

DEFENSE NUCLEAR FACILITIES SAFETY BOARD

March 28, 2008

TO: J. Kent Fortenberry, Technical Director
FROM: M. P. Duncan and M. T. Sautman, SRS Site Representatives
SUBJECT: SRS Weekly Report for Week Ending March 28, 2008

Solid Waste Management Facility (SWMF): A few years ago, it was recognized that the SWMF Documented Safety Analysis (DSA) lacked the technical rigor expected of contemporary DSAs. A complete revision of the DSA was initiated while a series of Justifications for Continued Operations were approved to allow waste management activities to continue in the interim. This week, the contractor commenced a Readiness Assessment for the implementation of the new DSA. The new DSA will allow certain noncompliant containers to be moved and activities (e.g., venting bulged drums) not currently authorized to be performed. Once the DSA is implemented, some noncompliant containers will require the immediate entrance into Limiting Condition for Operations because of their proximity to combustible material.

H-Canyon: While performing a Technical Safety Requirement functional test of the 9.2 evaporator high temperature interlock, a mechanic accidentally removed the leads for the 9.1 evaporator, which was operating. A second mechanic, who was acting as a peer inspector, signed the procedure indicating that the three correct leads had been removed. This action tripped the interlock and shut down the evaporator. The alarm control modules for both High Activity Waste evaporators were next to each other and not clearly labeled. The primary mechanic stated that he knew which module was the correct one, but that he became distracted and lifted them from the wrong module.

The contractor performed a calculation to determine the H Area Ventilation Stack pressure drop following a seismically-induced collapse of the stack liner. A Site Rep review of the calculation identified that while the wrong formula was shown in the calculation for the height of the rubble pile, the correct formula was used in the associated computer program that actually calculated the height. The Site Rep has also provided questions about the computer model used to analyze the performance of the canyon exhaust system following the collapse of the stack liner.

F Tank Farm: While taking a turbidity measurement, it appears that an operator cut through a glovebag glove and his two rubber gloves while performing a cut with a pair of scissors. Although his cotton glove liners measured 300,000 dpm β - γ , there was no skin contamination.

235-F: SRS is implementing remote monitoring of 235-F by providing video and audio monitoring capability of critical alarms from another F Area facility. While rounds will continue to be performed every shift, 235-F will no longer be required to be continuously manned. From the remote control room, the Site Rep observed an Emergency Preparedness drill that was part of a Management Self Assessment that began this week. The few minor issues noted by the site rep were also noted by the drill controllers. The facility declared that the drill was satisfactory but identified the need to fix some minor issues with communications and the conduct of operations.

Safety Basis: SRS completed an assessment of the potential impact of applying DOE-EM's interim guidance on consequence assessment methodology to the Liquid Waste Operations facilities (see 1/25/08 weekly). The impacts to the calculated co-located worker doses required additional evaluations for 15 events in the Tank Farms DSA. Of these, 4 may require new credited safety-related controls.