

Comprehensive Legacy Management and Institutional Controls Plan, Revision 13, Draft		
Significant Changes Summary		
Section	Description of Modification	Drive/Technical Information
<i>Website links were updated throughout document and are not itemized below.</i>		
Volume I, Legacy Management Plan		
Executive Summary	Minor changes to clarify CERCLA Institutional Controls.	The fourth and fifth CERCLA five-year reviews clarified the CERCLA Institutional Controls.
	Incorporated variance 2020-01 pertaining to revisions of the document utilizing the variance process and a complete review every five years.	Variance 2020-01
Section 1.0	In Section 1.1, Purpose and Organization of the LMICP, incorporated variance 2020-01 pertaining to revisions of the document utilizing the variance process and a complete review every five years. Updated the information pertaining to the latest CERCLA Five Year Review Report in 2021.	Variance 2020-01
	Updated information pertaining to the latest CERCLA Five Year Report being completed in 2021 and the next review to be completed in 2021 in Section 1.1, Purpose and Organization.	
	In Section 1.2, Purpose of Legacy Management, removed specific DOE orders and provided link to obtain the most up to date list. Also added information to indicate that DOE will review federal requirements to determine their applicability at the site.	
Section 2.0	Updated information in Section 2.4.2, Restored Areas, including the acreage for each area displayed in Figure 2. The onsite workspaces for site field personnel were also added.	
	Updated Figure 3, Uncertified Areas and Subgrade Utility Corridors, with the onsite workspaces.	
Section 3.0	Minor editorial changes and incorporation of variance 2020-01 in Section 3.0 to clarify the Institutional Control Plan (Volume II) will be reviewed annually, but not necessarily updated.	Variance 2020-01

Volume I, Legacy Management Plan (Continued)		
Section 3.0 (Continued)	Added a paragraph to Section 3.0 concerning the Natural Resources Management Plan which was developed in 2020 and is incorporated as Appendix A of Volume I.	
Section 4.0	Edits made to the first paragraph of Section 4.3, Role of Regulators, to clarify that Volume II, the Institutional Control Plan, contains the CERCLA Institutional Controls as well as other requirements.	
	Updated the reference to the current CERCLA Five-Year Review Report in Section 4.4, CERCLA Five-Year Reviews.	
Section 5.0	Added a sentence to Section 5.0, Records Management, stating that DOE maintains records in accordance with National Archives and Records Administration requirements.	
	Updated current webpage for Administrative Records and LM's Geospatial Environmental Mapping System, Section 5.4, Public Access Requirements.	
Section 6.0	No changes.	
Section 7.0	Updated references.	
Appendix A	Added Appendix A, Natural Resources Management Plan	
Volume II, Institutional Control Plan		
Executive Summary	Incorporated variance 2020-01 pertaining to revisions of the document utilizing the variance process and a complete review every five years.	Variance 2020-01
Section 1.0	Updated acreages for Land Use Types in Figure 1, Fernald Preserve Land Use.	
	In Section 1.1, Purpose and Organization of the LMICP, incorporated variance 2020-01 pertaining to revisions of the document utilizing the variance process and a complete review every five years. Also, updated the information with the next CERCLA Five -Year Review Report to be completed in 2026.	
	Updated Section 1.3, Definition and Purpose of Institutional Controls, to include updated EPA institutional control references.	

Volume II, Institutional Control Plan (Continued)		
Section 1.0 (Continued)	Section 1.4, Types of Institutional Controls, was changed to Section 1.4, Types of Institutional Controls and Other Measures. The four CERCLA Institutional Controls were added to the section along with other minor updates.	The fourth and fifth CERCLA five-year reviews clarified the CERCLA Institutional Controls.
	Incorporated variance 2020-01 pertaining to revisions of the document utilizing the variance process and a complete review every five years in Section 1.6, Updates to the Institutional Control Plan.	Variance 2020-01
Section 2.0	Updated Figure 2, Prohibited Activities and Items.	Variance 2020-02
	Removed primary and secondary points of contact, Appendix C, because contacts are on fence signs and in Attachment E, Community Involvement Plan.	
	Clarified that the risk calculation assumptions are reviewed during each CERCLA five-year review in Section 2.1.1. Proprietary Controls and Points of Contact.	
	Updated the most recent CERCLA Five-Year Review Report from 2016 to 2021 to Section 2.1.2, Governmental Controls.	
	Incorporated the on-site workspaces project into the list of facilities remaining onsite to Section 2.1.3.1, Informational Devices.	
	Removed unhoused extraction wells and added the electrical substation located along Willey Road to those items listed as having fences that remain locked in Section 2.1.3.2, Security of Site Facilities and Infrastructure.	
	Updated Figure 5, Fernald Preserve Site Configuration with onsite workspaces and other minor changes.	
	Clarified terminology between CERCLA Institutional Controls and controls in Section 2.2, OSDF.	The fourth and fifth CERCLA five-year reviews clarified the CERCLA Institutional Controls.

Volume II, Institutional Control Plan (Continued)		
Section 3.0	Added information from the Fifth CERCLA Five-Year Review Report pertaining to the risk calculations to Section 3.0, Controls to minimize Human and Environmental Exposure to Residual Contaminants.	
	Updated Table 3 to incorporate changes resulting from the new NPDES permit which removed monitoring in the former storm sewer outfall ditch and no longer requires and stormwater pollution plan. This plan has been replaced with the Construction Storm Water Pollution Plan required by the Clean Water Act.	
	Incorporated information pertaining to additional field walkdowns following prescribed burns in Section 3.2.	Variance 2020-03
	Incorporated information pertaining to changes in the collection and reporting of site and OSDF inspection photographs. These changes were proposed Appendix C of the 2021 Site Environmental Report.	
	Incorporated requirement to GPS debris locations and changes to site inspection reporting to Section 3.2.	Variance 2022-01
	Updated Figure 8, Uncertified Areas and Subgrade Utility Corridors with the onsite workspaces.	
	Clarified terminology between CERCLA institutional controls and controls in Section 3.5, On-Site Disposal Facility and Table 4, Controls to Minimize Human and Environmental Exposure to Residual Contaminants at the On-Site Disposal Facility.	The fourth and fifth CERCLA five-year reviews clarified the CERCLA Institutional Controls.
	Updated Section 3.5.1, OSDF Inspection and Maintenance to update the most recent CERCLA Five-Year Review Report and updated the history associated with the OSDF prescribed burns.	
Section 4.0	No significant changes.	
Section 5.0	Added Section 5.0 which had been previously contained in the LMICP as the IEMP, Appendix A, Natural Resources Monitoring Plan	
Section 6.0	Updated information available online or by contacting site personnel in Section 6.1, Information Management.	
	Updated Section 6.1.3, Reporting, with information pertaining to the next CERCLA Five-Year Review, which will begin in 2025.	
	Move text in Section 6.2.1, Current Public Involvement via Groups and Organization, to Attachment E, Public Involvement Plan.	
Section 7.0	Updated References.	
Appendix A	No changes.	
Appendix B	No significant changes.	

Volume II, Institutional Control Plan (Continued)		
Appendix C	Deleted Appendix C, Fernald Preserve Contact Information.	Information is provided in Attachment E, Community Involvement Plan.
Appendix D	Deleted Appendix D, Examples of OSDF and Fernald Preserve Inspection Forms.	Forms were removed in an effort to streamline content.
Volume II, Attachment A – Operations and Maintenance Master Plan		
Section 1.0	Updated Section 1.2, Basis and Need, to incorporate information pertaining to the backwash basin refurbishment.	
Section 2.0	Update Section 2.1, Discharge Limits, 2.1.2, NPDES Permit, and Section 3.6.1, NPDES Monitoring, to incorporate the most current NPDES permit which became effective on June 1, 2022.	
	Revised text in Section 2.2.3, OSDF Leachate to remove the statement that CAWWT operations will end in 2035.	
Section 3.0	Updated the year when pump-and-treat activities are predicted to be necessary from 2035 to 2045.	
	Added two paragraphs providing updated information on the aging well infrastructure (RW-3) and the resulting preliminary groundwater modeling results to replace extraction wells RW-6 and RW-7).	
	Updated Figure 2, Aquifer Restoration and Wastewater Treatment Timeline, with the completion of the CAWWT Backwash Basin and updated end dates for the various pump and treat modules.	
	Removed the paragraph concerning when a new extraction well is put into operation and the requirement to add additional wells be installed to help monitor the aquifer on a more frequent basis prior to startup.	Additional monitoring no longer necessary.
	Updated Figure 7, Percent Treated and Average Monthly Uranium Discharge Concentration versus Time (January 2004 through December 2021).	
	Added a paragraph to Section 3.4.2, CAWWT Backwash Basin to provide information on the refurbishment that occurred in 2019.	
Section 4.0	Revised Section 4.2, OSDF Leachate, with updated leachate volumes.	
	Updated Section 4.3, Other Flows, with updated flow volumes.	

Volume II, Attachment A – Operations and Maintenance Master Plan (Continued)		
Section 5.0	No significant changes.	
Section 6.0	Added a paragraph concerning small-scale test of peracetic acid in place of liquid acid descaler to Section 6.4, Regulatory Issues.	
	Updated Figure 8, Monthly Average Concentration in the Effluent to the Great Miami River through December 2021.	
Section 7.0	No significant changes.	
Section 8.0	Updated References.	
Volume II, Attachment B- On-Site Disposal Facility Post-Closure Care and Inspection Plan		
Section 1.0	No significant changes.	
Section 2.0	No significant changes.	
Section 3.0	Added information concerning aerial surveys to support the CERCLA five-year review to Section 3.3, OSDF As-Built.	Variance 2021-01
	Updated OSDF quarterly inspection photographs reporting mechanisms in Table 5 in Section 3.5.	OSDF quarterly inspection photographs will now be reported in the annual Site Environmental Report.
Section 4.0	Added a paragraph to Section 4.1, Introduction, clarifying the CERCLA institutional controls listed in Table 6, Institutional Controls as Key Components in the RODs.	
	Updated the mailing address for both LM and Site Contractor in Table 7, Points of Contact.	
	Added information clarifying that Figure 2, OSDF Fence signs are posted on the chain link fences with the international symbol for the presence of radioactive material.	
Section 5.0	No changes.	
Section 6.0	Added the requirement for post-burn walkdowns of the OSDF to Section 6.2.1.1, Frequency and Timing of Inspections.	Variance 2020-03.
	Throughout Section 6.0, Routine Scheduled Inspections, clarified that the inspections being discussed are not "site inspections", but are inspections of the OSDF facility. Site inspections are addressed in Volume II.	
Section 7.0	Throughout Section 7.0, Unscheduled Inspections, clarified that the inspections being discussed are not "site inspections", but are inspections of the OSDF facility. Site inspections are addressed in Volume II.	

Volume II, Attachment B- On-Site Disposal Facility Post-Closure Care and Inspection Plan (Continued)		
Section 8.0	Throughout Section 8.0, Custodial Maintenance and Contingency Repair, clarified that the conditions being discussed are not "site conditions", but are OSDF facility conditions.	
	Added discussion concerning the prescribed burn planning of the OSDF vegetated cap.	
Section 9.0	No changes.	
Section 10.0	No changes.	
Section 11.0	Updated information pertaining to the next CERCLA Five-Year Review beginning in 2025 and finalized in 2026.	
Section 12.0	Updated references.	
Volume II, Attachment C – Groundwater/Leachate Management Plan		
Section 1.0	No significant changes.	
Section 2.0	No changes.	
Section 3.0	In Section 3.2.2, Leachate Monitoring Compliance Strategy, updated information related to calculating LDS flow rates based on tank pump outs as the LDS continues to dry up.	Variance 2020-06
Section 4.0	In Section 4.4.2.1, Flow Monitoring in the LCS and LDS, updated information pertaining to flow monitoring as the OSDF cells continue to dry up.	Variance 2020-05
Section 5.0	No significant changes.	
Section 6.0	No changes.	
Section 7.0	Updated references.	
Appendix A	No changes.	
Appendix B	No significant changes.	
Appendix C	No significant changes.	
Appendix D	No significant changes.	
Appendix E	No significant changes.	

Volume II, Attachment D – Integrated Environmental Monitoring Plan		
Section 1.0	Removed Appendix A, Natural Resources Monitoring Plan. An updated Natural Resources Management Plan was added as Appendix A of Volume I. Requirements pertaining to natural resources were moved to Volume II.	
Section 2.0	Updated Figure 1, Uncertified Areas and Subgrade Utility Corridors, and Figure 2, Fernald Preserve Site Configuration to include the onsite workspaces.	
Section 3.0	Updated Figure 4, Monitoring Well Data and Maximum Total Uranium Plume through second half of 2021 with current data.	
	Updated Table 3, Groundwater FRL Exceedances based on Samples and Location Since IEMP Inception (August 1997 through 2021).	
	Removed private wells 13 and 14 from Table 5, List of IEMP Groundwater Monitoring Wells and Table 7, List of Groundwater Wells to be Sampled for Total Uranium Only. Added text to provide information on these two wells to Section 3.6.1.1, Total Uranium Monitoring.	
Section 4.0	Updated text, several tables and several figures to incorporate the new NPDES permit and reduction of several surface water locations.	
	Updated Table 12, Summary of Surface Water and Treated Effluent Sampling Requirements by Location, and Table 13, Surface Water Analytical Requirements for Constituents at specific sample locations, to incorporate changes to the new NPDES permit, and proposed surface water reductions presented in the 2021 Site Environmental Report.	
	Updated Section 4.3.2.8, Address Concerns of the Community, to incorporate the surface water reductions proposed in the 2021 Site Environmental Report.	
Section 5.0	No significant changes.	
Section 6.0	No significant changes.	
Section 7.0	Updated references.	
Appendix A	Removed Appendix A, Natural Resources Monitoring Plan. An updated Natural Resources Management Plan was added as Appendix A of Volume I. Requirements pertaining to natural resources were moved to Volume II.	

Volume II, Attachment E – Community Involvement Plan		
Section 1.0	No significant changes.	
Section 2.0	No changes.	
Section 3.0	No changes.	
Section 4.0	Updated Section 4.0, Community Profile, with current population information for the surrounding area.	
	Rearranged and updated information presented in Section 4.1, History of Community Involvement.	
	Added a paragraph concerning the closure of the Visitors Center in response to the COVID-19 pandemic.	
Section 5.0	Moved text from Volume II to become Section 5.1, Ongoing Decisions and Public Involvement.	
	Clarified that the public meeting presents results of the Site Environmental Report to Section 5.1.1, Public Meetings.	
	Clarified that there have been no briefings for local, state, and federal elected officials since closure of the site, in Section 5.1.2, Briefings for Local, State, and Federal Elected Officials.	
	Edited Table 1, Matrix of Public Participation Activities to clarify the results of the Site Environmental Report are discussed at the annual public meeting; briefings for elected officials are conducted, if required; education and information function of the facility is not a CERCLA Institutional Control; added the website for the online form for presentations and tours, removed Public Outreach Presentations and combined with Site Tours, Programs, and Outreach Presentations.	
	Added a sentence to Section 5.2.3, Meetings with Citizens Groups, concerning the Fernald Community Alliance meeting at the site six times per year and encourages area stakeholders to attend.	
	Provided a paragraph for historical purposes concerning the closure of the Visitors Center during the COVID-19 pandemic in Section 5.2, Visitors Center.	
	Provided email address and phone number for the public to request to be added to the mailing list to Section 5.12, Mailing Lists.	
Section 6.0	Updated References.	
Appendix A	Updated Contact List; additional changes to elected officials in the contact list will be made to the final document to reflect the 2022 election results.	Variances 2020-07, 2021-02, and 2022-02