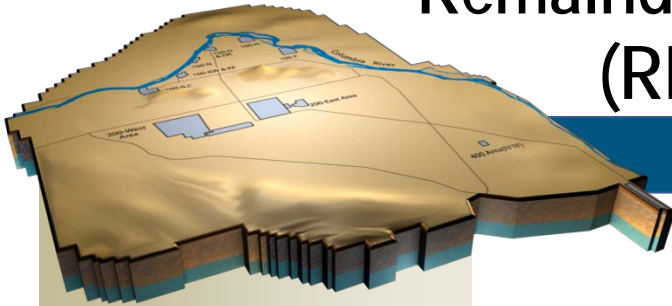


# Section E Nuclear Facility D&D, Remainder of Hanford (RL-0040)

## Monthly Performance Report



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Deliverable C.3.1.3.1 - 1



**284W Power House Demolition**

## PROJECT SUMMARY

### American Recovery and Reinvestment Act (ARRA)

Continued grouting of the 221U Canyon facility process cell voids.  
 Completed grouting of the electrical and piping galleries.  
 Began grouting the hot pipe trench.  
 Continued preparation for grouting activities in the ventilation tunnel and ventilation duct to sand filter.  
 Completed construction of the structural grout bulkheads for the rail tunnel.  
 Completed the Cell 30 Tank D-10 process vessel retrieval, loading, and shipping.  
 The 209E facility completed cutting tanks 101 and 105.  
 Applied fixative to all 200 series slab tanks.  
 Continued abatement activities in 284W Power House.  
 Continued decommissioning North Slope wells.  
 Continued asbestos abatement of the steam lines in the 200W Area.  
 The Railcar Disposition Project completed all field activities including demobilization of all materials, trailers, and equipment from the site. The Response Action Report (RAR) proceeded through the revision process and will be ready for RL review in early September.  
 Remediation activities continued in the Model Group (MG)-1 waste sites.

### Base

Planned surveillance and maintenance (S&M) activities continue.  
 Continued initial beryllium characterization sampling at B-Plant and 231Z.  
 Started roof repair at REDOX.

## 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	10	<p><b>08/29</b> Employee was assisting in lifting a glovebox, it then fell on hand, pinching off a portion of the left index finger. Employee was taken to Kadlec Hospital for treatment. <b>(22298)</b></p>
First Aid Cases	7	66	<p><b>08/09</b> Insulator was lifting a bag when it started to slip. The worker attempted to catch the bag with two fingers and strained a muscle in the right arm. <b>(22196)</b></p> <p><b>08/15</b> RCT reported a minor abrasion on the forehead from wearing a hard hat. <b>(22226)</b></p> <p><b>08/15</b> D&amp;D Worker reported a rash on head from the use of PPE. <b>(22225)</b></p> <p><b>08/16</b> Rigger ran hand over a wood plank and got a splinter in the forearm. <b>(22229)</b></p> <p><b>08/18</b> Pipefitter was stung by a sweat bee on the right shoulder. <b>(22233)</b></p> <p><b>08/26</b> D&amp;D Worker reported lifting heavy items causing an abdominal strain. <b>(22282)</b></p> <p><b>08/29</b> Employee strained left side of neck. <b>(22293)</b></p>
Near-Misses	0	0	N/A

## KEY ACCOMPLISHMENTS

ARRA – U Plant/Other Decontamination and decommissioning (D&D)

- U Canyon Demolition and Cell 30 Disposition
  - Continued grouting of the 221U Canyon facility process cells voids. Completed grouting of the electrical and piping galleries. Began grouting of the hot pipe trench. Continued preparation for grouting activities in the ventilation tunnel and ventilation duct to sand filter. Completed construction of the structural grout bulkheads for the rail tunnel.
- Completed the Cell Tank D-10 process vessel retrieval, loading and shipping.

- 209E Project
  - Removed Tank 231 and is ready to load out and have non-destructive analysis (NDA) performed.
  - Completed removal of Tank 106 and the associated wax from the CAR. Tank 106 is staged for placement of the glove bag to paint and begin cutting.
  - Completed all of the work packages for the project.
  - Completed shipment of Standard Waste Boxes (SWBs)
- 200W Project
  - Continued asbestos abatement activities in the 284W Power House.
- 200W and 200E Steam line
  - Continued 200W and 200E steam line asbestos abatement repair.

#### ARRA – Outer Zone D&D

- BC Controlled Area (BCCA) Waste Site Remediation
  - As required by the Remedial Action Work Plan (RAWP), an On-Scene Coordinator Report is being published to document remedial actions performed and current status of the waste site. RL and the regulator comments have been incorporated. The document is on scheduled to be transmitted to RL and incorporated in the Administrative Record (AR) by the end of September.
- MG-1
  - Waste sites 600-40, 600-49, 600- 218, 600-220, 600-282, and 200-W-147-PL RAR and reclassification is complete.
  - Waste sites 600-281has been backfilled. Closure documentation is being prepared.
  - Waste site 216-S-19 is being backfilled and is on schedule to be completed in mid-September. Closure documentation is being prepared.
  - Waste site 216-S-26 has been backfilled. Closure documentation is being prepared.
  - Waste site 600-228 backfill activities have been approved and will be completed in mid-September. Closure documentation is being prepared.
- NORTH SLOPE
  - Continued decommissioning North Slope wells.
  - Began demobilization.
- Railcars
  - Final surveys of the tracks completed. There will be Waste Information Data (WID) sites as contamination was discovered that could not be easily cleaned up. All materials, equipment, trailers have been demobilized from the site.
  - The air monitors have been turned off and all generators shut down. The RAR will be transmitted to RL in early September.

#### Base




- Beryllium sampling/characterization continued in B Plant and 231Z.
- Started roof repair at REDOX.




## MAJOR ISSUES





















None identified.

## 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
		Mont	Trend	
D4-036: Readiness Reviews Required	Probability of risk occurring is low; risk accepted without mitigation.			Due to change in procedure, probability is increasing. A change in criteria can require a change to process and potentially delay the project.
D4-042: Unexpected Site Conditions - D4	Conduct early facility walk downs and characterization activities to minimize the schedule impacts; interview "old timers" who worked in or around the facility and compare those events 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-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.			Evaluation of the path forward for below-grade tanks has been completed and the tanks will require full removal as opposed to being disposed in place. Risk realized, BCR to be developed for incorporation into Baseline.
D4-S-057: 209-E Fire System Deactivation	The plan is to shut off all utilities as part of the 209-E deactivation in preparation for demolition.			Upgrades to LSC systems have been completed. Project risk remains in that once the building can be categorized as non-nuclear (anticipated to occur in June), Fire Protection personnel may require continued monitoring/surveillance.
<b>WSR-006: Decision Document Approval Delays</b>	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.
<b>WSR-007: More Extensive Contamination Than Expected</b>	Cannot control extent of contamination; no mitigation.			A BCR has been approved and implemented to authorize completion of BCCA Zone A remediation. The loss of field indicators to help guide excavation extent, and failed verification samples caused continued excavation at multiple MG-1 waste sites.
<b>WSR-008: No Action Waste Sites</b>	Using L-8 table data; no mitigation.			Eight sites in the Outer Zone have failed the CSNA sample evaluation. Six of the waste sites have been remediated. Two will not be remediated. To date, cleanup of the failed sites has not resulted in large waste volumes.
KBC-020: Ecological/Cultural Conditions Restrict Field Activities	This risk is accepted as written and will be monitored throughout work execution.			There is an ongoing concern about any new changes; this is being watched closely. Where appropriate, the culturally sensitive portion of a waste site is being identified and work is being performed in non-sensitive areas. Site 600-227 is being adversely affecting by cultural approval.
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.

## 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 (%)
<b>U Plant/Other</b>	5.8	6.3	8.1	0.5	8.9	(1.8)	28.3
<b>Outer Zone</b>	<u>1.8</u>	<u>0.7</u>	<u>-0.4</u>	<u>(1.1)</u>	-60.2	<u>1.2</u>	160.2
<b>ARRA Total</b>	<b>7.6</b>	<b>7.0</b>	<b>7.7</b>	<b>(0.6)</b>	<b>-7.6</b>	<b>(0.6)</b>	<b>-8.5</b>
<b>Base</b>	<u>1.5</u>	<u>1.3</u>	<u>1.2</u>	<u>(0.2)</u>	-12.2	<u>0.1</u>	6.7
<b>Total</b>	<b>9.1</b>	<b>8.3</b>	<b>8.9</b>	<b>(0.8)</b>	<b>-8.3</b>	<b>(0.5)</b>	<b>-6.1</b>

Numbers are rounded to the nearest \$0.1M

#### ARRA

##### CM Schedule Performance: (-\$0.6M/-7.6%)

ARRA RL-0040.R1.1 U Plant/Other D&D (+\$0.5M)

Variance is within reporting threshold.

ARRA RL-0040.R1.2 (-\$1.1M) The unfavorable schedule variance is due to gains in the intentional deferral of work on waste sites outside of the footprint reduction zones (-\$0.8M) and earlier completion of scope associated with BC Control area. The Disposition of the railcars (-\$0.3M) unfavorable schedule variance was due to a minor issue with completing the final surveys. The surveys are complete and the project is in final close-out.

##### CM Cost Performance: (-\$0.6M/-8.5%)

ARRA RL-0040.R1.1 U Plant/Other D&D (-\$1.8M) Variance is within reporting threshold.

ARRA RL-0040.R1.2 (+\$1.2M) The variance is primarily due to a credit passback related to ERDF waste disposal costs (\$1.1M). This is offset by an unfavorable cost variance in waste sites (-\$0.1M) related to extent of contamination in 216-S-19 and 216-S-26.

#### Base

##### CM Schedule Performance: (+\$0.2M/+12.2%)

Variance is within reporting threshold.

##### CM Cost Performance: (+\$0.1M/+6.7%)

Variance is within reporting threshold.

## 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)
<b>U Plant/Other</b>	188.8	184.0	177.4	(4.8)	-2.5	6.6	3.6	199.6	187.6	12.4
<b>Outer Zone</b>	86.7	83.1	69.5	(3.6)	-4.1	13.6	16.4	89.4	86.3	10.4
<b>ARRA Total</b>	<b>275.5</b>	<b>267.1</b>	<b>246.9</b>	<b>(8.4)</b>	<b>-3.0</b>	<b>20.2</b>	<b>7.6</b>	<b>289.0</b>	<b>273.9</b>	<b>22.8</b>
<b>Base</b>	65.0	64.8	57.9	(0.1)	-0.2	7.0	10.7	733.2	742.7	16.8
<b>Total</b>	<b>340.4</b>	<b>331.9</b>	<b>304.8</b>	<b>(8.5)</b>	<b>-2.5</b>	<b>27.2</b>	<b>8.2</b>	<b>1,022.2</b>	<b>1,016.6</b>	<b>39.6</b>

Numbers are rounded to the nearest \$0.1M

### ARRA

#### CTD Schedule Performance: (-\$8.4M/-3.0%)

ARRA RL-0040.R1.1 U Plant/Other D&D (-\$4.8M) The negative schedule variance is due to late award of the grout contract for U Canyon (-\$2.7M), delays with the hazard reduction of 209E (-\$0.9M), and limited resources has also delayed 200W Administration Buildings (-\$1.6M). Also minor accounts outside the threshold (-\$0.1M).

ARRA RL-0040.R1.2 Outer Zone D&D (-\$3.6M) The unfavorable schedule variance is primarily due to the waste sites in ARRA that need to be moved to base to support the priority of footprint reduction (-\$3.7M), which is offset by the ahead of schedule disposition of the 212N railcars (+\$0.1M).

#### CTD Cost Performance: (+\$20.2M/+7.6%)

ARRA RL-0040.R1.1 U Plant/Other D&D (+\$6.6M) The 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) (+\$4.2M), overhead allocations (+\$10.5 M), less for Program Management than planned (+\$2.4M), less resources than planned for C-3 Sampling (+\$0.7M), lower than planned costs for capital equipment (D4) (+\$3.0M), less asbestos abatement required for 200W buildings (+\$3.3M), 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) (-\$8.0M), coupled with increased insulator staff and overtime to recover schedule, 200E Administration (-\$1.2M) and 209E Project delays (-\$3.0M), additional resources being applied at U Canyon (D4) to regain schedule (-\$2.3M), Usage Based Services (-\$2.9M), and minor accounts not within threshold (-\$0.1M).

ARRA RL-0040.R1.2 Outer Zone D&D (+\$13.6M) The favorable cost variance is due to efficiencies in Arid Lands Ecology (ALE), North Slope Facilities, disposition of railcars D&D (+\$7.2M), and Outer Area waste sites (+\$7.5M). The waste site favorable cost-to-date variance is primarily due to an O-Zone Remove, Treat, and Dispose (RTD) Waste Sites adjustments (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 with increased costs for the 212N/P/R Project (-\$1.1M) due to the walls of the basins being much thicker than estimated.

**Base**

**CTD Schedule Performance: (-0.1M/-0.2%)**

All Variances are within Thresholds.

**CTD Cost Performance: (+7.0M/+10.7%)**

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) less than expected (+\$1.9M), completion of the sampling of Cell 30 with less resources than planned (+\$0.9M), Program Management utilizing less resources (+\$1.5M), capital equipment (+\$0.3M), Usage Base Services (+\$0.2M), and underrun in overhead allocations (+\$1.8M).

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

**Estimate at Completion (EAC)**

The BAC and EAC include FY2009 through FY2018.

The changes in EAC from June to July, for both ARRA and Base, are within reporting thresholds.

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

WBS 040/RL-0040 Nuclear Facility D&D	FY2011		
	Projected Funding	Spending Forecast	Spend Variance
<b>ARRA</b>	142.6	137.5	5.1
<b>Base</b>	18.5	17.3	1.2

Numbers are rounded to the nearest \$0.1M.

**Funds/Variance Analysis**

Funding includes FY2010 carryover and FY2011 new Budget Authority.

**Critical Path Schedule**

Critical path analysis can be provided upon request.

**Baseline Change Requests**

BCR-PRC-11-039R0, "FY 2012 Annual PMB Update.".

**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.