

GAO

Report to the Chairman, Subcommittee  
on Strategic Forces, Committee on  
Armed Services, U.S. Senate

June 2004

NATIONAL NUCLEAR  
SECURITY  
ADMINISTRATION

Key Management  
Structure and  
Workforce Planning  
Issues Remain As  
NNSA Conducts  
Downsizing



G A O

Accountability \* Integrity \* Reliability



Highlights of [GAO-04-545](#), a report to the Chairman, Subcommittee on Strategic Forces, Committee on Armed Services, U.S. Senate

## Why GAO Did This Study

The National Nuclear Security Administration (NNSA), a separately organized agency within the Department of Energy (DOE), is responsible for the management and security of the nation's nuclear weapons, nonproliferation, and naval reactor programs. NNSA oversees contractors that operate its facilities to ensure that activities are effective and in line with departmental policy. In December 2002, NNSA began implementing a major reorganization aimed at solving important long-standing organizational issues. GAO reviewed NNSA's overall reorganization efforts to assess (1) the extent to which it is addressing in practice the past problems concerning the unclear delineation of authority and responsibility, (2) workforce planning, and (3) its impact on federal oversight of contractor activities.

## What GAO Recommends

GAO is making recommendations to the Secretary of Energy and the Administrator of NNSA to increase the likelihood that NNSA's reorganization will achieve NNSA's goals of increased management discipline and contractor oversight. In its comments, NNSA agreed in principle with GAO's recommendations, but felt its ongoing efforts were not sufficiently recognized. We have recognized NNSA's efforts, but believe more needs to be done to ensure effective program management and contractor oversight.

[www.gao.gov/cgi-bin/getrpt?GAO-04-545](http://www.gao.gov/cgi-bin/getrpt?GAO-04-545).

To view the full product, including the scope and methodology, click on the link above. For more information, contact Robin Nazzaro at (202) 512-3841 or [nazzaror@gao.gov](mailto:nazzaror@gao.gov).

# NATIONAL NUCLEAR SECURITY ADMINISTRATION

## Key Management Structure and Workforce Planning Issues Remain As NNSA Conducts Downsizing

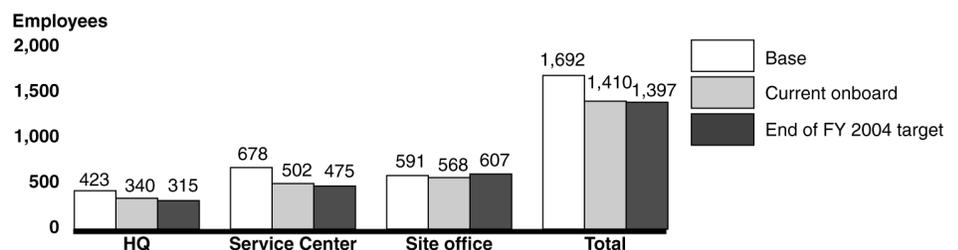
### What GAO Found

NNSA's reorganization has addressed some past problems by better delineating lines of authority and improving communication; however, NNSA has not formalized a program management structure that identifies program managers or details their responsibilities and qualifications as they relate to the direction and oversight of contractor activity under the new organization. Without first resolving such key management issues, NNSA cannot, among other things, ensure the improved discipline and accountability it seeks in managing its programs.

NNSA's reorganization is not likely to ensure that the agency has sufficient staff with the right skills in the right places because NNSA downsized its federal workforce without first determining the critical skills and capabilities needed to meet its mission and program goals. Consequently, NNSA will not know the composition of its workforce until it completes the 17 percent workforce reduction on September 30, 2004—the deadline specified in the reorganization plan—and then determines the knowledge, skills, and capabilities of its remaining employees. Without a functional long-term workforce plan, NNSA runs the risk of facing further, more serious staff shortages or skill imbalances, thereby diminishing its ability to adequately oversee its contractors.

NNSA's implementation of a proposed risk-based approach to rely more on contractors' assurances and self-assessments and less on NNSA's direct oversight may be premature because it has not yet established a program management structure or long-term workforce plan for ensuring sufficient staff with the right skills in the right places. Under this proposal, contractors will develop comprehensive assurance systems, or systems of management controls, and NNSA will primarily rely upon these contractor systems and controls to ensure that contractors properly execute their work. Although the overall concept of a risk-based approach to federal oversight has merit, NNSA's proposed transition to conduct less direct federal oversight could be compromised by outstanding reorganization issues.

### NNSA Workforce Downsizing Progress



Source: NNSA.

Note: This graph reflects NNSA's adjustments, as of March 6, 2004. It excludes certain offices not significantly affected by downsizing.

---

# Contents

---

<b>Letter</b>		<b>1</b>
	Results in Brief	4
	Background	7
	NNSA's Reorganization Has Delineated Lines of Authority, but More Clarification Is Needed for Specific Program Management and Oversight Functions	12
	NNSA's Reorganization Will Not Ensure Sufficient Staff with the Right Skills in the Right Places to Meet the Agency's Mission and Program Goals	16
	NNSA's Proposed Transition to Less Direct Federal Oversight Could Be Compromised by Outstanding Reorganization Issues	20
	Conclusions	24
	Recommendations for Executive Action	25
	Agency Comments and Our Evaluation	25
<b>Appendix I</b>	<b>Comments from the National Nuclear Security Administration</b>	<b>27</b>
<b>Appendix II</b>	<b>GAO Contact and Staff Acknowledgments</b>	<b>31</b>
	GAO Contact	31
	Acknowledgments	31
<b>Figures</b>		
	Figure 1: NNSA's Organization Prior to December 2002	9
	Figure 2: NNSA's New Organization	10

This is a work of the U.S. government and is not subject to copyright protection in the United States. It may be reproduced and distributed in its entirety without further permission from GAO. However, because this work may contain copyrighted images or other material, permission from the copyright holder may be necessary if you wish to reproduce this material separately.



G A O

Accountability \* Integrity \* Reliability

United States General Accounting Office  
Washington, DC 20548

June 25, 2004

The Honorable Wayne Allard  
Chairman, Subcommittee on Strategic  
Forces, Committee on Armed Services  
United States Senate

Dear Mr. Chairman:

For years, the Department of Energy (DOE) has experienced long-standing management problems with its nuclear weapons programs, including unclear delineation of management authorities and responsibilities that have contributed to significant cost overruns on major projects and security problems at the national laboratories.<sup>1</sup> In 1999, the Congress created the National Nuclear Security Administration (NNSA) under Title 32 of the National Defense Authorization Act for Fiscal Year 2000 to correct the problems that plagued DOE. NNSA, a separately organized agency within DOE, is responsible for the management and security of the nation's nuclear weapons, nonproliferation, and naval reactor programs. Since its inception, however, NNSA has experienced its own management and security problems.<sup>2</sup>

NNSA conducts nuclear weapon and nonproliferation-related national security activities in research and development laboratories, production plants, and other facilities.<sup>3</sup> Specifically, NNSA operates three national nuclear weapon design laboratories—Lawrence Livermore National Laboratory, California; Los Alamos National Laboratory, New Mexico; and the Sandia National Laboratories, New Mexico and California—and four nuclear weapons production sites—the Pantex Plant, Texas; the Y-12 Plant, Tennessee; the Kansas City Plant, Missouri; and the Savannah River Site,

---

<sup>1</sup>U.S. General Accounting Office, *Nuclear Weapons: Improved Management Needed to Implement Stockpile Stewardship Program Effectively*, [GAO-01-48](#) (Washington, D.C.: Dec. 14, 2000).

<sup>2</sup>See for example, U.S. General Accounting Office, *National Ignition Facility: Management and Oversight Failures Caused Major Cost Overruns and Schedule Delays*, [GAO/RCED-00-271](#) (Washington, D.C.: Aug. 8, 2000) and U.S. General Accounting Office, *Nuclear Security: NNSA Needs to Better Manage Its Safeguards and Security Program*, [GAO-03-471](#) (Washington, D.C.: May 3, 2003).

<sup>3</sup>The Office of Naval Reactors is managed as a separate entity within NNSA.

---

South Carolina, as well as the Nevada Test Site. To implement its programs, NNSA relies on site contractors to manage the day-to-day site operations and to adhere to DOE policies when operating the laboratory, production, or other facilities within the complex. Because many NNSA sites handle special nuclear material, including nuclear weapons, plutonium, and highly enriched uranium, effective federal oversight is critical to ensuring that national security, human health and safety, and the environment are not adversely affected.

For the last several years, we have monitored NNSA's efforts to implement Title 32. In April 2001, we testified that NNSA's efforts to establish a new organization looked promising.<sup>4</sup> However, among other things, we highlighted the need for NNSA to clearly define the roles and responsibilities of headquarters and field staff, and to establish clear lines of authority between NNSA and its contractors. In May 2001, in response to a series of external and internal studies detailing persistent management problems, NNSA announced plans to reorganize its headquarters operations. In December 2001, we noted that NNSA had set several important goals for its overall reorganization efforts, including establishing clear and direct lines of communication, clarifying the roles and responsibilities of NNSA's headquarters and field offices, and integrating and balancing priorities across NNSA's missions and infrastructure.<sup>5</sup> However, we found that NNSA's headquarters reorganization did not contain a clear definition of the roles and responsibilities of the headquarters organizational units.

In addition to reorganizing its headquarters, in February 2002, NNSA proposed a reorganization of its entire operation aimed at solving important long-standing organizational issues. Specifically, NNSA proposed a new organizational structure that would (1) remove a layer of management by making existing operations offices into support offices, (2) locate NNSA operational oversight close to laboratories and plants by strengthening its site offices, and (3) streamline federal staff and hold federal staff and contractors more accountable. In February 2002, we testified that with the proposed new organizational structure, resolution of

---

<sup>4</sup>U.S. General Accounting Office, *Department of Energy: Views on the Progress of the National Nuclear Security Administration in Implementing Title 32*, [GAO-01-602T](#) (Washington, D.C.: Apr. 4, 2001).

<sup>5</sup>U.S. General Accounting Office, *NNSA Management: Progress in the Implementation of Title 32*, [GAO-02-93R](#) (Washington, D.C.: Dec. 12, 2001).

---

NNSA's long-standing organizational issues appeared to be within NNSA's grasp.<sup>6</sup> However, we noted that NNSA's lack of a long-term strategic approach to ensure a well-managed workforce precluded it from identifying its current and future human capital needs, including the size of the workforce, its deployment across the organization, and the knowledge, skills, and capabilities needed to fulfill its mission. Finally, in December 2002, the Administrator of NNSA directed the implementation of the overall reorganization proposed in February 2002. Specifically, NNSA began implementing a new organizational structure that would (1) remove a layer of management by abolishing its three Operations Offices; (2) locate NNSA operational oversight close to laboratories and plants by strengthening its site offices; (3) consolidate business and technical support functions, such as procurement and contracting, in a single service center organization located in Albuquerque, New Mexico; and (4) adopt a challenging staff reduction target of about 17 percent to be achieved by the end of fiscal year 2004.

You asked us to review NNSA's overall reorganization efforts to assess (1) the extent to which NNSA's reorganization is addressing in practice the past problems concerning the unclear delineation of authority and responsibility, (2) the likelihood that NNSA's reorganization will result in sufficient staff with the right skills in the right places to meet its mission and program goals, and (3) how NNSA's reorganization will impact its proposed plan for federal oversight of contractor activities.

To assess the extent to which NNSA's reorganization addressed past problems concerning the unclear delineation of authority and responsibility, we visited NNSA headquarters, the new Albuquerque Service Center, and four of the eight NNSA site offices and interviewed officials and reviewed pertinent documents on the effect of the reorganization on NNSA's delineation of authority and responsibility. We developed a general list of interview questions—i.e., a semi-structured interview guide—to assist with our interviews of each NNSA site office

---

<sup>6</sup>U.S. General Accounting Office, *Department of Energy: NNSA Restructuring and Progress in Implementing Title 32*, GAO-02-451T (Washington, D.C.: Feb. 26, 2002).

---

manager.<sup>7</sup> To assess NNSA's efforts to ensure that NNSA had sufficient staff with the right skills in the right places to meet its mission and program goals, we reviewed NNSA workforce planning documents and interviewed NNSA officials, including using the interview guide for site office manager interviews, to determine if its plans had sufficient information to address NNSA's future staffing needs and to identify emerging skill gaps. In addition, we reviewed our reports on human capital management and workforce planning.<sup>8</sup> To assess NNSA's proposed plan for federal oversight of contractor activities under the new reorganization, we interviewed NNSA headquarters officials, site office managers (using the interview guide), and contractor officials, and reviewed documents pertaining to the ongoing implementation of this proposed oversight approach at Sandia National Laboratories. We focused our review on NNSA's Office of Defense Programs because, according to NNSA officials, it was most affected by the December 2002 reorganization, and because the Office of Defense Programs, which manages weapons activity programs, accounts for about 73 percent of NNSA's Fiscal Year 2005 budget request.

We conducted our review from June 2003 through April 2004 in accordance with generally accepted government auditing standards.

---

## Results in Brief

NNSA's reorganization has resulted in some progress in delineating lines of authority and improving communication between NNSA headquarters and its field offices, thus addressing some past problems; however, at the working level, NNSA has yet to determine who will give specific program direction to its contractors and how the actions of these program

---

<sup>7</sup>For the site offices we did not visit, we used the interview guide to conduct telephone interviews. Also, the practical difficulties of administering a semi-structured interview guide may introduce errors, commonly referred to as nonsampling errors. For example, measurement errors are introduced if difficulties exist in how a particular question is interpreted or in the sources of information available to respondents in answering a question. To reduce measurement error, we conducted two pretests with site office managers to make sure questions and response categories in our interview guide were interpreted in a consistent manner. We made relevant changes to the questions based upon these pretests.

<sup>8</sup>See U.S. General Accounting Office, *Human Capital: A Self-Assessment Checklist for Agency Leaders*, [GAO/OCG-00-14G](#) (Washington, D.C.: Sept. 2000); U.S. General Accounting Office, *A Model Of Strategic Human Capital Management*, [GAO-02-373SP](#) (Washington, D.C.: March 15, 2002); and U.S. General Accounting Office, *Human Capital: Key Principles for Effective Strategic Workforce Planning*, [GAO-04-39](#) (Washington, D.C.: Dec. 11, 2003).

---

managers will be coordinated. Specifically, NNSA officials report that the new structure has improved communication between headquarters and the field by eliminating a layer of management—the three operations offices—and consolidating administrative support functions into a new service center located in Albuquerque, New Mexico. In addition, the reorganization has strengthened the hand of local NNSA site office managers by granting them additional authority to manage contractors, specifically holding the site office managers accountable for the day-to-day security and safety of site operations. Important issues remain to be resolved. Specifically, NNSA has yet to formalize a program management structure that identifies its program managers, what their responsibilities and qualifications should be, and what their specific role will be in directing and overseeing contractor activity under the new organization. Moreover, NNSA has not determined how program managers, who are responsible for ensuring that program goals and requirements are met, will interact with contracting officers and their designated representatives, who are responsible for carrying out specific technical functions, such as monitoring and inspection.

NNSA's reorganization is not likely to ensure that it has sufficient staff with the right skills in the right places because NNSA chose to downsize its federal workforce without determining what critical skills and capabilities it needed to meet its mission and program goals. In December 2001, we reported that NNSA did not have the coherent human capital and workforce planning strategies it needed to develop and maintain a well-managed workforce over the long run. Consequently, we recommended that NNSA develop a thorough human capital and workforce planning strategy. Instead of developing a workforce plan, according to a senior NNSA official, NNSA managers relied on their judgment about how much to reduce the federal staff and where those reductions should occur in carrying out its December 2002 reorganization. Consequently, NNSA will not know the composition of its workforce until it completes the 17 percent workforce reduction on September 30, 2004—the deadline specified in the reorganization plan—and then determines the knowledge, skills, and capabilities of its remaining employees. While NNSA did develop a workforce plan in December 2003, which attempted to establish a framework for long-term workforce planning, this plan is of limited use without current statistics on workforce, positions, and organizational structures. We have found that when downsizings take place in such an unstructured environment agencies experienced significant challenges to deploying people with the right skills, in the right places, at the right time and performing its missions economically, efficiently, and effectively. In NNSA's case, early indications are that the lack of planning is already

---

contributing to skill imbalances. For example, NNSA site offices are 39 staff short of their targets and some site offices, namely Pantex, Y-12, and Los Alamos, are having some difficulty filling critical skills in safety and security. At the Albuquerque Service Center, significant skill gaps exist for contract specialists—it has only 26 of 54 contract specialist positions filled. Without a functional long-term workforce plan, NNSA runs the risk of facing further, more serious staff shortages or skill imbalances, thereby affecting its ability to adequately oversee its contractors and ensure the safety and security of its various facilities in the future.

NNSA's implementation of its proposed approach to rely more on contractors' assurances and self-assessments and less on NNSA's direct oversight may be premature because NNSA's reorganization has not yet generated or established a program management structure for directing and overseeing contractor activity or a long-term workforce plan for ensuring that it has sufficient staff with the right skills in the right places. According to the draft proposal, contractors will develop a comprehensive contractor assurance system, or system of management controls, and NNSA will primarily rely upon these systems and controls to ensure that the contractors' missions and activities are properly executed in an effective, efficient, and safe manner. Under this proposal, NNSA will use a risk-based, graded approach to its oversight and tailor the extent of federal oversight to the quality and completeness of the contractors' assurance systems and to evidence of acceptable contractor analysis of contractor performance. If implemented, NNSA's oversight functions will include review and analysis of contractor performance data, direct observations of contractor work activities in nuclear and other facilities, annual assessments of overall performance under the contract, and certifications by the contract or independent reviewers that the major elements of risk associated with the work performed are being adequately controlled. NNSA has already begun taking steps to accommodate implementation of the new contractor oversight approach in parallel with its reorganization. Although the overall concept of a risk-based approach to federal oversight has merit, the unresolved issues stemming from NNSA's major ongoing reorganization may affect its ability to effectively carry out this approach while successfully meeting its responsibility for safe and secure operations.

In order to increase the likelihood that NNSA's reorganization will achieve NNSA's goal of increased management discipline and accountability in program management and contractor oversight, we are recommending that NNSA establish a structure for its program management, complete and implement a data-driven workforce plan for the longer term, and

---

postpone any decrease in the level of NNSA's direct federal oversight of contractors until it has a program management structure in place and has completed its workforce plan.

In commenting on our draft report, NNSA agreed in principle with our recommendations; however, it felt that it already had efforts underway to address them. Specifically, with respect to our recommendation about program management, NNSA stated that it has established a formal process for using appropriately designated officials to direct contractor activity and that its formal program management policy was nearly established. We recognize in our report NNSA's effort to develop processes and formalize its program management policy; however, we believe that NNSA needs not only a policy, but also a structure and implementation guidance so that the managers providing direction to NNSA's contractors are clearly identified and can be held accountable. With respect to our recommendation on workforce planning, NNSA agreed with our recommendation, but it disagreed that its current plan was based on short-term or arbitrary management judgments. In this respect, our conclusions were based on discussions with knowledgeable senior agency officials at NNSA headquarters and site offices as well as a review of NNSA management council minutes. More importantly, we continue to believe in, and NNSA does not dispute, the need for a long-term data driven workforce plan that will ensure that NNSA meets its long-term goals. Finally, regarding our last recommendation on federal oversight of contractors, NNSA stated that it had no intention of further decreasing direct oversight of contractors, was hiring staff to fill vacant positions at site offices, and that its proposed contractor assurance systems would only be implemented after a site manager/contracting officer was convinced that the contractor's system would be at least as effective as the current system. While we are pleased that NNSA has stated that it will not decrease its direct oversight, our recommendation is intended to ensure that NNSA has the critical systems it needs in place to perform its function—effective, direct federal oversight.

---

## Background

NNSA, a separately organized agency within DOE, is responsible for the management and security of the nation's nuclear weapons, nonproliferation, and naval reactor programs. To conduct these activities, NNSA's fiscal year 2005 request is about \$9 billion, with about \$6.6 billion targeted for nuclear weapons programs managed by NNSA's Office of Defense Programs. For many years, various external studies have found problems with the organization of NNSA's principal activity—the Office of Defense Programs. For example, one such study found a dysfunctional

---

management structure with convoluted, confusing, and often contradictory reporting channels,<sup>9</sup> while another study cited ambiguities and overlaps in the roles of headquarters and the Albuquerque Operations Office as a primary source of inefficiencies and conflict within the program.<sup>10</sup> In December 2000, we reported organizational problems at three levels—within the Office of Defense Program’s headquarters functions, between headquarters and the field offices, and between contractor-operated sites and their federal overseers.<sup>11</sup> These problems resulted in overlapping roles and responsibilities for the federal workforce overseeing the nuclear weapons program and confusion and duplication of effort for the contractors implementing the program at sites within the nuclear weapons complex.

In December 2002, NNSA formally announced the beginning of an overall reorganization and workforce reduction intended to enhance its operational efficiency and programmatic effectiveness. Prior to its December 2002 reorganization, NNSA’s organization consisted of multiple layers. In particular, under the Office of Defense Programs—NNSA’s largest program—seven area offices reported to three operations offices that in turn reported to the Deputy Administrator for Defense Programs. The Deputy Administrator then reported to the Administrator. Figure 1 shows NNSA’s prior organization.

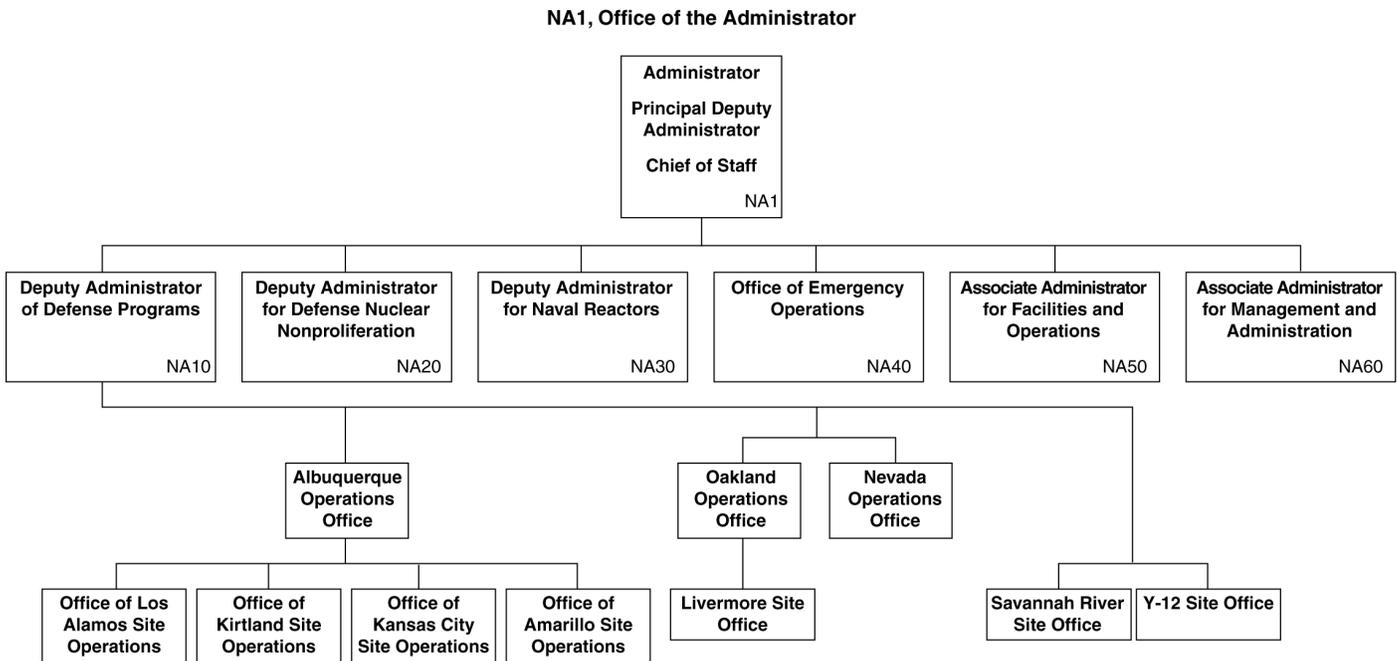
---

<sup>9</sup>President’s Foreign Intelligence Advisory Board, *Science At Its Best, Security At Its Worst*, (Washington, D.C.: June 1999).

<sup>10</sup>Institute for Defense Analyses, *The Organization and Management of the Nuclear Weapons Program*, (Washington, D.C.: March 1997).

<sup>11</sup>[GAO-01-48](#).

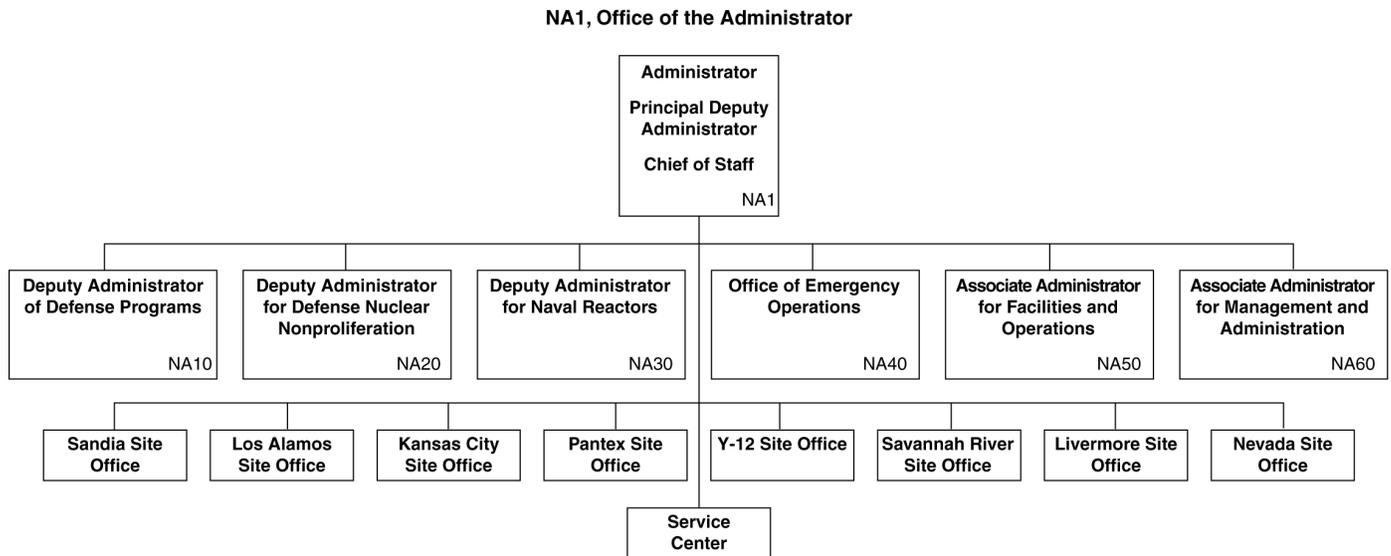
**Figure 1: NNSA's Organization Prior to December 2002**



Source: NNSA.

To remove a layer of management, NNSA closed the Albuquerque, Oakland, and Nevada operations offices. The new organization consists of eight site offices located at each of NNSA's major contractors, one service center located in Albuquerque, New Mexico, and headquarters program offices that all report directly to the Administrator. NNSA headquarters sets requirements, defines policies, and provides high-level guidance. Site office managers are the designated contracting officers responsible for delivering federal direction to the contractor at each site and for ensuring the site's safe and secure operation. The site office managers also manage each NNSA site office. Under the realignment, a single service center has been established in Albuquerque, New Mexico, to provide business and technical support services to the eight site offices and headquarters programs. Prior to the reorganization, about 200 staff provided these services in the Oakland and Nevada operations offices and in offices in Germantown, Maryland, and Washington, D.C. These services are now being consolidated in the new service center, resulting in the reassignment of the 200 staff to the Albuquerque service center. Figure 2 shows NNSA's new organization structure. NNSA plans to staff the service center with 475 employees, down from 678 in December 2002.

**Figure 2: NNSA's New Organization**



Source: NNSA.

As part of its reorganization, NNSA decided to reduce the size of its federal staff. Originally, NNSA set an overall staff reduction target of 20 percent. However, in August 2003, NNSA reduced the target to 17 percent. The current target includes a 26 percent reduction at headquarters and a 30 percent reduction at the service center. Three site offices—Kansas City, Nevada, and Savannah River—are experiencing reductions, although overall staff size at all eight site offices will increase by 16 employees. NNSA is relying on a combination of buyouts, directed reassignments, and attrition to achieve these targets by its September 30, 2004, deadline.

Standards that we have developed require federal agencies to establish and maintain an effective system of internal controls over their operations.<sup>12</sup> Such a system is a first line of defense in safeguarding assets and preventing and detecting errors. Under our standards, managers should, among other things, ensure that their staffs have the required skills to meet organizational objectives, that the organizational structure clearly

<sup>12</sup>U.S. General Accounting Office, *Standards for Internal Control in the Federal Government*, GAO/AIMD-00-21.3.1 (Washington, D.C.: November 1999).

---

defines key areas of authority and responsibility, that progress be effectively measured, and that operations be effectively monitored.

In addition to these internal control standards, in January 2001, and again in January 2003, we identified strategic human capital management as a governmentwide, high-risk area after finding that the lack of attention to strategic human capital planning had created a risk to the federal government's ability to perform its missions economically, efficiently, and effectively.<sup>13</sup> In that context, we have stated that strategic workforce planning is needed to address two critical needs: (1) aligning an organization's human capital program with its current and emerging mission and programmatic goals and (2) developing long-term strategies for acquiring, developing, and retaining staff to achieve programmatic goals.<sup>14</sup> There are five key principles that strategic workforce planning should address irrespective of the context in which the planning is done. It should

- involve top management, employees, and other stakeholders in developing, communicating, and implementing the strategic workforce plan;
- determine the critical skills and competencies that will be needed to achieve current and future programmatic results;
- develop strategies that are tailored to address gaps in number, deployment, and alignment of human capital approaches for enabling and sustaining the contributions of all critical skills and competencies;
- build the capability needed to address administrative, educational, and other requirements important to support workforce planning strategies; and

---

<sup>13</sup>See U.S. General Accounting Office, *High-Risk Series: An Update*, [GAO-01-263](#) (Washington, D.C.: January 2001), and U. S. General Accounting Office, *High Risk Series: An Update*, [GAO-03-119](#) (Washington, D.C.: January 2003). Also, see U.S. General Accounting Office, *Performance and Accountability Series—Major Management Challenges and Program Risks: A Governmentwide Perspective*, [GAO-01-241](#) (Washington, D.C.: January 2001). In addition, see the accompanying 21 reports (numbered [GAO-01-242](#) through [GAO-01-262](#)) on specific agencies.

<sup>14</sup>[GAO-04-39](#).

- 
- monitor and evaluate the agency's progress toward its human capital goals and the contribution that human capital results have made toward achieving programmatic results.

In light of shortcomings in strategic human capital management reported by us, the President's Management Agenda identified strategic management of human capital as a governmentwide initiative. Established in August 2001, the President's Management Agenda identified a strategy for improving the management and performance of the federal government. The agenda included five governmentwide initiatives: the strategic management of human capital, competitive sourcing, improved financial performance, expanded electronic government, and budget and performance integration.

Regarding strategic management of human capital, two principals are considered central to its success. One, people are assets whose value can be enhanced through investment. As with any investment, the goal is to maximize value while managing risk. Two, an organization's human capital approach should be designed, implemented, and assessed by the standards of how well they help the organization achieve results and pursue its mission. Effective strategic workforce planning is considered an essential element of strategic human capital management. Also called human capital planning, it focuses on developing long-term strategies for acquiring, developing, and retaining an organization's total workforce (including full- and part-time federal staff and contractors) to meet the needs of the future.

---

## NNSA's Reorganization Has Delineated Lines of Authority, but More Clarification Is Needed for Specific Program Management and Oversight Functions

NNSA's reorganization has resulted in some progress in delineating lines of authority between NNSA headquarters and its field offices, thus addressing some past problems; however, at the working level, NNSA has not formalized a program management structure that identifies its program managers or what their responsibilities and qualifications should be, particularly regarding their role in directing and overseeing contractor activity under its new organization. Furthermore, the reorganization has created gaps in the responsibility for important safety oversight that need to be addressed. Without first clarifying such key management issues, NNSA cannot, among other things, ensure the improved discipline and accountability it seeks in managing its programs.

By delineating lines of authority between NNSA headquarters and its field offices, NNSA's reorganization has addressed past problems, such as communications problems resulting from overlapping roles and

---

responsibilities of the federal workforce overseeing the nuclear weapons program. For example, according to NNSA site office managers, the streamlined structure has improved vertical communication because communication channels between headquarters and the field are more direct and do not involve an extra layer of management in the operations offices. Site office managers also state that by now reporting directly to the NNSA Administrator's office, the time required to make decisions has been reduced. In addition, the realignment provides NNSA site office managers with additional authority to manage contractors and assigns them responsibility for the day-to-day security and safety of contractor operations. As a result, it has strengthened the hand of local NNSA site office managers who now have the authority to shut down operations at the sites, if necessary, due to security or safety concerns.

Despite this progress NNSA's reorganization still suffers from two shortcomings. First, the reorganization plan does not yet fully delineate the authority and responsibility of program managers, who are responsible for ensuring that program goals and requirements are met, or reconcile these responsibilities with the mutual responsibilities of contracting officers and their designated representatives who manage the contract. Specifically, under the new reorganization, the contracting officer is responsible for appointing contracting officer representatives to carry out specific functions, such as monitoring, inspection, and other functions of a technical nature not involving a change in the scope, cost, or terms and conditions of the contract. These contracting officer representatives then assist in directing and overseeing the contractor for the programs that they represent. NNSA is attempting to improve program management accountability and discipline by requiring program managers to direct all work to the contractors through a contracting officer or a designated contracting officer representative instead of through the now defunct operations offices or by bypassing the formal contract administrators and informally directing the contractor, as was done in the past.

NNSA's policy on program management, however, is still being developed. NNSA's Assistant Deputy Administrator for the Office of Program Integration told us that the exact number of program managers within the Office of Defense Programs has yet to be determined because disagreement exists within the program about who currently is or is not a program manager. Furthermore, NNSA has not yet articulated its qualification standards for program managers. These standards are important to program success. As we noted in our report on NNSA's Stockpile Life Extension Program, problems with the W-87 refurbishment were caused, in part, because the assigned program manager was not

---

qualified to perform all required tasks and was not enrolled in DOE's project management qualification program.<sup>15</sup> Senior NNSA officials in headquarters expect NNSA's policy to be issued by May 2004, and implementation plans for this policy to be developed by summer 2004. NNSA officials told us that even after the policy is issued, its implementation is expected to take some time because it will likely require a change in the behavior and culture of program managers and the manner in which they operate.

NNSA's delay in issuing program management policy and appointing program managers is currently creating confusion. According to NNSA's existing policy concerning the appointment of contracting officer representatives, headquarters-based program officials must first be designated as program managers before they can be designated as contracting officer representatives for a site.<sup>16</sup> As a result, any uncertainty surrounding the number of program managers and their responsibilities has the potential to disrupt the appointment of contracting officer representatives. However, despite the present uncertainty surrounding the designation of program managers, site offices are appointing contracting officer representatives. For example, the Sandia Site Office appointed 25 of its 36 contracting officer representatives using available NNSA headquarters staff, as of June 2003. However, NNSA provided us with a list of its designated program managers as of December 2003 (the latest date for which data were available) that did not officially recognize 21 of the 25 headquarters-based contracting officer representatives that had been formally appointed by the Sandia Site Office. Until NNSA fully implements its policies to delineate program management authority and responsibility, it remains unclear under the new reorganization and management structure how program management authorities and responsibilities will be exercised in the day-to-day management of contractors and site operations and NNSA cannot ensure that the full discipline and accountability it seeks through its reorganization is fully achieved or that its long-standing organizational structure problems are corrected.

---

<sup>15</sup>U.S. General Accounting Office *Nuclear Weapons: Opportunities Exist to Improve the Budgeting, Cost Accounting, and Management Associated with the Stockpile Life Extension Program*, [GAO-03-583](#) (Washington, D.C. July 28, 2003).

<sup>16</sup>In commenting on our report, NNSA stated that for its weapons programs, it does have contracting officer representatives that are supervisors of program managers.

---

The second outstanding problem with NNSA's reorganization is that it has created gaps in the responsibility for safety oversight that need to be addressed. For example, managers at NNSA's Pantex Site Office, which oversees the contractor operating the Pantex Plant—an assembly/disassembly plant for nuclear weapons in Amarillo, Texas—stated that authority and responsibility for certain safety-related oversight is unclear. Specifically, according to the Pantex Site Office manager, when the realignment abolished the Albuquerque Operations Office, it left a void regarding who would take over certain nuclear explosive safety oversight activities previously performed by that office. Among other things, nuclear explosives safety oversight includes activities such as evaluating the adequacy of controls associated with tooling, testers, and operational processes to prevent and/or minimize the consequences of an accident involving nuclear explosives. While NNSA's Assistant Deputy Administrator for Military Application and Stockpile Operations—an NNSA program—assumed overall responsibility for nuclear explosive safety, NNSA has not resolved exactly who is to provide the day-to-day oversight previously conducted by the Albuquerque Operations Office. In this regard, the Pantex Site Office manager stated that there is no clear procedure for conducting oversight to ensure the prevention of deliberate, unauthorized use of a nuclear weapon—an important goal of NNSA. The Pantex Site Office manager—the risk acceptance official for the site—stated that he would therefore not authorize the continuation of certain work related to one current weapon system requiring use of a particular safety process. Furthermore, in October 2003, NNSA issued its safety-oriented *“Functions, Responsibilities, and Authorities Manual”* intended to clarify issues concerning delineation of authority. However, according to the Assistant Manager for Nuclear Engineering at the Pantex Site Office, the manual still does not clarify the authority and responsibility of nuclear explosives safety oversight. Senior NNSA headquarters officials stated that they are aware of problems concerning nuclear explosive safety oversight and that corrective action plans have been recently developed and are scheduled to be implemented through 2006.

The Defense Nuclear Facilities Safety Board recently expressed broader concerns in a December 8, 2003, letter to NNSA's Administrator that many orders, directives, standards, supplemental directives, and site office procedures, which had been issued to help ensure the safe operation of NNSA's defense nuclear facilities, have not been modified to reflect current roles and responsibilities within NNSA. The board further stated that in some cases, particularly those involving supplemental directives that the now-defunct Albuquerque Operations Office had issued, the documents may no longer have a clear owner within the NNSA

---

organization, and deviations from the processes that these directives prescribed are now becoming more frequent within NNSA.

---

## NNSA's Reorganization Will Not Ensure Sufficient Staff with the Right Skills in the Right Places to Meet the Agency's Mission and Program Goals

NNSA's reorganization is not likely to ensure that it has sufficient staff with the right skills in the right places because NNSA chose to downsize its federal workforce without first determining what critical skills and capabilities it needed to meet its mission and program goals. Consequently, NNSA will not know the composition of its workforce until it completes the 17 percent workforce reduction on September 30, 2004—the deadline specified in the reorganization plan—and then determines the knowledge, skills, and capabilities of its remaining employees. Without a functional long-term workforce plan, NNSA runs the risk of facing further, more serious staff shortages or skill imbalances, thereby affecting its ability to adequately oversee its contractors.

In December 2001, in addressing NNSA's use of its excepted service authority, we reported that NNSA did not have the coherent human capital and workforce planning strategies it needed to develop and maintain a well-managed workforce over the long run.<sup>17</sup> As a result, we recommended that NNSA not allocate any additional excepted service positions until it developed comprehensive human capital and workforce planning strategies. Subsequently, in February 2002, we testified that NNSA's lack of a long-term strategic approach to ensure a well-managed workforce precluded it from identifying its current and future human capital needs, including the size of the workforce, its deployment across the organization, and the knowledge, skills, and abilities needed to fulfill its mission.<sup>18</sup>

Despite these earlier recommendations to develop thorough human capital and workforce planning strategies, NNSA embarked on a major initiative, expected to span nearly 2 years, not only to reorganize, but also to reduce the size of its workforce. NNSA's December 2002 reorganization plan called for a reduction in its federal workforce from 1,695 to 1,356 staff, or a reduction of about 20 percent, by September 30, 2004. The planned 20 percent reduction involved a 29 percent reduction in headquarters staff, a 26 percent reduction in administrative support staff through the closure of the three operations offices and the consolidation of administrative

---

<sup>17</sup> [GAO-02-93R](#).

<sup>18</sup> [GAO-02-451T](#).

---

support staff in a new Service Center, and a 6 percent reduction in Site Office staff. A senior NNSA official stated that “getting things done” was a primary factor in deciding to quickly implement the reorganization and workforce reduction. As such, NNSA officials stated that the staff reduction targets were based more on judgment than a rigorous workload analysis. A senior NNSA official explained that NNSA managers knew that there was work overlap and redundancy in the organization, but were concerned that a more formal, rigorous analysis of requirements or workload could hamper what they believed was an urgent need to achieve organizational realignment and workforce reduction results. The official also said that NNSA management had decided that if and when staffing changes became necessary, such adjustments would then be made.

The NNSA Administrator implemented what it termed a managed staffing process soon after the workforce reduction target was announced in an effort to focus on its short-term staff reduction targets and deadline. He asked NNSA headquarters, service center, and site office managers to report their organization’s existing functions and staff in 2003, their anticipated changes to functions and associated staff requirements by the end of fiscal year 2004, and any staff surplus or deficit. Based on regular updates of this information, the NNSA Administrator has adjusted the total staff reduction target twice since December 2002, once in April 2003 and a second time in August 2003, to its current 17 percent target—primarily to accommodate an increase of 38 positions. This new target is to be accomplished by an increase of 23 positions in headquarters and 40 positions in the site offices, respectively, and a decrease of 25 positions at the Albuquerque Service Center. A February 2004 status report stated that NNSA created and staffed the 38 new positions to perform functions not previously identified, or for which original staffing targets were not adequate for mission accomplishment.

NNSA is progressing towards its staff reduction targets and deadline primarily through buyouts, directed reassignments, and attrition combined with a freeze on hiring and promotions, although exceptions can be allowed to fill critical positions. A total of 174 staff have thus far taken the buyout, which could be as high as \$25,000 per person depending on such factors as length of federal service and grade level. NNSA human capital managers report that 99 of the 200 administrative support staff in Oakland, Las Vegas, Germantown, and Washington, D.C., offices have formally stated that they would relocate to the Albuquerque Service Center. However, officials are not sure how many staff will actually relocate because, for example, they believe that some staff do not really want to

---

relocate and are seeking alternative employment. As of March 6, 2004, NNSA is 13 staff short of achieving its 17 percent staffing reduction target.

NNSA has also begun a number of specific workload reduction initiatives intended to accomplish its mission with fewer federal personnel. However, the outcome of these initiatives may not be known for some time so their affect on NNSA's workforce capabilities both in the short-term and long-term cannot be predicted. For example, in the area of safety, NNSA reduced the number of Site Office Facility Representatives from 68 in December 2002 to 53 in December 2003. Site Office Facility Representatives are typically responsible for day-to-day oversight of contractor operations to ensure that the contractor's work practices and performance are being completed in a safe and environmentally responsible manner. NNSA is pursuing changes to the Facilities Representative Program, among other things, to allow for greater coverage in areas of higher risk to the public, such as nuclear safety, and reduced coverage of standard industrial hazard facilities. NNSA is also considering shifting federal responsibility for employee safety to the contractor.

While continuing to pursue its short-term workforce reduction goals, NNSA began to develop a framework to determine its long-term human capital needs. In December 2003, NNSA issued a workforce plan designed to comprehensively meet the requirements of DOE's Human Capital Management Improvement Program and the strategic workforce planning aspect of the President's Management Agenda. The framework specifically identified strategic workforce planning as a means to mitigate the impact of losing a large percentage of the NNSA workforce and as the process for ensuring that the right people with the right skills are in the right place at the right time. The workforce planning model for the longer term—Workforce Plan 2004—called for the analysis of present workforce competencies, the identification of competencies needed in the future, a comparison of future needs with the present workforce in order to identify competency gaps and surpluses, the preparation of plans for building the workforce needed in the future, and an evaluation process to ensure that the workforce planning model remains valid and that mission objectives are being met.

Despite this effort, NNSA's workforce plan is of limited usefulness because it depends on workforce data that are either already obsolete or not yet available. For example, the number, skill, position, and location of employees are a moving target and subject to continuous change until the downsizing effort is completed in September 2004. Furthermore, several NNSA site office managers acknowledged that their workforce focus has

---

been on their short-term downsizing objective. A senior NNSA official agreed that the agency's workforce planning needed to be more long-term, but added that under the circumstances of NNSA's organizational downsizing, management primarily focused on meeting short-term needs. NNSA human capital officials also told us that NNSA's decreased reliance on DOE for practically all human capital management, resulting from NNSA's creation as a separately organized agency under DOE in 2000, required the building of a human resource structure, staff, and operation, which has taken some time to get up and running. NNSA plans to update information in its workforce plan, including its workforce composition and skills, as well as determine workforce needs for the long-term. With this information, NNSA can then conduct a skill gap analysis that is necessary to target recruitment, hiring, and training programs long-term.

As we have found in other government agencies, by carrying out downsizing without sufficient consideration of the strategic consequences, NNSA runs the risk of not having the right skills in the right place at the right time, thereby affecting its ability to adequately oversee its contractors and ensure the safety and security of its various facilities in the future. The situation may be further exacerbated by the fact that, according to NNSA estimates, 35 percent of NNSA employees will be eligible to retire in the next 5 years. The lack of adequate strategic and workforce planning in the course of downsizing efforts can negatively affect the agency's ability to provide quality service and lead to such negative effects as the loss of institutional memory and an increase in work backlogs. The impact of gaps in the numbers and skills of staff used to carry out its contractor oversight mission is already becoming apparent. For example, NNSA site offices are 39 staff short of their targets and some site offices, namely Pantex, Y-12, and Los Alamos, are having some difficulty filling critical skills in safety and security. At the Albuquerque Service Center, significant skill gaps exist for accountants and contract specialists. For example, the service center has only 26 of 54 contract specialist positions filled. NNSA's preoccupation with more short-term downsizing objectives and staffing strategy without the benefit of a strategic human capital plan may have contributed to the workforce imbalances it now is experiencing.

---

## NNSA's Proposed Transition to Less Direct Federal Oversight Could Be Compromised by Outstanding Reorganization Issues

NNSA's implementation of its proposed risk-based approach to rely more on contractors' assurances and self-assessments and less on NNSA's direct oversight may be premature because NNSA's reorganization has not yet established a program management structure or long-term workforce plan for ensuring that it has sufficient staff with the right skills in the right places. Others and we have reported on a number of problems over the years related to NNSA's performance of effective federal oversight of its contractors. Against this backdrop, NNSA has begun taking steps to accommodate implementation of the new contractor oversight approach in parallel with its reorganization. Under this new approach, contractors will develop comprehensive contractor assurance systems, or systems of management controls, and NNSA will primarily rely upon these systems and controls to ensure that contractors properly execute their missions and activities. Although the overall concept of a risk-based approach to federal oversight has merit, the unresolved issues stemming from NNSA's major ongoing reorganization may compromise its ability to effectively carry out this approach while successfully meeting its responsibility for safe and secure operations.

NNSA's reliance on contractors to operate its facilities and carry out its missions makes effective oversight of contractor activities critical to its success. Over the years, we have reported on problems related to NNSA's performance of effective federal oversight of its contractors. For example:

- In May 2003, we reported on problems with NNSA's oversight, particularly regarding assessing contractors' security activities.<sup>19</sup> We noted that, without a stable and effective management structure and with ongoing confusion about security roles and responsibilities, inconsistencies had emerged among NNSA sites on how they assessed contractors' security activities. Consequently, we stated that NNSA could not be assured that all facilities are subject to the comprehensive annual assessments that DOE policy requires.
- Weaknesses in NNSA oversight also occurred at the Lawrence Livermore National Laboratory. Specifically, in our May 2003 report on a new waste treatment facility at the laboratory,<sup>20</sup> we concluded that a delay in initiating

---

<sup>19</sup>U.S. General Accounting Office, *Nuclear Security: NNSA Needs to Better Manage Its Safeguards and Security Program*, [GAO-03-471](#) (Washington, D.C.: May 30, 2003).

<sup>20</sup>U.S. General Accounting Office, *Radioactive Waste: DOE Has Acted to Address Delay in New Facility at Livermore Laboratory, but Challenges Remain*, [GAO-03-558](#) (Washington, D.C.: May 15, 2003).

---

storage and treatment operations at the new facility occurred because NNSA managers did not carry out their oversight responsibilities to provide clear requirements and ensure contractor compliance with these requirements.

- In July 2003, we reported on problems with NNSA’s oversight, particularly with regard to cost and schedule, of the Stockpile Life Extension Program.<sup>21</sup> In particular, we found that Life Extension Program managers used reports that contained only limited information on cost growth and schedule changes against established baselines. We also found that program managers believed that they had not been given adequate authority to properly carry out the life extensions.
- In February 2004, we reported on problems with NNSA’s oversight with regard to business operations at the Los Alamos National Laboratory.<sup>22</sup> Beginning in the summer of 2002, a series of problems with business operations surfaced at the Los Alamos National Laboratory, raising questions about the effectiveness of controls over government purchase cards and property. Among the questions raised were allegations of fraudulent use of government purchase cards and purchase orders, concerns about the adequacy of property controls over items such as computers, and disputed rationales for the laboratory’s firing of two investigators. DOE and NNSA identified multiple causes for these business operations problems, one of which was that NNSA’s oversight was too narrowly focused on specific performance measures in the contract rather than on overall effectiveness.

In addition to these concerns, DOE’s Office of Inspector General has raised broader concerns about the adequacy of oversight. For example, in November 2003, DOE’s Office of Inspector General released its annual report on management challenges, including oversight of contracts and project management as two of three internal control challenges facing the department.<sup>23</sup>

---

<sup>21</sup>U.S. General Accounting Office, *Nuclear Weapons: Opportunities Exist to Improve the Budgeting, Cost Accounting, and Management Associated with the Stockpile Life Extension Program*, [GAO-03-583](#) (Washington, D.C.: July 28, 2003).

<sup>22</sup>U.S. General Accounting Office, *Department of Energy: Mission Support Challenges Remain at Los Alamos and Lawrence Livermore National Laboratories*, [GAO-04-370](#) (Washington, D.C.: Feb. 27, 2004).

<sup>23</sup>Department of Energy, *Management Challenges at the Department of Energy*, DOE/IG-0626 (Washington, D.C.: Nov. 12, 2003).

---

Against this backdrop and in the midst of a major reorganization and staff reduction effort, NNSA is proposing to change its contractor oversight approach. NNSA's August 2003 draft Line Oversight and Contractors' Assurance System policy would rely more on contractor self-assessment and reporting, among other methods, and less on NNSA's direct oversight.<sup>24</sup> The proposal would require a comprehensive contractor assurance system, or system of management controls, to be in place and would primarily rely upon these systems and controls to ensure that its missions and activities are properly executed in an effective, efficient, and safe manner. NNSA would use a risk-based, graded approach to its oversight and tailor the extent of federal oversight to the quality and completeness of the contractors' assurance systems and to evidence of acceptable contractor performance. NNSA's oversight functions would include review and analysis of contractor performance data, direct observations of contractor work activities in nuclear and other facilities, annual assessments of overall performance under the contract, and certifications by the contractor or independent reviewers that the major elements of risk associated with the work performed are being adequately controlled. NNSA stated in its draft policy and in public meetings before the Defense Nuclear Facilities Safety Board that the department plans to phase in this new oversight approach over the next few years.

NNSA has already begun taking steps to accommodate implementation of the new contractor oversight approach in parallel with its reorganization. For example, the new contract effective October 1, 2003, between Sandia Corporation and NNSA's Sandia Site Office describes 10 key attributes for its assurance system, such as having rigorous, risk-based, and credible self-assessments, feedback, and improvement activities, and using nationally recognized experts and other independent reviewers to assess and improve its work process and to carry out independent risk and vulnerability studies. Sandia's contractor plans to implement "assurance systems" beginning with its low-risk activities in fiscal year 2004, and medium- and high-risk activities in fiscal year 2005. Once satisfied that the contractor's assurance system is effective and results in an improvement

---

<sup>24</sup>Historically, NNSA has depended upon a combination of contractor controls and direct federal oversight to help manage the risks associated with the work conducted at its laboratories. However, there are diverse views on the proper balance between federal oversight and reliance on contractors' systems of internal controls. Since 1990, others and we have criticized NNSA for inadequate federal oversight and failure to hold contractors accountable. In contrast, a 1995 Secretary of Energy Advisory Board task force report on alternative futures for the national laboratories criticized DOE for excessive oversight and micromanagement of contractors' activities.

---

in the contractor's performance in key functional areas, NNSA will consider conducting oversight at the assurance systems level rather than at the level of individual transactions. At the time of our review, NNSA officials at the Sandia Site Office did not know how they would assess or validate the contractor assurance system or what level of assurance they would require before they would shift from "transactional" oversight to "systems level" oversight.

Although the overall concept of a risk-based approach seems reasonable, we are concerned about NNSA's ability to effectively carry it out. For example, considerable effort is needed at the Los Alamos and Lawrence Livermore National Laboratories to successfully implement a risk-based approach to laboratory oversight.<sup>25</sup> According to the Associate Director for Operations at the Los Alamos National Laboratory, the laboratory's ability to manage risk is at a beginning level of maturity. Other officials at the Los Alamos laboratory, including officials from the Performance Surety Division and the Quality Improvement Office, said that the laboratory and NNSA have different perceptions of risks at the laboratory and how to manage those risks. In our February 2004 report, we expressed concerns about NNSA's oversight approach and warned that such autonomy for the laboratories was inadvisable this soon into the process of recovery from a string of embarrassing revelations. We recommended that NNSA needs to maintain sufficient oversight of mission support activities to fulfill its responsibilities independently until the laboratories have demonstrated the maturity and effectiveness of contractor assurance systems and the adequacy of the contractor's oversight have been validated. NNSA disagreed with our view of its proposal to rely more on a contractor's system of management controls and less on NNSA's own independent oversight, but acknowledged that there have been problems with oversight in the past. NNSA officials remained convinced that the proposed risk-based approach will be successfully implemented, resulting in improved contractor oversight.

We continue to be concerned about whether NNSA is ready to move to its proposed system. For example, during this review, officials from NNSA's Nevada Site Office expressed concerns about the performance of the management and operating contractor for the Nevada Test Site, citing

---

<sup>25</sup>U.S. General Accounting Office, *Department of Energy: Mission Support Challenges Remain at Los Alamos and Lawrence Livermore National Laboratories*, [GAO-04-370](#) (Washington, D.C.: Feb. 27, 2004).

---

repeated problems with contractor's compliance with basic procedures. For example, officials from NNSA's Nevada Site Office expressed concern that there were repeated incidents where the contractor did not follow lock-out/tag-out procedures, resulting in, for example, the contractor drilling holes into wires that would cause power systems to shut down. Furthermore, the Defense Nuclear Facilities Safety Board, in recent public meetings, has expressed concerns about nuclear safety under the proposed NNSA contractor assurance policy and said that NNSA should not delegate responsibility for such an inherently high-risk area of operations. Finally, because NNSA has not fully determined (1) who will give program direction to its contractors and (2) through a comprehensive workforce plan, that it has sufficient staff with the right skills in the right places, NNSA's proposed approach to rely more on contractors' assurances and self-assessments and less on NNSA's direct oversight may be premature.

---

## Conclusions

NNSA is concurrently making significant and fundamental changes to its organization, workforce composition, and contractor oversight approach that require careful management forethought, strategy, and analysis. Preliminary indications are that some of these changes have had a positive effect on certain aspects of NNSA, but the final impact of these changes will not be apparent for several years. Specifically, NNSA's reorganization has resulted in some progress in delineating authority and improving communication between headquarters and the field. However, the reorganization has not resolved confusion regarding authority over program management. In addition, by downsizing its federal workforce without first determining what critical skills and capabilities it needed, NNSA's workforce reduction targets were more arbitrary than data-driven, contributing to short-term skill imbalances and making data-driven workforce planning for the longer term more difficult. Specifically, NNSA cannot begin to conduct a formal, substantive skill gap analysis to plan for the long term until it completes the current workforce reduction and collects critical workforce data on knowledge, skills, and competencies, among other things. Finally, because important program management and workforce issues still need to be resolved, NNSA's implementation of its proposal to rely more on contractors' assurances and self-assessments and less on NNSA's direct oversight appears to be premature.

---

## Recommendations for Executive Action

In order to increase the likelihood that NNSA's reorganization will achieve NNSA's goal of increased management discipline and accountability in program management and contractor oversight, we are making three recommendations to the NNSA Administrator and the Secretary of Energy:

- establish a formal program management structure, policy, and implementation guidance for directing the work of its contractors, especially concerning how program managers will interact with contracting officers at site offices to help direct and oversee contractor activity;
- complete and implement data-driven workforce planning for the longer term that (1) determines the critical skills and competencies that will be needed to achieve current and future programmatic results, including contractor oversight; (2) develops strategies tailored to address gaps in number, skills and competencies, and deployment of the workforce; and (3) monitors and evaluates the agency's progress toward its human capital goals and the contribution that human capital results have made toward achieving programmatic results, and
- postpone any decrease in the level of NNSA's direct federal oversight of contractors until NNSA has a program management structure in place and has completed its long-term workforce plan.

---

## Agency Comments and Our Evaluation

We provided NNSA with a draft of this report for review and comment. NNSA agreed in principle with our recommendations; however, it felt that it already had efforts underway to address them. Specifically, with respect to our recommendation about program management, NNSA stated that it has established a formal process for using appropriately designated officials to direct contractor activity and that its formal program management policy was nearly established. We recognize in our report NNSA's effort to develop processes and formalize its program management policy; however, we believe that NNSA needs not only a policy, but also a structure and implementation guidance so that the managers providing direction to NNSA's contractors are clearly identified and can be held accountable. With respect to our recommendation on workforce planning, NNSA agreed with our recommendation, but it disagreed that its current plan was based on short-term or arbitrary management judgments. In this respect, our conclusions were based on discussions with knowledgeable senior agency officials at NNSA headquarters and site offices as well as a review of NNSA management council minutes. More importantly, we continue to believe in, and NNSA

---

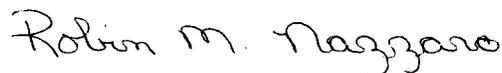
does not dispute, the need for a long-term data driven workforce plan that will ensure that NNSA meets its long-term goals. Finally, regarding our last recommendation on federal oversight of contractors, NNSA stated that it had no intention of further decreasing direct oversight of contractors, was hiring staff to fill vacant positions at site offices, and that its proposed contractor assurance systems would only be implemented after a site manager/contracting officer was convinced that the contractor's system would be at least as effective as the current system. While we are pleased that NNSA has stated that it will not decrease its direct oversight, our recommendation is intended to ensure that NNSA has the critical systems it needs in place to perform its function—effective, direct federal oversight.

---

As arranged with your office, unless you publicly announce its contents earlier, we plan no further distribution of this report until 30 days after the date of this report. At that time, we will send copies to the Secretary of Energy and the Administrator of NNSA, the Director of the Office of Management and Budget, and appropriate congressional committees. We will make copies available to others on request. In addition, the report will also be available at no charge on the GAO Web site at <http://www.gao.gov>.

If you or your staff have any questions about this report, please call me at (202) 512-3841. Major contributors to this report are listed in appendix II.

Sincerely yours,



Robin M. Nazzaro  
Director, Natural Resources and  
Environment

# Appendix I: Comments from the National Nuclear Security Administration



Department of Energy  
National Nuclear Security Administration  
Washington, DC 20585



MAY 25 2004

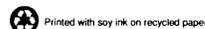
Robin Nazzaro  
Director  
Natural Resources  
and Environment  
General Accounting Office  
Washington, DC 20548-0001

Dear Ms. Nazzaro:

The National Nuclear Security Administration (NNSA) appreciates the opportunity to have reviewed the General Accounting Office (GAO) draft report, GAO-04-545, "National Nuclear Security Administration: Key Management Structure and Workforce Planning Issues Remain As NNSA Conducts Downsizing." We understand that this draft report is the result of GAO's efforts to assess: (1) the extent to which NNSA is addressing in practice the past problems concerning the unclear delineation of authority and responsibility; (2) our workforce planning; and, (3) the impacts our efforts have on federal oversight of contractor activities.

Based on conclusions described in the report, GAO is subsequently recommending that NNSA: (1) establish a formal program management structure for directing the work of our contractors; (2) complete and implement data-driven workforce planning for the longer term; and, (3) postpone any decrease in the level of NNSA's direct federal oversight of contractors until NNSA has this structure and plan in place. Our comments are focused on the conclusions and recommendations contained in the draft report.

While NNSA agrees with the desirability of each of GAO's recommendations, we disagree with the implications that these steps are not in progress. First, NNSA has established a formal process for assuring the direction to contractors flows through appropriately-designated officials and our formal program management policy is nearly established. Second, NNSA undertook a thorough workforce analysis before standing-up our new organizational structure and beginning the process of redeploying employees. GAO's review was undertaken in the midst of the realignment process. Subsequently to that review, NNSA's effort to close staffing gaps are well underway. The determination of the critical skills needed to meet mission and program goals is an iterative process; the GAO assertion that NNSA will not understand its requirements until after the re-engineering is complete is wrong. Finally, NNSA has no intention of further decreasing direct



oversight of contractors. We are hiring staff to fill vacant positions at our site offices and our contractor assurance systems are only implemented after a site manager/ contracting officer is convinced that the system will provide assurance at least as effectively as the current system.

As the Administrator reported to the Secretary at the end of Fiscal Year 2003, the standup and subsequent re-engineering of NNSA has been a complex undertaking. We are operational and are organized to maintain the nuclear weapon stockpile; prevent the proliferation of weapons of mass destruction; provide the Navy with effective nuclear propulsion; ensure the readiness of the nuclear security enterprise; and, to be a responsive and accountable organization. Our Federal managers continue to take measures to implement appropriate controls for results-oriented management; assess the adequacy of management controls in Federal programs and operations; identify needed improvements; take corresponding corrective action; and report on these controls. While we agree with GAO that there is much still to be accomplished, we have taken national missions that have been in existence through the inception of the Cold War, molded them into a separate agency, reorganized, and re-engineered without losing sight of our national goals. Our organizational structure and processes and procedures for managing an organization of this size allow us to address those challenges warranting increased emphasis or appearing to have reached a heightened level of urgency.

The Administrator's assertions to the Secretary are as important today as they were in his Fiscal Year 2003 report that NNSA is adopting management tools and practices to do our job better and more efficiently. We are using creative personnel practices to ensure the best talent is recruited, retained, and rewarded, and all employees are accountable to the Administrator for performance in achieving their elements of the NNSA's mission. The re-engineering concept that was developed jointly by managers throughout the organization provides the basis for moving technical staff to where the work is performed, and centralizing common business and administrative functions to improve the quality of oversight and increase efficiency. With our strong leadership, a committed workforce, modern technical and planning tools, and the continued support of the Congress and the President's Administration, NNSA is making a positive difference for America.

In regards to GAO's recommendation on the establishment of a formal program management structure, it is important to note that the various business functions utilized within NNSA are not singular in nature. While NNSA agrees that the Program Management structure needs to be formalized, we reiterate the fact that we have the Business Operating Policy document in the final review and comment phase. Additionally, this formal process is intertwined with NNSA's

comprehensive work authorization system which, in-and-of-itself, is tightly coupled to the financial and to the contracting mechanisms. The work authorization process is also captured in a Business Operating Policy document that codifies the ability of Contracting Officers to acknowledge and accept the scope of work directed by the Federal Program Managers and subsequently to modify the operating contracts. NNSA also wants to point out that the report states, on page 12, that according to our existing policy concerning the appointment of Contracting Officer Representatives, Headquarters program officials must first be designated as program managers before they can be designated as CORs. This is not completely correct. Within our weapons program we have CORs that are supervisors of program managers.

Regarding the recommendation related to the postponement of any decrease in the level of NNSA's direct federal oversight until it has a program management structure in place and has completed its workforce plan, NNSA has embarked on an aggressive reorganization schedule. Restructuring such as NNSA has performed during the last two years is an intensive effort that has serious impacts on the morale of the workers. Dragging the process out only continues the ineffective time period associated with any restructuring. The fact that NNSA has moved forward in its downsizing should serve as the catalyst to ensure that both the Federal employees and the Contractors redefine oversight by prioritizing on the highest risk activities with the resources they each have. Hiring more resources would not necessarily improve oversight while increasing cost to the taxpayer. GAO should take into consideration that the oversight policy associated with the Contractor Assurance Systems is being phased in within NNSA along with NNSA's restructure. The Sandia Contract contains a "transition" statement which states the following: **"...The Contractor's Management systems that exist on October 1, 2003 will continue until the Contractor addresses the applicable requirements contained in Contract Clauses H-2 through H-10. For changes that do require NNSA approval, the Contractor will not implement a change until it is formally approved by the Contracting Officer."** This statement in the contract allows the NNSA to address the relative risk before accepting changes. Since the Site Offices are actually increasing in size, a phased approach makes sense. For sites like Los Alamos or Pantex, who have more difficulty in staffing their sites because of their locations, a phased approach is provided for.

While completing and implementing data-driven workforce planning for the longer term may be an appropriate recommendation, NNSA believes that GAO reached a conclusion significantly different than one that NNSA is working from. Although it is true that NNSA's current staff reduction goals have been relatively short-term in nature, being targeted to the end of Fiscal Year 2004, they are not based on short-term or arbitrary management judgements, as the report would

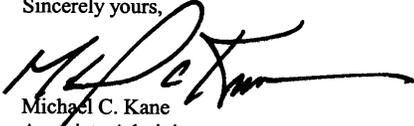
4

indicate. NNSA has conducted a logical, methodical, fact-based analysis in designing its long-term Re-engineering and Restructuring Initiatives. These initiatives are designed to meet the mandates and expectations of Congress to improve the overall management of the weapons and nonproliferation programs, while enhancing overall program and worker performance, minimizing skill gaps, and identifying heretofore unmet critical hiring needs. Teams of program managers and staff analysts worked during much of 2002 to establish an organizational baseline and to benchmark, validate, and align functions within defined major organizational units as part of NNSA's well-documented re-engineering initiative, resulting in the *Matrix of NNSA Functions and Activities by Location*, which provided the template for NNSA's major reorganization in December 2002. Since the stand-up of the NNSA's new management and organization structures, much has continued to be done to develop and refine NNSA's workforce planning and ongoing restructuring initiatives. NNSA feels strongly enough about this subject that we welcome the opportunity to provide documentation in evidence to support NNSA's conclusions.

I have provided additional comments as an enclosure to support the NNSA conclusion we have reached regarding the workforce planning and human capital issues.

Should you have any questions regarding this response, please contact Richard Speidel, Director, Policy and Internal Controls Management. He may be contacted at 202-586-5009.

Sincerely yours,



Michael C. Kane  
Associate Administrator  
for Management and Administration

Enclosure

---

# Appendix II: GAO Contact and Staff Acknowledgments

---

## GAO Contact

James Noel (202) 512-3591

---

## Acknowledgments

In addition to the individual named above, Arturo Holguin, Robert Kigerl, Jonathan McMurray, Christopher Pacheco, Anthony Padilla, Judy Pagano, and Ellen Rubin made key contributions to this report.

---

## GAO's Mission

The General Accounting Office, the audit, evaluation and investigative arm of Congress, exists to support Congress in meeting its constitutional responsibilities and to help improve the performance and accountability of the federal government for the American people. GAO examines the use of public funds; evaluates federal programs and policies; and provides analyses, recommendations, and other assistance to help Congress make informed oversight, policy, and funding decisions. GAO's commitment to good government is reflected in its core values of accountability, integrity, and reliability.

---

## Obtaining Copies of GAO Reports and Testimony

The fastest and easiest way to obtain copies of GAO documents at no cost is through the Internet. GAO's Web site ([www.gao.gov](http://www.gao.gov)) contains abstracts and full-text files of current reports and testimony and an expanding archive of older products. The Web site features a search engine to help you locate documents using key words and phrases. You can print these documents in their entirety, including charts and other graphics.

Each day, GAO issues a list of newly released reports, testimony, and correspondence. GAO posts this list, known as "Today's Reports," on its Web site daily. The list contains links to the full-text document files. To have GAO e-mail this list to you every afternoon, go to [www.gao.gov](http://www.gao.gov) and select "Subscribe to e-mail alerts" under the "Order GAO Products" heading.

---

## Order by Mail or Phone

The first copy of each printed report is free. Additional copies are \$2 each. A check or money order should be made out to the Superintendent of Documents. GAO also accepts VISA and Mastercard. Orders for 100 or more copies mailed to a single address are discounted 25 percent. Orders should be sent to:

U.S. General Accounting Office  
441 G Street NW, Room LM  
Washington, D.C. 20548

To order by Phone:   Voice:   (202) 512-6000  
                                  TDD:    (202) 512-2537  
                                  Fax:     (202) 512-6061

---

## To Report Fraud, Waste, and Abuse in Federal Programs

Contact:

Web site: [www.gao.gov/fraudnet/fraudnet.htm](http://www.gao.gov/fraudnet/fraudnet.htm)

E-mail: [fraudnet@gao.gov](mailto:fraudnet@gao.gov)

Automated answering system: (800) 424-5454 or (202) 512-7470

---

## Public Affairs

Jeff Nelligan, Managing Director, [NelliganJ@gao.gov](mailto:NelliganJ@gao.gov) (202) 512-4800  
U.S. General Accounting Office, 441 G Street NW, Room 7149  
Washington, D.C. 20548