# Section F Nuclear Facility D&D, River Corridor (RL-0041)





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# **PROJECT SUMMARY**

#### American Recovery and Reinvestment Act (ARRA)

No significant activity.

#### Base

#### Facilities

Continued interior cleanup activities including removal of combustible materials on the 1<sup>st</sup> floor. Initiated removal of core drilling slurry waste water drums from within 105KE Reactor building.

Completed sediment load-out of 183.2KE Basin on the east side and continued with preparation for debris removal at 183.7KE Structure with limited sampling resources.

Continued with pipe cuts on 105KE tunnel and non-boiler room asbestos removal on 165KE structure. Progress continues with below grade demolition on 182K Emergency Water Reservoir Pump House.

Continued remediation of waste sites 100-K-3, 100-K-68, 100-K-69, 100-K-70, and 100-K-71. Preliminary plan for modeling to determine protectiveness for waste sites around the 105KE reactor building is underway. A statement of work is in development for additional remediation at 100-K-47, 100-K-56 and Area AH. Completed lab analysis for contamination at Area AH east of the 105KE facility.

The Memorandum of Agreement (MOA) for Area AM is in review and field work on the removal of the 1908K Structure and waste sites 100-K-80, 96, 81, 83, and 116-K-3 is pending agreement on the MOA.

# **EMS OBJECTIVES AND TARGET STATUS**

EMS Objectives and Target Status for RL-0041 are included as part of the Objectives and Target Status for RL-0040.

|  | Current<br>Month | Rolling 12<br>Month | Comment |
|--|------------------|---------------------|---------|
| Days Away,<br>Restricted or<br>Transferred | 0                | 0                   | N/A     |
| Total<br>Recordable<br>Injuries            | 0                | 0                   | N/A     |
| First Aid<br>Cases                         | 0                | 10                  | N/A     |
| Near-Misses                                | 0                | 0                   | N/A     |

# TARGET ZERO PERFORMANCE



# **KEY ACCOMPLISHMENTS**

#### ARRA

No American Recovery and Reinvestment Act (ARRA) accomplishments.

#### Base

#### Facilities

- Continued interior cleanup activities second floor completed.
- Commenced pourback installation for K56 effluent tunnel.
- Issued RFP for SSE Construction.
- Continued with asbestos abatement of 105KE tunnel and pipe cuts.
- Continued with erecting scaffolding and demolition preparation at 183.7 structure when resources allow.
- Continued non-boiler room asbestos removal at 165KE.

#### Waste Sites

- M-016-53 Phase 1 TPA waste sites schedule sequencing and updates for compliant schedule.
- Awarded RFP and obtained concurrence on early mobilization for Area AH remediation and backfill work for Phase 1 TPA.
- Completed remediation of waste sites 100-K-3, 100-K-68, 100-K-69, 100-K-70, and 100-K-71.

# **MAJOR ISSUES**

No major issues to report this month.



# **RISK MANAGEMENT STATUS**

| Unassigned Risk  |   |                    | - No Concer |  |  |  |
|--|---|--------------------|-------------|--|--|--|
| Risk Passed<br>New Risk  |   | Working            | - Concern   | No Change  |  |  |
| Change   | _   | Working - Critical |             | Decreased Confidence   |  |  |
|  |   | Assess             |             |  |  |  |
| Risk Title   | Risk Strategy/Handling  | Month              | Trend       | Comments   |  |  |
|  | RL-041/W  | VBS 041            |             |  |  |  |
| KBC-004:<br>Contamination Depth<br>Greater Than Planned                    | Cannot control extent of contamination; Mitigate<br>risk utilizing total tons within the PMB volume for<br>100-K waste sites Remediation.   | -                  | +           | The 100K waste sites that have been remediated to<br>date realized more tons of waste than planned.<br>CHPRC will continue to use planned BCWS up to<br>the planned PMB total tons estimated.  |  |  |
| WSR-009: Different<br>Remediation Approach                                 | Clean up remedies are consistent with direction<br>received from RL in the PRC. There is a risk that<br>the regulators will require a different cleanup<br>remedy that what is planned.   |                    | <b>+</b>    | It has been demonstrated that with ISS of 105KE,<br>two significant plumes will not be fully remediated<br>under the RTD. The project is researching a long-<br>term (i.e. 75 year) low cost stabilization that will<br>retard water movement through the contaminated<br>zone. Failure to retard percolation will result in<br>additional contamination to the ground water and<br>possibly the Columbia river unless more drastic<br>measures are taken. There are alternative<br>remediation strategies being discussed for the<br>following sites: 100-K-42 / UPR-100-K-1 (Fuel<br>Storage Basin); 100-K-57 and 100-K-64 (100K East<br>Flood Plain); and 100-KE-1 (Ventilation Condensate<br>Crib with Carbon-14 and Tritium). The client is<br>being kept informed on developments. |  |  |
| KBC-020:<br>Ecological/Cultural<br>Conditions Restrict Field<br>Activities | Accelerate cultural resource reviews; work with<br>team to provide necessary information to mitigate<br>resources issues. This risk will be monitored<br>throughout work execution.   |                    | +           | TPA-CN-499 moved waste sites associated with<br>TPA milestone M-16-53 into Phase 2 TPA Milestone<br>M-16-143 due December 29, 2015.  |  |  |
| KBC-044: 100 K Waste<br>Sites Require Haz Cat<br>Controls                  | Existing characterization data indicates the<br>likelihood of this risk occurring is low; risk<br>accepted without mitigation.  | •                  | +           | Developing modeling data associated with KE waste<br>sites to determine remediation. Model results will be<br>shared with stakeholders for path forward.   |  |  |
| KBC-048: Unexpected<br>Industrial Contamination                            | D-4 activities are conducted in accordance with<br>CHPRC IH and Rad protection programs to<br>minimize contamination spread. Prior to D&D<br>activities, the existing and historical records are<br>reviewed to identify areas of likely industrial<br>contamination. |                    | +           | Contaminated Pipe Remediation initiated –<br>Progressing as scheduled. No concerns.  |  |  |
| WSR-047: Unforeseen<br>Waste Site Event                                    | Perform routine surveillances and maintenance of waste sites including herbicide application.   |                    | <b>†</b>    | Contaminated Pipe Remediation initiated –<br>Progressing as scheduled. No concerns.  |  |  |
| PRC-010:<br>Requirements Change  | The remediation of asbestos was conducted in<br>accordance with industry accepted techniques and<br>processes. CHPRC is working with DOE-RL and<br>other site contractors to ensure the asbestos<br>abatement and containment procedures are<br>adequate.             | •                  | +           | Recent site-wide notification regarding asbestos<br>abatement areas could identify additional<br>requirements regarding asbestos abatement and<br>remediation from previously demolished structures.   |  |  |
| PRC-014: Site-Wide<br>Occurrence   | The remediation of asbestos was conducted in<br>accordance with industry accepted techniques and<br>processes. All Hanford site Contractors have been<br>requested to assess asbestos abatement and facility<br>conditions.   |                    | +           | Recent site-wide notification regarding asbestos<br>abatement areas identifies that as a potential concern<br>for cost and schedule growth.  |  |  |
| PRC-021A: Workforce<br>Restructuring Caused<br>by Funding Changes          | Revise project schedules and work planning<br>documents around workforce restructuring<br>timelines. Work with other contractors to minimize<br>impacts associated with Bump and Roll.  |                    | Î           | Based on FY-13 funding projections, CHPRC is initiating a workforce restructuring action.  |  |  |



### PROJECT BASELINE PERFORMANCE Current Month (\$M)

| WBS 041/RL-0041<br>Nuclear Facility<br>D&D – River<br>Corridor | Budgeted<br>Cost<br>of Work<br>Scheduled | Budgeted<br>Cost<br>of Work<br>Performed | Actual<br>Cost<br>of Work<br>Performed | Schedule<br>Variance<br>(\$) | Schedule<br>Variance<br>(%) | Cost<br>Variance<br>(\$) | Cost<br>Variance<br>(%) |
|--|--|--|--|------------------------------|-----------------------------|--------------------------|-------------------------|
| ARRA   | 0.3                                      | 0.0                                      | 0.1                                    | -0.3                         | -100.0                      | -0.1                     | 0.0                     |
| Base   | <u>4.5</u>                               | <u>2.1</u>                               | <u>3.6</u>                             | -2.4                         | -53.4                       | <u>-1.5</u>              | -70.5                   |
| Total  | 4.8                                      | 2.1                                      | 3.7                                    | -2.7                         | -56.2                       | -1.6                     | -75.8                   |

Numbers are rounded to the nearest \$0.1M

#### ARRA

#### CM Schedule Performance: (-\$0.3M/-100.0%)

Waste Sites (-\$0.3M) The negative variance is due to backfills for Waste Sites being behind due to the activity being level loaded. Backfill will not occur until mid to late summer.

100K Area Project (Facilities and Others) (+\$0.0M) The variance is within reporting threshold.

#### CM Cost Performance: (-\$0.1M/+0.0%)

Waste Sites (-\$0.0M) The variance is within reporting threshold.

100K Area Project (-\$0.1M) The variance is within reporting threshold.

#### Base

#### CM Schedule Performance (-\$2.4M/-53.4%)

Waste Sites (-\$1.2M) The negative schedule variance is due to Area AG being behind on sampling due to limited resources. The project is working with the Sampling Organization to find work around and/or utilize overtime.

100K Area Project (Facilities and Others) (-\$1.2M) The negative variance is due to K East Sedimentation Basin, 165KE Structure and 105KE Water Tunnel being behind schedule. Sampling resources have not been available for the K East Sedimentation Basin and fitter resources for the 105KE Water Tunnel have been assigned to higher priority workscope.

#### CM Cost Performance (-\$1.5M/-70.5%)

Waste Sites (-\$1.2M) The variance is due in part to revised WSCF sampling costs from prior months and remediation efforts for 100-K-3 have exceeded the planned due to additional contamination.

100K Area Project (-\$0.3M) The variance is within reporting threshold.



| (\$M)  |  |  |  |              |                             |                          |                         |                                  |                                    |                                    |
|--|--|--|--|--------------|-----------------------------|--------------------------|-------------------------|----------------------------------|------------------------------------|------------------------------------|
| WBS 041/<br>RL-0041<br>Nuclear Facility<br>D&D – River<br>Corridor | Budgeted<br>Cost<br>of Work<br>Scheduled | Budgeted<br>Cost<br>of Work<br>Performed | Actual<br>Cost<br>of Work<br>Performed | Variance     | Schedule<br>Variance<br>(%) | Cost<br>Variance<br>(\$) | Cost<br>Variance<br>(%) | Budget at<br>Completion<br>(BAC) | Estimate at<br>Completion<br>(EAC) | Variance at<br>Completion<br>(VAC) |
| ARRA   | 178.7                                    | 177.7                                    | 179.7                                  | (1.0)        | -0.6                        | (2.0)                    | -1.1                    | 179.7                            | 181.3                              | (1.5)                              |
| Base   | <u>99.2</u>                              | <u>94.2</u>                              | <u>82.5</u>                            | <u>(4.9)</u> | -5.0                        | <u>11.7</u>              | 12.4                    | <u>337.8</u>                     | <u>325.2</u>                       | <u>12.7</u>                        |
| Total  | 277.9                                    | 271.9                                    | 262.2                                  | (5.9)        | -2.2                        | 9.7                      | 3.6                     | 517.6                            | 506.4                              | 11.1                               |
| Numbers are rounded to the nearest \$0.1M                          |  |  |  |              |                             |                          |                         |                                  |                                    |                                    |

Contract-to-Date

#### ARRA

#### CTD Schedule Performance: (-\$1.0M/-0.6%)

Waste Sites (-\$1.0M) The negative variance is due to backfills for Waste Sites being behind due to the activity being level loaded. Backfill will not occur until mid to late summer.

100K Area Project (-\$0.0M) The variance is within reporting threshold.

#### CTD Cost Performance: (-\$2.0M/-1.1%)

Waste Sites (+\$8.5) The positive cost variance is due to Confirmatory Sampling No Action (CSNA) sites that were completed at less than anticipated cost. This is partially offset by greater than anticipated extent and severity of contamination on many waste sites resulting in more tons disposed and more controls required, thus higher than anticipated cost.

100K Area Project (-\$10.5M) The negative cost variance is due to numerous design changes and additional punch list items in the Utilities Reroute project; this also resulted in the project utilizing more vehicles and equipment than was originally planned as well as the Project Management costs to rise due to the corresponding increases for both labor and materials.

#### Base

#### CTD Schedule Performance (-\$4.9M/-5.0%)

Waste Sites (-\$0.5M) The negative schedule variance is due to CSNA sites that were completed at less than anticipated cost. This is offset by Area AM not being worked as schedule due to the MOA not being approved.

100K Area Project (Facilities and Others) (-\$4.4M) The negative schedule variance is due to being behind on K East Sedimentation, 105KE Water Tunnel, 1908K Structure and 165KE Structure due to limited resources. A Baseline Change Request will process in June to defer 1908K and 165KE to out years.

#### CTD Cost Performance (+\$11.7M/+12.4%)

Waste Sites (+\$9.0M) The positive cost variance is due to CSNA sites that were completed at less than anticipated cost. This is partially offset by greater than anticipated extent and severity of contamination on many waste sites resulting in more tons disposed and more controls required, thus higher than anticipated cost, as well as level-of-effort activities bearing additional costs for increased functional group support.

100K Area Project (Facilities and Others) (+\$2.7M) The positive cost variance is due to 105KE Reactor Disposition – ISS underrun as well as G&A and Direct Distributables.

#### **Estimate at Completion (EAC)**

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

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



| FUNDS vs. SPEND FORECAST<br>(\$M)                              |                      |                      |                |  |  |  |  |
|--|----------------------|----------------------|----------------|--|--|--|--|
|  | FY2012               |                      |                |  |  |  |  |
| WBS 041/RL-0041<br>Nuclear Facility<br>D&D – River<br>Corridor | Projected<br>Funding | Spending<br>Forecast | Spend Variance |  |  |  |  |
| ARRA   | 6.5                  | 6.5                  | 0.0            |  |  |  |  |
| Base   | 34.8                 | 33.1                 | 1.7            |  |  |  |  |
| RL-0041 Total  | 41.3                 | 39.6                 | 1.7            |  |  |  |  |

Numbers are rounded to the nearest \$0.1M.

#### **Funds/Variance Analysis:**

Funding includes FY2011 carryover and FY2012 new Budget Authority.

#### **Critical Path Schedule**

Critical Path Analysis can be provided upon request.

#### **Baseline Change Requests**

None identified.

# **MILESTONE STATUS**

Tri-Party Agreement (TPA) milestones represent significant events in project execution. DOE Enforceable Agreement milestones were established to provide high-level visibility to critical deliverables and specific status on the accomplishment of these key events. The PMB Revision 3, implemented in November 2011, and subsequent approved BCRs define CHPRC planning with respect to TPA milestones.

| Number   | Title  | Туре | Due<br>Date | Actual<br>Date | Forecast<br>Date | Status/<br>Comment |
|----------|--|------|-------------|----------------|------------------|--------------------|
| M-016-53 | Complete the Interim<br>Response Actions for<br>the 100 K Area Phase I | TPA  | 12/31/12    |                |                  | On Schedule.       |

# 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.

