

DOE F 1325.8
(08-93)

United States Government

Department of Energy

memorandum

DATE: February 21, 2007

Audit Report Number: OAS-L-07-07

REPLY TO

ATTN OF: IG-321 (A06LV019)

SUBJECT: Audit Report on "Device Assembly Facility Utilization"

TO: Deputy Administrator for Defense Programs, NA-10

INTRODUCTION AND OBJECTIVE

The Nevada Test Site's Device Assembly Facility (DAF) is a 100,000 square foot facility, built in the early 1990s at a cost of approximately \$100 million to consolidate all nuclear explosive assembly operations and provide a state-of-the-art environment for assembling test devices in preparation for underground testing. In 1992, shortly after the facility was completed, a moratorium was placed on underground nuclear testing. Since the moratorium, the DAF has been largely underutilized. Building logs indicate that in the past four years, for example, utilization of DAF buildings has ranged from 9 to 48 percent.

Program activities are underway that will increase DAF utilization. Specifically, the National Nuclear Security Administration (NNSA) is relocating the criticality experiments capability and category I and II special nuclear material from Los Alamos National Laboratory's Technical Area 18 (TA-18) to the Criticality Experiments Facility (CEF) being constructed at the DAF. Responding to congressional concerns over DAF utilization, NNSA reported to the Congress in May 2003 that it evaluated conducting certain weapons dismantlements and small-scale weapons surveillance activities, such as accelerated aging, at the DAF.

Beginning in fiscal year 07, DAF operating costs are expected to exceed \$34 million to achieve mission capability to support the limited activities currently at the DAF, as well as the criticality experiments mission. Our objective was to determine whether NNSA has identified viable missions to fully utilize the DAF.

CONCLUSIONS AND OBSERVATIONS

While transferring the TA-18 mission will increase DAF utilization, it will not fully utilize the facility. Even after the CEF construction is complete in 2010, projections indicate that 25 percent of the DAF's operational buildings will not be utilized.

NNSA explored other missions cited in the 2003 report and established the DAF Steering Group to review potential missions including:

- Interim storage of special nuclear material from Sandia National Laboratories (Sandia) related to nuclear material consolidation throughout the weapons complex. As of the end of 2006, the Steering Group approved, in part, the storage of specified quantities of materials from Sandia; however, NNSA has not calculated the related infrastructure costs.
- Temporary storage of uranium from the Y-12 site. In 2006, the Steering Group deferred this proposal since NNSA expressed concern that the DAF would become a designated nuclear material storage facility as opposed to an operational facility that utilizes its unique capabilities. The current status is pending for this proposed mission.

Finally, in December 2006, NNSA directed the Nevada Site Office to plan and implement an effort to conduct nuclear weapon operations by September 2009 at the DAF. Specifically, NNSA intends to use the DAF for low-volume efforts complementing the Pantex Plant's capabilities as a primary assembly and disassembly site. NNSA has not defined the scope of activities to be carried out at the DAF through this initiative. Accordingly, NNSA does not currently know whether additional activities will be needed for the DAF to achieve full utilization.

We noted that NNSA efforts to identify and assess the suitability of missions for the DAF have been hampered by the lack of a cost recovery model. As a result, NNSA cannot reliably determine whether mission activities can be performed more cost effectively by transferring them from their current locations to the DAF. NNSA is currently developing a cost model that it expects to be complete by mid 2007. Completing the cost model will assist NNSA in assessing future mission costs associated with transferring low-volume weapons dismantlement/surveillance work to the DAF, including costs associated with any additional infrastructure, personnel, transportation, and security requirements.

SUGGESTED ACTIONS

We suggest that the Deputy Administrator for Defense Programs ensure:

- Development of the cost recovery model is completed;
- Use of the model to determine which low-volume weapons dismantlement/surveillance work should be transferred to the DAF; and,
- Re-evaluation of DAF's utilization after beginning CEF operations and transferring low-volume weapons work.

SCOPE AND METHODOLOGY

We performed the audit between May 2006 and January 2007 at the Nevada Site Office in North Las Vegas, Nevada and at the Nevada Test Site in Mercury, Nevada.

To accomplish the audit objective, we reviewed DAF cost data from October 2002 through May 2006 and building access logs for projects and missions from October 2002 through

July 2006. We also reviewed Department policies regarding building utilization and interviewed key personnel.

The audit was conducted in accordance with generally accepted government auditing standards for performance audits and included tests of internal controls and compliance with laws and regulations to the extent necessary to satisfy the audit objective. Because our review was limited, it would not necessarily have disclosed all internal control deficiencies that may have existed at the time of our audit. During the audit, we assessed the Department's compliance with the Government Performance and Results Act of 1993, and found that NNSA did not have any performance measures associated with the audit objective. We did not rely extensively on computer processed data to support our analyses.

We discussed the contents of this report with Policy and Internal Controls Management on January 26, 2007, and they waived an exit conference. Since no formal recommendations are being made in this Letter Report, a formal response is not required. We appreciate the cooperation of your staff throughout the audit.



Joanne Hill, Director
National Nuclear Security Administration
Audits Division
Office of Inspector General

cc: Team Leader, Audit Liaison Team, CF-1.2
Audit Liaison, NNSA/Nevada Site Office
Chief of Staff