Audit Report

OFFICE OF THE INSPECTOR GENERAL

**AGENCY RESOURCE MANAGEMENT
INFORMATION SUPPORT SYSTEM**

Report No. 96-085 March 15, 1996

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Acronyms

ARMISS	Agency Resource Management Information Support System
COTS	Commercial-off-the-Shelf
CSC	Computer Sciences Corporation
DIA	Defense Intelligence Agency
DIESCON	DoD Intelligence Information Systems Integration and Engineering Support Contract
NSA	National Security Agency
VSE	Value System Engineering

INSPECTOR GENERAL
DEPARTMENT OF DEFENSE
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March 15, 1996

MEMORANDUM FOR DIRECTOR, DEFENSE INTELLIGENCE AGENCY

SUBJECT: Audit Report on Agency Resource Management Information Support
System (Report No. 96-085)

We are providing this audit report for review and comment. The audit was
performed in response to a request from Senator Strom Thurmond. The Office of
Audit, Inspector General, Defense Intelligence Agency, assisted in performing the
audit. Management comments on a draft of this report were considered in preparing
the final report.

DoD Directive 7650.3 requires that all unresolved issues be resolved promptly.
Management comments on the draft report did not discuss the specific recommended
actions. Therefore, we request that the Defense Intelligence Agency provide additional
comments by May 14, 1996, on the development of a comprehensive acquisition plan
for the Agency Resource Management Information Support System; establishment of
controls to verify documentation of intended users requirements; establishment of
controls to verify that procurement quantities are limited until suitability is
demonstrated; and establishment of controls to ensure that senior managers are kept
apprised of important cost, schedule, and performance data. See the Finding for the
required responses.

We appreciate the courtesies extended to the audit staff. Questions on the
audit should be directed to Mr. Harlan M. Geyer, Audit Program Director, at
(703) 604-9594 (DSN 664-9594) or Ms. Jenniffer Wilson, Audit Project Manager, at
(703) 604-8361 (DSN 664-8361). See Appendix G for the report distribution. Audit
team members are listed inside the back cover.

Robert J. Lieberman
Assistant Inspector General
for Auditing

Office of the Inspector General, DoD

Agency Resource Management Information Support System

Executive Summary

Introduction. This audit was performed in response to a request from Senator Strom Thurmond to review allegations of improprieties related to the procurement of commercial software for the Agency Resource Management Information Support System. The Defense Intelligence Agency intended for the Agency Resource Management Information Support System to be an integrated suite of commercial computer software that would standardize existing administrative systems, eliminate redundant data bases and rekeying of data, promote the exchange of information, and provide a common data base of resource information to support management. In June 1993, the Defense Intelligence Agency awarded a contract, totaling about $6.9 million, to acquire and customize commercial software to fit Defense Intelligence Agency business practices. In September 1993 and 1994, the Defense Intelligence Agency issued two delivery orders totaling $1.1 million under an existing indefinite-delivery, indefinite-quantity contract to integrate the commercial software modules that were procured under the Agency Resource Management Information Support System contract. The National Military Intelligence Systems Center, Defense Intelligence Agency, planned to use the software modules to replace systems in two functions.

Audit Objectives. The audit objectives were to determine whether the Defense Intelligence Agency management of the Agency Resource Management and Information Support System and actions taken to correct system deficiencies conformed to regulatory guidance and to evaluate the validity of the allegations. We also evaluated the Defense Intelligence Agency management control program as it related to the audit objectives.

Audit Results. The audit either substantiated or partially substantiated six allegations related to inadequate planning and management of the acquisition and implementation of the Agency Resource Management Information Support System. The Defense Intelligence Agency spent more than $5.1 million for the commercial software and contractor services that did not satisfy the requirement for an integrated, management information system. We did not substantiate two other allegations (see Appendix C).

The Defense Intelligence Agency management control program needs improvement because material weaknesses were identified related to acquisition planning and execution. Recommendations, if implemented, will improve the effectiveness of actions to develop an integrated, management support system and should reduce future acquisition costs. We could not quantify potential monetary benefits. See Part I for a discussion of the audit results and Appendix E for a summary of the potential benefits resulting from audit.

Summary of Recommendations. We recommend stopping all Agency Resource Management Information Support system development and implementation until a comprehensive acquisition plan is developed and management controls are established to ensure that future software acquisition and development efforts are subjected to rigorous senior management oversight.

Management Comments. The Defense Intelligence Agency concurred with all recommendations; however, the comments did not fully meet our intent. See Part I for a summary of management comments regarding the recommendations, Appendix D for a summary of specific management comments, and Part III for the complete text of management comments.

Audit Response. The management comments did not specifically discuss the recommended actions. In addition, the Defense Intelligence Agency nonconcurred with specific issues discussed in the finding. Management made comments concerning the acquisition strategy for procuring the commercial-off-the-shelf software products, demonstration and prototyping of the software products, substantiation of the allegations, the Agency Resource Management Information Support System concept of operations and requirements, and program management roles and responsibilities. We disagreed with those comments and provided a response in Appendix D of this report. Therefore, we ask that the Defense Intelligence Agency provide additional comments in response to this report by May 14, 1996.

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Part I - Audit Results

Audit Background

Need for an Improved Administrative Management Information System. Defense Intelligence Agency (DIA) administrative systems are fragmented, labor intensive, and inefficient. In general, administrative information is redundantly processed in stand-alone systems that do not provide common access. In July 1988, the Director, DIA, approved a concept for improving the management of administrative information at the corporate level through an open systems architecture. Working groups and a process action team were formed to identify DIA-wide applications for integration into the DIA management information system. To meet the need for an improved administrative management system, the National Military Intelligence Systems Center (the Systems Center) developed the concept for the Agency Resource Management Information Support System (ARMISS). In July 1988, the Deputy Director, DIA, directed the Systems Center to establish a program management office for implementing the new administrative system. The Chief of Logistics Division within the Systems Center was designated the ARMISS program manager.[1]

ARMISS Concept of Operations. DIA planned to replace its stand-alone automated information systems with one integrated, information management system. The goal was consistent with Corporate Information Management policies and principles, as defined in DoD Directive 8000.1, "Defense Information Management Program," October 27, 1992, which emphasized the capability of automated data processing in support of business process improvements, data standardization, and systems consolidation. Principles associated with meeting the Corporate Information Management goals include functional process improvement projects and functional and technical integration analysis and planning.

ARMISS was intended to promote exchanging and sharing information, minimizing redundant development of user applications, reducing the potential for errors by eliminating multiple data entries, maximizing data availability to upper management for decision making, and permitting electronic tracking of a variety of data. The ARMISS would encompass all aspects of management and administrative information used by mid-level and senior managers to make decisions on administrative and fiscal matters. The functional offices included in the ARMISS effort consists of the comptroller, contracts, logistics, personnel, training, information processing, security, legal, and administrative functions of all DIA elements. The ARMISS program manager estimated that

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[1]The term "ARMISS program manager," used throughout this report, refers to the Chief of the Logistics Division who served in many different roles and positions related to the ARMISS effort. The program manager was the overall leader of the planning effort that set the direction and strategy for the ARMISS project. In that capacity, the program manager held titles and responsibilities of the acquisition planning leader, the project management and oversight officer, the technical process improvements process action officer, the Co-chair of the Administrative Functional Control Board, and the DIA-perspective focal point.

commercial software would give DIA a prepackaged solution to satisfy the predominant (about 80 percent) ARMISS requirements. The DIA spends about $4.1 million annually for new commercial software.

Contracting for Acquisition of the ARMISS. On June 7, 1993, the DIA Virginia Contracting Activity awarded contract MDA908-93-C-0027 to the Value System Engineering Corporation (VSE) to procure and customize an integrated commercial-off-the-shelf (COTS) software suite to serve as the ARMISS. The VSE based its bid on using Oracle Corporation COTS software products for most functions. The Oracle COTS software products consisted of a budget, acquisition, personnel and logistics module. The ARMISS effort was a cost-plus-fixed-fee-completion type contract for procurement and customization of COTS software and a firm fixed-price type contract for software maintenance. The contract period was 4 years and 4 months (a base period of 16 months and 3 option years) for a total price of $6.9 million. Implementation of the ARMISS was unsuccessful; therefore, DIA allowed the contract to expire and exercised no options. The DIA paid VSE about $4.1 million for software and services.

The DIA is continuing efforts to upgrade its existing administrative information systems through the use of software acquired under the ARMISS contract. The DIA paid $568,408 for delivery order 10 and $578,430 for delivery order 30. Those delivery orders were issued on September 23, 1993, and September 22, 1994, respectively, to the Computer Sciences Corporation (CSC) under contract MDA908-93-D-1503, an indefinite-delivery, indefinite-quantity contract. The Systems Center used delivery orders 10 and 30 to implement the ARMISS software to satisfy deficiencies for two functional missions within the Systems Center. The delivery order efforts are completed, yet the concept of an integrated, information management system was not achieved.

Allegations Related to the Procurement of ARMISS. On January 3, 1995, the Chairman, Senate Committee on Armed Services requested that the Inspector General, DoD, investigate allegations of improprieties by the DIA in procuring ARMISS software. The specific allegations and the results of our audit pertaining to each allegation are in Appendix C.

Audit Objectives

The audit objectives were to determine whether the DIA management of the acquisition of the ARMISS and actions to correct system deficiencies conformed to regulatory guidance and to evaluate the validity of the allegations. We also evaluated management controls germane to the audit objectives. See the Finding for a discussion of the material management control weaknesses and Appendix A for a discussion of the audit scope and methodology and the review of the management control program. See Appendix B for a summary of prior coverage related to the audit objectives.

ARMISS Program Management

The DIA did not exercise effective control over efforts to acquire, customize, and integrate COTS software for the ARMISS. Specifically, DIA:

      o procured 100 percent of the assumed quantities of COTS software needed for the ARMISS without verifying that the system concept design was feasible;

      o did not adequately define ARMISS requirements before contract award;

      o did not document business practices to facilitate customization of the COTS software;

      o did not consider the requirement to rely on the National Security Agency (NSA) for financial and accounting services; and

      o continued development efforts after it was apparent that the acquired COTS software was not suitable for the ARMISS concept.

Consequently, DIA spent more than $5.1 million for COTS software and contractor customization and integration services that did not result in an integrated, management information system or improved capability to DIA-wide business processes.

Acquisition Planning for the ARMISS

DIA Time-Phased Replacement of Existing Systems. The ARMISS request for proposal, dated July 17, 1992, states that the systems and applications integral to DIA operations must remain operational and would not be replaced by ARMISS. Thus, to ensure continuity of operations, implementation of the ARMISS would require maintenance and operation of dual systems and the development of interfaces to external systems. The DIA planned to implement the ARMISS in the following functional modules:

      o budget,

      o acquisition,

      o personnel,

      o training and education,

      o logistics,

o travel,

o central repository, and

o executive mail.

The DIA planned to award one contract to procure and customize the COTS software. The DIA also planned to integrate the software into the existing DIA environment using the DoD Intelligence Information Systems Integration and Engineering Support Contract (DIESCON).

Prototyping as a Means to Reduce Risk and Uncertainty in the ARMISS. DoD Directive 8120.1, "Life-Cycle Management of Automated Information Systems," January 14, 1993, requires that DoD Components consider the acceptance of software based on approval of test results. DoD Components are encouraged to use the policies and procedures identified in DoD Directive 5000.2, "Defense Acquisition Management Policies and Procedures," February 23, 1991, for managing all acquisition programs--major and nonmajor programs. In accordance with DoD Directive 5000.2, part 5, section D, "Technology Transition and Prototyping," prototyping is a major element of the acquisition process and should be used during the concept demonstration phase of the acquisition to reduce risk and uncertainty associated with the integration of products into system concept designs. Testing of prototypes demonstrates the feasibility of the product to work in the system design and allows the early assessment of operational effectiveness and suitability of the product.

To achieve the economies of a bulk purchase, DIA elected to procure the Oracle software immediately after the contract was awarded to VSE on June 7, 1993. DIA procured Oracle products and tools and site licenses for 500 concurrent users even though the concept of integrating all the software applications into the DIA environment had not been demonstrated. Further, the ARMISS contract required VSE to customize the software applications over a 12- to 24-month period; therefore, there was ample time to prove the feasibility of the ARMISS concept using a limited number of Oracle software modules and site licenses in a prototype installation. A more cost-effective acquisition alternative would have been for DIA to procure the needed quantities of software in a bulk purchase after DIA demonstrated the feasibility of the ARMISS concept.

Technical Constraints Affecting ARMISS Implementation

Documentation of Business Processes. DoD Directive 8120.1 implements Corporate Information Management policies and principles related to the acquisition of automated information systems. The Directive states that it is DoD policy to use life-cycle management review and approval procedures to verify that programmatic decisions for all automated information systems are based on approved functional requirements analysis and strategic planning. Specifically, DoD Components are responsible for developing a current and

future baseline of the administrative processes in the early stages of the acquisition life-cycle for all automated information system projects. Development of the current and future baseline is accomplished by preparing detailed definitions of functional requirements for all functional areas and by producing a business plan that identifies changes in the business process and an implementation strategy for the new system.

The DIA Manual 44-2, "Acquisition," March 1993, requires acquisition plans to identify significant cost and technical or schedule constraints that affect the acquisition. The ARMISS program manager was responsible for determining and validating requirements, acquisition planning, system concept design, the implementation plan, and funding for the ARMISS project. DIA ensured that the ARMISS contract required minimal customization of COTS software, mature and well-documented Government business processes, and a defined business model of the operations of each functional office obtainable within 30 to 35 days. Documentation of the supported business processes was necessary to permit customization the COTS software. However, the ARMISS program manager did not require DIA functional managers to document detailed definitions of their functional requirements and business processes. The ARMISS program manager did not request the detailed documentation because he assumed:

> o that the COTS software would provide an 80-percent solution for processing requirements, thereby resulting in a rapid prototyping approach rather than a software development; and

> o that DIA would change its way of doing business to take advantage of the COTS software capabilities and efficiencies.

Effects of DIA Undefined Requirements on VSE Ability to Perform. As a result of the inadequate requirements documentation, DIA had no assurances that the Oracle software would satisfy the ARMISS concept. Further, because of undefined requirements, VSE was unable to customize the Oracle software to the DIA business processes. By early August 1993, VSE determined that detailed documentation of the DIA current and future operational requirements was lacking. VSE needed the documentation to customize the software for the Oracle personnel and acquisition modules, as planned for during the base period of the contract. DIA modified the contract on September 23, 1993, and again on March 31, 1994, to direct VSE to develop the necessary requirements documentation. VSE delivered a Functional Requirements Definition Document for the Oracle acquisition module on May 23, 1994, and for the Oracle personnel module on September 21, 1994, at a total cost to DIA of about $928,000.

> **Operational Analysis of the Oracle Acquisition Module.** VSE performed operational analyses of the Oracle acquisition module from February through December 1993. The documentation provided a detailed definition of the operational requirements for the DIA acquisition process and a business model for determining current and future needs for ARMISS. As a result of the analysis, DIA determined that the Oracle acquisition module did not conform to the DIA acquisition process and that development of an import interface to

external procurement and logistics systems was needed to provide an integrated capability. Oracle COTS software, however, was not designed to interface with external systems, and software modifications needed to support an interface could invalidate software warranties and maintenance support agreements.

Operational Analysis of the Oracle Personnel Module. VSE performed an operational analysis on the Oracle personnel module from September 1993 through September 1994. DIA subject matter experts spent about 2,800 hours working with Oracle consultants and VSE program analysts to document the detailed operational requirements and business model of the current and future needs for the DIA personnel function.

As a result of the operational analysis, DIA determined that the Oracle personnel software module did not provide a prepackaged solution to satisfying the Directorate of Human Resources' requirements and that customization of the software was significantly more complex than envisioned. The Oracle personnel module did not offer a prepackaged solution because it did not contain forms or critical data fields needed to process mandatory, Government-specific personnel actions. Customizing the software required extensive programming, which could invalidate the software maintenance support and warranty coverage. Because the Oracle personnel module could not satisfy DIA requirements, the Directorate of Human Resources began evaluating DoD-standard systems, in accordance with Corporate Information Management policies and principles, to satisfy deficiencies in its existing personnel systems.

Oracle Software Suitability to ARMISS Requirements. The DIA stated that COTS software would meet 80 percent of DIA functional requirements, that DIA was willing to modify its business processes to take advantage of commercial software capabilities and efficiencies, and that DIA did not desire to modify the software to the extent DIA would have to develop nonstandard programming script to facilitate unique DIA requirements. However, as early as August 1993, VSE determined that those assumptions were erroneous and that DIA did not have an adequate understanding of the complexities associated with using industry-standard commercial software as a solution to satisfying ARMISS requirements.

The DIA did not adequately evaluate the mechanics of how the Oracle software worked and the effects it had on the ARMISS concept. Specifically, the ARMISS contract statement of work required that ARMISS interface with external finance, logistics, and procurement systems in order to import data to the Oracle applications. However, the Oracle software does not have a standard interface for importing data from external systems. According to the Oracle Corporation, there are limitations and explicit warnings against importing data in non-Oracle systems to Oracle software. Import interface is considered high risk because it requires development of an import facility and modification to the structure of the Oracle software. Because the Oracle Corporation often changes the structure each time it releases a new version of its software, programming scripts, developed to support the import facility, may not function properly and may have to be modified with each new release of the Oracle software. Further, modification to the software programs' structures would

require an effort far greater than that expected under a statement of work that emphasized that DIA did not wish to modify the commercial software applications to facilitate unique DIA requirements.

Compatibility of System Concept Design with the NSA Finance and Accounting System

Importance of General Ledger to Operation. The Oracle Government Financial applications includes the budget, acquisition, and logistics modules. The general ledger component of the budget module is the central hub that facilitates the exchange of data among the Oracle Financial applications. The Oracle software is designed as a tightly integrated software system that assumes functional managers use the Oracle budget module as the core module to exchange data. If the general ledger component of the budget module is not implemented, the capabilities of the software modules are reduced.

Requirement to Use the NSA System. The DIA awarded the ARMISS contract without considering that the Oracle budget module may duplicate or conflict with functions inherent in the NSA finance and accounting system. In August 1992, the Acting Comptroller of the DoD (now the Under Secretary of Defense [Comptroller]) directed the transfer of responsibility for DIA finance and accounting functions from the Air Force Finance and Accounting Office, Bolling Air Force Base, to the NSA. On September 16, 1993, the Comptrollers of the DIA and the NSA signed a memorandum of understanding covering DIA use of the NSA finance and accounting system. The Office of the DIA Comptroller advised senior DIA management and the ARMISS program manager that the NSA would provide finance and accounting support at least 6 months before the award of the ARMISS contract. Nonetheless, the ARMISS contract statement of work had no requirement that DIA use the NSA accounting and finance system or that an interface with the NSA system would be needed.

By late August 1993, the DIA Comptroller informed the Systems Center and other DIA functional elements that he objected to the use of the Oracle budget module as the core to provide common access to financial data because use of the general ledger component of the budget module would unnecessarily duplicate the accounting functions performed by the NSA finance and accounting system. At the request of the ARMISS contracting officer representative, VSE performed an assessment to determine the effects that the transfer of accounting and finance functions had on the ARMISS concept of operations. VSE delivered the assessment in October 1993 at a cost of $21,110. VSE determined that the implementation of accounting and finance functions in the NSA system would force a major revision to the ARMISS concept. Specifically, ARMISS would not provide a real-time exchange of financial data between the two systems, would not eliminate redundant data bases and rekeying of data, and would not provide a single, integrated solution as DIA envisioned.

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Ability of the ARMISS Contract to Meet Goals

Effects of Allowing the ARMISS Contract with VSE to Expire. After spending about $1 million on requirements documentation, DIA terminated customization of the Oracle software applications on March 31, 1994. In August 1993, DIA redirected VSE efforts under the ARMISS contract from software customization toward functional requirements analysis. Funds that were identified in the base year of the contract for software customization were used to support the operational analyses that VSE performed on the DIA acquisition and personnel processes. During the operational analyses, DIA determined that the proposed Oracle commercial software solution, with limited customization, would not satisfy the ARMISS goals for an integrated business solution tailored to current DIA processes. The Oracle software product was not designed to interface with external systems, such as those in the DIA automated environment. Further, the Oracle software applications were dependent on an integral general ledger, which conflicted with the requirement that DIA use the NSA accounting and finance system. The VSE did not deliver the customized software because the contractual effort escalated beyond the scope of work. As a result, DIA allowed the contract to expire without exercising any of the option years. The full value of the ARMISS contract totaled $4.1 million.

Project Tracking and Oversight

Roles and Responsibilities. DIA Regulation 65-17, "Automated Information Systems (AIS) Management Policy," November 6, 1989, assigns the Systems Center overall responsibility for the development and maintenance of corporate, automated information systems. Therefore, the Systems Center was responsible for the implementation of the ARMISS into the DIA automated environment. That responsibility was shared between the offices of the Logistics Division and Systems Development. The Chief of the Logistics Division was the ARMISS program manager. The ARMISS program manager had overall responsibility for the acquisition planning, to include determining and validating the ARMISS requirements, designing the system concept, developing the implementation strategy, and managing funds and resources for the ARMISS contract. The DIA contracting officer appointed a technical manager in the Systems Development office as the ARMISS contracting officer representative. The contracting officer representative was responsible for monitoring contractor performance and for representing the contracting officer in all technical matters related to the contract. However, cognizant officials at VSE and at the DIA contracting activity indicated that the ARMISS program manager directed VSE on how to proceed with the ARMISS contract.

In September 1993, VSE complained to the DIA Director of Procurement about the potential conflict in receiving direction from multiple sources. In November 1993, the DIA contracting officer issued a letter to VSE reiterating that the contractor shall not take orders to perform work regarding contract

MDA908-93-C-0027 from anyone except the contracting officer or contracting officer representative. Thereafter, the ARMISS program manager no longer intervened and focused on implementing and integrating an ARMISS-like system to satisfy Systems Center requirements. The ARMISS program manager initiated two delivery orders with CSC, under the DIESCON, to implement and integrate the Oracle commercial software and Oracle relational data base management system. The ARMISS program manager made no overall plan for tracking the project or for reporting the status of the ARMISS or DIESCON efforts to senior DIA management.

DIA Senior Management Briefings. From the time the ARMISS contract was awarded in June 1993 through the time the contract was allowed to expire in September 1994, the Systems Center held only two meetings with senior DIA management concerning the status of the ARMISS project.[2] The ARMISS program manager initiated the delivery orders without proper planning documentation and senior management oversight. In our opinion, proper planning did not occur because by the time delivery order 10 was initiated in September 1993, the DIA Comptroller had reiterated that the ARMISS could not be the final authority on obligations or expenditures and could not provide an integrated, management information system to satisfy DIA-wide needs. Also, by the time the Systems Center initiated delivery order 30 in September 1994, VSE had determined that the Oracle software did not conform to DIA business processes and that significant risks were associated with required interfaces with external systems.

The original intent of using DIESCON was for installation and integration of the customized software into the DIA automated environment. However, VSE was unable to customize the software to fit DIA business processes. Because the ARMISS program manager used the DIESCON efforts as a prototyping approach to satisfying ARMISS requirements in the Systems Center, the Systems Center should have briefed senior DIA management on the purpose of additional expenditures of about $1.1 million. The Systems Center did not brief DIA senior management on the delivery orders until March 1995.

DIESCON Delivery Order 10. On September 23, 1993, the DIA contracting activity issued delivery order 10, at the request of the Systems Center. The delivery order was a firm fixed-price-completion effort totaling $568,408. The scope of the delivery order was focused on implementing a Systems Center Administrative Management System, using the Oracle data base system and software modules acquired under the ARMISS contract, in a test-bed environment, for proving the ARMISS concept. The contractor for DIESCON, CSC, delivered an Administrative Management System application framework to include the data base schema, data dictionaries, and data screens supporting

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[2]The Systems Center discussed the status of ARMISS at two DIA Executive Committee meetings--one on August 3, 1992, and the other on March 2, 1993. However, the role and function of the DIA Executive Committee was only to work with senior managers to resolve questions and concerns and to provide a forum for discussing significant internal DIA management and resource issues. The Committee did not provide an oversight role or enforce decisions.

the budget functions. The CSC also delivered an Administrative Management System capability on a stand-alone computer workstation within the Logistics Division of the Systems Center to replace the current applications operating on its WANG Office System and local area network environments with the Oracle budget module. However, the ARMISS concept continued to be invalid because the Oracle budget module needed to interface with the NSA system to provide an integrated solution.

Delivery Order 30. On September 22, 1994, the DIA contracting activity issued delivery order 30 to CSC at the request of the Systems Center. The delivery order was a firm fixed-price-completion effort totaling $578,430. The objectives of delivery order 30 were to migrate existing software applications to the Oracle relational data base management system and to improve the Systems Center acquisition process by replacing its Acquisition, Resource, Inventory, Management Information System (Acquisition System). Delivery order 30 was to support continuation of the Systems Center Administrative Management System by including the development of a data exchange facility that would enable the Systems Center to import and export data to and from the existing DIA procurement and logistics systems. The CSC was unable to migrate existing software applications to the Oracle data base or to develop a facility for importing data because the Oracle commercial software did not have the import capabilities needed to support the Systems Center acquisition process. Additionally, the Systems Center acquisition process supports the Directorates of Procurement and Logistics and must interface with their automated systems. Oracle commercial software was not designed to import data from those systems; therefore, it could not support other DIA elements. Consequently, CSC was unable to perform the tasks associated with the import interface in the delivery order 30 statement of work.

Future Direction of ARMISS. In February 1995, the Systems Center briefed the new Deputy Director, DIA, on the results of the ARMISS contract. As a result of that briefing, the Deputy Director directed functional managers to identify DoD-standard systems, consistent with Corporate Information Management policies and principles, for satisfying deficiencies in their existing systems that ARMISS had been intended to remedy. No documentation existed to show that the status of the delivery orders was discussed at the February 1995 briefing.

On September 5, 1995, the Chairman of the Configuration Control Board for the Acquisition System submitted a proposed tasking to COMPEX Corporation to transition the data in the Acquisition System to the Oracle data base system. The scope of the tasking included tasks to implement the Oracle products and to integrate the Oracle financial software as part of a commercial solution to meet the functional requirements for the Systems Center acquisition process. The Inspector General, DIA, indicated that a planned follow-on audit of ARMISS will include the tasking. On October 2, 1995, the Director, DIA, issued a memorandum to the Systems Center, directing it to cease any contractual funding for ARMISS efforts specific to the Oracle products, pending completion of our audit. The DIA has $1 million designated for ARMISS in its FY 1996 spending plan.

Summary

The DIA was unsuccessful in achieving an integrated administrative management system because of poor planning and a lack of oversight. Specifically, DIA committed itself to a specific software solution without testing to verify whether the software would meet requirements. Because DIA did not consider the limiting characteristics of the Oracle commercial software and because DIA did not adequately define its requirements and business processes, it selected software that was unsuited to requirements. Also, DIA management disregarded the required use of the NSA finance and accounting system when selecting a software solution that was dependent on an integral general ledger component. Further, DIA showed poor business judgment by buying large quantities of software before testing the adequacy of the software for its intended use. Finally, DIA senior management approved the acquisition and permitted it to proceed, even though serious problems became apparent within 2 months of contract award. These circumstances provide evidence of a need for strengthened management controls over acquisition and contracting and a formal reporting process for tracking the progress of automated information system projects in the DIA.

The Office of the Under Secretary of Defense for Acquisition and Technology identified similar circumstances of poor planning and a lack of oversight in a Program Management Review that office performed on the entire DIA contracting process. For example, that review showed that DIA had no overall plan for the acquisition process and that requirements were ill defined. The review also showed that delivery orders should be managed as stand-alone procurements needing proper evaluation, documentation, and management oversight (see Appendix B for details).

Recommendations, Management Comments, and Audit Response

We recommend that the Director, Defense Intelligence Agency:

1. Cease all Agency Resource Management Information Support System development and implementation efforts until a comprehensive acquisition plan developed in accordance with Corporate Information Management policies and principles is approved.

Management Comments. The DIA concurred with the recommendation. The Director stated that the DIA is pursuing two efforts under the ARMISS, development and integration of a management information system using the Oracle data base system to satisfy requirements of the training and personnel functional offices. Further, all other aspects of the ARMISS have ceased, in accordance with the direction of the Director, DIA, pending finalization of the audit report.

Audit Response. Management comments are responsive. We agree with the decision to pursue efforts for the training and personnel functional offices as long as DIA does not integrate management information systems developed for those offices with the Oracle Government financial applications.

The DIA response, however, did not discuss specific development of a comprehensive acquisition plan. DIA did not provide the strategy for implementing a corporate management information system, including the Oracle Government Financial and Oracle Personnel applications. Specifically, the acquisition plan should cover the integration and migration strategy for implementing all the Oracle COTS applications into the DIA architecture and should identify the technical, business, management, and other significant considerations or risks controlling or affecting the implementation strategy. Therefore, we request that the DIA provide additional comments on the acquisition plan for the ARMISS in response to the final report.

2. Establish a system of controls to verify that:

a. The requirements of the Defense Intelligence Agency intended users are fully documented before an acquisition plan is approved.

Management Comments. The DIA concurred with the recommendation. The comments state that procedures already exist to ensure that documentation of user requirements are incorporated into acquisition plans and purchase requests.

Audit Response. Management comments are not fully responsive. Although we agree that the DIA has policies and procedures for ensuring that user requirements are considered in the acquisition planning, those policies and procedures were not followed in acquiring the ARMISS. Although the Systems Center sought involvement from DIA-wide functional and organizational users in developing ARMISS requirements and in identifying automated technological and functional process improvements, user involvement was not generally effective. All interaction of the ARMISS working group and the process action team funnelled through the Systems Center. We found no evidence that the Systems Center adequately considered or included comments or concerns addressed by the ARMISS working group or process action team in the ARMISS acquisition planning documents. Therefore, in response to the final report, we request that the DIA submit additional comments on how control verification will be accomplished.

b. Procurement is limited to those quantities required for testing until the suitability of the product or service for the intended purpose is demonstrated.

Management Comments. The DIA concurred with the recommendation, but provided no comments on limiting quantities until product suitability is demonstrated.

Audit Response. DIA Regulation 65-17 states that the Systems Center is responsible to analyze user requirements using prototypes to the extent possible to better understand and refine requirements and to design concepts.

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Nevertheless, the ARMISS request for proposal did not require the bidding vendors to demonstrate the concept of linking all seven administrative functions during the pre-award demonstration.

Our evaluations of the vendors' demonstrations indicated that the vendors demonstrated only the functionality of each application as independent systems. Furthermore, there was no need to procure 100 percent of the software because the DIA plan, as stated in the ARMISS statement of work, called for a modular implementation approach of the functional areas in order to prevent major disruption to existing work and to prevent downtime in critical functions. Commercial businesses test the features, performance, and capacity of COTS software by buying a small number of the product for evaluation, which the businesses use for prototyping, development, and testing. If the COTS software proves to be suitable, then the deployment quantities can be purchased with confidence. We request that in response to the final report, the DIA provide details on limiting procurement quantities until product suitability is determined.

c. Quarterly status reports detailing cost, schedule, and performance data are provided to senior Defense Intelligence Agency managers.

Management Comments. The DIA concurred with the recommendation, stating that senior management is kept apprised of procurement actions appropriately.

Audit Response. Management comments are not fully responsive. The point made in our report was that DIA-wide systems like ARMISS should receive the attention of the DIA Command Element. Although meetings were held to discuss the status of the ARMISS effort at the Systems Center and directorate levels, the concerns and issues that arose during the preaward and postaward phases of the ARMISS contract required Command Element involvement. For example, the System Center did not keep senior managers at the Command Element appropriately apprised of:

    o user concerns regarding the lack of effective communication and coordination;

    o the DIA Comptroller's recommendations to include a plan for reviewing and considering DoD standard systems and to procure the software on a module-by-module basis;

    o the effects that the DIA consolidation of accounting and finance functions with the NSA had on the ARMISS concept of operations; and

    o the Chief, Administrative and Resource Staff and Comptroller concern that the ARMISS statement of work did not identify discrete deliverables associated with clearly defined tasks that could be individually costed.

We request that in response to the final report, the DIA submit additional comments on establishing a system of controls to ensure that senior managers are kept appropriately apprised of important cost, schedule, and performance data for important DIA-wide acquisition programs.

Appendix D contains audit responses to DIA comments on specific issues in the finding.

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Part II - Additional Information

Appendix A. Scope and Methodology

Scope

ARMISS Project. We performed this audit jointly with the Inspector General, DIA. In response to anonymous allegations forwarded by the Chairman, Senate Committee on Armed Services we reviewed documentation relating to two contracts for the acquisition, customization, and implementation of ARMISS contract MDA908-93-C-0027 awarded June 7, 1993, to VSE for $6.9 million; delivery order 10, awarded September 23, 1993, for $568,408; and delivery order 30, awarded September 22, 1994, for $578,430 under contract MDA908-93-D-1503.

Methodology

At the Virginia Contracting Activity, we examined VSE technical and cost proposals, statements of work for the ARMISS and delivery orders 10 and 30, Source Selection Evaluation Board workbooks and files, source selection evaluation criteria, ARMISS requests for information, VSE and progress and status reports, and correspondence in the contract files for ARMISS and delivery orders 10 and 30.

At the Systems Center, we examined VSE deliverables specific to the functional requirements definition of the Oracle personnel and acquisition modules and to studies and analyses regarding the transfer of DIA accounting and finance functions to the NSA finance and accounting system. We also examined documentation on:

   o the acquisition planning and development and coordination of the ARMISS requirements;

   o deliverables specific to the implementation of the Oracle budget and acquisition modules;

   o the ARMISS pre-proposal conference;

   o the presolicitation demonstration of the Oracle products; and

   o correspondence in the contracting officer representative files.

At the DIA Directorate of Administration, we examined the Administrative Functional Control Board records of technical and functional issues regarding the ARMISS. At the office of the DIA Comptroller, we examined ARMISS program funding and information pertaining to the transition of accounting and finance functions to the NSA. We relied on Office of the Inspector General,

DoD, software engineers to perform a comparative analysis of the VSE and CSC efforts to determine whether the delivery orders were duplicative of work under the ARMISS contract. The software engineers also evaluated the technical implications of using the commercial software applications to satisfy the ARMISS requirements. All documentation examined was dated from July 1988 through September 1995.

We interviewed the Deputy Director, DIA; the Director, National Military Intelligence Systems Center and members of his staff; the former Director, Department of Administration; contracting officers at the Virginia Contracting Activity; personnel at VSE, CSC, BDM Federal International Company, and Oracle Corporation; the Chair and members of the Source Selection Evaluation Board; program management staff for ARMISS and delivery orders 10 and 30; and other DIA personnel involved with ARMISS and delivery orders 10 and 30.

Audit Period, Standards, and Locations. We performed this economy and efficiency audit from March through September 1995 in accordance with auditing standards issued by the Comptroller General of the United States, as implemented by the Inspector General, DoD, and, accordingly, included tests of management controls considered necessary. We did not rely on computer-processed data to achieve the audit objectives. Appendix F lists the organizations visited or contacted.

Management Control Program

DoD Directive 5010.38, "Internal Management Control Program," April 14, 1987, requires DoD organizations to implement a comprehensive system of management controls that provides reasonable assurance that programs are operating as intended and to evaluate the adequacy of the controls.

Scope of Review of Management Control Program. We reviewed management control procedures regarding the Systems Center's program management practices for the acquisition of the ARMISS. We also reviewed the Systems Center procedures pertaining to the use of the DIESCON for ARMISS implementation and integration.

Adequacy of Management Controls. We identified material management control weaknesses for DIA as defined by DoD Directive 5010.38. DIA management controls for acquisition planning and monitoring of management information systems were not effective to verify that user requirements and the system concept were fully analyzed, documented, and coordinated before the Systems Center prepared the ARMISS contract statement of work and before the Systems Center decided to use commercial software as a solution for satisfying the ARMISS requirements. The Office of the Under Secretary of Defense for Acquisition and Technology Program Management Review (see Appendix B) identified similar management control deficiencies. Also, controls were not effective to keep the DIA senior management regularly informed on the progress of the ARMISS project. DIA operating procedures permitted the

release of the ARMISS request for proposal when acquisition planning lacked content and preparation and permitted the continuation of the ARMISS project under the DIESCON after VSE identified a significant deficiency in using the Oracle commercial software to satisfy the ARMISS concept design and requirements. Recommendations 2.a. and 2.c., if implemented, will strengthen management controls over the acquisition planning and the project tracking processes. See Appendix E for a summary of those benefits. A copy of the report will be provided to the senior official responsible for management controls in the Office of the Assistant Secretary of Defense (Command, Control, Communications and Intelligence).

Adequacy of Management's Self-Evaluation. DIA reviews management controls every 5 years and performs an informal review every other year. The DIA management control program includes self-evaluations by program managers of assessable units. Program managers do not use checklists for evaluating management controls. The DIA plans to use checklists by FY 1996 at the request of the Inspector General, DIA. The Inspector General, DIA, suggested that checklists be used as a tool for assisting program managers in preparing opinions on management controls. The checklists would be provided to appropriate officials responsible for signing the annual statements of assurance. The DIA identified no material weaknesses in its FY 1994 annual statement of assurance.

Appendix B. Summary of Prior Audits and Other Reviews

Office of the Under Secretary of Defense for Acquisition and Technology

The Office of the Under Secretary of Defense for Acquisition and Technology and the Defense Logistics Agency performed a Program Management Review of the DIA contracting process. The review was conducted from January 23 through February 16, 1995. The review team identified problems with the DIA acquisition planning and requirements definition processes. Regarding acquisition planning, DIA had no overall plan for the acquisition process, requirements were ill defined because technical personnel had no incentive to develop statements of work for projects not likely to be funded, and contractor responsibilities were not clearly articulated in contractual instruments. The review team concluded that the acquisition planning function had become a "paper chase" within the Directorate of Procurement and that the technical community is not meeting the responsibility of writing statements of work.

Regarding requirements definition, the review team determined that DIA often provided broadly stated requirements in the basic contract and made attempts to narrow the scope through the issuance of delivery orders. The review team concluded that delivery orders should be managed as a stand-alone procurement with proper evaluation, documentation, and management oversight.

The review team recommended that the responsibility for acquisition planning be placed with staff knowledgeable of the technical aspects and that the Directorate of Procurement be taken out of the business of monitoring acquisition planning actions of $100,000 or more. The review team also recommended that acquisition planning concepts in DIA Manual 44-2, "Acquisition," be revised to include the development of meaningful planning tools to relate an acquisition strategy to a particular requirement. Further, the review team recommended ensuring that statements of work received from the requiring activities are well-defined in order to promote adequate competition and that contracting officers and technical analysts have a comprehensive understanding of the statement of work in order to validate technical proposals. The DIA is in the process of coming up with an action plan to implement each recommendation.

Inspector General, DoD

Inspector General, DoD, Report No. 92-084, "Acquisition of Automated Data Processing Equipment By the Defense Intelligence Agency," May 1, 1992, identifies a lack of formal acquisition planning. Specifically, the audit found no

evidence that DIA employed a structured, disciplined acquisition planning process; that planning documents specified the acquisition approaches considered or rationales used by DIA in making key acquisition decisions; or that DIA adequately coordinated the acquisition objectives, schedules, problems, status, and plans. In addition, inadequate planning directly contributed to questionable DIA actions and decisions regarding contract coordination, type, and costing methodology.

The report recommends revising DIA Manual 44-2 to indicate the considerations and requirements in planning acquisitions totaling more than $15 million in any fiscal year. DIA Manual 44-2 was revised to include a list of planning actions for verifying that requiring activity acquisition plans are completed. The report also recommends developing and documenting procedures to ensure that future requirements-type contracts are based on and developed from well-defined needs of the users. DIA Manual 44-2 was also revised to require supporting documentation from the users for all indefinite-delivery-type contracts.

Inspector General, DIA

Inspector General, DIA, Project No. 92-1215-0A-001, "Management and Control of Commercial-off-the-Shelf Software," August 22, 1994. The report identifies inconsistent and unreliable processes for meeting user requirements. Specifically, the justification and documentation for commercial software requests were either nonexistent or incomplete, a process for review and approval of requests was not established, and the processing of subsequent software acquisition actions was inconsistent.

The report recommends establishing guidance for the review of all software requests, implementing procedures to ensure all actions for software requests are fully documented, and implementing a method to track user requests.

The DIA concurred with all recommendations and has either completed or is in the process of planning action for each recommendation.

Inspector General, DIA, Project No. 94-1545-0A-014, "Automated Data Processing Hardware Inventory," August 2, 1995. The report states that automated data processing inventory records contained errors and that the accumulation of automated data processing inventory in the DIA warehouse was primarily caused by inadequate planning. The Inspector General, DIA, recommended implementing recommendations made by the Business Process Improvement Team V Acquisition Baseline Workshop to improve procurement tracking. The DIA has not completed a formal action plan; however, corrective actions are in progress for all recommendations.

Appendix C. Allegations and Audit Results

Allegation 1. In advance of issuing the competitive solicitation, the ARMISS program manager preselected an Oracle Corporation product, "Oracle Financial."

Audit Result. We were unable to substantiate the allegation. The ARMISS program manager and other DIA personnel attended a demonstration of the Oracle financial products before the issuance of a competitive solicitation. However, the solicitation did not specify that the vendors propose Oracle products, in whole or in part, to satisfy the ARMISS request for proposal. The vendors could propose any commercial software product that offered an integrated solution for satisfying the ARMISS requirements.

Additionally, the seven members on the ARMISS Source Selection Evaluation Board independently read and evaluated the ARMISS cost and technical proposals, documenting their scores in individual evaluation workbooks. In addition to the seven members, nine functional advisors independently evaluated the proposals. The proposals were evaluated on the mechanics of the proposals and the vendors' proposed solutions rather than the software products proposed by the vendors. Once the individual scoring was completed, the Source Selection Evaluation Board met to come to an overall consensus score.

DIA received three proposals for integrating its administrative functions. One vendor was disqualified because it proposed a software development solution rather than a commercial software solution. The remaining two vendors, VSE and Integrated Microcomputer Systems each proposed Oracle software products and Banner commercial training software. In addition, VSE proposed STARBUCS travel, and Integrated Microcomputer Systems proposed a Government-off-the-shelf travel program to satisfy the ARMISS request for proposal. We reviewed the source selection process and found it to be fair and reasonable.

Allegation 2. DoD acquisition regulations were not followed. Specifically, no formal funding plan, no formal acquisition plan, and no requirements definition were completed for the ARMISS project.

Audit Results. The allegation was substantiated. The DIA did not follow policies and procedures in DoD Directive 8120.1, specific to life-cycle management review and milestone approval for automated information systems projects. The DIA did not have a formal funding plan for ARMISS. In addition, senior management oversight permitted the realignment of funds from other Systems Center budgets to fund the ARMISS contract and contract modifications. The Systems Center had a formal acquisition plan; however, it was not sufficient. Specifically, the Systems Center did not adequately define the requirements for ARMISS, adequately analyze and explore the ARMISS concept design before procuring 100 percent of the assumed quantities of software, or consider the technical implications associated with the requirement for DIA to use the NSA accounting and finance system. See the Finding for details.

Allegation 3. The ARMISS Program Manager applied undue pressure on the ARMISS evaluation committee members and contracting staff to award the ARMISS contract.

Audit Result. We partially substantiated the allegation. We interviewed three of the seven ARMISS Source Selection Evaluation Board members, and two of them stated that they felt pressure by the ARMISS program manager to quickly award the contract. However, the two members asserted that outside pressure did not influence their decision. We also interviewed the contracting officer who awarded the ARMISS contract. He suggested recompeting the ARMISS request for proposal because, although the bids were acceptable, they were not exceptional. Also, the contracting officer suggested revamping the ARMISS statement of work because the contractor tasks were vague. However, we determined that the ARMISS program manager applied pressure to award the contract quickly.

Allegation 4. The ARMISS contract was permitted to expire because:

    o the Oracle products could not be modified to meet DIA needs, and

    o the contractor could not perform because of DIA undefined functional requirements.

Audit Results. The allegation was substantiated. The Oracle commercial software modules did not readily conform to the DIA business practices due to regulatory requirements, to the lack of functionality essential to business processes, or to design features inherent in the Oracle commercial software. For the Oracle commercial software to meet DIA needs, the software required extensive modification to the data base table structures and development of an import facility. Oracle Corporation considers changes of this magnitude to be risky which could result in relinquishing the software warranty and maintenance support agreements. See the Finding for details.

Allegation 5. The ARMISS program manager spent more than $1 million in an attempt to use the Oracle commercial software to satisfy resource management deficiencies in the Systems Center operational systems.

Audit Results. The allegation was substantiated. The ARMISS program manager spent about $1.1 million under the DIESCON to implement the Oracle financial modules. The work required under DIESCON delivery orders 10 and 30 were to provide the Systems Center with a fully functional, integrated system for tracking and monitoring budget expenditures and automated data processing acquisitions. However, the original intent of using the DIESCON was to integrate the customized software into the DIA automated environment for satisfying the DIA-wide ARMISS requirement. Further, the scope of work under delivery order 30 included replacing the Systems Center Acquisition System, which was an existing, operational system. However, CSC could not replace the Acquisition System due to the risks associated with importing data from external procurement and logistics systems. See the Finding for details.

Allegation 6. The ARMISS program manager redirected FY 1994 funds to acquire more than $1 million dollars in hardware to support the delivery order efforts under DIESCON.

Audit Results. We were unable to substantiate the allegation. DIA did not have an adequate mechanism for tracking the purchase of automated data processing equipment to specific programs. DIA purchases automated data processing hardware under its Systems Acquisition and Support Services hardware contract. Purchase requests may include requirements for more than one project, and the requirements were not well defined. Therefore, DIA had no assured method of accounting for all hardware purchased under the DIESCON efforts. To substantiate the allegation, we would have had to match purchase requests for the procurement of all hardware in FY 1994 against all invoices and would have had to perform a physical inventory of the hardware shipped. Inspector General, DIA, reports on "Management and Control of Commercial-off-the-Shelf Software" and on "Automated Data Processing Hardware Inventory," identified similar problems in tracking purchases to particular projects (see Appendix B for details).

Allegation 7. Attempts have been made to cover the issue or hide the fact that the Oracle software does not address DIA management information needs.

Audit Results. The allegation was not substantiated. We found that the Systems Center failed to keep DIA senior management regularly informed of the attempts that VSE or CSC made on customizing the Oracle software or on implementing the software into the DIA automated environment. Further, the Systems Center failed to make DIA senior management aware of plans to use the DIESCON as a vehicle to continue implementation of the Oracle commercial software. However, there was no evidence of an overt or conscious action to hide the difficulty in customizing the Oracle software or use of the DIESCON from DIA senior management. See the Finding for details.

Allegation 8. There has been virtually no real agency oversight of the ARMISS project.

Audit Results. The allegation was substantiated. Before the award of the ARMISS contract, the DIA command element formally met with ARMISS program management to discuss the broad objectives of the acquisition of ARMISS. Those meetings were held August 3, 1992, and March 3, 1993. After contract award in June 1993 through October 1994, the Systems Center briefed DIA senior management twice on the status of the ARMISS project, despite the deficiencies identified in the requirements documentation and in the Oracle software product to satisfy the system concept design. Finally, the Systems Center did not brief DIA senior management until March 1995 on the two delivery orders initiated in September 1993 and 1994. See the Finding for details.

Appendix D. Audit Response to Specific Management Comments

The DIA provided detailed comments on the finding in the draft report. Those management comments and our audit responses follow.

DIA Comments

Comments. The draft audit report overlooks the strategy regarding the use of COTS products in implementing the ARMISS concept.

Audit Response. We disagree. The intended use of a COTS solution does not mitigate risks of system development efforts. Implementation of COTS products requires the same development strategies as software development efforts and imposes the same risks, life-cycle, development, implementation, deployment, maintenance and other concerns of any major software development effort. In accordance with the Air Force Software Technology Support Center, "Guidelines for Successful Acquisition and Management of Software Intensive Systems," February 1995, use of COTS products does not prevent agencies from using traditional prototyping procedures. In fact, the Air Force guidance states ". . . it is often difficult to integrate all the COTS applications needed to provide the required functionality." To alleviate this burden, traditional approaches must be tailored to accommodate the acquisition and management of COTS solutions and to reduce risk.

One way to reduce risk is to allow the demonstration phase of the COTS product to reach the level of maturity where prototyping integrates the selected products in vertical and horizontal dimensions, creating a fairly complete system implementation. This phase can also significantly reduce the risk in the requirements baseline and system design, including the COTS product selection. Therefore, it is important not to procure 100 percent of the assumed quantities in case significant risk is identified.

The intent of our report was not to imply that COTS was a bad idea. We clearly understood that the COTS products would not satisfy 100 percent of the ARMISS requirements and that extensions to data fields or "flexfields" would be used to effect the necessary customization rather than modifying source codes. However, because the ARMISS contract with VSE was the first effort to apply a bundled suite of COTS products to integrate seven administrative functions, the DIA should have tailored the effort by using software development standards and practices as a guideline.

Comments. "Proof of concept" had been substantiated by the responses to the previous Government issued Request for Information, which demonstrated that COTS products indeed did exist in the marketplace.

Audit Response. We disagree. The request for information identifies availability of sources capable of satisfying the Government's requirements; however, the request for information does not prove that the concept works or that the product can be successfully implemented. Relying solely on product documentation or demonstration is an invitation to failure, according to the Air Force guidelines. DIA should have investigated other sites similar to the DIA structure where the complete suite of COTS products had been implemented.

Further, given the imposed legal and regulatory constraints on certain DIA business practices, that is, budget and personnel, the ARMISS concept of operations was not viable. Adequate demonstrations of the product, to include integrating the selected products in vertical and horizontal dimensions, mitigates risk in the requirements baseline and creates a fairly complete system implementation.

Comments. The DIA nonconcurs with the statement that allegations can be substantiated.

Audit Response. We disagree. The documentary and testimonial evidence obtained during the audit was sufficient to substantiate or partially substantiate six of the allegations.

Comments. Given the DIA acceptance of the VSE proposed schedule for implementation within 2 years, the plan to get users involved in the products, and the good price being offered, the DIA agreed to buy 100 percent of the assumed quantities as a good business decision. Due only to later events, when the ARMISS implementation plan radically changed, the DIA leadership stopped the financial management module indefinitely, and implementation went into hiatus, did the number of licenses seem an error. More than 200 of the 500 licenses procured under the ARMISS contract are being used.

Audit Response. We disagree with the DIA decision to procure 100 percent of the assumed quantities. In November 1991, the DIA Comptroller stated that a module-by-module approach should be adopted and that the contract should be constructed so as to provide maximum flexibility to the DIA to continue, exclude, or discontinue some module efforts.

For clarification, the licenses currently being used are only portions of the procured software, that is, Oracle data base system, Banner Student System, and portions of the Oracle financial module.

Comments. Both of the two viable contractors bidding on the contract demonstrated the proof of concept with the Oracle products and determined it was feasible. The issue was that leadership was not willing to accept a less than 100-percent solution and change business processes to maximize the usefulness of the product applications.

Audit Response. In addition to responses already provided, legal and regulatory constraints as well as lack of functionality prevented the DIA from using the Oracle COTS applications as intended. Specifically, the Oracle personnel module was not a Government application and did not contain forms

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or critical data fields needed to process mandatory, Government-specific personnel actions; Oracle budget module duplicated functionality inherent in the NSA accounting and finance system, the use of which was directed by the Under Secretary of Defense (Comptroller); the Oracle acquisition module did not contain key functionality such as a function that supports the processes of receiving, configuring, installing, and maintaining hardware; and Oracle Corporation did not have a standard interface to import data from external systems in the DIA environment.

Comments. The fact that the NSA replaced the Air Force does not alter the fact that a data feed to an outside financial and accounting function was considered and deemed feasible. Further, no one had proposed or considered, at any time during the planning or acquisition phase, that the Oracle financial management product would perform as the DIA system.

Audit Response. We disagree. As pointed out in the report, the decision to transfer accounting and finance functions to the NSA was made in August 1992. Even if no one fully understood that the NSA accounting system would perform as the DIA system, the Systems Center should have included the NSA accounting system in the ARMISS statement of work as a system that would need to interface with ARMISS. Furthermore, DIA officials proposed or considered the transition to the NSA accounting system during the planning stage. For example, on February 23, 1993, the Office of DIA Comptroller notified the Systems Center that DIA and NSA will use the standard DoD pay and finance and accounting systems. The Systems Center, as the DIA data administrator, could not prescribe a system solution for pay or finance and accounting systems, no matter which standards the DoD directed to be used. The DIA would have to develop the interfaces needed between ARMISS and the standard systems implemented at NSA.

In September 1992, another individual, a user on the process action team, addressed potential implications of using the NSA accounting system. He stated that:

> . . . it is my understanding that the DIA Comptroller has been directed by the Defense Finance and Accounting Service to use the finance package of the NSA. . . . As you probably know, all of the NSA's modules which DIA wishes to have are already up and running. If DIA went out onto the streets and bought another ARMISS package, how complete would the DIA ARMISS modules like logistics, acquisition, travel and budget be if the NSA based finance package is not compatible?

Comments. The contract was not terminated because the external interfaces were too difficult or the Oracle COTS products were not suited to satisfying the ARMISS goals.

Audit Responses. We disagree and stand by our position as stated in the report. The implementation strategy was significantly affected because of the Government's failure to provide the documented business processes to VSE, the

unanticipated difficulty in customizing the software, and the conflict between the ARMISS concept of operations and the use of the NSA accounting and finance system.

Comments. The statements and conclusions in the report regarding the Chief (as the ARMISS program manager) of the Logistics Division's professional conduct with VSE, the DIESCON delivery orders, and senior management involvement, are inaccurate.

Audit Response. The ARMISS program manager circumvented procurement practices on a number of occasions during the ARMISS effort as noted in the report. The ARMISS program manager bypassed the Contracting Officer Technical Representative as well as VSE, the prime contractor, in executing the ARMISS contract. The ARMISS program manager called an emergency Administrative Functional Control Board meeting in July 1993 to inform functional users that they needed to answer some questions, at the request of VSE, as quickly as possible to facilitate the interview process. VSE informed the Agency Business Manager, Co-Chair of the Board, that the questions and answers were useless and that the ARMISS program manager and Oracle Corporation had arranged for the question and answer drill without VSE knowledge.

On August 31, 1993, VSE held an ARMISS meeting with DIA officials. At the conclusion of that meeting, the President and Chief Executive Officer, VSE, spoke to the Director of the DIA Contracting Activity, regarding the coordination process and flow of information between the ARMISS program manager and the ARMISS Contracting Officer Technical Representative. The President stated that the Contracting Officer Technical Representative was not kept informed of tasking assignments given by the ARMISS program manager to the VSE team and of meetings that he held with VSE or Oracle employees.

Comments. The DIA nonconcurs with the statement in the report that, ". . . the ARMISS concept continued to be invalid because the Oracle budget module needed to interface with the NSA system to provide an integrated solution." The suite of Oracle COTS products can work either independently or in conjunction with each other. Also, implementation of the financial module ceased because of policy decisions made by senior management regarding the use of the NSA system, not because the ARMISS concept was not feasible.

Audit Response. The fact that the Oracle COTS products could not be physically linked to the NSA accounting and finance system was the reason that the ARMISS concept, as envisioned, was no longer viable. It is true that the DIA Comptroller did not object to the System Center's initiative to install and integrate the Oracle financial module into the Systems Center's environment to replace its WANG system and to serve as a resource manager's tool. However, the Comptroller, as well as other cognizant officials within the DIA Comptroller's office stated that the Systems Center had no valid need for a general ledger and that the Oracle financial module was not an adequate replacement for the WANG system because much of the capability inherent in the Oracle product could not be used due to the restrictions imposed by the DIA Comptroller.

The DIA Comptroller indicated that there could be no operational processing in ARMISS and no arrangements that constituted a financial commitment. Use of the Oracle financial module as a resource manager's tool was limited to an independent system because the module could not link to the NSA accounting and finance system. The Oracle financial module could be used as an interface tool to provide access to the raw data. However, the concept of a centralized, integrated client-server environment was no longer viable.

Comments. The DIA nonconcurs with the rationale regarding Allegation 2. Specifically, no formal funding plan, no formal acquisition plan, and no formal requirements definition existed for the ARMISS project.

Audit Response. The DIA had a formal acquisition plan signed by all appropriate individuals that met the documentation requirements established by the DIA Contracting Activity. However, the content of the acquisition plan was not sufficient, as stated in our report.

Comments. The DIA nonconcurs with the rationale regarding the cited substantiation for Allegation 3.

Audit Response. We obtained testimonial evidence from two Source Selection Evaluation Board members as well as the ARMISS Contracting Officer that they felt pressure from the ARMISS program manager to award the ARMISS contract quickly. The urgency to award the ARMISS contract in June 1993 represented poor planning because during the first few months of the contract, VSE was directed to implement the finance and acquisition module. Fourth-quarter work loads for those two offices, however, forced significant changes to the ARMISS implementation schedule, and we believe there was no need to award the contract quickly.

Comments. The DIA nonconcurs with the rationale regarding the substantiation for Allegation 4.

Audit Response. The DIA was not able to implement the Oracle personnel module because the VSE analysis of the software identified that it could not be readily tailored within the design of the COTS product capabilities and would require extensive modification to source code, which would jeopardize warranties and maintenance support agreements. The personnel functional area needed a solution that would accommodate the Government-mandated legal and regulatory business practices. Furthermore, the VSE analysis of the Oracle acquisition module identified a lack of functionality and risk associated with importing data from existing procurement and logistics systems to the acquisition module. VSE indicated that a concept of operations needed to be developed to determine how the existing Oracle systems would interface.

Comments. The DIA nonconcurs with the rational regarding the substantiation for Allegation 5.

Audit Response. As a result of technical complexities associated with the interface development and the integral general ledger, the DIA should not have

continued efforts to upgrade or replace its existing administrative, management information systems under the DIESCON contract until the Systems Directorate developed and evaluated a detailed implementation strategy.

During the audit, we were made aware that the Logistics Division had plans to connect the general ledger to the local area network and to eventually link the purchase module to the general ledger so that the Logistics Division could build purchase requests in-house. According to Logistics Division personnel, they were planning to define further CSC support using technical expertise of COMPEX Corporation personnel. The support consisted of transitioning the data in the Acquisition System to the Oracle data base system and transitioning existing user applications to the Oracle Government Financial modules.

Comments. The DIA nonconcurs with the rationale regarding the substantiation for Allegation 8.

Audit Response. We found no evidence that users were expecting the COTS products to provide a 100-percent solution. Rather, users were merely looking for a solution to satisfy their functional requirements, to include replacing antiquated systems. When users learned that the Oracle COTS products did not readily conform to significant business practices, lacked essential functionality, or lacked a standard interface to external systems, users began looking at the upcoming (February 1995) standard DoD-wide corporate information management systems as a solution, in accordance with the direction of the Deputy Director, DIA.

Appendix E. Summary of Potential Benefits Resulting From Audit

Recommendation Reference	Description of Benefit	Amount and Type of Benefit
1.	Economy and Efficiency. Stops further acquisition effort until planning documentation is developed in compliance with existing DoD guidance.	Nonmonetary.
2.a.	Management Controls. DIA will include the users in development of acquisition plans.	Nonmonetary.
2.b.	Economy and Efficiency. DIA resources for commercial software acquisitions will be spent on technically feasible and cost-effective alternatives.	Undeterminable.*
2.c.	Management Controls. Establishes procedures to track, monitor, and report the status of automated information system projects on a regular basis.	Nonmonetary.

*Monetary benefits were undeterminable because the DIA resources earmarked for commercial software acquisitions may be used for bulk purchases without testing to reduce the risk associated with integration into system designs.

Appendix F. Organizations Visited or Contacted

Office of the Secretary of Defense

Assistant Secretary of Defense (Command, Control, Communications and Intelligence),
 Washington, DC

Other Defense Organizations

Defense Intelligence Agency, Washington, DC
National Security Agency, Fort George G. Meade, MD

Non-Government Organizations

Value Systems Engineering Corporation, Alexandria, VA
Computer Sciences Corporation, Falls Church, VA
Oracle Corporation, Bethesda, MD
BDM Federal International Company, McLean, VA

Appendix G. Report Distribution

Office of the Secretary of Defense

Under Secretary of Defense for Acquisition and Technology
    Deputy Under Secretary of Defense (Acquisition Reform)
    Director, Defense Logistics Studies Information Exchange
Under Secretary of Defense (Comptroller)
    Deputy Chief Financial Officer
    Deputy Comptroller (Program/Budget)
Assistant Secretary of Defense (Command, Control, Communications and Intelligence)
Assistant to the Secretary of Defense (Public Affairs)

Department of the Army

Auditor General, Department of the Army

Department of the Navy

Assistant Secretary of the Navy (Financial Management and Comptroller)
Auditor General, Department of the Navy

Department of the Air Force

Assistant Secretary of the Air Force (Financial Management and Comptroller)
Auditor General, Department of the Air Force

Other Defense Organizations

Director, Defense Contract Audit Agency
Director, Defense Intelligence Agency
Director, Defense Logistics Agency
Director, National Security Agency
    Inspector General, National Security Agency

Non-Defense Federal Organizations and Individuals

Office of Management and Budget
Technical Information Center, National Security and International Affairs Division,
    General Accounting Office

Chairman and ranking minority member of each of the following congressional
    committees and subcommittees:

Senate Committee on Appropriations
Senate Subcommittee on Defense, Committee on Appropriations
Senate Committee on Armed Services
Senate Committee on Governmental Affairs
Senate Select Committee on Intelligence
House Committee on Appropriations
House Subcommittee on National Security, Committee on Appropriations
House Committee on Government Reform and Oversight
House Subcommittee on National Security, International Affairs and Criminal
    Justice, Committee on Government Reform and Oversight
House Committee on National Security
House Permanent Select Committee on Intelligence

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Part III - Management Comments

Defense Intelligence Agency Comments

DEFENSE INTELLIGENCE AGENCY

WASHINGTON, D.C. 20340-

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U-003/S-04

MEMORANDUM FOR THE DIRECTOR, READINESS AND OPERATIONAL SUPPORT DIRECTORATE
           ATTENTION: Audit Program Director

SUBJECT: Audit Report on Agency Resource Management Information Support
           System (Project No. 5RF-5025)

Reference: DoD IG memorandum of 31 October 1995, subject as above

1. The Defense Intelligence Agency (DIA) concurs with the recommendations
proposed by the draft audit report on the Agency Resource Management
Information Support System (ARMISS). Regarding the report's recommendations,
the following actions are already underway or are in place within the Agency:

    a. The Director, DIA, directed that those aspects of ARMISS relating to
Training (BANNER) and Personnel continue to be pursued, but all other aspects
of ARMISS are being held in abeyance pending finalization of the audit report.
At that time, DIA will review the corporate management information system and
determine further actions. The problems and needs upon which the requirement
for a corporate management information system have been long based still
exist.

    b. Procedures are in place within DIA to ensure requirements reflect user
needs, that multiple authorities are involved in the coordination and approval
of acquisition actions to ensure the Agency's best interests, and that senior
management is kept apprised of procurement actions appropriately.

2. In order to ensure as accurate and true a record is presented, DIA is
providing comments regarding the draft report statements, conclusions and
findings. DIA believes that none of the allegations can be substantiated.
The enclosed comments and change requests are provided to detail DIA's
concerns. They are arranged in three sections: Introduction, General/Overall
Comments; and Detailed Specifics in order of the report.

3. Request the draft audit report be modified pursuant to the enclosed.

FOR THE DIRECTOR

1. Enclosure a/s
                  RICHARD B. WALKER
                  Director, National Military
                    Intelligence Systems Center

DEFENSE. INTELLIGENCE AGENCY COMMENTS ON
DoD IG DRAFT.AUDIT REPORT ON ARMISS (PROJECT NO. 5RF-5025)

INTRODUCTION

The Defense Intelligence Agency non-concurs with the draft audit report on the Agency Resource Management Information Support System (ARMISS), Project No. 5RF-5025. The Agency takes exception to many elements of the report.

Significant amounts of documentation and other pertinent information were provided the combined DoD and DIA IG audit team. Every effort was made to provide support to the audit team in providing details of roles, responsibilities, events and actions. However, the audit report as written does not reflect a large part of the information provided and in some cases reflects the lack of interviews of key individuals (such as the Chairman of the ARMISS Source Selection Evaluation Committee). The draft audit report needs to be updated to reflect the correct assimilation of events in context and sequence. These include the long-standing demand for an Agency management information system through multiple separate contracted and Government examinations, studies, team efforts and reports. The substantial role the representatives across the Agency played in developing, defining and validating functional requirements, and coordinating throughout the entire and extensive process leading to two specific contracting efforts (the Request for Information (RFI), and Request for Proposal (RFP)), including the numerous corollary actions such as pre-proposal conference, bid evaluation plan development, bid evaluation, successful system demonstrations using COTS products by the bidding vendors, and post-award demonstrations--and enthusiastic reception by the functional representatives.

It should be noted that all the principle DoD regulations governing acquisition processes which were cited in the draft audit report (and to which DIA must conform as reflected in DIAM 44-2 and DIAR 65-17), will be, in large part, superseded by a revised DoD Directive 5000.1, and DoD Instruction 5000.2 integrating the 5000 and 8120 policy. This draft, currently in review, is intended to bring DoD policy and procedures into line with the Federal Acquisition Streamlining Act (FASA) of 1994. The major themes of this revision are to replace "outdated management techniques and philosophies..." with a "...management process, modelled much more closely than before on sound, commercial business practices" to, among others "emphasize our reliance on commercial products" and to balance responsibility with authority which "dramatically reduces the burden of mandatory procedures and specifications, and encourage prudent risk management", and "reflect the importance of working as *cross-functional* teams." Much of this has already been articulated over the past four years by senior DoD and DIA officials, and this DoD revision is the formal expression of such previous guidance. A companion document, DoD 5000.37H, "The NDI Handbook," is also in coordination and expected to be issued in the near future. This will provide a guide for acquisition managers and personnel in other functional areas for buying commercial and nondevelopmental items. The handbook relates the impetus for using commercial items and cites,

"In defining requirements you must give first preference to the use of commercial items and second preference to the use of other types of NDI. This is a provision of the Federal Acquisition Streamlining Act....Consider the application of NDI as a matter of degree rather

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than an all or nothing proposition....Buying and using commercial and
other nondevelopmental items also present some challenges and
departures from acquisition 'business-as-usual.' For example, items
...may require performance trade-offs...."

The planning and initiation effort on ARMISS sought to adopt and follow the
many policy statements that early in the 1990s embodied those ideas and
practices. Though DIA followed guidance as it existed at the time, DIA also
attempted to follow the Government's intent and direction. That intent and
direction has subsequently become institutionalized in increasing detail in
Government and DoD policies and directives. The evaluation of this ARMISS
effort must be in the context of these drastic changes that were, and still
are, taking place in the Government and DoD acquisition realm, because those
efforts were in consonance with the guidance that has been consistently
promulgated by senior DoD officials.

Substantiation of the concepts upon which the ARMISS planning effort was
founded has been consistently voiced from authorities outside DIA. The DoD
Office of the Comptroller, the Chief Financial Officers Council (composed of
the Chief Financial Officers of federal agencies covered by the Chief
Financial Officers Act of 1990) and the Joint Financial Management Improvement
Program (began in 1988) have reiterated precepts fundamental to the ARMISS
planning in addition to OSD C3I Corporate Information Management direction.

In line with the above, Agency comments addressing shortcomings in the
draft audit report are being provided as follows.

- First, there will be general comments on the overall draft report to serve
  as the foundation for the more specific detailed comments.

- Then detailed specifics of the report are addressed page by page. Each
  allegation for which substantiation has allegedly been found will be
  addressed.

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GENERAL/OVERALL COMMENTS

1. The overall report is difficult to follow, even for those knowledgeable about the sequence of events and the actions taken. The report does not give the complete picture of events in many areas, or include distinguishing dates, thus creating serious negative impressions of actions taken or not taken. There were over four years (1990--1994) of activity connected with the ARMISS effort, in which much happened. The conciseness of the report does not reflect consideration of the full picture. Material is included below to support recommended revisions/rewriting.

2. The Agency does not concur with the draft report statements regarding roles and responsibilities. The citing of an "ARMISS program manager" must be corrected throughout the draft report. Additional material needs to be added to reflect understanding of the tasking sequence; appropriate terms, roles and responsibilities; and distinguish between the effort to address the long-standing problem for the Agency at the macro level in the planning phrase, and the implementation of the AIS strategy developed during the initial effort at the project level. The draft report must be corrected to recognize the intrinsic and continuing involvement of functional and organizational team members throughout the entire process, and the planned and structured involvement of Agency representatives through implementation. The gathering of functional requirements, coordinating with Agency representation from working group to executive committee presentation, the completion of all elements of the Agency's acquisition procedures ending with uncontested contract award and the creation of a management structure, the Administrative Functional Control Board (AFCB), intended to monitor and assist implementation. Once the contract was awarded, an AIS technical project manager was named and responsibility for the contract and overall ARMISS, including COTS customization and implementation, came under the purview of the assigned AIS technical project manager in consonance with Agency/SC procedures. The technical project manager assigned had participated in the Request For Proposal and Statement of Work effort, was a member of the ARMISS Source Selection Evaluation Board and had technical qualifications for this complex undertaking.

The leader of the planning effort as established initially by senior DIA management to set the direction and strategy for the ARMISS Project worked with Agency-wide participation throughout the effort. The same individual was also designated by senior DIA management as the leader of the Process Action Team to identify and make recommendations on achieving Agency efficiencies. ARMISS was recognized as a technological improvement that would indeed achieve some level of efficiencies, but that true efficiencies stem from changes in the functional processes themselves. To ensure management control of both the functional and technical elements, a management structure was proposed, approved by senior management, and put into place to jointly address functional and technical issues, identify and propose resolutions to conflicts in priorities, and provide oversight--the Administrative Functional Control Board.

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3. To clarify the draft report regarding what was the ARMISS concept and
strategy and what was the implementation control and monitoring process and
what individuals were responsible in each phase, the following is provided:

The *ARMISS concept* is simply that an integrated suite of applications
meeting the major administrative functional requirements of the Agency
provide a corporate management information system (MIS) through single
data-entry with multiple data uses at all levels of users as well as
higher management levels. ARMISS applications would interact with each
other in a way that would appear almost seamless. Continual rekeying of
data, non-value added redundancy of stovepipe systems and manpower
intensive support would be eliminated, with improvement in accuracy,
responsiveness and demystifying of processes with shared data. ARMISS was
envisioned as an ADP "enabler" to achieve efficiencies, incorporating OSD
C3I Corporate Information Management principles, policies and intent.
This included the use of commercial off-the-shelf software products to
rapidly achieve functionality, recognizing and accepting a less than 100%
solution level. This approach would provide the corporate management
information system functionality as recommended by previous studies and
had been approved by the participants in the requirements definition
process. It was briefed to senior DIA leadership and approved. ARMISS
was designated a site-unique migration system.   These points appear to be
missed or misunderstood by the audit team.

The *ARMISS contract* was an acquisition effort to acquire the software with
innate integratable characteristics that met the functional requirements
of the Agency's Request for Proposal. The Oracle suite of products
acquired included an extensive capability to be tailored to specific user
demands through what are called "flexfields." These "flexfields" permit
customization without changing the actual code structure. However, the
customization required functional users to both understand their own
process and be able to articulate reasonable demands of the data
structure, and understand the capability of the software being provided.
The ARMISS contract with VSE did include customization of the software,
module by module--or function by function. It did not include the effort
to bring that software into the Agency's environment; that was the
responsibility of the Government (DIA) and stated in the Request for
Proposal. Those actions were intended to be executed through in-house or
contracted effort using the pre-existing DoDIIS Integration and
Engineering Contract (DIESCON).

The *ARMISS implementation* was the Government-responsible set of activities
which included Contracting Officer's Representative (COR) oversight of the
VSE contract, plus companion activities such as the integration of the
software into the Agency, and ancillary activities falling within the
parameters of the ARMISS concept (such as the Agency's Automated Tasking
System) which were the responsibility of the AIS technical project
manager.

4. The draft audit report overlooks the strategy regarding use of COTS
products in implementing the ARMISS concept. The announced DoD policy was to
use COTS products whenever possible. This has been ever increasingly
emphasized, particularly in functional areas in which private industry has a

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clear lead. The argument, reiterated by the DISA leaders in implementing DoD migration systems, is that COTS products are understood to provide less than a 100% solution. The DIA approach considered the remaining percentage as what should then be the basis for evaluation to determine value-added when discerning and evaluating the remaining "customer demands." Private industry, motivated by profit margin, has led the way in developing and marketing COTS products which are highly effective and efficient in reducing manhours for administrative processes. Per OSD and DISA guidance (in accordance with Congressional legislation (1986)) "...requiring DoD to give preference to the acquisition of nondevelopmental items" use of COTS is stressed. "Proof of concept" had been substantiated by the responses to the previous Government issued Request for Information which demonstrated that COTS products indeed did exist in the marketplace which could be used advantageously. Oracle, a worldwide leader in such products, was cited by both of the only two viable contenders responding to the Government's Request for Proposal.

5. The report also confounded the two DIESCON delivery orders, both with each other and in relation to the ARMISS contract effort by VSE. The distinctions are clear, and are addressed in the specific comments below.

6. It is mentioned in the report that the ARMISS concept and SOW stated that the Government would be willing to change the ways it does business if necessary. The report did not mention that upon contract award this initial, approved strategy was not followed and the effort was allowed to go in the direction of seeking a traditional from-the-ground-up software development, 100% solution. Though the plan for the technical solution had been arrived at with group participation across functional and organizational elements, the implementation itself became perceived as an SC effort--not a multi-level functional joint effort with SC providing the technical support. This transference in perceived responsibility from group dynamics to SC led to the resumption of expectations back to the more familiar experiences of a from-the-ground-up development effort, resumption of expectations for an ADP solution. Instead of grasping those elements of the software which did satisfy requirements and would have resulted in shared data across the Agency and multiple levels of use, demands and conditions being cited as absolutes stymied the contractor personnel. This in turn stymied SC: ADP can only be an enabler, not dictated to force changes in functional processes. This important point and its contribution to the decision not to exercise the contract option needs to be incorporated into the draft audit report.

7. DIA complied with established guidance, policies, procedures and directives and intent as they applied to the COTS product-based effort (e.g., DoD Directive 5000.1, section c, paragraph 1.c., "...maximum practical use shall be made of commercial and non-developmental items"): DoD Directive 8000.1, "Defense Information Management Program," DoD Directive 8120.1, "Life-Cycle Management of Automated Information Systems," DoD Directive 5000.2, "Defense Acquisition Management Policies and Procedures" (part 5, section D, "Technology Transition and Prototyping"), DoD Directive 5010.38, "Internal Management Control Program," DIA Regulation 65-17, "Automated Information Systems (AIS) Management Policy," DIA Manual 44-2, "Acquisition." Concepts, elements and goals were consistent with those espoused by OSD (C3I) Corporate Information Management program and the DISA DoD Enterprise Integration and Migration Systems efforts. The ARMISS project was not a DoD Standard 2167A

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Software Requirements Development Type Effort. None of the contract efforts addressed in the report were put in place to do a ground-up software development effort.

8. DIA has kept current with consistent revalidation of the precepts which were the foundation to the ARMISS planning that are evident external to DoD from the Chief Financial Officers Council (CFOC) and the Joint Financial Management Improvement Program. The FAR has already been streamlined in addressing COTS. The drafts for revising DoD Directive 5000.1 and DoD Instruction 5000.2 (superceding DoD 5000.2-M, DoDD 5000.49, DoD 7920.2-M, DoDI 7920.4, DoDD 8120.1, DoDI 8120.2 and numerous policy memoranda), and DoD 5000.37H reflects streamlining and addresses COTS consistent with the DIA concept applied to ARMISS.

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DETAILED SPECIFICS

Draft Audit Report: Executive Summary
Pages i--ii

Page i, Introduction.

DIA Response. The Report's over-conciseness as previously stated is reflected
in the Introduction. The compression omits key elements, and rolls
information together so the overall result is incorrect in regard to the
entire ARMISS effort, the DIESCON delivery orders and their relationship to
ARMISS, and the functions being "replaced". Recommend rewording for clarity
and accuracy as follows:

> The Defense Intelligence Agency (DIA) intended for the Agency Resource
> Management Information Support System (ARMISS) to be an integrated suite
> of commercial off-the-shelf (COTS) computer software products that would
> enable standardization of existing administrative systems, elimination of
> redundant data bases and rekeying of data, promote the exchange of
> information, and provide a common data base of resource information to
> support management. This was in recognition of expressions of need
> provided to the DIA leadership in numerous studies and after a DIA Request
> for Information demonstrated that applicable software solutions were
> available in the marketplace. In June 1993, the Defense Intelligence
> Agency awarded a contract to VSE, totalling $6.9 million to acquire COTS
> products to support primary functional areas (e.g., financial management,
> personnel, acquisition). The contract also included services to be
> provided by VSE, Inc., such as customizing within the parameters of the
> COTS products to meet DIA specific functionality. The Government was
> responsible for integrating the products within the DIA environment and
> making any interfaces with other systems or products as necessary. In
> September 1993 and 1994 the Defense Intelligence Agency issued delivery
> orders under the DoDIIS Engineering and Integration Support Contract
> (DIESCON) totaling $1.1 million to bring products acquired through VSE
> into the DIA environment. The DIESCON, an indefinite-delivery,
> indefinite-quantity contract, had been separately and previously
> established for integration efforts necessary to bring ADP products into
> the DIA environment--including those acquired through VSE.

> This audit was performed in response to a request from Senator Strom
> Thurmond to review allegations received anonymously of improprieties
> related to the procurement of commercial software for the ARMISS.

Page i, Audit Results.

DIA Response: DIA non-concurs with the statement that allegations can be
substantiated. Allegations are addressed in detail below.
Correction of this section and the rest of the summary in consonance with the
corrective material, comments and recommendations provided by DIA is
requested.

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Draft Audit Report: Part I - Audit Results
Pages 2--13

Page 2--3, Audit Background.

Page 2, Need for An Improved Administrative Management Information System.

DIA Response. This paragraph of the Report is overly concise, omitting key facts and considerations and leading to misstatements and erroneous interpretations and conclusions. Recommend rewording for clarity and accuracy as follows:

Defense Intelligence Agency (DIA) administrative systems were recognized, through in-house and contracted studies and evaluations, as fragmented, labor-intensive, and inefficient. In general, administrative information is redundantly processed in stand-alone systems that do not provide common access and were developed separately for individual functional purposes. The necessity of cross-functionality, efficiencies now drives the Agency toward shared data for a multitude of good-management reasons, espoused throughout DoD and private industry, for example:

- treating data as a corporate resource, linking functions;
- elimination of duplication;
- using ADP as an enabler of corporate efficiencies in business processes, not the solution in itself;
- involving the functional user in all phase of activities;
- structuring a balance between functional and technical
- recognizing that incremental solutions are necessary--solve the big payback issues first and work on the rest as time and resources become available.
- building a unique system from the ground-upwards and writing code is no longer affordable in development, or maintainable in upkeep, upgrades and training costs;
- achieving higher accuracy and faster response time because the data is not being hand entered repeatedly with differing meanings/timing/human error, and analytical time being wasted to track disparities in reports from different sources.

In July 1988, the Director of DIA called for a DIA-wide management information system. A team representing major organizational elements was formed. This effort evolved in 1989 to a working group which met regularly and held the objective of identifying Agency-wide applications initially for integration into the Agency MIS; provided a forum for information exchange and identify and resolve corporate issues. Issues included integrating Directorate applications into the corporate MIS, procedures for managing shared data in corporate-wide applications, and corporate versus individual user funding/management for corporate application development and implementation. The working group was broadened for better functional representation. Unfortunately, upon resignation from the Agency of the chairman of the working group in 1990, momentum was temporarily lost. The unfinished objective was recognized

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and accepted in 1991, when under the joint leadership of DS (now SC) and
RS (now DA), DS accepted chair responsibilities of a working group of
representatives from key Agency organizations to bring the effort to
conclusion. The Chief of the DS Resources Management Division was
appointed to lead the planning effort which was essentially a continuation
of the previously established team/working group mechanism.

Page 2, ARMISS Concept of Operations.

DIA Response. This paragraph of the Report, as written, is overly concise and
is missing key information. Recommend rewording for clarity and accuracy as
follows:

DIA planned to establish a corporate management information system
supporting multiple users with an integrated set of software tools that
provide support across the spectrum of administrative functions including
Personnel, Financial Management, Travel, Training, Acquisition, and
Logistics. Technically feasible solutions joined the then fresh
management principles of Corporate Information Management which stressed
ADP as an enabler of management efficiencies, but not an end unto itself.
This was part of the changing DoD culture which stressed data
standardization, and functional drivers to technical solutions, systems
consolidation, software standardization and reuse, and using COTS products
instead of continually reinventing that which was already not only extant
but commercially viable.

The goal was not only to replace multiple stand-alone systems, each
developed separately to serve the organizational needs of its sponsor, but
to provide the integrated databases to functional users at all levels of
the Agency. Therefore, for example, program managers at every level
within the Agency would have a software product capable of providing in-
depth information about their resources, not just Agency budget officials.
These integrated, functionally focused sets of data would in effect create
a single shared database available at varying levels of access, a
corporate management information system. The goal is consistent with
Corporate Information Management policies and principles, as defined in
DoD Directive 8000.1, "Defense Information Management Program," October
27, 1992, which emphasized the capability of automated data processing in
support of business process improvements, data standardization, and
systems consolidation. This is also consistent with the Joint Financial
Management Improvement Program (JFMIP). Principles associated with
meeting the Corporate Information Management goals include function
process improvement projects and functional technical integration analysis
and planning.

ARMISS was intended to promote exchanging and sharing information,
minimizing redundant development of user applications, reducing the
potential for errors by eliminating multiple entries of the same data,
maximizing data availability to upper management for decision making,
maximizing data availability to lower, multi-functional echelons for
meeting responsibilities regarding daily operations, status reporting,
situation analysis and work scheduling, responsiveness to leadership and

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emergent issues, and permitting electronic tracking of a variety of data.

The Agency estimated that commercial software--again, in keeping with OSD (C3I) CIM objectives--would provide the Agency a COTS solution that would satisfy the majority of functional requirements--between 60% and 80%. In many cases, the COTS products would provide users with capabilities they never had and would otherwise be unlikely to get in any near-term timeframe. It was anticipated that interfaces would have to be built to major systems such as that used by the Agency's contracting activity and logistics activity--and the Agency's accounting activity. Once the COTS software was operational, review of the remaining individual user demands would be made, assessing the value added of that demand, with whatever necessitated it. If a requirement truly withstood critical scrutiny, then a work order would be initiated for either Government or contractor solution. The key to ARMISS was that the software, linking the major Agency administrative functions, be deliberately interlinked from the start, giving a single-entry/multiple function character to the effort, whatever suite of software was used. A major assumption existed then, and remains that major administrative processes do not functionally vary so substantially within Government and private industry to preclude a COTS solution--except by impediments and regulations, and processes that are within reasonable bureaucratic control to change. Therefore, considerable effort should be expended, first to maximize the COTS solution including business process improvements, and then to take software development actions only when proven absolutely vital for the good of the Agency--not an individual's user's preference.

The ARMISS concept was a direct outgrowth of the previous studies, workgroups, and contracted/in-house evaluations. It was recognized as a technical mechanism to achieve some improved level of efficiency, but that true efficiency had to be based in business process improvement. These OSD C3I CIM principles, particularly of ADP being an enabler but necessitating functional management for direction and process improvement, were substantiated in the Agency's Administrative Efficiencies study. The role of ARMISS as a technical improvement was substantiated. It was in this Administrative Efficiencies effort that the ARMISS planning leader proposed the management structure that was put into place in the Agency that provided the discussion and decision-recommendation forum for addressing functional and technical issues of efficiency achievement--by automated systems such as ARMISS or by functional/business improvement efforts. It was this Administrative Functional Control Board (AFCB) with representation across the Agency administrative functions plus organizational representation that was anticipated to play a major role in implementing the ARMISS concept. Functional representation included financial management, acquisition, contracting, logistics, personnel, training, travel. Organizational representation included the major directorates and offices such as the Office of the Comptroller. Many of the participants on this Board were also very active in the subsequent acquisition effort as well, and were expected to provide continuity and focus.

Contracting for Acquisition of ARMISS. On June 7, 1993, the Virginia Contracting Activity, DIA's contracting authority, awarded contract

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MDA909-93-C-0027 to the Value System Engineering Corporation (VSE) to
procure and customize an integrated commercial-off-the shelf (COTS) suite
of software products to serve as the foundation for ARMISS. The VSE based
its bid on using Oracle Corporation COTS products for most of the
administrative functions: financial management, acquisition, personnel
and logistics modules. The contract was a cost-plus-fixed-fee completion
type contract for procurement of the products and customization within the
scope of the products capacity to meet DIA specifications. The contract
was multiple year (5), targeting customization by functional module over a
two-year period, plus maintenance (following three years), a total price
overall of $6.9 million.

The contract award culminated an extended period of requirements
development, articulation, and Agency acquisition efforts. The Agency had
assigned responsibility to the Information Systems Center (addressed
above) and appointed a planning team leader. However, the entire
acquisition effort was characterized by Agency-wide functional and
organizational team effort. The team participated fully in requirements
determination, definition, then developing the Statement of Work for the
Request for Proposal. They also coordinated on the Agency's Advance
Acquisition Plan, prepared their leadership for participation at the
Agency's decision-making forum (the Director's Executive Committee). They
coordinated on every acquisition activity, including developing the
evaluation plan, demonstration plan, pre-bid conference, pre-award
demonstration, evaluation of bids, and post-award demonstrations. The
team membership for the acquisition effort in most cases overlapped
membership on the Administrative Functional Control Board (AFCB). That
Board, as proposed by the ARMISS acquisition team leader, ensured a
management structure and discussion forum to address both functional and
technical administrative improvements for the Agency.

Under terms of the contract, the Agency's integration of the ARMISS COTS
products into the Agency's environment was the Government's
responsibility, to be executed using in-house or contracted means. The
DoDIIS Integration and Engineering Contract (DIESCON) had previously been
awarded to Computer Sciences Corporation (CSC), and had been envisioned as
the mechanism to achieve this integration for the Government. This action
was initiated as DIESCON Delivery Order #10 in September 1993. A point of
factual clarification is needed regarding Delivery Order #10. The
Delivery Order was not issued for $582,242, but for $382,242. Because the
Government was not able to provide Government Furnished Equipment (GFE) in
a timely manner, the contractor (CSC) was not able to perform in the
allotted time. Additional time and funds were required to finish the
original task, necessitating an amendment as issued 12 July 1994 (signed
by Ms. Rita Le) for an additional $186,166. This brought the total for
the task order to $568,408. Neither the correct amount, nor subsequent
date was cited in the report. At time of initiation, Delivery Order #10
was directed at establishing a test bed within the Agency to bring up the
suite of COTS products in their original (pre-tailored) form. Users
across the Agency would be able to use the test bed to investigate for
themselves the range of functionality provided in their initial form.
Training was also arranged on an ad hoc basis by the planning team, again
for familiarization so that individuals would have a better foundation for

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discussing customization efforts with VSE, and preparing for their own data/system conversion. The test bed would reside in DS (now SC).

The VSE plan for customizing the COTS products, concurred in by the Government, the subcontractor Oracle, made implementation of the financial management module first priority. However, because of the delayed date of award of the VSE contract (initially targeted to January 1993), the Agency had entered the end of the fiscal year, and the support of the Comptroller and contracting offices were not available due to workload. Recognizing the high visibility and management priority accorded to problems raised by the Personnel element of the Agency, the Agency decision was made to direct actions to that module.

When it was determined, as a result the difficulties with the ARMISS Personnel module work by VSE, and the lack of participation by budgeting and contracting, that an integrated product was not going to be achieved on the original schedule, Delivery Order #10 was modified to focus on the SC resource management system. What started as the prototype of an integrated Agency corporate information management system, a companion activity to the VSE customization, the modular implementation effort was modified to provide a local focus expected to provide benefit to the Agency under the changed circumstances.

A year later, DIESCON Delivery Order #30 was let. This action was in consonance with the Director's continued emphasis on process improvement, and Agency efforts to implement the recommendations made by Team 5 for Agency ADP acquisition process improvements, addressed at the Director's Off-site on Process (November 1993). Team 5 included the principals from the Office of the Comptroller, Office of the General Counsel, Production Center, Collection Center and Agency Administration Directorate, chaired by SC. Customer support, coordination streamlining, tracking and monitoring of acquisition actions and access to that data by the customer were among the process improvement goals. To provide a mechanism to help achieve these goals, an effort to implement electronic purchase request coordination (simple, small purchases--below $25,000) was initiated. That effort was targeted to take advantage of capabilities in the existing DOS-based Acquisition, Receiving and Inventory Management Information System (ARIMIS). That effort demonstrated feasibility of the concept, but also highlighted the need for either investment into the current DOS-based system to make it robust enough to fully achieve the broader improvement goals, or start transition of the application into UNIX. Therefore, in accordance with the Agency's goal to transition to Unix, DIESCON Delivery Order #30 was let to initiate the effort, and as a startpoint. The Government Furnished Equipment provided included the Oracle COTS products already acquired through the ARMISS VSE contract. If ARMISS implementation had continued as scheduled, the current separate ARIMIS as a DOS-based system would have been subsumed, along with the current separate logistics/inventory system (ILS). DIESCON Delivery Order #30 was the first of many that are anticipated as needed to transition the Acquisition, Receiving and Inventory Management Information System (ARIMIS) from its DOS-based application to UNIX and provide the mechanism for customer improvements to the ADP acquisition process.

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Work also continued separately on the training module in conjunction with NSA. In the personnel area, two things happened:

- DIA chose to adopt the Air Force-developed migration system for civilian personnel which is Oracle based; and

- Using the Agency-acquired Oracle relational data base management system (RDBMS), DIA is developing a military personnel system.

Page 4--12, ARMISS Program Management.

Page 4. ARMISS Program Management.

The report says that DIA did not exercise effective control over efforts to acquire, customize and integrate commercial software for the ARMISS.

DIA Response. This only now appears so in hindsight and does not take into account what took place and what were and are real management issues.

The report criticizes "...procurement of 100% of the assumed quantities of commercial software needed for the ARMISS without verifying that the system concept design was feasible"

DIA Response. This statement includes two incorrect perceptions. Addressed one at a time:

"Procurement of 100% of the assumed quantities...." It only now appears that DIA should not have procured the number of licenses that it did in the COTS acquisition through the VSE contract. At the time, however, given the Agency's acceptance of the VSE proposed schedule for implementation within two years, and the plan to get users involved in the products through the test bed and training, and the very good price being offered on the licenses, it was agreed to by the Agency as a good business decision. Only due to later events, when the ARMISS implementation plan radically changed, and DIA leadership stopped the financial management module indefinitely, and implementation went into hiatus, that the number of licenses seemed an error. Currently over 200 of the 500 licenses procured under ARMISS are being used. These include users working training/Banner, military personnel and SC resource management issues.

"...verifying that the system concept design was feasible." The notion that the system concept design was not feasible is recurrent through the report, demonstrating continued misunderstanding of using COTS products and the contracting action. The functional requirements were stated in the Statement of Work of the Government's Request for Proposal. The product suite proposed by any bidding contractor was to be integratable and subject to proof by demonstration. It was not a question whether the concept of using COTS was feasible--it was a question of whether the bidding contractors could find such products and demonstrate them. Both of the two viable contractors bidding on the contract did so, and both used Oracle products as their foundation. Oracle is a world leader in

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these administrative COTS applications and its customers include
Government as well as private industry. Therefore it has never been a
question of whether a COTS application is feasible, but rather will the
DIA users accept that application, recognizing that in some cases 100%
satisfaction cannot be achieved for the entire user universe, but for most
others at least a 60% or better satisfaction level can be achieved. This
is not a question of the feasibility of the system concept design, merely
leadership commitment to accept a less than 100% solution, and willingness
to change business processes to maximize the usefulness of the product
applications.

The report states the DIA "...did not adequately define ARMISS requirements
before contract award," and "...did not document business practices to
facility customization of the commercial software...."

DIA Response. Functional requirements were identified before contract award
for COTS products, and functional/subject matter experts had cognizance over
their functional processes. The requirements definition was requisite within
the acquisition process of the Agency and the contracting process. It was
only after the functional user community individually began the interview
process that the mass of "requirements" and allegedly fixed regulations became
apparent. The requirements had been defined functionally and it was expected
that any appropriate requests for refinement would be detailed in the meetings
where DIA personnel would be interviewed by VSE personnel as part of the
software customization effort. These functional requirements had been
coordinated with the functional area expects and the proposals had been
evaluated by the same functional area experts. The rapid prototyping
methodology utilizing COTS products does not require A-level requirements
specifications. Functional and organizational perspectives had been well and
consistently represented throughout the entire requirements definition
process, pre-award demonstration by the vendors, and bid evaluation.
Representation at the post-award demonstration was emphatically enthusiastic,
and indicated that the products would be an advance over what was currently
available. Without any actual experience with the software itself, users in
the interview process created massive confusion over their individual demands
and individual views of their own process. As for Personnel, for example, two
previous business process improvement workshops had been performed, and
conversations with functional leadership indicated that a firm understanding
of the process and bottlenecks to efficiency were extant. Likewise,
functional workshops had been performed on the acquisition process, and though
many problems and criticisms of the process were identified, the process
itself was well understood. Actually, the Agency permitted slippage in the
mandate that the users must first experience the product, customized to the
maximum extent, as prerequisite to identifying and evaluating what additional
requirements were left "unsatisfied." However, the circumstances had changed.
For SC, or the Agency leadership for that matter, to continue to press for
user acceptance in view of the resistance being evidenced in the Personnel
implementation effort, the result might have been an implemented software
application but at the cost of morale and individual esteem. ADP can only be
an enabler. SC, as the ADP technical center can only propose solutions. If
the users do not accept the solution, regardless of how technically correct it
may be, or how much more it offers than what is currently and anticipated as

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otherwise available, the solution will not work without greater cost to leadership.

The report states that DIA "...did not consider the requirement to rely on the National Security Agency for financial and accounting services..."

DIA Response. When the SOW was written, the Air Force was the Agency's disbursement/accounting agent. This was known and "considered" in the SOW. The Agency recognized that it would have to feed data to the Air Force. This was brought out in meetings with OC-4 early in the development of the ARMISS SOW and RFP. The fact that NSA replaced the Air Force does not alter the fact that a data feed to an outside financial and accounting function was considered and deemed feasible. The Agency did not consider the NSA accounting system in the light later presented by the Office of the Comptroller, because decisions had been--and had been unchallenged--in the planning stage that the NSA system would relate to the Agency similarly as the Air Force accounting system had done (and the Army accounting system before that). It was also well understood that the OSD migration systems effort could affect any element of ARMISS, but that decisions regarding those functional areas were well in the future and would be absorbed or adapted as made. As an internal-Agency administrative system, it was anticipated that interfaces to the DoD standards might be required, not transition of the daily operational system itself. However, when the Office of the Comptroller raised the perception later that the financial module presented a redundant accounting system to the Agency's singular, NSA-provided system, Agency leadership had to balance organizational rejection with that of a technical solution. It had never been proposed or considered at any time during the planning or acquisition phase that the Oracle financial management product would perform as the Agency's accounting system. It was only intended to provide the networked venue for passing and applying data from NSA to the various functional modules for daily operations at a sub-accounting level (in the sense used by the Comptroller) and feeding other applications. That user level of data and tool availability is essential for the Agency to continue to move in the direction of improved efficiencies, using, for example, activity-based costing methods. It was well recognized that the Agency could only have one accounting system, and was committed to Air Force, then NSA. However, technically, the Oracle product could have functioned without endangering the legal position of NSA's system, and provided day-to-day data needed by individuals within the Agency across functional and organizational levels, but it was at that time not accepted organizationally.

The report states that DIA "...continued development efforts after it was apparent that the acquired commercial software was not suitable for the ARMISS concept...."

DIA Response. The software acquired was imminently suitable to the *concept*: the applications were functionally modular and innately integratable; the proposals by both vendors cited Oracle products, and had been demonstrated prior to contract award as part of the evaluation of bids, and accepted by the Government as represented by the Agency team.

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The report states that "...DIA spent more than $5.1 million for commercial
software and contractor customization and integration services that did not
result in an integrated, management information system."

DIA Response. This statement in the report implies that VSE contract and the
DIESCON Delivery Orders #10 and #30 were intended to produce an integrate,
management information system. This implication is incorrect. VSE was to
provide an integrated product; Delivery Order #10 was to be the first step
toward integrating the product into the Agency; and #30 was applicable only to
ARIMIS--not ARMISS.,

The report states that "...continued development efforts after it was apparent
that the acquired commercial software was unsuitable for the ARMISS concept."

DIA Response. The origin of the report inference is unclear. The COTS
products were not proven unsuitable to the concept of satisfying a demand for
functionality across administrative functional areas. Rather than
"development", efforts to apply the already acquired products has resulted in
successful functional operation. SC does have all the COTS products loaded;
they can be accessed and examined. SC has succeeded, through using the
DIESCON contractor support and in-house personnel, in making the financial
management product operational for budget purposes; and has keyed budget data
to stages of functional definition, requisite for development efforts toward
activity-based costing. In addition to providing the management tool for
every day budget execution activities, an additional COTS product is
operational in concert with the Oracle product. This provides an executive
management reporting tool as well as analytical device for the working levels,
with user-determined level of detail and graphic capability. No one else has
loaded or attempted use of the Oracle COTS products acquired under the VSE
contract. Given the operational capability achieved with the financial
module, there is no foundation for the flat declaration in the report that the
acquired commercial software was not suitable for the ARMISS concept. Another
effort using an Oracle-based COTS product is also now operational, supporting
Agency training, worked by DIA in collaboration with NSA.

Page 4--5. Acquisition Planning for the ARMISS

Page 5, DIA Time-Phased Replacement of Existing Systems. The report states,
"A second contract would be awarded to integrate (perform data conversion and
download) ARMISS into the existing DIA environment."

DIA Response. The statement is inaccurate. DIA planned to use in-house
personnel and contractor support as appropriate, in keeping with the
Government responsibility to integrate the software into the environment. The
pre-existing Department of Defense Intelligence Information System (DoDIIS)
Integration and Engineering Contract (DIESCON) was envisioned as the contract
vehicle for such actions. As an already awarded contract, individual.delivery
orders would be written and approved without further competition. All
delivery orders to DIESCON must include documentation and be coordinated and
approved through the Agency acquisition process as any other procurement
action; the only difference is that no competition is required since the

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competition already took place in the contract award. SC brought the SC
financial management product into operation using a combination of DIESCON
delivery order and in-house personnel support.

Page 5, Prototyping as a Means to Reduce Risk and Uncertainty in the ARMISS.
The report cites two criticisms--prototyping to reduce risk and procurement of
500 user licenses.

DIA Response. The ARMISS contract with VSE was the very first effort to apply
COTS products to achieve a system solution. It was very definitely not a
standard from-the-ground-up software or system development effort. The
availability of COTS products in the marketplace meeting the administrative
functionality of the Agency was demonstrated in the responses to the
Government's Request for Information; this was considered proof that a COTS
solution was feasible. The decision to use COTS products was in keeping with
rapid prototyping, and OSD C3I CIM principles. It eliminated a multitude of
extended activities that were suitable only for from-the-ground-up development
efforts. System concept was that COTS products would achieve a significant
level of satisfaction of functional requirements. The response to the RFI
indicated that such products were on the market. The system design, which
required the COTS products to be functionally bundled, was proven by the
responses to the RFP from the only two viable contenders for the contract
award and demonstrated by both prior to award.

DIA followed the life-cycle management and AIS policies and procedures
dictated in the DoD Directives 8120.1 and 8120.2 in establishing a strategy
for the implementation of ARMISS. DIA sought to use COTS for the solution of
the ARMISS concept as required under DoD Directive 8120.1, paragraph D.4. In
addition, the management structure established sought to conform to paragraph
D.9., minimizing the layering of management by having the project manager
report to the NMISC Director for technical guidance and to the Administrative
Functional Control Board (AFCB) for Agency functional issues. The report
(page 5) addresses acceptance of software based on approved test results
citing DoDD 8120.1 and 8120.2, but these references apply to newly developed
software, not COTS products. COTS products, by definition have already been
tested and are operational and available in the marketplace as commercially-
viable products. Similarly the prototyping policy under DoD Directive 5000.2,
part 5, section D applies to newly developed software and is not applicable to
COTS software. The purpose of the system "prototype" planned for ARMISS was
to provide hands-on experience with the COTS products.

DIA did acquire licenses for 500 concurrent users. This Agency decision was
economically sound at the time, given the pricing offered and the
implementation schedule. Given the acquisition cycle, if implementation had
proceeded as scheduled, perception would have remained that it was a good
business decision.

Page 6--8, Technical Constraints Affecting ARMISS Implementation

Page 6, Documentation of Business Processes. The report ascribed
responsibilities to the ARMISS program manager, and assumptions he made
regarding the detailed documentation of business practices.

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<u>DIA Response</u>.

The report reflects here a misunderstanding regarding "the ARMISS program
manager" leading to the conclusion that the effort was essentially driven by
one individual. See paragraph 2 of the DIA *GENERAL/OVERALL COMMENTS* section
provided above. Efforts were the result of group participation across the
Agency over an extended period of time, and at least using three levels: that
of the acquisition effort itself, including the development of Agency-required
documentation; the Administrative Efficiencies Process Action Team and
subsequent Administrative Functional Control Board; and the Technical Project
Manager. The established process guided the project, not one individual.

It was the Agency decision to pursue achieving ARMISS objectives by using COTS
products rather than through from-the-ground-up software and system
development effort. The resources and time required to approach a such
solution through software development and programming were not available, and
duplicative of COTS products available in the marketplace as demonstrated by
the responses from industry to the Agency's Request for Information. It was
understood that using COTS products would not result in a 100% solution to all
user requirements, but that the functionality provided would be acceptable as
a start point. Business improvement processes such as evaluating the value
added of any user requirements not met by the COTS products would be applied
in the decision making process to pursue auxiliary software capabilities. The
acquisition strategy used was based upon rapid prototyping and acceptance by
the Agency representatives--both functional and organizational--of the COTS
solution which was believed as 60%--80% or higher solution. Implementation
required functional representatives and subject matter experts to understand
enough of their functional process to participate in the customization effort
available within the scope of the COTS products. Given the customization
capacity provided by the Oracle "flexfields" and the recognition that not
everything that all the users would be achieved, it was not envisioned at any
time before interviews began that modification of the underlying programming
code would be addressed. While transition of inefficient business practices
was to be avoided, this implementation was not intended to initiate a from-
the-ground-up software development or business reengineering effort. It was
intended to make the best of availabilities provided and critically assess the
remaining customer and system demands in context of the best interests of the
Agency--not individual user preferences.

The ARMISS implementation strategy, incorporating the role of the AFCB and
parallel actions, was the basis for the functional definition of requirements
that were part of the ARMISS Request for Proposal (RFP). The statement in the
report that the "ARMISS program manager" did not require DIA functional
managers to document detailed definitions of their functional requirements as
required by DIA Manual 44-2 is incorrect. In accordance with the concept and
implementation strategy, the Agency agreed to define requirements functionally
at a functional level appropriate to COTS; functional managers did provide
this material as incorporated--and approved--in the Statement of Work in the
RFP.

A third assumption needs to be added to those in the report (page 6) regarding
the implementation strategy. It was assumed that the functional users
understood their own business processes; it was this knowledge that was needed

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to customize the Oracle "flexfields." This assumption has a very sound
foundation; the functional managers had been integrally involved in every
phase of the planning for ARMISS, development of the Statement of Work, and
implementation strategy: the knowledge appeared readily available. Although
the Personnel managers knew what they needed to accomplish their function, as
submitted in the RFP, the interview process with VSE reflected an insistence
for discrete capabilities in excess of what had previously been understood,
and divergence on details of the process. This was in spite of Personnel
being previously involved in two separate business process improvement
workshops.

Page 6, **DIA Undefined Requirements Affect VSE Ability to Perform**. The report
states that due to "...the inadequate requirements documentation, DIA had no
assurances that the Oracle software would satisfy the ARMISS concept...VSE was
unable to customize the Oracle software....".

DIA Response. It was the change in stance by the functional user groups and
acceptance of that change by the Technical Project Manager that provided the
opportunity to equivocate to the point where VSE was no longer an asset. From
the acquisition perspective, the Agency did everything it could to ensure the
best effort, including contract modifications to direct the contractor to
priorities and feasible deliverables. By allowing the functional users,
through the interview process, to expand the requirements and address what
were believed as inadequacies in the COTS products rather than the level to
which functional operation could be achieved, the previous COTS-less-than-100%
solution dissolved into an all or nothing situation.

Page 7, **Operational Analysis of the Oracle Acquisition Module**. The report
credits VSE as identifying that interfaces would be needed for external
procurement and logistics system, and intimates that the import interface
would have to achieved by modifying the Oracle software.

Page 6

DIA Response. Two major ADP systems were understood from the initial
acquisition efforts under ARMISS as requiring interfaces: the Virginia
Contracting Activity's system (SACONS) and the Logistics system (ILS). This
was in addition to the understanding that an interface would be required for
the Agency's accounting system, and that decisions made in the DoD migration
systems arena may also require interfaces. Extraordinary effort was being
made at the time to download and upload from a classified to an unclassified
environment to interface the DOS-based SC acquisition system (ARIMIS) with
SACONS and ILS already, so the Agency had considerable experience with finding
workarounds. Again, it was not VSE that had responsibility to integrate any
of the software into the Agency environment.

Page 7, **Operational Analysis of the Oracle Personnel Module**.

DIA Response. Many resources were devoted to attempting to implement the
Personnel module in recognition of the high priority given to personnel ADP
issues which was done to accommodate the delay necessary in addressing
financial management and acquisition due to end of fiscal year priorities
(then later dissolution over the role of ARMISS and the NSA

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accounting/resources management capabilities). However, the multitude of
demands accumulated through the interview process and differing views of the
process presented confounded VSE. Again, perspective regarding what was
supposed to be a COTS solution lost focus and the effort devolved into what
would have been appropriate for a from-the-ground-up software development
effort. Rather than focus on the very fundamental understanding of what a
COTS solution means--less than a 100% solution--and challenge user claims as
requirements, or address why suddenly vital and unshakable demands appeared,
asserted as somehow mandatory, VSE took all the input provided and concluded
that the COTS personnel module could not satisfy DIA requirements. The
Government had recognized in the planning phase the fact-of-life that no COTS
product could be expected to satisfy 100% of DIA requirements; however, an
acceptable level of functionality was the goal. The planned implementation
strategy: maximize the application and then address the remainder after
implementation.

Oracle Software Was Not Suited to ARMISS Requirements.

<u>DIA Response</u>. If there was any import problem intrinsic to the Oracle
applications, VSE was remiss in addressing them in the bid proposal. These
specifications were clearly stated in the RFP and contract's Statement of
Work. The limitations of using COTS, and the need to update any interfaces as
the COTS product evolved were understood by the Government and accepted.
Given the unacceptable alternative costs and development time needed for any
in-house effort to duplicate even that level of operation available in the
COTS products, these negatives were acceptable. With any COTS--or GOTS and
internally generated code product--interfaces are always dependent upon
version and subject to change.

As for DIA not adequately evaluating the mechanics of how the Oracle software
worked and the effects it had on the ARMISS concept as averred in the audit
report, DIA did understand that, a) the suite of products would provide the
interfacing across functional areas required; and b) interfaces with external
or in-Agency unique systems would be necessary; and c) if the interfaces might
not be easy, neither were they any more impossible than dealing with
developing interfaces with any other system. Any COTS solution would incur
these or similar issues. The fact that other private industry and Government
organizations were using Oracle products, both bidding vendors had proposed
them, and that the Statement of Work had been clear on the requirement to
interface with other (including external) systems, the solution seemed in the
best interests of the Agency.

<u>Pages 8--9. System Concept Design Incompatible with the National Security
Agency Finance and Accounting System</u>

Page 8, The General Ledger is Key to Operation.

<u>DIA Response</u>. In the context that DIA intended for ARMISS, this is absolutely
true. The General Ledger included capabilities, however, which may have been
misperceived as duplicative to the NSA system's role as the Agency's single
accounting system.

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Requirement to Use the National Security Agency System.

DIA Response. In the report there is mention of the Memorandum of
Understanding (MOU) signed by the Comptrollers of DIA and NSA on 16 September
1993. There is also a statement that in August 1993 the DIA Comptroller
objected to the use of the ORACLE budget module. However, in order to keep
the context accurate, other facts need to be included in the report, such as:
the Contract was signed in June 1993; the Comptrollers's office provided a
functional area expert to review and evaluate bidder's response as well as the
define requirements that were part of the ARMISS Statement of Work; the ARMISS
Technical project team attended sessions at NSA and briefed them on the ARMISS
approach before contract award and before the MOU was signed. The
difficulties mentioned in the report (page 9) that ARMISS would not provide a
single, integrated solution as DIA envisioned was not, as the report states,
because of technical difficulties, but because a policy position surfaced by
the DIA Office of the Comptroller after contract award.

The report states that the ARMISS contract Statement of Work (SOW) had no
requirement that DIA use the NSA accounting and finance system. This is true,
but omission of vital facts makes it misleading. When the SOW was put
together, DIA was using the Air Force as its disbursement agent not NSA. In
the SOW in paragraph 4.1.1. it states that ARMISS will have to interface with
the Air Force system. The NSA system replaced that of the Air Force. To
fault the SOW for failure to mention a system that was not part of the DIA
environment at the time creates the impression that a function was ignored
when in fact it was not. There was no indication that the replacement of the
Air Force system with that of NSA was going to functionally or
organizationally affect the ARMISS effort. A batch process using an interface
between the two could have been considered acceptable. It would have been a
vast improvement on what had been and continues to be available.

Page 9. The ARMISS Contract was Unable to Meet Goals

Page 9, The ARMISS Contract with VSE Was Allowed to Expire.

DIA Response. At the time that the decision was reached not to exercise the
option years of the VSE contract, the Agency had reached a standoff
organizationally. The plan regarding implementing COTS products as
coordinated through the acquisition phase had not been followed in technical
project implementation. The problems being raised by users were technically
surmountable. The highest levels of Agency management had to decide whether
to dictate the ADP solution in the face of organizationally-expressed
negativity and denial of support. The Agency acted conservatively, for
without support during implementation no ADP solution, regardless of its
purity, can succeed. The organizational decision was to permit the VSE
contract to end without activating the option years. The contract was not
terminated because the external interfaces were too hard or that the Oracle
COTS products would not satisfy the ARMISS goals.

Page 10--12. Project Tracking and Oversight

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Reference

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Page 10, **Roles and Responsibilities.** The report identified the Chief of the Logistics Division as the ARMISS program manager and made statements and drew conclusions regarding professional conduct with VSE, the DIESCON Delivery Orders, and senior management involvement.

<u>DIA Response</u>. The statements and conclusions made in the report are inaccurate. Each will be addressed below.

The DIA Regulation 65-17 has an incorrect date cited in the report. The correct date of this document is 6 November 1989, not 6 November 1993.

The necessity to correct the "program manager" usage has been addressed. See paragraph 2 of the DIA GENERAL/OVERALL COMMENTS ON THE DRAFT REPORT section provided above.

The role of the Chief of Logistics Division is clarified below:

The Chief of what is now the Logistics Division within the National Military Intelligence Systems Center was designated the leader of the Agency-wide effort to identify and initiate actions to achieve an Agency management information system. This directly resulted from the 1991 tasking from the DIA Director to what is now SC, stimulated by combined DA and SC leadership and initiative. With only the direct support of a very small core team within his own Division, the Chief coordinated the planning effort ensuring organizational and functional representatives across the Agency had ample opportunity to participate in actions which led to the ARMISS concept, gathering of functional requirements, and coordinating the effort throughout the Agency. Once the contract was awarded, responsibility for the contract--and the overall project-- switched to the Contracting Officer's Representative (COR) and the Technical project manager.

The Chief, Logistics Division was separately tasked by the Director to head an Agency's Process Action Team to investigate and make recommendations regarding Agency administrative efficiencies. This resulted in the recommendation, subsequently approved and made operational, to establish an Administrative Functional Control Board and structure to address, prioritize and discuss technical and functional issues and action, as well as make recommendations for DIA command element decision making. While it was envisioned as participating in the ARMISS COTS product implementation, it had a larger focus than just ARMISS. The initial report and the follow-on Action Plan co-developed with DA recognized the ARMISS contracted effort as only one element of the Agency's effort to achieve administrative efficiencies.

After contract award action the Technical Project Manager for ARMISS (overall) and Contracting Officer's Representative (COR) of the contract with VSE, were designated. The Chief, Logistics Division, assisted in the transition into the implementation phase. This included efforts which kept the Agency leadership and interested participants informed of the progress of the ARMISS contracted effort through issuing electronic mail updates during the transition period. This also included initiating an ARMISS Oversight Committee within SC for reporting by the project manager

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of progress on the contract and ancillary activities, both for informing
SC management and as a discussion/decision forum for addressing problems
encountered and anticipated actions; and an engineering forum.

Regarding the Contracting Officer's letter to VSE and the audit report's
erroneous conclusion, correcting clarification is provided as follows:

The DIA contracting officer's issuing a letter to VSE reiterating that
only the contracting officer or contracting officer's representative were
authorized to issue work orders seems the basis for the erroneous
conclusion in the report that the "program manager" was interfering or
providing guidance to VSE inappropriately. The letter was not directed
personally; inference of inappropriate behavior is subjective and
incorrect.

Regarding the implementation and integration of an ARMISS-like system to
satisfy Systems Center Requirements, DIESCON delivery orders, correcting
clarification is provided as follows:

The Chief, Logistics Division has responsibilities regarding the SC budget
for which an automated tool set is needed. Recognizing the opportunity
amidst the problems resulting in the VSE customization effort and changes
to the implementation plan which also affected the initial scope of the
DIESCON Delivery Order #10, DIESCON Delivery Order #10 was modified to
include using real budget data, provided by SC, as part of the Agency test
bed facility. Though not really ARMISS-like (it focused on the financial
management module-budget element only), this maximized the usefulness of
the DIESCON Delivery Order #10 to the Agency by providing direct real
advancement toward achieving an operational budget system and provided
real data conversion and transition experience. As an integral companion
activity to the VSE customization effort, it was in keeping with the
Government's requirement to integrate the COTS products into the Agency
environment. The benefit to the Agency was that this led to SC personnel
being able to make the application operational on the Local Area Network
for SC for budget execution information, along with an executive
information system, and link the budget data to functional definitions for
Activity-Based Costing efforts.

The report's criticism of the program manager for not having a plan to track
the project, and not reporting status of the ARMISS or DIESCON efforts to
senior management are erroneous statements and stem, evidently, from the
misunderstanding evident in the report as to definition of "ARMISS program
manager." The individual targeted within the draft audit report was not the
ARMISS technical project manager or COR of the contract with VSE. It is not
Agency policy to formally brief status of contracting actions to senior DIA
management unless appropriate, though appropriate concise status checks are
provided through weekly key components meetings.

Page 10, DIA Senior Management Briefings. The report states that the Systems
Center held only two meetings with senior DIA management concerning the status
of the ARMISS project and that the Chief, Logistics Division initiated
[DIESCON] delivery orders without proper planning documentation and senior

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management oversight. The report states, "In our opinion, proper planning did not occur because by the time delivery order 10 was initiated in September 1993, the DIA Comptroller had reiterated that the ARMISS could not be the final authority on obligations or expenditures and could not provide an integrated, management information system to satisfy DIA-wide needs," and cites the VSE perception "...that the Oracle software did not conform to DIA business processes and that significant risks were associated with required interfaces with external systems."

DIA Response. The statements and inferences in the report are inaccurate and led to erroneous conclusions being drawn.

Regarding the report comments on senior management involvement, Agency authorities such as DAP, GC, OC and SC were involved in working problems and acquisition actions. These are all considered Agency senior level positions. As stated above, it is not standard practice to regularly brief senior management formally on all on-going contract actions unless specifically requested to do so or as otherwise appropriate. With the many and varied contracts in the Agency, the leadership would be inundated with "for information only" material. Concise status checks are usually provided to senior management of significant interest items through leadership or key component meetings as well as informal meetings.

The statement in the report (page 11) that says, "...the ARMISS concept continued to be invalid because the Oracle budget module needed to interface to with the National Security Agency system to provide an integrated solution," is incorrect. First, the Oracle COTS product suite is already integratable--being functionally modular, one product could work independently or in conjunction with its other functional area products once linkages were activated. To make it fully functional, the users have to define the data fields and customize the "flexfields" as necessary. Second, the concept was not invalid due to the concern raised by the Agency Comptroller that this might create a duplicate accounting system. The existence of COTS products established the validity of the concept. It was policy decisions made by senior management regarding NSA that ceased implementation of the financial module, not because the concept was infeasible. There was no objection to implementing the ARMISS concept at the Center level--as long as it was not implemented at the Agency level. It was this duplication of, and competition with the NSA system which covered all of DIA, which was the issue. Subsequent statements by the Government's Joint Financial Management Improvement Program statement of Federal Financial Management System Requirements (FFMSR-0) of January 1995, "Framework for Federal Financial Management Systems" address the single accounting system issue:

> "The financial management systems policy stated in OMB Circular A-127 requires that each agency establish and maintain a single, integrated financial management system....Having a single, integrated financial management system does not mean having only one software application for each agency covering all financial management system needs. Rather, a single, integrated financial management system is a unified set of financial systems and the financial portions of mixed systems encompassing the

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> software, hardware, personnel, process (manual and
> automated), procedures, controls, and data necessary to
> carry out financial management functions, manage financial
> operations of the agency, and report on the agency's
> financial status....It is critical that financial
> management system plans support the agency's mission and
> programs...and...are incorporated into the agency's plans
> for information technology infrastructure and information
> systems as a whole."

Page 12, Future Direction of ARMISS. The report states that the "Chairman of
the Configuration Control Board for the Acquisition System (Acquisition,
Receiving and Inventory Management System (ARIMIS)) submitted a tasking to
COMPEX Corporation to transition the data in the Acquisition System to the
Oracle data base system."

Page 11

<u>DIA Response</u>. The statement is incorrect. There is not yet an operational
UNIX-based replacement for ARIMIS. COMPEX was asked to prepare a proposal
looking towards a transition. This was for planning purposes, intended to
gauge the impact upon COMPEX of any such transition. COMPEX was not tasked to
transition anything.

<u>Page 12--13. Summary</u> The report reflects the incorrect and incomplete nature
of the narrative, and resultant conclusions.

Page 12

<u>DIA Response</u>. The summary needs to be corrected to include all the facts,
analysis of the events in context of the established Agency processes for
acquisition and contracting, DoD C3I CIM policies regarding COTS products vice
software development, and realistic problems that surfaced in implementation.

In regard to the criticisms citing references to the Office of the Under
Secretary of Defense for Acquisition and Technology's Program Management
Review, the Agency followed a very specific acquisition process which did
indeed require senior management involvement as well as extensive
participation throughout the Agency working levels. Requirements were well
defined for the rapid prototyping effort. The Agency did initiate DIESCON
Delivery Orders #10 and #30 similarly to stand-alone procurements as the
report cites as a Program Management Review recommendation; the only element
missing was the competition effort. Those Delivery Orders were properly
evaluated, documented and management oversight assured; the COR for those
efforts has an extensive file providing documentation.

<u>Page 13. Recommendations for Corrective Action</u> The report recommends "...that
the Director, Defense Intelligence Agency:

Page 12

> 1. Cease all Agency Resource Management Information Support System
> development and implementation efforts until a comprehensive acquisition
> plan developed in accordance with Corporate Information Management
> policies and principles is approved.

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2. Establish a system of controls to verify that:

    a. The requirements of the Defense Intelligence Agency intended users are fully documented before an acquisition plan is approved.

    b. Procurement is limited to those quantities required for testing until the suitability of the product or service for the intended purpose is demonstrated.

    c. Quarterly status reports detailing cost, schedule, and performance data are provided to senior Defense Intelligence Agency managers."

DIA Response. The Agency does concur with the recommendations but must comment:

1. All ARMISS efforts have ceased, with the exception of the training/Banner effort being performed in conjunction with NSA, per direction from the Director of the Agency pending receipt of the Audit Report.

2. These actions apply additional workload and structure to an ADP acquisition process that the Agency has been working to streamline and make more efficient.

    a. Procedures already exist that ensure documentation of user requirements are part the acquisition plan and included appropriately in purchase requests.

    b. Limiting procurement to testing quantities until the product or service is proven is appropriate only in development efforts. This would result in inappropriate delay, workload and additional expenditure of resources without significant benefit when an established standard (Agency, Intelligence Community, DoD or private industry) exists, or COTS product is verified as technically feasible. Technical feasibility can be tested by requiring the bidding vendors to demonstrate their capabilities in accordance with guidance as was provided in the Request for Proposal.

    c. Senior managers are apprised concisely of the status of contracting actions that are of significant interest either due to costs and sensitivity during routine leadership meetings. Specific formal briefings take place as requested. The effort to provide material that would be "information only" in quarterly reports represents a workload and expenditure of resources provides no value added.

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Part II - Additional Information
<u>Pages 16--29</u>

Appendix C. Allegations and Audit Results.

Page 22--23, **Allegation 2.** The report states that substantiation was found
for this allegation, "Specifically, no formal funding plan, no formal
acquisition plan, and no requirements definition for the ARMISS project."

<u>DIA Response</u>. The Agency non-concurs with the rationale regarding the cited
substantiation.

The report on the one hand states that DIA did not have a formal funding plan
and that senior management oversight permitted the realignment of funds for
ARMISS including contract modifications, but follows that with the statement
that the Systems Center did have a formal acquisition plan but it was not
sufficient. The process used for the ARMISS contract acquisition was in
accordance with Agency acquisition procedures and ensured extensive
coordination. The effort was a COTS product acquisition with some services,
not a system development effort. The procedures included developing and
coordinating throughout the Agency an advance acquisition plan (AAP) for
Agency Command Element signature as dictated by the Virginia Contracting
Authority. It included the funding profile anticipated. The purchase request
itself included the documentation necessary per Virginia Contracting Activity
requirements, including the Statement of Work, and was also coordinated
throughout the Agency. The Agency had issued a Request for Information which
demonstrated that ARMISS could be initiated using COTS products--technology
existed. The Air Force (NSA) factor was indeed considered in accordance with:
a) other external interfaces--the Statement of Work identified the
requirement; b) recognition of the Air Force (NSA) as the provider of the sole
accounting authority for the Agency. Data was to be passed from Air Force
(NSA) to be used to update the ARMISS and provide information to multiple
users at all levels. Realignment of funds to cover emergent issues and
contingencies, including modifications to contracts, is a normal event in
resource management. The fact that Agency senior management permitted this is
not evidence of DoD acquisition regulations not being followed.

The decision to procure 100% of the assumed quantities of licenses as
addressed above was a good management decision at the time it was made,
predicated upon the Government accepted schedule of implementation and the
price being offered. That implementation problems obviated the need for the
number of licenses is not evidence of DoD acquisition regulations not being
followed. Currently the Agency has a requirement to use 200 of the 500
licenses. This includes people working the training (Banner), military
personnel system, and the SC resource management issues. The number of
licenses required is expected to continue to increase.

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Page 23, **Allegation 3.** The report states that partial substantiation of the allegation was found, "The ARMISS Program Manager applied undue pressure on the ARMISS evaluation committee members and contracting staff to award the ARMISS contract."

DIA Response. DIA non-concurs with the rationale regarding the cited substantiation.

No definition of "undue" with accompanying documentation is provided. The sentence implies coercion or force of some kind, but does not describe what took place or in what direction. The result is a negative impression, but without substantiation other than what appears some action officers' preference for more time. The Agency had a contracting award schedule as worked with the Virginia Contracting Activity and the Contracting Officer, and was also trying to schedule follow-on, post-contract award activities. The Evaluation Board members may have preferred having more time, but this is a universal human trait. There was no coercion to force individuals to act against their professional judgement and personal will.

The statement that the contracting officer suggested recompeting because the bids were not exceptional though they were acceptable, and expressed concern regarding the contractor tasks is not evidence of substantial concerns. There is no documentation that these were shared by senior leadership in the Virginia Contracting Activity. If so, the contracting officer would not have signed the contract.

Allegation 4. The report states finding substantiation of the allegation, "The ARMISS contract was permitted to expire because:

- the Oracle products could not be modified to meet DIA needs, and
- the contractor could not perform because of DIA undefined functional requirements."

DIA Response. DIA non-concurs with the rationale regarding the cited substantiation.

The report cites as substantiation that the Oracle produces did not readily conform to the DIA business practices due to regulatory requirements, lack of functionality or design features inherent in the software. The Agency approach in implementing the COTS products had been to tailor the software as far as the inherent capabilities of the software permitted, to meet specific user needs, including changing the business processes--not the other way around as the report is presenting as substantiation of the allegation. Once implementation was complete, whatever degree of user-stated specific requirement would be assessed in terms of value-added, including regulatory citations. Functionality would necessarily be expected to be less than 100% overall, but for many users the functionality would be 100% greater than existed considering the lack of capabilities otherwise available to them. The design features inherent in the Oracle COTS products called "flexfields" provide extensive customization capability. None of the statements regarding the impossibility of the customization effort had been empirically tested and proven. DIESCON Delivery Order #10 has proven that it is possible. The issue

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of importing data was not the decision element in the Government action to not
activate the contract's option years.

Page 5--6, Allegation 5. The report cites finding substantiation of the
allegation, "The ARMISS program manager spent more than $1 million in an
attempt to use the Oracle commercial software to satisfy resource management
deficiencies in the Systems Center operational systems."

<u>DIA Response</u>. DIA non-concurs with the rationale regarding the cited
substantiation.

Some confusion exists in the report regarding the DoDIIS Integration and
Engineering Contract (DIESCON) itself, and specifically DIESCON Delivery
Orders #10 and #30. The report erroneously appears to believe that the
DIESCON was awarded for one reason but executed for another. Regarding
DIESCON Delivery Order #10, once the implementation plan of ARMISS changed,
the scope of the effort was modified in accordance with Agency procedures to
focus on achieving real-data load and functionality from the test bed that was
of benefit to the Agency. The effort did help migrate SC away from the
obsolete Wang system it was using for budget execution activities. The fact
is that this Delivery Order, as modified, has been successful.

DIESCON Delivery Order #30 was the initial effort by the Agency to prepare to
migrate from the inadequate DOS-based Agency Acquisition, Receiving and
Inventory Management Information System (ARIMIS)--apparently the "Systems
Center Acquisition System" being cited in the audit results--to UNIX. This
action was prompted by concerns to improve the ADP acquisition process and
implement improvements as recommended by Agency business/functional process
improvement efforts. The expected delivery from this effort was not a
replacement of ARIMIS, but an initial step toward UNIX.

The $1.1 million spent on DIESCON actions were in accordance with Agency-
approved goals, objectives, and with prescribed Agency coordination. These
funds were spent in efforts to provide improved capabilities in areas of SC
responsibility and in turn are in the best interests of the Agency and the
Government. These facts do not substantiate the allegation.

Page 25, Allegation 8. The report states finding substantiation of the
allegation that "There has been virtually no real agency oversight of the
ARMISS project."

<u>DIA Response</u>. DIA non-concurs with the rationale regarding the cited
substantiation.

The report's conclusion is not supported by the facts. The planning and
acquisition efforts included extensive coordination throughout the Agency
among functional and organizational representatives who were responsible for
keeping their higher management apprised of progress, assumptions, decisions,
direction, etc. The Request for Information, acquisition plan, Statement of
Work and the Request for Proposal, etc., were staffed in accordance with the
Agency procedures. They had been precoordinated with the working level

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representatives and modifications made per their recommendations as
appropriate. Post-contract award activities included electronic mail, key
component meetings, meetings and taskings with the Administrative Functional
Control Board, and meetings with leadership to discuss issues. The fact that
senior management elected not to exercise the second year option of the
contract with VSE demonstrates that they had been kept aware of the problem
and were actively involved. The management structure (Administrative
Functional Control Board) had been put into place to actively participate with
the technical Project Office as well as conduct process improvement
activities; it was the forum for discussing issues, identifying and resolving
conflicts in priorities, melding implementation actions with functional
improvement process actions, and making recommendations for Command Element
decision-making. ARMISS implementation did not fail from lack of management
structure to provide oversight and direction, but of management will to
implement the original strategy when users pressed for the traditional 100%
solution characteristic of from-the-ground-up software development efforts,
not characteristic of use of COTS products. Faced with the unachieveable
demands of the customers and what amounted to a reversal of the original
implementation plan, the only alternative would have been dictatorial decree.
As previously stated, once into implementation, the attitude shifted into an
"us" the users against "them" the ADP systems people. Forcing transition and
use of an ADP tool, regardless of the improved functionality to that user
group and the Agency as a total, was not deemed acceptable over the users'
objections.

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