

Mirant Potomac River, LLC Monthly Model Evaluation Study Report March 2007

ENSR Corporation March 2007 Document No.: 10350-003-106-10

ENSR AECOM

Mirant Potomac River, LLC 1400 North Royal St., Alexandria, VA 22314 T 703 838 8200 F 703-838-8272 U www.mirant.com

April 20, 2007

Doug Snyder Assistant Regional Counsel Office of Regional Counsel US EPA-Region 3 1650 Arch Street Philadelphia, PA 19103-2029

Michael Dowd Air Enforcement Manager Virginia Department of Environmental Quality 629 East Main Street Richmond, VA 23240-0009

Dear Messrs. Snyder and Dowd:

As you are aware, Mirant Potomac River, L.L.C. (Mirant) is operating per the terms and conditions of the Administrative Compliance Order (ACO) dated June 1, 2006. Under the terms of ACO, Mirant is to deliver a monthly report to include: (1) the modeled input files and results of the daily Predictive Modeling for the preceding month, including the hourly average heat input in the MMBtu for each unit and the exit velocity (or exhaust volume) for each unit; (2) verification that the planned Operating Parameters utilized for Predictive Modeling in the preceding month were not exceeded, or if exceeded, documentation describing that exceedance: (3) the inputs and results of the "follow-up" modeling for the preceding month (or portion thereof during which all Monitors were not in place), including the hourly average heat input in MMBtu for each unit and the exit velocity (or exhaust volume) for each unit and the exit velocity (or exhaust volume) for each unit and the exit velocity (or exhaust volume) for each unit and the monitors were not in place), including the hourly average heat input in MMBtu for each unit and the exit velocity (or exhaust volume) for each unit; and (4) after installation of the Monitors, the data generated by the Monitors.

As a result, please see the attached submission, "Mirant Potomac River, LLC Monthly Model Evaluation Study Report" for the month of March 2007.

The modeling data enclosed includes:

- Modeled Input Files and Results of Predictive Modeling: 3-hour and 24-hour AERMOD predictive modeling results using day-ahead weather forecast data for March 2007;
- Plant Operating Parameters Summary: 3-hour and 24 hour Rate Compliance Summary.
- Plant Operating Data.
- Follow-up Modeling Results: 3-hour and 24-hour AERMOD follow-up modeling results performed by the third-party consultant, ENSR, using observed weather conditions for March 2007; and 3-hour and 24-hour ambient actual monitor data for SO2 averages from the continuous monitoring sites as prescribed in the ACO, for the period of March 2007.
- Monthly Summary Data Reports: Marina Towers Central, Marina Towers South, Southeast, Southwest, North, and Northeast.



• In addition, we have provided a satellite view of the ambient air quality and meteorological network.

Should you have any questions regarding these modeling results, please contact me at 301-955-9168 or by email: david.cramer@mirant.com.

Regards,

David J. Com

David Cramer Manager – Air Compliance & Permitting

Copies: Bob Driscoll, CEO Mid-Atlantic L.L.C Judith Katz, US EPA Shawn Konary, Director Environmental, Safety and Health, Mirant File Prepared for: Mirant Potomac River, LLC Potomac Generating Station Alexandria, VA

Mirant Potomac River, LLC Monthly Model Evaluation Study Report March 2007

Frank R. Tringale

Prepared By

Dave Sh

Reviewed By

ENSR Corporation March 2007 Document No.: 10350-003-106-10



DOCUMENT CERTIFICATION

Facility Name: Potomac River Generating Station

Identification: ORIS # 3788; Virginia Registration# 70228

Facility Location: 1400 North Royal St., Alexandria VA 22314

Type of Submittal Attached: March 2007 Monthly ACO Report

This March 2007 Monthly Report is being submitted to demonstrate compliance with the Administrative Compliance Order between Mirant Potomac River, LLC and the U.S. EPA, dated June 2, 2006.

Certification: Except as provided below, I certify that the information contained in or accompanying this report is true, accurate, and complete. As to those portions of this report for which I cannot personally verify their accuracy, I certify under the penalty of law that this report and all attachments were prepared under my direction or supervision in accordance with a system designed to assure that qualified personnel properly gather and evaluate the information submitted. Based on my inquiry of the person or persons who manage the system, or those persons directly responsible for gathering the information, the information submitted is, to the best of my knowledge and belief, true, accurate, and complete. I am aware that there are significant penalties for submitting false information, including the possibility of fine and imprisonment for knowing violations.

Name of Responsible Official (Print): ____ Robert E. Driscoll

Title: President & Chief Executive Officer, Mirant Potomac River, LLC

Coluto uside Signature:

____ Date: Upril 17, 2007

Contents

1.0	Intro	oduction	1-1
2.0	Dail	y Predictive Modeling	2-1
3.0	Plar	nt Operating Parameters	3-1
4.0	Foll	ow-Up Modeling	4-1
5.0	Am	bient Monitoring Data	5-1
	5.1	Description of the Ambient Data Report	5-1
	5.2	Continuous Air Quality Measurements	5-2
	5.3	Meteorological Measurements	5-2
6.0	Am	bient Data Validation Criteria	6-1
	6.1	Continuous Parameter Data Validation	6-1
	6.2	Data Validation Standards and Criteria	6-1
7.0	Am	bient Data Results and Statistics	7-1

List of Appendices

Appendix A Modeled Input Files and Results of Daily Predictive Modeling (on CD)

- Appendix B Plant Operating Parameters Summary
- Appendix C Plant Operating Data for March (on CD)
- Appendix D Follow-Up Modeling Results (on CD)
- Appendix E Monthly Summary Data Reports (on CD)
- Appendix F Satellite View of the Ambient Air Quality and Meteorological Network

List of Tables

Table 3-1:	Unit Heat Rates	3-2
Table 3-2:	Daily Unit Heat Inputs	3-2
Table 5-1:	Summary of Monitoring Program Parameters for Mirant Air Quality Network	5-3
Table 5-2:	Monitoring Equipment for the Mirant Ambient Monitoring Program	5-4
Table 7-1:	Parameters, Site Name Codes, and Abbreviations	7-1
Table 7-2:	Mirant Monthly Data Capture Summary	7-2

1.0 Introduction

Under an Administrative Compliance Order (ACO) signed on June 1, 2006, between Mirant Potomac River, LLC, (Mirant) and the United States Environmental Protection Agency (EPA), Mirant is submitting a monthly modeling, monitoring, and operating data report for March 2007.

2.0 Daily Predictive Modeling

On June 17, 2006, Mirant began performing daily forecast modeling to calculate maximum sulfur dioxide (SO₂) impacts from the Potomac River Power Plant. Mirant uses this modeling to plan electrical generation for the following day. Mirant uses meteorological data forecasted by the National Weather Service's Global Forecast Model (see http://www.arl.noaa.gov/ready/cmet.html) for Reagan National Airport. Modeling is carried out between 8:00 am – 10:00 am each day for the next day. All other model inputs including receptors, land use and building dimensions derived from BPIP-PRIME for downwash simulations were established in the August 2005 modeling report entitled "A Dispersion Modeling Analysis of Downwash from Mirant's Potomac River Power Plant" (ENSR Document 10350-002-410) and were used in the daily forecast modeling.

Beginning on February 19th and continuing through March 6th, PEPCO conducted a scheduled maintenance outage on one of the 230 kV transmission lines that supply electricity to central Washington DC. Any time one or more of these transmission lines is out of service, operations at the plant fall under Ordering Paragraph A of the December 20, 2005 Department of Energy (DOE) Order 202-05-03, which requires Mirant to "operate the Potomac River Generating Plant to produce the amount of power (up to its full capacity) needed to meet the demand in the Central D.C. area as specified by PJM for the duration of the outage". Section IV.C of the ACO, 'Operations During Line Outage Situations' mirrors the DOE Order. During the February 19 – March 6 period, PJM direction took precedence over daily predictive modeling guidelines when determining the number of units to run each day. Nevertheless, Mirant ran daily predictive and follow-up modeling throughout the duration of the line outage.

Table A-1 in (Appendix A) summarizes the daily predictive modeling results for each day. Mirant is required to control SO₂ emissions so that the maximum modeled 3-hour impact is at or below 1,061 μ g/m³. The 3-hour National Ambient Air Quality Standard (NAAQS) for SO₂ is 1,300 μ g/m³. Mirant assumes that there is an existing background concentration of 239 μ g/m³, representing the contribution to ambient air from other sources. For the 24-hour average, Mirant is required to control SO₂ emissions so that its maximum modeled impact is at or below 314 μ g/m³, allowing for a 51 μ g/m³ background concentration. The 24-hour NAAQS for SO₂ is 365 μ g/m³.

Predictive PM_{10} modeling results can also be found in Table A-1. Mirant conducts PM_{10} modeling using an emission rate of 0.055 lb/MMBtu from each stack that is modeled to run, plus fugitive emissions at levels scaled to the number of units in operation. The emission rate used for PM_{10} modeling was set higher than the highest PM stack test result recorded at the plant. With three units in operation at the 0.055 lb/MMBtu PM_{10} emission rate, the plant shows modeled compliance under all meteorological conditions, therefore the ACO only requires predictive PM_{10} modeling be conducted when four or five units are scheduled to run.

In March 2007, modeling resulted in 3-hour SO₂ limits ranging from 0.19 lb/MMBtu to 1.84 lb/MMBtu and 24-hour SO₂ limits ranging from 0.24 lb/MMBtu to 1.20 lb/MMBtu.

3.0 Plant Operating Parameters

Upon completion of daily predictive modeling, operating targets for each unit that is scheduled to run the next day are set. The plant then operates the scheduled units at the SO_2 emission rate and level of operation set by the model. A single 24-hour SO_2 emission rate is assumed for all units that operate on a given day. In addition, a maximum 3-hour SO_2 emission rate is determined during the predictive modeling process which is used as a short term upper limit by operators, should equipment malfunction cause SO_2 emissions to rise above the 24-hour average limit. If a unit is not meeting its target SO_2 emission rate, plant operations will be curtailed to an operating configuration that models NAAQS compliance.

There are three ways in which actual plant operations are compared to predictive modeling results to evaluate the plant's adherence to the scheduled operation prescribed by the predictive model.

24-Hour Average SO₂ Emission Rate

Table B-1 (Appendix B) illustrates the 24-hour average SO_2 emission rate each unit achieved for every day of the month, and the corresponding target SO_2 emission rate to be met for each day. The 24-hour emission rate was met by all units in March 2007 when all transmission lines were in service.

During the line outage period, some units exceeded the 24-hour SO_2 target due to DOE Order requirements. No 24-hour SO_2 NAAQS exceedances were observed by the SO_2 monitoring network at any time in March however.

3-Hour Average SO2 Emission Rate

Table B-2 (Appendix B) illustrates the 3-hour maximum SO_2 emission rate each unit attained for every day of the month, and the corresponding target SO_2 emission rate not to be exceeded for each day. The 3-hour emission rate target was met by all units in March 2007 when all transmission lines were in service. During the line outage period, some units exceeded the 3-hour SO_2 target due to DOE order requirements. No 3-hour SO_2 NAAQS exceedances were observed by the SO_2 monitoring network at any time in March however.

SO₂ Pounds-Per-Day Emissions

AERMOD models stack SO_2 emissions as a mass emission rate in pounds per hour or grams per second. In order to determine if the actual output from each unit complied with the SO_2 mass emissions predicted by the model, an SO_2 pounds-per-day limit based on model results has been established.

Dispatch signals from PJM vary the generation output of each unit continuously, making it impossible to make hourly comparisons between actual unit generation and hourly-based predictive model results. Unit output can be evaluated however, by comparing each unit's total SO₂ pounds-per-day emitted to a daily target established by the predictive model.

Unit specific SO₂ pounds-per-day targets are computed using heat input to each unit, the daily SO₂ target emission rate, and the unit operating scenario selected for the day.

The daily SO_2 target emission rates and unit operating scenarios can be found in the daily predictive model results summary in Table A-1. Heat inputs for each unit are calculated from the daily operating scenarios, which describe the operating profile for each unit, and unit heat rates, which are a measure of how efficiently the units convert fuel heat content into electricity. The procedure below illustrates how the SO_2 pounds-per-day targets are derived.

The first step is to determine hourly heat input values based on the assumed minimum and maximum loads and associated heat rates listed in Table 3-1.

Unit	Operating Load	Net Power Output (MWh)	Net Heat Rate (MMBtu/MWh)	Heat Input (MMBtu)
1&2 -	Maximum	88	12.6	1113
	Minimum	32	15.3	491
2.4 and 5	Maximum	102	10.2	1045
3, 4, and 5	Minimum	32	12.5	401

Table 3-1: Unit Heat Rates

Hourly heat inputs are then used to compute daily heat inputs based on the unit operating conditions. Daily heat inputs for all unit operating combinations are presented below in Table 3-2.

Table 3-2: Daily Unit Heat Inputs

Unit	Daily Operating Scenario	Daily Heat Input per Unit (MMBtu/day)
unasi di setudi nel 44	8 Hours Maximum Load / 8 Hours Minimum Load / 8 Hours Off	12,826
1&2	16 Hours Maximum Load / 8 Hours Off	17,801
	24 Hours Maximum	26,701
	8 Hours Maximum Load / 16 Hours Minimum Load	14,769
3, 4, & 5	12 Hours Maximum Load / 12 Hours Minimum Load	17,346
<u> 1</u> 1 년3	16 Hours Maximum Load / 8 Hours Minimum Load	19,922
	24 Hours Maximum Load	25,076

Based on the daily forecast operating scenario, multiplying the above heat input (in MMBtu/day) for each unit operating scenario times the daily target emission rate (in Ib/MMBtu) produces the daily target SO₂ mass emission rate (Ib/day) shown in Table B-3 for each unit.

For example, one configuration calls for Units 1 and 2 to operate at maximum load for 8 hours, minimum load for 8 hours, and off for 8 hours; and for Units 3, 4, and 5 to operate for 12 hours at maximum load and 12 hours at minimum load. Assuming the SO_2 limit for the day is 0.6 lb/MMBtu, the daily SO_2 target (in lb/day) is:

Unit 1 and 2: 12,826 MMBtu/day X 0.6 lb/MMBtu = 7,696 lb/day per unit

Unit 3, 4, and 5: 17,346 MMBtu/day X 0.6 lb/MMBtu = 10,408 lb/day per unit

Table B-3 illustrates the pounds per day of SO_2 emitted by each unit for every day of the month and its corresponding SO_2 lb/day target. The SO_2 lb/day targets were met by all units in March 2007 when all transmission lines were in service.

During the line outage period, some units exceeded their 24-hour pounds-per-day SO₂ target due to DOE Order requirements.

It should be noted that occasionally a small number of SO_2 pounds can be found in Table B-3 for units on non-operating days. These emissions are the result of boiler startup or shutdown activities associated with operations from the following or previous day. These insignificant emissions are a normal part of transitioning units on and off line and are acknowledged in Section IV.B.1.a of the ACO.

4.0 Follow-Up Modeling

ENSR performed follow-up modeling for the period March 1 – 31, 2007. The modeling used actual, measured, hourly, in-stack emissions parameters and hourly weather data from the National Weather Service site at Reagan National Airport. All other model inputs including receptors, land use and building dimensions derived from BPIP-PRIME for downwash simulations were established in the August 2005 modeling report entitled "A Dispersion Modeling Analysis of Downwash from Mirant's Potomac River Power Plant" (ENSR Document 10350-002-410) and were used in this follow-up modeling.

Appendix C contains daily operating data for the Potomac River Generating Station. The data are included on the accompanying CD. A "read me" file on the CD explains the file structure.

Table D-1 (Appendix D) summarizes the follow-up modeling results for each day and compares the results to the daily predictive modeling and to maximum observed ambient SO₂ concentrations in the monitoring network. There were three days in March in which follow-up modeling showed potential 3-hour NAAQS exceedance (March 2, 23 and 26). Follow-up modeling showed seven potential 24-hour NAAQS exceedances (March 2, 4, 5, 13, 23, 26, 30).

3-Hour Modeled Exceedances

The 3-hour modeled exceedance on March 2 was predicted in the SE portion of the roof of Marina Towers for the 3-hour period ending 0600 local time. The exceedance was predicted at a location on the roof that is at the same location as the South SO₂ monitor on the roof. Meteorological conditions during this period consisted of strong winds (7 - 9 m/sec) from 170°/180° for the three hour period as measured at Reagan Airport and 5-8 m/sec from 172 - 180° as measured by the on site monitors. The maximum observed SO₂ concentrations from the monitors on March 2 is listed below. The strong winds minimized plume rise, combined with five units operating under emergency conditions, contributed to the elevated 3-hour measured concentration. The measured concentration is not an exceedance of the NAAQS.

Date	3-Hour Max. μg/m ³	24-Hour Avg. μg/m ³	
March 2	1,183	274	
March 4	NA	103	
March 5	NA	134	
March 13	NA	32	
March 23	63	19	
March 26	276	63	
March 30	NA	39	
NAAQS	1,300	365	

The follow up 3-hour modeling prediction on March 2 was higher than the actual monitored SO_2 concentration because the actual plume heights from the units that were operating (Units 1,2,3,4,5) were higher than calculated by AERMOD. This is because winds from 170° - 180° nearly align the stack plumes, causing them

to combine and achieve enhanced plume rise. The AERMOD model assumes that the stack gases do not combine.

Follow up modeling predicted 3-hour NAAQS exceedances on March 23 and 26, both on the roof of Marina Towers. Actual measured concentrations were very low, 63 µg/m³ and 276 µg/m³. Differences in model calculated plume rise and actual plume rise accounted for the over prediction.

24-Hour Modeled Exceedances

Five of the follow up 24-hour modeled exceedances were predicted on the roof of Marina Towers and two modeled exceedances were predicted along the fenceline, east of stack 2. All predicted concentrations were greater than the observed concentrations. Of the five predicted 24-hour exceedances on the roof of Marina Towers, the highest observed concentration occurred on March 2 (274 μ g/m³) in association with strong winds from the south at 6-12 m/sec that lasted for 8 hours. The predicted 24-hour concentration was 549 μ g/m³. Differences in model calculated versus actual plume rise account for the over prediction.

Follow-up modeling predicted 24-hour NAAQS exceedances at ground level on March 4 and 5. Winds on these days were from the NW at 4-11 m/sec on March 4 and 6.3 - 10.3 m/sec on March 5. The maximum predicted concentration on March 4 was 347 µg/m³ compared to the observed value of 103 ug/m3. The maximum predicted concentration on March 5 was 331 compared with an observed value of 134 µg/m³. The predicted concentrations occurred near the SE fenceline monitor where the highest observed concentrations were recorded on those days. The higher predicted concentrations are partly due to the inherent conservatism of the model and partly due to there being only one monitor.

A review of Table D-1 (Appendix D) shows that sometimes there is a large discrepancy between the daily predictive modeling results and the follow-up modeling results using actual observed meteorological observations. On some days, follow-up modeling predicted higher concentrations, while on other days predictive modeling had higher concentrations. During southerly wind conditions, when power plant emissions are carried toward Marina Towers, follow-up modeling often predicts higher impacts than daily forecast modeling. ENSR presented a detailed explanation of the likely reasons for the differences between the daily predictive modeling and follow-up modeling for June, 2006 in a separate memo.

Charts D-1 and D-2 graphically display the data contained in Table D-1, with Chart D-1 displaying 3-hour SO₂ concentrations and Chart D-2 displaying 24-hour SO₂ concentrations for each day in March. Under normal operations, when predictive modeling is observed and there is no PEPCO Line Outage, the maximum predicted concentrations are always higher than observed concentrations, and generally by a wide margin. The likely reasons for this were discussed in the June 2006 memorandum cited above and in the Model valuation Study report.

Appendix D presents results of the weekly follow-up modeling. Modeling files are contained on the attached CD. A "read me" file on the CD explains the file structure.

5.0 Ambient Monitoring Data

As of August 2006, all six (6) Mirant Ambient Monitoring Program sites were in operation. The air quality monitoring sites measure ambient concentrations of sulfur dioxide (SO_2) in the vicinity of the Potomac River Power Plant. Three of the sites are at ground level and measure SO_2 at approximately 3-4 meters above ground height. Two sites are at a residential building, Marina Towers, where 2 sample probes measure SO_2 at a rooftop elevation. One probe is located at the center area of the building and one probe is positioned at the corner of the southeast wing of the building. One site is located southwest of the plant on the roof of the Holiday Inn. The six air monitoring sites were selected based on the results of extensive dispersion modeling, and the locations were approved by the U.S. EPA Region III as "preferred" sites in the Administrative Compliance Order dated June 1, 2006 (Docket No. CAA-03-2006-0163DA).

The ambient measurement program includes a meteorological measurement system that is comprised of tower-mounted parameters at the plant site. A separate SODAR system was added in December 2006. The list of air quality and meteorological parameters is provided in Table 5-1.

This report also includes a description of the monitoring equipment and data acquisition system. Section 6 of this report describes the various data validation criteria used for the Mirant ambient monitoring program, while Section 7 presents data results plus data capture statistics along with explanations of significant missing data periods. Appendix E presents monthly summary data reports of air quality and meteorological data. A satellite view of the Air Quality network is presented in Appendix F. The figure shows a view of the land area in the vicinity of the power plant with each measurement site labeled to indicate their location.

5.1 Description of the Ambient Data Report

Ambient air quality and meteorological data are collected and reported on a monthly basis from the Potomac River Generating Station's ambient air quality and meteorological monitoring network. The network was installed between the end of May and the end of July 2006. The Marina Tower probe sites began sampling on June 2, 2006. At the end of June, the network consisted of 4 SO₂ measurement locations, which was increased to 6 probe locations during the later part of July 2006. A separate meteorological monitoring station was installed in July and became operational in August 2006. A separate location has been selected for a SODAR measurement site and will come on line at a later date. The site locations were described in more detail in the monitoring plan document prepared for the project. The air quality data are compared to the National Ambient Air Quality Standards (NAAQS) for SO₂ and summarized on the monthly data report summary pages (MONSUMS) in Appendix E of this report. The parameters that are (and will be) monitored at the sites are listed in Table 5-1. Table 5-2 lists the instrumentation used for the monitoring program.

Configuration, siting, operation, data processing, quality assurance, and quality control practices for this measurement program conforms to the provisions of EPA's Ambient Monitoring Guidelines for the Prevention of Significant Deterioration (PSD), EPA-450/4-87-007, May 1987) and On-Site Meteorological Program Guidance for Regulatory Modeling Applications (EPA-450/4-87-013, June 1, 1987) except for the siting criteria of the monitoring stations. Exceptions to the siting criteria were made to meet the special requirements of the measurement program. A project specific Monitoring and QA Plan document details the network locations and operational procedures.

Each site is equipped with an Odessa 3260 data logger that monitors and records the output signals from the continuous measurement analyzers. The data loggers perform preliminary data processing, including computation of 1-hour averages and provide temporary data storage. Wind variability (sigma theta, sigma W) calculations will also be conducted by the data logger. The ENSR Data Center routinely interrogates the data

loggers via a dial-up phone line to retrieve the stored data. Data are then edited and validated within ENSR's PC-based data processing system.

5.2 Continuous Air Quality Measurements

Sulfur dioxide (SO₂) measurements are conducted using continuous measurement analyzers connected to an air intake manifold. Sulfur dioxide is measured at each site using a Thermo Environmental Instruments (TEI) Model 43A analyzer. The Odessa data logger monitors and records the output from the analyzers and provides hourly averages of pollutant concentrations. The hourly averages are reported in the monthly summary reports, which are presented in Appendix E.

Analyzers go through an automatic calibration check each day using the in-station calibration device controlled by the Odessa data logger. The automatic calibration is reviewed each business day by ENSR technical staff to verify that the analyzer is operating within acceptable performance boundaries. In the event that the automatic calibration check shows that the analyzer is not operating as required, corrective action is taken to investigate and resolve any instrument problem, if needed. On a biweekly schedule, each continuous SO₂ analyzer is checked for precision and, if needed, subsequently calibrated using the network gas dilution system (ENSR GASCAL) device and a certified gas cylinder of a known pollutant concentration.

5.3 Meteorological Measurements

A meteorological measurement system was installed during July-August 2006. Meteorological measurements are made at one tower site using sensors manufactured by Climatronics Corporation. Table 5-2 lists the parameter name and model number for each sensor. The sensors are installed on a 20-meter light tower located south of the power plant along the east fence line near the coal storage area. The wind speed, wind direction, and vertical wind sensors were moved from the 10-meter height to a 20-meter height on December 24, 2006 to improve sensor exposure. The meteorological site measures the parameters listed in Table 5-1.

The meteorological data is reviewed each business day to confirm that the system is operating properly and the hourly averages appear reasonable. The meteorological sensors receive a complete calibration and maintenance service check every 6 months.

Site Name	Monitored Parameters	Elevation Above Ground Level (AGL)	
Marina Towers Air Monitoring Site	Sulfur Dioxide (SO ₂) – Central Rooftop Location, 1 probe	45-meters	
	Sulfur Dioxide (SO ₂) – Southeast Rooftop Location, 1 probe	40-meters	
Southeast Fence Line	Sulfur Dioxide (SO ₂) – 1 probe	5 meters	
Northeast Fence Line	Sulfur Dioxide (SO ₂) – 1 probe	5 meters	
North - Daingerfield Park	Sulfur Dioxide (SO ₂) – 1 probe	5 meters	
Southwest - Holiday Inn Building	Sulfur Dioxide (SO ₂) – 1 probe	5 meters	
	Meteorological Operations	•	
Met. Tower Site	Wind Speed (scalar & vector)	20 meters	
	Wind Direction (scalar & vector)	20 meters	
	Vertical Wind Speed	20 meters	
	Sigma Theta	20 meters	
	Sigma W	20 meters	
	Temperature	2 meters	
	Temperature Difference (△T)	2 to 10 meters	
SODAR Plant Rooftop	Wind Speed (vector)	50, 75, 100, 125, 150, 175, 200 meters	
	Wind Direction (vector)	50, 75, 100, 125, 150, 175, 200 meters	
	Sigma Theta	50, 75, 100, 125, 150, 175, 200 meters	
	Vertical Wind Speeds	50, 75, 100, 125, 150, 175, 200 meters	
	Sigma W	50, 75, 100, 125, 150, 175, 200 meters	

Table 5-1: Summary of Monitoring Program Parameters for Mirant Air Quality Network

Parameter	Instrument	EPA Designation No.		
SO ₂	Thermo Environmental Instruments (TEI) 43A			
Wind Speed	Climatronics Model F460	N/A		
Wind Direction	Climatronics Model F460	N/A		
Vertical Wind	RM Young	N/A		
Temperature/Temperature Difference	Climatronics			
Sigma Theta, Sigma W	Odessa DSM 3260	N/A		
	Support Equipment			
Function	Inst	Instrument		
Data Acquisition	Odessa DSM 3260			
Telemetry – modem	Practical Peripheral (or other)			
Calibration Tracking	Metronics, In-station Calibrators with Permeation Tube			
Multipoint Calibrations and bi- weekly Precision and Level 1 Checks				
Data Transmitters				

Table 5-2: Monitoring Equipment for the Mirant Ambient Monitoring Program

6.0 Ambient Data Validation Criteria

Data validation, an after-the-fact review of in-field collected data, is the process by which data are determined to be of acceptable or unacceptable quality based on a set of predefined criteria. These criteria depend upon the types of data involved and the purpose for which data are collected.

6.1 Continuous Parameter Data Validation

Data validation, which occurs at several steps along the path of data flow, includes visual, mathematical, and graphical evaluations of the data. Checks are performed by ENSR field technicians, data processing personnel and ENSR operation and maintenance staff. Although the data validation process is continuous, final data validation can only occur at the time of a final calibration of each analyzer so that all of the validation criteria can be considered. ENSR staff review all measured data to determine validity during periods between the routine calibration checks.

Validation of continuous air quality data and meteorological is governed by strict standard operating procedures. For data to be considered valid, they must be accurate and precise within prescribed limits, represent factual conditions, be obtained from a calibrated, well-functioning instrument and from air sampled without interference or obstructions, and be thoroughly documented as traceable to recognized primary standards.

The data validation process initially begins in the field with the ENSR field technician's assessment of data during each site visit. Hourly data averages are subsequently scanned at ENSR for anomalous results and any faulty instrument performance. Events affecting validity are thoroughly documented. During the processing, erroneous data values are highlighted. An experienced ENSR data analyst performs checks of the field station log sheets, calibration data and the data report. The data-review also includes checking any values flagged as suspect and usually 2-5% of each data month's hourly values. Periods of data labeled suspect by the ENSR field technician are subsequently deemed valid or invalid by the ENSR validating meteorologist. All instrument calibrations (i.e., audits, multi-point calibrations, precision and Level 1 checks, etc.) are subsequently analyzed to confirm that initial calibration results are within acceptable tolerances.

6.2 Data Validation Standards and Criteria

The following validation criteria are used in the evaluation of the data:

- The instrument must be in its normal sampling configuration.
- Each hourly average must be based on at least 45 minutes of valid data
- Each air quality data point must be bracketed by calibration checks showing instrument responses to be within ± 15% of input concentration.
- Audit, multipoint, precision and Level 1 calibration records of the continuous air quality sensors must indicate analyzer responses to be within ± 15% of input concentrations for the period under review.
- The following validation limits are used for the tower-based meteorological parameters:

Wind Speed	± 5 mph	
Wind Direction	± 20 degrees	
Vertical Wind	± 5 mph	
Temperature	± 3.0° C	

 Limits for SODAR-based meteorological data accuracy were presented in Table 1-2 of the QA Plan. Due to the technology associated with SODAR monitoring, it is sometimes difficult to provide definitive data validation limits where a co-located meteorological tower is not present. ENSR provides quantitative reasonability check tolerances upon which a professional meteorologist can base a data validation decision. The following is the validation criteria that will be used to evaluate SODAR data:

Test	Wind Speed (mph)	Wind Direction (degrees)	Vertical Wind Speed (mph)	Sigma W (mph)	Sigma Theta (degrees)
Acceptable Range	0 to 100	1 to 360	-15 to -15	0 to 30	0 to 180
Hourly Difference Between SODAR and Tower	7.0	30	3.0	0.9	10
Mean Difference of a Data Set (Tower vs. SODAR)	1.1	20	0.5	0.7	5
Standard Deviation of Differences for a Data Set (Tower vs. SODAR)	4.5	30	2.0	0.7	10

SODAR data are not judged invalid solely on the basis of the reasonability check acceptance criteria described in this section. Data failing to meet these reasonability check tolerances are ultimately determined valid or invalid by a meteorologist using professional judgment.

7.0 Ambient Data Results and Statistics

The parameter abbreviations used on the Monthly Data Summary Forms for the Mirant Project and their associated definitions are provided in Table 7-1.

Table 7-2 presents the valid data capture statistics for each monitored parameter for the monitoring period. Also included are explanations of all significant missing data periods throughout the report period for air quality parameters not meeting the 80% data capture goal, and meteorological parameters not meeting the 90% data capture goal.

At the Marina Towers SO_2 measurement site, the rack temperature exceeded 104° F from March 27, hour 1300 through March 28 hour 2300, which is the upper operating temperature range for the SO_2 analyzer according to the instrument manufacturer. The elevated inside temperature coincided with high outside ambient temperatures plus the presence of new monitoring equipment in the room, installed by other parties. The new monitoring equipment gives off additional heat, which is not fully managed by the two air conditioning units that are currently installed in the room.

Air Quality and Meteorological Parameters					
Parameters / Definition Monthly Summary Code					
Sulfur Dioxide	SO ₂				
Wind Speed	WS				
Wind Speed – Vector	WS-Vector				
Wind Direction	WD				
Wind Direction – Vector	WD-Vector				
Vertical Wind Speed	VWS				
Sigma Theta (wind direction variability)	Sigma T				
Temperature	Temp				
Temperature Difference 2 to 10- Meters	Delta T				
Site Name	Site Abbreviation				
Marina Towers – Central Probe	Marina Towers - CNTRL				
Marina Towers – South Probe	Marina Towers - SOUTH				
Southeast Site	SOUTHEAST SO2				
Northeast Site	NORTHEAST SO2				
Southwest Site/Holiday Inn	SOUTHWEST HOLIDAY IN				
North Site/Daingerfield Park	NORTH				

Table 7-1: Parameters, Site Name Codes, and Abbreviations

Table 7-2: Mirant Monthly Data Capture Summary

Site Name	Parameter	% Data Capture*	Total % Data Loss	Reason for Significant Periods of Data Loss**	Affected Dates
Marina Towers Central Probe	SO ₂	99.3	0.7		
Marina Towers South Probe	SO ₂	99.3	0.7		· ·
Southeast Fence	SO ₂	99.5	0.5		
Northeast Fence Line	SO ₂	99.7	0.3		
<u>Southwest</u> Site/Holiday Inn	SO ₂	99.5	0.5		
<u>North</u> <u>Site/Daingerfield</u> <u>Park</u>	SO ₂	99.6	0.4		
Meteorological Tower	Wind Speed	99.9	0.1		
Measurements Reported as of	Wind Direction	99.9	0.1		
December 1, 2006	Vertical Wind	99.9	0.1		
	Sigma Theta	99.9	0.1		
	Sigma W	99.9	0.1		
	Temperature	99.9	0.1		
	Temperature Difference	99.9	0.1		

* Data capture target values are:

80% data capture for continuous air quality data. ٠

٠

90% data capture for continuous meteorological data. % data capture is based on the date of the site data start-up.

** Consecutive data loss greater than or equal to 12 hours

Appendix A

Modeled Input Files and Results of Daily Predictive Modeling (on CD)

Predictive Model Results Summary Table A-1

Table A-1: Predictive Model Results Summary

Potomac River

AERMOD N	lodel Results Log	24 Hr AVG	3 HR MAX	AERMO
DATE MODELED	SELECTED CONFIGURATION	TARGET SO2 RATE Ib/MBtu	SO2 RATE (lb/MBtu)	S O 2 3-H O U I
March 1, 2007	G 3 Unit 1, 2, 3, 4 & 5(24Max)	0.24	0.19	1208
March 2, 2007	G 3 Unit 1, 2, 3, 4 & 5(24Max)	0.24	0.21	1087
March 3, 2007	G3 Unit 1, 2, 3, 4 & 5(24Max)	0.24	0.34	665
March 4, 2007	G 3 Unit 1, 2, 3, 4 & 5(24Max)	0.60	0.73	778
March 5, 2007	G 3 Unit 1, 2, 3, 4 & 5(24Max)	0.24	0.42	546
March 6, 2007	G 3 Unit 1, 2, 3, 4 & 5(24Max)	0.24	0.31	725
March 7, 2007	Table #1 C1 (8 / 8 / 8)	1.20	N/A	N/A
March 8, 2007	Z3 Units 1 & 2 (24Max)	0.60	1.16	493
March 9, 2007	Z1 Units 1 & 2 (16 Max 8 Off)	0.50	0.75	634
March 10, 2007	Table #1 C1 (8 / 8 / 8)	1.20	N/A	N/A
March 11, 2007	Table #1 C1 (8 / 8 / 8)	1.20	N/A	N/A
March 12, 2007	Table #1 C1 (8 / 8 / 8)	1.20	N/A	N/A
March 13, 2007	N1 Units 1& 2 (16/0/8), 3 (12/12)	0.50	1.04	457
March 14, 2007	P1 Units 1&2 (16/0/8), Unit 5 (12/12)	0.50	0.78	609
March 15, 2007	R Units 3 & 5 (12/12)	0.50	1.01	470
March 16, 2007	P2 Units 1&2 (8/8/8), Unit 5 (24Max)	0.60	1.30	437
March 17, 2007	V2 Units 1 (8/8/8), Unit 5 (24 Max)	0.60	1.83	312
March 18, 2007	R 2 Units 3 & 5 (24 Max)	0.60	1.84	309
March 19, 2007	R Units 3 & 5 (12/12)	0.60	0.81	704
March 20, 2007	D2 Units 1&2 (8/8/8), 3&5 (24Max)	0.60	1.04	550
March 21, 2007	P2 Units 1&2 (8/8/8), Unit 5 (24Max)	0.60	0.82	698
March 22, 2007	V2 Unit 1 (8/8/8), Unit 5 (24 Max)	0.60	1.54	371
March 23, 2007	E Units 1&2 (8/8/8), 4&5 (12/12)	0.60	1.67	341
March 24, 2007	E2 Units 1&2 (8/8/8), 4&5 (24Max)	0.60	1.11	512
March 25, 2007	E2 Units 1&2 (8/8/8), 4&5 (24Max)	0.60	1.64	347
March 26, 2007	E Units 1&2 (8/8/8), 4&5 (12/12)	0.50	0.63	751
March 27, 2007	E2 Units 1&2 (8/8/8), 4&5 (24Max)	0.60	1.06	537
March 28, 2007	B2 Unit 1 (8/8/8), 3, 4 & 5 (24Max)	0.60	1.45	393
March 29, 2007	A (Units 3-4-5 @ 12 Min / 12 Max)	0.45	0.62	691
March 30, 2007	B3 Units 1, 3, 4 & 5 (24 Max)	0.60	0.79	719
March 31, 2007	B Unit 1 (8/8/8) 3, 4 & 5 (12/12)	0.60	1.26	453

S O 2	S 0 2	PM10				
3-HOUR	24-HOUR	24-HOUR				
1208	363	83				
1087	258	61				
665	276	65				
778	306	29				
546	305	71				
725	331	77				
N/A	N/A	N/A				
493	180	N/A				
634	192	N/A				
N/A	N/A	N/A				
N/A	N/A	N/A				
N/A	N/A	N/A				
457	178	N/A				
609	186	N/A				
470	199	N/A				
437	182	N/A				
312	155	N/A				
309	204	N/A				
704	209	N/A				
550	154	17				
698	130	N/A				
371	103	N/A				
341	104	23				
512	86	21				
347	60	17				
751	200	24				
537	188	19				
393	110	38				
691	191	N/A				
719	121	19				
453	150	24				

AMBIENT LIMITS (with background removed)									
3 HR SO2	24 HR SO2	24 HR PM10							
1061 ug/m ³	314 ug/m ³	105 ug/m ³							

Appendix **B**

Plant Operating Parameters Summary

24 Hour SO₂ Rate Compliance Summary Table B-1

3 Hour SO₂ Rate Compliance Summary Table B-2

24 Hour SO₂ Lb/Day Compliance Summary Table B-3

Table B-1

24 Hour SO2 Rate Compliance Summary

	Unit 1 SO 2	Unit 2 SO 2	Unit 3 SO 2	Unit 4 SO2	Unit 5 SO 2	Daily
DATE	24 Hr Avg	24 Hr Avg	24 Hr Avg	24 Hr Avg	24 Hr Avg	SO2 Target
	lb/M M B tu	lb/M M B tu	lb/M M B tu	lb/MMBtu	lb/M M B tu	lb/MMBtu
March 1, 2007	0.56	0.51	0.58	0.51	0.70	0.24
March 2, 2007	0.40	0.40	0.62	0.50	0.76	0.24
March 3, 2007	0.34	0.33	0.36	0.33	0.43	0.24
March 4, 2007	0.51	0.52	0.57	0.55	0.58	0.60
March 5, 2007	0.34	0.38	0.41	0.39	0.44	0.24
March 6, 2007	0.41	0.41	0.35	0.45	0.66	0.24
March 7, 2007	0.49	0.00	0.00	0.00	0.00	1.20
March 8, 2007	0.46	0.41	0.00	0.00	0.00	0.60
March 9, 2007	0.41	0.42	0.00	0.00	0.00	0.50
March 10, 2007	0.91	0.00	0.00	0.00	0.00	1.20
March 11, 2007	0.95	0.00	0.00	0.00	0.00	1.20
March 12, 2007	0.98	0.00	0.12	0.00	0.00	1.20
March 13, 2007	0.43	0.41	0.41	0.00	0.00	0.50
March 14, 2007	0.46	0.37	0.22	0.00	0.38	0.50
March 15, 2007	0.00	0.00	0.45	0.00	0.46	0.50
March 16, 2007	0.46	0.46	0.00	0.00	0.55	0.60
March 17, 2007	0.45	0.00	0.11	0.00	0.55	0.60
March 18, 2007	0.00	0.00	0.52	0.00	0.54	0.60
March 19, 2007	0.00	0.00	0.57	0.00	0.52	0.60
March 20, 2007	0.42	0.47	0.52	0.00	0.54	0.60
March 21, 2007	0.46	0.50	0.00	0.00	0.55	0.60
March 22, 2007	0.48	0.00	0.00	0.03	0.55	0.60
March 23, 2007	0.55	0.49	0.00	0.37	0.56	0.60
March 24, 2007	0.52	0.47	0.00	0.53	0.55	0.60
March 25, 2007	0.40	0.46	0.00	0.51	0.55	0.60
March 26, 2007	0.43	0.39	0.00	0.46	0.46	0.50
March 27, 2007	0.47	0.50	0.00	0.54	0.57	0.60
March 28, 2007	0.45	0.00	0.39	0.54	0.48	0.60
March 29, 2007	0.40	0.00	0.41	0.42	0.41	0.45
March 30, 2007	0.50	0.00	0.50	0.54	0.55	0.60
March 31, 2007	0.51	0.00	0.55	0.53	0.55	0.60

ENSR

Table B-2

3-Hour	502	Rate	Com	nliance	Summary
•			00111	phanee	oummary

	Unit 1	Unit 2	Unit 3	Unit 4	Unit 5	3-Hour
	Maximum 3-					
	Hour SO 2	Hour SO 2	Hour SO 2	Hour SO 2	Hour SO2	
DATE	Rate	Rate	Rate	Rate	Rate	SO2 Target
	(lb/MMBtu)	(lb/MMBtu)	(Ib/MMBtu)	(lb/MMBtu)	(lb/MMBtu)	(lb/MMBtu)
March 1, 2007	0.92	0.67	0.67	0.58	0.93	0.19
March 2, 2007	0.60	0.59	0.93	0.63	1.01	0.21
March 3, 2007	0.64	0.48	0.40	0.40	0.51	0.34
March 4, 2007	0.52	0.55	0.60	0.56	0.64	0.73
March 5, 2007	0.42	0.49	0.45	0.53	0.75	0.42
March 6, 2007	0.51	0.52	0.38	0.56	1.06	0.31
March 7, 2007	0.81	0.00	0.00	0.00	0.00	1.20
March 8, 2007	0.54	0.59	0.00	0.00	0.00	1.16
March 9, 2007	0.45	0.50	0.00	0.00	0.00	0.75
March 10, 2007	1.03	0.00	0.00	0.00	0.00	1.20
March 11, 2007	1.06	0.00	0.00	0.00	0.00	1.20
March 12, 2007	1.11	0.00	0.12	0.00	0.00	1.20
March 13, 2007	0.52	0.50	0.51	0.00	0.01	1.04
March 14, 2007	0.59	0.46	0.25	0.00	0.46	0.78
March 15, 2007	0.00	0.00	0.53	0.00	0.47	1.01
March 16, 2007	0.65	0.58	0.00	0.00	0.57	1.30
March 17, 2007	0.49	0.00	0.16	0.00	0.56	1.83
March 18, 2007	0.00	0.00	0.68	0.00	0.56	1.84
March 19, 2007	0.00	0.13	0.72	0.00	0.55	0.81
March 20, 2007	0.63	0.60	0.56	0.00	0.56	1.04
March 21, 2007	0.55	0.57	0.00	0.00	0.55	0.82
March 22, 2007	0.56	0.00	0.00	0.03	0.57	1.54
March 23, 2007	0.67	0.56	0.00	0.55	0.56	1.67
March 24, 2007	0.64	0.57	0.00	0.56	0.56	1.11
March 25, 2007	0.48	0.55	0.00	0.53	0.55	1.64
March 26, 2007	0.54	0.55	0.00	0.47	0.49	0.63
March 27, 2007	0.76	0.56	0.00	0.57	0.58	1.06
March 28, 2007	0.52	0.00	0.57	0.55	0.53	1.45
March 29, 2007	0.40	0.00	0.48	0.48	0.47	0.62
March 30, 2007	0.61	0.00	0.54	0.55	0.55	0.79
March 31, 2007	0.62	0.00	0.58	0.55	0.56	1.26

Table B-3
24 Hour SO2 Lb/Day Compliance Summary

	Unit	1 SO2	Unit	2 SO2	Unit 3	3 SO2	Unit 4	SO2	Unit 5	5 SO2	Tota	SO2
DATE	24 Hr Total	SO2 Target1	24 Hr Total	SO2 Target								
	lb/day	lb/day	lb/day	lb/day	lb/day	lb/day	lb/day	lb/day	lb/day	lb/day	lb/day	lb/day
March 1, 2007	11,341	6,408	9,672	6,408	10,338	6,018	9,576	6,018	11,316	6,018	52,243	30,871
March 2, 2007	7,231	6,408	6,923	6,408	9,273	6,018	9,483	6,018	13,426	6,018	46,336	30,871
March 3, 2007	4,210	6,408	4,174	6,408	5,379	6,018	5,237	6,018	7,098	6,018	26,098	30,871
March 4, 2007	5,535	16,021	5,909	16,021	8,923	15,045	9,181	15,045	9,534	15,045	39,082	77,178
March 5, 2007	5,912	6,408	6,448	6,408	7,004	6,018	7,606	6,018	7,887	6,018	34,857	30,871
March 6, 2007	4,363	6,408	4,273	6,408	3,659	6,018	4,972	6,018	9,521	6,018	26,788	30,871
March 7, 2007	4,357	15,391	-	-	-	-	-	141	-	-	4,357	15,391
March 8, 2007	8,293	16,021	3,013	16,021		-		-			11,306	32,041
March 9, 2007	4,974	8,900	4,812	8,900	-	-	-	-	-	-	9,786	17,801
March 10, 2007	12,955	15,391	-	-	-	-	-	-	-	-	12,955	15,391
March 11, 2007	11,969	15,391	-	-	-			-	-	-	11,969	15,391
March 12, 2007	15,289	15,391	6	-	31	-	-	-	-	-	15,326	15,391
March 13, 2007	5,666	8,900	5,447	8,900	5,108	8,673	-	-	-	-	16,221	26,474
March 14, 2007	5,362	8,900	4,728	8,900	218	-		-	4,221	8,673	14,529	26,474
March 15, 2007	-	-	-	-	6,844	8,673	-	-	8,109	8,673	14,953	17,346
March 16, 2007	5,719	7,695	5,442	7,695	-	-		2	9,037	15,045	20,198	30,436
March 17, 2007	4,893	7,695	-	-	39	-	-	-	10,914	15,045	15,846	22,741
March 18, 2007	-	-	-	-	7,966	15,045		-	10,139	15,045	18,105	30,091
March 19, 2007	-	-	19	-	7,711	10,408		-	8,073	10,408	15,803	20,816
March 20, 2007	5,196	7,695	5,492	7,695	7,191	15,045		-	9,662	15,045	27,541	45,481
March 21, 2007	6,607	7,695	6,241	7,695	-	-	-	-	11,228	15,045	24,076	30,436
March 22, 2007	6,448	7,695	-	-	-	-	7		10,888	15,045	17,343	22,741
March 23, 2007	5,641	7,695	5,842	7,695	-	-	2,880	10,408	8,931	10,408	23,294	36,206
March 24, 2007	4,810	7,695	5,448	7,695	-	-	6,124	15,045	7,810	15,045	24,192	45,481
March 25, 2007	1,941	7,695	4,876	7,695	-	-	8,561	15,045	9,401	15,045	24,779	45,481
March 26, 2007	5,311	6,413	4,610	6,413	-	-	7,921	8,673	6,908	8,673	24,750	30,171
March 27, 2007	2,288	7,695	6,138	7,695	-	÷	10,248	15,045	10,084	15,045	28,758	45,481
March 28, 2007	5,634	7,695		-	3,190	15,045	9,172	15,045	7,850	15,045	25,846	52,831
March 29, 2007	315	-	-	-	4,314	7,806	6,059	7,806	6,575	7,806	17,263	23,417
March 30, 2007	7,382	16,021	-	-	5,416	15,045	10,440	15,045	10,188	15,045	33,426	61,157
March 31, 2007	5,191	7,695			5,684	10,408	8,385	10,408	8,153	10,408	27,413	38,918

Appendix C

Plant Operating Data for March (on CD)

Appendix D

Follow-Up Modeling Results (on CD)

Follow-up Model Summary Table D-1

3 Hour SO₂ Comparison Figure D-1

24 Hour SO₂ Comparison Figure D-2

Table D-1: Follow-Up Model Summary

Mirant Potomac, Alexandría, Virginia

Maximum SO 2 Impacts Predicted by AERMOD Using Actual Stack Emissions/Parameters Along with Historical Meteorological Observations Maximum Measured SO 2 Concentrations from Ambient Monitoring Network Predicted Concentrations above the threshold values are in **bold** 3-hr Threshold Value: 1300 (NAAQS) - 238.4 (Background) = 1061.6 µg/m³ 24-hr Threshold Value: 365 (NAAQS) - 51 (Background) = 314 µg/m³

Date	Units Operating		ed Concentrations ted Met Data		ed Concentrations ved Met Data	Max Impact Lo	cation (if follow-u) threshold)	conc is above	Observed MC	NITOR DATA
		3-hr (µg/m³)	24-hr (µg/m ³)	3-hr (µg/m³)	24 -h r (µg/m ³)	UTM X (NAD27)	UTM Y (NAD27)	Location	3-hr (µg/m³)	24-hr (µg/m ³)
March 1, 2007	Units 1, 2, 3, 4, 5	1,208	363	710.3	172.7				323.1	61.3
March 2, 2007	Units 1, 2, 3, 4, 5	1,086	258	1,993.6	549.2	322/8/ 66	4298786	Roof of Marina Twrs	1.183.4	273.8
March 3, 2007	Units 1 2, 3, 4, 5	665	276	605.3	255.0				223.6	50.8
March 4, 2007	Units 1, 2, 3, 4, 5	777	306	753.2	346.5	322867 38	4296580	Fence, E of Slack 2	242.8	102.7
March 5, 2007	Units 1, 2, 3, 4, 5	545	304	778.8	330.5	322871 62	4298565	Fence, E of Stack 2	453.3	134.2
March 6, 2007	Units 1, 2, 3, 4, 5	725	331	1,052.3	285.9				721.8	283.9
March 7, 2007	Unit 1 (Table 1 Operation)	0	0	33.5	в 8				31.9	20.2
March 8, 2007	Units 1, 2	493	180	237.7	44.5				42.4	25.7
March 9, 2007	Units 1, 2	634	192	362.0	112.3				84.7	26.9
March 10, 2007	Unit 1 (Table 1 Operation)	0	0	281.6	101.0				68.2	28.6
March 11, 2007	Unit 1 (Table 1 Operation)	N/A	N/A	287 4	137.8				37.6	19.0
March 12, 2007	Unit 1 (Table 1 Operation)	N/A	N/A	110.6	38.5				59.4	20.4
March 13, 2007	Units 1, 2, 3	457	178	985.5	458.5	372787 55	4295786	Roof of Marina Twis	72.5	31.8
March 14, 2007	Units 1, 2, 3, 5	610	186	592.6	147.0				B1.2	29.1
March 15, 2007	Units 3, 5	470	:99	401.4	133.7				85.2	31.3
March 16, 2007	Units 1, 2, 5	437	181	385.4	112.6				61.1	20.8
March 17, 2007	Units 1, 3, 5	522	155	174.6	91.8				198.2	81.4
March 18, 2007	Units 3. 5	309	204	391.5	116.D				163,7	52.3
March 19, 2007	Units 3 5	704	209	329.8	159.8				93.5	42.4
March 20, 2007	Units 1, 2, 3, 5	550	154	385 6	913				203.1	63.9
March 21, 2007	Units 1, 2, 5	697	129	509 4	124.9				24.9	13.2
March 22, 2007	Units 1, 5	371	103	248 2	84.1				86.0	34.4
March 23, 2007	Units 1, 2, 4. 5	341	104	1,109.7	315.8	322787 66	4298786	Roof of Marina Twis	62.9	19.2
March 24, 2007	Units 1, 2, 4, 5	512	66	312.1	96.1				30.6	11.1
March 25, 2007	Units 1, 2, 4, 5	347	59	883.9	150.6				160.2	42.5
March 26, 2007	Units 1, 2, 4, 5	751	200	1,153.8	598,2	3hr 322770.78 24hr 322787 65	3hr 4298791 50 24+r 4258766	Roof of Marina Twrs	276.4	62.6
March 27, 2007	Units 1, 2, 4, 5	638	187	397 5	144.1				119.2	53.4
March 28, 2007	Units 1, 3, 4, 5	393	110	494.9	216.8				102.6	29.0
March 29, 2007	Units 1, 3, 4, 5	691	191	405.2	159.1				120.5	45.6
March 30, 2007	Units 1, 3, 4, 5	719	121	922.6	389.1	322787 66	4298786	Roof of Marina Twrs	124.0	38.9
March 31, 2007	Units 1, 3, 4, 5	453	150	520.5	165.2				34.9	15.2

2,200 2,000 1,800 1,600 SO2 Concentration - ug/m3 1,400 1,200 3 Hr NAAQS -Bkgnd = 1,061 ug/m3 1,000 --- Predictive 800 600 400 200 0 2 10 11 12 13 14 15 16 17 18 19 20 21 22 23 24 25 26 27 28 29 30 31 1 3 5 6 7 8 9 4 Day of Month

Figure D-1: March 2007 3 Hr SO2 Comparison

April 2007

ENSR

SO2 Concentration - ug/m3 24 Hr NAAQS -Bkgnd = 314 ug/m3 Predictive Follow-Up 10 11 12 13 14 15 16 17 18 19 20 21 22 23 24 25 26 27 28 29 30 31 Day of Month

Figure D-2: March 2007 24 Hr SO2 Comparison

April 2007

ENSR

Appendix E

Monthly Summary Data Reports (on CD)

Monthly SO₂ and Meteorological Summary Reports

MONTHLY SUMMARY REPORT MIRANT POTOMAC										*				 *										
LOCATION: MARINA TOWERS 502 CNTRL (ug/m3)								DAT RUN	A FOR	:04/1	2007 0707													
HR-BEGØ HR-ENDØ DAY	0 01 1 02	02 03	03 04	04 05	Ø5 Ø6	06 07	Ø7 Ø8	08 09	09 10	HOU 10 11	RS(es 11 12	t) 12 13	13 1 4	14 15	15 16	16 17	17 18	18 19	19 20	20 21	21 22	22 23	23 24	AVG
7891111111111122222222222222222222222222	$\begin{array}{c} 2083\\ 2083\\ 44\\ 10\\ 10\\ 34\\ 57\\ 10\\ 12\\ 97\\ 7\\ 10\\ 84\\ 12\\ 97\\ 7\\ 10\\ 84\\ 12\\ 97\\ 7\\ 10\\ 84\\ 12\\ 97\\ 7\\ 10\\ 84\\ 12\\ 97\\ 7\\ 10\\ 85\\ 93\\ 10\\ 5\\ 13\\ 95\\ 13\\ 15\\ 13\\ 95\\ 13\\ 15\\ 15\\ 12\\ 15\\ 12\\ 15\\ 12\\ 15\\ 12\\ 12\\ 12\\ 12\\ 12\\ 12\\ 12\\ 12\\ 12\\ 12$	1773549277740535888870849470833485	1860 105472283887227493499334577 12283887277493499334577	16355321444405718377772799355592557 1214444055718377772799355592557	12487302186648793688977937392907 12211648793688977937392907 6 1 107	6274537864988932395729 48 388892677 11112 2113 1 1 611111 611111	334488406927203234503808350299068 11112211111233450380835029068	25945969987552823334518808832927217 151111128808832927217 1227	54 781 2188 20683 2632 132 395 187 742 238 13885 7 14238 357	304347270704646237478588738-36320 	46378533936780303542396138642300 31231 16410 11 12 711 20 211 20	9337796483509313737753734907319 214512513737753734907319 214513734907319	1833580807165803-3938372539297377 24997977	203240377897896758230659636574577 119 37 119311515 151577	3035550878722707472307208438917227 1119 11518438917227 11212 11212	17338077995021177937480377093084785 10377950211377937480370933084785 113778111113337785	13330275039690493499597004380525 125 125 125 125 125 125 125 125 125	3 11 9989826087325295948883873704 2 1185 11 1 1 185 11 1	7370839543928522323494404054724 1231231231111354724 11354724	33993802944695566422454244856595 1 22 2 1 11 136 136 4 1 136 1	3395972853453738933994041488498 21 112 235 1 1 122 1 1	337 44013495 517483333417311778495 2 11162 1337 1495	96355140648554837320057316957782 210057312095770857 10057312095770857	62 62 1106843174402496071430292394796 2 1112231 111111 46 13 3 136
AVG Hours	52 44 31 31	38 31	42 31	34 31	$\begin{smallmatrix}15\\31\end{smallmatrix}$	16 31	13 31	$\begin{array}{c} 15\\31\end{array}$	$\begin{smallmatrix}14\\29\end{smallmatrix}$	16 30	24 31	21 30	17 30	30 31	24 31	20 31	14 31	14 31	12 31	25 31	$\frac{15}{31}$	13 31	4 8 31	24 739
TOTAL H NUMBER NUMBER DATA CA STANDAR	OF GOOD OF MISS PTURE (PERCE.	S = OURS= NT) = =	744 739 99	9 HJ 5 2r 3 MJ		г ноия Эн ноц	RLY VA	ALUE /ALUE VALUE	= 10	24 - 18 48 H 3 2	- 3HR ØVAI HIGHES 2nd HJ	LUES E St ave	IXCEEL BRAGE 3	077	;: F	24HR ØVA HIGHES 2nd H	RUNNI ALUES ST AVE IIGHES	NG AV EXCEE RAGE T AVG	ERAGE D 365 271 . 99	<u>-</u>			

NOTE: MISSING VALUE INDICATOR IS----

*******	* * * * * * * * * * * * * * * * * * * *	* * * *
*	DATA VALIDATED BY	*
*	ENSR	*
********	******	****

April 2007

	MONTHLY SUMMARY REPORT	* * *
LOCATION: MARINA TOWERS SO2	MIRANT POTOMAC SOUTH (ug/m3)	DATA FOR MAR 2007 RUN DATE:04/10/07
HR-BEGØØ Ø1 Ø2 Ø3 Ø4 Ø5 HR-ENDØ1 Ø2 Ø3 Ø4 Ø5 Ø6 DAY	HOURS(est) 06 07 08 09 10 11 12 13 14 15 16 17 07 08 09 10 11 12 13 14 15 16 17 18	18 19 20 21 22 23 19 20 21 22 23 24 AVG
$\begin{array}{cccccccccccccccccccccccccccccccccccc$	$\begin{array}{cccccccccccccccccccccccccccccccccccc$	3 13 12 9 7 7 8 8
AVG 45 51 48 56 43 18 HOURS 31 31 31 31 31 31	8 13 12 14 14 16 21 19 14 22 17 15 1 1 31 31 31 29 30 31 30 30 31 31 31 3	.3 14 10 13 11 13 39 23 31 31 31 31 31 31 31 31 739
TOTAL HOURS = 744 NUMBER OF GOOD HOURS = 739 NUMBER OF MISSING HOURS= 5 DATA CAPTURE (PERCENT) = 99.3 STANDARD DEVIATION = 103	TOTAL AVERAGE = 23 - 3HR RUNNING AVERAGE24H HIGHEST HOURLY VALUE = 1445 IVALUES EXCEED1300 0 2nd HIGH HOURLY VALUE = 1275 HIGHEST AVERAGE1317 HIGH MINIMUM REPORTED VALUE= 3 2nd HIGHEST AVG. 607 2nd	IR RUNNING AVERAGE- DVALUES EXCEED 365 IEST AVERAGE 317 I HIGHEST AVG. 45

NOTE: MISSING VALUE INDICATOR IS----

***********	* * * * * * * * * * * * * * * * * * * *	******
*	DATA VALIDATED BY	*
*	ENSR	*
*********	* * * * * * * * * * * * * * * * * * * *	******

April 2007

MONTHLY SUMMARY REPORT * * MIRANT POTOMAC DATA FOR MAR 200 RUN DATE:04/09/07 LOCATION: SOUTHEAST SO2 S02 (ug/m3)HOURS(est) 24 $\begin{array}{c} 15\\ 16\end{array}$ $\frac{18}{19}$ 20 21 22 23 13 $\begin{smallmatrix}13\\14\end{smallmatrix}$ 17 $17 \\ 18$ $\frac{11}{12}$ 15 07 09 10 HR-BEG00 HR-END01 DAY $^{01}_{02}$ 03 04 05 06 AVG $^{14}_{88}$ 3 3 $^{13}_{3}$ $^{10}_{3}$ 3 $\frac{13}{17}$ 122 3 45 97 3 ----्र Ē З 24 1908 22 227 119 303 233 5 22 242 14 48 60 C, 118 438 71 8 41 17 443 73 7 479 38 8 73 176 14Í -4 1Õ 17 28 16 12 17 21 13 7 168 10 22 16 12 39 937 g - 5 15 21 12 22 18 21 3 22 20 16 17 13 16 10 8 25 13 3 ġ 29 25 18 16 12 3 16 20 17 $\frac{1}{2}$ 17 29 9 5 13 26 3 19 54 8 37 -5 Ĵ. 10 8 à 16 24 13 9 3 12 10 12 $\frac{17}{22}$ $1\overline{4}$ ž 15 11 28 - - -17 Š 10 12 123 147 695 12 9 3 17 18 7 16 5 13 22 8 5 81 52 9 5 10 11 13 29 3 з 3 35 12 12 3 139 3 47 ž ā 54 42 à Ĵ. 14 12 58 119 165 13 $161 \\ 127$ $138 \\ 176 \\ 7$ 64 5 51 13 169 $164 \\ 196$ 000000000 12 10 8 9 5 3 ă 10 9 8 8 17Õ 5 7 30Ī 1Õ 1 Ž 12 5 13 7 -5 3 1ŏ Ś ā 17 <u>9</u> $^{16}_{25}$ 3 5 9 3 2Ō ğ 16 з З Ĵ. ā 14 143 10 10 17 З 13 75 4 14 13 ŝ 1 7 $^{18}_{7}$ Э ģ з 8 9 7 ŝ. 17 14 10 5 28 31 13 5 16 21 17 3 7 12 3 9 16^{8} 3 $110 \\ 51$ õ. 5 3 Ż З З ā -5 _ _ ĝ 1Ø -4 Δ $\frac{25}{31}$ 31 30 31 31 31 31 $\frac{43}{31}$ 31 $\frac{44}{31}$ 30 31 AVG Hours 31 31 31 31 31 Ξī - 3HR RUNNING AVERAGE-OVALUES EXCEED1300 HIGHEST AVERAGE 827 2nd HIGHEST AVG. 468 -24HR RUNNING AVERAGE-5VALUES EXCEED 365 TOTAL HOURS NUMBER OF GOOD HOURS TOTAL AVERAGE = HIGHEST HOURLY VALUE = 2nd HIGH HOURLY VALUE = MINIMUM REPORTED VALUE= 740937 **EX** = HIGHEST AVERAGE 387 2nd HIGHEST AVG. 128 NUMBER OF MISSING HOURS= DATA CAPTURE (PERCENT) = 99.5 STANDARD DEVIATION

NOTE: MISSING VALUE INDICATOR IS----

2

****	******	*******
*	DATA VALIDATED BY	*
*	ENSR	*
*******	************************	******

ē

,

MONTHLY SUMMARY REPORT * MIRANT POTOMAC DATA FOR MAR 2007 RUN DATE:04/09/07 (ug/m3)S02 LOCATION: NORTHEAST SO2 HOURS(est) $18 \\ 19$ 21 22 23 24 $^{17}_{18}$ 20 $13 \\ 14$ $^{14}_{15}$ $\frac{15}{16}$ $\frac{16}{17}$ 09 $11 \\ 12$ 02 03 04 05 06 07 $\frac{12}{13}$ HR-BEG00 HR-END01 ĭō 8 AVG DAY 362 37 290 76 24 439 10 121 8 155 12 25 8 269 118 41 35 7 5Ø 5 31 169 317 5 9 9 ЗŤ ģ -9 97 30 17 26 12 76 ġ, - Ğ ġ. 21 18 12 16 7 35 18 47 59 7 12 7 зõ 012345678901234567890 26 26 10 $\frac{12}{21}$ - 8 īō 24 10 17 5 18 13 17 $\overline{13}$ 13-5 -4 10 10 $\overline{16}$ 10- 4 17 254 13 12 зğ $14 \\ 14 \\ 13$ 22 10 14 10 14 9 7 3 7 24 16 28 24 12 28 20 17 7 -9 17 10 13 22 1ġ 5 7 17 59 29 21 9 ġ 9 13 -9 12 29 14 14 14 14 13 94 10 $1\frac{2}{8}$ 121716 21 18 17 7 <u>9</u> ž ē ğ <u>9</u> á 21 20 ___ ā 29 12 92 12 7 16 22 16 7 25 13 9 14 10 7 $14 \\ 13$ 22 $10 \\ 18$ 7 16 14 7 20 20 16 ĩş 287 18 24 20 17 21 ě 16 18 29 8 81 12 21 12 88 10 16 $2\overline{1}$ 55 14 21 9 59 13 24 9 63 10 10 56 12 9 13 229 88 13 10 16 99 16 9 18 9 17 30 10 16 37 14 47 17 ġ ġ 17 12 28 22 17 20 13 9 31 $\overline{10}$ 17īø 17 8 12 10 2õ 12 10 ī7 17 12 9 - 8 13 12 10 108 99 $\frac{13}{17}$ 17 10 10 9 13 12 99 9 14 13 9 12 8 12 9 $12\\10$ 9 9 8 13 8 8 12 10 īø ē 8 9 8 ē 13 10 12 10 10 9 10 8 13 17 $\frac{13}{17}$ 10 21 $13 \\ 12$ $1\overline{6}$ $1\overline{0}$ $\frac{51}{12}$ õ, Q, q 8 9 1Ő īø 1Ø 16 ğ ġ, 12 13 12 $12 \\ 18$ 12 - 9 $\overline{2}\overline{1}$ ğ à ន ā 31 $\frac{25}{31}$ $\frac{21}{31}$ 31 31 $\frac{14}{31}$ 31 $\frac{13}{31}$ 31 $\frac{17}{31}$ AVG HOURS $\frac{14}{31}$ $\frac{11}{31}$ $\frac{13}{31}$ $\frac{13}{31}$ 31 Зø -24HR RUNNING AVERAGE-TOTAL AVERAGE HIGHEST HOURLY VALUE = 2nd HIGH HOURLY VALUE = 439 **3HR RUNNING AVERAGE-**-742 TOTAL HOURS = OVALUES EXCEED 365 HIGHEST AVERAGE 105 2nd HIGHEST AVG. 102 **ØVALUES EXCEED1300** NUMBER OF GOOD HOURS Ŧ HIGHEST AVERAGE 390 2nd HIGHEST AVG. 301 NUMBER OF MISSING HOURS= DATA CAPTURE (PERCENT) = MINIMUM REPORTED VALUE= 99.7 STANDARD DEVIATION

NOTE: MISSING VALUE INDICATOR IS----

 $\frac{1}{2}$

*******	* * * * * * * * * * * * * * * * * * * *	******
*	DATA VALIDATED BY	*
*	ENSR	*
*********	*******	******

											SUMMA POTOM		PORT							 *		-		 *
LOCATION: NO	ישרים. זבייים	DATNG	ERFTE	1.0				S 02	FIL.	KUN1	FOION		g/m3)							DAT RUN	A FOR DATE	MAR :04/0	2007 9707	
HR-BEG00 HR-END01 DAY	01 02	02 03	03 04	Ø4 Ø5	05 06	06 07	07 08	08 09	09 10	HOU 10 11	RS(es 11 12	t) 12 13	13 14	14 15	15 16	16 17	17 18	18 19	19 20	20 21	21 22	22 23	23 24	AVG
16457867789011234567890110355097	1884773868844501677203849783585007	1158796464572898809489947379597 11164572898809489947379597	16788736434073684890477284533794887 1164340736884890447284533794887	16078732434596274792378834079578 1211 2 11 4 11 3 3 3 5 7 8	19897224244962274182081834789988 12211111111121182081834789988	1687948608030375884308835090629 111111121 2 1122 6 1112 1121 1121 2 1112 6 1111	17972646206612225787494935308060 11111311211 1 11 5 31 111 111	17789377302228244670287936998200 12998200 120020200	38792239211443432749759419.09999 12113312111655419.09999 21021	3758012041142123975288941944563 12121421221 51 5 2 15 11	39 109477 109477 31188 2572385667 2572385667 10644 1104443 1104443 1104443 1104443 1104443 1104443 1104443 1104443 1104443 1104443 1104443 1104443 1104443 1104443 1104443 11044445 11044445 11044445 11044445 1104445 1104445 1104445 1104445 1104445 1104445 110445 110445 110445 110445 110445 110455 110455 1104555 1104555 11045555 11045555 1104555555 110455555555555555555555555555555555555	$\begin{array}{c} 12 \\ 44 \\ 109 \\ 3186 \\ 106 \\ 760 \\ 312 \\ 852 \\ 085 \\ 120 \\ 852 \\ 120 \\ 852 \\ 080 \\ 94 \\ 176 \\ 97 \\ 4 \\ 10 \\ 10 \\ 10 \\ 10 \\ 10 \\ 10 \\ 10 $	16348013421734805050564948488887539 1212224 1131 1 56494848887539 1 1131 1 51 5 22 19	2 18260097980899458834547684788 112321 180899458834547684788 118 118 118 118 118 118 118 118 118 1	2388390266300878343724757080888 190266300878343724757080888 1008783437247570808888	2370480900309805875283895383848 2111132511 15375283895383848 311132511 15311 13113	1637337939576007947228877005678707 158877071587007	3 11112 11152 11 16 11112 11152 11 16 1777975754827	8392062874897728539578575743735 1111212 11 21 11 15 11 15 1	53 094 2129955628747455557097854805 1222 12 12 12 197854805 1 122 12 12 12 12 197854805	53282948778748580315596446768887 1 21 78748580315596446768887 11222 11 1 1887	44873696507767584477458045873797	4377880758581757433543424959987	17989166159346406192584969683838 . 189166159346406192584969683838 .
AVG 10 HOURS 31	9 31	9 31	9 31	12 31	14 31	$\begin{array}{c} 14\\31 \end{array}$	14 31	$15 \\ 31$	$17\\31$	18 31	21 29	23 30	20 31	16 31	17 31	14 31	15 31	1 4 31	12 31	11 31	$\frac{11}{31}$	12 31	11 31	14 741
TOTAL HOUR NUMBER OF NUMBER OF DATA CAPTU STANDARD D	GOOD MISSI RE (P	ERCE	= 5 5 0 0 7 8 5 7 7 7 7 7 7 7 7 7 7 7 7 7 7 7 7 7	74 74 99 1	1 H) 3 21 .6 M)	IGHES' nd HIU	AVERA(T HOUI GH HOI M REP(RLY VA JRLY V	ALUE	=	14 - 152 141 H 3 2	- 3HR ØVAI HIGHES 2nd HI	ST AVE	RAGE	/ERAGE 01300 110 . 93		-24HR ØV HIGHES 2nd H	LUES	EXCE	SD 36	5			

NOTE: MISSING VALUE INDICATOR IS----

••

*******	*****	*******
+	DATA VALIDATED BY	*
*	ENSR	*
********	7080	*******

										THLY			PORT							 *		-		*
TOODWTON S	വനവം	neem u		V TN				S 02	MI	RANT	POTOM		g/m3)							DAT RUN	A FOR DATE	MAR :04/0	2007 9/07	
HOURS(est)																								
HR-BEG00 HR-END01 DAY	01 02	02 03	03 04	04 05	05 06	06 07	07 08	08 09	09 10	10 11	11 12	12 13	$\begin{array}{c} 13\\ 14 \end{array}$	14 15	15 16	16 17	17 18	18 19	19 20	20 21	21 22	22 23	23 24	AVG
12345678921234567890112345678901123456789011234567890122222222222222233	2758740007894004044607489383449 131111111111 1222	2578847707307602034897257392229 111211111111111111111111111111111	2498821707600495023898255403899 221222122212221222111111111111111111	247976987720119582377060470033300 12111221221111111111111111111111	17579849468425825424628047623963 1221 11211 311111 7113963 1221 11211 3111111	2 6 107524930563830004804742461 1221 12211 31004804742461 1724 1724	2 4283862647648657704864253639865 1121131211 111121 112 11211 1211 11211 1211 11211 1211 11211 1211	2 15493282482156658933001252729835	3 2 1211181211 1 1118254933856 11211181211 1 11111 2 113226	25589565518060 4083400074369488 213221222 1 11121 2115118	4 199818649496499845060070-64466 122221 22211 12106070-64466	16-40098177384163107212239598297773 1221239598297773	2 447 0040629680444737807588884312 111151 1118075888843121 12121	2 48724257306498677744688844796362 111331111 1911 121 11 2121	31279402732744991370028695208042 112431111971121111123212	147734933806739619208807347791900 111111151151111 1151111 1151111 112 112	15 11 131 242 4 112 61 1311 131 242 4 112 131 1311	321449634078158788743883057742279 1231728788743883057742279 1231728788743883057742279	8392418137923864787187927555260 6 112131 21 72 113 2 1113 21 113 113 2	79203399697806927906987047580932 11222 112771 219 23 5932 11 71 219 23 5932	8528327288898012708178214795822 1132 8898012708178214795822 1111215 23 11 111215 11 111215 11 11115 11115 11 1111111111	8097684088894949888972854975920 1132 182498949888972854975920 112 10 11 10 11	8879122279905060866573514798326 121111127122281111	222 1122111121321112111111609675 112211112132111211111112411
AVG 17 HOURS 31	$\frac{13}{31}$	$\begin{array}{c} 15\\31\end{array}$	$\begin{smallmatrix}15\\31\end{smallmatrix}$	17 31	$\frac{19}{31}$	23 31	21 31	19 30	17 31	18 30	16 30	15 30	$\begin{array}{c} 16\\31\end{array}$	18 31	17 31	21 31	$\begin{array}{c} 19\\31 \end{array}$	21 31	17 31	19 31	24 31	$\begin{array}{c} 23\\31 \end{array}$	17 31	18 740
TOTAL HOU NUMBER OF NUMBER OF DATA CAPT STANDARD	GOOD MISSI URE (1	ING HO PERCE	OURS =	744 74(99	20 H1 4 21 5 M1	IGHES' nd HT	сн но	GE RLY V! URLY N ORTED	/ALUE	= 1	18 76 138 1 3	- 3HR ØVAI HIGHES 2nd HI	LUES H St ave	IXCEEI IRAGE	141	; F	24HR ØV HIGHES 2nd H	ST AVE	ING AV Excer Brage St Av(59				

NOTE: MISSING VALUE INDICATOR IS----

*****	*****	* * * * * *
*	DATA VALIDATED BY	*
*	ENSR	*
********	*****	* * * * *

* *

MONTHLY SUMMARY REPORT

MIRANT PO	DTOMAC

			MIRA	NT РОТОМ	AC					 DA	TA FOR	MAR	2007	
LOCATION: SOUTHEAST PENCEI	LINE	W	Ss		(MPH)				RÜ	IN DATE	:04/0	9/07	
HR-BEG00 01 02 03 HR-END01 02 03 04 DAY	04 05 05 06	06 07 0 07 08 0	8 09 1 9 10 1		12 13 13 14	$\begin{smallmatrix}1&4\\1&5\end{smallmatrix}$	15 16 16 17	17 18	18 19	19 20 20 21	21 22	22 23	23 24	AVG
$\begin{array}{c} 1 \\ 2 \\ 13.0 \\ 15.0 \\ 16.4 \\ 17.3 \\ 14.7 \\ 8.3 \\ 12.17 \\ 15.0 \\ 4.3 \\ 12.17 \\ 14.3 \\ 14.7 \\ 13.8 \\ 12.17 \\ 14.3 \\ 12.17 \\ 14.3 \\ 14.7 \\ 14.3 \\ 14.7 \\ 14.3 \\ 14.6 \\ 14.8 \\ 14.7 \\ 15.0 \\ 14.8 \\ 12.17 \\ 14.3 \\ 14.6 \\ 14.8 \\ 14.6 \\ 14.8 \\ 14.6 \\ 14.8 \\ 14.6 \\ 14.8 \\ 14.6 \\ 17.7 \\ 15.1 \\ 15.1 \\ 15.1 \\ 17.8 \\ 14.8 $	3.4.6.9.1 3.9.6.2.7 4.6.8.1 3.5.9.1 3.5.9.1 3.5.3.6.2.3.9 4.6.3.7 3.5.3.6.2.3.9 4.4.3.3.8.3.5 1.6.3.8.7 1.1.8.2.3.8.3.5 1.1.6.4.7.3.7 2.6.1.1 1.6.4.7.3.7 2.6.1.1 1.9.8.3.5.9.5 1.6.4.7.3.7 2.6.4.1.4 1.4.7 3.5.2.8.3.5 1.6.8.5.5 1.6.8.5.5 1.6.8.5.5 1.6.8.5.5 1.6.8.5.5 1.6.8.5.5 1.6.8.5.5 1.6.8.5.5.5.5.5.5.5.5.5.5.5.5.5.5.5.5.5.5	$\begin{array}{c} 17.9 \\ 9.8 \\ 9.6 \\ 10.41 \\ 9.6 \\ 10.57 \\ 5.7 \\ $	4 8 0 1 0	9799939460066097072608058 979087755766116276891008 11111116276891008 11008 1108	39.4 131.4 10.5 12.1 12.3 7.7 12.3 7.1 15.6 16.9 15.7 12.3 15.6 16.9 11.5 12.3 15.7 12.3 15.7 12.3 11.2 17.5 12.3 12.3 12.3 12.3 12.4 17.5 12.5 7.8 12.3 12.3 12.4 17.5 12.5 7.8 12.4 12.3 12.5 7.8 12.4 12.3 12.5 7.8 12.4 12.3 12.5 7.8 12.4 12.3 12.4 12.3 12.5 7.8 12.4 12.3 12.5 12.4 12.4 12.3 12.4 12.3 13.4 12.4 14.4 14.4 14.4 14.4 14.4	10890614916638449976356994 108906829747129244982199 111111111111111111111111111111111	$\begin{array}{c} 1 & 3.9 \\ 8.9 \\ 8.9 \\ 8.9 \\ 8.9 \\ 8.9 \\ 8.9 \\ 12.5 \\ 1.1 \\ 1.2 \\ $	94056046680483315446198 1681531503986315446198 1511503986315446198	7.6911 1970.85279711 19970.85279711 104.696.773951 1111.02.6778207 1111102.6778.98 1111102.6778.98 1551.24	9785966171006937583168384 9785976008152691431588 9597616416937583168384		525517139838293346990197963 566946684568193946990197963 1111111111	74256144505052027470822121289351 1415763658455519409957306555741 10655741	71821376754931829373281228692137 7182137676856593732881228692137 1111176768565931829373281228692137
AVG 7.3 7.0 7.2 7.1 HOURS 31 31 31 31	$ 6.9 6.7 \\ 31 31 $	6.9 7.7 9 31 31	9.1 9.6 9 31 31	9.9 10.5 31 31	11.1 11.1 31 31	11.4 31	$ \begin{array}{ccccccccccccccccccccccccccccccccccc$	9.9 31	9,7 31	8.9 8.6 31 3:		7.9 31	7.8 31	8.9 743
TOTAL HOURS = NUMBER OF GOOD HOURS = NUMBER OF MISSING HOURS= DATA CAPTURE (PERCENT) = STANDARD DEVIATION =	743 HIG 1 2nd 99.9 MIX 4.1	TAL AVERAGE SHEST HOURLY I HIGH HOURI NIMUM REPORT	LY VALUE =	8,9 20,9 19,5 0,8										
NOTE: MISSING VALUE INDI	CHICK ISSUE		*****	*****	*****	*****	******							

~	***************************************	
٠	DATA VALIDATED BY	£
*	ENSB	
٠	***************************************	r

	* * *											
LOCATION: SOUTHEAST FENCELINE	DATA FOR MAR 2007 RUN DATE:04/10/07											
HR-BEGØØ Ø1 02 Ø3 Ø4 Ø5 Ø6 Ø7 HR-ENDØ1 02 Ø3 Ø4 Ø5 Ø6 Ø7 Ø8 DAY	HOURS(EST) 08 09 10 11 12 1 09 10 11 12 13 1	14 15 16 17 18 15 16 17 18 19	19 20 21 22 23 20 21 22 23 24 AVG									
$ \begin{array}{cccccccccccccccccccccccccccccccccccc$	$\begin{array}{cccccccccccccccccccccccccccccccccccc$		$\begin{array}{cccccccccccccccccccccccccccccccccccc$									
AVG 185 191 194 200 184 173 194 170 HOURS 31 31 31 31 31 31 31 31 31		00 196 195 205 205 179 31 31 30 31 31 31	180 171 181 176 196 186 31 31 31 31 31 31 743									
TOTAL HOURS = 744 TOTAL AVERA NUMBER OF GOOD HOURS = 743 HIGHEST HOU NUMBER OF MISSING HOURS = 1 2nd HIGH HO DATA CAPTURE (PERCENT) = 99.9 MINIMUM REP STANDARD DEVIATION = 94	AGE = 186 JRLY VALUE = 359 JURLY VALUE = 356 PORTED VALUE = 2											
NOTE: MISSING VALUE INDICATOR IS												
	*****	* * * * * * * * * * * * * * * * * * * *										

******	*************************************	* *
*	DATA VALIDATED BY	*
*	ENSR	*
********	*******************************	* *

MONTHLY SUMMARY REPORT MIRANT POTOMAC DATA FOR MAR 2007 RUN DATE:04/09/07 SDs (DEG -) LOCATION: SOUTHEAST FENCELINE HOURS(EST) 19 20 20 21 21 22 22 23 23 24 10 11 11 12 12 13 $13 \\ 14$ $17 \\ 18$ $18 \\ 19$ HR-BEG00 HR-END01 DAY 03 04 Ø4 05 06 06 07 07 08 08 09 09 $14 \\ 15$ $\frac{15}{16}$ $\frac{16}{17}$ 01 02 02 03 ĩõ **Ø**5

 9.5
 15.
 4
 13.
 13.
 13.
 14.
 15.
 14.
 15.
 15.
 15.
 15.
 15.
 15.
 15.
 15.
 15.
 15.
 15.
 15.
 15.
 15.
 15.
 15.
 15.
 15.
 15.
 15.
 15.
 15.
 15.
 15.
 15.
 15.
 15.
 15.
 15.
 15.
 15.
 15.
 15.
 15.
 15.
 15.
 15.
 15.
 15.
 15.
 15.
 15.
 15.
 15.
 15.
 15.
 15.
 15.
 15.
 15.
 15.
 15.
 15.
 15.
 15.
 15.
 15.
 15.
 15.
 15.
 15.
 15.
 15.
 15.
 15.
 15.
 15.
 15.
 15.
 15.
 15.
 15.
 15.
 15.
 15.
 15.
 15.
 15.
 15.
 15.
 15.
 15.
 15.
 15.
 15.
 15.
 15.
 15.
 15.
 15.
 15.
 15.
 15.
 15.
 15.
 15.
 15.
 15. AVG 13.6 13.0 26.4 13.4 16.0 24.8 11.1 27.4 12.9 16.2 28.5 17.5 10.6 11.8 34.3 22.6 10.7 12.2 16.9 34.2 9.7 15.5 18.4 18.2 25.1 11.8 17.2 26.4 51.3 20.4 23.1 20.5 21.0 20.5 31 31 31 19.7 743 TOTAL AVERAGE = HIGHEST HOURLY VALUE = 2nd HIGH HOURLY VALUE = MINIMUM REPORTED VALUE= TOTAL HOURS = NUMBER OF GOOD HOURS = NUMBER OF MISSING HOURS = 744 743 1 19.7 = 89.4 88.3 99.9 DATA CAPTURE (PERCENT) = 3.1 STANDARD DEVIATION 16.3 NOTE: MISSING VALUE INDICATOR IS ----

ź

з

6 7

8

9111345678901234567890

31

DATA VALIDATED BY ENSR

.

	 *		*								
LOCATION: SOUTHEAST FENCELINE		DATA FOR MAR 2007 RUN DATE:04/09/07									
	TMP2m	(DEG HOURS(EST)									
HR-BEG00 01 02 03 04 05 HR-END01 02 03 04 05 06 DAY	06 07 08 09 07 08 09 10	$ \begin{array}{cccccccccccccccccccccccccccccccccccc$		18 19 20 19 20 21	21 22 23 22 23 24	AVG					
$ \begin{array}{cccccccccccccccccccccccccccccccccccc$	$\begin{array}{c} 30.4 \\ 21.3 \\ 21.4 \\ 21.3 \\ 21.5 \\ 22.1 \\ 22.1 \\ 23.1 \\ 22.1 \\ 23.1 \\ 22.1 \\ 23.1 \\ 22.1 \\ 23.1 \\ 22.1 \\ 23.1 \\ 23.1 \\ 25.2 \\ 27.6 \\ 29.0 \\ 34.1 \\ 24.2 \\ 27.6 \\ 29.0 \\ 34.1 \\ 24.2 \\ 27.6 \\ 29.0 \\ 34.1 \\ 24.2 \\ 27.6 \\ 29.0 \\ 34.1 \\ 24.2 \\ 27.6 \\ 29.0 \\ 34.1 \\ 24.2 \\ 25.2 \\ 27.6 \\ 29.0 \\ 34.1 \\ 24.2 \\ 25.2 \\ 27.6 \\ 29.0 \\ 34.1 \\ 24.2 \\ 25.2 \\ 27.6 \\ 29.0 \\ 34.1 \\ 24.2 \\ 25.2 \\ 25.2 \\ 25.2 \\ 24.2 \\ 25.2 \\ 24.2 \\ 25.2 \\ 24.2 \\ 25.2 \\ 24.2 \\ 25.2 \\ 24.2 \\ 25.2 \\ 24.2 \\ 25.2 \\ 24.2 \\ 25.2 \\ 24.2 \\ 25.2 \\ 24.2 \\ 25.2 \\ 24.2 \\ 25.2 \\ 24.2 \\ 25.2 \\ 24.2 \\ 25.2 \\ 24.2 \\ 25.2 \\ 24.2 \\ 25.2 \\ 24.2 \\ 25.2 \\ 24.2 \\ 24.2 \\ 25.2 \\ 24.2 \\ 25.2 \\ 24.2 \\ 25.2 \\ 24.2 \\ 25.2 \\ 24.2 \\ 25.2 \\ 24.2 \\ 25.2 \\ 24.2 \\ 25.2 \\ 24.2 \\ 25.2 \\ 24.2 \\ 25.2 \\ 24.2 \\ 25.2 \\ 24.2 \\ 25.2 \\ 24.2 \\ 25.2 \\ 24.2 \\ 25.2 \\ 24.2 \\ 24.2 \\ 25.2 \\ 24.2 \\ 25.2 \\ 24.2 \\ 24.2 \\ 25.2 \\ 24.2 \\ 24.2 \\ 25.2 \\ 24$	34, 47 ,	$\begin{array}{cccccccccccccccccccccccccccccccccccc$	30 50 30 50 30 50 30 50 30 50 30 50 30 50 30 50 30 50 30 50 30 50 30 50 30 50 30 50 30 50 30 50 30 50 30 50 30 50 50 30 50 <td< td=""><td>30.1 327.8 37.5 37.5 37.5 37.2 37.5 37.2 36.8 37.5 37.2 36.8 37.5 37.2 36.8 37.5 37.2 36.8 37.5 37.2 36.8 37.5 37.2 36.8 37.5 37.2 36.8 37.5 37.2 36.8 37.5 37.2 36.8 37.5 37.5 37.2 36.8 37.5 37.5 37.5 37.5 37.5 37.5 37.5 37.5 31.4 31.4 335.9 35.3 35.2 35.2 35.3 35.2 35.2 35.3 35.2 35.2 35.2 35.49 37.5 35.49 37.5 35.2 35.2 35.49 37.5 35.49 37.5 35.49 37.5 35.49 37.5 35.49 37.5 35.49 37.5 35.49 37.5 3</td><td>454332233554565333454565555665555</td></td<>	30.1 327.8 37.5 37.5 37.5 37.2 37.5 37.2 36.8 37.5 37.2 36.8 37.5 37.2 36.8 37.5 37.2 36.8 37.5 37.2 36.8 37.5 37.2 36.8 37.5 37.2 36.8 37.5 37.2 36.8 37.5 37.2 36.8 37.5 37.5 37.2 36.8 37.5 37.5 37.5 37.5 37.5 37.5 37.5 37.5 31.4 31.4 335.9 35.3 35.2 35.2 35.3 35.2 35.2 35.3 35.2 35.2 35.2 35.49 37.5 35.49 37.5 35.2 35.2 35.49 37.5 35.49 37.5 35.49 37.5 35.49 37.5 35.49 37.5 35.49 37.5 35.49 37.5 3	454332233554565333454565555665555					
AVG 45.8 45.0 44.4 43.7 42.8 42.1 HOURS 31 31 31 31 31 31	42.0 42.9 44.6 47.2 31 31 31 31	2 50.0 52.1 54.0 55 1 31 31 31	.7 55.7 55.5 54.8 53.7 5 31 31 30 31 31	2.4 51.1 49.7 4 31 31 31	48.6 47.6 47.0 31 31 31	48. 7 7 4 3					
NUMBER OF GOOD HOURS = 743 H NUMBER OF MISSING HOURS = 1 2	OTAL AVERAGE IGHEST HOURLY VALUE IGH HOURLY VALUE INIMUM REPORTED VALUE	E = 82.0									
NOTE: MISSING VALUE INDICATOR IS											
	******	******	******								

DATA VALIDATED BY * * ******* * * * ******

MONTHLY SUMMARY REPORT

MONTALY SUMMARY REPORT	* *
MIRANT POTOMAC	DATA FOR MAR 2007
LOCATION:SOUTHEAST FENCELINE DT2M (DEGF)	RUN DATE:04/09/07
$\begin{array}{cccccccccccccccccccccccccccccccccccc$	20 21 22 23 21 22 23 24 AVG
$\begin{array}{c} 1.1 \\ -0.5 \\ -0.6 \\ -0.$	$\begin{array}{c} 0.8 \\ 0.11 \\ 0.12 \\ 0.11 \\ 0.13 \\ 0.22 \\ 0.11 \\ 0.22 \\ 0.12 \\ 0.22 \\ 0.12 \\ 0.22 \\ 0.12 \\ 0.22 \\ 0.12 \\ 0.22 \\ 0.12 \\ 0.22 \\ 0.12 \\ 0.22 \\ 0.12 \\ 0.22 \\ 0.12 \\ 0.22 \\ 0.12 \\ 0.22 \\ 0.12 \\ 0.22 \\ 0.12 \\ 0.22 \\ 0.12 \\ 0.22 \\ 0.12 \\ 0.22 \\ 0.12 \\ 0.22 \\ 0.12 \\ 0.22 \\ 0.12 \\ 0.22 \\ 0.12 \\ 0.22 \\ 0.12 \\ 0.22 \\ 0.12 \\ 0.22 \\ 0.23 \\ 0.24 \\ 0.25 \\ 0.23 \\ 0.24 \\ 0.25 \\ 0.23 \\ 0.24 \\ 0.25 \\ 0.23 \\ 0.24 \\ 0.25 \\ 0.23 \\ 0.24 \\ 0.25 \\ 0.23 \\ 0.24 \\ 0.25 \\ 0.23 \\ 0.24 \\ 0.25 \\ 0.23 \\ 0.24 \\ 0.25 \\ 0.23 \\ 0.24 \\ 0.25 \\ 0.23 \\ 0.24 \\ 0.25 \\ 0.23 \\ 0.24 \\ 0.25 \\ 0.23 \\ 0.24 \\ 0.22 \\ 0.23 \\ 0.24 \\ 0.22 \\ 0.23 \\ 0.24 \\ 0.22 \\ 0.23 \\ 0.24 \\ 0.23 \\ 0.24 \\ 0.23 \\ 0.24 \\ 0.23 \\ 0.24 \\ 0.23 \\ 0.24 \\ 0.23 \\ 0.24 \\ 0.23 \\ 0.24 \\ 0.23 \\ 0.24 \\ 0.23 \\ 0.24 \\ 0.23 \\ 0.24 \\ 0.23 \\ 0.24 \\ 0.23 \\ 0.24 \\ 0.23 \\ 0.24 \\ 0.23 \\ 0.24 \\ 0.23 \\ 0.24 \\ 0.23 \\ 0.24 \\ 0.23 \\ 0.24 \\ 0.25 \\ 0.23 \\ 0.24 \\ 0.23 \\ 0.24 \\ 0.23 \\ 0.24 \\ 0.23 \\ 0.24 \\ 0.23 \\ 0.24 \\ 0.23 \\ 0.24 \\ 0.25 \\ 0.23 \\ 0.24 \\ 0.23 \\ 0.24 \\ 0.23 \\ 0.24 \\ 0.25 \\ 0.23 \\ 0.24 \\ 0.23 \\ 0.24 \\ 0.23 \\ 0.24 \\ 0.25 \\ 0.23 \\ 0.24 \\ 0.23 \\ 0.24 \\ 0.23 \\ 0.24 \\ 0.25 \\ 0.23 \\ 0.24 \\ 0.23 \\ 0.24 \\ 0.23 \\ 0.24 \\ 0.23 \\ 0.24 \\ 0.25 \\ 0.23 \\ 0.24 \\ 0.23 \\ 0.24 \\ 0.25 \\ 0.23 \\ 0.24 \\ 0.23 \\ 0.24 \\ 0.25 \\ 0.23 \\ 0.24 \\ 0.24 \\ 0.25 \\ 0.21 \\ 0.24 \\ 0.24 \\ 0.24 \\ 0.25 \\ 0.21 \\ 0.24 \\ 0.24 \\ 0.24 \\ 0.25 \\ 0.21 \\ 0.24 \\ 0.2$
AVG 0.4 0.5 0.5 0.5 0.7 0.8 0.6 0.0 -0.5 -1.1 -1.3 -1.4 -1.4 -1.4 -1.2 -0.9 -0.5 -0.2 0.2 0.4 HOURS 31 31 31 31 31 31 31 31 31 31 31 31 31	$\begin{array}{cccccccccccccccccccccccccccccccccccc$
TOTAL HOURS = 744 TOTAL AVERAGE = -0.1 NUMBER OF GOOD HOURS = 743 HIGHEST HOURLY VALUE = 3.7 NUMBER OF MISSING HOURS= 1 2nd HIGH HOURLY VALUE = 3.0 DATA CAPTURE (PERCENT) = 99.9 MINIMUM REPORTED VALUE= -5.0 STANDARD DEVIATION = 1.2	

NOTE: MISSING VALUE INDICATOR IS----

********	* * * * * * * * * * * * * * * * * * * *	* * *
*	DATA VALIDATED BY	*
*	ENSR	*
*********	* * * * * * * * * * * * * * * * * * * *	* * *

MONTHLY SUMMARY REPORT MIRANT POTOMAC DATA FOR MAR 2007 (MPH) RUN DATE:04/09/07 LOCATION: SOUTHEAST FENCELINE VWS HOURS(EST) 18 19 19 20 20 21 21 22 22 23 23 24 12 $\frac{13}{14}$ $\frac{14}{15}$ $\frac{16}{17}$ $17 \\ 18$ HR-BEG00 01 02 02 03 03 04 05 05 06 07 08 Ø9 10 $\frac{11}{12}$ 15 16 ŏă 10 13 **0**6 **Ø**7 **Ø**8 **Ø**9 11 HR-ENDØ1 AVG 0.5 0.4 0.3 ~0.2 -0.5 ~0.2 -0.1 0.3 0.0 0.0 0.6 0.5 0.4 1.1 1.0 0.7 0.6 0.7 1.0 0.5 0.1 0.3 0.2 0.5 0.4 0.1 0.5 0.2 0.7 Ø.2 Ø.4 Ø.2 -0.1 0.2 0.3 0.7 -0.2 0.2 -0,5 0.0 0.9 Ø.2 Ø.2 Ø.8 0.3 0.2 0.8 Ø.9 0.8 0.7 0.4 0.1 0.0 -0.4 -0.4 -0.2 -0.1 1.0 0.9 1.2 0.9 0.3 0.4 0.7 0.6 0.2 0.6 **0.**6 0.1 0.7 -0.1 0.4 0.0 0.8 0.2 1.2 0.9 0.6 0.8 0.8 0.5 0.1 -0.2 Ø.8 Ø.9 1.2 1.2 0.6 0.6 0.2 -0.1 1.1 0.7 0.4 0.5 0. .4 0.9 0.7 $\frac{1}{0}, \frac{2}{7}$ 0.9 0.7 0.6 1.0 0.5 0.9 0.7 1.3 1.0 1.1 -0.1 0.1 -0.2 0.4 0.2 0.8 1.3 0.0 -0.2 0.0 -0.1 0.0 -0.1 -0.2 ō. š Ø.9 0.8 0.6 0.7 Ø.5 0.6 0.8 0.5 1.1 1.4 0.9 0.2 0.9 1.0 1.0 1.5 0.7 1.1 1.0 1.2 1.0 1.1 0.7 0.8 0.9 ø.8 1.3 0.6 $\frac{1}{0.7}$ 0.9 0.9 1.0 1.5 1.4 1.4 0.9 0.9 0.9 0.6 0.4 0.6 0.1 0.5 0.7 0.8 0.8 1.5 0.7 -0.1 0.4 0.4 õ.õ õ.õ 0.0 0.0 0.2 0.4 0.6 0.7 0.8 0.5 0.4 -0.3 0.3 0.3 0.4 0.5 0.0 0.5 0.1 0.1 0.0 0.0 0.4 0.9 0.3 0.4 0.8 0.0 0.3 0.1 0.0 0.0 0.1 1.1 0.4 -0.3 0.7 ð. Ö -0.1 -0.1 -0.2 0.3 0.4 -0.2 -0.6 -0.5 -0.6 -0.4 -0.8 0.0 0.1 0.1 0.0 0.0 0.0 -0.1 -0.5 0.0 -0.5 0.4 0.3 0.3 0.3 0.1 0.8 0.2 0.0 -0.2 0.4 0.4 0.6 0.3 0.3 0.5 0.7 0.2 0.6 0.9 0.6 0.9 0.4 Ø.5 0.1 0.0 0.4 0.3 0.1 -0.2 0.1 0.2 -0.7 0.1 -0.2 0.1 õ.õ õ.õ 0.0 -0.3 0.0 -0.4 -0.2 -0.1 Ø.1 ----0.0 0.0 0.3 0.10.0 0.0 -0.4 -0.2 2.4 0.7 -0.3 -0.2 -0.3 -0.1 -0.1 -0.3 -0.1 -0.4 -0.2 -0.1 -0.1 -0.2 -0.3 0.0 -0.1 -0.2 0.0 0.1 -0.1 0.1 0.3 -0.2 -0.3 -0.2 0.1 1.2 0.7 -0.4 -0.3 -0.3 0.3 0.5 0.1 -0.5 ð.7 0.0 2.3 0.7 1.4 0.0 2.4 2.4 2.4 2.1 ø.ø 0.0 $1.1 \\ 1.3$ $1.1 \\ 1.3$ 1.8 1.4 -0.3 -0.1 0.1 -0.1 0.0 Ø.1 1.9 -0.1 -0.4 ø.6 Ø.6 1.8 1.0 1.4 Ø.3 1.6 0.4 0.5 1.6 2.5 2.12.7 1.9 1.6 1.6 -0.8 -0.8 0.7 0.7 0.2 0.5 Ø.8 1.1 0.3 0.5 -0.6 1.3 0.4 Ō.6 0.6 0.5 0.6 õ.4 ĩ.Ô 0.6 0.6 õ.3 ō.3 1.0 õ.6 1.0 -0.7 0.7 0.8 -0.7 1.4 0.1 0.4 -0.2 -0.4 ø. š 1.0 1.0 1.0 0.3 0.1 0.2 0.0 0.4 0.3 0.3 0.2 0.3 -1.0 0.0 -0.2 -0.9 -0.9 -0.7 -0.4 -0.9 -0.7 -0.4 -0.1 0.1 1.5 -0.1 0.1 -0.6 0.8 0.7 -0.6 -0.6 0.0 -0.5 -0.1 -0.2 Ø.7 1.0 0.5 -0.8 2.0 0.9 1.3 1.5 1.7 1.4 -0.6 ø.ī 0.7 1.1 0.5 -0.9 0.3 0.8 -0.5 0.4 0.5 -0.9 Ø.5 0.5 0.6 -0.7 0.6 -0.1 0.3 -0.4 -0.1 1.3 1.2 1.6 1.5 - 0.31.8 1.6 1.5 $^{1.4}_{-0.5}$ -0.3 -1.0 -0.9 -0.6 -0.1 -0.6 -0.3 -0.2 ~0.7 -0.3 -0.3 -0.5 -0.3 -0.6 -0 Ø.1 -0.4 0.0 1.2 1.6 2.0 1.2 0.0 1.7 ī.ē Ø.7 0.3 -0.3 -0.2 -0.2 0.0 -0.1 -0.1 -0.1 0.1 0.7 0.0 0.7 1.9 $\frac{1}{0}, \frac{1}{0}$ 1.2 . 2 -0.5 -0. ø.8 0.8 ŏ.0 -0.1 -0.1 0.0 0.0 0.0 0.0 0.6 1.3 1.7 0.5 0.8 1.0 1.0 1.0 1. 0 $1.1 \\ 0.7$ 0.8 1.2 0.8 -0.2 1.7 0.4 1.0 1.0 0.6 -0.2 0.5 0.4 0.3 0.3 00000 00000 00000 -0.5 1.0 $\frac{1}{0}$, $\frac{3}{2}$ 1.2 1.0 0.1 0.8 0.1 -0.1 $^{1.6}_{-0.2}$ 1.0 . 1 0.3 ø :3 -0.1 0.7 2.1 1.7 -0.6 -0.4 0.0 õ.õ -Ø.3 -0.2 -0.4 0.5 0.7 -0.4 0.5 0 Ø.4 2.2 Ø.7 1.3 0.4 0.3 1.0 0.8 1.7 0.5 0.3 0.2 0.1 0.0 2.0 1.8 0.6 Ø. 5 -0.4 0.0 0.0 -0.1 -0.2 -0.1 -0.1 $\begin{array}{c}
 0.1 \\
 2.0
 \end{array}$ 0.7 1.8 1.8 2.1 1.3 Ø.2 2.6 1.4 1.0 0.7 1.5 1.3 $1.6 \\ 1.1$ Ø.3 0.4 1.1 0. . 3 ō. 0.1 -0.1 1.5 0.4 -0.2 1.9 Ø.4 1.2 1.0 0.4 Ø, 8 1.1 . 3 1.4 0.9 0.9 2.2 2.1 2.6 2 . 1 -0.11.5 Ø.6 0.5 1.5 0.2 0.1 õ.ø 0.0 -0.1 -0 0.2 0.4 ō.ŏ 0,3 0.4 0.4 ō.4 0.4 0.3 0.2 0.2 1.5 1.1 0.0 0.2 0.4 0.7 0.9 1.5 1.8 1.8 1.8 1.6 1.7 1.6 1.4 1.3 1.3 0.1 0.0 -0.10.1 0.5 0.5 31 0.6 0.6 0.6 0.6 0.6 0.6 0.5 0.6 0.6 0.5 0.5 0.4 0.4 AVG HOURS $0.3 \\ 31$ 0.3 Ø.3 31 0.3 0.3 31 0.3 0.3 0.5 0.6 0.6 Зĩ 31 31 31 743 31 31 31 31 31 31 ŝĩ. ŝī. <u>31</u> 31 31 31 31 31 31 30 TOTAL AVERAGE HIGHEST HOURLY VALUE 0.5 2.7 744 TOTAL HOURS NUMBER OF GOOD HOURS 743 = 5 2nd HIGH HOURLY VALUE = 2.6 NUMBER OF MISSING HOURS= 1 DATA CAPTURE (PERCENT) = MINIMUM REPORTED VALUE= 99.9 -1.0 STANDARD DEVIATION 0.7 NOTE: MISSING VALUE INDICATOR IS----

DAY

1

2

3

6

7

8

9

11123456789012234567890

31

**********	********************	******
*	DATA VALIDATED BY	*
*	ENSR	*
*********	*****	******

MONTHLY SUMMARY REPORT

MONTHLY SUMMARY REPORT	* *
MIRANT POTOMAC	DATA FOR MAR 2007 RUN DATE:04/09/07
LOCATION: SOUTHEAST FENCELINE SW (%FR)	RUN DATE:04/09/07
HR-BEG00 01 02 03 04 05 06 07 08 09 10 11 12 13 14 15 HR-END01 02 03 04 05 06 07 08 09 10 11 12 13 14 15 HR-END01 02 03 04 05 06 07 08 09 10 11 12 13 14 15 16 DAY	16 17 18 19 20 21 22 23 17 18 19 20 21 22 23 24 AVG
$ \begin{array}{c} 1 \\ 2 \\ 1 \\ 1 \\ 2 \\ 1 \\ 1 \\ 1 \\ 2 \\ 1 \\ 1$	$\begin{array}{c} 1.8 \\ 1.5 \\ 1.0 \\ 1.9 \\ 1.7 \\ 1.5 \\ 1.4 \\ 1.5 \\ 1.7 \\ 1.5 \\ 1.4 \\ 1.5 \\ 1.7 \\ 1.5 \\ 1.7 \\ 1.5 \\ 1.4 \\ 1.7 \\ 1.5 \\ 1.4 \\ 1.7 \\ 1.5 \\ 1.4 \\ 1.7 \\ 1.5 \\ 1.4 \\ 1.7 \\ 1.5 \\ 1.4 \\ 1.7 \\ 1.5 \\ 1.4 \\ 1.7 \\ 1.5 \\ 1.4 \\ 1.7 \\ 1.5 \\ 1.4 \\ 1.7 \\ 1.5 \\ 1.4 \\ 1.7 \\ 1.5 \\ 1.4 \\ 1.7 \\ 1.5 \\ 1.4 \\ 1.7 \\ 1.5 \\ 1.4 \\ 1.7 \\ 1.5 \\ 1.4 \\ 1.7 \\ 1.5 \\ 1.1 \\ 1.7 \\ 1.6 \\ 1.7 \\ 1.6 \\ 1.7 \\ 1.6 \\ 1.7 \\ 1.6 \\ 1.7 \\ 1.6 \\ 1.7 \\ 1.6 \\ 1.7 \\ 1.6 \\ 1.7 \\ 1.6 \\ 1.7 \\ 1.6 \\ 1.7 \\ 1.6 \\$
AVG 0.8 0.7 0.8 0.8 0.7 0.7 0.8 0.9 1.0 1.1 1.2 1.3 1.4 1.5 1.4 1.4 HOURS 31 31 31 31 31 31 31 31 31 31 31 31 31	4 1.3 1.1 0.9 0.9 0.9 0.9 0.8 0.9 1.0 0 31 31 31 31 31 31 31 31 31 743
TOTAL HOURS = 744 TOTAL AVERAGE = 1.0 NUMBER OF GOOD HOURS = 743 HIGHEST HOURLY VALUE = 3.3 NUMBER OF MISSING HOURS= 1 2nd HIGH HOURLY VALUE = 3.0 DATA CAPTURE (PERCENT) = 99.9 MINIMUM REPORTED VALUE= 0.1 STANDARD DEVIATION = 0.6	

NOTE: MISSING VALUE INDICATOR IS----

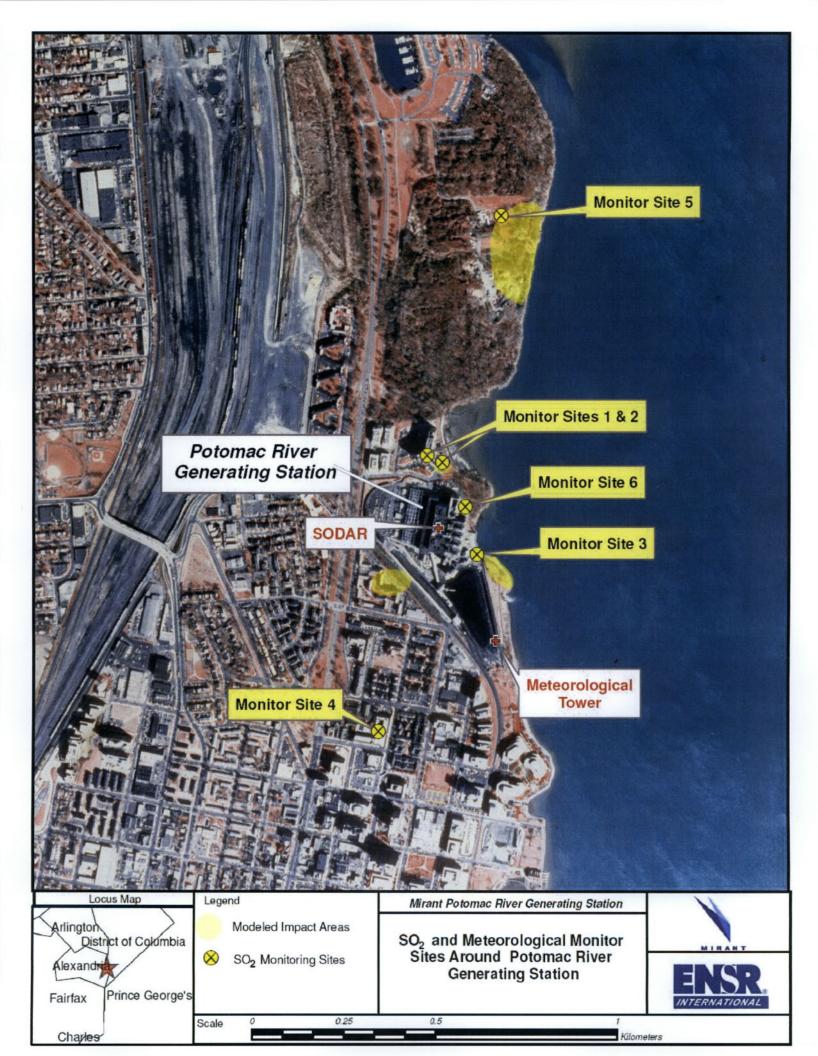
*******	* * * * * * * * * * * * * * * * * * * *	******
*	DATA VALIDATED BY	*
*	ENCD	*
~ ************	7083	* * * * * * * * *

		SUMMARY REPORT		
LOCATION SOUTHEAST FENCELINE	RTMP	POTOMAC (DEGF)	DATA FOR MAR 2007 RUN DATE:04/09/07	
	06 07 08 09 10 07 08 09 10 11	URS(EST) 11 12 13 14 15 12 13 14 15 16	16 17 18 19 20 21 22 23 17 18 19 20 21 22 23 24 AVG	
$\begin{array}{c} 2 \\ 68.4 \\ 69.4 \\ 69.7 \\ 67.8 \\ 67.9 \\ 66.5 \\ 66.8 \\ 66.8 \\ 66.8 \\ 66.8 \\ 66.8 \\ 66.8 \\ 66.8 \\ 66.8 \\ 66.4 \\ 86.6 \\ 66.8 \\ 66.4 \\ 86.6 \\ 66.4 \\ 86.6 \\ 66.4 \\ 86.6 \\ 66.4 \\ 86.6 \\ 66.4 \\ 86.6 \\ 66.4 \\ 86.6 \\ 66.6 \\ 66.8 \\ 66.6 \\ 66.8 \\ 66.6 \\ 66.8 \\ 66.6 \\ 66.8 \\ 66.6 \\ 66.8 \\ 66.6 \\ 66.8 $	$\begin{array}{c} 53.1 \\ 64$	66.5 67.6 68.2 70.2 70.7 64.5 64.8 64.9 64.7 64.7 64.4 67.3 69.8 69.7 64.7 64.5 64.7 68.9 68.6 68.7 64.4 69.3 69.7 64.7 68.9 68.8 68.2 69.3 69.7 73.4 69.2 68.9 70.4 71.9 73.4 69.2 69.3 69.7 73.4 69.3 69.3 69.7 71.9 71.6 73.4 70.3 69.1 71.2 71.9 71.6 70.3 69.1 72.1 72.1 71.6 70.3 72.1 72.1 71.6 66.5 66.5 66.1 66.1 65.7 69.7 69.3 70.2 70.2 72.6 74.4 70.2 69.7 70.3 72.6 74.9 69.5 70.0 72.1 73.3 73.3 73.3 69.5 70.7 74.1 74.9 73.3		
TOTAL HOURS = 744 TO NUMBER OF GOOD HOURS = 743 HI NUMBER OF MISSING HOURS = 1 200	TAL AVERAGE - 6 GHEST HOURLY VALUE - 7 d HIGH HOURLY VALUE - 7	8.4 4.5 4.4 2.9		
NOTE: MISSING VALUE INDICATOR IS				
		*********************	* * * * *	

*********	*******
* DATA VALIDATED BY	*
* ENSR	*
*********	* * * * * * * * * * *

Appendix F

Satellite View of the Ambient Air Quality and Meteorological Network



U.S. Locations

AK, Anchorage (907) 561-5700

AL, Birmingham (205) 980-0054

AL, Florence (256) 767-1210

CA, Alameda (510) 748-6700

CA, Camarillo (805) 388-3775

CA, Orange (714) 973-9740

CA, Sacramento (916) 362-7100

CO, Ft. Collins (970) 493-8878

CO, Ft. Collins Tox Lab. (970) 416-0916

CT, Stamford (203) 323-6620

CT, Willington (860) 429-5323

FL, St. Petersburg (727) 577-5430

FL, Tallahassee (850) 385-5006

GA, Norcross (770) 381-1836

IL, Chicago (630) 836-1700

IL, Collinsville (618) 344-1545

LA, Baton Rouge (225) 751-3012

MA, Harvard Air Lab. (978) 772-2345 MA, Sagamore Beach (508) 888-3900

MA, Westford (978) 589-3000

MA, Woods Hole (508) 457-7900

MD, Columbia (410) 884-9280

ME, Portland (207) 773-9501

MI, Detroit (269) 385-4245

MN, Minneapolis (952) 924-0117

NC, Charlotte (704) 529-1755

NC, Raleigh (919) 872-6600

NH, Belmont (603) 524-8866

NJ, Piscataway (732) 981-0200

NY, Albany (518) 453-6444

NY, Rochester (585) 381-2210

NY, Syracuse (315) 432-0506

NY, Syracuse Air Lab. (315) 432-0506

OH, Cincinnati (513) 772-7800

PA, Langhorne (215) 757-4900

PA, Pittsburgh (412) 261-2910

RI, Providence (401) 274-5685

SC, Columbia (803) 216-0003 TX, Dallas (972) 509-2250

TX, Houston (713) 520-9900

TX, San Antonio (210) 296-2125

VA, Chesapeake (757) 312-0063

VA, Glen Allen (804) 290-7920

WA, Redmond (425) 881-7700

WI, Milwaukee (262) 523-2040

Headquarters MA, Westford (978) 589-3000

Worldwide Locations

Azerbaijan Belgium Bolivia Brazil China England France Germany Ireland Italy Japan Malaysia Netherlands Philippines Scotland Singapore Thailand Turkey Venezuela

www.ensr.aecom.com

About ENSR

ENSR, an AECOM company, is a leading worldwide environmental services firm. Founded in 1968, ENSR serves industrial companies and government agencies with consulting, engineering, remediation, and environmental health and safety solutions. ENSR is a recipient of the BP HSSE Diamond Award, Textron Environmental Remediation Partner in Excellence Award, and Environmental Business Journal awards. As an AECOM company, ENSR is part of a global design and management company with 24,000 employees worldwide serving the transportation, facilities, and environmental markets

ENSR Locations

Azerbaijan

Belgium

Bolivia

Brazil

England

France

Ireland

italy

Japan

Malaysia

Netherlands

Philippines

Germany

Alabama Alaska California Colorado Connecticut Florida Georgia Illinois Louisiana Maine Maryland Massachusetts Michigan Minnesota New Hampshire New Jersey New York North Carolina Ohio Pennsylvania Rhode Island South Carolina Texas Virginia Massachusetts

Singapore Thailand Turkey Venezuela Headquarters Westford