

DEFENSE NUCLEAR FACILITIES SAFETY BOARD

February 3, 2017

TO: S. A. Stokes, Technical Director
FROM: P. Fox and D. Gutowski Hanford Site Representatives
SUBJECT: Hanford Activity Report for the Week Ending February 3, 2017

Plutonium Finishing Plant. An ARA boundary CAM alarmed while the demolition team was consolidating a pile of debris. Demolition activity was stopped and workers took action per the pre-planned response for a boundary CAM alarm. Subsequent surveys found contamination in the RBA located next to the HCA/ARA, but none was found outside of the facility boundary. Although elevated contamination levels were found on equipment within the demolition area, no workers were contaminated. The contractor is performing recovery actions and evaluating additional actions to improve the control of contamination when demolition resumes.

A worker assigned to remove ceiling plaster to provide access for removal of asbestos insulation from piping systems accidentally cut into a sanitary water system supply pipe. Spray from the pipe activated a heat detector causing a fire alarm. The combination of the cut pipe and fire alarm caused workers to believe that the pipe was part of the fire main system. The incorrect identification delayed isolation of the leak, resulting in the release of an estimated 500 gallons of uncontaminated water into a HCA/ARA. The contractor has noted a rising trend in adverse events and will pause work on Monday to provide information and training related to recent events to refocus the workforce. The contractor is also working to move the 234-5Z to a cold and dark status to reduce the risk related to ongoing intrusive demolition preparation activities.

Waste Treatment Plant (WTP). The contractor briefed ORP management on a draft PDSA revision for the HLW facility that differs from the approach outlined in the existing Safety Design Strategy. The contractor stated that revised consequence calculations support the downgrade of some controls from safety-class/seismic category I to safety-significant/seismic category III. These include the building structure, the confinement ventilation system, and the seismic switch. ORP has not yet evaluated this proposal or reviewed the supporting calculations.

ORP finalized the report of their audit of the WTP contractor quality assurance (QA) program. It indicates that, in general, the QA program adequately implements requirements. However, the audit determined that the contractor needs to perform additional work to resolve one significant finding from a 2013 QA program audit. Additionally, the audit identified 22 new findings.

242-A Evaporator. The contractor met with ORP to discuss the next evaporator campaign and compliance with DOE Order 425.1D *Verification of Readiness to Start up or Restart Nuclear Facilities*. Although the evaporator campaign will occur longer than twelve months after the last campaign, the contractor believes that, per the intent of the order, the evaporator has not been shutdown and a Readiness Assessment is not required. Instead they proposed to perform an Operational Readiness Checklist prior to the campaign. ORP is evaluating this position.

Tank Farms. Due to a concern regarding pathogenic contamination, respiratory protection equipment issuance was curtailed until decontamination and cleaning could be completed on equipment and facilities. Respiratory protection equipment was only issued for TSR and other compliance activities on Thursday dayshift until the disinfection was completed.