

## DEFENSE NUCLEAR FACILITIES SAFETY BOARD

June 25, 1999

**TO:** G.W. Cunningham, Technical Director  
**FROM:** David T. Moyle, Oak Ridge Site Representative  
**SUBJ:** Activity Report for Week Ending June 25, 1999

Paul Gubanc was in Nevada this week attending the DOE facility representative meeting. Ralph West was at Y-12 this week reviewing the HF system.

### A. Y-12 Hydrogen Fluoride (HF) System for Enriched Uranium Operations (EUO):

1. **Project Status** - There are several concurrent efforts to correct deficiencies with the HF system and bring it on line. Currently, testing is the controlling path toward project completion.
2. **Independent Assessment** - The assessment team is tasked to review current HF issues and determine if their full extent has been identified, determine the causes for these deficiencies and propose corrective actions to minimize recurrence. The review covers: (1) welding, inspection and surveillance; (2) engineering design review; and (3) procurement operations. The team began its review this week and may continue into mid-July.
3. **Configuration Control** - Since last week there has been some improvement in the control and tracking of temporary modifications (TMs). A management assessment was completed, noting several deficiencies but no significant safety issues. Proposed corrective actions include formal training of process engineers on the TM process and more prescriptive requirements on shift manager review of the TM log. In the mean time, documentation has been prepared for five of seven TMs on the HF system and the final two should be documented next week. Also, the shift manager's log has been substantially cleaned up to reflect only current plant wide TMs.
4. **Authorization Basis** - The Basis for Interim Operations (BIO) and the Operational Safety Requirements (OSRs) are nearing completion and are expected to be approved by LMES by the end of next week. Still, there are two safety controls for the process that have not been defined or designed - (1) verified operation of the B-1 Wing scrubber (HF release prevention) and (2) exhaust of the reduction fluid bed chamber (hydrogen explosion prevention). These may require revision of the updated BIO/OSRs. (I-A, II-B)

B. Building 9215 OSR Violation: On June 17, four individuals entered an area in building 9215 without radiation detection and alarm equipment to perform preventative maintenance on fans. The area was posted as a criticality accident alarm system (CAAS) inaudibility area which required shift manager approval and radiation detection and alarm equipment for entry. This event was recognized by 9215 management as an OSR violation on June 22. The work was performed under a generic job hazard analysis / job hazard identification (JHA/JHI) which failed to identify inaudibility conditions. As an immediate action, the critique team proposed physical control of known CAAS inaudibility areas by locking doors and forcing personnel to see the shift manager for access. (I-A, II-B)

C. Prioritization of Post-Operations Activities: Preliminary discussions with DP and EM management indicate there is little forward thinking to transition facilities from operations to deactivation and decommissioning. EM prioritizes its activities based on the current scope of facilities under its purview. There is little evidence of communication between DP and EM at the site level to prioritize changes in facility missions. The site relies on DOE headquarters decision making which is generally budget driven. Thus, some facilities at Y-12 may sit in an inactive state under DP for extended periods of time. (III-B)

cc: Board Members