

DEFENSE NUCLEAR FACILITIES SAFETY BOARD

September 16, 2016

MEMO TO: Steven Stokes, Technical Director
FROM: Ramsey Arnold and Zachery Beauvais, Pantex Site Representatives
SUBJECT: Pantex Plant Report for Week Ending September 16, 2016

DNFSB Staff Activity: R. Tontodonato was on site to provide site representative support.

Lightning Standoff: Last week, the site representatives observed a coiled portion of an air hose enter a region of a nuclear explosive bay marked as a standoff for lightning protection. After consultation with CNS and NPO subject matter experts, the site representatives communicated this observation to CNS management who initially determined that the configuration violated the Pantex lightning protection control operating procedure (OP). Production management has briefed PTs on the possibility for this to occur during operations. This week, CNS held a critique to further discuss the safety concern. CNS stated that while the OP and lightning standoff is only in effect during lightning warnings, it is implemented at all times as a best business practice. The site representatives provided feedback to CNS and NPO management that there are aspects of the OP that are not fully understood by the entire plant population, and that the procedure could be written more clearly to flow down Technical Safety Requirements (TSR). Additionally, the procedure interpretation appears to contradict the Specific Administrative Control (SAC) that states the lightning standoff requirements shall be maintained at all times. CNS plans to hold a causal analysis mistake proofing (CAMP) meeting to identify corrective actions.

TSR Violation: CNS held a critique to better understand the events that led to a TSR violation for not completing a surveillance requirement (SR) within the prescribed period. CNS fire protection engineering (FPE) recently consolidated multiple facility annual maintenance procedures into one procedure. During the consolidation, a SR, which only applies to one facility, to verify that a system control valve is open and locked was inadvertently not included in the procedure. The FPE validation review did not catch the error. Last week, FPE realized that when the procedure was executed in June, the SR had not been completed. Upon discovery, CNS took action to perform a PM to verify the valve was open and locked. Additionally, CNS has paused authorization of any similar FPE procedures that are being consolidated until they are verified to contain all necessary steps including SRs.

TSR Violation: During scheduled PM on a nuclear explosive bay crane, SMIs were unable to move the crane back to its approved parking location due to crane malfunction. The crane had been moved to begin the PM, and in doing so, blocked the line of sight between a flame detector head and a unit in the facility. FPE was notified and made the determination to enter the required Limiting Condition of Operation appropriately. However, prior to exiting the facility, CNS did not address the SAC to park the facility crane in an approved location or establish the stuck crane position as an approved location. CNS and NPO are aware that the LCO and SAC are not effectively aligned and will be holding a CAMP meeting to identify corrective actions.

NPO Safety Evaluation Report (SER): NPO issued a SER to approve a CNS authorization basis change package that incorporates electrostatic discharge hazards and controls for a specific weapon program into the hazard analysis report and closes the Justification for Continued Operations. Most notably, the SER approves the usage of new, inherently dissipative containers in lieu of bonding controls on the containers previously in use (see 3/27/15 and 6/12/15 reports).