

DEFENSE NUCLEAR FACILITIES SAFETY BOARD

July 11, 2025

TO: Technical Director
FROM: Hanford Site Resident Inspectors
SUBJECT: Hanford Activity Report for the Week Ending July 11, 2025

Low-Activity Waste (LAW) Facility: HFO authorized BNI to proceed into hot commissioning in accordance with the approved startup plan.

DNFSB Staff Activity: A staff team was onsite to review maintenance and testing of high-efficiency particulate air (HEPA) filter systems used to ensure airborne radioactive material is confined to tanks and facilities. The team met with HFO and contractor subject matter experts (SMEs) and walked down the T Plant confinement ventilation system. The team also visited calibration laboratories at the Columbia Generating Station and the Pacific Northwest National Laboratory, which calibrate equipment used for HEPA filter testing on the Hanford Site.

Tank Farms: The H2C Corrective Action Review board (CARB) met to evaluate the results of a causal analysis performed to determine the conditions that led to an unqualified individual standing watch as the Tank Farms Central Shift Manager, which resulted in a Technical Safety Requirement (TSR) violation (see 6/6/2025 report). The causal analysis team determined that H2C had not established a process for verifying qualifications for individuals assigned to fulfill the minimum required operations shift complement. To correct the cause, the team proposed that H2C create an integrated watchbill and implement a verification process in the electronic turnover system that would automatically verify the qualifications of individuals assigned to the watchbill. The associated operations procedure, which addresses turnover, would also be modified. The CARB members determined that the team had appropriately identified the cause of the event and that the proposed corrective actions would prevent future occurrences. The resident inspector agrees that the proposed approach addresses the underlying cause of the event and notes that the causal analysis completion was timely.

Following a leak test of the Tank Side Cesium Removal (TSCR) process, H2C personnel violated the TSR by blowing down the TSCR ion exchange columns prior to entering maintenance mode. At the fact-finding, participants noted that miscommunication between day and night shift personnel, procedure ambiguity regarding mode shift changes, and a mistake in using the digital tool used to document mode changes all contributed to the event. H2C management has restricted TSCR operations pending the development of corrective actions.

A resident inspector observed the kickoff of a commonality review prompted by a rise in TSR violations and reportable hazardous energy events over the past year, such as the violations above. Kickoff attendees included contractor performance assurance personnel, SMEs, senior H2C managers, and HFO oversight personnel. They discussed each relevant event, the results of event investigations, and effectiveness of corrective actions. Common elements of each event included gaps in procedures and programs, disciplined operations, technical rigor, and training, as well as potential corrective actions to address these common causes. The resident inspector noted open dialogue between all parties and agrees with their preliminary observations.