

DEFENSE NUCLEAR FACILITIES SAFETY BOARD

November 11, 2005

TO: K. Fortenberry, Technical Director
FROM: B. Quirk and W. Linzau, Hanford Site Representatives
SUBJ: Activity Report for the Week Ending November 11, 2005

Waste Treatment and Immobilization Plant (WTP): A team of noted industry experts is conducting a comprehensive review of process and mechanical systems. The review is part of the increased oversight provided from the Department of Energy (DOE) and is being coordinated through Bechtel National, Inc. (BNI). The objective of the review is to evaluate the process technology, process equipment, and evaluate overall system operability. The scope of the review is in three parts: (1) Determine if any significant issues exist in the process flowsheet that could impact operational ability, (2) Evaluate if the process flowsheet is adequate to meet contract throughput capacities, and (3) Identify and categorize the risks in the process that could limit the plant's ability to meet contract requirements. The risks will be categorized as significant risks that should be resolved before startup and minor risks that can be resolved after startup. The review is scheduled to continue into next year, and a draft report to DOE is scheduled for February 28, 2006. The site reps will continue to follow the progress of the review.

The column anchor bolts for the Analytical Laboratory (Lab) were fabricated according to the drawing, but the drawing showed tack welds in the wrong location. The improper placement of the tack welds causes the strength of the anchors to be indeterminate. Roughly half of the bolts purchased have already been embedded in concrete. BNI has decided to replace the bolts not embedded and they are investigating how to disposition the defective bolts already installed.

Retrieval from Tank C-103: The site rep attended the CH2M Hill Hanford Group (CHG) Joint Test Working Group (JTWG) meeting for the review and approval of the Operational Acceptance Test for retrieval from tank C-103 using supernate from tank AN-106. The JTWG identified a number of minor errors that required correction before retrieval was authorized. Actual retrievals from tank C-103 to AN-106 began on Sunday, November 6.

The site rep noted that the cover sheet of an Engineering Change Notice associated with the retrieval included a note that an unreviewed safety question review was not required. CHG engineering management concurred that this was an error and initiated appropriate corrective actions.

K Basin Closure Joint Test Group (JTG): The site rep attended the JTG meeting for the Hose-in-Hose Booster Pump Station Qualification Test. The procedure includes tests such as motor rotation, start-up/shut-down sequence, and vibration tests. The procedure will be revised to incorporate design changes resulting from the Fluor Hanford review of the British Nuclear Group of America design. The procedure will also be revised to ensure that abnormal conditions included in the test will not damage equipment such as the pumps seals. The site reps will continue to monitor the JTG actions.
cc: Board Members