

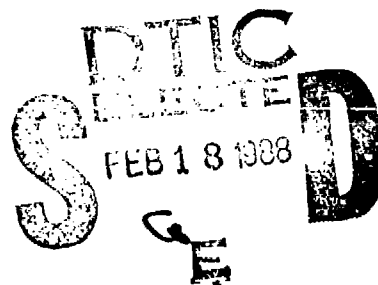
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THESIS



A HANDBOOK FOR THE JUNIOR FINANCIAL
MANAGEMENT SUBSPECIALIST-IN-TRAINING

by

Patricia S. Hine

December 1987

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A Handbook for the Junior Financial
Management Subspecialist-in-Training

by

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Submitted in partial fulfillment of the
requirements for the degree of

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ABSTRACT

There is an ample body of directives, manuals and informative literature pertaining to Navy financial management, with the preponderance designed for the technician or mid-grade and senior officer. The officer assigned to a Navy financial management training billet, subspecialty coded 0031T or 0031S, by virtue of her or his inexperience, generally cannot comprehend such material and is ineligible and, in all likelihood, unprepared for advanced training. This research is aimed at determining the information needs of the junior financial management subspecialist-in-training through feedback from the financial management subspecialty community at large, educators of Navy financial managers, and the Chief of Naval Operations (CNO) financial management subspecialty sponsor, OP-92. Based on the research, this effort then focuses on the production of a reference handbook designed to meet the informational needs of the junior Navy financial management subspecialist-in-training.

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I. INTRODUCTION

A. PURPOSE

The purpose of this research is to examine the role of the junior Navy financial management subspecialist-in-training assigned to a 0031T or 0031S subspecialty coded billet, to determine his or her general information requirements as regards financial management, and to set forth that information in a reference handbook.

1. The Role of the Junior Navy Financial Manager Assigned to 0031T and 0031S Subspecialty Coded Billets

Officers assigned to 0031T and 0031S subspecialty coded billets are in training to hold progressively more responsible positions in Navy financial management. In general, the officer assigned to a 0031T or 0031S billet is between the paygrades O-1 and O-3, and serves in one of the Navy's "entry level" financial management positions. Subspecialty codes and levels will be discussed in greater detail later in the thesis. For now, a brief introduction to the two pertinent subspecialty codes is provided.

a. The 0031T Billet--Training

The 0031T coded billet is a training position designed to provide the assigned officer with the necessary experience and expertise to enable him or her to progress to the next higher subspecialty level, 0031S.

b. The 0031S Billet--Experience

The 0031S billet is for the officer with some experience or knowledge in the subspecialty field, but no formal education. After one or more such experience tours, this officer will usually be board-selected as a "proven" subspecialist.

This thesis will examine the role of the junior financial manager assigned to a 0031T or 0031S subspecialty coded billet through various research methods, with the goal of providing a framework for the officer's understanding of his or her role as a financial manager in the federal government.

2. Information Needs of the Junior Navy Financial Management Subspecialist-in-Training

The junior financial manager will generally be assigned to a 0031T or 0031S billet for three years. While assigned to the training billet, the officer gains the experience and expertise necessary to successfully perform the duties at the next higher subspecialty level. For this reason, it is vital that the junior financial manager focus on what he or she needs to learn in order to make the most of the training phase. This research will attempt to identify the relevant financial management topics on which the financial management subspecialist should focus while in training, and the level of detail in each topic to which the subspecialist should endeavor to acquire expertise.

3. Reference Handbook for the Junior Financial Management Subspecialist-in-Training

There is an ample body of directives, manuals and informative literature pertaining to Navy financial management, with the preponderance designed for the technician or mid-grade and senior officer. The officer assigned to the 0031T or 0031S subspecialty coded billet, by virtue of his or her inexperience, generally cannot comprehend such material and is ineligible and, in all likelihood, unprepared for advanced training.

This research is aimed at providing a single reference handbook designed with this officer in mind, which will address his or her information needs in context of the officer's limited background. The handbook will attempt to provide a structured approach to the various areas of Navy financial management, and serve as a point of departure for continued professional development in the field.

B. SCOPE

The junior financial management subspecialist-in-training under study in this research refers to the following applicable officer categories or designators within the Navy: Unrestricted Line, Restricted Line, Medical Service Corps, Supply Corps, and Civil Engineer Corps.

There are three broad research areas of interest in this study.

1. Federal Government, Department of Defense (DOD) and Department of the Navy (DON) Financial Management

The scope of the research includes an examination of federal resource management in general past and present, and the role of the junior Navy financial manager in its future.

2. Navy Financial Management Subspecialty

The research includes an examination of the subspecialty system procedures and policies, as well as characteristics of 0031T and 0031S billets.

3. Information for the Handbook

The product of the research is a handbook for the junior Navy financial management subspecialist-in-training. The topics chosen for inclusion in the handbook originated from responses to a financial management questionnaire and interviews.

C. METHODOLOGY

The method for obtaining the information for this thesis included a review of current directives and historical literature. The determination regarding what topics to include in the handbook was based on responses from a financial management questionnaire. The questionnaire (Appendix B) was completed by 27 financial management subspecialists, five faculty members from the Administrative Sciences Department at the Naval Postgraduate School, and two key representatives of the CNO financial management subspecialty sponsor, OP-92.

1. Questionnaires

The questionnaire addresses suggested topics of importance to junior financial managers. It asks for two responses for each topic: the level of importance of the topic and the level of detail to which it should be covered in a handbook for the financial management subspecialist-in-training.

This data is summarized and analyzed to determine the relevant topics and their level of detail which should be included in the handbook. This summary is provided in Chapter IV.

2. Interviews

Phone interviews were the secondary source for information regarding the Navy subspecialty and billet coding systems. Discussions were held with representatives of the Navy Military Personnel Command (NMPC) Education and Subspecialty Management Branch (NMPC-440) and the Deputy Chief of Naval Operations (Manpower, Personnel and Training) Subspecialty Requirements Coordinator Branch (OP-114).

3. Literature Review

Part of this thesis is based on the results of previous research in the areas of financial management subspecialty utilization, financial management in the Navy, and the history of federal and defense resource management. DON policy and procedure directives were also used, as well as recent theses and published defense analyses.

D. THESIS ORGANIZATION

The following orientation to the remainder of this thesis is provided to facilitate understanding of its contents.

1. Federal and DOD/DON Financial Management

In order to provide the junior Navy financial management subspecialist-in-training with a perspective on his or her role as a resource manager, this research includes background information on financial management in the federal government, DOD and DON, as well as a discussion of several current topics within the field.

2. The Navy Financial Management Subspecialty

This section describes the Navy's subspecialty system, its purpose, and the significant participants in the system. Additionally, it examines the "specialty versus subspecialty" issue, subspecialty codes and levels, and officer asset utilization/careers. A discussion of current training courses, funded education, and professional associations of interest to the junior financial manager is also provided.

3. Conclusions

In the concluding section, data obtained through questionnaires are summarized and analyzed. Findings are presented regarding proposed topics for inclusion in the handbook for the junior financial manager.

4. Appendix A--A Handbook for the Navy Financial Manager-in-Training

Appendix A contains the handbook, which is a consolidated reference guide for the junior financial manager who is assigned to a 0031T or 0031S subspecialty coded financial management billet.

5. Appendix B--Navy Financial Management Questionnaire

Appendix B is an example of the questionnaire used to determine financial management topics of importance to junior financial managers.

6. Appendix C

Appendix C is a Table which reflects responses from the three questionnaire groups combined (in percentages).

7. Appendix D

Appendix D is a Table which reflects responses from the three questionnaire groups individually (in percentages).

II. FEDERAL AND DOD/DON FINANCIAL MANAGEMENT

A. BACKGROUND

1. Public Funds and Policy

Since the adoption of the United States Constitution in 1787, Congress has been entrusted with the responsibility to ensure tax dollars are spent in accordance with national objectives. Public funds appropriated and passed down to government agencies by Congress carry with them the fiduciary responsibility to use those funds in accordance with the intent of each appropriation.

The government's plan for spending public monies is called a budget, and is in fact the government's agenda for carrying out its policies. Aaron Wildavsky explains the relationship between the federal budget and its policy objectives:

In the most literal sense a budget is a document, containing words and figures, which proposes expenditures for certain items and purposes. The words describe items of expenditure (salaries, equipment, travel) or purposes (preventing war, improving mental health, providing low-income housing), and the figures are attached to each item or purpose. Presumably, those who make a budget intend that there will be a direct connection between what is written in it and future events. Hence we might conceive of a budget as intended behavior, as a prediction. If the requests for funds are granted, and if they are spent in accordance with instructions, and if the actions involved lead to the desired consequences, then the purposes stated in the document will be achieved. The budget thus becomes a link between financial resources and human behavior to accomplish policy objectives. [Ref. 1:p. 1]

The trust and confidence placed in government officials to carry out public policy through management of public funds are fundamental to every government financial manager. Military financial managers play a role in policy implementation through their authority to obligate and spend public funds which, in fact, carries out the government's agenda.

To clarify the role of the junior financial manager, it is important to gain a certain amount of political and historical perspective, which will show the context in which he or she operates. Emphasis will be placed on the last few decades of rapid economic, technological and social change.

2. Resource Management--Trade-offs

Today, perhaps more than any other time in history, emphasis is being placed on sound resource management practices. This is partly due to the relatively recent realization that resources are limited and only through prudent management can we derive the optimum level of benefit from these resources. Prudent management of scarce resources calls for a balance. All requirements cannot be met with a limited amount of resources; therefore, a balance must be achieved in the allocation process. Managers must make "trade-offs" to obtain the optimum mix of available resources for their programs. This trade-off process can be

seen quite clearly between proponents of defense and welfare programs in the annual federal budget struggle.

3. Financial Management--A Critical Management Tool

DOD and DON have long understood the nature of budget trade-offs, or as it has come to be called, the "butter versus bullets" argument. More recently, agencies throughout the government have come to recognize financial management as an increasingly powerful tool in the management of their programs. Financial management has gained in managerial significance and has become an essential strategic ingredient for maintaining or expanding an agency's "share of the pie."

The most recent edition of the Naval Education and Training Command's course book, Financial Management in the Navy (NAVEDTRA 10792-E), highlights the growing emphasis on financial management in its introduction:

One of the greatest changes in the Department of the Navy in recent years has been the growing recognition of the importance of financial management in the planning and execution of Navy and Marine Corps programs. Command at all levels is giving more attention to developing and utilizing the tools of financial management for decision-making. [Ref. 2:p. 1-1]

4. History

Financial management, like any discipline, is effected by political climate, economic conditions, and world affairs. The last 50 years have witnessed dramatic changes in these areas. Defense analyst and resource strategist, William W. Kaufmann, comments on this period of

change in his book, Studies in Defense Policy, A Reasonable Defense:

It is hardly surprising that defense planning and budgeting should have undergone a considerable transformation during the last fifty years. During those same years the size of the defense budget was, in a series of major steps, undergoing a major metamorphosis. [Ref. 3:p. 18]

Between the years 1929 and 1939, the number of active duty personnel was approximately 250,000, and expenditures for national defense during that time measured between \$6.5 and \$11.6 billion (in constant 1986 dollars). This was the period just prior to World War II and the subsequent rapid advancement of technology. Before World War II, nations had a sense of "isolationism." It was thought that only a minimum defense base needed to be maintained during peacetime because, due to limited technology, countries were largely unable to engage on short notice. The United States shared this parochial view, and its defense policy during this period was to raise forces and expand the industrial base only as the need arose. [Ref. 3]

The advanced technology which came with World War II changed the United States' isolationist policy to one of "defender of democracy across the world." During the war, national defense expenditures reached a peak at \$692.5 billion and personnel at 12 million. Following the war, expenditures and active duty forces stabilized at \$70 billion and 1.5 million respectively. This was much lower

than the war's peak, seven times greater than the pre-war level. [Ref. 3]

By 1950 the United States was involved in the Korean War, which brought expenditures up to \$285 billion. Afterwards, the stabilized level was \$219 billion and 2.8 million military personnel, approximately 3 times the pre-war level. [Ref. 3:p. 20]

Each war spurred higher post-war levels of defense expenditures and forces. Rapid growth of new technologies in nuclear energy, mobilization, intelligence and communications, and their introduction into industry, changed the composition of defense programs and foreign policy forever. Thus the last few decades have brought enormous change to the business of providing national security.

The most dramatic change occurred in 1981, when the Reagan Administration launched a \$1.5 trillion defense build-up, bringing expenditures to their highest level since 1969, the second most expensive year in the Vietnam War [Ref. 3:p. 22]. Defense spending has continued to grow between 4% and 8% from 1981 to 1985, almost 30% in 4 years. These increases were reportedly made in order to close the gap between U.S. and Soviet armed forces, which grew during the so-called "decade of neglect" of the 1970's.

B. CURRENT TOPICS

1. Gramm-Rudman-Hollings Act

Fiscal responsibility and astute management of public funds have become the watchwords for government leaders today. Government officials must be able to continually demonstrate to the public that their actions result in the most efficient use of taxpayers' dollars. With the federal budget deficit increasing into the billions of dollars, public confidence in government officials' fiscal management abilities waned.

The Balanced Budget and Emergency Deficit Control Act (P.L. 99-177), or "Gramm-Rudman" as it came to be called, was signed into law by President Reagan on December 12, 1985 after a very brief period of legislative activity. This Act significantly changed the federal budget process. The most remarkable change was the requirement for a balanced budget by the year 1991 through mandated fixed deficit targets and automatic spending cuts.

The new budget process, initiated by Senators Gramm, Rudman, and Hollings, passed after only two months of negotiations. This expedience grew out of a mounting sense of frustration in the country and in Congress over the federal deficit and national debt which surfaced after Congress had to increase the national debt ceiling in October, 1985. [Ref. 4]

Americans had become increasingly concerned about the budget and its ever-growing deficit. As a result, in late 1985, Congress felt much pressure to develop a solution to the deficit problem and to do so quickly, no matter how radical a change from existing policies and practices the solution might be. Therefore, once the Gramm-Rudman-Hollings plan was passed by the Senate in early October, it rapidly gained supporters and flew through both houses, even though there had been no hearing on it and few people were sure exactly how (or even whether) it would work. [Ref. 4:p. 15]

This legislation changed the power structure and budget schedule, and underscored the serious interest the public and lawmakers were beginning to take in managing the nation's shrinking resources. It also set the stage for continued scrutiny of the Defense Department in view of its recent buildup.

2. The President's Blue Ribbon Commission on Defense Management

Public concern over the negative effects of the national debt on domestic and international economies, and procurement scandals within the Defense Department leading to charges of widespread fraud between DOD and its contractors, put pressure on government leaders to regain the trust and confidence placed in them to effectively and efficiently manage public funds.

Kaufmann describes what he sees as the growing uneasiness with regard to defense management:

More and more members of Congress, quite apart from the scandals surrounding the procurement process and overpriced items, have become persuaded that the country is getting a poor return on the large investment it has been making in defense. A small number, mostly senators, have even begun to wonder whether there is any longer a

significant relationship among objectives, strategy, forces, and budgets. [Ref. 3:p. 15]

Criticism of defense management such as this led President Reagan to charter the President's Blue Ribbon Commission on Defense Management (the Packard Commission) in July, 1985. The Commission was chaired by David Packard, former Deputy Secretary of Defense from 1969 to 1971, and president of the Hewlett-Packard Company. The President charged the Commission to evaluate the budget process, the procurement system, legislative oversight, and the organizational and operational arrangements [Ref. 5]. When the President received the Commission's recommendations, he ordered immediate implementation. This led to changes in the Joint Chiefs of Staff and the Defense Department acquisition organization and process. Recommendations were largely aimed at improving communication, responsiveness and accountability within DOD.

3. Material Professional Program

To demonstrate the Navy's commitment to better resource management, a separate material professional program was established. This program was designed as a new career path for senior officers from all communities which would bring better leadership and experience to the field of system acquisition and result in more efficient management of resources.

C. CONCLUSION

The government financial manager is entrusted with fiduciary responsibility for managing public funds, and in carrying out this duty implements the nation's political and social agenda.

In times of shrinking resources, and as more and more interest is taken in fiscal responsibility and accountability, financial management will continue to be a primary focus for government officials and leaders.

Government financial managers must be prepared to bear this scrutiny. The Defense Department receives its share of public examination in light of the annual "butter versus bullets" debate over the federal budget deficit, and defense's recent history of growth. It is in this dynamic and challenging environment that the Navy financial manager operates.

III. THE NAVY FINANCIAL MANAGEMENT SUBSPECIALTY SYSTEM

A. SUBSPECIALTY SYSTEM BACKGROUND

1. Purpose

The following is the definition of the subspecialty system as it relates to officer professional development and asset utilization:

The officer professional development system is based on the fundamental premise that operational, technical and managerial development are desired elements in every officer's career development with the degree of involvement in each area a variable. The subspecialty management system is structured to ensure that the technical and managerial requirements of the Navy are met by the development of subspecialty expertise in officers through education, training and/or experience in a variety of subspecialty fields. [Ref 6:p. 8-1]

The subspecialty system is used to identify and classify requirements for which significant experience, functional training, and advanced education are deemed necessary to meet specific operational, technical, and managerial needs. It is an integrated manpower, personnel, and education management system designed to develop the specialized skills and knowledge necessary to satisfy the aforementioned needs. [Ref. 7:p. 6-13]

2. Specialty Versus Subspecialty

A Navy officer has a designator code which expresses his or her specialty within the Navy organization. He or she usually maintains the same specialty throughout his or her career. The specialty determines the officer's career experiences and is the officer's primary area of expertise. "The area of specialization (specialty) required in a billet is identified by the designator code. Certain billets

requiring additional qualifications beyond those indicated by a designator code are further identified by subspecialty codes." [Ref. 8:p. E-1]

The subspecialty designation can be viewed as one level below the officer's primary area of specialization (e.g., aviation, surface warfare, intelligence). The officers assigned to subspecialty coded billets serve as the Navy's "experts" in that field.

3. Administration

There are seven primary participants who administer the Navy's subspecialty management system. Their offices and duties are briefly described below.

a. Chief of Naval Operations (CNO)

The CNO manages the subspecialty system with assistance from the Deputy CNO's, System Command Commanders, and other assigned staff offices. The CNO has overall responsibility to ensure that Navy assets, including personnel, are utilized effectively and efficiently. [Ref. 7]

b. Subspecialty Requirements Coordinator (OP-114)

OP-114 is the Deputy CNO for Manpower, Personnel and Training. It is responsible for the development of policy for officer subspecialty management and coordination of manpower requirements. This office also approves the identification of billets for officer subspecialists and plans for future requirements. Biennially, OP-114 convenes

a Subspecialty Requirements Board to review total graduate education billet criteria and requirements. [Ref. 7]

c. Subspecialty Career Development Coordinator (OP-130E)

The primary activity of OP-130E is the supervision of URL professional development to ensure application of career development policies with specific emphasis on development and assignment of subspecialists. [Ref. 7]

d. Naval Postgraduate School (NPS) Superintendent

The NPS Superintendent is the Subspecialty Curricula Coordinator and administers the fully funded graduate education programs at NPS, other service graduate schools, and civilian universities, and reviews the Education Skill Requirements issued by the Subspecialty Primary Consultants to ensure they are being met. [Ref. 7]

e. The Subspecialty Requirements Board (SRB)

The SRB convenes biennially to revalidate all subspecialty requirements. The board is composed of flag officers from the major CNO directorates and systems commands. The SRB produces a billet base with valid requirements for subspecialists in the various technical and managerial skill fields. [Ref. 7]

f. Education and Subspecialty Management (NMPC 440)

This branch within the Navy Military Personnel Command (NMPC) establishes subspecialty assignment procedures which enhance the professional development of the

various officer communities. It also counsels officers on subspecialty careers, effects liaison with Subspecialty Primary Consultants or "sponsors," and reviews assignment of subspecialists by the various officer distribution divisions to ensure consistent application of established policies and optimum utilization of officer assets. [Ref. 7]

g. Subspecialty Primary Consultants

The subspecialty primary consultant usually works for the sponsor of that particular subspecialty. The sponsor is the head of the functional organization which has a vested interest in the subspecialist's training and education. For example, the sponsor for the financial management subspecialty is the Navy Comptroller, OPNAV-92. The consultant serves as the central point of contact for the related subspecialty, develops Educational Skill Requirements and Criteria Statements for the assigned subspecialty, reviews Subspecialty Billet Requests, and evaluates the degree to which existing education and training meet the needs for officer subspecialists. [Ref. 7]

4. Subspecialty Codes and Levels

Subspecialties apply to the URL, Restricted Line and Staff Corps, and are professional development fields secondary to specialties [Ref. 8]. The subspecialty code is

subordinate to the officer's specialty, or designator, and serves a different purpose.

The officer subspecialty system is designed to identify officer requirements for advanced education, functional training and significant experience. It also identifies those officers who have acquired such qualifications. This is accomplished with a system of subspecialty classification codes.

The subspecialty code has five positions; the first four are numbers and the last a letter. The first two positions reflect the "functional field" within the subspecialty. Below the rank of LCDR, "00" will appear in the first two positions. More will be said about the types and use of the functional field later. The third and fourth positions denote the education/training/experience required by the billet (e.g., Financial Management, Manpower, Personnel and Training, Computer Science, and Electronic Engineering) and is the core subspecialty code. The final position in the code is a letter which applies both to the officer and the billet, and identifies the level of education/training/experience pertaining to the subspecialty identified by the third and fourth positions.

The subject of this study is the junior financial management subspecialist-in-training who is coded "0031T" or "0031S". The first two digits are "00" because he or she is usually below the rank of LCDR, the third and fourth

positions are the education/training/experience field code for Financial Management, "31," and the last position reflects the officer's level, "T" for training, and "S" for experience.

The Subspecialty Primary Consultant uses a set of criteria to determine the level of the billet, which becomes the last position, or letter code. The following summarizes the criteria for the "T" and "S" coded billets.

a. "T" Code

The "T" code is justified when the officer performs programming, planning, budget formulation or execution under supervision using previously defined procedures. Training is an integral aspect of a T-coded billet, and the officer is expected to participate in on-the-job as well as formal financial management training courses. The experience gained in a T-coded billet allows the officer to serve subsequent tours in S-coded subspecialty billets. [Ref. 7]

b. "S" Code

The "S" code is justified when the incumbent is required to independently perform programming, planning, budget formulation or execution functions. Additionally, the officer should have some experience in three or more of the following areas:

- (1) Development, planning, implementation and/or administration of policies, controls and systems to ensure optimum utilization of resources.

- (2) Development of significant input and justification of fiscal requirements for an activity budget, the Program Objective Memorandum (POM) or Five Year Defense Plan (FYDP).
- (3) Coordination of fund allocations to programs and organizational units.
- (4) Monitoring internal control procedures over related financial management systems.
- (5) Performance of internal review and audit of financial management systems.

B. FINANCIAL MANAGEMENT SUBSPECIALTY

1. Description

The subspecialty Fact Sheet prepared by the Subspecialty Primary Consultant OP-92 provides a definition of the financial management subspecialty:

This management subspecialty supports the Department of the Navy's financial management organization with officers experienced and/or educated in the management of resources within the Department of Defense. The subspecialty requires specific education and skills in Navy budgeting and accounting procedures, supported by a knowledge of management systems applications, economic principles, and financial analysis. [Ref. 9]

There are various ways to enter the financial management subspecialist community. Officers from varied backgrounds may serve in a T-coded billet, and are then eligible for assignment to an S-coded billet during his or her next tour in financial management. The officer may also obtain graduate level education in financial management from the NPS (curriculum #837) or from other colleges or universities for which approval has been granted. Over one half of the billets requires graduate education. [Ref. 9]

2. Billets

In total there are 596 financial management billets with 62 coded as "T" and 137 coded as "S." Most financial management billets are located in Washington, D.C. on the staff of the CNO (e.g., OP-90, 91, and 92) and systems commands (e.g., NAVSEA, SPAWAR, NAVSUP and NAVAIR). Other billets are located on staff at the Type Commander (e.g., SURFPAC, SUBPAC, and AIRPAC and LANT, and at stations and field activities).

3. Personnel

As of May 1987, there were 1276 Unrestricted Line, Restricted Line, Supply Corps and Civil Engineering Corps officers in the financial management subspecialty with 590 holding a Navy funded graduate education degree and another 356 holding graduate degrees obtained on their own. [Ref. 9]

4. Career

Having completed the training and/or experience tours and received designation as a financial management subspecialist, the Lieutenant Commander may expect assignment to financial management procedural and budget analysis billets at the Navy Comptroller (NAVCOMPT), NMPC, OPNAV and the Navy Finance Center, Washington, D.C., and also comptroller billets at Naval Air Stations, Naval training centers and Naval bases. Commanders may expect financial analysis, budgeting, cost analysis and fiscal

planning billets at systems commands, NMPC, NAVCOMPT, OPNAV, Chief of Naval Education and Training and other major staffs involved in fiscal planning, and also comptroller billets at Naval air stations, Naval stations and other fleet support stations. Captains hold key fiscal planning and budget management billets at the Pentagon and Fleet and Force headquarters. (Admirals do not carry a subspecialty designation.)

5. Subspecialty Functional Areas

The third and fourth positions in the subspecialty code indicate the subspecialty functional field. This represents a broad technical and managerial category and applies only to URL between the grades of LCDR and CAPT. Functional fields include categories such as public affairs, intelligence, naval warfare, command and control, plans and programs, political/military strategic planning, material support and manpower-personnel. "On billets, these functional codes express a requirement for an officer with background experience in the functional field in addition to the education/training/experience identified by the second two digits of the subspecialty code." [Ref. 8:E-9] For example, the subspecialty code for a financial manager in support of a manpower/personnel functional field would show the manpower/personnel functional field in the first two positions, "90," and the financial management subspecialty code "31" in the third and fourth positions. The letter

might be a "T" and denote that the billet is designed for training. The whole subspecialty code would be "9031T." Functional field codes are assigned as a result of subspecialty selection board action.

C. FINANCIAL MANAGEMENT EDUCATION AND TRAINING

This research is concerned with the junior officer serving in a 0031T or 0031S billet. This officer has little or no experience in financial management, but is in a position to gain experience and training for increased responsibilities in Navy financial management. While assigned to a 0031T or 0031S billet, the officer should take advantage of every training and education opportunity to continue his or her development in the field.

Opportunities within DOD and DON with which the junior financial management subspecialist-in-training ought to be familiar include courses available from the Officer of Personnel Management (OPM) and DOD/DON, Navy funded education, and professional organizations or associations.

1. Courses

a. Correspondence Course

Perhaps the most basic and accessible training course for the junior financial manager is the Navy correspondence course entitled Financial Management in the Navy (NAVEDTRA 10792-E). The course is an overview of DON financial management designed to provide the student with a broad understanding of the various components and cycles of

financial management. It covers the role of the Legislature, General Accounting Office (GAO), and the OMB. Within the Navy, topics include organization, comptrollership, the Planning, Programming and Budgeting System (PPBS), budget formulation and execution, accounting, reporting and auditing. [Ref. 2]

b. Navy Practical Comptrollership Course (PCC)

Comptroller organizations are integral to financial management. Comptrollership focuses on many areas of interest to the junior financial manager and can provide him or her with a practical approach to the many facets of financial management. The PCC is a two-week course based at the Naval Postgraduate School. The course is aimed at officers and civil service civilians who work in financial management, but there is no requirement that students have a certain level of expertise or experience. However, one must usually be assigned to a financial management billet to obtain a quota. It provides students with a minimum of theory and maximum of application in all facets of comptrollership and includes material on planning, budgeting, accounting, execution control, and internal review. [Ref. 10]

c. Professional Military Comptroller Course (PMC)

The PMC is two months long and is offered by the Air Force at Maxwell Air Force Base. An officer must be an O-3 (lieutenant) or above, or a civilian with a civil

service grade of at least GS-12 or above, be assigned to be sent to a comptroller position, or be in such a position at the time. The PMC deals in depth with subjects ranging from financial controls in the federal government, legal responsibilities of a comptroller, the U.S. economic system and policies, computers, and analytical techniques.

d. Office of Personnel Management (OPM)

OPM offers government employees numerous useful courses which may give the officer background in federal financial management. Course offerings will vary according to geographical location, and may include an introduction to the federal budget, budget formulation and execution, and budget justification.

2. Education

At the 0031T or 0031S level, the officer may consider advancement within the subspecialty community through graduate education. Of the officers currently with a financial management subspecialty, 590 of 1276 hold a Navy funded graduate education degree, and another 356 hold graduate degrees obtained on their own [Ref. 9].

a. Naval Postgraduate School (NPS)

NPS offers an 18 month financial management curriculum resulting in a Master's of Science Degree in Management. While assigned, the officer is coded 0031T for training, and following graduation receives a 0031P for the subspecialty level reflecting a master's level education.

Subsequent assignments will utilize the subspecialist to the greatest extent possible as long as it does not interfere with the officer's primary specialty.

b. Other

Other colleges and universities may have similar programs in their management science departments which closely approximate the curriculum offered at NPS. The officer considering pursuing a graduate degree from other colleges and universities (in order to obtain designation as a subspecialist) should first make contact with NMPC-440E, the Subspecialty Procedural Control Branch. A review of the curriculum must be made to ensure it complies with subspecialty standards. [Ref. 9]

3. Professional Associations

Because professional associations presume certain expertise or familiarity with the particular profession, many of them may be beyond the junior financial manager. However, one association in particular worth mentioning is the American Society of Military Comptrollers (ASMC). Its broad comptrollership approach lends itself to many topics of interest to the junior financial manager.

The ASMC is a professional organization for military and civilians involved in financial management or comptrollership. Its purpose is to promote education and training of its members, and to support the development and advancement of the profession of military comptrollership.

To accomplish its objectives the ASMC publishes a quarterly magazine call the Armed Forces Comptroller, which contains issues and programs in the forefront of current financial management. The ASMC also holds yearly conferences, and local chapters conduct periodic seminars which promote liaison and discussion among the professional financial managers. [Ref. 10] A military financial manager at any level can obtain a lot of information and experience through affiliation with the ASMC.

IV. CONCLUSION

A. INTRODUCTION

1. Purpose of the Research

The purpose of this research is to examine the role of the junior Navy financial management subspecialist-in-training and determine his or her information needs with regard to Navy financial management at the "entry level." Based on the results of this research a handbook was developed for the junior financial management subspecialist-in-training.

2. Areas of Research

Areas deemed appropriate for research included: general historical background regarding government, the Defense Department, and Navy financial management; the Navy subspecialty system, and the financial management subspeciality in particular; and information relevant for inclusion in the handbook (Appendix A).

3. Methodology

The methodological approach to the first two areas of research essentially required a review of current directives and historical literature.

Input for the third area was obtained from individuals currently involved in Navy financial management with the use of a financial management questionnaire.

Responses to the questionnaire constituted the primary source of information for determining what topics to include in the handbook as well as the detail of coverage needed for each topic.

4. Questionnaire

a. Participants

The questionnaire was administered to three groups: 27 Navy financial management subspecialists who work in the field at the time of this writing; five NPS faculty members from the Administrative Sciences Department (representing those professors who instruct the core courses of the Financial Management Curriculum); and two key representatives from the CNO financial management subspecialty sponsor, OP-92.

Financial management subspecialists were chosen randomly from the financial management subspecialty sponsor's personnel file. Their input was solicited to obtain a realistic, experienced point of view. It was felt that as former junior financial managers, and likely current bosses of junior financial managers, they would be critical judges of the areas of endeavor to which the junior financial manager should apply him or herself during the training phase.

Answers to the questionnaire from educators of Navy financial managers (the five instructors of the NPS Financial Management Curriculum) were solicited because it

was felt that they would provide a broad perspective on expectations of financial managers in the more general context of public expenditure policy formulation and execution.

The CNO sponsor was requested to participate in the research in order to incorporate current emphasis and anticipated directions in the formal management of the Navy's financial management community.

b. Content

As shown in Appendix B, the questionnaire suggested 11 general topics pertaining to financial management. Those topics included: the planning, programming and budgeting system; budgeting; accounting; contracting; auditing, management control; plant property; commercial activities; civilian personnel; reimbursables/Inter-service Support Agreements; and financial management with computers. Space was left for additional categories and free-form comments.

c. Responses

Participants were asked to give two responses for each topic. The first response addressed whether or not the topic was deemed to be important to the junior financial manager, on a scale from one to three (one indicating very important and three indicating not very important). Four could also be selected to indicate that the topic did not apply to the junior financial management subspecialist-in-

training. The second response indicated the appropriate level of detail to which the junior financial manager should be concerned in developing expertise in that topic, on a scale from one to three (one indicating a lot of detail and three indicating general coverage).

B. FINDINGS

1. Calculations

Responses to the questionnaire were tabulated individually per group and collectively topic by topic for both response categories: importance and detail.

Percentages were derived for both responses according to the total responses made for importance and detail for the 11 topics.

2. Analysis

After the responses from each group were transformed into percentages, analysis determined the individual and collective recommendations of the three groups. Composite and individual group responses are shown in percentages in Appendices C and D, respectively.

By examining the questionnaire results, this researcher was able to focus the writing of the handbook on the areas deemed important by the financial management community at large. The topics chosen for inclusion in Appendix A, and the level of detail deemed appropriate, are based largely on the individual and combined responses (34 total) of the participants in the questionnaire.

Where high percentages (greater than 40 percent) showed an emphasis on a given topic and a need for a high level of coverage (detail), an attempt was made to ensure that topic was covered accordingly. Where low percentages (less than 20 percent) indicated that certain topics required less detail, the handbook reflects more general coverage.

Additional categories suggested under "other" were included in the 11 general topics detailed above.

C. SUMMARY

Based on the collective responses to the financial management questionnaire received from 34 financial management subspecialists, sponsors, and educators, all 11 of the suggested topics were deemed by this researcher to be important enough to warrant inclusion in the handbook for the junior financial manager.

1. Results of the Research Incorporated into the Handbook

In accordance with the results of the research, the handbook placed the greatest emphasis on the PPBS, Budgeting, Accounting, Management Control, and Civilian Personnel Chapters. The greatest detail was presented in the Budgeting, Accounting, Management Control, and Civilian Personnel Chapters.

2. Differences Between Questionnaire Groups

As can be expected, there were some identifiable differences between the composite responses of the three groups. These can be summarized as follows.

The subspecialists tended to emphasize the fundamental comptrollership functions (i.e., budgeting, accounting, civilian personnel management, and the reimbursable/Inter-service Support Agreement areas).

Educators of Navy financial managers tended to stress the importance of traditional areas of financial management (i.e., planning, budgeting, accounting, and management control).

The areas deemed important by the CNO sponsor included high-level management concerns such as the PPBS process, budgeting, contracting, management control, and civilian personnel management.

In general, the responses from the three groups tended to balance out one another and present a reasonably clear indication of the areas deemed most important to junior Navy financial managers and the level of detail to which each area should be covered in the handbook.

APPENDIX A

A HANDBOOK FOR THE FINANCIAL MANAGEMENT SUBSPECIALIST-IN-TRAINING

I. INTRODUCTION

A. THE NAVY FINANCIAL MANAGEMENT SUBSPECIALIST

1. Role

The Navy officer subspecialty system was developed to identify and classify billets which require special expertise in addition to the officer's specialty or designator (e.g., Surface Warfare, Aviation, Supply, and Intelligence). A management system was created whereby officers gain experience, training and/or attend advanced education courses in order to satisfy special operational, technical, and managerial billet requirements.

At various levels within the Navy, the financial management subspecialist fulfills the organization's need for special expertise in the area of resource management. According to the Navy's financial management Subspecialty Primary Consultant, OP-92, the subspecialist supports the Navy's financial management organization through his or her specific experience, training, and/or education in the areas of budgeting, accounting, management systems, economics, and financial analysis [Ref. 9].

The officer assigned to a training- or experience-level subspecialty coded billet, 0031T or 0031S respectively, is in a position to focus on acquiring necessary skills for advancement within the professional community of Navy financial managers. The role of the junior financial manager is to use the training and experience available during his or her training and experience phases to prepare for increased responsibilities in subsequent financial management assignments.

In addition to the subspecialty designation itself, an Unrestricted Line (URL) officer above the rank of LCDR may acquire a sub-designation within the subspecialty system which further identifies the officer's skill and experience. This designation is referred to as a "functional field" and represents a broad technical and managerial category (e.g., plans and programs, material support, manpower/personnel, and political/military strategic planning). When selected for a functional field designation by the subspecialty review board, the subspecialist will be identified by a functional field code in the first two digits of his or her subspecialty code. Functional field designation is reserved for senior officers, and provides a means for identifying and classifying billets for which additional experience is required.

2. What You Need to Know

In the case of a 0031T subspecialty coded billet the assigned officer is not expected to have any experience or expertise in the field of financial management. The billet is designed to provide the opportunity for training and experience, which will prepare the officer for the next higher subspecialty level, 0031S. The first two digits are reserved for the functional field code, the third and fourth reflect the subspecialty area, and the fifth is the letter code which denotes the level of expertise, education, or training.

The officer serving in a 0031S subspecialty coded billet may have limited experience or background in the field, but no proven experience or formal education. "Proven" subspecialty billets, in general, require more experienced, senior officers, and can be thought of as "follow-on" billets for basic subspecialty system billets [Ref. 8].

In order to determine what the junior Navy financial manager needs to know, a financial management questionnaire was sent by this researcher to the following individuals: 27 experienced financial managers at headquarters and field activity levels, five faculty members from the Naval Postgraduate School (NPS) financial management curriculum, and two key representatives of the financial management Subspecialty Primary Consultant (OP-92).

The questionnaire asked the respondents to evaluate the importance of 11 financial management topics which were proposed for inclusion in a handbook for the junior financial management subspecialist-in-training. The questionnaire also asked for the respondents' judgement on the level of detail pertaining to each topic that should be discussed in such a handbook. Suggested topics included: the Planning, Programming, and Budgeting System (PPBS), budgeting, accounting, contracting, auditing, management control, plant property, Commercial Activities, civilian personnel, reimbursables, Inter-service Support Agreements, and financial management with personal computers.

The fundamentals of what you need to know as a Navy financial management subspecialist-in-training, in order to begin or continue your early professional training, are contained in the remainder of Appendix A. The topics covered in Appendix A were chosen from information provided by subspecialists in the field, educators of Navy financial managers, and representatives of the Subspecialty Primary Consultant. These topics, as well as their particular levels of detail, reflect what the current financial management community feels the junior financial manager needs to know.

B. THE HANDBOOK

1. Purpose

The handbook is written for the financial management subspecialist who serves in an 0031T billet, which is designated for training, or a 0031S billet, which is designated for experience. Neither billet requires proven experience nor formal education in the subspecialty area.

There is ample information on financial management procedures and policies available in directives and technical manuals. Many of these references are located in different documents, and are written at the mid- or senior-grade officer or technician level. The junior financial manager, in all likelihood, has no experiential context for such specialized information. This handbook attempts to give the officer a broad perspective on his or her role as a subspecialist, as well as provide an introduction to the basics of financial management topics.

2. Reference and Resource

The handbook discusses the role of the subspecialist, the many organizational levels of public financial management, and presents information on 11 fundamental topics in Navy financial management.

The handbook is not intended to be a comprehensive presentation of Navy financial or resource management. Its scope is sufficiently broad to touch on major topics, some in greater detail than others, but not detailed beyond the

comprehension of, or usefulness to, the inexperienced junior financial manager.

II. FINANCIAL MANAGEMENT

A. COMPTROLLERSHIP

1. Introduction

Comptrollership is the organization for financial management wherein the comptroller is the primary resource manager and financial management specialist.

Comptrollership is that function of management that deals with the financial areas of an organization--with those analyses, forecasts, records, reports, and procedures that have a bearing on the organization's financial status in relation to its mission or goal. [Ref. 2:p. 2-6]

The enactment of Title IV of the National Security Act Amendments of 1949 (Title 10, U.S. Code, Sec. 5061) resulted in the creation of federal government comptroller organizations. In 1950 the Secretary of the Navy (SECNAV) established the Office of the Comptroller of the Navy, NAVCOMPT. [Ref.2]

2. Purpose

The purpose of the comptroller organization is to perform the functions of financial management and directly serve command authority as a specialist in that area. "When properly performed, comptrollership will enable the commanding officer to spend more of his time in the areas of policy formulation, decision, and program direction." [Ref. 11:p. 012003] The official establishment of comptroller organizations expanded their role and emphasized that

financial management was not only recordkeeping (accounting), but also data interpretation and program analysis.

3. Line Versus Staff

Line officials have ultimate responsibility for the organization. They decide how to guide the organization and which actions to take based on information and recommendations from staff managers (e.g., medical, administrative, and financial).

Comptrollership is one part of the total management job. The comptroller is a staff manager who functions in support of line authority in the area of resource management, but does not make decisions on behalf of the command as a whole and does not make policy.

4. Responsibilities

The goal of comptrollership is to provide the commander with an integrated system of financial management information, which will assist in decision-making. The responsibilities of comptrollership include: technical guidance and direction of financial matters throughout the organization as a staff service to command; maintenance of account classifications for programs, including budget plans and program schedules; budget formulation, review, and execution; accounting and operating statistics; and promotion of economy and efficiencies in program performance [Ref. 11].

Specific comptroller functions are: budgeting; accounting and disbursing; program analysis; and program reports and statistics. These functions are presented in more detail in the remaining chapters.

B. ORGANIZATION

1. Federal Government

To accomplish the functions of comptrollership, each level of government has its own financial management-type organization and processes. In the federal government, the Executive and Legislative Branches play key roles in managing the nation's resources.

a. Executive Branch

The President reviews the programs and budgets which government agencies submit through their organizations (e.g., Department of Defense, Department of Agriculture, and Department of Energy). These inputs are reviewed by the President's executive staff in the Office of Management and Budget (OMB), and forwarded to Congress with his priorities and recommendations.

OMB reviews and performs the technical analysis on budgets submitted by government agencies, and then transforms them into the President's budget, which will be submitted to Congress. OMB promulgates policy and procedures to government agencies for preparation and submission of their budget inputs, and controls and monitors the apportionment process. [Ref. 12]

b. Legislative Branch

Congress participates in the federal budget process in two distinct legislative steps: authorization and appropriation. The enabling legislation passed prior to the appropriation act is the authorization act. The authorization act specifies the purpose and use of federal funds. Once the authorization act is approved, the passage of an appropriation act permits the actual commitment and expenditure of funds against the U.S. Treasury.

The House and Senate Budget Committees establish spending priorities and set federal budget target amounts based on information concerning projected taxing and spending levels obtained from the Congressional Budget Office. The budget committees also conduct the reconciliation process, which is designed to bring dollar amounts contained in the House and Senate appropriation bills into agreement. The role of the budget committees is one of budgetary discipline [Ref. 1].

The House and Senate Armed Services Committees determine the purpose and guidelines for which programs will be included in the budget. These committees, referred to as the authorizing committees, decide how federal funds should be spent.

The House and Senate Appropriations Committees prepare the appropriations bills, which specify dollar limitations within appropriations. These committees make

cuts to what has been authorized by the House and Senate authorizing committees when budget figures are not within targets established by the Budget Committees.

The Congressional Budget Office (CBO) provides economic analyses and forecasts, as well as statistical reports, which assist Congress in making decisions during the budget process.

The General Accounting Office (GAO) is the congressional auditing agency, which formulates basic accounting principles and standards for government agencies, in addition to providing numerous studies and reports.

2. Department of Defense (DOD)

The Secretary of Defense (SECDEF) is advised on budgetary and fiscal matters by the Assistant Secretary of Defense (Comptroller) (ASD(C)).

Under the Secretary, the ASD(C) has Department-wide responsibility for organizational and administrative principles, policies, and procedures relating to budget preparation and execution, accounting, progress and statistical reporting, and audit. The ASD(C) is also responsible for policies and procedures relating to the expenditure and collection of funds administered by the Department of Defense and for establishing uniform terminologies, classifications, and procedures in all of the foregoing matters. [Ref. 2:p. 2.14]

The Office of the Secretary of Defense (OSD) passes policy and budget guidance to the services through ASD(C) and coordinates certain basic policies applicable to the military departments relating to disbursing, contracting, and finance. The ASD(C) also has overall responsibility for development and implementation of resource management

systems throughout DOD, and for maintaining liaison with all services concerning major comptroller functions.

The ASD(C) is before OMB in the chain of command for review of military departments' budgets, and is DOD's intermediary between the military services and the Executive Branch.

3. Department of the Navy (DON)

The Secretary of the Navy (SECNAV) is advised on matters relating to financial management by the Assistant Secretary of the Navy for Financial Management (ASN(FM)). The ASN(FM) is the Comptroller of the Navy and is responsible for budgeting, accounting and disbursing, financing, progress and statistical reporting, and reconciling audit issues. He or she maintains liaison with the ASD(C), GAO, OMB, and supervises the Office of the Comptroller (NAVCOMPT) and the Office of Management Information.

The ASN(FM) is a civilian with a military officer as Deputy Comptroller. The Deputy Comptroller commands NAVCOMPT and serves as an advisor and assistant to the Chief of Naval Operations (CNO) and Commandant of the Marine Corps (CMC).

The structure of the Navy Comptroller's office is unique among the service comptrollers. The Army and Air Force comptrollers are military officers reporting to their respective chiefs of staff. To accommodate the existence of the Navy and Marine Corps under one service secretary, the Navy Comptroller is an Executive Service (civilian) employee who reports to the Undersecretary of the Navy. [Ref. 13:p. 54]

Under the ASN(FM), NAVCOMPT uses two directorates to carry out the Navy's comptrollership functions.

a. Director of Budget and Reports (Code NCB)

NCB prepares and administers the Navy's budget for SECNAV. This directorate has seven divisions to perform various functions: conduct liaison with the House and Senate Appropriations Committee relating to DON participation in congressional hearings; perform budget evaluation; administer the appropriation accounts; manage financial control systems; develop policies and procedures; and review, recommend, and revise civilian personnel levels for inclusion in the budget. [Ref. 13]

b. Financial Management Systems/Commander, Navy Accounting and Finance Center (NCF)

NCF is responsible for ensuring the integrity of all Navy and Marine Corps accounting support systems.

The ASN(FM) and Deputy Comptroller in command of NAVCOMPT are assisted by numerous offices throughout the Navy in the performance of assigned responsibilities (e.g., Assistant Comptroller for Financial Management Systems, the Auditor General and Director, Naval Audit Service, the Assistant Comptroller for Cost Review and Analysis, the Director of the Office of Management Evaluation, and the Project Manager of the Integrated Financial Management Systems (IFMS) Project). [Ref. 2]

NAVCOMPT is responsible for exercising technical direction over decentralized fiscal operations performed at

lower levels, and prescribes Navy-wide financial policies and procedures.

4. Major Claimants

Although responsibility and authority for financial management in the Navy are centralized in NAVCOMPT, certain operations are decentralized to various headquarters commands and through them to subordinate activities. Examples of major claimants include: Commander in Chief, Pacific Fleet (CINCPACFLT), Commander in Chief, Atlantic Fleet (CINCLANTFLT), Commander, Naval Sea Systems Command (COMNAVSEASYSOM), Chief of Naval Education and Training (CNET), and Commander, Naval Military Personnel Command (COMNAVMIIPERSOM).

A major claimant, often a headquarters or systems command, is the level between NAVCOMPT and the field activities. Financial specialists at the major claimant are responsible for financial administration of the programs and activities under the cognizance of the headquarters' or system commands' commander or director. They receive and consolidate inputs from field activities regarding resource management functions, and prepare project or division budgets and support material for the budget process. Major claimants are responsible for defending their NAVCOMPT budget submissions during all reviews and for participating in congressional hearings. [Ref. 2]

5. Field Activities

DON complied with the mandate to establish comptroller organizations by ordering that fully coordinated resource management organizations be installed at field activities where the size, scope, and complexity of fiscal operations justify the need. If an organization does not require a comptroller, then a fiscal officer is appointed to administer the basic functions of comptrollership.

The field activity has the flexibility to tailor its comptroller organization according to its needs. It may divide the functions into specialized organizational units, or combine them if the activity is small. The details are left to the individual command to ensure that its comptroller organization is a coordinated, integrated system that will provide complete staff service to the command.

The Navy's general response to the federal government mandate was the realization that most comptroller functions were already being accomplished at some level within the organization. Therefore, when the Navy issued SECNAV Instruction 5400.4 (November 1953) to establish Navy comptroller organizations, it primarily emphasized analysis as distinct from the bookkeeping function, improved budget formulation and execution through use of accounting and program data, and integration and coordination of decision-making information.

C. FLOW OF FUNDS

Having discussed comptrollership and the levels involved in the management of the Navy's financial resources, it is important to briefly explain how funds come to be managed by the various comptrollership organizations.

During DOD's Planning, Programming, and Budgeting System (PPBS) process (which is discussed in detail in the next chapter) plans, programs, and budgets are developed to ensure that defense resources are allocated most effectively and efficiently among competing programs. The budget is the output of the PPBS process and is forwarded by DOD to the President for review and approval via SECDEF.

OMB conducts the President's review of the DOD budget, along with budget submissions from the other government agencies, and consolidates them for submission to Congress on 5 January.

Congress reviews the President's budget during the summer. The House and Senate committees perform their respective control, authorization, and appropriation functions. Their action culminates in the passage of the authorization and appropriation acts. In recent history, an omnibus appropriation act has been passed instead of individual appropriations in order to expedite the process.

Congress forwards the appropriation act to the President for review. The President may veto it and send it back to

Congress where his veto can be overturned by a two-thirds majority, or he may sign the act into law.

If the President signs the appropriation act into law, it is sent to the Treasury where an appropriation warrant is issued. This action enters the approved appropriation into the U.S. Treasury accounting system. The appropriation warrant is then forwarded to the Comptroller General at GAO for countersignature. From GAO, the warrant is given to OMB, which oversees the apportionment and budget execution processes.

III. PLANNING, PROGRAMMING AND BUDGETING SYSTEM (PPBS)

A. OVERVIEW

1. Introduction

PPBS is the method developed by DOD to ensure it allocates its limited resources most effectively between the competing programs which are designed to accomplish national defense objectives.

"Defense is an insurance policy which contributes to protecting us from external threats to our way of life." [Ref. 14] As required by the U.S. Constitution, the federal government provides this defense, which comes to represent a substantial portion of the nation's budget.

PPBS is a complex, multi-layered process, which involves all DOD planners and financial managers, whether they are aware of it or not. PPBS is the mechanical process by which defense policies are translated into plans, which will be carried out through programs, and costed in the DOD and federal budgets. PPBS organizes defense requirements into a structure which facilitates the choice of optimum alternatives.

2. History

In the 1940's and 1950's, DOD's system for financial management relied primarily on cost control and performance measures of effectiveness (e.g., output per manhour worked

and output per hour of maintenance performed/required). This effort to quantify true costs helped determine what to buy, but not what to do. The problem lay in the difficulty of relating budgets to military missions. Therefore, during the Kennedy Administration under Secretary of Defense Robert McNamara, DOD developed a practical method which allowed missions to be related to costs.

It was this analytical approach which aimed at costing varying program alternatives along MISSION lines McNamara's approach to program budgeting was a planning/programming cycle which defined forces and programs required by the national strategy and once the need was quantified, developed the most cost-effective means of acquiring the posture that could be funded.
[Ref. 2: 4-3]

This was a significant change from the way traditional planning and budgeting had been done in the military because it introduced the notion of program budgeting, or programming.

The Planning, Programming, and Budgeting system contrasts with the traditional budgeting process which preceded it in two significant ways. First, PPBS tends to focus less on the existing base and annual incremental improvements to it. Instead, its focus is more on objectives and purposes, and the long-term alternative means for achieving them. As a result of this emphasis, planning has been elevated to a level on par with budgetary management and control. Secondly, the system brings together planning and budgeting by means of programming, a process which essentially defines a procedure for distributing available resources equitably among the many competing or possible programs. [Ref. 12:p. A-9]

B. CYCLE

PPBS can be briefly summarized as the collection of intelligence, evaluation of the threat, and the development

of strategies and programs, within fiscal constraints, to meet the threat and maintain force structure. The phases in the cycle involve numerous documents and agencies whose PPBS activities, at any given period of time, span nearly two years. PPBS can be broken down into many players at many levels. For purposes of simplicity and understanding, the following brief outline depicts the basic steps.

1. Planning

At the beginning of the cycle, the Joint Chiefs of Staff (JCS) develop an overall defense strategy based on inputs from the Central Intelligence Agency (CIA), Defense Intelligence Agency (DIA), and other sources. This becomes the Joint Long-Range Strategic Appraisal (JLRSA). JCS consolidates this into a Joint Strategic Planning Document (JSPD), which is used to advise the President, National Security Council, and the military departments.

Based on the strategic planning information provided by JCS and the intelligence agencies, SECDEF composes guidance for its military departments. The document is called the Draft Defense Guidance and includes information on policy, force planning, and fiscal considerations spanning five years.

Military departments have the opportunity to study the draft guidance and make comments regarding their perspectives on long range service-specific strategies.

After the services have reviewed the draft guidance, SECDEF consolidates and issues the final Defense Guidance, which becomes the authoritative statement of fundamental strategy, issues and rationale, and serves as the basis for the services' Program Objective Memoranda (POM). The final Defense Guidance contains the following sections: strategic nuclear forces; theater nuclear forces; general purpose forces; manpower; logistics; communications, command and control, and intelligence; research and development; forces by geographical areas; and forces by types.

Appraisals and analyses are performed by various DOD agencies throughout the planning phase to provide detailed and specific information on international political issues, domestic attitudes, and economic trends.

2. Programming

The POM process is the heart of the PPBS programming phase. During the POM process, defense agencies translate approved concepts and objectives, arrived at in the planning phase, into a definitive structure expressed in terms of time-phased resource requirements.

Agencies submit their POMs to SECDEF for review and approval. The POM relates dollars to missions and allows SECDEF to see the impact of present-day decisions on future defense programs. The POM contains rough fiscal constraints from the Defense Guidance, and is also the basis for DOD's Five Year Defense Plan (FYDP).

Programming consists of the analysis of data to determine the best mix of programs, given the competition for limited resources. This is done through systematic procedures which allow planners to cost-out policy objectives five years into the future, and relate dollars to military capabilities.

Although not quite a budget, the POM is expressed in force structure, in terms of manpower, material, and estimated costs, and represents economic mission accomplishment through specified programs.

There are three consecutive phases in the development of the Navy POM: the Program Planning Phase, Program Data Base Update Phase, and the Final POM Development (End-Game) Phase.

a. Program Planning Phase

SECNAV issues broad guidance for planning and programming, and highlights areas of special concern. The Chief of Naval Operations (CNO) then promulgates guidance on programming and fiscal targets. The CNO creates Programming Analysis Memoranda (CPAM), which analyze major areas (e.g., U.S./Allied Naval capabilities with those of potential adversaries, general support and logistics, manpower, personnel, and training, and fleet support and strategic mobility). These documents are reviewed thoroughly by assessment sponsors (e.g., Intelligence, Training, and Personnel Support), and are summarized in a Tentative

Program Summary (TPS). The TPS highlights major issues, program decisions, and tentative priorities chosen by CNO.

b. Program Data Base Update Phase

During this phase, funding guidance is examined with the goal of maximizing the effectiveness of defense dollars. Resource sponsors (e.g., Surface, Aviation, and Submarine) review their programs, establish priorities, make changes, and recommend programs for inclusion in the POM. This information is collected into a data base using a computer, and serves as a starting point for the programs proposed by each resource sponsor. This is reviewed as a whole, issues resolved, and then forwarded to the CNO for approval.

c. End Game

After the balancing between programs and sponsors is over and the data base is more or less in its final form, the appropriation sponsors (e.g., Operations and Maintenance (O&M), Weapons Procurement (WP), Research, Development, Test and Evaluation (RDT&E), Military Construction (MILCON)) review the POM with the appropriations in mind instead of programs. This process is concerned with funding levels, executability of each line item, compliance with congressional direction, and packaging for best possible chances for successful presentation to SECDEF, OMB, and Congress.

OP-90, the General Planning and Programming Division for the CNO, coordinates the final computer data and narrative portions of the POM documentation, and forwards it to the CNO, via a last review by resource sponsors and OP-00X, Director of Long-Range Planning.

SECDEF issues his PDMs to the services with their respective POMs, as approved or modified.

Services can formally comment or appeal decisions made by SECDEF during the reclama process. The PDM may be revised as a result of service reclama. When issued, it will contain final funding constraints for the budgeting phase.

The major programs which are decided upon during the programming phase are subdivided into program elements. Every DOD activity has a program element which reflects a military activity or capability across service lines. The Navy has more than 1000 program elements. [Ref. 2:p. 4-29] The program element relates programs to appropriation categories in the FYDP and serves as a building block for major subprograms. Each program element is assigned a sponsor who is responsible for coordinating the development of proposed program element changes.

JCS reviews the services' POM inputs, and prepares and submits the JPAM to SECDEF with feedback. OSD then reviews the POMs and provides SECDEF with information on which to base program decisions.

3. Budgeting

PPBS ends with the budgeting phase, which expresses the financial requirements for approved programs developed during the preceding phases. Budgets translate program structure into appropriation structure. While programs are grouped according to specific missions, appropriations are grouped according to similar operations. The budget is the bridge between programs and appropriations, and becomes the framework for day to day management and execution of programs.

"Programs achieve a specificity and greater realism through the budget process by which funds are provided for personnel, material, and facilities." [Ref. 2:p. 4-33]

The services prepare budget estimates for the programs approved during the programming phase. In the Navy, NAVCOMPT issues an annual budget call to major claimants with instructions concerning format and content, and the major claimants issue budget calls to their field activities. After field activity budget requests are received and consolidated at the major claimant level, a consolidated budget request is forwarded to NAVCOMPT. NAVCOMPT reviews and consolidates major claimant budget requests and submits its consolidated budget request to SECDEF, following SECNAV review and approval.

A brief description of the budgeting that takes place at the end of the PPBS cycle does not reflect the

majority of the budgeting activity which takes place in the Navy. Most budget formulation and execution occurs at field activity levels. A more in-depth discussion of budgeting at the field activity levels follows in the chapter on budgeting.

C. SUMMARY

Although the PPBS process is quite complex and involves a large number of documents and participants, it can be summed up in a few words: PPBS is the process whereby defense strategy is developed from an assessment of the threat. The strategy is articulated in policy objectives, or plans. Programs are developed to execute plans within time and resource constraints. Funds are budgeted for programs in the appropriation process in Congress.

IV. BUDGETING

A. OVERVIEW

The Federal Government allocates resources between the private and public sectors of the economy through taxing, borrowing, and spending. Within the Federal Government, the allocation of budget resources among individual spending programs reflects the national priorities determined by the President and Congress. [Ref. 15:p. 88]

According to the above quote from the introduction in the federal budget document, the budget reflects priorities. Budget policy expert Aaron Wildavsky expands on this theme by asserting that a budget is simply a list of agenda items with price tags attached [Ref. 1]. Therefore, the federal budget is the nation's prioritized political agenda and the DOD budget is a prioritized agenda for carrying out defense policy. This policy, which is expressed in terms of programs, has prices attached, and those costed programs are incorporated into the federal budget.

During the programming phase of PPBS the programs, which are described in terms of their missions, are costed. The next and final phase of PPBS, which results in the formulation of the budget, consists of activities that translate mission requirements into appropriation terms or budget format. During this phase, the budget is presented and justified in an iterative process which involves numerous agencies and documents. The result is a budget

suitable for execution by means of the obligation and expenditure of funds. [Ref. 12]

1. Functions of a Budget

A budget is an activity's prioritized policy statement in financial terms that identifies resources required to support the activity's goals and objectives. The functions of a budget include: providing guidance and instruction, review of estimates, consolidations of activity budget data, control of fund authorizations, and analysis of program performance.

With regard to legal limitations placed on management of a budget, the following two subsections of Title 31 of U.S.C.A. apply.

a. Subsection 1341(a)

Subsection 1341 requires that appropriated funds be expended on programs or items for the purpose intended by the appropriation category (i.e., funds from the shipbuilding and conversion appropriation can only be used for those purposes, and cannot be used to purchase consumable supply parts or pay personnel costs).

b. Subsection 1517(a)

This subsection prohibits any officer or employee from making or authorizing an obligation in excess of the amount available in an appropriation, or authorized by agency regulations.

Any person who violates these subsections of the Act (formerly referred to as R.S. 3678 and 3679) are subject to discipline that may include suspension without pay or removal from office. If done knowingly and willfully, criminal penalties of up to a \$5000 fine or imprisonment, or both, may be imposed.

2. Appropriations

An appropriation is an authorization by an act of Congress to incur obligations for specified purposes and to make payment (expenditures) out of the U.S. Treasury. An appropriation has three limitations: a specified dollar amount, a particular purpose for which the funds have been appropriated, and an obligational availability period, which is the amount of time for which the funds are available for commitment before they "expire."

a. Types

There are two types of appropriations: expense and investment. In terms of Navy appropriations, the expense appropriations are Operations and Maintenance, Navy (O&MN), and Military Personnel, Navy (MPN). The investment appropriations are Aircraft Procurement, Navy (APN), Weapons Procurement, Navy (WPN), Shipbuilding and Conversion, Navy (SCN), Military Construction, Navy (MCN), and Other Procurement, Navy (OPN). Research, Development, Test and Evaluation, Navy (RDT&EN) can be considered both an expense and investment appropriation because it is used to fund the

ongoing research of new items which will ultimately be produced as major end-items (investments).

b. Duration and Funding

(1) Obligational Availability. As discussed above, appropriations have a specific obligational availability period. The duration is normally consistent with the funding characteristics of the appropriation. Expense appropriations are typically used to finance ongoing operations (e.g., payroll, parts, and provisions). As annual appropriations, they are funded "incrementally," or as needed each year. Investment appropriations are used to procure major end items or finance construction of weapons systems, ships, aircraft, and buildings. Investment funds are multi-year appropriations, which fully fund the individual investment programs for a finite period of time.

(2) Expenditure Availability. All appropriations have a two-year expenditure availability period following the obligational availability period when bills may come in and be paid. During this period no new obligations may be incurred; however, existing obligations may change due to factors which could not be predicted at the time of obligation (e.g., price changes or ordering errors). This could cause a difference between the original amount obligated and the actual expenditure.

c. Successor Account

An appropriation expires or "lapses" into a successor account at the end of its obligational and expenditure availability periods. The successor account is called the "M" account, and is a pool of funds by appropriation which have been transferred to the U.S. Treasury.

d. Terms

The understanding of budget terminology is important to the study of the budget process.

(1) Obligation. A legal reservation of a specified amount of funds for future payment for material or services.

(2) Expenditure. An outlay or actual disbursement of funds evidenced by a voucher, claim, or government check which is issued from the U.S. Treasury.

(3) Liquidation. The process by which the payment of a encumbrance, incurred as an obligation, becomes an expenditure.

e. Timing of an Appropriation

(1) Regular. A regular appropriation is passed at the beginning of the fiscal year. Theoretically, all appropriations (13 in total) are passed at the same time prior to the beginning of the fiscal year 1 October.

(2) Supplemental. A supplemental appropriation is passed during the fiscal year in response to unfunded

requirements, which for some reason could not be funded with the regular appropriation.

(3) Deficiency. A deficiency appropriation is passed after the end of the fiscal year in order to bring an expired appropriation back to a positive balance so that it can lapse.

f. Adjustment of an Appropriation

Funds can be transferred between appropriations or reprogrammed within an appropriation between programs. This action depends on provisions and statutory requirements which may limit the use of funds, policies, programs, and directives of the President, restraints expressed in appropriation committee reports, and the moral obligation to follow a specific course of action as a result of preliminary plans which supported the approved budget estimate [Ref. 2:p. 8-11].

Reprogramming may be carried out in response to unforeseen changes in the environment (e.g., pay raises, price changes, or new legislation which requires adjustment of funds). Reprogramming is carried out within an appropriation up to a specified dollar limit per activity group.

Transfers may be effected between appropriations up to certain dollar limits, but require approval by Congress.

Because appropriations are passed by Congress with specific purposes in mind, reprogramming and transfers require special justification and action to change the intentionally structured limitations.

B. BUDGET FORMULATION

The formulation of the DOD budget takes place during the last phase in the PPBS process. During this phase, programs compete for approval and implementation in the same way that plans compete for approval during the programming phase.

Budgeting is a means to communicate program requirements up and down the chain of command. The budget chain of command follows the lines of organizational responsibility, but is not necessarily the operational chain of command. The budget chain of command, from the top down, involves OMB, DOD/SECDEF, CNO/NAVCOMPT, major claimants, responsibility centers or field activities, and cost centers.

DOD uses budget calls and budget requests to process the information needed to determine program approval.

1. Budget Calls

Based on guidance from OMB and OSD, NAVCOMPT issues a budget call to major claimants, who issue them to responsibility centers at the field activity level. Internal to a responsibility center, a budget call may also

be issued to departments and cost centers (divisions). This is usually coordinated by the Comptroller staff.

The budget call from the claimant/sub-claimant communicates to the activity certain guidelines and constraints which the operating budget must consider. Control figures which may accompany the budget call indicate the approximate level of funding which will be available during the fiscal period under consideration. Similarly, the internal budget call from the commanding officer to the activity departments (cost centers) and divisions (sub-cost centers) communicates philosophy and guidance on the operation of the command. [Ref. 12:p. C-3]

The responsibility center's budget call is usually a command directive, signed by the commanding officer, containing his or her goals and priorities, along with planning and budget guidance. It should indicate control numbers for individual departments, and perhaps also historical data on command and department spending. Examples, as well as forms, and instructions on how to fill them out, should also be included.

To facilitate the process, a budget call should be timely, clear, comprehensive and simple. This will help ensure high quality responses. Once consolidated at the activity level, it will be forwarded to the major claimant or sub-claimant as a budget request, and further consolidated and reviewed up the budget chain of command.

2. Budget Requests

NAVCOMPT receives consolidated budget requests from the Navy's major claimants and conducts an informal review during which major claimants are asked for additional

justification or clarification on parts of their budget requests. After the informal review, NAVCOMPT "marks" (changes) the budget requests. Major claimants are allowed to challenge these changes during a "reclama" process. Following the reclamas, NAVCOMPT conducts a formal review of all budget request information and makes the final marks to the budgets. Major claimants prepare additional or revised budget exhibits for NAVCOMPT's final summary of the Navy budget, which is reviewed and approved by SECNAV and forwarded to SECDEF.

The purpose of NAVCOMPT's review is to ensure the Navy's budget contains only essential requirements, which are presented clearly and adequately justified. This process is called "scrubbing" the budget and aims at leaving no weak spots which could be targeted for reduction or deletion during subsequent review at the SECDEF, OMB, and congressional levels.

The budget request process spans three years: if the current fiscal year is 1988, it is referred to as the current or prior year; the second year, 1989, is called the apportionment year; and the third year, 1990, is the budget year.

3. Budget Justification

The budget call and request processes have three different results. Requirements may be funded, partially funded, or left unfunded. Unfunded requirements are the

difference between total resources needed for total program implementation, less resources received. Determination of what programs are funded may rest on the quality of the justification for the programs which make up the budget.

The justification process should seek to provide facts which will be the most useful in articulating and supporting program requirements. Supporting and backup materials may take the form of oral or graphic presentations, and may be called forth at each level of the budget review process.

Financial managers at every level are involved in detailed economic analysis during budget formulation in order to provide the most realistic data and convincing arguments in defense of Navy programs.

Because the head of the command must defend the budget to higher authority, and is in fact requesting the Secretary of the Navy to support the proposals before the Secretary of Defense and the Congress, the head requires that every proposal be supported by fact, and be consistent with the fiscal and program policies which have been received from higher authority. [Ref. 2:p. 7-8]

C. BUDGET EXECUTION

While budget formulation is the process of asking for funds, budget execution is the process of spending funds. Budget formulation takes place at the end of the PPBS cycle and lasts approximately 15 months. Budget execution takes place primarily at the field activity level and continues until all payments from the appropriation are made. This

may take up to ten years due to multi-year contract obligations.

Budget execution is the accomplishment of the plan, and the process established to achieve the most effective, efficient, and economical use of financial resources in carrying out the program for which funds were appropriated.

During periods of scarce funds, much attention is devoted to the execution process, wherein controls are used to monitor spending and ensure efficient use of tax dollars.

1. Funds Control

As funds are passed down from Congress for use by government agencies, they are controlled by processes which limit obligation and expenditure rates. These constraints apply to particular types of spending at the various organizational levels. Data required for control within approved limits is available through the various accounting and reporting systems.

a. Appropriation

The first control established to ensure proper use of funds is the appropriation act itself which establishes the dollar limitations for programs by appropriation. Each appropriation is assigned to an office for overall management (e.g., Assistant Secretary of the Navy for Research, Engineering and Systems (ASN(RE&S)) is assigned the RDT&E appropriation, and the CNO and CMC are responsible for the remaining Navy appropriations). CNO

assigns management responsibilities to cognizant headquarters offices (e.g., NAVAIR coordinates APN, NAVSEA coordinates SCN, Navy Facilities Engineering Command (NAVFAC) coordinates MCN).

b. Apportionment

Federal law requires that funds be so apportioned as to ensure the most effective use of appropriations and to prevent their over-obligation. Apportionment is determined by OMB and is the amount of obligations which may be incurred during a specified period. Annual appropriations are usually apportioned on a quarterly basis, and multi-year appropriations on an annual basis. In addition to authorizing rates of obligations, OMB uses the process as an instrument to implement national fiscal policy, review detailed program requirements, establish reserves, and effect savings. [Ref. 2]

c. Allocation

Allocation is a control internal to the Navy which ensures that appropriations are being passed down in accordance with congressional intent. It is a control on the total amount of funds which may be used for a particular budget activity during a year. Allocations represent the funds which are posted to the activity's control account in the official Navy accounting records and which are legally binding.

2. Expenditures

Obligations incurred during the obligational availability period of an appropriation result in expenditures or outlays. This may occur the year the funds are obligated, or over several years.

Expenditures represent the actual payment of funds from the U.S. Treasury and reflect actual performance of Navy programs. As such, expenditures are often compared and used as baselines for determining future funding levels. Therefore, it is important to monitor expenditures as they relate to expenditure limitations even though they are in some instances extremely difficult to control, especially in multi-year appropriations where it is difficult to predict future requirements.

3. Authorizations

Authorization to incur obligations and make expenditures against Navy appropriations is delegated down through the various administrative levels described above in the apportionment and allocation processes. Two types of authorizations are: Operating Budgets and Operating Targets.

a. Operating Budgets (OBs)

OBs authorize the use of O&M and RDT&E funds by echelons down to the field activity level. An OB is an estimate of the resources needed by an activity to sustain a year of operations. Approval is received on a Resource

Authorization (NAVCOMPT Form 2168-1) which provides, normally in quarterly increments, approved obligation and expense authority.

b. Operating Targets (OPTARs)

Smaller activities, and certain units of the Operating Forces, receive OPTARs. No centrally managed items are included in OPTARs (e.g., maintenance of real property, utilities, communications, and transportation). An OPTAR is an administrative expense limitation. Legal responsibility for over-obligation of an OPTAR rests with the issuing authority.

4. Performance

The budget is the instrument through which annual Navy program plans are developed, approved, funded, and controlled. As a management tool, it is a strong motivating force for the orderly execution of programs. It is a convenient device for reviewing program performance in relation to plans. [Ref. 2: p. 8-14]

During budget execution accounting reports provide performance information in various levels of detail. Examination of these data reveals progress in program implementation and remaining funds available in relation unexecuted programs. This analysis is valuable to managers for determining whether funds must be shifted between programs and also in planning for future budget estimates. Throughout the fiscal year, budget execution leaves an audit trail with comparable planned and actual data.

a. Beginning Fiscal Year

At the responsibility center level, the field activity receives a funding document, NAVCOMPT 2168-1, which contains new obligational authority. The remarks section may delineate "fences," which are restrictions set forth by the issuing authority regarding spending floors and ceilings for certain categories. Warnings are also included concerning Title 31 over-obligation and cross-use of appropriations.

Upon receipt of new obligational authority, the amount is posted to the activity's account. This is done through the activity's authorized accounting activity. Internally, the responsibility center begins the execution of its annual spending plan. The spending plan is the activity's documented budget execution plan detailing how funds will be spent. The spending plan will also address requirements which remain unfunded, and maintain a strategy for utilizing additional obligational authority should it become available.

The responsibility center not only receives funds at the beginning of the fiscal year, but also may receive them at the beginning of each quarter, during quarters, or near the end of the fiscal year. Obligational authority may also be downwardly adjusted at any time.

b. Mid-Year Review

Mid-Year Review is a formal review of budget execution by the whole budget chain of command from January through July or August each year. Activities submit actual performance data for a six-month period which is used to evaluate program status in relation to budget and execution plans. This review process formalizes an opportunity to address and correct any imbalances which may have occurred over the previous six months, including requests for additional funds. Unfunded requirements may also be funded at this time or current budget allocations reduced. The goal of Mid-Year Review is to promote efficiency in program execution.

c. End of Fiscal Year

At the end of the fiscal year (mid-summer) activities issue internal cut-off dates for procurement of items from the supply system. Responsibility centers pool remaining funds and submit a wishlist to the commanding officer via the comptroller. The commanding officer will decide on the use of the remaining funds, and the activity will attempt to spend down to a given level, typically 99.6 percent.

5. Continuing Resolution

If a fiscal year begins without enactment of the appropriations by Congress, the passage of a continuing resolution normally provides sufficient funds to continue

ongoing activities. It is important to understand that there are limitations and restrictions inherent in this kind of funding authority. No new activities can be started, and activities must continue to operate at previous levels until Congress can complete deliberation and action on the appropriations.

V. ACCOUNTING

A. INTRODUCTION

1. Definition

Accounting is an information system. Although it cannot provide all the information needed to manage an organization, it provides reliable past and present data concerning the economic resources controlled by an organization. By analyzing this accounting information, managers make decisions about future resource allocations.

Accounting consists of the collection and systematic recording of financial data. The data are stored in ledger accounts according to specified categories, processed, and reported to users manually or electronically using computers.

Accounting information consists of different types of data (e.g., dollar values, hours worked, standards of performance, and material amounts). Sources of data may include employee time cards, job orders, contracts, purchase orders, shipping documents, and invoices. [Ref. 11]

2. Accountability and Fiduciary Responsibility

The essence of accounting is "accountability." By providing the framework for assigning responsibility to those who manage programs, according to each area,

accounting is able to show who is accountable to whom and for how much.

In Government, accountability runs to the President, the Congress, and to the public. It is through the budget, accounting, and financial reporting that private citizens obtain knowledge of the receipts and expenditures of public funds and that the managers of Executive agencies obtain the financial information necessary to their undertakings. [Ref. 2:p. 10-3]

Accountability starts at the beginning of the process. Funds made available for public use through taxation provide the necessary revenue for Congress's annual spending plan, the federal budget. Congress and the President are empowered by the Constitution to provide for the common defense. The authority to use the funds to accomplish defense objectives is passed down from Congress and the President to OMB, OSD, and the military departments. With authority to carry out defense programs also goes accountability and fiduciary responsibility for management of the funding.

OMB funds federal agencies on a quarterly basis through the apportionment process, which limits the amount of funds the Navy receives. The Comptroller of the Navy is responsible for the administration of apportioned funds, and allocates them to various headquarters commands, offices, and responsible bureaus. Throughout the process, each level is accountable through the various management control functions in appropriation, apportionment and allotment phases, for the prudent management of public funds.

3. Legislative History

The public has always demanded strict accountability from government officials regarding the use of tax dollars. In order to ensure fiscal control, numerous laws and regulations have come into being.

a. The Budget and Accounting Act of 1921

The Budget and Accounting Act of 1921 established the federal budgeting system under the Department of the Treasury and provided for independent audit of government accounts by the newly created Government Accounting Office (GAO). The head of GAO, the Comptroller General of the United States, was given overall responsibility for developing government accounting systems; conducting expenditure analyses; maintaining ledger accounts; investigation of receipt, disbursement, and application of public funds; examination of books, documents, papers, and records of financial transactions; audits; and the settlement of accounts. [Ref. 2]

b. Joint Financial Management Improvement Program

Following World Wars I and II, the role of the federal government expanded considerably and Congress authorized the establishment of numerous new government agencies. In order to accommodate this expansion, the government shifted from centralized management to decentralized management. Governmental accounting systems needed to respond to this change. The Joint Financial

Management Improvement Program was established to consider modifications which would meet the needs of the changing accounting environment. [Ref. 2]

c. National Security Act Amendments of 1949

The objectives of this Act were to: provide reliable fiscal data in support of budget preparations; provide a medium for control over obligations and expenditures; provide the accounting tools for measuring the effectiveness and economy of performance; promote control over and reduce operating costs; and establish accountability. [Ref. 2]

d. Budget and Accounting Procedures Act of 1950

The Budget and Accounting Procedures Act was the first legislation to place responsibility for establishing and maintaining an adequate accounting system with each Executive agency. The Act was not implemented with the intention of standardizing government accounting systems; rather, it required that agencies comply with GAO accounting principals and guidelines. [Ref. 2]

e. Public Law 84-863

This law required the use of cost-based budgets. Cost based budgets emphasize the actual cost of executing the federal budget. The law also stressed the need for consistency in accounting and budget classifications. [Ref. 2]

B. NAVY ACCOUNTING

1. Background

a. Purpose

Navy accounting has three basic objectives: to report the use of funds under the various appropriations granted to it by Congress, to control obligations and expenditures to prevent their exceeding the limitations imposed by Congress (and those established by fund administrators at various levels), and to provide cost analyses [Ref. 2].

b. Control

The issue of control is central to the purpose of accounting, and ties in to the concept of accountability. "It is the responsibility of management to devise a system of financial control which will provide information upon which prudent financial management may be based" [Ref. 2:p. 10-7]. Beginning with appropriation process, from Congress to the President, to the Treasury for the appropriation warrant, and then to the Comptroller General for counter-signature, great care is taken to ensure the appropriated funds are adequately controlled. The apportionment process whereby OMB releases funds in quarterly increments, as well as continuous monitoring of budget execution at all levels, reenforce the idea of strict management control.

Military departments are required by law to have a system of control to prevent obligations and expenditures

from exceeding amounts appropriated and apportioned. Major claimants maintain control of allocations from NAVCOMPT, while allotment and operating budget holders perform the day to day detailed accounting functions under their own set of budgetary controls. Controls are pervasive in the accounting system to ensure that public funds are spent as intended by legislation.

2. Navy Accountants

The central accounting office for DON is under the direction of the Comptroller of the Navy. It is physically performed at the Navy Accounting and Finance Center, Washington, D.C. It uses the double entry accounting system which records transactions in terms of debits and credits, so that each transaction affects two accounts. It manages the Navy's master control accounts and the appropriation cash accounts.

The accounting and disbursing for field level, operating forces, and the major claimant level is performed by Financial Information Processing Centers (FIPCs). A major reorganization of the Navy's accounting and disbursing system is presently nearing completion. This will be discussed separately at the end of this chapter.

The FIPC is usually located within a Naval Supply Center, Navy Regional Finance Center, or Fleet Accounting and Disbursing Center. Its role is to provide accounting services to user commands, maintain the financial data base

which constitutes the legal or official accounting records, and provide periodic reports to commands and claimants.

In cases where an activity does not have the capability to perform its own accounting function, a FIPC is assigned to provide accounting services, according to established NAVCOMPT provisions. Under these circumstances, the FIPC's responsibility extends only to accounting and related disbursing areas, not performance of other comptrollership functions.

3. Accounting Methods

a. Obligational Accounting

Navy accounting differs from public sector accounting in that the Navy is required to report progress in the spending of appropriated funds. To do this it uses an obligational accounting method, which tracks commitments, obligations and expenditures by fiscal year against the appropriations. Using this method, an obligation is created and recorded when a specific dollar amount is committed to acquire goods and services. Obligational accounting is concerned with tracking the progress of spending resources.

b. Accrual Accounting

Accrual accounting deals with the timing of recognition of expenses and revenues. The public sector uses this system to recognize the cost of an item when it is received and presumably used. Accrual accounting reflects a truer picture of the organization's financial condition by

showing what funds were actually needed during the period. The Navy uses both methods, but has begun to stress the accrual method in order to focus on the actual costs of operations and promote economies and efficiencies.

The accrual basis of accounting should be used to the extent that results will be significantly improved. . . . Use of the accrual basis should increase the value of accounting to management and others by contributing to full disclosure; improving financial control over assets and liabilities; aiding in the development of cost accounting; providing more informative budget data; and furnishing more significant accounting data related to specific assignments of managerial responsibility. [Ref. 2:p. 10-8]

c. Cost Accounting

Cost accounting can be used with the obligational or accrual method. Cost accounting is a method for identifying costs associated with the achievement of a specific purpose. A segment of the Navy accounting spread is reserved for the cost account code, to permit the accounting system to break down costs to a low level. Cost accounting is an added layer of bookkeeping which contains more refined accounting information. It reflects a level of detail which facilitates measurement of unit costs and the determination of direct material, direct labor, and overhead costs. This information is useful to managers at all levels of the organization.

4. Levels of Accounting

Accounting for funds and assets in the Navy entails activities at two distinct levels: headquarters (office/bureau/command) level and field activity level.

Both levels have unique informational needs. The headquarters level generally requires summarized data, while the field activity needs more detailed data.

The Navy is comprised of 27 major commands whose functional areas of responsibilities are very different in nature and complexity. Therefore, the resulting accounting support requirements vary widely. When designing an accounting system, the design must take into account the various needs and levels of system users to ensure their informational needs can be met, and that the levels are able to share information.

5. Accounting Classification Structure

Accounting is the systematic collection of data into a structure which allows retrieval and processing of financial information. The Navy Accounting and Finance Center, Washington, D.C. manages the central accounts: the master control accounts and the appropriation cash accounts.

a. Master Control Accounts

The master control accounts are used to reflect the current status of appropriations and funds available for disbursements and collections. They are grouped according to nine traditional accounting categories (e.g., cash, accounts receivable, stores, and property investments), as opposed to appropriation categories (e.g., operations and maintenance, research and development, and shipbuilding and conversion).

The master control accounts are composed of more detailed trial balance accounts. Trial balance accounts are control accounts which summarize transactions from still more detailed accounts at the activity levels. This information is rolled up by the FIPC system into a closing trial balance of accounts for the DON, which describes the Navy's financial condition in terms of assets, liabilities and investment. [Ref. 2]

b. Appropriation Cash Accounts

The appropriation cash accounts record appropriation warrants from the Treasury, and collect expenditure data for the individual appropriation accounts. These are subsidiary accounts of the master control accounts.

c. Accounting Classifications

In order to provide decision makers with specific information regarding the purposes and uses of funds, accounting information is broken down into discrete categories using a classification system. The Navy uses an alphabetic and numeric code system to precisely identify the purpose for which funds are programmed and spent. These accounting classifications are used on all purchase requests, and resulting obligation and expenditure documents. As an alpha-numeric code, it is amenable to computer manipulation, which allows rapid collection, classification, summary and reporting of the data.

The Navy accounting classification code is 45 digits. It includes the following 12 categories of information: military department, fiscal year, appropriation, subhead, object class, bureau control number/budget project, allotment, suballotment, authorization accounting activity, transaction type, property accounting activity, and cost code. Each category specifies some particular piece of information of interest to an accounting level within the government. An example of an accounting classification is:

17 9 1804 2410 26 19 444 E 000444 2D 000444 432918765632.

d. Activity Classifications

For accounting purposes, activities are classified as shore (field) or operating activities. Shore activities are further broken down into the following categories: industrial, modified industrial, or nonindustrial. Operating activities are funded out of monies provided to the Type Commanders to support their units. Industrial activities are financed with initial working capital funds, and nonindustrial activities are financed by funds granted to the commanding officers from funds appropriated for the support of the command's mission.

C. NAVY ACCOUNTING SYSTEMS

1. Introduction

The Navy uses a number of different accounting systems because the financial support requirements of 27

major commands varies widely. The accounting systems are particularly complex because they must meet not only diverse operational and management information needs, but also certain external requirements. [Ref. 16] A brief overview of the most prominent systems is presented in this section.

2. Integrated Disbursing and Accounting (IDA) System

a. Background

Disbursing is integral to accounting because it is the process by which goods and services are paid for and reflected in the accounting records. The Navy has a special system designed to ensure prompt, convenient, and accurate disbursing services to Navy employees and suppliers.

The Navy pays its bills through its various disbursing offices: the Navy regional finance centers, Fleet Accounting and Disbursing Centers and other disbursing components of Naval activities ashore and afloat. These paying activities receive and review invoices, prepare vouchers for payment, and authorize disbursement of funds.

b. Financial Information Processing System (FIPS)

The Navy has undertaken a new concept within the IDA system to integrate the disbursing and accounting functions across the various financial management organizations in the Navy. The short title of this approach is IDAFIPS, and the goal is to improve the timeliness and accuracy of reporting financial data within the Navy.

Disbursing and accounting will not be performed as separate functions in separate locations, but rather within the same FIPC. FIPCs combine the former Authorization Accounting Activity (AAA) functions with the Regional Finance Center functions. Eighty-eight AAAs and Five regional finance centers will be combined to make 15 FIPCs.

IDAFIPS includes four major areas of effort: IDAFMS (Financial Management System), IDA OPFORCES (Operating Forces), IDACAM (Major Claimants), and IDAFRS (Financial Reporting System).

(1) IDAFMS. IDAFMS is the system for field level accounting. There are five major systems. Its objective is an integrated field level accounting and disbursing system which has as its basis a single data base. The system will be implemented on a dedicated suite of hardware within a dedicated financial information processing network.

(2) IDA OPFORCES. IDA OPFORCES is the accounting system for the operating forces and is performed by the Fleet Accounting and Disbursing Centers (FAADCs). Its objective is to improve fleet accounting methodology, create a single system, eliminate duplicity in accounting requirements and reporting, and provide fleet users with on-line update, modification and access capability. It will be used by active fleet ships and staffs, reserve training

vessels, fleet aviation squadrons, construction battalions, oceanographic units, and ships intermediate maintenance activities.

(3) IDACAM. IDACAM is designed for claimant level accounting. Data from IDAFMS and IDA OPFORCES will be rolled up into IDACAM using revised accounting classification codes.

(4) IDAFRS. IDAFRS is the upward financial reporting system, which is the follow-on to IDAFMS. It represents an interim standard and is currently being developed and implemented.

The FIPS system improves accounting in that it allows more rapid and accurate financial data processing. It eliminates the need for memorandum accounting records since it is an on-line system which can reflect full commitment accounting and provide on-line updates and funds availability checks.

3. Resource Management System (RMS) Accounting

RMS is a system to promote better management. It was implemented in DOD in 1966, and was designed to provide managers with improved means of obtaining and controlling the resources required to accomplish their missions. RMS focused on defense goals and outputs, and emphasized managers' responsibility for effective and efficient use of resources. The tools of the manager became the

organization's management control system, expense operating budget, and actual versus planned performance data.

RMS significantly affects accounting procedures. Some of the changes were: all DOD activities were to use operating budgets to obtain, manage and account for resources; current expense items were to be funded from the annual O&M appropriations, and long-lived items were to be funded from investment appropriations; a uniform chart of operating expense accounts was developed, which fit into the FYDP program element scheme; activities were to be charged with all their consumable resources at the time of consumption rather than when purchased or when paid; institutionalization of accrual accounting; and costs were to be accumulated using new RMS codes for "activity groups" and "sub-activity groups" (AG/SAGs), "cost account/fund codes," and "elements of expense." [Ref. 2]

"RMS is, among other things, a cost accounting system" [Ref. 13:p. 105]. RMS established an additional layer of accounting classifications called the uniform chart of accounts. By assigning transactions detailed cost account codes (e.g., AG/SAGs, cost account/fund codes, and elements of expense), operations could be analyzed according to planned and actual expenditures. From this variances could be identified and researched. RMS accounting uses both obligational and accrual accounting methods.

4. Working Capital Funds Accounting

Working capital funds are "revolving" funds (i.e., they reimburse themselves through manufacture or resale of goods and services). The purpose of working capital funds is to provide a means for businesslike management and financing of operations in industrial-type and commercial-type activities, and of common-use standard-stock items. Working capital funds allow materials to be available before dollars are actually appropriated, which gives DOD the flexibility to order in economic quantities and take supplier discounts.

a. Navy Stock Fund (NSF)

The purpose of NSF is to finance Navy inventories. Inventories provide material support in the form of repair parts, consumable supplies, fuel, food, clothing, forms and publications, and ammunition. Customer reimbursements from the fleet, shore establishments, and non-Navy activities, maintain what is called the "corpus," or body of the fund. Theoretically, a working capital fund is self-sustaining and requires no annual appropriation; however, NSF occasionally receives a direct injection from Congress as a result of newly acquired systems, new stocking policy, or an increase in wartime spares. It is also reimbursed from customers through a surcharge.

The fund is protected from loss of material purchasing power through the application of a surcharge to material inventories, sufficient to cover the cost of transportation to first point of destination, minor

repairs. . . . Issue prices are revised annually be the inventory control point. . . . [Ref. 2:p. 11-36]

There are two accounts within the NSF: the appropriation purchases account (APA), and the Navy stock account (NSA). The APA uses investment appropriations to procure major equipment or systems (e.g., engines and missile launchers). NSA uses the expense appropriations to buy consumable items (e.g., repair parts and office supplies).

NSF is not totally self-sustaining due to certain costs of operations, or so-called "leakage." Expenses to the fund include: inflation; transportation costs from vendor to the stock point, and stock point to stock point; obsolescence of materials in stock due to changes in technology, expiration of shelf-life, deactivization, or no demand; and inventory loss, whether through theft, damage, or misplacement.

To ensure the integrity of assets, the NSF accounting system is designed to provide status on all assets, liabilities, and working capital. The fund is maintained through a system of credits and debits.

b. Navy Industrial Fund (NIF)

DOD operates five industrial funds, one for each military department and one for DOD. The Navy's industrial fund is the largest and supports Naval shipyards, air rework facilities, ordnance depots, public works centers, and the Military Sealift Command (MSC). [Ref. 13]

NIF finances industrial- and commercial-type activities, much the same as NSF finances inventories. NIF activities usually produce finished products, or provide goods and services to other activities.

NIF activities are reimbursed for the cost of their work. Expenses equal customer payments; therefore it operates as a non-profit organization. In the case of the industrially funded activities, there is no leakage since all costs are passed to the customer.

Accounting classifications peculiar to NIF activities are direct and indirect costs. Direct costs can easily be identified with the finished product (e.g., sheet metal, engine parts, and pipes). Indirect costs are more difficult to relate to the finished product (e.g., costs for supervision of laborers, clerical staff, spoilage, and set-up time). General-administrative (G&A) overhead is also distributed over all projects using standard, stabilized overhead rates.

Budgeting at NIF activities presents some problems because of cost fluctuations and the nature of reimbursable work requests. Work is performed upon request and cannot easily be predicted. Each NIF activity must have a special cost accounting system which accommodates its operations specifically.

The purpose of working capital funds is to promote a buyer-seller relationship between an activity and

military purchasers, and to make practical common use of available facilities and inventories to enhance efficiency in DOD resource management.

5. Nonappropriated Funds Accounting

Nonappropriated funds exist outside the congressional appropriation process and are not accounted for by the U.S. Treasury. They are generated within activities such as the Navy Exchange system, officers' messes, enlisted clubs, civilian cafeterias, and special services programs. The purpose of nonappropriated funds is to offset the cost of activities which contribute to the morale, welfare, and recreation (MWR) of military and civilian personnel.

MWR accounting is governed by a strict set of rules relating to the amount of support MWR activities are permitted to receive from local activities which are funded with appropriated funds.

Officers who have cognizance over nonappropriated funds are responsible for ensuring that the funds are used for appropriated purposes, and that appropriated funds are not used for nonappropriated purposes.

6. Memorandum Accounting

The accounting systems which individual activities develop and maintain, in addition to the official accounting records held at the FIPC, are called memorandum accounting records. These are internal records for use by activity

managers. Memorandum records support the official records, but are not used for official purposes (e.g., auditing, fiscal year-end spend-down management, or close-out).

D. CONTROL OF NAVY ACCOUNTING SYSTEMS

The Comptroller of the Navy, in addition to his duties as the advisor to SECNAV on all financial matters, is also responsible for the overall coordination of the disciplines used to manage and control DON management information (e.g., reports management, acquisition management, systems control, data management, and management of automated data systems).

1. Proliferation of Accounting Systems

By 1984 there were 182 existing and planned Navy/Marine Corps accounting support systems, many of which are incompatible with one another [Ref. 13]. The problem of incompatibility in accounting systems has arisen due the uncontrolled development of various system architectures, hardware, and software. Faced with numerous instances of poor fiduciary control, mismanaged financial systems, and the need to provide sound information to decision makers in a time of decreasing resources and increasing demands, the Comptroller of the Navy devised a plan to address the problem.

2. A Strategy for Streamlining

In August 1985, DON implemented a coordinated approach to the planning, development, operation, review, and evaluation of Navy accounting systems. The Comptroller

of the Navy issued Navy Instruction 7000.39B, subject: Department of the Navy Strategic Financial Management Master Plan (SFMMP), which addressed the proliferation of these different financial management systems. "This plan represents the consolidation of DON mission derived goals, objectives, strategies, and action plans to implement new financial management projects and ideas and the continuation of existing programs." [Ref. 16:p. 51]

The SFMMP is an effort to ensure that developmental efforts in the area of accounting systems lead to a single integrated financial management system that is in compliance with applicable statutes and regulations. The SFMMP seeks to provide a means to review and correct deficiencies in accounting systems, and to consider a consolidation strategy. By 1990, the plan shows a decrease in accounting systems from 182 to 66 [Ref. 13]. Improvement in financial management systems will provide Navy decision makers with better information for effective and efficient management.

VI. CONTRACTING

A. GENERAL

1. Definition

The term "acquisition" describes the broad management function involved in the process of acquiring goods and services. Contracting is a subset of acquisition and consists of the skills used, and the activities performed, by the federal government in order to acquire goods and services from industry. [Ref. 12]

Contracting with commercial sources is the government's way of accomplishing a task for which it has no technical expertise or support. Defense contracting is the largest business enterprise in the world with \$170 billion dollars in annual purchases and 15 million separate contract actions [Ref. 5].

DOD makes only a small percentage of its equipment. It depends primarily on the nation's industrial companies to develop its weapons and to manufacture everything from belt buckles to aircraft carriers. In general, these companies do not work solely on defense contracts. Most of the top 50 defense contractors also engage in substantial commercial production. . . . In this way, the technological base developed for commercial products can be effectively applied to military products, and vice versa. [Ref. 5:p. 43]

2. Background

The line chain of command in the Navy is responsible for carrying out the Navy's mission. As it develops plans and programs to carry out Navy objectives, it continuously

reassesses its capabilities for carrying out the mission. During the course of this analysis the line authority recognizes and expresses requirements for new or upgraded weapon systems, buildings, supply parts, and other items. The decision to procure new requirements is considered within the systematic structure of Navy's acquisition process.

The acquisition process uses milestone decision points and phases to explore, screen, and document the need for new requirements. The acquisition process for a major weapon system has six milestone decision points with the following phases: mission area analysis, concept exploration, development and validation, full scale development, production and deployment, and operations [Ref. 17]. At each milestone decision point the documentation and results of the previous phase are reviewed, and a determination is made whether or not to continue the acquisition process. During the concept exploration, development, and production phases, private industry is often needed to manufacture part or all of an item or system which the government cannot provide. (For example, during the early stages of the acquisition of an aircraft, a prototype will be needed which the government does not have the capability to manufacture.) Contractor participation in government endeavors calls for the establishment of an official contractual relationship and contract document.

3. What Constitutes a Contract

a. Conditions

An agreement is not a contract unless it is enforceable by law, binding to both parties, and fulfills certain promises. In order for a government contract to exist, six conditions must be met: both parties must be competent (i.e., in full possession of intellectual and physical faculties); the contract must clearly express the terms and conditions of the promise; each party must voluntarily offer something of value for consideration to the other party; an offer must be made by the seller; the activity detailed in the contract must be legal; and the government must be in the position to accept an offer (i.e., not in a position to demand compliance, as in the case of imminent domain).

b. Sub-contractors

Government contracts do not extend to sub-contractors. Sub-contractors do not have access to the government to complain or protest government actions.

4. Laws and Regulations

The Armed Services Procurement Act established the Armed Services Procurement Regulation (ASPR) in 1947. The ASPR governed military procurement and the Federal Procurement Regulation (FPR) governed non-defense procurement. In 1976 the ASPR was changed to the Defense Acquisition Regulation (DAR) which set forth the principles,

policies, and procedures on a broad range of subjects involved in acquisition and contracting (e.g., methods of procurement, contract clauses, patents, contract termination, labor, quality assurance, and cost accounting). In 1984, the DAR and FPR were consolidated into one document by the Office of Federal Procurement Policy. The document is called the Federal Acquisition Regulation (FAR). From the FAR, DOD created the Defense Federal Acquisition Regulation (DFAR) and the Navy created the Navy Acquisition Regulation Supplement (NARSUP).

Government contracting is also effected by a number of laws designed to ensure the integrity of the contracting process and to accomplish social objectives. Some of these laws include: Public Law 87-653, the Truth in Negotiations and Conflict-of-Interest statutes; Public Law 97-177, the Prompt Payment Act; the Small Business Act of 1963; and Public Law 95-507, Subcontracting with Small and Minority Business Firms.

B. CONTRACTING PROCESS

1. Players

After a requirement is approved through the acquisition system, contracting for the item may begin. The Navy's contracting process is carried out by three types of contracting officers: procurement, administrative, and termination contracting officers.

a. Procurement Contracting Officer (PCO)

The PCO has overall responsibility for the contract and is usually located at the Program Management Office (PMO) at the headquarters or systems command. He or she is primarily involved in the activities prior to award of the contract.

b. Administrative Contracting Officer (ACO)

The ACO is delegated by the PCO to monitor contractor performance and is responsible for quality assurance, management of government-furnished equipment and materials, change control, and sub-contractor management. If the size and duration of the contract warrant it, the ACO's office may be located at the contractor's place of business.

c. Termination Contracting Officer (TCO)

The TCO is responsible for all actions leading to the settlement of terminated contracts.

In addition to the contracting officers, the Defense Contract Audit Agency (DCAA), who works for the Assistant Secretary of Defense (Comptroller), plays a significant role in the contracting process. DCAA is responsible for auditing contractors' books and accounting records, and determining the acceptability/allowability of incurred and estimated costs.

2. Phases

The basic steps involved in the contracting process include: planning; solicitation; source evaluation, negotiation, and selection; award; and contract administration.

a. Planning

During this phase, the government is involved in the development of a strategy for procurement, including determination of a method, appropriate contract type, development of a solicitation document and draft request for procurement (RFP), evaluation of specifications for bidding, and development of source selection evaluation criteria.

b. Solicitation

During solicitation the government makes industry aware of the requirement and issues a document soliciting prospective companies to bid, or draw up a proposal in response. The solicitation document may take the form of an "Invitation for Bid" (IFB) or a "Request for Procurement" (RFP). This will depend on whether contractor selection will be based on the evaluation of sealed bids or a negotiation process. (This will be discussed further below.)

c. Source Evaluation, Negotiation and Selection

If the contracting method is sealed bid, the contractor is selected by examination and evaluation of the bids received in response to the government's IFB. The

evaluation process applies predefined source selection criteria to determine the lowest responsive and responsible bidder. If the negotiation method is used, selection is made based on analysis of the contractors' responses to the RFP, specifically on technical aspects, cost and price structure, and the delivery schedule.

d. Award

Contract award is the official recognition of the contractor selected to fulfill the contract requirement.

e. Contract Administration

Administration includes all activities after award and before termination of the contract. Much of contract administration involves change proposals and amendments to the contract.

C. CONTRACTING METHODS

As discussed briefly above, DOD uses two methods for contracting: sealed bid and negotiated proposal. Neither method is preferred as long as full and open competition exists between contractors.

1. Sealed Bid

The sealed bid method is used under the following conditions: there is sufficient time to perform the advertising procedures; contract specifications are explicit, complete, and realistic; the basis for award can be price alone; more than one bid is expected; and

discussion is not necessary between parties to fulfill the contract.

2. Negotiation

The negotiation method is used if the criteria for the sealed bid do not apply. "In the negotiation method, the contractor must submit cost or pricing data which are used by contracting officers in negotiating contract prices, terms and conditions" [Ref. 12:p. D-53]. If there is only one source to fulfill the requirement, the negotiation method must be used. A sole source selection can be made, but a decision to use sole source must be backed up with ample justification prior to approval.

D. TYPES OF CONTRACTS

The type of contract used depends on the type of procurement desired. To fit the different kinds of items which the government may need to procure from private industry, the following categories of contracts apply.

1. Categories of Contracts

The two major categories of contracts are fixed-price type contracts and cost reimbursement type contracts.

a. Fixed-price

Fixed-price contracts specify a cost ceiling. This protects the government against cost-overruns. The fixed-price contracts specify a deliverable and are usually used for production contracts. Because of the uncertainties inherent in the environment surrounding research and

development, and the difficulty in arriving at good cost estimates, fixed-price contracts are generally not appropriate.

Fixed-price contracts require the contractor to meet requirements within the agreed upon price and motivate him to work efficiently. This type is generally used when the contract requirement is relatively simple and clear. The types of fixed-price contracts are: firm fixed price and fixed-price with an economic adjustment. [Ref. 17]

b. Cost Reimbursement

The ceiling on a cost reimbursement type contract is a non-binding limitation on funds. The deliverable is the contractor's "best effort." These contracts are suitable for use in the case of research and development contracts because they afford flexibility in an uncertain environment. The types of cost reimbursement contracts are: cost plus fixed fee, cost plus award fee, and cost plus incentive fee. [Ref. 17]

Other types of contracts (or agreements to contracts) include: letter contracts, basic agreements, basic ordering agreements, and blanket purchase agreements.

2. Considerations

The following factors bear consideration when determining the type of contract to be used: complexity of the item or service being contracted for; urgency of the requirement; period of contract performance and the length

of the production run; degree of competition present; difficulty of estimating performance costs; availability of comparative cost data; prior experience with the contractor; extent of subcontracting anticipated; risk-profit relationship; benefits of incentives; technical capability and financial responsibility of contractor; adequacy of contractor's accounting system; and the administrative costs to both parties.

E. COMPETITION

In 1976 OMB issued the basic policy document for federal acquisition in the form of OMB Circular A-109. OMB Circular A-109, and the DOD and Navy directives which implemented its policy, emphasized the use of competition in federal procurement to promote economy and efficiency [Ref. 18]. Each federal agency was directed to appoint a Competition Advocate to ensure the policy was being carried out.

The guidance specified two types of competition: design and production. Design competition assists the government in arriving at the most promising design ideas, while production competition results in lower unit costs, improved quality, and fortification of the nation's industrial base.

In 1985 the concept of competition took the form of legislation in the Competition in Contracting Act (CICA). The Act required competition in every phase of the acquisition and contracting process as a means to improve economy and efficiency. [Ref. 17]

VII. AUDITING

A. INTRODUCTION

1. Purpose

Auditing is a management tool designed to identify deficiencies or undesirable conditions in an organization. Auditing provides objective and constructive analysis, appraisals, recommendations and comments to help management take the corrective actions required to improve organizational efficiency and effectiveness.

2. Background

Government agencies are accustomed to audits designed to ensure the proper use of tax dollars; however, in the last 30 years there has been increased emphasis on the use of auditing internal to government to promote economy and efficiency.

Public Law 81-216 required the establishment of internal auditing within DOD and placed responsibility for the internal audit function under the Assistant Secretary of Defense (Comptroller). The law also made the military services responsible for internal audit of their respective departments. [Ref. 2]

3. Internal versus External Auditing

Internal auditing is the effort of an organization to improve efficiency and ensure compliance with relevant

directives through analysis of its own operations. External auditing is the effort of an organization to examine the accounting, financial, and related operations, and to appraise the manner in which another agency or activity discharges its financial responsibilities. The difference between internal and external auditing depends on the relationship of the auditor and activity being audited. As an example, the internal auditor for the Navy as a whole is the Naval Audit Service, while GAO is an external auditor to the Navy. The Naval Audit Service is an external auditor to a particular Navy command (e.g., Naval Air Station, Norfolk has its own internal audit group within its organization).

4. Types of Audits

There are two types of activity audits: continuous and periodic.

a. Continuous

A continuous audit is performed by a staff of auditors who are resident at the activity. They do not belong organizationally to the activity; rather, they are attached to the originating audit agency. The continuous audit cycles through various functional areas of a command, and over a period of time, will examine and evaluate all the functions of the organization (e.g., administration, operations, supply, and contracting).

b. Periodic

A periodic audit is characterized by a visiting team of auditors who comes to the activity for a specified period of time to conduct a comprehensive evaluation of the command. A periodic audit is usually scheduled every three to five years, depending on the size and complexity of the organization.

B. APPROACH

1. Policy

Auditing used to focus exclusively on financial reports and data; however, with growing emphasis on optimizing the use of limited public resources, audits have begun to review and evaluate more than the financial side of an organization.

SECDEF's audit policy requires audits to focus on program and system areas where the most significant contributions to management can be made. The approach is to be mission-oriented, with concentration of effort where resulting improvement will most benefit mission performance.

2. Scope

The area encompassed by auditing is no longer limited to financial management. The scope of naval auditing includes: automatic data processing systems, communications, intelligence and security, maintenance, nonappropriated fund activities, personnel, procurement, property management, supply, and transportation.

Auditing attempts to take an integrated approach to the evaluation of an organization's activities. It includes all work and processes involved at the activity, with particular emphasis on the areas that perform its primary mission.

C. AUDIT LEVELS

Auditing plays an increasingly important role as a management tool. Auditing includes the performance of studies and analyses to develop possible methods of reducing operating costs through improved procedures, consolidation of activities and functions, and development of more meaningful management data [Ref. 2]. There are three general levels of auditing.

1. The Financial and Compliance Audit

This level of auditing concerns itself with the accuracy of financial reports and the proper conduct of the organization's financial practices. It also examines whether operations and reports comply with applicable laws and directives.

2. Economy and Efficiency Audit

The economy and efficiency audit considers the proper management of the organization's resources and examines the cause behind inefficiencies. The economy and efficiency audit may include an examination of the organizational structure, as well as a review of

administrative procedures and management information systems.

3. Program Results

The focus of this audit level is program results, specifically the benefits derived from implementation of the organization's programs. The audit measures accomplishment of objectives and goals against the costs of attaining them.

D. AUDITORS

The Budget and Accounting Procedures Act of 1950 required that each Executive agency establish and maintain accounting and internal control systems to provide control over, and accountability for, all of its assets.

1. Government Accounting Office (GAO)

As the Comptroller General of the United States, and an agent of Congress, GAO provides legislative controls over the receipt, disbursement, and application of tax dollars. GAO has the authority to examine and review accounting, financial, and related operations of government agencies.

GAO conducts special audits, surveys, and reviews at the request of congressional committees, individual members of the Congress, and on its own initiative. The focus of a GAO audit is the review of the entire control mechanism within an agency, including cross-service issues, and also a review of the agency's own internal auditor.

Management assistance provided in GAO audit findings complements the information provided by the Naval Audit

Service. GAO recommendations can result in changes in Naval audit programs or intensification of Navy audit effort in certain areas [Ref. 2].

2. Assistant DOD Inspector General (IG)

Established in 1976, the Assistant DOD IG Auditor performs audits for SECDEF, JCS, Unified and Specified Commands, and other defense agencies. This auditor provides quick response audits for SECDEF and relieves the load of other defense audit agencies. The focus of this audit is cross-service issues.

3. Defense Contracting Audit Agency (DCAA)

Under the authority of SECDEF, DCAA is responsible for all defense contract auditing and performance of contract audit and financial advisory services. DCAA assists in the achievement of improved contracting by providing better financial information in connection with the negotiation, administration, and settlement of contracts.

4. Naval Audit Service

Under the cognizance of SECDEF, the Auditor General of the Navy is responsible for the Naval Audit Service. The Auditor General coordinates audit matters with GAO, OSD, and other military departments, as well as the overall planning and direction of the Naval audit program. The Naval audit program is responsible for developing and promulgating policies and procedures for Navy audits. [Ref. 2]

a. Purpose

The purpose of the Naval Audit Service is to furnish objective analyses, appraisals, and recommendations concerning activities and programs; review compliance with Navy regulations and procedures; protect government interests; promote economy, effectiveness and efficiency; and perform a service to management.

b. Responsibilities

The Naval Audit Service is responsible for the examination, observation, review, and evaluation of organizational practices, and the report of findings and recommendations for corrective action. The Naval Audit Service provides an internal management consultant service to Navy activities.

c. Organization

Audits are accomplished through Naval Audit Service regional offices, each of which, under a Director, has audit responsibility within an assigned geographic area, including responsibility for branch-type operations at Naval Audit Sites. Regional Office Headquarters are located in Camden, NJ (Northeast Region), Washington, D.C. (Capitol Region), Norfolk, VA (Southeast Region), and San Diego, CA (Western Region). Naval Audit Offices are divisions of Regional Offices located at the following major Naval complexes: Charleston, SC; Pensacola, FL; San Francisco, CA; and Honolulu, HI. Naval Audit Sites are resident audit teams serving one or more activities of sufficient size to warrant continuous audit service. [Ref. 13:p. F-31]

d. Audit Cycle

The audit cycle begins with the audit plan. The Naval Audit Service team provides the plan to, and holds an

opening conference with, the commanding officer and other key command representatives to discuss the upcoming events.

The audit team conducts a pre-audit survey to collect audit materials and evidence. The team also conducts interviews and develops various organization charts to become familiar with the activity. After an on-site examination, the initial findings are discussed with department representatives. (Disagreements may be worked out during this phase.)

The audit team drafts an audit report and reviews it with command members. The report contains findings and recommendations. The report makes recommendations by appropriation and shows dollars to be saved by corrective action. The cost of the audit is also included. The audit ends with a closing conference.

The report may not be published for several weeks. Copies are distributed to the immediate superior in command (ISIC) of the audited activity, any activity to whom a recommendation is directed, and to the ISIC of any activity to whom a recommendation is directed. Information copies are forwarded to various interested commands.

The next phase is the implementation phase wherein the activity implements the recommendation of the Naval Audit Service team.

On-site follow-up reviews are performed to evaluate action taken by management to correct significant

weaknesses noted during the audit. Unresolved audit findings are tracked by the Naval Audit Service.

E. INTERNAL REVIEW

There is a difference between auditing and internal review. Auditing is the official examination or verification of an activity's financial operations by professional auditors. Auditors follow specific procedures and document the results for the official record.

Internal review differs from auditing in that it is an assessment of activity operations by local personnel and is a vehicle for local management to study the efficient use of its resources. Internal review is not necessarily conducted by auditors, and does not necessarily follow a specific set of guidelines. Although internal review was once part of the comptroller organization, it is now the responsibility of the management analysis branch.

Headquarters commands and major field activities are required to conduct continuous internal review. Lower organizational levels are encouraged to establish their own internal review staffs to act as "troubleshooters" and perform special analyses in comptroller as well as other areas. The internal review staff also assists in correcting deficiencies which are revealed by audits.

The governing directive for internal review in the Navy, SECNAVINST 7510.8, stresses that the internal review activity should avoid duplication of internal audit

functions which are assigned to the centralized audit agencies such as the Naval Audit Service and GAO. [Ref. 2]

VIII. CIVILIAN PERSONNEL

A. INTRODUCTION

1. Civil Service

The term civil service is used to describe service performed for the federal government by civilian employees who have competitively attained their positions and may gain tenure by continuing satisfactory performance.

Approximately one third of the DOD labor force (1 million) is composed of civil service personnel. Up to 80 percent of the Navy shore establishment O&M budget is dedicated to funding civilian payroll. From these numbers, it is clear that civilian personnel and payroll management is an important aspect of the duties of a military manager.

In the past, the civilian personnel system was managed according to the total number of employees. This is referred to as the end-strength figure. Each activity was limited by end-strength but not by personnel cost. In 1986, the Navy adopted a new personnel management concept called Management to Payroll. Management to Payroll changed the emphasis from numbers of employees to cost of the payroll. (Management to Payroll will be discussed in greater detail later in this chapter.)

2. System Structure

a. Office of Personnel Management

The Office of Personnel Management (OPM) administers the government's civil service system and is organizationally under the Office of Management and Budget (OMB). OPM was established in 1978 and replaced the original Civil Service Commission established by Congress in 1883. OPM issues the Federal Personnel Manual which promulgates civil service policy and administrative procedures, as well as information on employment rights.

b. Navy Civilian Personnel Command

The Navy issues its own personnel policy and procedure documents, the Navy Civilian Personnel Instructions. The Office for Civilian Personnel is under the Assistant Secretary of the Navy for Manpower, Reserve Affairs and Logistics. The Navy Civilian Personnel Command (NCPC) and its field divisions implement CNO guidance and policy. [Ref. 2]

The Civilian Personnel Office (CPO) is responsible for civil service management at the field level. The CPO works for one particular command. A Consolidated Civilian Personnel Office (CCPO) has responsibility if multiple commands are served. CPO responsibilities include: providing advice on personnel administration; coordinating recruiting, examination, and hiring; assisting in labor-management relations, including grievances, discipline and

equal employment opportunity; providing employee counseling; overseeing training, career development, performance evaluation, and retention; and providing assistance for position classification. [Ref. 2]

3. Employee Status

Employee status is assigned to civil service personnel according to four appointment categories: career conditional, career, temporary and term.

a. Career Conditional

The career conditional employee is an individual who has been newly hired into the civil service system. He or she is on probation for one year and may be discharged without cause. The employee remains in career conditional status for three years (including the probationary period) and may then be placed in career status. [Ref. 13]

b. Career

The employee with career status has been continuously employed for more than three years.

c. Temporary

The temporary appointment lasts less than one year and may be renewed annually. The purpose of this category is to meet short-term personnel needs.

d. Term

The term appointment is associated with a project which has finite duration, usually less than four years.

4. Pay Scales

The civil service system uses two pay scales to classify employees according to skills, responsibilities, occupation, and level of proficiency: general schedule and wage grade.

a. General Schedule (GS)

There are three classes of GS employees: Senior Executive Service, Merit Pay Supervisors and General Schedule Professional.

(1) Senior Executive Service (SES). SES civilians are high level, experienced employees designated executive service grades 1 through 6. This grading system replaced the original grades of GS-16 through GS-18.

(2) Merit Pay Supervisors (GM). GM civilians hold grades from GS-13 to GS-15 and are the federal government's professional people managers. GM employees have a maximum and minimum salary range. Promotions are based on merit.

(3) General Schedule (GS). Most general schedule employees are non-supervisory. GS employees use a 15 level rating system with ten steps per level (GS-1 through GS-15). These employees perform professional and clerical jobs. GS employees are paid and classified on a graded scale. Employees are graded in terms of the following criteria: increasing responsibility, education, technical proficiency and experience. [Ref. 12]

Employees within the general schedule system receive equal pay for equal work regardless of geographic location (e.g., the GS-7 employee in Washington, D.C. receives the same salary as the GS-7 employee in Arkansas). Salary levels are set annually by the President and Congress [Ref. 13].

b. Federal Wage System

The federal wage system has 15 levels with five pay steps within each level (i.e., WG-1 through WG-15). There are supervisory and non-supervisory wage positions. Wage Leaders and Wage Supervisors are the supervisory positions.

In contrast to the salaried general schedule employees, wage grade employees earn an hourly wage. The wage rates are determined by a geographical survey. Each region has a different pay scale that reflects average wages for comparable local industry jobs. Typical wage grade jobs include painters, laborers, truck drivers, supply clerks and electricians.

B. MANAGEMENT TO PAYROLL

In August 1986, SECNAV issued a new policy regarding the management of civilian personnel. As discussed earlier, the previous management system used end-strength numbers to manage the civilian personnel system. This method controlled the total number of employees but not the payroll cost.

1. Purpose

The purpose of Management to Payroll is to define DON policy and requirements on civilian position management and provide delegation of position classification authority to permit line managers to manage civilian resources consistent with associated budgetary funding levels. [Ref. 19]

2. Applicability

The new policy applies to all DON civilian positions under the general schedule and federal wage systems. It does not apply to the Senior Executive Service, general schedule grades above 15 or nonappropriated fund positions. [Ref. 19]

3. Discussion

Management to Payroll places greater authority, incentive, and flexibility for position classification and management programs on lower management levels. Its intent is to provide line managers with the authority to establish and classify civilian positions subject to civilian payroll resources.

Management to Payroll requires that payroll allocations be issued together with funds authorizations. Payroll allocations are formulated and treated like a cost element in the Planning, Programming, and Budgeting System (PPBS), (e.g., maintenance of real property, utilities and travel). [Ref. 19]

4. Policy

SECNAV's policy is designed to ensure that all positions and organizations are structured to achieve efficiency and economy in support of the mission of the organization. By delegating position classification authority and payroll funding allocation levels to more appropriate management levels, line managers have greater responsibility and accountability for managing civilian employment costs. This authority has been delegated to the CNO, CMC, Chief of Naval Research (CNR), and the Assistant for Administration Office of the Under Secretary of the Navy. Military and civilian heads of activities are encouraged to redelegate this authority to the lowest practicable level. The redelegation must include authority to classify positions as well as suballocation of payroll spending authority. [Ref. 19]

5. Civilian Compensation in the Budget

The amount of funding for civilian compensation is determined during PPBS and reflected in the federal budget as a cost element. This cost includes salaries, overtime, leave and awards. The budgeted amount is the baseline for the distribution of payroll allocations and the basis for management of civilian personnel. If end-strength controls are used, they will not be applied lower than the major claimant level.

6. Responsibilities

- a. The Assistant Secretary of the Navy (Manpower and Reserve Affairs)

The Assistant Secretary of the Navy for Manpower and Reserve Affairs is responsible for monitoring and analyzing formal evaluations and inspections on program effectiveness, providing data and evaluation results to top management, revocation of position classification authority when required, and adjudicating agency-level position classification appeals. [Ref. 19]

- b. NAVCOMPT

NAVCOMPT is responsible for providing major claimants with authorized levels of funding for civilian compensation. These payroll allocations may be suballocated to the lowest practicable activity level. NAVCOMPT also monitors payroll obligations to ensure compliance with authorized levels and takes corrective action as required. [Ref. 19]

- c. CNO, CMC, CNR and the Assistant for Administration

These parties are responsible for: ensuring that their organizations and subordinate organizations comply with policy and procedures; providing guidance and training on the Management to Payroll program; monitoring the quality and integrity of program execution; revoking position classification authority when warranted; ensuring command instructions are in conformance with policy; and

ensuring sufficient resources are available to support the program. [Ref. 19]

d. Major Claimants

Major claimants are responsible for allocating authorized levels of funding for civilian compensation by appropriation, monitoring payroll obligations, ensuring compliance with authorized levels and taking corrective action as necessary. [Ref. 19]

e. Military or Civilian Heads of Activities

Heads of activities are responsible for allocating authorized levels of funding for civilian compensation and monitoring actual payroll obligations. Heads of activities will also develop and implement a plan to delegate funding authority which provides for: the identification of organizational levels to which authorities will be delegated; identification of positions for which classification authority is delegated to line managers and supervisors; training of current and new managers and supervisors; resolving disagreements; and verification of the accuracy of position descriptions. [Ref. 19]

f. Civilian Personnel Office

The CPO is responsible for classifying positions for which authority has been delegated to it by the commanding officer; providing technical documents and advice on classification, compensation, and position management; training managers and supervisors; and administering and

monitoring the classification and position management programs [Ref. 19].

C. CIVILIAN PAYROLL ACCOUNTING

Civilian payroll is an important and time-consuming activity for the Navy shore establishment. As mentioned previously, the civilian payroll comprises the majority of an activity's O&M budget. In addition, payroll is also a sensitive personnel issue which can effect employee morale and effectiveness. It is critical that the payroll be processed accurately and in a timely manner.

1. The Control Process

Before an employee is placed on the payroll, the payroll office must receive an authenticated personnel action form from CPO. Each employee is assigned a pay number (typically the social security number) and a distribution code number which identifies the employee with a department or work center. The pay number and distribution code are shown on all payrolls and individual records pertaining to the employee. [Ref. 2]

Because of the amount and variety of work done at most activities, payrolls are usually broken down into segments for control purposes. These segments are grouped by pay numbers and placed into separate control accounts.

The control accounts summarize total pay hours and rates of pay for each segment. Changes to rates of pay or deductions are processed through the payroll office either

as they occur or at the end of the pay period. Changes require proper documentation (i.e., personnel action forms indicating appointments, separations, transfers, promotions, demotions, and periodic step increases; withholding tax exemption statements; and time cards.) After all changes are made the control accounts are adjusted, balanced and closed out. [Ref. 12]

2. Procedures and Timekeeping

Payroll procedures vary widely from activity to activity. Some use manual systems, while others use computer programs to perform the arithmetic functions and to update personnel pay records. All methods record year-to-date earnings and deductions for quarterly and year-end disclosure of withholding tax and retirement fund contributions. [Ref. 2]

At the activity level the key payroll procedure is timekeeping. Detailed timekeeping procedures are devised by the fiscal officer at the payroll accounting activity or FIPC. The activity serviced by the FIPC must follow these timekeeping procedures which are designed to provide effective control and ensure accuracy. [Ref. 2]

Timekeeping uses a timecard as source document to account for the hours each employee works and to compute pay and entitlements. Each employee records straight time worked, overtime, sick leave, annual leave, and/or holiday leave on the biweekly timecard. The supervisor signs it to

certify its accuracy. Processing of the timecard produces the paycheck along with reports on leave, earnings, and withholding. [Ref. 13]

Numerous formal and local controls exist in the timekeeping process to prevent payment of non-existent employees and to ensure overpayments and underpayments do not occur. The timekeeping office coordinates with the CPO and FIPC to ensure payroll information is accurate and that expenditures are valid.

3. Cost Accounting and Labor Distribution

While timekeeping keeps track of time worked, cost accounting keeps track of tasks performed. Cost accounting answers the question: On what jobs did the employee spend his or her time? The source of this information is the labor distribution card which records the purpose for which a labor charge was incurred.

A job order is a document which estimates the resources required to accomplish a particular task at an activity. It is like a sub-segment within a budget. There may be one to several hundred job orders at an activity, depending upon how many jobs are in process at any given time. The job order document is coded with a number that identifies and describes the task to be done. Civilians who spend time performing work related to that task record that time on their labor distribution cards. When summarized, labor distribution information reveals how much time was

spent on various individual tasks. The function of cost accounting is to provide managers with this level of detail. The total hours recorded on an employee's labor distribution card equals the total hours on the time card. The time card breaks down time in terms of categories (straight time, overtime, holiday, etc.) and the labor distribution card breaks down time in terms of tasks (various job orders). Together the timecard and the labor distribution card provide the information required in civilian payroll accounting.

4. Fringe

Fringe is the government's contribution to employees' health, life insurance, retirement and social security programs. Salary costs alone do not represent the full cost of the civilian payroll. An activity must budget for salary plus fringe.

5. Acceleration

Acceleration is a method for costing labor by productive hour to arrive at a rate applicable to reimbursable customers. (Reimbursable work orders will be discussed in a later chapter.) The objective of acceleration is to cause all reimbursable job orders to reflect the true cost of labor, including the cost of leave and fringe benefits.

IX. MANAGEMENT CONTROL

A. INTRODUCTION

1. Control as a Management Function

Control is key to the effective management of any organization. The term control applies to a wide spectrum of methods which direct, restrain, govern, and verify that the organization is meeting its goals.

Control is one of the primary functions of management. In carrying out the control function, managers take steps to ensure that each part of the organization is meeting its objectives. To do this, managers study accounting, administrative, and program performance data which show where operations are not proceeding effectively, and use this feedback to take the necessary action to correct deficiencies, replan, set new strategies, or change the organizational structure.

The Navy's management control program was introduced in the early 1980's as a means to prevent fraud, waste and abuse. Line managers are responsible for the management control system and have become increasingly involved in this relatively recent and visible program. As evidence of the increased emphasis placed on management control, government auditors have been directed to comment on organizations' management control programs in their audit reports.

2. Definition

In the past the emphasis of control was placed on financial management, and in particular on accounting. Control is obviously integral to providing valid and reliable accounting data; however; control entails more than simply verifying the accuracy of financial information and ensuring it complies with accepted accounting rules.

In general, there are three broad areas of control: accounting control, administrative control, and management control. The boundaries between these control areas are not clear cut, and in some cases there is some overlap.

Accounting and administrative controls are primarily concerned with the day to day operating goals and plans of an organization. Control systems for operating goals and plans involve the details of authorization, approval, and separation of duties (i.e., arrangement of responsibilities to minimize the opportunity for fraud and errors). Examples of accounting and administrative controls include: departmental budgets and forecasts, job assignment sheets, reports, production schedules, procedures manuals, performance standards, logs, registers, charts, forms, records, time cards and checklists. [Ref. 12]

Management control is a broad area concerned with carrying out organization-wide objectives, long-range plans, and organizational structure. It is primarily concerned with the coordination of methods and measures designed to:

safeguard assets, check the accuracy and reliability of accounting data, promote operational efficiency, and encourage adherence to prescribed managerial policies. Examples of management controls include: budgets, forecasts, policy statements, organization charts and statements of function and responsibility. [Ref. 12]

Recently, the term internal control has become synonymous with the broader term management control. For purposes of this discussion the term management control will be used.

3. Objectives

The objectives of management control are to provide management with reasonable assurance that: existing controls are in place and effective; obligations and costs are in compliance with laws and regulations; funds, property, and assets are safeguarded from fraud, waste, and abuse; and revenues and expenditures are properly recorded.

B. LEGISLATION AND POLICY

1. Budget and Accounting Act of 1950

The Budget and Accounting Act of 1950 was the first legislation which identified the need for internal controls in the federal government.

2. Federal Manager's Financial Integrity Act of 1982

In 1982 Congress recognized the value of management controls in the fight against fraud, waste, and abuse. The Federal Manager's Financial Integrity Act of 1982 required

the following actions: development of standards for management control by the U.S. Comptroller General; establishment of guidelines for the evaluation of management controls by OMB; and preparation of annual statements for the President and Congress regarding the state of agency-level management controls by agency heads.

3. OMB Circular A-123

OMB issued its interpretation of the Federal Manager's Financial Integrity Act to government agencies in OMB Circular A-123. This document promulgated program policy and evaluation guidelines. [Ref. 13]

C. STANDARDS

The Standards for Audit of Governmental Organizations, Programs, Activities, and Functions, published by GAO in 1983, sets forth guidance for the federal management control program. It defines management control as the policies, procedures, and practices established or encouraged by management, including the plans and measures necessary to carry them out. The Standards emphasize not only the control process itself, but also the measure of its effectiveness (i.e., performance and results). [Ref. 12]

The GAO Standards are divided into three categories: general, specific, and audit resolution.

1. General Standards

The general standards include reasonable assurance to management that: appropriate controls are operating

effectively, local management supports the program, competent personnel hold positions commensurate with their abilities, and control objectives and techniques are properly defined.

2. Specific Standards

Specific standards include: documentation, recording of transactions and events, execution of transactions and events, separation of duties, supervision, access to resources, and accountability for resources.

3. Audit Resolution Standard

This standard requires prompt resolution of audit findings.

D. PROGRAM REQUIREMENTS

Management control program requirements do not extend to the operating forces (e.g., afloat units, afloat staffs, and deployed aircraft squadrons). Responsibility for the program stops at the Type Commander.

There are four requirements of the management control program: vulnerability assessments, management control reviews, compliance statements, and management evaluation plans.

1. Vulnerability Assessments

The vulnerability assessment is an analysis of organizational areas to determine where the organization might be susceptible to: loss or unauthorized use of resources, errors in reports or records, illegal or

unethical acts, or adverse or unfavorable public information [Ref. 13].

The vulnerability assessment is the basis for the management control program. It is performed by local personnel on a five-year cycle. During the cycle all aspects of the organization will be assessed according to predetermined risk levels (i.e., high, medium and low). "To be effective, assessments must be done by functional specialists who are close to the area being assessed" [Ref. 13:p. 137].

2. Management Control Review (MCR)

When an area in the organization is determined to be vulnerable, an MCR is conducted to analyze the amount of risk involved and to design methods to reduce the risk. Top management should be involved in this process to give the review the support it requires to make necessary changes. MCRs are conducted on a six-month cycle.

3. Compliance Statement by Agency Heads

Every six months, government agency heads must submit a one page statement to the President and Congress regarding the state of their agency's management control system. The statement identifies any material weaknesses discovered over the previous six month period and describes the course of action to correct deficiencies.

4. Management Evaluation Plan

The management evaluation plan is a five year schedule for review of management controls. The schedule delineates specific actions and designates responsibility for each action. The management evaluation plan articulates methods for evaluating medium and high risk areas identified in the vulnerability assessment.

In the present operating environment of constrained resources, leaders look increasingly to control programs which promise to minimize losses from waste, fraud and errors, and increase productivity without adding additional resources.

X. PLANT PROPERTY

A. INTRODUCTION

1. Definition

Plant Property comprises all Navy-owned and Navy-controlled real and personal property of a capital nature used by the shore establishment [Ref.2]. Property of a capital nature is defined as an item with an expected useful life greater than two years and an acquisition and installation cost exceeding 1000 dollars. Management of plant property focuses on the safeguarding of and accounting for assets already acquired.

Plant property is generally found ashore, although Class IV industrial plant equipment is found on industrial ships, such as tenders, repair ships, and aircraft carriers. Medical and dental items are not considered plant property, but are centrally managed and are subject to stringent control by MEDCOM. [Ref. 13:p. 158]

2. Funding

Plant property can be financed using O&M (expense) or procurement (investment) funds. In general, O&M funds are used to purchase minor items, and procurement funds are used to purchase larger investment items.

An activity may buy minor items using O&M funds from its operating budget if the cost of the item is under a certain dollar threshold. For investment items, the activity must first develop and submit a line item procurement budget requesting the plant property by name and

price (including installment cost). Authorization to purchase investment items contained in the request is granted by line item only.

In the case of Class 4 industrial plant equipment, the Defense Industrial Plant Equipment Center (DIPEC) performs the budgeting, acquisition and disposal functions. Command requests for industrial equipment must be forwarded to DIPEC for approval.

B. CLASSES

Plant property is grouped into four classes: land, buildings and improvement, equipment other than industrial plant equipment, and industrial plant equipment.

1. Class 1

Class 1 encompasses real property including land and water rights.

2. Class 2

Class 2 classifies the acquisition or installation of all types of buildings, structures, utility-distributing systems, sidewalks, roads, surfacing, seawalls, and fences. It also includes replacements, alterations, and improvements which result in a change in the overall usefulness of the property, as well as any equipment permanently built-in to structures which would otherwise be categorized as Class 3 or 4. [Ref. 2]

3. Class 3

Class 3 can be considered equipment of a personal nature, or personal capital equipment which has been commercially acquired (e.g., copy machines, ovens, and dishwashers).

Equipment in this category must meet the following criteria: have a unit cost greater than 5000 dollars; have a useful life exceeding two years; not be consumable in use; not be available in supply stores; and not constitute an integral part of a Class 2 system. [Ref. 2]

4. Class 4

Class 4 plant property is characterized by long-life equipment (up to 20 years) which is used to produce other items (e.g., machine tools, lathes, and cranes). "Industrial Plant Equipment (IPE), defined as any item that cuts, abrades, bends, or otherwise reshapes or reforms materials, makes up Class IV" [Ref. 13].

5. Minor Property

To deter theft of items that do not meet the criteria of any class of plant property, SECNAV has promulgated policy on the control of minor property. The primary characteristic of minor property is its pilferable nature. Minor property meets the criteria for Class 3, but costs less than 5000 dollars and is managed locally using station records. Minor property includes such items as

desks, cabinets, safes, calculators, typewriters and lockers. [Ref. 2]

C. CONTROL SYSTEM

The Navy uses various control systems and techniques to ensure compliance with DOD directives concerning government property and the proper collection, compilation, recording, and reporting of plant property information.

1. Inventories

Plant property is subject to periodic physical inventory to verify that the property recorded as an asset is actually on hand. The frequency of such inventories varies according to the class of plant property and requirements of higher authority.

An inventory is typically conducted by a team which sights each item and reconciles the physical count with the plant property records. The public works department may be called upon to inventory Class 1 and 2 property, (i.e., land, buildings, and improvements) [Ref. 2].

At the activity level the comptroller staff or fiscal office is usually responsible for the inventory of Class 2 and 3 plant property. The Class 3 inventory takes place triennially. In performing this duty the inventory team must have access to offices and work centers where plant property is used.

2. Records and Reports

The Navy Facilities Engineering Center has been tasked by NAVCOMPT to record and account for Class 1 and Class 2 plant property. Records consist of maps, drawings, plans, specifications and property record cards. The Naval Facilities Engineering Center is responsible for maintaining the real property inventory (using a management information system) and the identification and reporting of any excesses or deficiencies. This information is provided up the chain of command during the portion of the PPBS cycle concerned with procurement budgets. The Naval Facilities Engineering Center makes quarterly reports using the Reconciliation of Plant Account document (NAVCOMPT Form 167). The report contains receipt and expenditure documentation. [Ref. 2]

At the field level the comptroller is the Class 3 and minor property recordskeeper and is responsible for: the establishment and maintenance of plant property accounting records; preparation and submission of plant property accounting records to the AAA; ensuring the accuracy of records through proper internal controls; and ensuring that all plant property is identified and reported. Departments are responsible to the comptroller for obtaining technical descriptions of the plant property and assisting in the affixing of identification plates and decals on the property. Departments must also report acquisitions, dispositions, transfers, and surveys of plant property.

Responsibility for plant property is passed down to an officer in the department where the property is used and/or located. [Ref. 13]

3. Valuation

a. Capitalization

Capitalization considers the value of an item over its useful life and is a means to recognize its depletion through use. Depreciation is the accounting term for recognition of the decreasing value of an item over time. Improvements to a structure increases its value and is therefore capitalized and depreciated in the accounting process.

Industrial-commercial activities (e.g., shipyards, rework centers, maintenance activities) are required to depreciate plant property. [Ref. 13]

b. Maintenance of Real Property (MRP)

Unlike improvements, maintenance does not increase the value of plant property. MRP funds come from the O&M appropriation and are received by an activity on a O&M funding authorization. A specific dollar amount is specified for MRP on the authorization document. The specified amount "fences" or sets aside funds for MRP. The fence is called a "floor" because it requires that at least the amount specified be used for maintenance of real property. This control is used to ensure that mission-related operations are not funded to the exclusion or

neglect of real property maintenance. In the past, MRP funds were used for other purposes which led to the gradual degradation of buildings and grounds, and expensive repair backlogs.

XI. REIMBURSABLE WORK AND INTER-SERVICE SUPPORT

A. INTRODUCTION

1. Definition

Reimbursable work is the term given to work provided by one Naval activity to another Naval activity, government agency or private party. The requesting activity reimburses the providing activity for the work performed.

2. Background

In addition to allotments or operating budgets provided to activities by their major claimants, activities may also receive funds from other sources in return for work performed. This occurs when the requesting activity does not have the expertise or assets to provide itself with the good or service it requires (e.g., utilities, training courses, communications, and specialized technical work).

Activities within the same claimancy, however, do not perform reimbursable work for each other. In this case, the major claimant authorizes the performing activity to provide the other activity with the goods or service. The major claimant then adds the appropriate amount of funds to the performing activity's resource authorization or budget. The resource authorization of the receiving activity will be reduced accordingly. This shift of funds takes place at the major claimant level. [Ref. 12]

B. REIMBURSABLE ORDERS

1. General

Reimbursable work is authorized and funded using a reimbursable work order. The work order contains a description of the work requested as well as dollar and time limits. Unless the performing and receiving activities have an Inter-service Support Agreement which reflects a prior understanding of the service to be provided, the receiving activity has the option to accept or reject the work order based on its ability to complete the work.

2. Types of Reimbursable Orders

Reimbursable orders fall into four categories: requisitions, work requests, project orders, and requests for contractual procurement.

a. Requisitions

A requisition is a document which an activity uses to request material from the Navy supply system. A requisition requires stock numbers to order and ship requested materials. The appropriation data of the requesting activity is indicated on the requisition to permit reimbursement to the supply system. Requisitions are used to obtain items carried by the supply system or, if not available through the supply system, from private vendors. Examples of such items include: aircraft parts, fuel, desks, paper, and clothing. [Ref. 13]

b. Work Requests

Work requests are used to finance routine services requested by one DOD activity from another DOD activity (e.g., training, duplication services, and utilities). Work requests are usually forwarded to the performing activity at the beginning of each fiscal year or quarter.

A work request is not the appropriate type of reimbursable order to use if the performing activity is unable to do the work itself and intends to contract the work out to another party. Some portion of the requested work must be done by the performing activity. [Ref. 12]

c. Project Orders

Project orders are appropriate between Naval activities when the work to be performed is specific and clearly defined. Both parties must be certain as to the work defined in the order [Ref. 2]. A project order is similar to a firm contract to the extent that it specifies a discrete task or project.

As in the case of work requests, project orders should not be used if the performing activity plans to contract the majority of the work out to another party. Before a work request or project order can be issued, a need for the work must exist in the fiscal year in which the order is drafted.

d. Requests for Procurement

Requests for procurement (RFPs) are used by one Navy activity to request another Navy activity to let a contract for a specific good or service from a commercial source (e.g., a Naval base requests the contracting office at the local Naval Supply Center to let a contract for base telephone service).

C. REIMBURSABLE ACCOUNTING

1. Receipt of Reimbursable Funds

Funds are received by the performing activity via one of the several types of reimbursable work order documents cited above. Each work order contains a funding citation that indicates the dollar amount authorized and the expiration date of the appropriation.

Upon acceptance of the work order, the performing activity increases its obligational authority by the amount on the reimbursable order. The increase in the activity's operating budget account is made by the cognizant FIPC.

2. Use of Reimbursable Funds

As funds are consumed in the course of performing the work, the balance of available reimbursable funds is gradually reduced. The actual billing and accounting functions are performed by the FIPC. The performing activity receives reports from the FIPC regarding the use of reimbursable funds and may reflect this in memorandum records. Reimbursable records are kept separate from

operating budget records. Care must be taken to ensure that reimbursable funds are not used to support mission-funded operations and that mission funds (operating budget resources) are not used to support reimbursable work.

The reimbursable accounting area relies heavily upon the cost accounting function to attribute obligational and accrual accounting values against the reimbursable order. In the event of a breakdown of the cost accounting coding structure, or its utilization, these costs would tend to be logged against the performing activity's own resources. [Ref. 12:p. D-10]

The funding limit specified on the work order prohibits over-obligation of funds. If the performing activity needs additional funds, it must negotiate the requirement with the requesting activity prior to proceeding. If the performing activity continues to spend funds beyond the funding limit on the work order, it must absorb the excess using its own operating budget.

3. Funds Availability

The period of availability of funds depends on the type of work order received. In the case of work requests, the availability of the resources is dictated by the obligational availability of the financing appropriation. In the case of project orders, funds are available for obligation and expenditure throughout the life of the appropriation. For RCPs, availability of funds is reflected in the requesting activity's accounting data which is cited on the order directly. [Ref. 12]

4. Cross-service Work Order

The document used to obtain goods or services from another branch of government is a Military Interservice Procurement Request (MIPR). A MIPR can be used to perform the same functions as the reimbursable work orders discussed above. [Ref. 12]

D. INTER-SERVICE SUPPORT AGREEMENTS

Inter-service Support Agreements provide a vehicle for reaching an understanding concerning which activities will provide and receive certain services.

1. Purpose

The purpose of Inter-service Support Agreements is to reduce costs by consolidating certain activities, where feasible, and spreading the cost of common facilities and functions among the users [Ref. 13].

2. Players

The Defense Logistics Agency (DLA) has overall responsibility for ISSAs.

OSD established an office to implement the Defense Retail Interservice Support (DRIS) program. The DRIS program provides for the examination of ISSAs government-wide to determine where additional savings can be made.

Joint Interservice Resource Study Groups (JIRSGs) review interservice support functions on an ad hoc basis by geographical region. The JIRSG review considers potential areas for further consolidation.

In the language of ISSAs, the providing activity is called the "host" and the receiving activity is called the "tenant."

3. The Agreement

The first stage in forming an agreement between the host and tenant is the development of a draft support plan. A group may be formed to study and estimate reimbursement costs. The agreement may address three different types of support: common use, joint use, and sole use services.

a. Common Use

Common use services are generally provided by nonappropriated-fund activities (e.g., Navy Exchange, commissary, and base security). These facilities are not supported by funds appropriated from Congress and do not receive reimbursement from customers for maintenance or utilities.

b. Joint Use

Joint use services are generally funded by the host unless measurement of tenants' use can be determined. If the host and tenant agree, engineering surveys performed by the Public Works Department may be used to determine allocable costs.

c. Sole Use

Sole use service indicates that the tenant assumes the full cost of a service because it can be shown

that it is the sole user of the service or support. The host bills the tenant for the full cost of the service.

3. Billing

The host uses the following criteria to determine when to bill a tenant: charges must be significant (i.e., greater than 100 dollars), charges must be identifiable to the tenant, charges must result from actual cash outlays, costs must be developed without undue administrative burden. [Ref. 13]

The form used for ISSAs is DD Form 1144. The agreement must be renegotiated every six years; however, it should be reviewed more frequently to reassess changes.

XII. FINANCIAL MANAGEMENT WITH COMPUTERS

A. INTRODUCTION

As computerized information systems become increasingly integrated into all organizational functions and activities, today's manager (at whatever level or functional area) needs to be an effective manager of information.

The purpose of this chapter is to review the landscape of management information systems and discuss opportunities for application of computer technology to the field of financial management.

B. ROLE OF COMPUTERS IN FINANCIAL MANAGEMENT

1. Background

Since their invention, computers have been successfully applied to areas within financial management. "The computer-based information system was introduced as a tool for commercial data processing, and most of its early applications--payroll, inventory, billing--involved accounting data" [Ref. 20:p. 1]. The development of computer technology primarily increased processing speed and improved accuracy of numerical calculations. It also permitted storage of large amounts of data in a small area and mechanization of many routine bookkeeping tasks. [Ref. 13]

2. Levels of Involvement

The financial manager is involved with computers on several different levels. The Navy financial manager is responsible for input of his or her activity's financial data into the official accounting system and is also a user of numerous reports generated by the computerized system. As the business-financial manager in a project management office involved in computer system acquisition, a financial manager is responsible for cost/benefit analysis. Financial managers may also use computers to help organize, calculate, and report internal information in support of local resource management decision-making.

To take advantage of computer technology at each level, the financial manager must acquire some degree of computer literacy and learn what opportunities computer technology offers.

C. COMPUTER BASICS

1. Types

There are three basic types of computers: mainframe, mini, and personal. The following criteria generally distinguish one type from another: processing speed, storage capacity, number of users, kinds of applications, installation costs, and price.

a. Mainframe Computers

Mainframe computers are typically very fast, contain a great deal of memory, and support a variety of

input, output, and secondary storage devices. They generally serve more than 100 users and cost more than 100,000 dollars [Ref. 21]. They are used in large scale, organization-wide, multi-task environments.

b. Mini-computers

Mini-computers generally have the same processing capabilities as mainframe computers but are designed for specific applications. Such dedicated applications might include: payroll, logistics, and records management. They usually cost less than 100,000 dollars.

c. Personal Computers

Personal computers usually support a single user and can cost less than 1,000 dollars. They are the result of advancing integrated circuit technology which has miniaturized processing capability and allowed it to be packaged in a unit suitable for desktop use [Ref. 21]. Examples of personal computers are: IBM PC, Apple MacIntosh, and Zenith micro-processors.

2. Elements

A computer is composed of three basic elements: hardware, software and firmware.

a. Hardware

Hardware refers to the physical components of a computer system (e.g., the central processing unit, storage devices, and input/output peripherals). Storage devices store the information used by computers on disks and tapes.

Input/output peripherals include: keyboards, card and paper tape readers, communications devices, mice, printers, plotters, and displays.

b. Software

The term software refers to the coded instructions which direct computer processes. There are two basic types of software: system software and applications software. System software (also called operating system software) includes the programs which internally manage computer operations. Applications software consists of particular programs designed to process a user's task (e.g., word processing, spreadsheets, and database management systems).

c. Firmware

Firmware refers to any program which resides in memory and cannot easily be changed by the user [Ref. 22].

D. OPPORTUNITIES

The Navy financial manager is required to learn about various computerized accounting systems and perhaps also about computer system acquisition. The area for discussion here, however, focuses on opportunities for supporting financial management decision-making and analysis at the local level with computers. The degree to which a financial manager can take advantage of computer technology, as it applies to financial management, depends upon the availability of computer hardware and processing time;

access to funds to procure software; access to technical assistance; and ability (or desire) to devote time to understanding the technology and specific applications.

There is a wide variety of commercial software available to assist the financial manager including: budget and forecasting programs, spreadsheet data organization and calculation, personnel records management, cost estimation models, and financial statement preparation and reporting. Most of these application programs include elaborate graphics capabilities for bar charts, pie charts, and other visual displays of financial information and trends.

Financial management applications which can be implemented at the local level on personal computers can be grouped into three general areas: spreadsheet programs, database management systems, and decision support systems.

1. Spreadsheet Programs

Spreadsheet programs imitate an account ledger sheet on which financial information is calculated, summarized, and reported. Some programs have up to 9999 rows and 127 columns for data. These programs are commonly used for budget preparation and often integrate graphics as well as data management capabilities. Most notably, spreadsheet programs enable the user to enter large amounts of numerical data and store them for future manipulation without having to restructure and reenter each number. Spreadsheets can also be used in "what if" scenarios for situations in which

the user would like to see how a change of one or more numbers may effect overall totals.

2. Database Management Systems

Database management systems (DBMs) are programs which allow the user to store a large amount of different types of data (both numerical and text) in a single place. Each piece of information is entered only once and therefore updated at one location. This reduces the opportunity for inconsistencies in data. Parts of the database can be extracted, summarized, and reported at will according to the needs of the user. DBMs allow quick retrieval of data, reduce redundant input procedures, and increase productivity. They also perform calculations and summary of numerical data.

3. Decision Support Systems

Decision Support Systems (DSSs) are computer-based tools for support of decision-making. DSSs do not automate the decision-making process (i.e., calculate an algorithmic solution); rather, they help the manager access a large amount of data and make necessary computations in order to arrive at alternatives. While spreadsheets handle structured, repetitive calculations, DSSs are used where managerial judgement is also part of the equation. These systems can be quite complex and often require some measure of programming expertise. A common application of DSSs is in financial planning models.

E. TRENDS

With the beginning of widespread computer technology in the 1950's, the field of MIS has progressed through four stages which have been characterized by varying degrees of "management versus specialist "involvement. The four phases are batch processing mode, on-line direct access, personal computers (fourth generation languages), and advanced communications technologies.

1. Batch Processing

Batch processing is characterized by the accumulation of data over a given period into a "batch" which is processed together at a later time. The batch processing era (1950's) applied primarily to the accounting function. During this period data processing specialists had complete control of the technology and the accounting application. Accountants themselves were only the users and were not involved in design or implementation.

2. On-line Direct Access

During the on-line direct access processing era (1960's and 1970's) applications primarily included logistics, order entry, and inventory control. Users were involved in the input portion of the process but not development or implementation.

3. Personal Computers

The third phase (1970's) was the first to allow the user significant control over the design and implementation

of computer applications. The personal computer became a tool for managerial decision-making. This era brought data processing managers and functional managers into a partnership.

4. Communications Technology

The so-called fourth generation of MIS reflects vast improvements in the ability to link and integrate systems together faster and more cheaply. This has led to the proliferation of computer systems throughout organizations. Their integration has changed internal and external organizational structures. Data processing managers provide support to line managers in their use of computer systems. Computer technology has become easier and cheaper to use, and accessible to more people.

More than ever, managers across the organization have a say in computer design and implementation, and are able to use computers to improve productivity. With the advent of the personal computer, financial managers now have powerful, but affordable, tools at their fingertips to assist them in financial analysis and decision-making. The intelligent utilization of this technology can significantly improve the efficiency and effectiveness with which financial managers carry out the increasingly challenging job of resource management.

APPENDIX B

NAVY FINANCIAL MANAGEMENT QUESTIONNAIRE

Instructions: Item numbers 1 through 11 represent financial management topics which I feel are relevant for the junior financial management subspecialist. Please make a check in both categories for topic and detail.

- 1 = very important topic, needs very detailed coverage
- 2 = relatively important topic, needs moderate coverage
- 3 = not very important topic, needs general coverage
- 4 = not applicable

Please list additional topics in item number 12 and add any comments you may have as they relate to skill and knowledge requirements of the junior financial manager in 0031T and 0031S billets.

	TOPIC					DETAIL		
	!	!	!	!	!!!!!	!	!	!
=====								
1. Planning, Programming Budgeting System	!	!	!	!	!!!!!	!	!	!
=====								
2. Budgeting	!	!	!	!	!!!!!	!	!	!
=====								
3. Accounting	!	!	!	!	!!!!!	!	!	!
=====								
4. Contracting	!	!	!	!	!!!!!	!	!	!
=====								
5. Auditing/Internal Rvw	!	!	!	!	!!!!!	!	!	!
=====								
6. Management Control	!	!	!	!	!!!!!	!	!	!
=====								
7. Plant Property	!	!	!	!	!!!!!	!	!	!
=====								
8. Commercial Activities	!	!	!	!	!!!!!	!	!	!
=====								
9. Civilian Personnel	!	!	!	!	!!!!!	!	!	!
=====								
10. Reimbursable/ISSAs	!	!	!	!	!!!!!	!	!	!
=====								
11. Financial Management with Computers	!	!	!	!	!!!!!	!	!	!
=====								

12. Other Topics

!	!	!	!	!!!!	!	!	!
!	!	!	!	!!!!	!	!	!
=====	=====	=====	=====	=====	=====	=====	=====
!	!	!	!	!!!!	!	!	!
=====	=====	=====	=====	=====	=====	=====	=====
!	!	!	!	!!!!	!	!	!
=====	=====	=====	=====	=====	=====	=====	=====
!	!	!	!	!!!!	!	!	!
=====	=====	=====	=====	=====	=====	=====	=====

Comments:

APPENDIX C

COMPOSITE RESPONSES (IN PERCENTAGES)

		TOPIC					DETAIL									
1.	Planning, Programming Budgeting System	!	47	!	38	!	13	!	2	!!!!!!	27	!	50	!	33	!
2.	Budgeting	!	86	!	14	!	0	!	0	!!!!!!	78	!	22	!	0	!
3.	Accounting	!	44	!	47	!	9	!	0	!!!!!!	38	!	50	!	12	!
4.	Contracting	!	16	!	55	!	23	!	6	!!!!!!	7	!	52	!	41	!
5.	Auditing/Internal Rvw	!	19	!	62	!	13	!	6	!!!!!!	23	!	54	!	23	!
6.	Management Control	!	45	!	39	!	16	!	0	!!!!!!	45	!	32	!	23	!
7.	Plant Property	!	13	!	53	!	28	!	6	!!!!!!	20	!	47	!	33	!
8.	Commercial Activities	!	13	!	50	!	27	!	10	!!!!!!	14	!	36	!	50	!
9.	Civilian Personnel	!	50	!	34	!	13	!	3	!!!!!!	45	!	42	!	13	!
10.	Reimbursable/ISSAs	!	32	!	45	!	19	!	4	!!!!!!	23	!	50	!	27	!
11.	Financial Management with Computers	!	29	!	55	!	16	!	0	!!!!!!	35	!	45	!	20	!

APPENDIX D

SEPARATE RESPONSES (IN PERCENTAGES)

	TOPIC	DETAIL
1. Planning, Programming Budgeting System	! 44 ! 44 ! 8 ! 4 !!!!!	25 ! 54 ! 21 !
2. Budgeting	! 88 ! 12 ! 0 ! 0 !!!!!	84 ! 16 ! 0 !
3. Accounting	! 48 ! 40 ! 12 ! 0 !!!!!	36 ! 48 ! 16 !
4. Contracting	! 12 ! 60 ! 20 ! 8 !!!!!	9 ! 43 ! 48 !
5. Auditing/Internal Rvw	! 20 ! 56 ! 16 ! 8 !!!!!	22 ! 52 ! 26 !
6. Management Control	! 36 ! 44 ! 20 ! 0 !!!!!	36 ! 36 ! 28 !
7. Plant Property	! 12 ! 48 ! 32 ! 8 !!!!!	22 ! 39 ! 39 !
8. Commercial Activities	! 17 ! 42 ! 29 ! 12 !!!!!	19 ! 29 ! 52 !
9. Civilian Personnel	! 56 ! 32 ! 12 ! 0 !!!!!	52 ! 36 ! 12 !
10. Reimbursable/ISSAs	! 40 ! 36 ! 20 ! 4 !!!!!	29 ! 42 ! 29 !
11. Financial Management with Computers	! 38 ! 50 ! 12 ! 0 !!!!!	42 ! 42 ! 16 !

EDUCATORS
(IN PERCENTAGES)

	TOPIC						DETAIL									
1.	Planning, Programming Budgeting System	!	40	!	20	!	40	!	0	!!!!!!	0	!	20	!	80	!
2.	Budgeting	!	100	!	0	!	0	!	0	!!!!!!	60	!	40	!	0	!
3.	Accounting	!	40	!	60	!	0	!	0	!!!!!!	60	!	40	!	0	!
4.	Contracting	!	25	!	25	!	50	!	0	!!!!!!	0	!	75	!	25	!
5.	Auditing/Internal Rvw	!	20	!	80	!	0	!	0	!!!!!!	40	!	40	!	20	!
6.	Management Control	!	80	!	20	!	0	!	0	!!!!!!	80	!	20	!	0	!
7.	Plant Property	!	20	!	80	!	0	!	0	!!!!!!	20	!	80	!	0	!
8.	Commercial Activities	!	0	!	80	!	20	!	0	!!!!!!	0	!	60	!	40	!
9.	Civilian Personnel	!	20	!	60	!	0	!	20	!!!!!!	25	!	75	!	0	!
10.	Reimbursable/ISSAs	!	0	!	100	!	0	!	0	!!!!!!	20	!	60	!	20	!
11.	Financial Management with Computers	!	0	!	80	!	20	!	0	!!!!!!	20	!	60	!	20	!

SPONSORS
(IN PERCENTAGES)

	TOPIC	DETAIL
1. Planning, Programming Budgeting System	=====	=====
	! 100! 0 ! 0 ! 0 !!!!!	100! 0 ! 0 !
2. Budgeting	=====	=====
	! 50 ! 50 ! 0 ! 0 !!!!!	50 ! 50 ! 0 !
3. Accounting	=====	=====
	! 0 ! 100! 0 ! 0 !!!!!	0 ! 100! 0 !
4. Contracting	=====	=====
	! 50 ! 50 ! 0 ! 0 !!!!!	0 ! 100! 0 !
5. Auditing/Internal RVW	=====	=====
	! 0 ! 100! 0 ! 0 !!!!!	0 ! 100! 0 !
6. Management Control	=====	=====
	! 100! 0 ! 0 ! 0 !!!!!	100! 0 ! 0 !
7. Plant Property	=====	=====
	! 0 ! 50 ! 50 ! 0 !!!!!	0 ! 50 ! 50 !
8. Commercial Activities	=====	=====
	! 0 ! 50 ! 50 ! 0 !!!!!	0 ! 50 ! 50 !
9. Civilian Personnel	=====	=====
	! 50 ! 0 ! 50 ! 0 !!!!!	0 ! 50 ! 50 !
10. Reimbursable/ISSAs	=====	=====
	! 0 ! 50 ! 50 ! 0 !!!!!	0 ! 50 ! 50 !
11. Financial Management with Computers	=====	=====
	! 0 ! 50 ! 50 ! 0 !!!!!	0 ! 50 ! 50 !

LIST OF REFERENCES

1. Wildavsky, Aaron, The Politics of the Budgetary Process, Little, Brown and Company, 1984.
2. Financial Management in the Navy (NAVEDTRA 10792-E), Naval Education and Training Program Development Center, U.S. Government Printing Office, Washington, D.C., 1981.
3. Kaufmann, William W., A Reasonable Defense--Studies in Defense Policy, The Brookings Institution, 1986.
4. Collender, Stanley E., The New Guide to the Federal Budget Fiscal 1987, The Urban Institute, 1986.
5. President's Blue Ribbon Commission on Defense Management, A Quest for Excellence--Final Report to the President, U.S. Government Printing Office, Washington, D.C., 1986.
6. Navy Personnel Instruction 15559, Officer Transfer Manual, 1986.
7. Chief of Naval Operations Instruction 1000.16F, Officer Subspecialty System Guidance, 12 August 1986.
8. Navy Personnel Instruction 15839F, Manual of Navy Officer Manpower and Personnel Classifications, Vol. I, 1985.
9. Subspecialty Primary Consultant for Financial Management (OP-92) Handout, Fact Sheet, 8 May 1987.
10. Darby, Peter J., Maintaining the Professional Knowledge of Navy Financial Management Subspecialists, Master's Thesis at the Naval Postgraduate School, Monterey, California, September 1983.
11. Navy Comptroller Manual, Office of the Comptroller of the Navy, Washington, D.C.
12. Practical Comptrollership Course, Student Text, Naval Postgraduate School, Monterey, California.
13. Backus, John Robert, Practical Comptrollership Course, Master's Thesis at the Naval Postgraduate School, Monterey, California, March 1987.

14. Government Accounting Office Study (GAO/PLRD 83-8), "Defense Spending and Its Relationship to the Federal Budget", 1983.
15. Executive Office of the President, Office of Management and Budget, "Budget of the United States Government, Fiscal Year 1988."
16. Main, Glenn A., The Department of the Navy Evaluation and Control Process for Financial Management Systems, Master's Thesis at the Naval Postgraduate School, Monterey, California, June 1986.
17. Department of Defense Instruction 5000.2, "Major System Acquisition Procedures," 12 March 1986.
18. Executive Office of the President, Office of Management and Budget, "Major Systems Acquisitions" (OMB Circular A-109), 5 April 1976.
19. Secretary of the Navy Instruction 12510.9, "Delegation of Position Classification Authority and Position Management Responsibilities Consistent with Payroll Management," August 1986.
20. Davis, James R. and Barry E. Cushing, Accounting Information Systems, Addison-Wesley Publishing Company, 1987.
21. Davis, William S., Information Processing Systems, Addison-Wesley Publishing Company, 1981.
22. Zaks, Rodnay, From Chips to Systems: An Introduction to Microprocessors, Sybex, Inc., 1981.

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