DEFENSE NUCLEAR FACILITIES SAFETY BOARD

MEMO TO:Steven Stokes, Technical DirectorFROM:David Andersen, Acting Pantex Site RepresentativeSUBJECT:Pantex Plant Report for Week Ending June 19, 2015

Emergency Drill: On June 16, 2015, the Acting Site Representative observed an emergency drill from the Pantex Emergency Operations Center (EOC). The drill tested the site's response to a simulated material release from Zone 12 South and included the demonstration of new plume modeling software to assist the EOC in responding to a material release event. In addition, the drill included radiological technicians taking measurements in the field, along the simulated contamination pathway, and reporting measurement results back to the EOC. At the conclusion of the drill, participants gathered to share lessons learned to improve the effectiveness of the response.

Disassembly Operation Pause: On June 17, 2015, Consolidated Nuclear Security, LLC (CNS), paused a nuclear explosive disassembly operation after an unexpected condition was encountered during a lifting operation with a vacuum fixture. The Acting Site Representative observed the unit in its paused configuration and observed the Production Section Manager and personnel from the Nuclear Explosive Safety (NES), Safety Analysis Engineering, and Process Engineering departments deliberate on how to proceed. Once CNS made a decision, the Acting Site Representative observed Production Technicians (PT) place the unit into a safe and stable condition. Since this situation is not addressed by the Nuclear Explosive Operating Procedure, CNS is preparing a Nuclear Explosive Engineering Procedure to identify the steps on how to proceed with disassembly.

Facility Lighting: While performing a walkdown of a nuclear explosive facility, the Acting Site Representative observed similar lighting issues in the same facility as noted last week by the Acting Site Representative (see 6/12/15 report). The PTs paused their activities due to an unrelated condition before the room's lighting momentarily flickered. The recurrence of the lighting issue highlights the possibility that it could have affected work during a critical step of a nuclear explosive operation and presents a potential safety concern.

NES Change Evaluations (NCE): This week, a NES Study Group (NESSG) performed two separate NCEs, one pertaining to a detonator cable assembly (DCA) removal issue (see 2/13/15 and 6/12/15 reports) and the other on the infrared flame detection sensor upgrades planned for the fire protection systems in bays and cells. Neither NCE identified any findings. Related to the DCA NCE, members of the NESSG raised concerns about grit accumulation and the security risk of leaving the unit in its current configuration for an extended period of time. The NESSG proposed an operational step to clean the unit and remove excess grit prior to the removal of the DCA. On June 16, 2015, the NNSA Production Office issued a Safety Evaluation Report approving the Justification for Continued Operations for disassembly of the affected unit with no conditions of approval.

Loss of Power Events: CNS is planning an outage to make repairs related to recent loss of power events (see 5/22/15 and 6/12/15 reports). The cause(s) of the electrical problems has still not been identified. Additional testing is being planned to continue to investigate the cause.