DEFENSE NUCLEAR FACILITIES SAFETY BOARD

July 25, 1997

TO: G. W. Cunningham, Technical Director

S. L. Krahn, Deputy Technical Director

FROM: R. F. Warther, M. T. Sautman

SUBJ: RFETS Activity Report for Week Ending July 25, 1997

S/RIDs. Following a prolonged debate at the site, K-H and RFFO have agreed to discontinue further attempts to tailor DOE requirements specified in Appendix J of the contract. RFFO intends to replace the list of DOE Orders contained in Appendix J of the contract with a list of DOE's "three-digit" orders. K-H will use its Level One procedures (e.g., RadCon Manual, Criticality Safety Manual, HSP Manual) to implement the DOE requirements. The staff has conducted multiple reviews of these Level One documents and concluded that they adequately incorporate the DOE requirements and appropriate industry standards beyond the DOE Orders. The Site Reps and Cog Engineer view this decision positively because it demonstrates K-H's recognition that occurrences and safety issues are rooted in (1) implementing procedures within the facilities and (2) operator training and readiness as opposed to problems with the DOE orders. K-H plans to task functional area managers to work with facility management (e.g., facility managers, operations managers, job supervisors) to improve the Level One procedures rather than rewriting them in the abstract setting of a standards group.

Shift Manager Qualification Board. The Site Reps observed a Shift Manager Qualification Board in B371. The Oral Board members passed the candidate. Although the candidate exhibited adequate knowledge of the facility based on the questions asked, the Oral Board members did not ask detailed technical questions. Additionally, following the Board, the members voted on whether the candidate passed or failed and agreed to discuss the candidate's strengths and weaknesses later rather than providing immediate feedback. As a result, the true expectations of performance by building management are not clear. The Site Reps have had ongoing discussions with the SSOC Training Manager, and will continue to press this issue.

Crimp and Seal. K-H completed crimp and seal activities this week for a reduced number of pits. Several pits were removed from the program scope only after work was well underway because program managers had not recognized their unique characteristics earlier. Examples included pits labeled "mock" that contained fissile material, a pit with external contamination, a pit with a special gas, pits with weld leaks, pits that could not be crimped, and pits that contained unexpected equipment or materials. These issues were only identified once a very experience worker was brought into the project. New dispositions now need to be determined for these pits. The Site Reps are working with Harry Waugh to identify any safety issues associated with these special pits.

Residues. More than 300 residue containers have been sampled so far in FY97 compared with only 69 in FY96. The Site Reps have summarized the available data in the attached table.

LANL has selected V_2O_5 as the preferred oxidant to reduce foaming during distillation. Although crucible corrosion by V_2O_5 is considered acceptable if the crucible is not reused, LANL has had difficulty getting more than 50 percent plutonium in the distillation heel when V_2O_5 is used.

cc: Board Members