

## DEFENSE NUCLEAR FACILITIES SAFETY BOARD

December 20, 2013

**TO:** S. A. Stokes, Technical Director  
**FROM:** D. Gutowski and R. Quirk, Hanford Site Representatives  
**SUBJECT:** Hanford Activity Report for the Week Ending December 20, 2013

Savannah River site representative M. Sautman was on-site to provide cross-site perspective.

**Waste Treatment Plant.** The Office of River Protection (ORP) completed its design review of selected systems in the High Level Waste (HLW) Facility (see Activity Report 12/6/2013). At an outbrief meeting, the review team presented a large number of preliminary issues. Many of these were categorized as potentially requiring significant redesign efforts. The ventilation systems and the process vessel vent exhaust system had many of the more significant issues.

ORP met with the contractor to provide feedback on the contractor's draft plan to resume engineering, procurement, and construction at HLW (see Activity Report 12/13/2013). ORP noted that the plan emphasized construction, did not include maintaining alignment of the design with the safety basis, and did not include a strategy to resolve issues from assessments including the HLW design review. ORP is planning more detailed evaluations as BNI further develops their approach for HLW resumption.

Last week, the contractor provided ORP management with an update on their progress addressing the Level 1 findings from the audit of the quality assurance program (see Activity Report 11/29/2013). They have nearly completed their causal analysis and are developing proposed resolutions for the finding on the corrective action program. They are starting the causal analysis for the finding on the quality assurance program. The contractor also provided a proposed format and content for the Managed Improvement Plan requested by ORP to address systemic issues.

**Plutonium Finishing Plant (PFP).** The site rep met with Richland Operations Office (RL) and contractor staff to discuss the plans for removing remaining gloveboxes from the facility. The contractor said they still need to develop work packages for many of these gloveboxes but believe that the time to develop and approve them will be significantly shorter than in the past. The contractor also hopes to use foam or a foam-like material in a number of the remaining gloveboxes so that they can be size-reduced, possibly outside of the facility in a confinement tent (see Activity Report 8/23/2013). Additionally, the contractor discussed the gloveboxes that will remain in place while the facility is dismantled, including some that may have significant TRU holdup. The contractor noted that when they revise the safety basis to more accurately reflect the hazards that remain in the facility, the D&D efforts will become easier (see Activity Report 12/6/2013).

The contractor completed the Technical Description that will be used by their senior management to provide RL with the recommended level of readiness review for foaming and subsequent size reduction of gloveboxes, piping systems, and other equipment at PFP. The document notes that it is a restart of size reduction activities that were last performed in April 2011. The contractor expects the readiness review to occur in August 2014 and will begin the work the following month.