



U.S. DEPARTMENT OF
ENERGY

OFFICE OF
**ENVIRONMENTAL
MANAGEMENT**



2016 Compliance Order on Consent Progress Update

Doug Hintze
Manager

Environmental Management Los Alamos Field Office
August 15, 2018



ENVIRONMENTAL MANAGEMENT
SAFETY ♦ PERFORMANCE ♦ CLEANUP ♦ CLOSURE



- **Consent Order Process**
- **Campaign Approach**
- **Appendix C: Consent Order Campaigns**
- **Appendix B: FY 2018 Enforceable Milestones**
- **Appendix B: FY 2019 Enforceable Milestones**





- **Appendix A: Solid Waste Management Unit/Area of Concern List**
- **Appendix C: Future Campaigns**
- **Appendix B: Milestones and Targets**
- **Process for updating Appendix B**
 - Current FY, FY+1, & FY+2, with milestones and targets
 - Updated annually
 - Review includes changed conditions, priorities, & funding
 - Revised Appendix B posted on NMED's website
 - Public meeting held to present changes to Appendix B
- **Dynamic process allows for revision during the year due to upward or downward adjustments in funding**





- **EM-LA Lifecycle Cost Estimate (LCE) is based on a campaign approach**
 - **LCE is integrated with the 2016 Consent Order**
 - 17 Soil and Water campaigns identified in Appendix C
 - **Legacy waste is a standalone campaign driven by DOE radiological authority (rather than the Consent Order)**
- **Campaigns are worked in the prioritized order listed in Appendix C**
- **Multiple campaigns underway simultaneously**
- **Safe, efficient and transparent execution**





Appendix C: Consent Order Campaigns

Item #	Campaign Title	SWMUs/AOCs	Estimated Completion	Estimated Cost (M)
1	Chromium Interim Measure	1	2020 – 2022	\$38.9 - \$50.6
2	Historic Properties Completion	84	2019 – 2020	\$5.3 - \$6.4
3	Royal Demolition Explosives (RDX) Characterization	2	2022 – 2024	\$1.6 - \$2.1
4	Supplemental Investigations Reports	222	2019 – 2019	\$0 - \$1.0
5	TA-21 D&D and Cleanup	41	2020 – 2022	\$45.8 - \$54.9
6	RDX Remedy	0	2024 – 2025	\$22.3 - \$26.8
7	Known Cleanup Sites	20	2027 - 2028	\$34.8 - \$41.8
8	Material Disposal Area (MDAs) A & T Remedy	30	2028 – 2031	\$92.1 - \$124.3
9	Chromium Final Remedy	0	2026 – 2028	\$100.3 - \$130.0
10	Southern External Boundary	60	2025 – 2026	\$10.0 - \$12.0
11	MDA C Remedy	1	2024 – 2026	\$34.6 - \$48.7
12	Sandia Canyon Watershed	49	2024 – 2025	\$6.3 - \$7.6
13	Pajarito Watershed	167	2028 – 2030	\$20.7 - \$24.9
14	Upper Water Watershed	253	2030 – 2031	\$33.5 - \$40.2
15	MDA AB Remedy	12	2027 – 2030	\$41.8 - \$50.2
16	MDA H Remedy	1	2029 – 2030	\$15.3 - \$18.3
17	MDA G & L Remedy / D&D	12	2035 – 2040	\$237.9 - \$356.9

Highlighted rows indicate campaigns currently underway





Appendix B: FY 2018 Enforceable Milestones

Campaign	Consent Order Milestone	Target Date	Forecast	Actual (M/NM)
Chromium IM & Characterization	Technical Report Package for Chromium Plume Center Characteristics	Mar 30, 2018	Mar 28, 2018	Met
Chromium IM & Characterization	Letter Report to NMED-HWB documenting integrated operation of Chromium Extraction Well 4 (CrEX-4) into the existing IM System	Mar 30, 2018	Mar 22, 2018	Met
Chromium IM & Characterization	Summary Report (Completion or Progress) Phase I Pilot Amendment Test Results	Jul 31, 2018	Jul 31, 2018	Met
Chromium IM & Characterization	Phase II Pilot Amendment Test Work Plan	Sep 28, 2018	Sep 28, 2018	
Chromium IM & Characterization	Annual Progress Report on Chromium Plume Control IM Performance	Sep 28, 2018	Sep 28, 2018	
RDX Characterization	Technical Report Package related to Deep Groundwater Investigation	Mar 30, 2018	Mar 30, 2018	Met
RDX Characterization	R-69 Field Completion	Sep 28, 2018	Sep 28, 2018	
RDX Characterization	First Annual Long-Term Monitoring Report following completion of Surface CMI and approval of Long-Term Monitoring Plan	Sep 28, 2018	Sep 28, 2018	



Campaign	Consent Order Milestone	Target Date	Forecast	Actual (M/NM)
Historical Properties Upper LA Canyon	Upper LA Canyon Phase II IR Submitted to NMED	Sept 28, 2018	Sept 28, 2018	
Historical Properties Middle LA Canyon	Middle LA Canyon Phase II IR Submitted to NMED	Sept 28, 2018	Sept 28, 2018	
TA-21 D&D and Cleanup	Investigation Report for DP sites Aggregate Area at DP East at TA-21	Jun 29, 2018	Jun 29, 2018	Met
Known Cleanup Sites	Field Completion for Aggregate Area Known Cleanup Sites	Sep 28, 2018	Sep 28, 2018	
Sandia Canyon Watershed	Sandia Canyon Wetland Performance Report for Period April 2017-December 2017	Apr 30, 2018	Apr 30, 2018	Met
N/A	Annual Monitoring Report for the completed FY17 and Plan for the upcoming FY18 LA/Pueblo Watershed Sediment Transport Mitigation Project	Apr 30, 2018	Apr 28, 2018	Met
N/A	Annual Update to the Interim Facility-Wide Groundwater Monitoring Plan	May 30, 2018	May 30, 2018	Met





U.S. DEPARTMENT OF
ENERGY

OFFICE OF
ENVIRONMENTAL
MANAGEMENT

Appendix B: FY 2019 Enforceable Milestones

- **FY 2019 enforceable milestones are under development**
- **Public meeting scheduled for November in Los Alamos**



ENVIRONMENTAL MANAGEMENT
SAFETY ♦ PERFORMANCE ♦ CLEANUP ♦ CLOSURE