-05	-	-
Trichloroethene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1.6E-03	1.3E-04	-	-
Total Petroleum Hydrocarbons																		
C14-C20(Diesel Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	4.0E-03	3.2E-04	-	-

Notes:
Inhalation Indoor Air_{s-gw} - Exposure associated with indoor air concentrations of COPCs modeled from soil vapor, soil, or groundwater.
Inhalation Ambient Air_{s-gw} - Exposure associated with ambient air concentrations of COPCs modeled from soil or groundwater.
ADD - Average daily dose, as defined in the SRAM (MWH 2005).
LADD - Lifetime average daily dose, as defined in the SRAM (MWH 2005).
The chemicals presented in this table are comprehensive for all media sampled. Not all chemicals were analyzed for or detected in all media.
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyls
COPC - chemical of potential concern
"-" indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
mg/kg-day - milligrams per kilogram day

Spreadsheet C4-35 (1 of 1)

Estimated Human Intake for the Adult Resident
Building 64 Leach Field

Central Tendancy Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation of Indoor Air$_{s}$		Inhalation Ambient Air$_{s}$		Inhalation of Indoor Air$_{gw}$		Inhalation Ambient Air$_{gw}$		Domestic Groundwater Use		Plant Consumption	
	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)
Inorganic Compounds																		
Copper	-	-	-	-	-	-	-	-	-	-	-	-	-	-	2.5E-04	3.0E-05	-	-
Fluoride	-	-	-	-	-	-	-	-	-	-	-	-	-	-	7.7E-03	9.2E-04	-	-
Nitrate	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1.9E-01	2.3E-02	-	-
Thallium	-	-	-	-	-	-	-	-	-	-	-	-	-	-	7.4E-06	8.9E-07	-	-
VOCs																		
1,1-Dichloroethane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	7.1E-05	8.5E-06	-	-
Acetone	-	-	-	-	-	-	-	-	-	-	9.6E-09	1.1E-09	4.1E-14	4.9E-15	4.4E-04	5.3E-05	-	-
Benzene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1.6E-05	1.9E-06	-	-
Carbon disulfide	-	-	-	-	-	-	-	-	-	-	-	-	-	-	7.1E-05	8.5E-06	-	-
Chloromethane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	8.8E-06	1.1E-06	-	-
cis-1,2-Dichloroethene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1.4E-03	1.7E-04	-	-
Methylene chloride	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1.8E-05	2.1E-06	-	-
Toluene	-	-	-	-	-	-	-	-	-	-	5.5E-07	6.6E-08	8.3E-09	9.9E-10	4.9E-05	5.9E-06	-	-
Trichloroethene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	2.7E-04	3.3E-05	-	-
Total Petroleum Hydrocarbons																		
C14-C20(Diesel Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	6.8E-04	8.2E-05	-	-
							-	-	-	-	-	-	-	-				

Reasonable Maximum Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation of Indoor Air$_{s}$		Inhalation Ambient Air$_{s}$		Inhalation of Indoor Air$_{gw}$		Inhalation Ambient Air$_{gw}$		Domestic Grounder Use		Plant Consumption	
	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)
Inorganic Compounds																		
Copper	-	-	-	-	-	-	-	-	-	-	-	-	-	-	3.8E-04	1.2E-04	-	-
Fluoride	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1.2E-02	3.8E-03	-	-
Nitrate	-	-	-	-	-	-	-	-	-	-	-	-	-	-	3.0E-01	9.6E-02	-	-
Thallium	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1.1E-05	3.6E-06	-	-
VOCs																		
1,1-Dichloroethane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1.1E-04	3.5E-05	-	-
Acetone	-	-	-	-	-	-	-	-	-	-	2.7E-08	8.7E-09	1.2E-13	3.7E-14	6.8E-04	2.2E-04	-	-
Benzene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	2.4E-05	7.8E-06	-	-
Carbon disulfide	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1.1E-04	3.5E-05	-	-
Chloromethane	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1.4E-05	4.3E-06	-	-
cis-1,2-Dichloroethene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	2.2E-03	6.9E-04	-	-
Methylene chloride	-	-	-	-	-	-	-	-	-	-	-	-	-	-	2.7E-05	8.6E-06	-	-
Toluene	-	-	-	-	-	-	-	-	-	-	1.5E-06	5.0E-07	2.3E-08	7.5E-09	7.6E-05	2.4E-05	-	-
Trichloroethene	-	-	-	-	-	-	-	-	-	-	-	-	-	-	4.2E-04	1.4E-04	-	-
Total Petroleum Hydrocarbons																		
C14-C20(Diesel Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1.1E-03	3.4E-04	-	-

Notes:
Inhalation Indoor Air$_{s-gw}$ - Exposure associated with indoor air concentrations of COPCs modeled from soil vapor, soil, or groundwater.
Inhalation Ambient Air$_{s-gw}$ - Exposure associated with ambient air concentrations of COPCs modeled from soil or groundwater.
ADD - Average daily dose, as defined in the SRAM (MWH 2005).
LADD - Lifetime average daily dose, as defined in the SRAM (MWH 2005).
The chemicals presented in this table are comprehensive for all media sampled. Not all chemicals were analyzed for or detected in all media.
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyls
COPC - chemical of potential concern
"-" indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
mg/kg-day - milligrams per kilogram day

Spreadsheet C4-34 (1 of 1)

Estimated Human Intake for the Child Recreator
Building 64 Leach Field

Central Tendancy Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation Ambient Air_s		Inhalation Ambient Air_{gw}	
	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)
Inorganic Compounds										
Copper	-	-	-	-	-	-	-	-	-	-
Nitrate	-	-	-	-	-	-	-	-	-	-
Thallium	-	-	-	-	-	-	-	-	-	-
VOCs										
1,1-Dichloroethane	-	-	-	-	-	-	-	-	-	-
Acetone	-	-	-	-	-	-	-	-	3.4E-14	2.7E-15
Benzene	-	-	-	-	-	-	-	-	-	-
Carbon disulfide	-	-	-	-	-	-	-	-	-	-
Chloromethane	-	-	-	-	-	-	-	-	-	-
cis-1,2-Dichloroethene	-	-	-	-	-	-	-	-	-	-
Methylene chloride	-	-	-	-	-	-	-	-	-	-
Toluene	-	-	-	-	-	-	-	-	6.9E-09	5.5E-10
Trichloroethene	-	-	-	-	-	-	-	-	-	-
Total Petroleum Hydrocarbons										
C14-C20(Diesel Range)	-	-	-	-	-	-	-	-	-	-

Reasonable Maximum Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation of Indoor Air		Inhalation Ambient Air_{s-gw}	
	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)
Inorganic Compounds										
Copper	-	-	-	-	-	-	-	-	-	-
Nitrate	-	-	-	-	-	-	-	-	-	-
Thallium	-	-	-	-	-	-	-	-	-	-
VOCs										
1,1-Dichloroethane	-	-	-	-	-	-	-	-	-	-
Acetone	-	-	-	-	-	-	-	-	1.4E-13	1.1E-14
Benzene	-	-	-	-	-	-	-	-	-	-
Carbon disulfide	-	-	-	-	-	-	-	-	-	-
Chloromethane	-	-	-	-	-	-	-	-	-	-
cis-1,2-Dichloroethene	-	-	-	-	-	-	-	-	-	-
Methylene chloride	-	-	-	-	-	-	-	-	-	-
Toluene	-	-	-	-	-	-	-	-	2.8E-08	2.2E-09
Trichloroethene	-	-	-	-	-	-	-	-	-	-
Total Petroleum Hydrocarbons										
C14-C20(Diesel Range)	-	-	-	-	-	-	-	-	-	-

Notes:
Inhalation Ambient Air_{s-gw} - Exposure associated with ambient air concentrations of COPCs modeled from soil or groundwater.
ADD - Average daily dose, as defined in the SRAM (MWH 2005).
LADD - Lifetime average daily dose, as defined in the SRAM (MWH 2005).
The chemicals presented in this table are comprehensive for all media sampled. Not all chemicals were analyzed for or detected in all media.
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyls
COPC - chemical of potential concern
"-" indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
mg/kg-day - milligrams per kilogram per day

Spreadsheet C4-33 (1 of 1)

Estimated Human Intake for the Adult Recreator
Building 64 Leach Field

Central Tendancy Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation Ambient Air_s		Inhalation Ambient Air_{gw}	
	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)
Inorganic Compounds										
Copper	-	-	-	-	-	-	-	-	-	-
Nitrate	-	-	-	-	-	-	-	-	-	-
Thallium	-	-	-	-	-	-	-	-	-	-
VOCs										
1,1-Dichloroethane	-	-	-	-	-	-	-	-	-	-
Acetone	-	-	-	-	-	-	-	-	4.3E-15	5.2E-16
Benzene	-	-	-	-	-	-	-	-	-	-
Chloromethane	-	-	-	-	-	-	-	-	-	-
cis-1,2-Dichloroethene	-	-	-	-	-	-	-	-	-	-
Methylene chloride	-	-	-	-	-	-	-	-	-	-
Toluene	-	-	-	-	-	-	-	-	8.8E-10	1.1E-10
Trichloroethene	-	-	-	-	-	-	-	-	-	-
Total Petroleum Hydrocarbons										
C14-C20(Diesel Range)	-	-	-	-	-	-	-	-	-	-

Reasonable Maximum Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation Ambient Air_s		Inhalation Ambient Air_{gw}	
	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)
Inorganic Compounds										
Copper	-	-	-	-	-	-	-	-	-	-
Nitrate	-	-	-	-	-	-	-	-	-	-
Thallium	-	-	-	-	-	-	-	-	-	-
VOCs										
1,1-Dichloroethane	-	-	-	-	-	-	-	-	-	-
Acetone	-	-	-	-	-	-	-	-	8.7E-15	2.8E-15
Benzene	-	-	-	-	-	-	-	-	-	-
Carbon disulfide	-	-	-	-	-	-	-	-	-	-
Chloromethane	-	-	-	-	-	-	-	-	-	-
cis-1,2-Dichloroethene	-	-	-	-	-	-	-	-	-	-
Methylene chloride	-	-	-	-	-	-	-	-	-	-
Toluene	-	-	-	-	-	-	-	-	1.8E-09	5.6E-10
Trichloroethene	-	-	-	-	-	-	-	-	-	-
Total Petroleum Hydrocarbons										
C14-C20(Diesel Range)	-	-	-	-	-	-	-	-	-	-

Notes:
Inhalation Ambient Air_{s-gw} - Exposure associated with ambient air concentrations of COPCs modeled from soil or groundwater
ADD - Average daily dose, as defined in the SRAM (MWH 2005).
LADD - Lifetime average daily dose, as defined in the SRAM (MWH 2005).
The chemicals presented in this table are comprehensive for all media sampled. Not all chemicals were analyzed for or detected in all media.
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyls
COPC - chemical of potential concern
"-" indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
mg/kg-day - milligrams per kilogram per day

Estimated Human Intake for the Adult Worker
Building 64 Leach Field

Central Tendancy Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation of Indoor Air_s		Inhalation Ambient Air_s		Inhalation of Indoor Air_{gw}		Inhalation Ambient Air_{gw}	
	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)
Inorganic Compounds														
Copper	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Nitrate	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Thallium	-	-	-	-	-	-	-	-	-	-	-	-	-	-
VOCs														
1,1-Dichloroethane	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Acetone	-	-	-	-	-	-	-	-	-	-	2.9E-09	3.4E-10	3.8E-14	4.6E-15
Benzene	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Chloromethane	-	-	-	-	-	-	-	-	-	-	-	-	-	-
cis-1,2-Dichloroethene	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Methylene chloride	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Toluene	-	-	-	-	-	-	-	-	-	-	1.6E-07	2.0E-08	7.7E-09	9.2E-10
Trichloroethene	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Total Petroleum Hydrocarbons														
C14-C20(Diesel Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-

Reasonable Maximum Exposure

Chemical	Soil Ingestion		Soil Dermal Contact		Soil Particulate Inhalation		Inhalation of Indoor Air_s		Inhalation Ambient Air_s		Inhalation of Indoor Air_{gw}		Inhalation Ambient Air_{gw}	
	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)	ADD (mg/kg-day)	LADD (mg/kg-day)
Inorganic Compounds														
Copper	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Nitrate	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Thallium	-	-	-	-	-	-	-	-	-	-	-	-	-	-
VOCs														
1,1-Dichloroethane	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Acetone	-	-	-	-	-	-	-	-	-	-	7.5E-09	2.5E-09	1.0E-13	3.3E-14
Benzene	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Carbon disulfide	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Chloromethane	-	-	-	-	-	-	-	-	-	-	-	-	-	-
cis-1,2-Dichloroethene	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Methylene chloride	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Toluene	-	-	-	-	-	-	-	-	-	-	4.3E-07	1.4E-07	2.0E-08	6.7E-09
Trichloroethene	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Total Petroleum Hydrocarbons														
C14-C20(Diesel Range)	-	-	-	-	-	-	-	-	-	-	-	-	-	-

Notes:
Inhalation Indoor Air $_{s-gw}$ - Exposure associated with indoor air concentrations of COPCs modeled from soil vapor, soil, or groundwater.
Inhalation Ambient Air $_{s-gw}$ - Exposure associated with ambient air concentrations of COPCs modeled from soil or groundwater.
ADD - Average daily dose, as defined in the SRAM (MWH 2005).
LADD - Lifetime average daily dose, as defined in the SRAM (MWH 2005).
The chemicals presented in this table are comprehensive for all media sampled. Not all chemicals were analyzed for or detected in all media.
VOC - volatile organic compound
SVOC - semi-volatile organic compound
PCB - polychlorinated biphenyls
COPC - chemical of potential concern
"-" indicates that evaluation of the respective chemical is not applicable for the given pathway, per the SRAM (MWH 2005).
mg/kg-day - milligrams per kilogram per day

Migration of Volatile COPC from Groundwater to Residential Building Indoor Air
Building 64 Leach Fields RFI Site

Chemical -Specific Values[a]	CTE Groundwater Concentration[b] C_r^{CTE} (mg/L)	RME Groundwater Concentration[b] C_r^{RME} (mg/L)	CTE Indoor Air Concentration[c] $C_{building}^{CTE}$ (µg/m3)	RME Indoor Air Concentration[c] $C_{building}^{RME}$ (µg/m3)
VOCs				
Chloromethane	3.2E-04	3.2E-04	2.1E-03	2.1E-03
cis-1,2-Dichloroethene	3.5E-04	3.5E-04	9.1E-04	9.1E-04
Trichloroethene	4.3E-03	4.3E-03	2.7E-02	2.7E-02

Site-Specific and Default Values			
Average soil Temperature (T_s)	1.8E+01	C°	Region-specific, estimated from graph presented in USEPA (2
Depth below grade to bottom of enclosed space floor ($_f$)	1.5E+01	cm	USEPA (2002) default for slab-on-grade constructio
Depth below grade to water table (L_w^T)	1.9E+03	cm	See note (d)
Thickness of soil stratum A (l_A)	3.0E+02	cm	As defined by USEPA (2002), equal to Lw
Soil Stratum A SCS soil type	SL		Site-specific - sandy loam
Soil bulk density for soil stratum A ($_b^A$)	1.7E+00	g/cm³	Site-specific - as per SRAM (MWH, 2005
Soil porosity for soil stratum A (n^A)	3.7E-01	cm^3/cm^3	Site-specific - as per SRAM (MWH, 2005)
Soil water filled porosity for soil stratum A ($_w^A$)	1.1E-01	cm³/cm³	Site-specific - as per SRAM (MWH, 2005
Thickness of soil stratum B (l_B)	3.0E+02	cm	Conservatively assumed to be 10 fee
Soil Stratum B SCS soil type	Weathered Bedrock		
Soil bulk density for soil stratum B ($_b^B$)	1.7E+00	g/cm³	Site-specific - as per SRAM (MWH, 2005
Soil porosity for soil stratum B (n^B)	2.0E-01	cm^3/cm^3	Site-specific - as per SRAM (MWH, 2005)
Soil water filled porosity for soil stratum B ($_w^B$)	5.3E-02	cm³/cm³	Site-specific - as per SRAM (MWH, 2005
Weathered bedrock fractures (ϕwbr)	1.0E-04	cm^3/cm^3	MWH (2003)
Thickness of soil stratum C (l_C)	1.2E+03	cm	L_w-h_A - h_B
Soil Stratum C SCS soil type	nweathered Bedrock		
Soil bulk density for soil stratum C ($_b^C$)	1.7E+00	g/cm³	Site-specific - as per SRAM (MWH, 2005
Soil porosity for soil stratum C (n^C)	1.3E-01	cm^3/cm^3	Site-specific - as per SRAM (MWH, 2005)
Soil water filled porosity for soil stratum C ($_w^C$)	5.1E-02	cm³/cm³	Site-specific - as per SRAM (MWH, 2005
Unweathered bedrock fractures (ϕubr)	5.0E-05	cm^3/cm^3	MWH (2003)
Enclosed space floor thickness (l_{crack})	1.5E+01	cm	USEPA (2002) default value
Soil building pressure differential (^P)	4.0E+01	(g/cm-s²)	USEPA (2002) default value.
Enclosed space floor length (L_B)	1.0E+03	cm	USEPA (2002) default value
Enclosed space floor width (W_B)	1.0E+03	cm	USEPA (2002) default value
Enclosed space height (H_B)	2.4E+02	cm	USEPA (2002) default value
Floor-wall seam crack width (w)	1.0E-01	cm	USEPA (2002) default value.
Indoor air exchange rate (ER)	5.0E-01	(1/hour)	DTSC (2005) default value.

Notes:

a. DTSC (1999) chemical-specific physical/chemical property values used to model soil to indoor air COPC concentrations, with the exception of 1,1,2-trichloro-1,2,2-trifluoroethan
Physical/chemical property values for 1,1,2-trichloro-1,2,2-trifluoroethane obtained from the Hazardous Substance Data Base (HSDB) and incorporated into the DTSC (1999) loo

b. Exposure point concentrations (EPC) as presented in Spreadsheet D-13.

c. Indoor air concentrations estimated using USEPA (1997) Johnson and Ettinger Indoor Air Model as modified by DTSC (1999), Version 1.3.

d. Depth below grade to water table estimated as the average depth to groundwater.

COPC - chemical of potential concern

UCL - upper confidence limit

CTE - Central Tendency Exposure

RME - Reasonable Maximum Exposure

Migration of Volatile COPC from Groundwater to Commercial Building Indoor Air
Building 64 Leach Fields RFI Site

Chemical -Specific Values[a]	CTE Groundwater Concentration[b] C_{rCTE} (mg/L)	RME Groundwater Concentration[b] C_{rRME} (mg/L)	CTE Indoor Air Concentration[c] $C_{buildingCTE}$ (µg/m3)	RME Indoor Air Concentration[c] $C_{buildingRME}$ (µg/m3)
VOCs				
Chloromethane	3.2E-04	3.2E-04	6.6E-04	6.6E-04
cis-1,2-Dichloroethene	3.5E-04	3.5E-04	2.9E-04	2.9E-04
Trichloroethene	4.3E-03	4.3E-03	8.8E-03	8.8E-03

Site-Specific and Default Values			
Average soil Temperature (T_s)	1.8E+01	C°	Region-specific, estimated from graph presented in USEPA (200
Depth below grade to bottom of enclosed space floor ($_f$)	1.5E+01	cm	USEPA (2002) default for slab-on-grade constructior
Depth below grade to water table (L_w^t)	1.9E+03	cm	See note (d)
Thickness of soil stratum A (l_A)	3.0E+02	cm	Conservatively assumed to be 10 fee
Soil Stratum A SCS soil type	SL		Site-specific - sandy loam
Soil bulk density for soil stratum A (l_b^A)	1.7E+00	g/cm³	Site-specific - as per SRAM (MWH, 2005
Soil porosity for soil stratum A (n^A)	3.7E-01	cm^3/cm^3	Site-specific - as per SRAM (MWH, 2005)
Soil water filled porosity for soil stratum A ($_w^A$)	1.1E-01	cm³/cm³	Site-specific - as per SRAM (MWH, 2005
Thickness of soil stratum B (l_B)	3.0E+02	cm	Conservatively assumed to be 10 fee
Soil Stratum B SCS soil type	Weathered Bedrock		
Soil bulk density for soil stratum B (l_b^B)	1.7E+00	g/cm³	Site-specific - as per SRAM (MWH, 2005
Soil porosity for soil stratum B (n^B)	2.0E-01	cm^3/cm^3	Site-specific - as per SRAM (MWH, 2005)
Soil water filled porosity for soil stratum B ($_w^B$)	5.3E-02	cm³/cm³	Site-specific - as per SRAM (MWH, 2005
Weathered bedrock fractures (ϕwbr)	1.0E-04	cm^3/cm^3	MWH (2003)
Thickness of soil stratum C (l_C)	1.2E+03	cm	L_w-h_A - h_B
Soil Stratum C SCS soil type	Jnweathered Bedrock		
Soil bulk density for soil stratum C (l_b^C)	1.7E+00	g/cm³	Site-specific - as per SRAM (MWH, 2005
Soil porosity for soil stratum C (n^C)	1.3E-01	cm^3/cm^3	Site-specific - as per SRAM (MWH, 2005)
Soil water filled porosity for soil stratum C ($_w^C$)	5.1E-02	cm³/cm³	Site-specific - as per SRAM (MWH, 2005
Unweathered bedrock fractures (ϕubr)	5.0E-05	cm^3/cm^3	MWH (2003)
Enclosed space floor thickness (l_{crack})	1.5E+01	cm	USEPA (2002) default value.
Soil building pressure differential (^P)	2.0E+01	(g/cm-s²)	Mid-point of range presented in USEPA (1997), to account for slab-on-grade con
Enclosed space floor length (L_B)	3.0E+03	cm	Site-specific - based on 10,000 f² commercial building
Enclosed space floor width (W_B)	3.0E+03	cm	Site-specific - based on 10,000 f² commercial building

Flux Rates and Ambient Air Concentrations Estimated for Volatile COPC in Groundwater
Building 64 Leach Fields RFI Site

Volatile COPC	6-Year[a] Exposure Flux Rate Js (mg/sec-m^2)	9-Year[b] Exposure Flux Rate Js (mg/sec-m^2)	24-Year[c] Exposure Flux Rate Js (mg/sec-m^2)	25-Year[d] Exposure Flux Rate Js (mg/sec-m^2)	6-Year[a] Time-Averaged Air Concentration Ca (mg/m^3)	9-Year[b] Time-Averaged Air Concentration Ca (mg/m^3)	24-Year[c] Time-Averaged Air Concentration Ca (mg/m^3)	25-Year[d] Time-Averaged Air Concentration Ca (mg/m^3)
VOCs								
Chloromethane	5.4E-09	5.4E-09	5.4E-09	5.4E-09	1.3E-07	1.3E-07	1.3E-07	1.3E-07
cis-1,2-Dichloroethene	1.3E-09	1.3E-09	1.3E-09	1.3E-09	3.2E-08	3.2E-08	3.2E-08	3.2E-08
Trichloroethene	4.5E-08	4.5E-08	4.5E-08	4.5E-08	1.1E-06	1.1E-06	1.1E-06	1.1E-06

Site-Specific Values		
Length of box (L)	198 m	[e]
Mixing height (H)	2 m	[f]
Wind speed (WS)	2 m/s	[g]

Notes:
a. 6-year exposure is applicable to average and RME residential and recreational child scenario.
b. 9-year exposure is applicable to average worker scenario.
c. 24-year exposure is applicable to average and RME residential and recreational adult scenario.
d. 25-year exposure is applicable to RME worker scenario.
e. Site-specific; equal to the square root of the total area of the RFI site.
f. EPA default value.
g. Site-specific value, as presented in the SRAM (MWH 2005).
COPC - chemical of potential concern
VOC - volatile organic compound
mg/sec-m^2 - milligram per second per square meter
mg/m^3 - milligram per cubic meter

Spreadsheet C4-22 (1 of 1)

Parameter Values Used for Migration of Volatile COPC from Groundwater to Ambient Air
Building 64 Leach Fields RFI Site

Constituent	RME Soil Vapor Concentration Cs (ug/m^3)	Diffusivity in air D_a (cm^2/s)	Diffusivity in water D_w (cm^2/s)	Henry's law constant at reference temperature H (atm-m^3/mol)	Organic carbon partition coefficient K_{oc} (cm^3/g)	Effective diffusion coefficient D^{eff}_A (cm^2/s)
Chloromethane	9.76E+01	1.26E-01	6.50E-06	8.80E-03	2.12E+00	1.06E-02
cis-1,2-Dichloroethene	4.37E+01	7.36E-02	1.13E-05	4.07E-03	3.55E+01	6.21E-03
Trichloroethene	1.31E+03	7.90E-02	9.10E-06	1.03E-02	1.66E+02	6.67E-03

Site-Specific and Default Values

Organic carbon content of soil (f_{oc})	2.3E-03	fraction	Site-specific - as per SRAM (MWH, 2005)
Soil bulk density for soil stratum (P_b)	1.7E+00	g/cm^3	Site-specific - as per SRAM (MWH, 2005)
Soil porosity (n)	3.7E-01	cm^3/cm^3	Site-specific - as per SRAM (MWH, 2005)
Soil water filled porosity (0_w)	1.1E-01	cm^3/cm^3	Site-specific - as per SRAM (MWH, 2005)
Depth to groundwater (L)	1859	cm	Site-specific
Site Area (A)	0.26	acres	Site-specific
Q/C coefficient A	12	unitless	USEPA (2002) default
Q/C coefficient B	18	unitless	USEPA (2002) default
Q/C coefficient C	210	unitless	USEPA (2002) default
Q/C	41	g/m2-s/kg/m3	USEPA (2002)
Water recharge (R)	1.0E-09	m/s	Site-specific - as per SRAM (MWH, 2005)

Spreadsheet C4-13b (1 of 1)

Exposure Point Concentrations for COPCs in Chatsworth Formation
Building 64 Leach Fields

Chemical	Distribution Type	EPCs	
		CTE[a] (mg/L)	RME[a] (mg/L)
VOCs			
Acetone	NT	5.0E-03	5.0E-03
Toluene	NT	1.8E-03	1.8E-03

Notes:
a. The maximum detected concentration.
COPC - chemical of potential concern
EPC - exposure point concentration
CTE - Central Tendency Exposure
RME - Reasonable Maximum Exposure
VOC - volatile organic compound
NT - data not tested for distribution due to sample size
"-" not applicable
mg/L - milligrams per liter
bgs - below ground surface

Spreadsheet C4-13a (1 of 1)

Exposure Point Concentrations for COPCs in Chatsworth Formation
Group 6 Reporting Area

Chemical	Distribution Type	EPCs	
		CTE[a] (mg/L)	RME[a] (mg/L)
Inorganic Compounds			
Copper	NT	1.8E-02	1.8E-02
Fluoride	NT	5.6E-01	5.6E-01
Nitrate	NT	1.4E+01	1.4E+01
Thallium	NT	5.4E-04	5.4E-04
VOCs			
1,1-Dichloroethane	NT	2.6E-03	2.6E-03
1,2-Dichloroethane	NT	9.0E-04	9.0E-04
Acetone	NT	1.6E-02	1.6E-02
Benzene	NT	5.8E-04	5.8E-04
Carbon disulfide	NT	2.6E-03	2.6E-03
Chloromethane	NT	3.2E-04	3.2E-04
cis-1,2-Dichloroethene	NT	5.1E-02	5.1E-02
Methylene chloride	NT	6.4E-04	6.4E-04
Toluene	NT	1.8E-03	1.8E-03
Trichloroethene	NT	1.0E-02	1.0E-02
Total Petroleum Hydrocarbons			
C14-C20(Diesel Range)	NT	5.0E-02	5.0E-02

Notes:
a. The maximum detected concentration.
COPC - chemical of potential concern
EPC - exposure point concentration
CTE - Central Tendency Exposure
RME - Reasonable Maximum Exposure
VOC - volatile organic compound
NT - data not tested for distribution due to sample size
"-" not applicable
mg/L - milligrams per liter
bgs - below ground surface

Comparison of Inorganic Compound Concentrations in Soil (0-2 feet bgs) Against Background[a]
Building 64 Leach Fields

Inorganic Compounds	Maximum Background [a] (mg/kg)	Maximum RFI Site (mg/kg)	Results of Wilcoxon-Rank Sum Test	RFI Site Ever Detected?	RFI Site Exceeds Background?	
Aluminum	2.0E+04	1.4E+04	No	Yes	No	b
Antimony	8.7E+00	1.6E-01	No	Yes	No	b
Arsenic	1.5E+01	3.4E+00	No	Yes	No	b
Barium	1.4E+02	7.9E+01	No	Yes	No	b
Beryllium	1.1E+00	5.6E-01	No	Yes	No	b
Boron	9.7E+00	3.5E+00	No	Yes	No	b
Cadmium	1.0E+00	3.9E-01	No	Yes	No	b
Chromium	3.7E+01	2.4E+01	No	Yes	No	b
Cobalt	2.1E+01	6.5E+00	No	Yes	No	b
Copper	2.9E+01	1.5E+01	No	Yes	No	b
Lead	3.4E+01	4.0E+01	No	Yes	No	b
Manganese	5.0E+02	2.9E+02	No	Yes	No	b
Mercury	9.0E-02	2.4E-02	No	Yes	No	b
Molybdenum	5.3E+00	3.4E-01	No	No	No	b
Nickel	2.9E+01	1.4E+01	No	Yes	No	b
Selenium	6.6E-01	4.1E-01	No	Yes	No	b
Silver	7.9E-01	1.5E-01	No	Yes	No	b
Thallium	4.6E-01	4.8E-01	Yes	Yes	Yes	c
Vanadium	6.2E+01	3.6E+01	No	Yes	No	b
Zinc	1.1E+02	1.2E+02	No	Yes	No	b

Notes:

a. The concentrations of inorganic compounds for which soil background data are not available are considered to be above background concentrations if they are detected and are potentially site-related.

b. Determined be within the range of background since the RFI site sample population for soils at 0 to 2 feet bgs was found to be no different than the background sample population at p=0.05 based on the Wilcoxon Rank Sum Test.

c. Although the WRS test indicates site concentrations may be different from background, the detected concentrations are generally consistent

Selection of Chemicals of Potential Concern in Chatsworth Formation Groundwater
Building 64 Leach Fields

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (mg/L)	Potentially Site Related	Chemical Detected in Laboratory Blanks [a]	Maximum Detected Concentration Exceeds Background [b]	COPC
Inorganic Compounds								
Aluminum	-	-	-	-	No	No	No	No
Antimony	-	-	-	-	No	No	No	No
Arsenic	-	-	-	-	No	No	No	No
Barium	-	-	-	-	No	No	No	No
Beryllium	-	-	-	-	No	No	No	No
Boron	-	-	-	-	No	No	No	No
Cadmium	-	-	-	-	No	No	No	No
Chromium	-	-	-	-	No	No	No	No
Hexavalent chromium	-	-	-	-	No	No	No	No
Cobalt	-	-	-	-	No	No	No	No
Copper	-	-	-	-	No	No	No	No
Fluoride	-	-	-	-	No	No	Yes	Yes
Lead	-	-	-	-	No	No	No	No
Manganese	-	-	-	-	No	No	No	No
Mercury	-	-	-	-	No	No	No	No
Molybdenum	-	-	-	-	No	No	No	No
Nickel	-	-	-	-	No	No	No	No
Nitrate	-	-	-	-	No	No	Yes	Yes
Perchlorate	-	-	-	-	No	No	-	No
Selenium	-	-	-	-	No	No	No	No
Silver	-	-	-	-	No	No	No	No
Strontium	-	-	-	-	No	No	No	No
Thallium	-	-	-	-	No	No	No	No
Tin	-	-	-	-	No	No	No	No
Vanadium	-	-	-	-	No	No	No	No
Zinc	-	-	-	-	No	No	No	No
VOCs								
1,1,1,2-Tetrachloroethane	-	-	-	-	No	No	-	No
1,1,1-Trichloroethane	-	-	-	-	No	No	-	No
1,1,2,2-Tetrachloroethane	-	-	-	-	No	No	-	No
1,1,2-Trichloro-1,2,2-trifluoroethane	-	-	-	-	No	No	-	No
1,1,2-Trichloroethane	-	-	-	-	No	No	-	No
1,1-Dichloroethane	-	-	-	-	No	No	-	No
1,1-Dichloroethene	-	-	-	-	No	No	-	No
1,1-Dichloropropene	-	-	-	-	No	No	-	No
1,2,3-Trichlorobenzene	-	-	-	-	No	No	-	No
1,2,3-Trichloropropane	-	-	-	-	No	No	-	No
1,2,4-Trichlorobenzene	-	-	-	-	No	No	-	No
1,2,4-Trimethylbenzene	-	-	-	-	No	No	-	No
1,2-Dibromo-3-chloropropane	-	-	-	-	No	No	-	No
1,2-Dibromoethane	-	-	-	-	No	No	-	No
1,2-Dichlorobenzene	-	-	-	-	No	No	-	No
1,2-Dichloroethane	-	-	-	-	No	No	-	No
1,2-Dichloropropane	-	-	-	-	No	No	-	No
1,3,5-Trimethylbenzene	-	-	-	-	No	No	-	No
1,3-Dichlorobenzene	-	-	-	-	No	No	-	No
1,4-Dichlorobenzene	-	-	-	-	No	No	-	No
2-Butanone	-	-	-	-	No	No	-	No
2-Chloroethylvinylether	-	-	-	-	No	No	-	No
2-Chlorotoluene	-	-	-	-	No	No	-	No
2-Chloro-1,1,1-trifluoroethane	-	-	-	-	No	No	-	No
2-Hexanone	-	-	-	-	No	No	-	No

Selection of Chemicals of Potential Concern in Chatsworth Formation Groundwater
Building 64 Leach Fields

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (mg/L)	Potentially Site Related	Chemical Detected in Laboratory Blanks [a]	Maximum Detected Concentration Exceeds Background [b]	COPC
4-Bromofluorobenzene	-	-	-	-	No	No	-	No
4-Chlorotoluene	-	-	-	-	No	No	-	No
4-Isopropyltoluene	-	-	-	-	No	No	-	No
4-Methyl-2-pentanone	-	-	-	-	No	No	-	No
Acetone	2	1	50	5.0E-03	No	No	-	Yes
Acrolein	-	-	-	-	No	No	-	No
Acrylonitrile	-	-	-	-	No	No	-	No
Benzene	-	-	-	-	No	No	-	No
Benzidine	-	-	-	-	No	No	-	No
Bromobenzene	-	-	-	-	No	No	-	No
Bromodichloromethane	-	-	-	-	No	No	-	No
Bromoform	-	-	-	-	No	No	-	No
Bromomethane	-	-	-	-	No	No	-	No
Carbon disulfide	-	-	-	-	No	No	-	No
Carbon tetrachloride	-	-	-	-	No	No	-	No
Chlorobenzene	-	-	-	-	No	No	-	No
Chloroethane	-	-	-	-	No	No	-	No
Chloroform	-	-	-	-	No	No	-	No
Chloromethane	-	-	-	-	No	No	-	No
Chlorotrifluoroethene	-	-	-	-	No	No	-	No
cis-1,2-Dichloroethene	-	-	-	-	No	No	-	No
cis-1,3-Dichloropropene	-	-	-	-	No	No	-	No
Dibromochloromethane	-	-	-	-	No	No	-	No
Dibromomethane	-	-	-	-	No	No	-	No
Dichlorodifluoromethane	-	-	-	-	No	No	-	No
Ethylbenzene	-	-	-	-	No	No	-	No
Formaldehyde	-	-	-	-	No	No	-	No
Isopropylbenzene	-	-	-	-	No	No	-	No
m,p-Xylene	-	-	-	-	No	No	-	No
Methyl tert-butyl ether	-	-	-	-	No	No	-	No
Methylene chloride	-	-	-	-	No	No	-	No
n-Butylbenzene	-	-	-	-	No	No	-	No
n-Propylbenzene	-	-	-	-	No	No	-	No
o-Xylene	-	-	-	-	No	No	-	No
p-Isopropyltoluene	-	-	-	-	No	No	-	No
sec-Butylbenzene	-	-	-	-	No	No	-	No
Styrene	-	-	-	-	No	No	-	No
tert-Butylbenzene	-	-	-	-	No	No	-	No
Tetrachloroethene	-	-	-	-	No	No	-	No
Toluene	2	1	50	1.8E-03	No	No	-	Yes
trans-1,2-Dichloroethene	-	-	-	-	No	No	-	No
trans-1,3-Dichloropropene	-	-	-	-	No	No	-	No
Trichloroethene	-	-	-	-	No	No	-	No
Trichlorofluoromethane	-	-	-	-	No	No	-	No
Vinyl acetate	-	-	-	-	No	No	-	No
Vinyl chloride	-	-	-	-	No	No	-	No
SVOCs								
1,2-Diphenylhydrazine	-	-	-	-	No	No	-	No
1,4-Dioxane	-	-	-	-	No	No	-	No
2,4,5-Trichlorophenol	-	-	-	-	No	No	-	No
2,4,6-Trichlorophenol	-	-	-	-	No	No	-	No
2,4-Dichlorophenol	-	-	-	-	No	No	-	No

Selection of Chemicals of Potential Concern in Chatsworth Formation Groundwater
Building 64 Leach Fields

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (mg/L)	Potentially Site Related	Chemical Detected in Laboratory Blanks [a]	Maximum Detected Concentration Exceeds Background [b]	COPC
2,4-Dimethylphenol	-	-	-	-	No	No	-	No
2,4-Dinitrophenol	-	-	-	-	No	No	-	No
2,4-Dinitrotoluene	-	-	-	-	No	No	-	No
2,6-Dinitrotoluene	-	-	-	-	No	No	-	No
2-Chloronaphthalene	-	-	-	-	No	No	-	No
2-Chlorophenol	-	-	-	-	No	No	-	No
2-Methylnaphthalene	-	-	-	-	No	No	-	No
2-Methylphenol	-	-	-	-	No	No	-	No
2-Nitroaniline	-	-	-	-	No	No	-	No
2-Nitrophenol	-	-	-	-	No	No	-	No
3- and 4-Methylphenol Coelution	-	-	-	-	No	No	-	No
3-Methylphenol	-	-	-	-	No	No	-	No
4-Methylphenol	-	-	-	-	No	No	-	No
3,3'-Dichlorobenzidine	-	-	-	-	No	No	-	No
3-Nitroaniline	-	-	-	-	No	No	-	No
4,6-Dinitro-2-methylphenol	-	-	-	-	No	No	-	No
4-Bromophenyl phenyl ether	-	-	-	-	No	No	-	No
4-Chloro-3-methylphenol	-	-	-	-	No	No	-	No
4-Chloroaniline	-	-	-	-	No	No	-	No
4-Chlorophenyl phenyl ether	-	-	-	-	No	No	-	No
4-Nitroaniline	-	-	-	-	No	No	-	No
4-Nitrophenol	-	-	-	-	No	No	-	No
Acenaphthene	-	-	-	-	No	No	-	No
Acenaphthylene	-	-	-	-	No	No	-	No
Aniline	-	-	-	-	No	No	-	No
Anthracene	-	-	-	-	No	No	-	No
Benzo(a)anthracene	-	-	-	-	No	No	-	No
Benzo(a)pyrene	-	-	-	-	No	No	-	No
Benzo(b)fluoranthene	-	-	-	-	No	No	-	No
Benzo(g,h,i)perylene	-	-	-	-	No	No	-	No
Benzo(k)fluoranthene	-	-	-	-	No	No	-	No
Benzoic acid	-	-	-	-	No	No	-	No
Benzyl alcohol	-	-	-	-	No	No	-	No
bis(2-Chloroethoxy)methane	-	-	-	-	No	No	-	No
bis(2-Chloroethyl)ether	-	-	-	-	No	No	-	No
bis(2-Chloroisopropyl) ether	-	-	-	-	No	No	-	No
bis(2-Ethylhexyl)phthalate	-	-	-	-	No	No	-	No
Butyl benzyl phthalate	-	-	-	-	No	No	-	No
Carbazole	-	-	-	-	No	No	-	No
Chrysene	-	-	-	-	No	No	-	No
Dibenz(a,h)anthracene	-	-	-	-	No	No	-	No
Dibenzofuran	-	-	-	-	No	No	-	No
Diethylphthalate	-	-	-	-	No	No	-	No
Dimethyl phthalate	-	-	-	-	No	No	-	No
Di-n-butylphthalate	-	-	-	-	No	No	-	No
Di-n-octyl phthalate	-	-	-	-	No	No	-	No
Fluoranthene	-	-	-	-	No	No	-	No
Fluorene	-	-	-	-	No	No	-	No
Hexachlorobenzene	-	-	-	-	No	No	-	No
Hexachlorobutadiene	-	-	-	-	No	No	-	No
Hexachlorocyclopentadiene	-	-	-	-	No	No	-	No
Hexachloroethane	-	-	-	-	No	No	-	No
Indeno(1,2,3-cd)pyrene	-	-	-	-	No	No	-	No

Selection of Chemicals of Potential Concern in Chatsworth Formation Groundwater
Building 64 Leach Fields

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (mg/L)	Potentially Site Related	Chemical Detected in Laboratory Blanks [a]	Maximum Detected Concentration Exceeds Background [b]	COPC
Isophorone	-	-	-	-	No	No	-	No
Naphthalene	-	-	-	-	No	No	-	No
Nitrobenzene	-	-	-	-	No	No	-	No
N-Nitrosodimethylamine	-	-	-	-	No	No	-	No
N-Nitrosodi-n-propylamine	-	-	-	-	No	No	-	No
N-Nitrosodiphenylamine	-	-	-	-	No	No	-	No
Pentachlorophenol	-	-	-	-	No	No	-	No
Phenanthrene	-	-	-	-	No	No	-	No
Phenol	-	-	-	-	No	No	-	No
Pyrene	-	-	-	-	No	No	-	No
Pyridine	-	-	-	-	No	No	-	No
Total Petroleum Hydrocarbons								
C08-C11(Gasoline Range)	-	-	-	-	No	No	-	No
C11-C14(Kerosene Range)	-	-	-	-	No	No	-	No
C14-C20(Diesel Range)	-	-	-	-	No	No	-	No
C20-C30(Lubricant Oil Range)	-	-	-	-	No	No	-	No
PCDD/PCDFs								
2,3,7,8-TCDD	-	-	-	-	No	No	-	No
1,2,3,7,8-PeCDD	-	-	-	-	No	No	-	No
1,2,3,4,7,8-HxCDD	-	-	-	-	No	No	-	No
1,2,3,6,7,8-HxCDD	-	-	-	-	No	No	-	No
1,2,3,7,8,9-HxCDD	-	-	-	-	No	No	-	No
1,2,3,4,6,7,8-HpCDD	-	-	-	-	No	No	-	No
OCDD	-	-	-	-	No	No	-	No
2,3,7,8-TCDF	-	-	-	-	No	No	-	No
1,2,3,7,8-PeCDF	-	-	-	-	No	No	-	No
2,3,4,7,8-PeCDF	-	-	-	-	No	No	-	No
1,2,3,4,7,8-HxCDF	-	-	-	-	No	No	-	No
1,2,3,6,7,8-HxCDF	-	-	-	-	No	No	-	No
2,3,4,6,7,8-HxCDF	-	-	-	-	No	No	-	No
1,2,3,7,8,9-HxCDF	-	-	-	-	No	No	-	No
1,2,3,4,6,7,8-HpCDF	-	-	-	-	No	No	-	No
1,2,3,4,7,8,9-HpCDF	-	-	-	-	No	No	-	No
OCDF	-	-	-	-	No	No	-	No
Total Tetra	-	-	-	-	-	-	-	No
Total Penta	-	-	-	-	-	-	-	No
Total Hexa	-	-	-	-	-	-	-	No
Total Hepta	-	-	-	-	-	-	-	No
Total Octa	-	-	-	-	-	-	-	No
PCDD/PCDF	-	-	-	-	-	-	-	No
PCBs								
Aroclor-1016	-	-	-	-	No	No	-	No
Aroclor-1221	-	-	-	-	No	No	-	No
Aroclor-1232	-	-	-	-	No	No	-	No
Aroclor-1242	-	-	-	-	No	No	-	No
Aroclor-1248	-	-	-	-	No	No	-	No
Aroclor-1254	-	-	-	-	No	No	-	No
Aroclor-1260	-	-	-	-	No	No	-	No
PCB-105	-	-	-	-	No	No	-	No
PCB-114	-	-	-	-	No	No	-	No
PCB-118	-	-	-	-	No	No	-	No

Selection of Chemicals of Potential Concern in Chatsworth Formation Groundwater
Building 64 Leach Fields

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (mg/L)	Potentially Site Related	Chemical Detected in Laboratory Blanks [a]	Maximum Detected Concentration Exceeds Background [b]	COPC
PCB-123	-	-	-	-	No	No	-	No
PCB-126	-	-	-	-	No	No	-	No
PCB-156	-	-	-	-	No	No	-	No
PCB-157	-	-	-	-	No	No	-	No
PCB-167	-	-	-	-	No	No	-	No
PCB-169	-	-	-	-	No	No	-	No
PCB-189	-	-	-	-	No	No	-	No
PCB-77	-	-	-	-	No	No	-	No
PCB-81	-	-	-	-	No	No	-	No

Notes:
a. Any chemical eliminated as COPC due to laboratory blank contamination is discussed in Section 3.0.
COPC - chemical of potential concern
VOC - volatile organic chemicals
SVOC - semivolatile organic chemicals
PCDD/PDDFs - polychlorinated dibenzo-p-dioxins and dibenzofurans
"-" not applicable
mg/L - milligrams per liter
bgs- below ground surface

Selection of Chemicals of Potential Concern in Chatsworth Formation Groundwater
Group 6 Reporting Area

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (mg/L)	Potentially Site Related	Chemical Detected in Laboratory Blanks [a]	Maximum Detected Concentration Exceeds Background [b]	COPC
Inorganic Compounds								
Aluminum	-	-	-	-	No	No	No	No
Antimony	-	-	-	-	No	No	No	No
Arsenic	-	-	-	-	No	No	No	No
Barium	-	-	-	-	No	No	No	No
Beryllium	-	-	-	-	No	No	No	No
Boron	-	-	-	-	No	No	No	No
Cadmium	-	-	-	-	No	No	No	No
Chromium	-	-	-	-	No	No	No	No
Hexavalent chromium	-	-	-	-	No	No	No	No
Cobalt	-	-	-	-	No	No	No	No
Copper	10	9	90	1.8E-02	No	No	Yes	Yes
Fluoride	10	10	100	5.6E-01	No	No	Yes	Yes
Lead	-	-	-	-	No	No	No	No
Manganese	-	-	-	-	No	No	No	No
Mercury	-	-	-	-	No	No	No	No
Molybdenum	-	-	-	-	No	No	No	No
Nickel	-	-	-	-	No	No	No	No
Nitrate	10	5	50	1.4E+01	No	No	Yes	Yes
Perchlorate	-	-	-	-	No	No	-	No
Selenium	-	-	-	-	No	No	No	No
Silver	-	-	-	-	No	No	No	No
Strontium	-	-	-	-	No	No	No	No
Thallium	8	2	25	5.4E-04	No	No	Yes	Yes
Tin	-	-	-	-	No	No	No	No
Vanadium	-	-	-	-	No	No	No	No
Zinc	-	-	-	-	No	No	No	No
VOCs								
1,1,1,2-Tetrachloroethane	-	-	-	-	No	No	-	No
1,1,1-Trichloroethane	34	0	0	0.0E+00	No	No	-	No
1,1,2,2-Tetrachloroethane	-	-	-	-	No	No	-	No
1,1,2-Trichloro-1,2,2-trifluoroethane	28	0	0	0.0E+00	No	No	-	No
1,1,2-Trichloroethane	-	-	-	-	No	No	-	No
1,1-Dichloroethane	34	1	3	2.6E-03	No	No	-	No
1,1-Dichloroethene	34	0	0	0.0E+00	No	No	-	No
1,1-Dichloropropene	-	-	-	-	No	No	-	No
1,2,3-Trichlorobenzene	-	-	-	-	No	No	-	No
1,2,3-Trichloropropane	-	-	-	-	No	No	-	No
1,2,4-Trichlorobenzene	-	-	-	-	No	No	-	No
1,2,4-Trimethylbenzene	-	-	-	-	No	No	-	No
1,2-Dibromo-3-chloropropane	-	-	-	-	No	No	-	No
1,2-Dibromoethane	-	-	-	-	No	No	-	No
1,2-Dichlorobenzene	-	-	-	-	No	No	-	No
1,2-Dichloroethane	34	1	3	9.0E-04	No	No	-	No
1,2-Dichloropropane	-	-	-	-	No	No	-	No
1,3,5-Trimethylbenzene	-	-	-	-	No	No	-	No
1,3-Dichlorobenzene	-	-	-	-	No	No	-	No
1,4-Dichlorobenzene	-	-	-	-	No	No	-	No
2-Butanone	27	0	0	0.0E+00	No	No	-	No
2-Chloroethylvinylether	-	-	-	-	No	No	-	No
2-Chlorotoluene	-	-	-	-	No	No	-	No
2-Chloro-1,1,1-trifluoroethane	-	-	-	-	No	No	-	No
2-Hexanone	26	0	0	0.0E+00	No	No	-	No

Selection of Chemicals of Potential Concern in Chatsworth Formation Groundwater
Group 6 Reporting Area

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (mg/L)	Potentially Site Related	Chemical Detected in Laboratory Blanks [a]	Maximum Detected Concentration Exceeds Background [b]	COPC
4-Bromofluorobenzene	-	-	-	-	No	No	-	No
4-Chlorotoluene	-	-	-	-	No	No	-	No
4-Isopropyltoluene	1	0	0	0.0E+00	No	No	-	No
4-Methyl-2-pentanone	-	-	-	-	No	No	-	No
Acetone	28	7	25	1.6E-02	No	No	-	Yes
Acrolein	-	-	-	-	No	No	-	No
Acrylonitrile	-	-	-	-	No	No	-	No
Benzene	29	1	3	5.8E-04	No	No	-	No
Benzidine	-	-	-	-	No	No	-	No
Bromobenzene	-	-	-	-	No	No	-	No
Bromodichloromethane	-	-	-	-	No	No	-	No
Bromoform	-	-	-	-	No	No	-	No
Bromomethane	-	-	-	-	No	No	-	No
Carbon disulfide	26	1	4	2.6E-03	No	No	-	No
Carbon tetrachloride	-	-	-	-	No	No	-	No
Chlorobenzene	-	-	-	-	No	No	-	No
Chloroethane	-	-	-	-	No	No	-	No
Chloroform	-	-	-	-	No	No	-	No
Chloromethane	34	3	9	3.2E-04	No	No	-	Yes
Chlorotrifluoroethene	-	-	-	-	No	No	-	No
cis-1,2-Dichloroethene	32	5	16	5.1E-02	No	No	-	Yes
cis-1,3-Dichloropropene	-	-	-	-	No	No	-	No
Dibromochloromethane	-	-	-	-	No	No	-	No
Dibromomethane	-	-	-	-	No	No	-	No
Dichlorodifluoromethane	-	-	-	-	No	No	-	No
Ethylbenzene	29	0	0	0.0E+00	No	No	-	No
Formaldehyde	-	-	-	-	No	No	-	No
Isopropylbenzene	-	-	-	-	No	No	-	No
m,p-Xylene	26	0	0	0.0E+00	No	No	-	No
Methyl tert-butyl ether	-	-	-	-	No	No	-	No
Methylene chloride	34	1	3	6.4E-04	No	No	-	No
n-Butylbenzene	-	-	-	-	No	No	-	No
n-Propylbenzene	-	-	-	-	No	No	-	No
o-Xylene	26	0	0	0.0E+00	No	No	-	No
p-Isopropyltoluene	-	-	-	-	No	No	-	No
sec-Butylbenzene	-	-	-	-	No	No	-	No
Styrene	-	-	-	-	No	No	-	No
tert-Butylbenzene	-	-	-	-	No	No	-	No
Tetrachloroethene	34	0	0	0.0E+00	No	No	-	No
Toluene	29	1	3	1.8E-03	No	No	-	No
trans-1,2-Dichloroethene	34	0	0	0.0E+00	No	No	-	No
trans-1,3-Dichloropropene	-	-	-	-	No	No	-	No
Trichloroethene	34	12	35	1.0E-02	No	No	-	Yes
Trichlorofluoromethane	-	-	-	-	No	No	-	No
Vinyl acetate	-	-	-	-	No	No	-	No
Vinyl chloride	-	-	-	-	No	No	-	No
SVOCs								
1,2-Diphenylhydrazine	-	-	-	-	No	No	-	No
1,4-Dioxane	-	-	-	-	No	No	-	No
2,4,5-Trichlorophenol	-	-	-	-	No	No	-	No
2,4,6-Trichlorophenol	-	-	-	-	No	No	-	No
2,4-Dichlorophenol	-	-	-	-	No	No	-	No

Selection of Chemicals of Potential Concern in Chatsworth Formation Groundwater
Group 6 Reporting Area

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (mg/L)	Potentially Site Related	Chemical Detected in Laboratory Blanks [a]	Maximum Detected Concentration Exceeds Background [b]	COPC
2,4-Dimethylphenol	-	-	-	-	No	No	-	No
2,4-Dinitrophenol	11	0	0	0.0E+00	No	No	-	No
2,4-Dinitrotoluene	-	-	-	-	No	No	-	No
2,6-Dinitrotoluene	-	-	-	-	No	No	-	No
2-Chloronaphthalene	-	-	-	-	No	No	-	No
2-Chlorophenol	-	-	-	-	No	No	-	No
2-Methylnaphthalene	1	0	0	0.0E+00	No	No	-	No
2-Methylphenol	-	-	-	-	No	No	-	No
2-Nitroaniline	-	-	-	-	No	No	-	No
2-Nitrophenol	-	-	-	-	No	No	-	No
3- and 4-Methylphenol Coelution	-	-	-	-	No	No	-	No
3-Methylphenol	-	-	-	-	No	No	-	No
4-Methylphenol	-	-	-	-	No	No	-	No
3,3'-Dichlorobenzidine	-	-	-	-	No	No	-	No
3-Nitroaniline	-	-	-	-	No	No	-	No
4,6-Dinitro-2-methylphenol	-	-	-	-	No	No	-	No
4-Bromophenyl phenyl ether	-	-	-	-	No	No	-	No
4-Chloro-3-methylphenol	-	-	-	-	No	No	-	No
4-Chloroaniline	-	-	-	-	No	No	-	No
4-Chlorophenyl phenyl ether	-	-	-	-	No	No	-	No
4-Nitroaniline	-	-	-	-	No	No	-	No
4-Nitrophenol	-	-	-	-	No	No	-	No
Acenaphthene	7	0	0	0.0E+00	No	No	-	No
Acenaphthylene	7	0	0	0.0E+00	No	No	-	No
Aniline	-	-	-	-	No	No	-	No
Anthracene	7	0	0	0.0E+00	No	No	-	No
Benzo(a)anthracene	7	0	0	0.0E+00	No	No	-	No
Benzo(a)pyrene	7	0	0	0.0E+00	No	No	-	No
Benzo(b)fluoranthene	7	0	0	0.0E+00	No	No	-	No
Benzo(g,h,i)perylene	7	0	0	0.0E+00	No	No	-	No
Benzo(k)fluoranthene	7	0	0	0.0E+00	No	No	-	No
Benzoic acid	-	-	-	-	No	No	-	No
Benzyl alcohol	-	-	-	-	No	No	-	No
bis(2-Chloroethoxy)methane	-	-	-	-	No	No	-	No
bis(2-Chloroethyl)ether	-	-	-	-	No	No	-	No
bis(2-Chloroisopropyl) ether	-	-	-	-	No	No	-	No
bis(2-Ethylhexyl)phthalate	-	-	-	-	No	No	-	No
Butyl benzyl phthalate	-	-	-	-	No	No	-	No
Carbazole	-	-	-	-	No	No	-	No
Chrysene	7	0	0	0.0E+00	No	No	-	No
Dibenz(a,h)anthracene	7	0	0	0.0E+00	No	No	-	No
Dibenzofuran	1	0	0	0.0E+00	No	No	-	No
Diethylphthalate	-	-	-	-	No	No	-	No
Dimethyl phthalate	-	-	-	-	No	No	-	No
Di-n-butylphthalate	-	-	-	-	No	No	-	No
Di-n-octyl phthalate	-	-	-	-	No	No	-	No
Fluoranthene	7	0	0	0.0E+00	No	No	-	No
Fluorene	7	0	0	0.0E+00	No	No	-	No
Hexachlorobenzene	-	-	-	-	No	No	-	No
Hexachlorobutadiene	-	-	-	-	No	No	-	No
Hexachlorocyclopentadiene	-	-	-	-	No	No	-	No
Hexachloroethane	-	-	-	-	No	No	-	No
Indeno(1,2,3-cd)pyrene	7	0	0	0.0E+00	No	No	-	No

Selection of Chemicals of Potential Concern in Chatsworth Formation Groundwater
Group 6 Reporting Area

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (mg/L)	Potentially Site Related	Chemical Detected in Laboratory Blanks [a]	Maximum Detected Concentration Exceeds Background [b]	COPC
Isophorone	-	-	-	-	No	No	-	No
Naphthalene	7	0	0	0.0E+00	No	No	-	No
Nitrobenzene	-	-	-	-	No	No	-	No
N-Nitrosodimethylamine	-	-	-	-	No	No	-	No
N-Nitrosodi-n-propylamine	-	-	-	-	No	No	-	No
N-Nitrosodiphenylamine	-	-	-	-	No	No	-	No
Pentachlorophenol	-	-	-	-	No	No	-	No
Phenanthrene	7	0	0	0.0E+00	No	No	-	No
Phenol	-	-	-	-	No	No	-	No
Pyrene	4	0	0	0.0E+00	No	No	-	No
Pyridine	-	-	-	-	No	No	-	No
Total Petroleum Hydrocarbons								
C08-C11(Gasoline Range)	-	-	-	-	No	No	-	No
C11-C14(Kerosene Range)	-	-	-	-	No	No	-	No
C14-C20(Diesel Range)	1	1	100	5.0E-02	No	No	-	Yes
C20-C30(Lubricant Oil Range)	-	-	-	-	No	No	-	No
PCDD/PCDFs								
2,3,7,8-TCDD	1	0	0	0.0E+00	No	No	-	No
1,2,3,7,8-PeCDD	1	0	0	0.0E+00	No	No	-	No
1,2,3,4,7,8-HxCDD	1	0	0	0.0E+00	No	No	-	No
1,2,3,6,7,8-HxCDD	1	0	0	0.0E+00	No	No	-	No
1,2,3,7,8,9-HxCDD	1	0	0	0.0E+00	No	No	-	No
1,2,3,4,6,7,8-HpCDD	1	0	0	0.0E+00	No	No	-	No
OCDD	1	0	0	0.0E+00	No	No	-	No
2,3,7,8-TCDF	1	0	0	0.0E+00	No	No	-	No
1,2,3,7,8-PeCDF	1	0	0	0.0E+00	No	No	-	No
2,3,4,7,8-PeCDF	1	0	0	0.0E+00	No	No	-	No
1,2,3,4,7,8-HxCDF	1	0	0	0.0E+00	No	No	-	No
1,2,3,6,7,8-HxCDF	1	0	0	0.0E+00	No	No	-	No
2,3,4,6,7,8-HxCDF	1	0	0	0.0E+00	No	No	-	No
1,2,3,7,8,9-HxCDF	1	0	0	0.0E+00	No	No	-	No
1,2,3,4,6,7,8-HpCDF	1	0	0	0.0E+00	No	No	-	No
1,2,3,4,7,8,9-HpCDF	1	0	0	0.0E+00	No	No	-	No
OCDF	1	0	0	0.0E+00	No	No	-	No
Total Tetra	-	-	-	-	-	-	-	No
Total Penta	-	-	-	-	-	-	-	No
Total Hexa	-	-	-	-	-	-	-	No
Total Hepta	-	-	-	-	-	-	-	No
Total Octa	-	-	-	-	-	-	-	No
PCDD/PCDF	-	-	-	-	-	-	-	No
PCBs								
Aroclor-1016	-	-	-	-	No	No	-	No
Aroclor-1221	-	-	-	-	No	No	-	No
Aroclor-1232	-	-	-	-	No	No	-	No
Aroclor-1242	-	-	-	-	No	No	-	No
Aroclor-1248	1	0	0	0.0E+00	No	No	-	No
Aroclor-1254	1	0	0	0.0E+00	No	No	-	No
Aroclor-1260	1	0	0	0.0E+00	No	No	-	No
PCB-105	-	-	-	-	No	No	-	No
PCB-114	-	-	-	-	No	No	-	No
PCB-118	-	-	-	-	No	No	-	No

Selection of Chemicals of Potential Concern in Chatsworth Formation Groundwater
Group 6 Reporting Area

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (mg/L)	Potentially Site Related	Chemical Detected in Laboratory Blanks [a]	Maximum Detected Concentration Exceeds Background [b]	COPC
PCB-123	-	-	-	-	No	No	-	No
PCB-126	-	-	-	-	No	No	-	No
PCB-156	-	-	-	-	No	No	-	No
PCB-157	-	-	-	-	No	No	-	No
PCB-167	-	-	-	-	No	No	-	No
PCB-169	-	-	-	-	No	No	-	No
PCB-189	-	-	-	-	No	No	-	No
PCB-77	-	-	-	-	No	No	-	No
PCB-81	-	-	-	-	No	No	-	No

Notes:
a. Any chemical eliminated as COPC due to laboratory blank contamination is discussed in Section 3.0.
COPC - chemical of potential concern
VOC - volatile organic chemicals
SVOC - semivolatile organic chemicals
PCDD/PDDFs - polychlorinated dibenzo-p-dioxins and dibenzofurans
"-" not applicable
mg/L - milligrams per liter
bgs- below ground surface

Selection of Chemicals of Potential Concern in Soil (0-2 feet bgs)
Building 64 Leach Fields

Chemical	Number of Samples	Number of Detects	Percent Frequency of Detection	Maximum Detected Concentration (mg/kg)	Potentially Site Related	Chemical Detected in Laboratory Blanks [a]	WRS Indicates Exceeds Background[b]	COPC
Inorganic Compounds								
Aluminum	3	3	100	1.4E+04	Yes	Yes	No	No [c]
Antimony	3	2	67	1.6E-01	Yes	Yes	No	No [c]
Arsenic	3	3	100	3.4E+00	Yes	No	No	No [c]
Barium	3	3	100	7.9E+01	Yes	Yes	No	No [c]
Beryllium	3	3	100	5.6E-01	Yes	No	No	No [c]
Boron	3	3	100	3.5E+00	Yes	No	No	No [c]
Cadmium	3	3	100	3.9E-01	Yes	Yes	No	No [c]
Chromium	3	3	100	2.4E+01	Yes	Yes	No	No [c]
Cobalt	3	3	100	6.5E+00	Yes	Yes	No	No [c]
Copper	3	3	100	1.5E+01	Yes	Yes	No	No [c]
Lead	3	3	100	4.0E+01	Yes	Yes	No	No [c]
Manganese	3	3	100	2.9E+02	Yes	No	No	No [c]
Mercury	3	3	100	2.4E-02	Yes	No	No	No [c]
Molybdenum	3	0	0	-	Yes	No	No	No [c]
Nickel	3	3	100	1.4E+01	Yes	Yes	No	No [c]
Selenium	3	2	67	2.6E-01	Yes	No	No	No [c]
Silver	3	3	100	1.5E-01	Yes	No	No	No [c]
Thallium	3	3	100	4.8E-01	Yes	Yes	Yes	No [d]
Vanadium	3	3	100	3.6E+01	Yes	No	No	No [c]
Zinc	3	3	100	1.2E+02	Yes	Yes	No	No [c]

Notes:

a. Any chemical eliminated as COPC due to laboratory blank contamination is discussed in Section 3.0.

b. Background comparision for inorganic compounds presented in Attachment 1 Spreadsheet C2-5.

c. Not selected as COPC since the RFI site sample population for soils at 0 to 2 feet bgs was found to be no different than the background sample population at p=0.05 based on the Wilcoxon Rank Sum Test.

d. Although the WRS test indicates site concentrations may be different from background, the chemical is not selected as a COPC for quantitative analysis because the detected concentrations are generally consistent with the range of detected background concentrations, the maximum detect is only marginally above the maximum background (4% which is well within analytical variability), and the chemical was detected in the laboratory blank. Therefore, it will not be further evaluated quantitatively, but will be discussed in the uncertainty analysis.

COPC - chemical of potential concern

"-" not applicable

mg/kg - milligrams per kilogram

bgs - below ground surface