

DEFENSE NUCLEAR FACILITIES SAFETY BOARD

September 3, 2021

TO: Christopher J. Roscetti, Technical Director
FROM: B. Caleca, P. Fox, and P. Meyer, Hanford Resident Inspectors
SUBJECT: Hanford Activity Report for the Week Ending September 3, 2021

Tank Side Cesium Recovery (TSCR) System: An independent contractor team completed an assessment of the contractor's readiness to startup the TSCR system (see 8/20/2021 and 8/27/21 reports). The team identified four findings in the areas of emergency response planning, training, startup planning, and information technology system readiness that must be resolved prior to start of TSCR operations. The team's overall determination was that, subject to satisfactory resolution of pre-start findings and remaining items on the manageable list of pre-start items identified during the management self-assessment, the Tank Operations Contractor (TOC) has adequately demonstrated readiness of equipment, procedures, and personnel to safely commence TSCR nuclear operations. A DOE team will also perform a separate readiness assessment later this month.

Liquid Effluent Retention Facility (LERF): The contractor Plant Review Committee (PRC) met to evaluate changes to the existing justification for continuing operation (JCO). The original JCO was put in place when the TOC determined that an unreviewed safety question existed after solids were discovered in basin 44 that challenged material-at-risk assumptions related to the LERF hazard categorization (see 10/23/20 report). The JCO controls primarily focused on the prevention of fires or other operational activities that might cause a release of the solids to the environment. The JCO was subsequently modified to allow work to remove the solids and replace the basin cover (see 4/23/2021 report). The contractor recently completed the removal of these solids from the basin and staged them in a controlled area near the basin. This JCO modification reduces the scope of area affected by the fire hazard controls to the controlled storage area and restores the contractor's ability to perform normal LERF operational activities. The TOC is developing a new documented safety analysis that will address the hazards identified in the JCO and allow the JCO to be closed. In addition, the JCO may be terminated once basin 44 solids have been shipped from the controlled storage area. The PRC voted to recommend approval of the modification. The TOC sent the modification to DOE for approval.

Hanford Site: The Mission Integration Contractor completed modifications to the chlorine detection and alarm system that eliminate the cause of the chlorine alarms that resulted in two "take cover" events in the site's 200W area (see 8/13/2021 report).

The Central Plateau Risk Management (CPRM) shift office activated its Facility Emergency Response Organization (FERO) and then placed the 200W Area into a take cover when two work crews working east of the REDOX canyon facility reported solvent odors. The Hanford Site subsequently activated its Event Coordination Team (ECT). The ECT coordinated efforts by Hanford Fire, Hanford Patrol, and the CPRM FERO to perform industrial hygiene surveys to verify no chemical hazard existed. This allowed them to first reduce the size of the affected area and then, later, fully lift the take cover. The source of the odor has not been determined.

Plutonium Reclamation Facility (PRF): The last cans of PRF debris were packaged and shipped from the Plutonium Finishing Plant (PFP) work control area. The project will perform additional characterization before placing a soil cap and down posting the PFP footprint.