

## DEFENSE NUCLEAR FACILITIES SAFETY BOARD

April 20, 2001

**TO:** J. Kent Fortenberry, Technical Director  
**FROM:** Paul F. Gubanc and David T. Moyle, Oak Ridge Site Representatives  
**SUBJ:** Activity Report for Week Ending April 20, 2001

Staff member Coones was at Y-12 Thursday to follow up on fire protection issues. Mr. Gubanc toured the BWXT-Lynchburg facility on Friday.

A. Y-12 Enriched Uranium Operations (EUO) - Reduction: On Thursday, after verifying closure of all prestart issues, YAO officially authorized BWXT to resume reduction and primary extraction pour-up operations. We will observe reduction first use operations in the next two weeks. (1-C, 2-A)

B. Y-12 Fire Protection: On Thursday, we were briefed on the new BWXT fire protection corrective action plan. The plan focuses on preparing and improving fire hazards analyses and engineering analyses; improving test, maintenance and inspection (TMI) activities; reducing the backlog in system impairments; and reducing the excessive use of compensatory measures. Some items discussed:

1. There were 1400 TMI activities not performed in FY2000, including no fire detection system testing since the new system was installed two years ago. This trend has continued in FY2001.
2. BWXT claims to have reduced the impairment backlog by 37% recently, but most were paper changes. Additional impairment reductions will be achieved by revising test acceptance criteria.
3. Improvements are being made to the site wide fire alarm system, replacing the vendor-supplied lightning transient protectors (LTPs) with another brand to decrease the system vulnerability to lightning. The original components were found to be improperly fabricated.
4. The number of impaired or disabled devices on the fire alarm system has been slightly reduced. Resolution of system communication issues is waiting on BWXT to pay for a vendor specialist to diagnose and correct component-level problems.

Despite corrective actions, the staff pointed out that BWXT has not addressed the potential life safety impacts resulting from so many fire protection program deficiencies. (1-C)

C. Y-12 Modernization: This week, Mr. Gubanc met with the BWXT Director for Engineering & Projects and attended the monthly projects status meeting.

1. The HEU Materials Facility (HEUMF) is now proceeding on a design-bid-build path (i.e., no longer a fixed-price design-build). BWXT provided the Technical Safety Basis to YAO last week. Current plans are to award a design contract to an Architect/Engineer by early next year.
2. An experienced Bechtel project manager, Mr. Asa Kelly, arrived at Y-12 in early March and has assumed responsibility for all Y-12 projects and the HEUMF in particular. Mr. Kelly effectively ran the monthly project meeting (attended by the YAO Manager and BWXT General Manager) and identified some specific areas of needed project management improvement at Y-12.
3. BWXT has been depending on YAO to communicate to the Board staff on their projects-related actions and status; this has not occurred.
4. The corrective action plan (CAP) previously developed by LMES/YAO in response to the Board's letter of November 9, 1999, is not being utilized. No action has been taken with the Board to supplant that CAP with the actions BWXT and YAO are actually taking (e.g., importation of Bechtel-Nevada PM procedures). Gubanc continues to stress to YAO and BWXT that the Board's goal is to see the fundamental issues addressed (e.g., project management, QA, engineering, procurement, line management involvement), not the completion of a CAP. (1-C)

cc: Board Members