

DEFENSE NUCLEAR FACILITIES SAFETY BOARD

July 29, 2005

MEMORANDUM FOR: J. Kent Fortenberry, Technical Director
FROM: J. S. Contardi/M.T. Sautman, SRS Site Representatives
SUBJECT: SRS Report for Week Ending July 29, 2005

Mr. Sautman was out of the office this week. Staff member Dan Ogg was onsite this week performing site rep duties.

Depleted Uranium Wastes: On May 31, 2005, site operators made the last shipment of depleted uranyl nitrate (DUN) to a private vendor in Tennessee for stabilization and shipment to the Nevada Test Site (NTS) for final disposition (Site Rep weekly 8/13/04). This week, the vendor made the final shipment of stabilized DUN to NTS.

Currently, the Savannah River Site (SRS) contractor is storing more than 30,000 drums of depleted uranium oxide in seven buildings across the site. This material is stored in 55-gallon drums, some of which have been overpacked due to drum integrity concerns. The contractor has been retrieving the drums for shipment via rail to Envirocare in Utah. This year, the contractor has completed 32 shipments containing approximately 3,000 drums. As a result of these efforts, one previous storage building has been demolished and a second will be razed soon.

Defense Waste Processing Facility (DWPF): As planned, the contractor entered a non-pour outage for DWPF on July 24th (see last week's site rep. report). While evaluating the planned maintenance activities, the contractor decided to extend the outage through the first week of August so that electrical work may be performed as well. Earlier this week, the contractor shut down the 2-H Evaporator due to a stuck back flush valve between the evaporator and the drop tank. The valve has since been cleared and the evaporator restarted. In order to gain significant tank space, the 2-H evaporator must achieve a high attainment while DWPF is in the outage.

Transuranic (TRU) Waste Processing: The number of TRU waste shipments from SRS is expected to decline significantly in the next several months due to competing demands for TRU waste shipments from the Idaho National Laboratory (INL). Direction from the Carlsbad Field Office indicates that the reduction at SRS will be temporary and the shipping rate will return to 16 shipments per month by January 2006.

Neptunium Processing: Recently, analysts at the Savannah River National Laboratory (SRNL) confirmed that one 9975 package of neptunium oxide contained moisture exceeding 0.5 weight per cent (Site Rep weekly 7/1/05). Site managers decided to return the 9975 to HB-Line for recalcination. A review of process logs indicated that less than adequate purge flow led to incomplete calcination of neptunium oxalate. Laboratory analysis by F/H laboratory found that a second can contained greater than 0.5 weight per cent moisture and high impurity levels. However, SRNL analysis of a sample from the same filter boat did not agree with the F/H laboratory findings. An evaluation to determine the cause of the discrepancy has begun and should be available by mid August.