DEFENSE NUCLEAR FACILITIES SAFETY BOARD

December 24, 2014

TO: S. A. Stokes, Technical Director
FROM: P. Fox, D. Gutowski and R. Quirk, Hanford Site Representatives
SUBJECT: Hanford Activity Report for the Week Ending December 26, 2014

R. Quirk was off site this week.

Tank Farms. ORP informed the contractor that they intend to revise the list of directives contained in the existing contract to include DOE Standard 3009-2014. The revised standard will be applied for new facilities, major modifications, and existing facilities where mitigated offsite doses exceed the evaluation guideline. DOE Standard 3009-94 Change Notice 3 will continue to be applied to existing facilities. The contractor is evaluating the impact of applying the requirements of DOE Standard 3009-2014 to design of the Low Activity Waste Pretreatment System. The contractor intends to perform this evaluation in conjunction with a similar evaluation regarding the impact of applying DOE Order 420.1C requirements to the design of the project.

Last Friday, the site reps observed the removal of a pump from Tank AY-102 (see Activity Report 10/24/2014). The pump lift was accomplished without significant problems. The highest dose rate detected by teledosimetry adjacent to the pump was 3 Rads/hour deep dose.

The contractor continued retrieval operations from single-shell tank C-102. Retrieval operations have been shut down periodically due to limited availability of required respiratory protection for field support personnel due to newly purchased masks having substantial differences from previously purchased version of the same model. The new masks have a high failure rate for worker fit tests. Large numbers of masks are required due to increased respiratory protection requirements in single-shell tank farms (see Activity Report 11/7/2014). Workers are being trained and fitted to additional models of masks to mitigate this problem. Retrieval operations were suspended again on 12/24/2014 when control problems were encountered with a sluicer arm.

The contractor is making final preparations for a transfer from double shell tank (DST) AP-103 to DST AW-102. The transfer is expected to occur next week and supports an upcoming 242-A evaporator campaign.

Plutonium Finishing Plant. The contractor repaired the Plutonium Reclamation Facility crane and returned it to service (see Activity Report 12/19/2014).

Waste Treatment Plant. The site reps observed the new castable refractory layer currently being installed in the Low Activity Waste Facility's Melter number 1.