DEFENSE NUCLEAR FACILITIES SAFETY BOARD

September 2, 2016

MEMORANDUM FOR: S.A. Stokes, Technical Director **FROM:** R.K. Verhaagen and J.W. Plaue

SUBJECT: Los Alamos Report for Week Ending September 2, 2016

DNFSB Staff Activity: D.J. Brown observed federal readiness activities for Plutonium Pyrochemistry Operations on Monday through Wednesday. C.T. Beaty observed the player hotwash and evaluator critique from last week's full-scale exercise on Monday and Tuesday.

Plutonium Facility–Issue Recurrence: On Thursday, Plutonium Facility management issued an extent-of-condition review on the use of cheesecloth with nitric acid and plutonium-238 (see 8/19/16 weekly). They elected to issue the extent-of-condition review in lieu of a technical white paper defending the practice due to the number of internal peer review comments received on the draft white paper and more importantly, a recognition conveyed in the transmittal email that they should not have generated these materials and do not intend to generate them in the future. The review utilized the Waste Compliance and Tracking database and identified that of the 2513 waste containers generated since 2010, 174 may contain cheesecloth and plutonium-238. Of these, 84 were generated as a result of aqueous scrap recovery operations that use nitric acid, but none mention the word spill in the comments section of the records. They did identify two containers with plutonium-239 and comments indicating the presence of these materials and the word spill. The memo indicates that this validates the usefulness of the comments field. However, the Site Representatives note the waste visual inspection procedure does not provide operators details on what should be populated in the comments field. The cheesecloth from the June spill remains in three pipe overpack containers not yet declared as waste, and is expected to be reintroduced into a glovebox for treatment.

Federal Oversight: On Wednesday, the leader of the team that conducted an Organizational Health Assessment of the NNSA Field Office briefed the results of the review at a field office all hands meeting (see 6/10/2016 weekly). The team's objective, executed primarily through interviews, was to identify challenges to enhancing organizational effectiveness for a nuclear safety environment, including follow-up on a number of recent employee concerns raised regarding the manner used for resolution of divergent views on issues. The team identified opportunities for improvement in four general areas including leadership, learning, establishing a respectful environment, and improving the differing professional opinion (DPO) process. The NNSA Field Office Manager briefed corrective actions taken or planned that most notably included: (1) establishing a senior review board to resolve divergent views on safety basis issues; (2) revising the field office procedure on the DPO process; (3) conducting inclusion training and making improvements to the Employee Concerns Program; (4) conducting 360 reviews for the leadership team; and (5) having NNSA headquarters concur on future safety basis approvals.

Confinement Vessel Disposition (CVD) Project: On Tuesday, CVD operators paused work when they noticed a tear in the bag being used to provide confinement while removing a vessel port cover. Operators responded by covering the tear with their gloves until they could tape the tear closed. During a fact finding of the event, LANL personnel discussed whether the appropriate actions were taken because a tear in the bag could represent a potential criticality safety process deviation which would require operators to immediately move away competing with the priority to take action to maintain confinement. Management concluded that the appropriate actions were taken and noted that the procedures governing the operation could more clearly identify the desired response in the event this occurs in the future.