DEFENSE NUCLEAR FACILITIES SAFETY BOARD

September 12, 2008

TO:T. J. Dwyer, Technical DirectorFROM:M. P. Duncan and M. T. Sautman, Site RepresentativesSUBJECT:Savannah River Site Weekly Report for Week Ending September 12, 2008

P. Foster, A. Gwal, and B. Sharpless were at SRS to review the electrical systems for H-Canyon, HB-Line, the Salt Waste Processing Facility, and the Waste Solidification Building.

Tank Farms: In response to Readiness Assessment (RA) findings, management spent a few weeks improving conduct of operations associated with Tank 18/19 mechanical waste removal activities. When the dry run was repeated for the RA team, there was a noticeable improvement in the rigor of the pre-job briefing, the interface between facility operations and subcontractor staff, and the subcontractor's conduct of operations. (See 8/15/08 and 8/22/08 reports).

Acid cleaning significantly reduced the differential pressure in the Decontaminated Salt Solution coalescer, but the pressure quickly increased after resuming processing. (See 9/5/08 report).

The Site Rep observed an oral assessment for a systems engineer and suggested asking scenario questions that require the candidate to apply their systems knowledge. (See 6/6/08 report).

F-Canyon: When the Site Rep observed workers unpacking an overpacked drum, it was hard for them to remove the long stem filter from the overpack lid. Rather than suspending the procedure per the Conduct of Operations Manual, the Operations and First Line Managers directed the operators to perform steps out of order. Spacers may be used for future overpacks because the operators struggled to attach the drum grappler to the inner drum. (See 8/29/08 report).

Tritium Facilities: The Site Rep observed ongoing open glovebox maintenance to replace several zeolite beds in H-Area New Manufacturing, which will take several weeks. There were several expired tags/stickers in the room, including a quality assurance hold tag and two inspection stickers on powered lifting equipment. One appeared to have been recently operated. Further investigation determined that all of them should have been removed and that there was no underlying issue. However, prompt disposition of obsolete or expired tags and labels is important to help avoid a situation where operators will learn to ignore them in the future.

L Area: The Site Rep observed the receipt and storage of dry fuel storage containers in the slug vault. Good conduct of operations was exhibited during the observed portions.

H-Canyon: After the existing uranium solution in the receipt tank was transferred out, gadolinium was added and transfers from HB-Line resumed. (See 8/1/08 and 8/8/08 reports).

Savannah River National Laboratory: Two researchers were contaminated on their skin and clothing while repairing an instrument with a plugged valve. The hazard analysis assumed that the there was no potential for radioactive contamination in this valve. When they disconnected various lines and disassembled the valve, they were not always wearing gloves or a lab coat as it was not required. One had a maximum of 100,000 dpm/100 cm² beta-gamma on his hands and the other had a maximum of 80,000 dpm/100 cm² beta-gamma on his forearm. No airborne contamination was detected. The facility's initial response to the event was good.