

DEFENSE NUCLEAR FACILITIES SAFETY BOARD

MEMO TO: J. Kent Fortenberry, Technical Director
FROM: Timothy Hunt and Dave Kupferer, Pantex Site Representatives
DATE: 31 August 2007
SUBJECT: Pantex Plant Weekly Report

DNFSB Staff Activity: B. Laake was at Pantex to observe the second week of the W80 SS-21 disassembly and inspection Nuclear Explosive Safety Study. B. Broderick was at Pantex to observe a NWC Lightning Committee meeting and augment site rep coverage.

W80 SS-21 Startup: This week, BWXT concluded its contractor readiness assessment (CRA) and NNSA completed its Nuclear Explosive Safety Study (NESS) to independently evaluate whether line management was prepared to commence W80 SS-21 disassembly and inspection operations. The CRA team identified 7 pre-start findings and 2 post-start findings. The pre-start findings included procedure content and performance errors. The review team also observed that the requirements of DOE Standard 1186, *Specific Administrative Controls* (SACs), had not been met. The NESS did not identify any findings. However, PXSO has developed several of its own concerns based on the deliberation topics from the NESS including potential procedural and tooling improvements. The NNSA readiness assessment is expected to begin next week.

Separations Testing (Sep Test): Last week, NNSA convened an Operational Safety Review (OSR) to evaluate ongoing Sep Test operations. The OSR demonstrations (which are performed on war reserve units) were postponed due to a suspension of operations involving lifting and rotating fixtures. The OSR plans to reconvene in two weeks. An expiring NESS of Sep Test operations was performed in 2002. The NNSA approval letter for the 2002 Sep Test NESS describes two actions NNSA wanted to be completed within 90 days of the approval: an evaluation of the ability of the safety catch and brake system to perform its safety function and a laboratory evaluation of two specific scenarios to determine whether additional controls are warranted. It appears that neither of these actions were completed.

Lightning: Last month, an NNSA Bays and Cells NES Master Study concluded, pending approval of the final report, that a lightning scenario resulting in an induced voltage in a coupled circuit (task exhaust, unit, flooring) is not sufficiently analyzed or controlled. To resolve this finding, BWXT developed an analysis that concludes that the scenario is extremely unlikely and PXSO has accepted the risk. In addition, BWXT issued a supplemental procedure that instructs the production technicians to discontinue certain task exhaust operations during lightning warnings. It is unclear why this type of direction was disseminated through a supplemental procedure as opposed to a standing order. In addition, the Nuclear Weapons Complex (NWC) Lightning Committee met at Pantex this week. The previously established consensus path forward for addressing outstanding issues appears to have been altered since the last meeting due to site office pressure to meet existing milestones for issue resolution.

Extended Work Hours: Last November, an anonymous letter was sent to BWXT management from an anonymous group of BWXT employees that asserted, among other concerns, BWXT's employees were being overworked to meet production goals. Six months earlier, in March 2006, BWXT had issued an internal work instruction that limits employee work hours to no more than 16 hours in any 24-hour period, 26 hours in any 48-hour period, and 72 hours in any 7-day period. In addition, employees are not supposed to work more than 14 consecutive days without at least two consecutive days of rest. Emergency exemptions to these limits can be obtained and requires supervisor approval. From January through July of this year, more than 700 exemptions to these limits were approved (not including the security guards or fire fighters), more than 150 of which were within the Manufacturing Division.