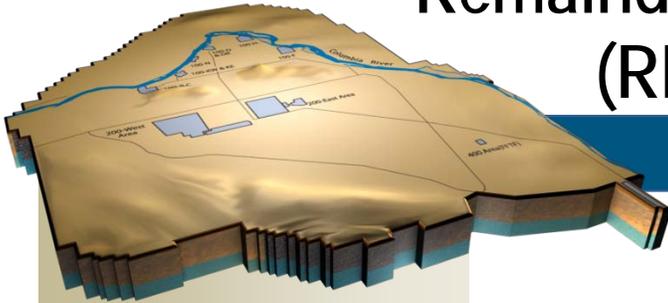


Section E Nuclear Facility D&D, Remainder of Hanford (RL-0040)

Monthly Performance Report



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Deliverable C.3.1.3.1 - 1



2902W Water Tower Demolition



284W Stacks Demolition

PROJECT SUMMARY

American Recovery and Reinvestment Act (ARRA)

Completed the final surveys for 224U and 224UA

Upper Arid Lands Ecology (ALE) closeout paperwork and power pole removal continued.

Efforts continue at U Canyon in preparation of grouting activities. The on-site grout batch plant installation and start-up is proceeding. Mobilization of grout pumps and installation of grout conveyance systems has commenced. Core drilling of penetration for grout placement continues.

The 209E facility continued with characterization including visual inspection of tanks. Continued nondestructive assay (NDA) activities on tanks and pipes within the facility. Continued preparation activities and equipment removal of HO-200 for dismantling. Completed demolition of 2701EC Guard Shack and 209EA Storage Pad. Completed filling and NDA of three standard waste boxes (SWBs).

Continued with mobilization for demolition of 284E demolition. Completed demolition preparation for the explosive demolition of the 284E Bag Houses, Stacks, and the 2902E Water Tower.

Cold and dark and characterization activities continued in 200 West structures. Completed the explosive demolition of the 284W Bag Houses, Stacks, and 2902W Water Tower.

Cleanup of North Slope debris pile sites continued; continued cleanup of 106 and No Potential to Cause Effect (NPCE) debris sites.

The contract for the lift and haul of the railcars was awarded. Preparing (fixing, draining/solidification of the water) of the railcars for shipment to the Environmental Restoration Disposal Facility (ERDF) and B Reactor was initiated. The Shipping Evaluation Checklists and Tiedown calculations have been initiated and the first set was submitted to RL.

Remediation activities continued in the Outer Zone at BC Control area, CW-3 waste sites, and Model Group (MG)-1 waste sites. BC Control Area removed approximately 19,000 tons of soil in February; approximately 140 acres of BC Control Area, Zone A, have been cleared. Backfill continues for 216-N-4 and 216-N-6 with anticipated completion of backfill in early March. Backfill was completed for waste site 600-36.

Sampling/surveys have been completed on 18 MG-1 sites.

Base

Planned surveillance and maintenance (S&M) activities continue. Initial beryllium characterization sampling continues at REDOX, 231Z, and 222T.

CW-3 pipeline 600-286-PL and 600-287-PL excavations are complete with backfill activities in process. Backfill is anticipated to complete in early March.

MG-1 completed backfill of waste sites 600-38 and 600-222.

EMS Objectives and Target Status

Objective #	Objective	Target	Due Date	Status
10-EMS-D&D-OB2-T2	Mitigate spill impacts	1) Develop spill management tools for routine activities (building demolition and S&M)	03/31/10	Complete
		2) Evaluate the need for lower tier project procedures to implement the PRC spill response procedure	04/30/10	Complete
		3) Develop and provide awareness, prevention, response and mitigation training to >85 percent of project personnel as related to spill response	05/30/10	Complete
		4) Review and validate pre-designations for commonly used chemicals at the facility	06/30/10	Complete
		5) Incorporate new spill requirements into applicable procedures/work packages based upon issuance of spill response procedure	04/30/10	Complete
		6) Evaluate the need for a system to pre-designate new chemicals	06/30/10	Complete

TARGET ZERO PERFORMANCE

	CM Quantity	Rolling 12 Month	Comment
Days Away, Restricted or Transferred	0	4	N/A
Total Recordable Injuries	1	9	<p>02/24 North Slope Sealaska employee was walking through an area where trees were being trimmed. Worker was wearing a hard hat, but was struck in the head by a tree limb felled by another employee. Worker developed a headache and was transported to AMH. The diagnosis from AMH was head and cervical contusion. AMH then decided the worker should be evaluated at Kadlec Medical Center. The worker was transported by ambulance to Kadlec Medical Center. The worker was given three prescriptions making this case a recordable injury. (21770)</p>
First Aid Cases	9	74	<p>02/01 284W Electrician tripped on a rock when exiting a portable toilet. (21708)</p> <p>02/03 Two 284E D&D workers reported they had sore throats from working around dust and draining oil. (21712 and 21711)</p> <p>02/08 Teamster was sitting at a table during a pre-job. At the end of the pre-job, worker stood and walked about 20', felt a sharp pain in his left hamstring. (21717)</p> <p>02/11 200W Tool Crib Attendant reported on 02/07 that while sweeping the floor in the tool crib the worker reportedly developed a bronchial condition from the dust on that date. (21724)</p> <p>02/16 North Slope D&D worker was struck in the face by a branch. (21758)</p> <p>02/21 284E Electrician reported performing heavy lifting all week. On 02/24, worker reported sore back to FWS. (21773)</p> <p>02/22 D&D worker reported on 02/23 that due to wind caused bilateral eye conjunctivitis. (21768)</p> <p>02/28 200W Tool Crib Attendant pinched right index finger while opening a Connex door. The worker was wearing appropriate PPE (gloves) at the time of the injury. (21785)</p>
Near-Misses	0	0	N/A

KEY ACCOMPLISHMENTS

ARRA – U PLANT/OTHER D&D

- U Plant Regional Closure Zone (U Ancillary Facilities D&D)
 - Completed site surveys, equipment decontamination, and site stabilization
- U Canyon Demolition and Cell 30 Disposition
 - Installation and start-up of the on-site grout batch plant is proceeding. Core drilling activities continued. Grout conveyance systems installation and grout pump mobilization commenced.
- 200E Project
 - Completed explosive demolition preparation for 284E Bag Houses and Stacks
 - Completed explosive demolition preparation for 2902E Water Tower
 - Continued with mobilization for 284E demolition
- 209E Project
 - Completed removal of the HO-170 Hood. Continued the NDA of the facility and verification of tanks as dry; all tanks with the exception of Tk-161 have now been verified as dry. Tk-161 verification will be performed as part of the HO-160 removal process.
 - Completed transition to temporary power and the electrical isolation of the Critical Assembly Room and the Mix Room. Completed removal of all of the process piping and began the removal of HO-200. Completed NDA of the HO-140 and Tk-141. Completed demolition of 2701EC Guard Shack and 209EA Storage Pad.
 - Completed preparation of the SWBs for shipment
- 200W Project
 - Continued characterization and cold and dark activities
 - Completed explosive demolition of 284W Bag Houses and Stacks
 - Completed explosive demolition of 2902W Water Tower
 - Completed beryllium clean up in 284W
 - Continued bio-hazard remediation and demolition preparation activities at 284W
 - Began abatement activities in 284W Power House and Crusher House

ARRA – OUTER ZONE D&D

- BC Controlled Area Waste Site Remediation
 - Remediation using super dump trucks continued with approximately 337,000 tons cumulative to date of soil removed and transferred to ERDF.
 - CERCLA survey measurements have been completed for approximately 90 percent of Zone A.
- 200-CW-3 Waste Sites
 - The verification package documentation for waste sites 216-N-1, 216-N-4, and 216-N-6 have been reviewed and approved by RL. Backfill of 216-N-1 has been previously completed. Backfill of 216-N-4 and 216-N-6 is ongoing.

- MG-1
 - Reclassification/closure documentation for waste sites 200-E-110, UPR-600-21, 600-51, 600-37, and 600-262 has been approved.
 - Waste site 600-275 additional excavation was completed in January. Sampling has been performed with acceptable results. Hauling of concrete debris was completed in mid-February. Backfill is anticipated in March.
 - Initial excavation of pipeline 200-W-147-PL was completed. Sampling is anticipated in March.
 - Waste site 600-220 sampling has been completed and remove, treat, and dispose (RTD) action is being planned. Field activities are adversely impacted by the cultural review process.
 - Waste site 600-226 verification sampling has been successfully completed. Reclassification and closure documentation is in progress.
 - Site 600-65 investigative sampling was completed with preliminary results indicating that RTD is not required
 - Preparations for remediation of sites 200-W-33 and 600-218 are ongoing with an anticipated start in early March
- ALE D&D
 - Contract awarded for Power Pole removal
- NORTH SLOPE
 - Continued cleanup of 106 and NPCE Monitored debris sites
- Railcars
 - Remedial Action Work Plan and Sampling Analysis Plan approved by EPA
 - Visual inspections have been completed.
 - Preparation of railcars for shipment initiated. Contractor for the lift and haul of the railcars was awarded.
 - B Reactor initiated planning for receiving railcars.

Base

- Excavation and backfill of 600-38 and 600-222 is complete.
- Backfill after excavation of pipelines 600-287-PL and 600-286-PL is in process and should complete in early March.
- Beryllium sampling/characterization continued in REDOX, 231Z, and 222T.
- Began planning of 6652PH equipment removal activities

MAJOR ISSUES

None.

RISK MANAGEMENT STATUS

Unassigned Risk
Risk Passed
New Risk

 Working - No Concerns
 Working - Concern
 Working - Critical

 Increased Confidence
 No Change
 Decreased Confidence

Risk Title	Risk Strategy/Handling	Assessment		Comments
		Month	Trend	
D4-U-004: U Canyon Technical Approach Changes	Conduct detailed planning/engineering to identify areas of concern and to minimize schedule impacts.			Detailed planning in process; impacts are being evaluated.
D4-020: Unexpected Condition/Radiological Contamination at Industrial Facilities	Perform early radiological surveys.			No significant impacts at this time.
D4-036: Readiness Reviews Required	Probability of risk occurring is low; risk is <u>accepted without mitigation</u> .			Probability is increasing; determining impacts to cost and schedule.
D4-037: D4 Regulatory Documents Delayed	Develop various regulatory documents to ensure the documents are submitted sufficiently early to obtain needed DOE or regulator approvals prior to planned start of work.			Working with RL to determine the appropriate path forward for facilities not covered under current regulatory documents.
D4-042: Unexpected Site Conditions	Conduct early facility walk downs and characterization activities to minimize schedule impacts; interview "old-timers" and compare recollections to historic records; conduct document searches to ensure all available documentation is reviewed early in the D4 planning process.			No issues at this time.
D4-043: Unforeseen Facility Event Impacts Safety or Environment	Include corrective maintenance in baseline based upon historic experience; risk accepted without further mitigation.			No issues at this time.
D4-S-033: Semi-Works Zone Closure-Regulatory Documents Delayed	Develop various regulatory documents to ensure the documents are submitted sufficiently early to obtain needed DOE or regulator approvals prior to planned start of work.			Evaluating the path forward for below-grade tanks.
D4-S-057: 209E Fire System Deactivation	The plan is to shut off all utilities as part of the 209E deactivation in preparation for demolition.			Upgrades to LSC systems are being implemented.
WSR-006: Decision Document Approval Delays	Work with RL and regulators to establish priorities and need dates.			RAWP and TPA Change Notice have been approved; MG-1 field activities for the pipelines have been adversely affected.
WSR-007: More Extensive Contamination Than Expected	Cannot control extent of contamination; no mitigation.			The BCCA is the major risk that has been realized. 216-N-4 had more contamination than anticipated, however 216-N-1 had less than anticipated - being from the same control account the cost impact was a net sum zero. Risk level reflects project life worst case impact of \$60M; individual waste site risks are moderate except for BCCA which is high.
WSR-008: No Action Waste Sites	Using L-8 table data; no mitigation.			Eight sites in the Outer Zone have failed the CSNA sample evaluation. Two of these sites have been remediated with closure paperwork in process. Four other sites have passed the initial CSNA evaluation. To date, cleanup of the failed sites has not resulted in large waste volumes.

RISK MANAGEMENT STATUS (continued)

Unassigned Risk
Risk Passed
New Risk

 Working - No Concerns
 Working - Concern
 Working - Critical

 Increased Confidence
 No Change
 Decreased Confidence

Risk Title	Risk Strategy/Handling	Assessment		Comments
		Month	Trend	
WSR-020: Ecological/Cultural Conditions Restrict Field Activities	This risk is accepted as written and will be monitored throughout work execution.			As a result of issues encountered a couple of months ago, a BCR was processed in September that incorporated the appropriate risk changes that could be taken at that time. There is an ongoing concern about any new changes; this is being watched closely.
WSR-021: Remediation Subcontractor Performance	This risk is accepted as written and will be monitored throughout work execution.			No issues identified at this time.
WSR-028: Unexpected Liquid in Pipelines/Tanks	Anticipate liquids in field work plans; include spill response plans in RD/RAWPs.			No issues identified at this time.
WSR-030: NRDWL Barrier (RCRA vs. ET-Mono)	Draft closure plan and L-8 table show ET-Mono; no mitigation.			Ecology comments on the draft closure plan indicates their acceptance of an ET Barrier. However, final acceptance of the ET cap requires public review and an associated permit modification.
WSR-031: NRDWL Cap - Learning Curve	Award contract which considers previous environmental barrier construction experience in the selection criteria. Assign full-time QA contractor to oversee barrier construction.			These criteria will be evaluated during contract award, which starts after the Closure Plan is submitted to the public for review.

PROJECT BASELINE PERFORMANCE

Current Month

(\$M)

WBS 040/ RL-0040 Nuclear Facility D&D	Budgeted Cost of Work Scheduled	Budgeted Cost of Work Performed	Actual Cost of Work Performed	Schedule Variance (\$)	Schedule Variance (%)	Cost Variance (\$)	Cost Variance (%)
U Plant/Other	6.0	6.1	6.4	0.1	2.0	(0.2)	-3.5
Outer Zone	<u>3.1</u>	<u>4.4</u>	<u>3.8</u>	<u>1.3</u>	41.2	<u>0.6</u>	13.4
ARRA Total	9.1	10.5	10.2	1.4	15.3	0.4	3.5
Base	<u>0.3</u>	<u>0.3</u>	<u>1.1</u>	<u>0.0</u>	5.1	<u>(0.8)</u>	-255.6
Total	9.4	10.8	11.2	1.4	15.0	(0.4)	-3.9

Numbers are rounded to the nearest \$0.1M

ARRA

CM Schedule Performance: (+\$1.4M/+15.3%)

ARRA RL-0040.R1.1 U Plant/Other D&D (+\$0.1M) is within reporting thresholds.

ARRA RL-0040.R1.2 Outer Zone D&D (+\$1.3M)

Outer zone waste sites favorable schedule variance is primarily related to implementation of contract modifications 135 and 140 by BCR-PRC-11-020 R0; this deleted waste sites which have been identified as requiring no remediation and deferred selected waste sites from ARRA into FY2014 base due to lack of an approved regulatory path forward (+\$1.3M).

CM Cost Performance: (+\$0.4M/+3.5%)

ARRA RL-0040.R1.1 U Plant/Other D&D (-\$0.2M) variance is within reporting threshold.

ARRA RL-0040.R1.2 Outer Zone D&D (+\$0.6M) favorable cost variance is primarily due to efficiency of parallel performance of activities in the BC Control Area, including completion of the primary excavation in Zone A, continuing CERCLA surveys of the balance of Zone A with hot spot removal as necessary and seeding portions of Zone A which had already been surveyed to verify completion of remediation.

Base

CM Schedule Performance: (+\$0.0M/+5.1%)

Variance is within reporting threshold.

CM Cost Performance: (-\$0.8M/-255.6%)

The negative cost variance is primarily due to a one-time point adjustment associated with implementation of BCR-PRC-11-020R0, Align FY11 PMB Scope to RL Priorities, where the Direct Distributable and G&A budgets were redistributed.

Contract-To-Date (\$M)

WBS 040/ RL-0040 Nuclear Facility D&D	Budgeted Cost of Work Scheduled	Budgeted Cost of Work Performed	Actual Cost of Work Performed	Schedule Variance (\$)	Schedule Variance (%)	Cost Variance (\$)	Cost Variance (%)	Budget at Completion (BAC)	Estimate at Completion (EAC)	Variance at Completion (VAC)
U Plant/Other	150.5	146.3	134.6	(4.3)	-2.8	11.6	8.0	198.7	186.9	11.8
Outer Zone	<u>65.1</u>	<u>63.1</u>	<u>51.7</u>	<u>(2.0)</u>	-3.0	<u>11.4</u>	18.1	<u>89.5</u>	<u>91.6</u>	<u>(2.0)</u>
ARRA Total	215.6	209.4	186.3	(6.3)	-2.9	23.1	11.0	288.3	278.5	9.8
Base	<u>56.0</u>	<u>56.2</u>	<u>50.4</u>	<u>0.3</u>	0.5	<u>5.9</u>	10.4	<u>757.8</u>	<u>742.6</u>	<u>15.2</u>
Total	271.6	265.6	236.7	(6.0)	-2.2	28.9	10.9	1,046.0	1,021.1	24.9

Numbers are rounded to the nearest \$0.1M

ARRA

CTD Schedule Performance: (-\$6.3M/-2.9%)

ARRA RL-0040.R1.1 U Plant/Other D&D (-\$4.3M) negative schedule variance is due to late award of the grout contract for U Canyon (-\$2.8M) and delays with the 200E Administration Buildings (-\$1.8M) due to bio-hazard and radiological control issues. Limited resources has also delayed 200W Administration Buildings (-\$0.7M). This is offset by accelerating 209E demolition preparation, mobilization, and asbestos abatement (+\$1.1M).

ARRA RL-0040.R1.2 Outer Zone D&D (-2.0M) unfavorable schedule variance is primarily due to delay of work on selected waste sites pending finalization of site priorities (-\$1.2M). Demobilization of the ALE towers should have been complete in FY2010 but due to delays with releasing several towers to CHPRC, the project is behind (-\$0.2M) and delays with cultural/ecological reviews on the North Slope (-\$0.4M). Minor accounts outside the threshold (-\$0.1M).

CTD Cost Performance: (+\$23.1M/+11.0%)

ARRA RL-0040.R1.1 U Plant/Other D&D (+\$11.6M) favorable cost variance is largely due to favorable performance of the Cold and Dark teams and the Sampling and Characterization/Waste Identification Form teams (D4) (+\$3.3M), overhead allocations (+\$6.5M), less for Program Management than planned (+\$1.2M), efficiencies at U Canyon (D4) (+\$1.9M), less resources than planned for C-3 Sampling (+\$0.7M) and 200E Administration (+\$1.2M), lower than planned costs for capital equipment (D4) (+\$2.7M), less asbestos abatement required for 200W buildings (+\$2.5M), offset by increased material and equipment costs, increased use of masks and respirators due to the unexpected asbestos levels in the ancillary buildings in U Ancillary (D4) (-\$7.7M), coupled with increased insulator staff and overtime to recover schedule, 209E Project (-\$0.8M). Minor accounts not within threshold (+\$0.1M).

ARRA RL-0040.R1.2 Outer Zone D&D (+\$11.4M) favorable cost variance is due to efficiencies in ALE and North Slope Facilities D&D (+\$4.5M) and Outer Area waste sites (+\$7.9M). The waste site favorable cost-to-date variance is primarily due to an O-Zone RTD Waste Sites adjustment (pass back) to ERDF waste disposal costs reflecting the operational efficiencies of the super dump trucks. Within the waste sites area, this favorable cost variance is partially offset by higher than planned costs associated with remediation of pipelines. A negative cost variance is associated increase costs for the 212N/P/R Project (-\$1.0M) due to the walls of the basins being much thicker than estimated.

Base

CTD Schedule Performance: (+0.3M/+0.5%)

All Variances are within Thresholds.

CTD Cost Performance: (+\$5.9M/+10.4%)

Balance of Site (facilities and others) (+\$5.9M) favorable cost variance is associated with recognized efficiencies for demolition of the Industrial 7 Project (D4) (+\$0.6M) as a result of utilization of existing site equipment and materials, surveillance and maintenance costs (D4) (+\$1.3M) less than expected, completed the sampling of Cell 30 with less resources than planned (+\$0.9M), Program Management utilizing less resources (+\$1.4M), capital equipment (+\$0.3M), Usage Base Services (+\$0.1M), and underrun in overhead allocations (+\$1.3M).

Contract Performance Report Formats are provided in Appendix A and Appendix A-1.

**FUNDS vs. SPEND FORECAST
(\$M)**

WBS 040/RL-0040 Nuclear Facility D&D	FY2011		
	Projected Funding	Spending Forecast	Spend Variance
ARRA	142.6	141.6	1.0
Base	24.6	18.7	5.9

Numbers are rounded to the nearest \$0.1M.

Funds/Variance Analysis

Funding includes FY2010 carryover and FY2011 new Budget Authority. The variances reflect an approved realignment of ARRA and Base work scope that was implemented in February.

Critical Path Schedule

Critical path analysis can be provided upon request.

Estimate at Completion (EAC)

The BAC and EAC now include FY2009 through FY2018, the PRC contract period.

Baseline Change Requests

BCR-PRC-11-020R0, Align FY 2011 PMB Scope to Revised RL Priorities

BCRA-PRC-11-023R0, General Administrative & FOC Changes for February 2011

MILESTONE STATUS

None currently identified.

SELF-PERFORMED WORK

The Section H. clause entitled, Self-Performed Work, is addressed in the Monthly Report Overview.

GOVERNMENT FURNISHED SERVICES AND INFORMATION (GFS/I)

None currently identified.