

DOCUMENT RESUME

04773 - [ B0265139 ]

Summaries of Conclusions and Recommendations on Department of Defense Operations. PSAD-78-46; B-106190. January 24, 1978. 106 pp.

Report to Rep. George H. Mahon, Chairman, House Committee on Appropriations; Sen. John L. McClellan, Chairman, Senate Committee on Appropriations; by Elmer B. Staats, Comptroller General.

Contact: Procurement and Systems Acquisition Div.  
Budget Function: National Defense (050); Natural Resources, Environment, and Energy (300); Commerce and Transportation (400).

Organization Concerned: Department of the Navy; Department of Defense; Department of the Army; Department of the Air Force.

Congressional Relevance: House Committee on Appropriations; Senate Committee on Appropriations. Rep. George H. Mahon; Sen. John L. McClellan.

Authority: Accounting and Auditing Act of 1950 (31 U.S.C. 66a). Sikes Act of 1960. P.L. 94-454. P.L. 91-441. B-146896 (1972). B-163074 (1971). H.R. 7769 (95th Cong.).

The annual report summarizes GAO conclusions and recommendations resulting from audits and other review work in the Department of Defense. The report was compiled to assist congressional committees in their review of budget requests for fiscal year 1979. Previous GAO reports brought these matters to the attention of the congressional and departmental officials. The report is divided into three major categories: national defense; natural resources, environment, and energy; and commerce and transportation. National defense subdivisions are: Department of Defense--military, military assistance, defense-related activities, weapon systems, and Department of Defense--procurement and contracts. The major subdivisions under natural resources, environment, and energy are water resources and power, conservation and land management, and pollution control and abatement. The subdivision under commerce and transportation is water transportation. (SW)

5739



**REPORT TO THE  
HOUSE AND SENATE  
COMMITTEES ON APPROPRIATIONS  
BY THE COMPTROLLER GENERAL  
OF THE UNITED STATES**

---

**Summaries Of Conclusions And  
Recommendations On Department  
Of Defense Operations**

This is a summary of GAO's conclusions and recommendations resulting from its audits and other review work in the Department of Defense, compiled to assist congressional committees in their review of budget requests for fiscal year 1979. Previous GAO reports brought these matters to the attention of the congressional and departmental officials.



COMPTROLLER GENERAL OF THE UNITED STATES  
WASHINGTON, D.C. 20548

B-106190

Chairman, Senate Committee on Appropriations  
Chairman, House Committee on Appropriations

This annual report summarizes our conclusions and recommendations resulting from our audits and other review work in the Department of Defense which we believe will be of interest to your Committees in their review of budget requests for fiscal year 1979. Previously our reports have brought these matters to the attention of the Congress and departmental officials. We have not suggested questions to be asked in appropriations hearings; however, we will suggest specific questions on the items summarized if you desire.

A report of conclusions and recommendations concerning the Federal civil departments and agencies is being submitted separately.

We are sending copies of this report to the Department of Defense and the military departments so they may answer any inquiries on these issues during the appropriations hearings.

A handwritten signature in cursive script, reading "James B. Heath".

Comptroller General  
of the United States

C o n t e n t s

CHAPTER		<u>Page</u>
	<u>NATIONAL DEFENSE</u>	1
1	DEPARTMENT OF DEFENSE--MILITARY	1
	Automatic Data Processing System	1
	World-Wide Military Command and Control System (WWMCCS) Department of Defense	1
	Computers and U.S. Military Readiness in Europe Department of Defense	2
	Improvements Needed in the Development of the Army Corps of Engineers Management Information System Department of the Army (Corps of Engineers)	3
	Adequate Controls Needed in the Army Standard Payroll System Prior To Implementation Defense-Wide Department of Defense	4
	Improved Management of Computer Resources Needed to Enhance Marine Corps' Efficiency and Effectiveness Department of the Navy (Marine Corps)	5
	Basing Agreements	6
	Ways to Improve Future U.S. Country Withdrawal Operations Departments of Defense and State	6
	Facilities Management	7
	Improvements Needed in Operating and Maintaining Waste Water Treatment Plants Department of Defense	7
	Family Housing	8
	Large Savings Possible in the Mortgage Insurance Premium Payments System Department of Defense	8
	Free Assets	10
	Initiatives to Improve Free Asset Management Department of Defense	10

## CHAPTER

Page

1	Health Matters	11
	Greater Assurances Are Needed That Emotionally Disturbed and Handicapped Children Are Properly Cared for in Department of Defense Approved Facilities	11
	Department of Defense	11
	The Operations and Financial Needs of the United States Soldiers' and Airmen's Home	12
	Departments of the Army and the Air Force	12
	Hearing Protection Problems	13
	Department of Defense	13
	Maintenance, Repair, and Overhaul	14
	Management Action Needed in the Department of Defense to Realize Benefits from a New System of Aircraft Maintenance	14
	Department of Defense	14
	Problems in Supporting Weapons Systems Produced by Other Countries	15
	Department of the Navy	15
	Why Improved Navy Planning and Logistic Support for the Mark-48 Torpedo Are Essential	16
	Department of the Navy	16
	Determining Requirements for Aircraft Maintenance Personnel Could Be Improved--Peacetime and Wartime	18
	Departments of the Army, Navy, and Air Force	18
	A Central Manager Is Needed To Coordinate The Military Diagnostic and Calibration Program	19
	Department of Defense	19
	The Navy Depot Level Aircraft Maintenance Program--Is There a Serious Backlog	20
	Department of the Navy	20
	Military Manpower	21
	Savings Possible by Adoption of a Contributory Retirement System for Military Personnel	21
	Departments of the Army, Navy, and Air Force	21
	Consolidating Pacific Headquarters	22
	Department of the Navy	22

## CHAPTER

Page

1

Clothing Maintenance Allowance For Enlisted Military Personnel Departments of the Army, Navy, and Air Force	23 23
Military Compensation Should Be Changed to Salary System Departments of the Army, Navy, and Air Force	24 24
Management of Automatic Data Proces- sing Personnel Department of the Navy	25 25
Standards for Staffing Support Activi- ties Departments of the Army, Navy, and Air Force	26 26
Enlisted Career Force Management Departments of the Army, Navy, and Air Force	26
Mobilization	27
Management of Department of Defense Industrial Plant Equipment Can Be Improved Department of Defense	27 27
Restructuring Needed of the Department of Defense Program for Planning with Private Industry for Mobilization Production Requirements Department of Defense	28 28
Challenges to Reducing Government Equipment in Contractors' Plants Department of Defense	29 29
National Productivity	30
Improvements Needed in Defense's Ef- forts to Use Work Measurement Department of Defense	30 30
A Focal Point Is Needed to Coordinate the Services Efforts To Apply Source Data Automation in Industrial Activities Department of Defense	31 31
Readiness	32
Another Look at The Readiness of Stra- tegic Army Forces Department of the Army	32 32

CHAPTER

Page

1

Foreign Military Sales--A Potential Drain on the U.S. Defense Posture	33
Department of Defense	33
U.S. Military Command Structure in Europe	35
Department of Defense	35
U.S. Lethal Chemical Munitions Policy: Issues Facing the Congress	36
Department of Defense	36
Requirements	38
The Air Force Could Reduce War Reserve Requirements of Spare and Repair Parts For Combat-Ready Units	38
Department of the Air Force	38
Using Aviation Resources In The United States More Efficiently	39
Departments of the Army, Navy, and Air Force	39
Stockage of Spare Operating Equipment By Army Maintenance Activities	40
Department of the Army	40
Emergency Power Generators Used And Managed Inefficiently By The	
Department of Defense	41
Departments of the Army, Navy, and Air Force	41
If Defense and Civil Agencies Work More Closely Together, More Efficient Search/Rescue and Coastal Law Enforcement Could Follow	42
Departments of the Navy and Air Force	42
The Air Force Can Reduce Inventories By Eliminating Unneeded Stock Levels	43
Department of the Air Force	43
Methods Used For Determining Conventional Ammunition Requirements	44
Department of Defense	44
The Navy's Multimission Carrier Airwing--Can The Mission Be Accomplished With Fewer Resources?	45
Department of the Navy	45
Stock Funds	47
The Department of Defense Should Increase Efforts To Implement Vertical Controls Over Military Stock Funds	47
Department of Defense	47

CHAPTER

Page

1	Supply Management	48
	Air Force Continues to Repair Parts When Serviceable Parts Are Avail- able	48
	Department of the Air Force	48
	Support Functions	49
	Millions Could Be Saved Annually and Productivity Increased If Military Support Functions In The Pacific Were Consolidated	49
	Department of Defense	49
	Submarine Supply Support Cost. Can Be Greatly Reduced Without Impairing Readiness	51
	Department of the Navy	51
	Transportation	52
	Adoption of Commercial Standards for Seat Spacing and In-Flight Food Service Would Reduce Contract Air- lift Costs and Conserve Fuel	52
	Department of the Air Force	52
	Collection of Processing Fee from Space-Available Travelers	53
	Department of Defense	53
	Unauthorized and Questionable Use of Appropriated Funds to Pay Transpor- tation Costs of Non-Appropriated Fund Activities	54
	Department of Defense	54
	Improvements Needed to Fully Recover Transportation and Other Delivery Costs Under the Foreign Military Sales Program	56
	Department of Defense	56
2	MILITARY ASSISTANCE	58
	Defense Cost-Sharing	58
	The United States and Japan Should Seek a More Equitable Defense Cost- Sharing Arrangement	58
	Departments of Defense and State	58
	Military Agreements	59
	Observations on U.S. Military Presence and Base Negotiations in the Phil- ippines	59
	Departments of Defense and State	59

CHAPTER		<u>Page</u>
2	Military Training	61
	Cost of Training Granted to Foreign Students Under the Military Assistance Program	61
	Department of Defense	61
3	DEFENSE-RELATED ACTIVITIES	63
	Accounting Systems	63
	Many Accounting Systems Still Unapproved by the Comptroller General	63
	Department of Defense	63
	Budgeting	64
	Discussion and Illustration of a New Concept	64
	Department of Defense	64
	Need for a Government-Wide Budget Classification Structure for Fed- eral Research and Development	66
	Departments of the Army, Navy, and Air Force	66
	Civil Preparedness	67
	Civil Defense: Are Federal, State, and Local Governments Prepared for Nuclear Attack?	67
	Defense Civil Preparedness Agency	67
	Foreign Military Sales	69
	Millions of Dollars of Costs Incurred In The Sale of Defense Articles To Foreign Governments	69
	Department of Defense	69
	Government Policy of Self-Insurance	70
	Extending Government's Policy of Self- Insurance in Certain Instances Could Result in Great Savings	70
	Department of Defense	70
	National Aeronautics and Space Administration	70
	Energy Research and Development Administration	70
	Internal Audits	71
	Computer Auditing in the Executive Departments: Not Enough Is Being Done	71
	Government-wide	71

**CHAPTER****Page**

<b>4</b>	<b>WEAPON SYSTEMS</b>	<b>73</b>
	Individual System Studies	73
	The Effectiveness of the Attack Submarine in the Direct Support Role	73
	Departments of Defense and the Navy	73
	Need to Assure Base Level of Relia- bility Before Production of the CAPTOR	74
	Department of the Navy	74
	Status of the Light Airborne Multi-Purpose System	75
	Department of Defense	75
	Confusion and Uncertainty as to the Need for and Use of Air Launched and Tomahawk Cruise Missile Pro- grams	76
	Departments of the Navy and Air Force	76
<b>5</b>	<b>DEPARTMENT OF DEFENSE---PROCUREMENT AND CONTRACTS</b>	<b>78</b>
	Administrative Control of Funds	78
	Legislative Suggestions For Improved Congressional Control Over Reim- bursements To Appropriations	78
	Department of Defense	78
	Serious Breakdown In The Army's Financial Management System	79
	Department of the Army	79
	Contractors' Pension Plan Practices	80
	Improvements Needed in Government Oversight of Contractors' Pension Plan Practices	80
	Department of Defense	80
	National Aeronautics and Space Administration	80
	Medical Reimbursements	81
	Loss Of Revenue Because of Inadequate Charges for Medical Care	71
	Department of Defense	81
	Operation and Maintenance Funds	82
	Navy Ship Repairs and Overhaul	82
	Department of the Navy	82

CHAPTER		<u>Page</u>
5	Procurement	82
	An Organized Approach to Improvement	82
	Department of Defense	82
	Procurement of Beef by the Department	
	of Defense--Are We Getting Our	
	Money's Worth?	84
	Department of Defense (Defense	
	Logistics Agency)	84
	Research, Development, Test, and Evaluation	85
	Independent Research and Develop-	
	ment	85
	Department of Defense	85
	Shipbuilding Claims	86
	Problems in the Quality of Design	
	Packages for Ships and Needed	
	Changes in Shipbuilding Claims	
	Procedures	86
	Department of the Navy	86
	Subcontracts for Minorities	87
	Program to Help Minority-Run Busines-	
	ses Get Subcontracts Not Working	
	Well	87
	Department of Defense	87
	<u>NATURAL RESOURCES, ENVIRONMENT, AND ENERGY</u>	89
6	WATER RESOURCES AND POWER	89
	Benefit-Cost Analyses	89
	Improvements Needed in Making Benefit-	
	Cost Analyses for Federal Water Re-	
	sources Projects	89
	Department of the Army (Corps of	
	Engineers)	89
	Dam Safety	91
	Actions Needed to Increase the Safety	
	of Dams Built by the Bureau of Rec-	
	lamation and the Corps of Engineers	91
	Department of the Army (Corps of	
	Engineers)	91
	Slow Progress in Developing and Imple-	
	menting a National Dam Safety Pro-	
	gram	93
	Department of the Army (Corps of	
	Engineers)	93
	Federal Hydroelectric Systems	95
	Federal Hydroelectric Plants Can	
	Increase Power Production	95

**CHAPTER****Page**

6

Department of the Army (Corps of Engineers)	95
Inland Navigation	97
More Information Needed on Economic and Environmental Issues in Maintaining the Nation's Inland Navigation System	97
Department of the Army (Corps of Engineers)	97

7 CONSERVATION AND LAND MANAGEMENT	99
Wildlife Conservation	99
Military Fish and Wildlife Management and Public Outdoor Recreation Planning Needs Greater Emphasis	99
Departments of the Army, Navy, and Air Force	99

8 POLLUTION CONTROL AND ABATEMENT	101
Environment	101
Improving Military Solid Waste Management	101
Department of Defense	101
Defense Air Pollution Control: Progress and Delays	102
Department of Defense	102
Ways to Improve Oil Recycling	103
Department of Defense	103

**COMMERCE AND TRANSPORTATION** 105

9 WATER TRANSPORTATION	105
Inland Waterways	105
Federal Efforts to Extend Winter Navigation on the Great Lakes and the St. Lawrence Seaway--Status and Problems to be Resolved	105
Department of the Army (Corps of Engineers)	105

N A T I O N A L D E F E N S E

CHAPTER 1

DEPARTMENT OF DEFENSE--MILITARY

AUTOMATIC DATA PROCESSING

World-Wide Military Command  
and Control System (WWMCCS)

Department of Defense

The mission of this system, as outlined in Department of Defense directives, is to provide information to the National Command Authorities and Commanders of Unified and Specified Commands so that appropriate and timely decisions may be made. The system, therefore, must collect, process, and disseminate a large volume of diverse information that is required to help commanders at all levels to make the required decisions in a timely manner. This information is a resource and must be adequately managed and protected from unauthorized use.

GAO reported that system management should address the need for improving (1) computer security and (2) effectiveness and efficiency of internetting between computers in its automatic data processing (ADP) operations. GAO also reported that the machine dependency of part of the system may limit competitive acquisitions of future ADP equipment.

GAO suggested that WWMCCS management evaluate the cost, schedule, and technical parameters of feasible alternatives to assure that user requirements will be met in the most economical manner (LCD-75-116, July 21, 1975.)

The Department replied that it would conduct evaluations.

Appropriations

Operation and Maintenance (Army) (Navy) (Air Force)  
(Defense agencies).  
Procurement (Army) (Navy) (Air Force) (Defense agencies).  
Research and Development (Army) (Navy) (Air Force)  
(Defense agencies).

## Appropriation Committee Issue

Appropriations required for the WWMCCS system should be reviewed to determine if the Department of Defense is adequately addressing the computer security and data communications or internetting issues.

### Computers and U.S. Military Readiness in Europe (Classified)

#### Department of Defense

To meet their peacetime and wartime operational needs, U.S. forces stationed in Europe rely on automatic data processing systems. ADP support is provided in the areas of command and control, intelligence, logistics, personnel accounting, financial accounting, and base-level operations. For many of these functions, parallel manual operations do not exist for meeting data requirements.

The services have several studies in various stages of development to increase the operational readiness of the forces in Europe. GAO concluded in a classified report that the ADP wartime readiness will not be improved materially unless the following matters are considered fully in present and future plans:

- Clearly defined ADP wartime missions.
- Providing for service backup facilities or making computers as transportable and survivable as the principal activities they support.
- Periodic field testing to insure that van-mounted computers can operate in field environments and that adequate power and transportation support are available.
- Adequate plans for providing continuity of wartime support.

Defense agreed that ADP should be as survivable as the activity it supports and that Defense's reliance on ADP is increasing. It further stated that it would begin reviewing plans and policies for ADP continuity of operations. (LCD-76-110, Aug. 25, 1976.)

## Appropriation

Operation and Maintenance (Army) (Navy) (Air Force).

## Appropriation Committee Issues

If the Department of Defense would provide the Congress with plans for continuity of critical ADP operations, this could be of value in determining the cost of achieving effective ADP operations. Alternatives and associated costs for continuity of operations could be documented by the Department to present an overall perspective for the selected course of action.

## Improvements Needed in the Development of the Army Corps of Engineers Management Information System

### Department of the Army (Corps of Engineers)

The Army Corps of Engineers Management Information System (COEMIS) is intended to be a standardized system for the Corps to use in its divisions and districts throughout the United States. GAO reported to the Secretary of Defense that the COEMIS development effort had suffered from inadequate planning and management. This weakness has been recurring; GAO reported similarly in 1971 (B-163074, Apr. 21, 1971). Although COEMIS had undergone numerous modifications since the prototype was approved in 1971 and additional computer equipment had been procured, computer hardware was still inadequate to handle intended applications, and user satisfaction was questionable. Further, the development effort had lagged considerably. The development of COEMIS, which was initiated in 1966, had an estimated completion date of 1971. The system still is not fully operational; three of the four COEMIS subsystems are estimated to be completed by the end of 1977. GAO recommended that a full reevaluation of COEMIS be made to develop a formal, comprehensive plan specifically addressing the

- actual versus planned project milestones and costs,
- adequacy of providing user satisfaction,
- effects of system saturation on long-range COEMIS implementation,

--need for the Corps to obtain effective future procurement competition, and

--alternate system designs for future COEMIS.

(LCD-76-119, Oct. 8, 1976.)

The Assistant Secretary of the Army (Financial Management) stated that the Army considered the GAO approach to be technically feasible but more costly than a revised Corps plan. He said that the Corps had developed a plan to accomplish the objectives outlined in the GAO report and that a number of other actions were in progress at the Corps which will alleviate the other problems considered by GAO.

#### Appropriation

Automatic Data Processing (Army: Corps of Engineers, Civil Functions).

#### Appropriation Committee Issue

The Committees should ascertain the reasonableness of the Corps' plans for satisfying the objectives and concerns expressed in the GAO report.

#### Adequate Controls Needed In The Army Standard Payroll System Prior To Implementation Defense-Wide

##### Department of Defense

The Army is now implementing a standardized computerized payroll system which will be used to pay its approximately 350,000 civilian employees about \$5 billion annually. The Army system is also being used as a model for a standard Defense system which may be used to pay about 1 million civilians \$15 billion annually.

In a report to the Congress, GAO disclosed that the Army system did not contain adequate procedures and controls to prevent erroneous or fraudulent payments. Many of the weaknesses were the same as those disclosed in earlier GAO payroll reviews and had been reported to the Congress.

Acting on GAO's recommendations, the Army is taking steps to improve its standard payroll system by (1) incorporating additional edit routines into the system, (2) providing for adequate separation of duties, (3) completing and updating

system documentation, and (4) providing for better utilization of the automated capabilities of the computer to improve system efficiency and output reliability. Also, Defense stated that the Army would be required to make all important changes to improve system controls before implementation Defense-wide. (FGMSD-77-4, July 5, 1977.)

### Appropriation

Operation and Maintenance (All Defense Organizations).

### Appropriation Committee Issue

The Committee should determine the Army's progress in improving the standard payroll system.

### Improved Management of Computer Resources Needed to Enhance Marine Corps' Efficiency and Effectiveness

#### Department of the Navy (Marine Corps)

The effectiveness of Marine Corps operations is substantially affected by the availability of ADP support. GAO reported on the Marine Corps ADP environment, disclosing numerous weaknesses which impaired overall effectiveness. In commenting on the GAO report, the Assistant Secretary of the Navy (Financial Management) stated that several of the recommendations had merit and that the Marine Corps had initiated corrective action. The corrective actions are generally consistent with GAO's recommendations and, if properly implemented, should improve Marine Corps management of its data processing resources. However, the Assistant Secretary took exception to two implications in the GAO report that

--the Marine Corps had not effectively complied with Government regulations on the acquisition of ADP equipment and

--user requirements were neither effectively identified nor satisfied.

GAO maintains the validity of the above conclusions. (LCD-76-124, July 11, 1977.)

### Appropriation

Operation and Maintenance (Navy-Marine Corps).

## Appropriation Committee Issues

It is extremely critical that long-range planning precede the acquisition and implementation of ADP support. For future ADP acquisition requests, the Committees should assure themselves that adequate attention has been given to the overall system development effort before further funding is approved. A representative planning model to aid in analyzing such efforts is contained in the Senate Committee on Appropriations report S95-325, July 1, 1977.

## BASING AGREEMENTS

### Ways to Improve Future U.S. Country Withdrawal Operations

#### Departments of Defense and State

In March 1975, because of changing conditions in South-east Asia, the Royal Thailand Government asked the United States to withdraw its combat forces from Thailand. At that time, 27,000 military personnel were authorized for six bases and other facilities throughout the country. The phasedown resulted in U.S. force levels being reduced to less than 250 as of July 20, 1976.

Although a massive U.S. military force had been deployed to Thailand--about 46,300 in 1969--agreements authorizing such a force were minimal. This was particularly true regarding most of the military facilities constructed there and the disposition of the equipment assigned to them. Meanwhile, the Thai Government controlled the bases and the transportation facilities used by U.S. forces. Given these conditions, the Thai Government could have made the withdrawal operations much less successful. However, through the cooperation of the Thai Government and agreements reached during phasedown and withdrawal, the operation was successful.

GAO recommended that the Secretary of Defense direct that definite criteria for peacetime withdrawal of U.S. forces and associated material from foreign countries be established. GAO further recommended that future basing agreements should contain provisions for protecting U.S. investments, either through their return or appropriate compensation for them, and for moving retrograde material without hindrance.

The Departments of Defense and State agreed with GAO's recommendations for corrective action and said they would implement them. (LCD-77-402, June 3, 1977.)

### Appropriations

Operation and Maintenance (Department of Defense).  
Procurement (Department of Defense).  
Military Construction (Department of Defense).

### Appropriation Committee Issues

A definite criteria for the peacetime withdrawal of U.S. forces and associated material from other countries should be established by the Department of Defense. Future basing agreements should contain provisions to adopt Defense criteria for withdrawal.

## FACILITIES MANAGEMENT

### Improvements Needed in Operating and Maintaining Waste Water Treatment Plants

#### Department of Defense

During fiscal years 1968-76, the Congress appropriated about \$263 million to Defense for improvements to waste water treatment plants and connections to public sewage systems. Budget estimates for construction in fiscal years 1977 and 1978 are \$56 million and \$79 million, respectively. Operation and maintenance costs for fiscal year 1975 were \$44 million.

GAO reported that many Defense waste water treatment facilities did not meet required water quality standards and that the Department had not taken measures to insure compliance by July 1, 1977.

Because the effectiveness of the Defense waste water treatment program was seriously impaired by problems of design, operation, and maintenance of facilities, GAO recommended that the Secretary of Defense direct the Secretaries of the Army, Navy, and Air Force to establish the necessary controls for insuring that waste treatment facilities comply with effluent limitations and water quality standards.

Defense should direct the military services to:

- Determine the capabilities of all treatment plants and the improvements needed to meet effluent limitations and water quality standards.
- Price out, budget for, and program improvements in laboratory equipment, staff, and training that would bring plants into compliance with applicable water quality standards.
- Monitor the progress of improvements by using internal operating reports and evaluations made by the Environmental Protection Agency and environmental groups within Defense.

Defense generally agreed with GAO's recommendations and said it would emphasize the requirements of Executive Order 11752 and the actions needed to conform with the applicable effluent limitations and water quality standards.

The Environmental Protection Agency concurred with GAO's recommendations to the Secretary of Defense and said that proper staffing and staff training, preventive maintenance programs, replacement of obsolete equipment, and implementation of adequate laboratory testing programs should be emphasized. (LCD-76-312, June 18, 1976.)

### Appropriations

Military Construction (Army) (Navy) (Air Force).  
Operation and Maintenance (Army) (Navy) (Air Force).

### Appropriation Committee Issue

Defense may need funds above the current annual level of \$60 to \$80 million to meet the 1985 national goal of eliminating the discharge of pollutants from its installations into navigable waters.

### FAMILY HOUSING

#### Large Savings Possible in the Mortgage Insurance Premium Payments System

##### Department of Defense

In a report to the Congress, GAO questioned the need for the Government to continue paying about \$2.6 million annually in mortgage insurance premiums for military personnel as authorized by section 222 of the National Housing Act of 1954.

GAO raised the issue because (1) military pay has substantially increased since the law was passed, providing many program participants with adequate salaries to purchase homes without assistance and (2) other federally sponsored programs are now available for military personnel actually needing assistance in buying a home.

GAO's report discussed program costs amounting to \$3.3 million--\$2.6 million in premiums and \$0.7 million in personnel costs--that could be saved annually by discontinuing the program. GAO's report also pointed out that if the program was indeed necessary, much of the annual personnel cost could be saved by simplifying the annual transfer of about \$2.6 million from the Department of Defense (DOD) to the Department of Housing and Urban Development (HUD) to cover premium payments made on behalf of military personnel.

HUD agreed with GAO's position that the section 222 programs should be reevaluated and acknowledged that the cost of transferring the money--about 30 cents for each \$1 transferred--was too high.

GAO issued its report without including DOD's position because comments had not been received by 60 days after the due date. Subsequently, Defense sent comments to GAO basically disagreeing with the report and conceding a need only for very minor program changes to bring about greater accuracy in HUD's billings. Defense offered several justifications for the section 222 program. GAO is in the process of evaluating Defense's rationale for continuing the program.

HUD agreed to pursue GAO's suggestions for simplifying the transfer of funds, including a suggestion to use a composite annual billing to DOD in lieu of the annual bills now being submitted for each program participant. HUD also promised to correct records on which billings are based and to process data affecting the bills more promptly. Defense agreed to participate in these efforts.

GAO asked the Secretaries of HUD and Defense to evaluate the need for continuing the section 222 program and if a decision is made to continue it, to consider whether an income eligibility criteria should be established. GAO also asked that the study results be reported to the appropriate congressional committees. (FGMSD-77-12, Aug. 24, 1977.)

## Appropriation

Family Housing (Defense).

### Appropriation Committee Issues

1. If it is determined that the section 222 program should be discontinued, the potential savings would amount to \$3.3 million. If it is determined that the 222 program should be modified through a change in the eligibility criteria, the potential savings would be somewhat less.
2. If it is determined that simplification of the transfer of funds is feasible, a substantial portion of the current cost of \$700,000 would be saved.
3. The Appropriation Committees should review the report of the Secretaries of HUD and Defense on (1) the evaluation of the need for the Government to continue to pay housing insurance premiums for military personnel and (2) whether new income eligibility criteria should be established for the program.

## FREE ASSETS

### Initiatives To Improve Free Assets Management

#### Department of Defense

The Department of Defense generates funds by selling equipment which is not required to be replaced in the Department's inventory. Receipts from these sales are termed "free assets" and may be used, with appropriate approvals and controls, to fund other Defense needs. An earlier GAO report identified weaknesses in reporting and managing free assets.

Defense has taken a number of steps to improve its reporting and management control over free asset funds. However, Defense still needs to do more to improve

--the accuracy of free asset estimates given annually to the Congress and

--internal coordination in formulating servicewide free asset procedures. (LCD-77-416, Feb. 28, 1977.)

## Appropriations

Procurement (servicewide).  
Research and Development (servicewide).

## Appropriation Committee Issues

Use of more effective estimating techniques for free assets by Defense would provide the Committees with more accurate information on the availability of such funds to Defense. This information would be more useful to the Committees in their annual review of Defense budget requests for appropriated funds. Greater coordination of free asset sales policies within Defense would prevent confusion in classifying such sales and would insure servicewide uniformity in managing and accounting for these funds. This would further reduce the possibility of future overobligations occurring from the use of free asset funds.

## HEALTH MATTERS

### Greater Assurances Are Needed That Emotionally Disturbed and Handicapped Children Are Properly Cared for in Department of Defense Approved Facilities

#### Department of Defense

About 1,600 psychiatric, handicap, and specialized inpatient treatment facilities throughout the United States have been approved by the Department of Defense to care for emotionally disturbed and handicapped children and adolescents under the Civilian Health and Medical Program of the Uniformed Services (CHAMPUS). Payments by the Department to those facilities in 1974 were about \$18 million.

GAO reported to the Congress on several problem areas, including the need for (1) better criteria and inspection procedures in approving facilities, (2) procedures to avoid inappropriate admissions and excessive lengths of stay, (3) improved controls over facility financial changes, and (4) reconsideration of financial provisions of the program for the handicapped.

The Department generally agreed with GAO's recommendations and stated that most of the weaknesses have been corrected and the others await techniques to meet the objectives.

However, the Department has not taken action on GAO's recommendations regarding the need for reconsideration of financial provisions of the program for the handicapped. GAO recommended that the Secretary of Defense direct the Assistant Secretary of Defense (Health Affairs) to:

- Determine an appropriate CHAMPUS payment for handicap care reflecting the increased costs of such care.
- Determine an equitable sponsors' share of the costs of handicap care reflecting the significant increases in military pay since 1966.
- Propose legislation to increase CHAMPUS' and the sponsors' payments for handicap services. (HRD-76-175, Oct. 21, 1976.)

### Appropriation

Operation and Maintenance (Defense).

### Appropriation Committee Issue

Department of Defense action on GAO's recommendations would increase the funding needed for health care of military personnel dependents.

### The Operations and Financial Needs of the United States Soldiers' and Airmen's Home

#### Departments of the Army and Air Force

The United States Soldiers' and Airmen's Home was established to provide a military asylum for the relief and support of invalid and disabled soldiers. The Home's expenses have been exceeding its income, and its operations have been financed, in part, with moneys taken from the principal of its permanent fund. The Congress enacted Public Law 94-454 in October 1976 to provide the Home with additional income.

GAO recommended actions to the Home that would reduce expenses without adversely affecting the level of care provided. The Home is implementing the recommendations.

The additional funding provided under Public Law 94-454 should improve the Home's financial condition to the point where no immediate action is needed to authorize additional revenue sources. GAO recommended that the Home defer requests to the Congress for additional revenue sources until the

effects of Public Law 94-454 on the Home's financing can be assessed.

The Home disagrees and believes that additional funds should be authorized immediately for its operations. (HRD-77-123, Aug. 1, 1977.)

### Appropriation

Military Personnel (Army) (Air Force).

### Appropriation Committee Issue

Actions should not be taken to authorize additional sources of income for the Home until the effects of Public Law 94-454 on the Home's financing can be assessed.

### Hearing Protection Problems

#### Department of Defense

GAO reported to the Congress that the Department of Defense is paying out millions of dollars for employees' job-related hearing losses and that safety rules have been disregarded and disciplinary actions lacking.

GAO concluded that:

- A much higher percentage of Defense workers in hazardous noise areas had hearing losses than workers not exposed to hazardous noise.
- The hazardous noise areas identified in some surveys were not sufficiently defined.
- Installations were not giving hearing tests to all workers either before exposure to hazardous noise or periodically after assignment to such areas.
- Criteria were needed for deciding when engineering controls are feasible.
- Installations were not enforcing the rules or instructing all workers on hearing protection.

GAO recommended that Defense (1) have the Navy and Defense agencies, where applicable, change from a 90- to an 85-decibel noise exposure limit, (2) issue guidance on work

area surveys that will result in better identification of hazardous noise areas, and (3) have its components

- establish a monitoring system to make sure that the required initial and yearly hearing tests are given to all workers assigned to noisy areas,
- adopt uniform criteria for deciding when engineering controls should be used,
- provide guidance on the need to enforce penalties for hearing protection violators under existing regulations and to carry out educational programs on hearing conservation.

The Department believed that its noise surveys and enforcement procedures are adequate and said that, except for the proposal to establish engineering control criteria, it was already implementing GAO's proposals as Defense policy. (LCD-77-308, Sept. 15, 1977.)

#### Appropriations

Operation and Maintenance (Army) (Navy) (Air Force).  
Military Construction (Army) (Navy) (Air Force).

#### Appropriation Committee Issue

Uniform standards and enforcement are needed to improve protection of workers' hearing and minimize compensation claims for job-related hearing losses.

#### MAINTENANCE, REPAIR, AND OVERHAUL

##### Management Action Needed in the Department of Defense to Realize Benefits from a New System of Aircraft Maintenance

##### Department of Defense

The Department of Defense has adopted a new aircraft maintenance concept which limits routine maintenance to that which is meaningful to safety, reliability, and economics. The Navy has tested the new concept.

GAO reported to the Congress that although savings and improvements have been realized from the new concept, maximum benefits have not been obtained. Total potential savings are

substantial. On the basis of current aircraft maintenance costs Defense-wide of over \$6 billion, savings as much as \$1 billion could aggregate.

GAO recommended that Defense should (1) provide specific guidance to the military services on carrying out the concept, (2) emphasize the importance of having well-defined and quantified goals, (3) monitor each concept application through specific reporting requirements, and (4) require the services to change the computation of aircraft requirements to include the higher operational-available time of aircraft. Defense generally agreed with GAO's recommendations. (LCD-76-443, Nov. 10, 1976.)

### Appropriation

Operation and Maintenance (Army) (Navy) (Air Force).

### Appropriation Committee Issue

The Committees should oversee what is being done to achieve the potential savings resulting from the improved aircraft maintenance system during future appropriation hearings.

### Problems In Supporting Weapons Systems Produced by Other Countries

#### Department of the Navy

This report describes the maintenance and supply support problems encountered as a result of the Navy's acquisition of the British-produced AV-8A Harrier aircraft. After discussions with Marine Corps officials, GAO concluded that the low operational readiness level of the aircraft was due, in part, to providing logistics support for a foreign-produced system. In anticipation of future foreign procurements, GAO has highlighted the unique support problems and has recommended procedures to be taken to avoid similar problems.

The Navy agreed with GAO's recommendation to complete the integrated logistics support functions when purchasing a system, but disagreed with the recommendation to issue supplemental guidelines on the logistics support of a system produced by another country. Navy said existing instructions, though not geared specifically to such procurements, meet the intent of the recommendation.

GAO does not agree that Navy instructions meet the intent of its recommendation. Existing instructions were tailored after domestic acquisitions and do not address the specifics included in the recommendation.

The Assistant Secretary of Defense (Installations and Logistics) agreed with the report and said the lessons learned from the AV-8A Harrier program will be passed on to all associated with system acquisitions. He did not, however, comment on whether the supplemental guidelines advocated by GAO would be prepared. (LCD-76-450, Jan. 4, 1977.)

### Appropriations

Procurement (Navy).  
Operation and Maintenance (Navy).

### Appropriation Committee Issue

The Appropriation Committees in reviewing new weapon system procurements should insure that the Secretary of Defense has taken the lead in providing the services with necessary guidance to deal specifically with supporting systems produced by other countries.

### Why Improved Navy Planning and Logistic Support of the Mark-48 Torpedo Are Essential

#### Department of the Navy

The Navy's Mark-48 torpedo is a \$2 billion acquisition program, and millions more will be spent to support the system over its expected 30-year life.

GAO reported to the Congress that the Navy originally tailored its logistic support plans to a torpedo design which was not selected due to operational problems. The Navy failed to change those plans to support the design selected for production and deployment. As a result, about \$54.7 million was spent for maintenance facilities and test equipment which either were not needed or were of marginal value. Five years after deployment, major improvements are still needed to achieve total system support.

GAO recommended that to improve the logistic support of the Mark-48 torpedo, the Secretary of Defense should require the Navy to

- develop a comprehensive plan for logistic requirements;
- examine needs for maintenance facilities and make indicated reductions;
- reassess requirements for automatic test equipment in relation to workload and facility realignments to avoid unnecessary costs for test equipment modifications, spare parts, and contract support;
- transfer inventory management from the contractor to Navy support facilities;
- reconsider a recommendation to staff maintenance facilities with U.S. Navy civilians; and
- explore fully the costs and benefits of consolidating maintenance facilities on the east and west coasts of the continental United States.

The Navy did not concur with these last two recommendations, stating that both recommendations would incur greater costs than at present. GAO believes that the Navy has not fully explored the alternatives nor analyzed all costs and benefits. Defense concurs with the Navy for the present; however, it states the Navy will reconsider both decisions.

Defense contends that the Navy has planned system support over the years as changes occurred and has continued to review facility requirements and has made the realignments GAO noted. GAO believes the plans to be more of a status report of what was being done than a comprehensive analysis of what was needed. (LCD-76-451, May 9, 1977.)

### Appropriations

Military Personnel (Navy).  
 Operation and Maintenance (Navy).  
 Military Construction (Navy).

### Appropriation Committee Issues

1. The Navy will require additional funds to modify maintenance shops designed to support the original torpedo design but which cannot efficiently support the torpedo selected. Costs for modifications could be reduced if consolidations occurred.

2. The requirement for Navy military personnel would drop if maintenance shops were closed and U.S. Navy civilians provided torpedo maintenance.
3. The Committees should examine the Navy's long-range plans for the logistic support of the Mark-48 torpedo in view of the significant impact on funding the plans can have.

Determining Requirements for Aircraft  
Maintenance Personnel Could Be Improved--  
Peacetime and Wartime

Departments of the Army, Navy, and Air Force

The Department of Defense spends over \$6 billion annually for aircraft maintenance, and about two-thirds of this cost is for below-depot-level maintenance. The services employ over 250,000 military and civilian personnel to perform this maintenance.

GAO found that below-depot-level aircraft maintenance manpower requirements are usually based on wartime needs. In many cases, however, manpower factors and data used in the individual manpower determination systems are questionable, inaccurate, or outdated. Also, assumptions concerning the use of military forces underlie each service's manpower determination system and greatly affect the manpower requirements. For example, the services' systems generally assume all deployable aircraft units must be ready to deploy immediately, but some units will not deploy during the early stages of war. In addition, the services, with few exceptions, staff their below-depot-level maintenance activities to support mobilization without reliance on reserves. (LCD-77-421, May 20, 1977.)

Appropriations

Military Personnel (Army) (Navy) (Air Force).  
Operation and Maintenance (Army) (Navy) (Air Force).

Appropriation Committee Issues

1. The most appropriate level of maintenance manpower for both wartime and peacetime could be determined if the services would refine existing systems and information used to establish those manpower levels.

2. An evaluation of critical assumptions concerning the use of forces at the outbreak of war also could improve the manpower requirements determination process.
3. Alternatives should be developed for greater use of reserves when determining the most cost-effective and appropriate mix of forces (active and reserve) to meet the below-depot-level maintenance personnel requirements.

A Central Manager Is Needed To  
Coordinate The Military Diagnostic  
And Calibration Program

Department of Defense

GAO reported to the Secretary of Defense that each military service has established its own system and facilities to satisfy common calibration needs. Because the services have not exploited opportunities for calibration cross-servicing, the Department continues to underutilize its resources and incurs unnecessary costs for transportation, equipment, staff, and facilities.

GAO recommended that the Secretary of Defense establish a single, central manager for the entire diagnostic and calibration program. Further, the Secretary should immediately direct the services to use the closest calibration facility which can perform the services most effectively and at the lowest transportation cost. (LCD-77-427, May 31, 1977.)

Appropriation

Operation and Maintenance (Army) (Navy) (Air Force).

Appropriation Committee Issue

Operating and maintenance costs could be reduced if the Department of Defense calibration and diagnostic programs were consolidated, thereby improving the efficiency of resource utilization.

The Navy Depot Level Aircraft Maintenance Program- There a Serious Backlog

Department of the Navy

This report presents information on the Department of the Navy's depot-level aircraft repair program. The operations of this program affect the Navy's funding requirements and the reported end of fiscal year 1976 and 1977 backlog of maintenance.

Essentially, most of the backlog of depot-level airframe maintenance is not a current priority requirement. With improvements in the Navy's programs, some of which are in progress, this backlog is being reduced as the equipment is needed. Apparently some additional funding could be used in the component repair program. However, until management deficiencies are corrected, it would be difficult to determine how much funding this program should receive and what impact it would have on readiness.

On other related matters, GAO recommended that the Department of Defense take steps to standardize data used by the Congress and military planners by eliminating as much as possible the differences in the services' operations readiness report systems. Also, common criteria are needed for determining when an aircraft should receive depot-level maintenance, and Defense should require that only aircraft actually in need of depot work be reported as an unfunded backlog requirement. (LCD-77-432, Sept. 1, 1977.)

Appropriation

Operation and Maintenance (Army) (Navy) (Air Force).

Appropriation Committee Issues

The military services aircraft maintenance and operational readiness data should be developed and presented to the Congress in a similar manner. Standardization of data would aid in comparing the services' operations of their aircraft inventory.

## MILITARY MANPOWER

### Savings Possible by Adoption of a Contributory Retirement System for Military Personnel

#### Departments of the Army, Navy, and Air Force

Military retirement costs are increasing sharply. In fiscal year 1976 the retired military population reached 1.1 million members who received an estimated \$6.9 billion in payments (estimated to be \$9 billion in fiscal year 1978). Partly because of this cost increase, the Department of Defense proposed legislative reform of the military retirement system. The proposal, which did not include a contributory feature, would allow Defense managers to closely control the number of military personnel who become eligible for retired pay. This would eventually reduce retirement costs. No action was taken by the Congress on this proposal (H.R. 7769), and Defense does not intend to resubmit it until after the recently appointed Commission on Military Compensation completes its study on military pay. (Report due March 15, 1978.)

GAO reported to the Defense Task Force, Senate Budget Committee, on the issue of a contributory retirement system for military personnel. The report identified the advantages and disadvantages, cost implications, and the issues to be resolved. We estimated that about \$1 billion could be saved the first year under such a system, assuming the same benefits as the present system and no retirement fund, if military personnel were to contribute 7 percent of their basic pay toward retirement costs. Varying the factors and assumptions can result in lesser savings or even increased costs. (FPCD-76-43, Mar. 4, 1976.)

#### Appropriation

Military personnel (Army) (Navy) (Air Force).

#### Appropriation Committee Issues

1. Significant savings may be possible by adopting a contributory retirement system for military personnel. The Department of Defense, in conjunction with the Office of Management and Budget, should consider incorporating a contributory feature in proposed legislative reform of the retirement system.

2. Guidance from the Congress should be provided to the Department of Defense and Office of Management and Budget on unresolved issues pertaining to adoption of a contributory retirement system, such as
  - how contributions should be computed,
  - whether a retirement fund should be established,
  - whether pay should be increased to offset contributions,
  - when vesting rights should be granted, and
  - how the military retirement system should be integrated with Social Security.

### Consolidating Pacific Headquarters

#### Department of the Navy

The Navy's organization in the Pacific is a complex structure that has existed basically the same way for years. The Pacific Fleet is currently composed of about 149,000 military personnel and operates 249 ships.

The operations of ships and units are controlled through numbered fleet commanders. The administration of men, money, and material is controlled through air, surface, submarine, and logistics management headquarters called type commands.

GAO reported to the Appropriation Committees that Pacific Fleet Headquarters and the type commands perform many similar types of work.

The Department of the Navy said it disagreed that there may be better ways to organize the Pacific Fleet. (FPCD-76-98, Feb. 4, 1977.)

#### Appropriations

Military Personnel (Navy).  
Operation and Maintenance (Navy).

#### Appropriation Committee Issue

The number of military personnel in the Pacific could be reduced if the Navy's Pacific organizational structure

was streamlined through consolidations and/or cutbacks in functions and/or eliminating some headquarters

Clothing Maintenance Allowance  
For Enlisted Military Personnel

Departments of the Army, Navy, and Air Force

The authority to prescribe the quantity and kind of clothing or clothing allowance to be furnished to enlisted military personnel has delegated by the President to the Secretary of Defense in Executive Order 10113, February 24, 1950. In fiscal year 1976, the Department of Defense (DOD) spent approximately \$298 million on initial clothing, issues and subsequent allowances for enlisted members of the armed services.

GAO reported to the Secretary of Defense that aspects of the clothing maintenance allowance have remained unevaluated and unchanged since the early 1950s. Consequently, methods of determining and paying the allowance provide some enlisted members more funds than necessary to replace wornout clothing during their active duty service. GAO believes the clothing maintenance allowance should be only a reimbursement for necessary expenses and recommended that methods of determining the allowance be refined to provide closer alignment with actual replacement expenses.

Defense responded that efforts to refine and improve the system will continue as new or more reliable data becomes available. However, Defense justified current methods of setting clothing maintenance allowance rates by providing an analysis of clothing replacement costs and requirements which contended that the present system does not provide more funds than are required to replace wornout clothing.

GAO examined the analysis and forwarded to Defense figures which show that under the present system some members do in fact receive more funds than necessary to replace wornout clothing. (FPCD-77-35, Mar. 7, 1977.)

Appropriation

Military personnel (Army) (Navy) (Air Force).

Appropriation Committee Issues

Savings can be realized by improving the methods used to calculate clothing maintenance allowance rates.

The present system of paying the allowance provides some enlisted members more funds than are necessary to replace wornout clothing during their active duty service. The Department of Defense should refine methods of arriving at allowance rates to insure alinement with actual replacement expenses.

### Military Compensation Should Be Changed to Salary System

#### Department of the Army, Navy, and Air Force

GAO reported to the Congress that the purpose of military compensation is to assist the services in successfully competing with other employers for personnel they require. The base pay and allowances system is an inefficient means of supporting this objective and should be replaced by a salary system. GAO recommended that the base pay and allowances system be replaced by a salary system and the executive branch be directed to draft and submit conversion proposals and establish milestones for converting.

The Department of Defense agreed that many advantages existed for converting to a salary system but believed the disadvantages outweighed the advantages. GAO did not agree with the disadvantages cited. Defense is awaiting the recommendation of the recently appointed Commission on Military Compensation (report due Mar. 15, 1978) before taking a position on changes to the form of military compensation. (FPCD-77-20, Aug. 1, 1977.)

#### Appropriation

Military personnel (Army) (Navy) (Air Force) (Marine Corps).

#### Appropriation Committee Issues

1. Military compensation is complicated, and individuals being compensated cannot easily determine their pay; regular military compensation was underestimated by 40 percent of enlisted personnel and 20 percent of officers. Clearly, compensation which is not recognized does not help to attract and retain personnel and is an inefficient use of compensation resources.

2. The base pay and allowance system is inequitable. Compensation is greater for married members than for single members of the same grade and length of service even if their duties, qualifications, and performance are equivalent.
3. The base pay and allowance system conceals the cost of military personnel through the provision of goods rather than cash and particularly through tax advantage, which is not reflected in the Defense budget but is a cost to the Government reflected in reduced Federal income tax revenue.

### Management of Automatic Data Processing Personnel

#### Department of the Navy

Half of the Navy's \$388 million automated data processing (ADP) budget for fiscal year 1976 is estimated to relate to personnel costs. If the Navy is to reduce its ADP costs, it must take steps to manage its ADP personnel effectively.

GAO reported to the Secretary of Defense that responsibility for ADP personnel is diffused throughout the Navy and that the Navy had no central guidance or direction on how to staff or structure ADP organizations.

The diffusion is so great that, for example, even within Naval Sea Systems Command (NAVSEA), management of ADP personnel is fragmented. NAVSEA has not issued guidance on the size, composition, and direction of central design activities. Control over the shipyard management information system is scattered among eight shipyards and several NAVSEA offices.

The Department of the Navy said it agreed with some of GAO's recommendations and had started or would start to implement them. However, the Department disagreed with other GAO recommendations, especially those concerning improved management of central design activities. (FPCD-77-73, Aug. 30, 1977.)

#### Appropriations

Military Personnel (Navy).  
Operation and Maintenance (Navy).

## Appropriation Committee Issues

The number of military and civilian ADP personnel could be reduced if the structure of ADP organizations was tied to workload.

## Standards for Staffing Support Activities

### Departments of the Army, Navy, and Air Force

About 1.7 million military and civilian personnel work in support activities of the Department of Defense. Due to increasing personnel costs, it has become vital that staffing requirements for these people be credible, supportable, and visible.

GAO reported to the Congress that, except for the Air Force, the services have been very slow in developing staffing standards based on work measurement techniques. GAO attributes this condition to the low priority and low management emphasis the Department of Defense has given the program.

Defense and service officials have agreed with GAO's recommendations, but little corrective action has been started. (FPCD-77-42, Sept. 29, 1977.)

## Appropriations

Military Personnel (Army) (Navy) (Air Force).  
Operation and Maintenance (Army) (Navy) (Air Force).

## Appropriation Committee Issues

The number and cost of military and civilian personnel in Defense support activities could be reduced and/or applied more effectively if workload-related standards were used to support budget staffing requests. In addition, these techniques should prove useful in the budget process.

## Enlisted Career Force Management

### Departments of the Army, Navy, and Air Force

On June 30, 1976, the armed services had about 28,000 more career enlisted personnel--those with more than 4 years of service--than called for in their enlisted force management plans. These people caused higher active enlisted personnel costs of about \$253.2 million. Pay and allowances

for active careerists eligible to retire account for at least \$116.4 million of this cost.

GAO reported to the Congress that management improvements could bring the career force into balance with the objectives earlier than the 7 to 10 years planned by Defense. Ways should be developed to measure the effectiveness of career force objectives on a cost-benefit basis.

The Department of Defense agreed with GAO's recommendations except for accelerating the development and application of career force objectives. (FPCD-77-42, Sept. 29, 1977.)

### Appropriations

Military Personnel (Army) (Navy) (Air Force).  
Operation and Maintenance (Army) (Navy) (Air Force).

### Appropriation Committee Issue

The number and cost of active military career personnel could be reduced and/or applied more effectively if the enlisted career force was related to specific needs.

## MOBILIZATION

### Management of Department of Defense Industrial Plant Equipment Can Be Improved

#### Department of Defense

The Department of Defense owns industrial plant equipment costing about \$5.4 billion, which GAO believes is more than may be needed for peacetime and mobilization requirements.

GAO reported to the Congress that the military services (1) have understated the number of hours that machines will be run in a mobilization, (2) do not have practical systems for translating mobilization requirements into industrial plant equipment needs, and (3) seem to lack confidence in the validity of the stated requirements. Navy activities are not even told what their mobilization requirements are.

The Department of Defense agreed with GAO's recommendation on standardized instructions for similar commodity areas. It advised us of actions being taken by the Army to provide

standardized planning guidance and said that it will reassess existing criteria for Navy shipyards and Air Force depot maintenance centers to determine the need for publication of criteria in other planning guidance documents. Defense also agreed to consider centralizing the responsibility of all or part of plant equipment management as it relates to Government-owned and operated facilities. (LCD-76-407, Oct. 5, 1976.)

### Appropriations

Operation and Maintenance (Army) (Navy) (Air Force).  
Procurement (Army) (Navy) (Air Force).

### Appropriation Committee Issue

A strong central manager of Department of Defense industrial plant equipment is needed to manage an adequate equipment reserve and to obtain maximum use of equipment.

### Restructuring Needed of the Department of Defense Program for Planning with Private Industry for Mobilization Production Requirements

#### Department of Defense

A viable industrial base is a major element of our national strength and deterrent posture, and maintaining the capacity of that industrial base to respond to potential wartime demands continues to be a major consideration in our defense planning. GAO reported that the present Department of Defense mobilization planning program with private industry does little to strengthen U.S. industrial capacity to meet emergency requirements. Planning data often lacks adequate analysis, and little is done by the services to correct problems when such an analysis is performed. Consequently, the program's credibility with industry has been lost. GAO recommended that the Secretary of Defense restructure the Department of Defense Industrial Preparedness Planning program, taking into consideration these issues:

- What priority does maintaining an industrial mobilization base have in the overall defense strategy?
- What level of resources can be committed to this effort?

--What can be accomplished within this level of resources?

Two important alternatives that should be considered in restructuring the industrial preparedness planning effort are

--individual item planning limited to what can be accomplished with available resources and

--industrywide planning to examine the basic structure of key sectors of the defense industry and its related capacity--again limiting the scope to what can be done within the established funding commitment.

The Department of Defense generally concurred with GAO's findings and had started a reevaluation of the program. That reevaluation should be completed in March 1978. (PSAD-77-108, May 13, 1977.)

#### Appropriations

Procurement (Army) (Navy) (Air Force).  
Operation and Maintenance (Army) (Navy) (Air Force).

#### Appropriation Committee Issues

1. The Committees should determine the level of funding appropriate for maintaining industrial mobilization base.
2. Determine the results of the reevaluation and the funding measures proposed by Defense.

#### Challenges to Reducing Government Equipment in Contractors' Plants

##### Department of Defense

In March 1970, the Department of Defense announced a 5-year program to generally phase out the use of in-place, Government-owned facilities in the possession of contractors.

GAO reported to the Chairman, Legislation and National Security Subcommittee of the House Committee on Government Operations on the Department's efforts to reduce the amount of equipment at contractor-owned plants and the problems in removing the equipment. While some progress has been made, total phaseout cannot be achieved under current policies and procedures.

Uncertainties about authority to dispose of Government equipment by negotiated sale to contractors and past lack of incentives for contractors to invest in capital equipment have detracted from the phaseout program's success. In addition, to prepare for possible wartime production expansion, Defense must keep some Government-owned equipment at contractor plants.

Control over contractor's use of Government-owned plant equipment needs to be strengthened. Defense must be more aggressive in obtaining contractor compliance with regulations and must improve its administration of contracts to protect the Government's interests.

As directed by the Committee, GAO did not follow its usual procedure of obtaining agency comments on its recommendations for corrective action. (LCD-77-417, Sept. 15, 1977.)

#### Appropriations

Operation and Maintenance (Army) (Navy) (Air Force).  
Procurement of Ammunition (Army).

#### Appropriation Committee Issue

The Congress should clarify the authority of the General Services Administration to negotiate sales of nonexcess, Government-owned equipment solely to the holding contractor.

#### NATIONAL PRODUCTIVITY

##### Improvements Needed In Defense's Efforts To Use Work Measurement

##### Department of Defense

The Department of Defense is one of the largest single users of work measurement. The military services employ some 4,483 work measurement personnel at an annual cost of \$58 million.

GAO found that the services were not providing leadership in this area. For the last 10 years emphasis has been on the depot-level activity, which is highly susceptible to coverage. However, improvements are needed in this area as well as other areas not covered by work measurement. Specific recommendations were to:

- Establish reporting system to evaluate work measurement in Defense.
- Monitor services' actions to insure adequate attention to resources allotted to work measurement.
- Have services realine work measurement functions to foster more independence.
- Survey other than industrial type areas for work measurement applications. (LCD-76-401, Aug. 31, 1976.)

### Appropriation

Operation and Maintenance (Army) (Navy) (Air Force).

### Appropriation Committee Issue

Until the Secretary of Defense provides strong leadership in the direction and control of these efforts, the potential value of work measurement in the services will not be realized.

### A Focal Point Is Needed to Coordinate the Services Efforts To Apply Source Data Automation in Industrial Activities

#### Department of Defense

Technology is being developed and refined to permit more efficient and timely reporting of shop floor activities into industrial data processing systems. Proper use of this technology, called source data automation, can improve industrial productivity through aiding computer-directed process controls, improving scheduling, and giving better visibility over materials inventory.

While some activities are using source data automation, in general they have not been able to systematically share pilot study results beyond the command level, and they have had difficulty with justification criteria and procurement of equipment. Others have had difficulty keeping up with the technology and identifying good applications.

In a report to the Department of Defense, GAO recommended that the Secretary of Defense designate a group to serve as a focal point for coordination of the services' use of source data automation. This group should assist the National Center

for Productivity and Quality of Working Life in its efforts to diffuse the technology.

The Department of Defense said that it agreed with GAO's recommendations and that it would consider the appropriateness of designating a focal point that could provide an overview on all aspects of source data automation to assure the proper interfaces with nonindustrial source data automation activities. (ICD-77-441, Sept. 23, 1977.)

### Appropriation

Operation and Maintenance (Army) (Navy) (Air Force).

### Appropriation Committee Issues

1. Coordination is needed to insure that industrial source data automation is developed and diffused in the military services in an economical manner.
2. Resources must be available to the Department of Defense to facilitate the diffusion of productivity which should improve industrial technologies.

### READINESS

#### Another Look At The Readiness Of Strategic Army Forces

##### Department of the Army

The Army maintains certain active units in the United States which are to be constantly available on short notice for deployment in an emergency--either to reinforce and support forces stationed overseas or to be deployed elsewhere to support national commitments. These units, the strategic Army forces, consisted of eight divisions and three brigades at the time of GAO's review. Three new divisions are being formed.

GAO first reviewed the readiness of these forces in 1971 when they had four and one-third divisions. GAO's report "Need for Improvement in Readiness of Strategic Army Forces" (B-146896, May 8, 1972) concluded that it would be difficult for these forces to deploy quickly and at full strength because many units were not combat ready. Much of their equipment was not kept up and repair parts were in short supply. High turnover of personnel and a lack of qualified personnel were other problems.

This followup review disclosed that it is still doubtful that strategic Army forces could deploy quickly and in a fully combat-ready condition. Although these units were reporting much higher readiness ratings than before, readiness reports were inaccurate, and therefore did not provide a realistic basis for evaluating the units.

The Army generally agreed with GAO's findings, conclusions, and recommendations and advised GAO of actions taken or being taken to alleviate funding, personnel, training, and readiness reporting conditions as reported. (LCD-76-457, June 9, 1977.)

### Appropriations

Procurement (Army).  
Operation and Maintenance (Army).  
Military Personnel (Army).

### Appropriation Committee Issues

1. Today, all Army divisions are competing for the limited resources available.
2. If limits on resources continue, alternatives should be selected which would guarantee that forces which are ready for combat and which can be deployed quickly will be available. Also, adjustments in deployment plans may be necessary after the Joint Chiefs of Staff complete their comparison of the transportation resources needed to deploy strategic forces versus those available.

### Foreign Military Sales--A Potential Drain on the U.S. Defense Posture

#### Department of Defense

GAO reported to the Congress that foreign military sales have increased almost tenfold from 1970 to 1976. This rapid increase in sales has, on one hand, been at the expense of the U.S. forces; on the other, it has helped maintain employment and has reduced the costs of some weapon systems.

Of equal importance, these sales have created large inventories of U.S. articles in foreign lands. However, there is no experience to suggest that the future support of both foreign and U.S. inventories can be accomplished with

the even-handedness necessary to avert a potential drain on the U.S. defense posture.

GAO recommends that the Secretary of Defense:

- To reduce the possibility that future foreign sales and deliveries may hinder the U.S. defense effort, require in all cases the inclusion of detailed impact statements in the foreign military sales decision-making process so that relevant information is not inadvertently omitted.
- Require that a supply support agreement or other mechanisms be a part of any sale, when it is feasible to do so, so that the Department of Defense can program and fund future support without adversely affecting U.S. defense capabilities.
- Develop a forecasting mechanism which will identify the probable quantities of future critical support items for U.S. and foreign sales customers, including long leadtime secondary items used in more than one weapon system. Such a mechanism will require a system that will couple existing foreign military sales data on sales and deliveries by country, weapon system, quantities, and delivery dates with current assets.

The Department of Defense said it agreed with our recommendations and would implement them. (LCD-76-455, July 25, 1977.)

#### Appropriations

Military Procurement (Army) (Navy) (Air Force).  
Operation and Maintenance (Army) (Navy) (Air Force).

#### Appropriation Committee Issue

Department of Defense actions are needed to insure that future commitments for foreign military sales and deliveries are known in advance and do not adversely affect deliveries to U.S. forces.

U.S. Military Command  
Structure in Europe

Department of Defense

The United States participates in two commands in Europe --its own and NATO's Allied Command, Europe. The U.S. and NATO command structures are similarly organized and have basically the same overall mission--to provide a combat-ready force to deter aggression from the Warsaw Pact nations. The close relationship of the two commands is best illustrated by (1) several U.S. commanders also being NATO commanders, (2) NATO assuming operational command of U.S. combat forces in a NATO war, and (3) NATO being heavily staffed with U.S. personnel in peacetime.

The increasing independence of NATO members underscores the need for a NATO command that can respond quickly in the event of an attack by the Warsaw Pact forces. Transition from a peacetime to a wartime structure should require minimal change. The only practical way to accomplish this is through the close integration of the command structures of the NATO members' forces and the NATO command structure.

GAO reported that there are at least two alternatives that should be considered in analyzing the U.S. command structure in Europe--alternatives that could improve U.S. participation in NATO and reduce the management layering that now exists. These alternatives are:

- Integrate the U.S. unified command with NATO's Supreme Headquarters, Allied Powers, Europe.
- Integrate component commands and the United States European Command.

GAO recommended that the Secretary of Defense reexamine the U.S. command structure in Europe and make changes as necessary to insure that the structure is optimally organized to perform its primary wartime mission. The examination should include evaluation of the potential benefits--both to U.S. staffing and a strengthened NATO--of taking the leadership in giving NATO greater authority and control over peacetime logistics support to facilitate the transition to and effectiveness of wartime activities.

GAO further recommended that the Secretary of Defense also take a leadership role in encouraging a multilateral study to identify ways in which closer integration of the

command structures of all the NATO members forces with the NATO command structure can be achieved. (LCD-77-419, Aug. 26, 1977.)

The Secretary of Defense supports the report's general conclusion that greater integration of national and NATO headquarters could facilitate peacetime command and control while improving NATO's ability to convert to wartime operations.

### Appropriation

Military Personnel (Army) (Navy) (Air Force).

### Appropriation Committee Issue

Closer integration between the command structures of all NATO member forces and the NATO command structure would ease the transition from peace to war as well as improve the command structure effectiveness.

### U.S. Lethal Chemical Munitions Policy: Issues Facing the Congress

#### Department of Defense

Current U.S. defense policies require a chemical munitions stockpile to deter and retaliate for enemy chemical attacks. The Department of Defense considers the existing stockpile inadequate and wants to upgrade it with new munitions. The Congress will need to address several issues before deciding whether to fund a program to maintain or upgrade the U.S. chemical stockpile.

The report provides information on the following issues facing the Congress:

- What is the chemical warfare threat to the U.S. forces?
- Why does the United States retain chemical munitions?
- What chemical munitions are needed?
- What new chemical munitions are being developed?
- What constraints would affect the timeliness of a U.S. chemical retaliation?

GAO recommends that, as long as the United States has a chemical stockpile, the Secretary of Defense develop and document procedures for using the stockpile that maximize its deterrent effect.

The Department of Defense agreed with GAO's recommendation, but stated that there are many constraints placed on the Department in implementing the recommendation. The constraints include arms control negotiations and political and legal considerations. If the Department of Defense finds that these constraints prevent it from implementing the recommendation, GAO believes that the need to continue maintaining a chemical stockpile should be reevaluated. (PSAD-77-84, Sept. 21, 1977.)

#### Appropriations

Procurement (Army) (Navy) (Air Force).  
Military Construction (Army).

#### Appropriation Committee Issues

1. Determine whether Defense has adequately substantiated the chemical threat and, if so, if chemical munitions are the appropriate means for deterring the threat.
2. Determine whether the proposed changes in the U.S. chemical warfare policy have been fully coordinated.
3. If chemical munitions are appropriate to deter chemical warfare, determine the appropriate size, composition, and location of the U.S. and NATO chemical stockpiles.
4. Determine whether the planned distribution of chemical munitions will permit a timely response.
5. Note. Other issues are classified.

## REQUIREMENTS

### The Air Force Could Reduce War Reserve Requirements of Spare and Repair Parts for Combat-Ready Units

#### Department of the Air Force

The Air Force maintains spares and repair parts for aircraft and equipment as part of its war reserves. Included, for the most part, are major avionics assemblies which can be removed and replaced by maintenance personnel on the flight line. Through fiscal year 1975 the Air Force investment in such war reserves was \$618 million.

GAO recommended that the Secretary of Defense evaluate the reasonableness of the Air Force's practice of providing a 30-day supply of spares and repair parts for units to deploy overseas, giving consideration to the fact that units already deployed in Europe are provided fewer supplies based on an air resupply standard of 17 days.

GAO proposed other alternatives to reduce war reserve spares and repair parts requirements, such as

- deploying with additional maintenance equipment and personnel for more effective onsite repair capability,
- establishing a central repair capability in the theater of operations to use field maintenance equipment and personnel more effectively, and
- relying on U.S. depots and existing field maintenance capabilities at U.S. bases for increased maintenance support.

GAO also called attention to the Air Force's need to resolve numerous discrepancies between the quantities of war reserve spares and repair parts reported by combat units and those authorized by the Department of the Air Force. (LCD-75-144, Aug. 27, 1976.)

#### Appropriations

Operation and Maintenance (Air Force).  
Procurement (Air Force).

## Appropriation Committee Issues

The cost of acquiring war reserves has increased greatly, and the cost of acquiring stocks to meet the requirements computed by the Air Force far exceeds available funds. Requirements for spares and repair parts can be reduced while still providing effective support.

## Using Aviation Resources In The United States More Efficiently

### Departments of the Army, Navy, and Air Force

The Federal Government spends over \$865 million annually through the Departments of Commerce, Defense, and Transportation to support aviation in the United States. These Departments provide a vast amount of information, service, and logistical support such as communications, weather information, navigational support, maintenance, fueling services, personnel needs, and flight route information to insure aircraft safety from departure to arrival.

GAO reported to the Congress that the three Departments provide overlapping services. For example, each is involved in disseminating weather information and the Departments of Defense and Transportation are involved in airspace management requiring large investments in similar navigational air equipment and personnel skills.

GAO recommended that the Departments emphasize at the highest level sharing of assets interdependence and coordination of aviation requirements to assure economy and efficiency and to reduce cost.

Defense said that it agreed with GAO's recommendation for more effective coordination and has tasked the Chairman of the Department of Defense Advisory Committee of Federal Aviation to advise the Federal Aviation Administration and Department of Commerce that the Advisory Committee is the Defense activity responsible for the coordinating and planning recommended in the GAO report. (LCD-76-445, Mar. 31, 1977.)

## Appropriations

Military Personnel (Army) (Navy) (Air Force).  
Operation and Maintenance (Army) (Navy) (Air Force).

## Appropriation Committee Issue

Equipment acquisition, facilities operation, and maintenance cost could be reduced through consolidation and joint use of military and civil capabilities.

## Stockage of Spare Operating Equipment By Army Maintenance Activities

### Department of the Army

The Department of the Army requires its depot and field maintenance activities to stock spare operating equipment, such as tanks, helicopters, and tractors, for use by combat and noncombat units that return unserviceable equipment for repair or overhaul. Equipment bought for this purpose is called "maintenance float" and is valued at \$966 million.

In a report to the Congress GAO questioned the need for about \$62 million of maintenance float for noncombat units primarily because these units are often collocated with combat units having similar or identical equipment which could be pooled.

GAO also reported that the Army had not verified maintenance float requirements for combat units since 1971 and that \$23 million of this equipment exceeded stated needs when measured against available performance standards.

The Army generally agreed with the findings discussed in the report but said that it would await the results of its own studies currently underway before making any adjustments to its maintenance float requirements. (LCD-76-442, Apr. 5, 1977.)

## Appropriation

Procurement (Army).

## Appropriation Committee Issues

1. Procurement costs could be reduced in those instances where noncombat units can share maintenance float with collocated combat units.
2. Procurement costs could be reduced by making more frequent assessments of maintenance float requirements for combat units and basing such requirements

on realistic performance standards rather than on actual production performance.

Emergency Power Generators Used And  
Managed Inefficiently By The Department  
of Defense

Departments of the Army, Navy, and Air Force

Most military installations have emergency backup generators to keep essential equipment and activities--such as air craft navigational aids, fire stations, command posts, and hospitals--operating when normal power sources fail.

The Department of Defense has invested large sums for emergency power generators. A large part of this investment is in permanently installed, rather than mobile, generators. The Department also uses mobile generators in emergencies. Most are purchased for tactical purposes, but several are used for backup power.

GAO reported that the Department needed to:

- Provide criteria for determining which users should have priority access to emergency power and how the needs of these users can best be met.
- Strengthen the process for reviewing and justifying the need for all generators. This will permit (1) the initial need for a generator to be adequately justified, (2) those users which can be serviced by smaller generators to be identified, and (3) generators no longer necessary to be made available to other users.
- Instruct installations to share generators, when appropriate, as an alternative to buying or retaining unnecessary generators.

The Department believed GAO's recommendations merited consideration and is reviewing criteria standardizing the authorization and use of emergency power for specific facilities.

However, the Department indicated that GAO's report should have recognized basic differences between tactical mobile generators and auxiliary electrical power systems, readiness requirement during mobilization or national emergencies, and degrees of criticality or reliability of these systems. (LCD-77-406, May 20, 1977.)

## Appropriations

Military Construction (Army) (Navy) (Air Force).  
Operation and Maintenance (Army) (Navy) (Air Force).

## Appropriation Committee Issue

The Department of Defense needs a management system which guarantees that emergency power needs are justified, and it could save large sums of money if such needs were consolidated as appropriate.

## If Defense and Civil Agencies Work More Closely Together, More Efficient Search/Rescue and Coastal Law Enforcement Could Follow

### Departments of the Navy and Air Force

Coordination among several Federal services for search and rescue operations is provided for under the National Search and Rescue Plan. If this plan were sufficiently adhered to, which it is not, substantial savings could be realized.

This could be done by greater sharing of aircraft, crews, support facilities and equipment among the Air Force, the Navy, and the Coast Guard in meeting their cooperative responsibilities under the National Search and Rescue Plan. Excellent opportunities exist for sharing of resources which would result in less total resource requirements and more efficient use of Federal aircraft, ships, and personnel.

GAO found that the Air Force, Navy, and Coast Guard compute their own search and rescue requirements independently without adequately considering available assets of the others in the plan. The result is an overabundance of aircraft, people, and equipment devoted to search and rescue missions.

GAO recommended to the Secretaries of Defense and Transportation that they.

--Direct the military services and the Coast Guard to determine jointly total search and rescue aircraft requirements for both peacetime and wartime.

--Direct the military services and the Coast Guard to begin joint effective use of search and rescue

aircraft, including stationing, training, personnel staffing, and future deployments.

Both Defense and Transportation disagreed with GAO's recommendations. Defense said its search and rescue assets are maintained to support military forces. Civil search and rescue missions are and will be done, but on a basis of noninterference with military operations. The Coast Guard disagreed on the basis that it has statutory responsibility for civil maritime search and rescue.

GAO does not believe the intent of the National Search and Rescue Policy was to place higher priority on military than on civil search and rescue missions, nor that the Coast Guard's statutory responsibility precludes use of other available Federal assets. (LCD-76-456, May 26, 1977.)

#### Appropriations

Operation and Maintenance (Navy) (Air Force).  
Military Personnel (Navy) (Air Force).  
Aircraft Procurement (Navy) (Air Force).

#### Appropriation Committee Issue

Costs of search and rescue operations could be reduced if the military services and the Coast Guard made greater efforts to implement the National Search and Rescue Policy.

#### The Air Force Can Reduce Inventories By Eliminating Unneeded Stock Levels

##### Department of the Air Force

Air Force policy allows bases to stock spare and repair parts for any part which fails at least twice in 12 months. Items kept in stock by demand usually satisfy immediate needs. Yet the Air Force does allow bases to store parts whose need is not based on prior uses. These stock levels are called special levels.

Although the Air Force has studied, audited, and acted on special levels several times, they continue to represent a considerable investment. On June 30, 1975, the Air Force's special level requirement for reparable items was \$272 million.

The Air Force's current requirement for adjusted special levels could be reduced further by relying more on the item manager to manage the item throughout the entire Air Force supply system, redistributing assets when needed, instead of establishing another stock level.

The item manager should play a greater role in the special level review and approval process, because he is in the best position to determine whether the worldwide requirement for reparable items at all supply echelons is sufficient to keep requirements at a minimum. Supply officials at the base level are not in a position to determine this. The key issue is whether the Air Force has the right number of items and can obtain them within prescribed times.

The Air Force feels that GAO did not specify which stock-age system was being discussed--the base level or the wholesale requirements computation system--in making the recommendations. The Department of Defense, however, replied that the actions recommended in the final report are fully consistent with its objectives of minimizing special stock levels and enhancing the item manager's worldwide responsibility for using available assets. (LCD-76-425, June 17, 1977.)

### Appropriation

Procurement (Air Force).

### Appropriation Committee Issues

Air Force supply requirements should be viewed in terms of one system, with the item manager knowing the location of all assets, whether stocked at the wholesale level or at bases worldwide. The Air Force should start taking aggressive action to reduce unneeded stock levels and should spend its money on items in the system frequently used for aircraft operational problems.

### Methods Used For Determining Conventional Ammunition Requirements

#### Department of Defense

In response to a request from the Chairman, House Committee on Appropriations, GAO reviewed the military services' methods for determining conventional ammunition requirements.

Each year, the Secretary of Defense issues guidance to the military services for developing their procurement

programs. In 1976, the Secretary issued guidance which provided for a longer period of logistics planning in Europe and a shorter period in Asia. This change from previous years' guidance--attributed to changes in the world situation--resulted in increased U.S. requirements for ammunition.

Other issues not mentioned in the guidance cause military services to develop their own assumptions, which creates imbalances in their planning. For example, the guidance did not address differences in logistics planning periods between the United States and our allies.

GAO recommended ways for improving the methods used for determining conventional U.S. ammunition requirements for the war reserve stockpile. As directed by the Committee, GAO did not follow its usual procedure of obtaining agency comments on its recommendations for corrective action. (LCD-77-401, July 20, 1977.)

#### Appropriation

Procurement of Ammunition (Army) (Navy) (Air Force).

#### Appropriation Committee Issue

In considering the Department of Defense request for procurement of ammunition, the Committee should:

- Query the Department of Defense for an evaluation of the U.S. military posture in Europe relative to allied capability.
- Discuss the implications of substituting precision-guided munitions to support an Asian scenario.
- Discuss with Navy officials whether or not the practice of adding shipfill requirements to the war reserves stockpile is valid.

#### The Navy's Multimission Carrier Airwing-- Can The Mission Be Accomplished With Fewer Resources?

##### Department of the Navy

The Navy is converting 12 of its 13 aircraft carriers into multimission carriers. Each of the carriers will have enough aircraft to be self sufficient for optimized sea control and power projection missions. To change from a

carrier deckload optimized for sea control to one optimized for power projection, each carrier is provided a flexibility component of several suitable aircraft to exchange between the carrier and shore bases.

GAO reported to the Congress that the Navy has options other than to provide each carrier with a shore-based flexibility component of basically attack aircraft by outfitting each carrier with sufficient aircraft necessary to perform the primary mission of sea control. Sea control airwings are expected to be required under the Navy's worst case scenario, and such airwings have the aircraft needed for the collateral power projection mission. Aircraft source options available to the Navy which could provide the necessary flexibility to optimize carrier deckloads for power projection are

- aircraft of other carriers,
- aircraft assigned to carriers undergoing extensive overhaul,
- carrier-deployable aircraft operated by the Marine Corps,
- the Navy and Marine Corps Reserve airwings,
- a pool of aircraft established for flexibility, and
- highly capable training aircraft.

GAO estimates that it costs the Navy from \$90 million to \$124 million a year to operate the over 100 aircraft, including support aircraft, contained in flexibility components. Acquisition costs for the flexibility components and their modernization could amount to from \$600 million to over \$1 billion, depending on the particular aircraft type in question.

The Navy did not agree with GAO's recommendation that it reassess the total aircraft requirements for multimission aircraft carriers and determine the minimum number of aircraft required for each carrier and how to best satisfy the mission with the least resources. (LCD-77-409, Sept. 12, 1977.)

## Appropriations

Military Personnel (Navy).  
Operation and Maintenance (Navy).  
Procurement (Navy).

## Appropriation Committee Issue

In view of the alternatives available to the Navy to provide the flexibility to adjust the carrier deckload, justification for procurement of the additional aircraft comprising the flexibility component is needed.

Should the Congress decide that, notwithstanding the alternatives, each of the multimission aircraft carriers should have its own unique airwing including the flexibility component, then the Congress should defer appropriating funds for aircraft in excess of the basic sea control airwing requirements until the Navy demonstrates to its own and congressional satisfaction that it can efficiently and effectively operate the entire multimission airwing from the carriers under simulated combat conditions.

## STOCK FUNDS

### The Department of Defense Should Increase Efforts To Implement Vertical Controls Over Military Stock Funds

#### Department of Defense

The Department of Defense provides policy guidance over five stock funds. In a 1974 report GAO recommended that the Secretary of Defense require the military services to use the vertical stock fund concept. The Chairman of the Senate Appropriations Committee requested GAO to follow up on this recommendation.

GAO found that both the Air Force and the Navy have implemented some vertical controls but not over all stock fund items. The Army has not implemented vertical controls over any part of its stock fund operation. The delay in implementing vertical stock funds results in larger stock fund capital needs.

In its report to the Senate Appropriations Committee, GAO recommended that the Secretary of Defense should:

- Develop an overall plan for improving logistics management and stock funding.
- Establish a system to assure that efforts of the military services and the Defense Logistics Agency are assessed for conformance with the coordinated long-range plan.
- Assure strong monitoring of the Defense Logistics Agency's assignment to develop a standardized computer system model and timely implementation of the Retail Inventory Management Stockage Policy in order to facilitate interservice vertical management. (LCD-77-437, Sept. 7, 1977.)

### Appropriations

Operation and Maintenance (Army) (Navy) (Air Force).  
Stock Fund (Army) (Navy) (Air Force).

### Appropriation Committee Issues

1. Failure to extend vertical controls over stock fund material results in longer resupply times. This causes greater stockage requirements, and consequently stock fund capital requirements are greater.
2. The Committee should consider what Defense is doing to correct these uneconomical practices when considering appropriations for stock fund capital.

### SUPPLY MANAGEMENT

#### Air Force Continues to Repair Parts When Serviceable Parts Are Available

##### Department of the Air Force

GAO reported to the Congress that the Air Force unnecessarily spends million of dollars to repair parts when more than sufficient quantities of serviceable parts are available to meet current needs.

The unnecessary repairs result because the Air Force does not have an effective system for identifying and matching available serviceable parts with parts scheduled for repair. Also, personnel responsible for managing replacement parts and parts repair schedules were not always familiar with

objectives and procedures for using available serviceable replacement parts, and management did not give adequate attention to establishing effective procedures to make sure that the replacements were used to preclude repairs.

The failure to use available serviceable parts to preclude repairs is a long-standing problem. GAO and the Air Force Audit Agency have issued several reports in the past on this matter. In each instance the Air Force agreed that unwarranted repairs had taken place, but effective action to remedy the problem did not ensue. The Air Force again plans several procedural and data system changes to alleviate the deficiencies cited by GAO. (LCD-77-202, June 7, 1977.)

### Appropriations

Procurement (Air Force).  
Operation and Maintenance (Air Force).

### Appropriation Committee Issue

Although the Air Force has promised corrective action, in view of the many years the problem has gone uncorrected it is obvious that the Air Force must take more vigorous action than it has in the past to make sure the improvements are properly implemented.

### SUPPORT FUNCTIONS

#### Millions Could Be Saved Annually and Productivity Increased If Military Support Functions In The Pacific Were Consolidated

##### Department of Defense

The Department of Defense established the Defense Retail Interservice Support (DRIS) program to promote effective use of interservice support thereby eliminating unnecessary duplication. Although GAO reported in 1972 that improvements were needed in the DRIS program, 3 years later the program was still not effective.

GAO found that in the Pacific (1) overseas coordinating groups responsible for identifying and proposing worthwhile opportunities for consolidation were, for the most part, ineffective, (2) local commands had prevented beneficial consolidations of support functions through parochial objections, and (3) the Secretary of Defense had not authorized the Pacific Commander clear-cut authority to direct consolidations of support functions over these narrow objections.

GAO reviewed selected military support functions in the Pacific and found that large savings and increased productivity could be realized, without impairing military missions, by consolidating the following support activities:

- The administrative aircraft support operation for the Army at Rankin Army Airfield, Camp Zama, Japan, and the Air Force operation at Yokota Air Base, Yokota, Japan.
- Several of the 25 equipment calibration facilities in Hawaii into a joint facility.
- Separate calibration facilities for each service in Okinawa.
- Separate civilian personnel offices for each service in Hawaii, Japan, and Okinawa into one joint office in each location.
- Two Army industrial gas production plants at Makiminato, Okinawa, and two Air Force gas plants at Kadena Air Base, Okinawa.
- Separate procurement offices for each service in Hawaii, Japan, and Okinawa into one joint office in each location.
- Separate base housing and household furniture management offices for all the services in Okinawa.
- The seven real property maintenance organizations in Hawaii into two organizations and the four organizations in Okinawa into one.
- Three automatic digital network terminals in Hawaii-- at Schofield Barracks, Wheeler Air Force Base, and Kunia Navy facility.
- The Army general cargo port at Yokohama, Japan, and the Navy port at Yokosuka, Japan.

Defense disagreed that the Pacific Commander needed directive authority and said that specific procedures were provided to resolve any disagreements on consolidations recommended by the Commander. Defense said the Army was taking the lead in drafting a proposed change to the joint regulation on interservicing that would incorporate any additional procedures deemed appropriate.

Defense also advised that some of the consolidations proposed by GAO had been made and others were being studied.

However, of the consolidations proposed only the following have been undertaken.

- Industrial gas plants in Okinawa were consolidated under the Air Force.
- Army and Air Force procurement offices in Japan and Korea were consolidated; the Navy continues to operate separately and separate service offices are maintained in Hawaii.
- The Wheeler Air Force Base automatic digital network facility was closed and its functions taken over by the Schofield Barracks Army terminal; the Navy terminal was eliminated due to closure of the Kunia communications facility.

Defense advised that staffing was greatly reduced at the Army cargo port in Yokosuka, Japan; however, even with reduced workloads, both cargo ports continue to operate. (LCD-75-217, Aug. 26, 1975.)

### Appropriation

Operation and Maintenance (Army) (Navy) (Air Force).

### Appropriation Committee Issue

The Committee should consider what is being done to achieve these proposed savings when considering future appropriations requests.

### Submarine Supply Support Costs Can Be Greatly Reduced Without Impairing Readiness

#### Department of the Navy

GAO reported to the Secretary of Defense that the Navy could reduce future investments in submarine support inventories by as much as \$106 million over a 5-year period by improving policies and procedures for establishing and maintaining optimum stock levels on submarines and tenders.

The Department of Defense agreed with a number of GAO's proposals for improvement and cited several actions taken or

planned by the Navy which should save about \$20 million. Defense did not, however, agree with three proposals for improvements which GAO believed could yield additional savings of \$86 million over a 5-year period. GAO feels that Defense's reasons for not agreeing with these proposals were not supported by data directly relevant to the situations dealt with in the report. (LCD-76-237, June 7, 1977.)

### Appropriation

Operation and Maintenance (Navy).

### Appropriation Committee Issues

The Navy's future 5-year investments in submarine support inventories could be reduced by as much as \$86 million if the Navy's policies and procedures for supply support of submarines were revised to provide for (1) placing greater reliance on current usage data when updating the rates used for replacing submarine equipment parts, (2) adoption of more stringent stocking criteria, and (3) limiting increases in stock levels to quantities based on actual usage.

### TRANSPORTATION

#### Adoption of Commercial Standards for Seat Spacing and In-Flight Food Service Would Reduce Contract Airlift Costs and Conserve Fuel

##### Department of the Air Force

GAO reported to the Congress that adopting commercial coach seat spacing on military charter flights would increase aircraft capacity, thus reducing the number of flights required. In fiscal year 1975, the Department of Defense spent about \$10.2 million on charter flights which could have been eliminated if commercial seating standards had been used. Eliminating these flights also would have saved about 8.4 million gallons of jet fuel. Adopting commercial standards for in-flight food service would further reduce charter airlift costs.

Such changes would be consistent with the provisions of the Federal Travel Regulations which in effect require Federal employees to use coach class service when traveling by commercial air carrier on official business.

The Military Airlift Command standard for seat spacing of 38 inches between rows is justified primarily on comfort of the military passenger. This standard was established in 1959 when slower piston-engine aircraft were used for passenger flights and flying times were much longer.

Department of Defense officials agreed to adopt commercial standards for in-flight food service but wanted to study the seat-spacing matter further. However, it should be noted that the Air Force performed a study in 1974 in which it also concluded that savings could be realized through adoption of commercial seat spacing. But, after some discussion between the military services, it was decided that the reduction in passenger comfort and convenience would override the advantage of cost and fuel savings, so the 38-inch standard was retained. (LCD-76-211, Oct. 5, 1976.)

#### Appropriation

Operation and Maintenance (Defense-wide).

#### Appropriation Committee Issues

Based on reaction to the earlier Air Force study, it appears unlikely GAO's recommendation will be adopted. However, GAO continues to believe commercial seating standards should be used. The Appropriations Committees should ascertain the status and results of the Department of Defense study. If commercial seating has not been adopted, the Committees should explore the reasons and ramifications with the Department of Defense.

#### Collection of Processing Fee From Space-Available Travelers

##### Department of Defense

About 2.8 million individuals traveled free on Department of Defense-controlled aircraft from fiscal year 1968 through the first quarter of fiscal year 1976. These individuals were active or retired military members and their dependents traveling worldwide for personal reasons on a space-available basis. The percentage of passengers traveling free on Department of Defense-controlled aircraft has increased from about 9 percent in fiscal year 1968 to about 24 percent in fiscal year 1975.

GAO's review at various military terminals showed that passengers traveling on a space-available basis comprise a significant portion of the passenger-processing workload. GAO did not attempt to identify the incremental costs involved in processing space-available passengers. However, on the basis of the average cost to process a passenger at military air terminals (\$17), the cost to process the 460,000 space-available passengers handled in fiscal year 1975 was about \$7.8 million.

GAO reported this matter to the Secretary of Defense. Copies of the report were also sent to the House Committee on Government Operations, the Senate Committee on Governmental Affairs, and the House and Senate Committees on Appropriations and Armed Services.

The Appropriation Committees subsequently recommended that Defense collect \$10 from space-available travelers to cover terminal processing costs. The 1978 Defense appropriation was reduced by \$3.5 million to give recognition to the recovery of this processing cost. (LCD-76-230, May 11, 1977.)

#### Appropriation

Operation and Maintenance (Defense-wide).

#### Appropriation Committee Issue

The committees should see that the processing charge is being collected.

#### Unauthorized and Questionable Use of Appropriated Funds to Pay Transportation Costs of Non-Appropriated-Fund Activities

#### Department of Defense

GAO reported to the Congress that the Department of Defense has improperly spent over \$7 million for transportation support that should have been funded by non-appropriated-fund activities. These improper expenditures were in addition to support authorized by the Department. Non-appropriated-fund activities (post exchanges, liquor stores, clubs and recreational facilities) provide members of the armed services with goods and services not furnished by the Government.

Reasons for these improper payments were:

- The Department's policy requires that merchandise purchased in the United States be moved at non-appropriated-fund expense to the port of embarkation nearest the overseas destination. This was not always done. Non-appropriated-fund activities saved land transportation costs by selecting ports closer to the merchandise sources, but appropriated-fund costs increased because of the longer ocean distances to the overseas destinations.
- Non-appropriated-fund activities did not always reimburse the Department for using the Defense Transportation System when appropriated-fund support was not authorized. Unreimbursed costs for the period 1964-76 totaled over \$7 million because reimbursable transportation account codes had not been assigned or properly charged. These codes are on the shipping documents and are the basis for determining who should be billed for transportation costs. The unreimbursed costs primarily related to the overocean transportation of foreign-made merchandise and personal property. After GAO brought the matter to Defense's attention, it billed the non-appropriated-fund activities for about \$3.6 million of these costs.
- The Navy financed overseas land transportation costs with appropriated funds. This practice was inconsistent with the Army's and Air Force's practices of not financing these costs.
- Foreign-made merchandise was shipped from New York to Hawaii by the Defense Transportation System at appropriated-fund expense. Defense permitted using these funds because U.S. customs duties and taxes had been paid on the merchandise. This practice is contrary to Defense's policy of promoting the sale of U.S. goods and services in overseas non-appropriated-fund activities. GAO believes this practice should be stopped.

The Department of Defense concurred with several of GAO's recommendations and has billed the exchanges about \$3.6 million, of which \$2 million has been collected. It has taken no action as yet to bill \$1.1 million of unreimbursed costs, does not concur that \$2.3 million spent for shipping foreign-made merchandise to Vietnam and Thailand should

be billed, and said that other issues were being studied. (LCD-76-233, June 3, 1977.)

### Appropriation

Operation and Maintenance (Defense-wide).

### Appropriation Committee Issues

The Committee should require Defense to

1. pursue collection of \$1.6 million billed but not reimbursed,
2. pursue collection of \$1.1 million as yet unbilled, and
3. justify reasons for not billing \$2.3 million spent for shipping foreign-made merchandise to Vietnam and Thailand for account of non-appropriated-fund activities.

### Improvements Needed to Fully Recover Transportation and Other Delivery Costs Under the Foreign Military Sales Program

#### Department of Defense

The Department of Defense has absorbed millions of dollars of transportation and handling costs which should have been recovered from customers under the Foreign Military Sales program.

GAO reported to the Secretary of Defense that controlling legislation requires the Government to recover all costs associated with the sale of material and services to foreign countries. This includes the costs for accessorial services provided after the sale. Accessorial services provided often include

- packing, crating, and handling costs for preparing material for shipment from storage or distribution points;
- inland transportation costs (by land, air, or waterways) in the United States or outside the United States, including parcel post;
- ocean transportation costs, including parcel post; and

--loading and unloading costs at ports of embarkation and debarkation.

In connection with airlift and sealift, the Department of Defense failed to recover millions of dollars because foreign customers were improperly billed for these services. In addition, customers were undercharged tens of millions of dollars for packing, crating, and handling services because Defense used unrealistic percentage surcharges to compute billings.

The Department of Defense may also be absorbing significant costs to replace and ship new items to customers who claim loss or damage of material purchased.

GAO recommended that the Secretary of Defense direct the Defense Comptroller to (1) discontinue using the percentage surcharge for transportation and port handling costs and to bill the actual costs and (2) increase the surcharge rate for packing, handling, and crating to cover actual costs. GAO also recommended that the Secretary of Defense establish task groups to review previous shipments and attempt to collect amounts underbilled. (LCD-77-210, Aug. 19, 1977.)

#### Appropriation

Operation and Maintenance (Army) (Air Force).

#### Appropriation Committee Issues

1. Transportation costs should be billed on an actual-cost basis.
2. Packing, crating, and handling percentage surcharges should be increased in an effort to more closely recover actual costs.
3. Receipts for material should be obtained from customers to refute loss and damage claims.

## CHAPTER 2

### MILITARY ASSISTANCE

#### DEFENSE COST-SHARING

##### The United States and Japan Should Seek a More Equitable Defense Cost- Sharing Arrangement

###### Departments of Defense and State

The United States has a major role in preserving peace and stability in Northeast Asia. Japan has prospered under the security provided by the U.S. defense umbrella and has developed into an economic superpower capable of assuming a greater share of common defense costs. Japan has made tremendous economic strides during the past decade and is the dominant economic power in Asia. Its impressive economic growth is reflected in its bilateral trade with the United States; while the United States maintained a favorable balance before 1966, Japan has enjoyed a trade surplus every year since then. Each year from 1968 through 1975, the U.S. trade deficit with Japan exceeded \$1 billion and cumulatively totaled \$15.8 billion during this period.

In comparing the continuously large U.S. bilateral trade deficits with Japan and the multibillion dollar cost of stationing U.S. forces in Asia with Japan's modest defense expenditures and tremendous economic capabilities, GAO concluded that the United States is justified in seeking increased Japanese support for the common defense costs. There are recognized political constraints on how far Japan can go, but a measurable level of increase should be possible.

A logical first step is to develop comprehensive objectives and priorities that meet U.S. interests. The goals of complementarity appear to offer a realistic approach in this direction. Although mutual cooperation is subject to mutual determination of how it will be achieved, the U.S. Government should establish its own position before holding discussions with Japan. Accordingly, GAO recommended that the Secretaries of State and Defense jointly reexamine possible cost-sharing methods and develop definitive plans for exploring additional cost-sharing opportunities with Japan. Important considerations include the

--missions, functions, or costs Japan can and should assume;

- impact on the U.S. military posture in Japan;
- possible U.S. cost savings or increased United States-Japan military capability; and
- target dates to discuss actions identified.

Positive U.S. action to initiate cost-sharing arrangements could lead to a more equitable sharing of common defense interests. Two potential areas are labor cost-sharing and joint use of defense installations. The recent decision to reconsider labor cost-sharing is encouraging, but no target dates for taking action have been set. GAO recommends that the Secretaries of State and Defense begin negotiations to implement a labor cost-sharing arrangement.

GAO also recommended that the Secretary of Defense review the use of military installations in Japan to identify potential joint-use candidates and then act to establish joint use of installations so identified. Underused Army installations would seem to be obvious joint-use candidates. The Departments of State and Defense both concurred with these recommendations. (ID-77-8, July 15, 1977.)

### Appropriations

Department of Defense:  
Operation and Maintenance (Army) (Navy) (Air Force)  
(Marine Corps).

### Appropriation Committee Issue

Development of burden-sharing plans could ultimately reduce the operations and maintenance expenses of maintaining U.S. troops in Japan.

### MILITARY AGREEMENTS

#### Observations on U.S. Military Presence and Base Negotiations in the Philippines

##### Departments of Defense and State

The Philippines is a major site of U.S. military deployments in Southeast Asia and the location of critical negotiations for a revised basing agreement. Similar basing agreements recently negotiated with Spain and Turkey involved sizable compensation packages and various restrictions on U.S. base operations. The Department of State said that the

new U.S administration expected to resume the negotiations initiated April 1976 after it had reviewed the situation and that the outcome of the review and eventual negotiating strategy could not be foreseen.

Since the Congress will likely be asked to approve a multiyear assistance program for the Philippines, GAO believes the concerned congressional committees should be given detailed briefings on the negotiations as they proceed so that congressional concerns are considered. The Departments of Defense and State did not comment on their plans to brief the Congress or report the results of a new agreement. We continue to believe our proposal should be adopted. We also recommend that this procedure be followed in future negotiations on other important foreign basing agreements to improve congressional oversight.

The Congress has refused to appropriate funds requested for major construction projects in the Philippines. The unresolved negotiations and uncertainty over the U.S. military tenure were considerations in the decision. However, construction is continuing under other appropriations. GAO expressed the opinion that the Secretary of Defense should (1) reevaluate each construction and base improvement program planned for the Philippines, including using minor construction and operations and maintenance funds for this purpose and (2) take action to postpone expenditures for projects not considered vital until the negotiations are satisfactorily resolved.

In response, Defense said that it has been closely reviewing the military construction efforts in the Philippines since June 1975 and has approved only those projects considered essential to the morale, welfare, or operational requirements of U.S. forces stationed there. Defense believed that its actions have been consistent with our proposal. (ID-77-5, July 1, 1977.)

### Appropriations

Department of Defense:  
Operation and Maintenance (Army) (Navy) (Air Force).

Department of State:  
Foreign Assistance

## Appropriation Committee Issue

Policy guidance is needed to insure that the base agreement eventually negotiated conforms to the national interest as defined by the Congress.

### MILITARY TRAINING

#### Cost of Training Granted to Foreign Students Under the Military Assistance Program

##### Department of Defense

Under the Foreign Assistance Act, the United States provided training to about 6,300 students from 43 countries at a recorded cost of \$23 million in fiscal year 1976.

To improve cost controls, reduce costs, and to make the program more effective, GAO recommended to the Secretaries of State and Defense that (1) all costs of training be recorded, such as military salaries and allowances, (2) recipient countries assume responsibility for paying transportation and living allowances, (3) they stress the need for foreign countries to better use their incountry language facilities, and (4) the Army and Air Force discontinue the U.S. maintenance and operation of the Canal Zone military schools through internationalization or closure, with the merging of essential programs with U.S. military programs in the United States as soon as possible.

The State Department generally agreed with our recommendations except it noted that it was premature to undertake further efforts toward internationalization of the Canal Zone schools, pending the outcome of the Canal Zone treaty negotiations with Panama. The Defense Department stated that training at the Canal Zone schools should continue and expressed the concern that assuming training costs by some participating countries will make the program too expensive, and consequently the countries will look elsewhere for training or needs will go unfilled. (ID-76-79, May 17, 1977.)

#### Appropriation

Foreign Assistance and Related Programs (Army) (Navy)  
(Air Force).

## Appropriation Committee Issues

1. The need to insure that all training costs are recorded in order for the Congress to know the full value of providing training to foreign military students and that the Defense Department make maximum use of cost-sharing training agreements with foreign countries.
2. The relationship of military schools in the Canal Zone to the outcome of the Canal Zone treaty with Panama.

## CHAPTER 3

### DEFENSE-RELATED ACTIVITIES

#### ACCOUNTING SYSTEMS

##### Many Accounting Systems Still Unapproved by the Comptroller General

###### Department of Defense

Under Section 113 of the Accounting and Auditing Act of 1950 (31 U.S.C. 66a), the head of each executive agency is responsible for establishing and maintaining accounting systems that conform to principles and standards prescribed by the Comptroller General. Section 112 of the act requires the Comptroller General to approve agency accounting systems when deemed adequate and in conformity. GAO reported to the Congress that as of September 30, 1976, only 52 percent of the accounting system designs of executive branch agencies had been approved as conforming to principles and standards prescribed by the Comptroller General.

Some Federal agencies have worked hard to establish good accounting systems to be approved by the Comptroller General. These include the Departments of Labor, Treasury, Commerce, and Transportation, which have all or most of their accounting systems approved. The Department of Agriculture is also pursuing a commendable program of accounting systems development, although its completion is several years away.

Until recently, the Department of Defense made little progress in obtaining approval of its systems. However, in the last 4 years 54 systems have been approved. Most of this remarkable progress has been in the Navy and the Air Force, with the Army and some of the Defense agencies making less progress.

Three departments--Interior; Health, Education, and Welfare; and State--have progressed so little that GAO is concerned whether they will have approved accounting systems in the near future. GAO approved a departmental system for the Department of Housing and Urban Development, but the Department has never completed the designs of its subsystems.

It is very important that agencies have approved systems in operation because such systems can produce the type of

financial information that agency officials and the Congress need to make financial decisions. The problems that can occur when good accounting systems do not exist have received considerable attention in the past year. The financial plight of New York City and the contribution of poor accounting practices to that situation are well known. Poor practices in unapproved accounting systems of the Department of the Army and the District of Columbia government were also reported to the Congress by GAO during the past year. In the Army's case over \$200 million in overobligation of funds occurred. In the District's case, the accounting was so unreliable that an outside certified public accounting firm called it "misleading, out-of-date and inaccurate." A good accounting system can prevent these kinds of problems.

GAO's report on Federal agency accounting recommended that, when examining budget requests and agency use of funds, the Office of Management and Budget and the Congress should make sure that the executive departments and agencies were devoting sufficient resources to qualify their accounting systems for approval by the Comptroller General. (FGMSD-77-21, Aug. 24, 1977.)

#### Appropriation

Operation and Maintenance (Army) (Navy) (Air Force)  
(Defense agencies).

#### Appropriation Committee Issue

In appropriating funds for agencies having unapproved accounting systems, the Committees should be certain that funds are included for qualifying the systems for approval by the Comptroller General.

#### BUDGETING

##### Discussion and Illustration of a New Concept

##### Department of Defense

There has been growing concern in and outside the Congress about the way the Federal budget is currently presented, the limitations it imposes on congressional review, and the lack of control over Federal programs. The common complaint with the present system is that the Congress gets a great mass of detail but not a coherent picture of what the money is for and why it is needed. Federal programs get underway

and are locked into predetermined solutions long before the Congress becomes aware of them or whether they are needed.

In a report to the Congress, GAO discussed a new concept called mission budgeting that has been proposed to alleviate these problems. GAO converted fiscal year 1978 budgets in the energy, defense, and space fields to illustrate how the new concept works.

Mission budgeting does not take away from the Congress the kinds of detail information it presently receives. Rather, it restructures the information so that budget activities are linked to needs and basic mission responsibilities of the agency. Budget activities would thus be organized by mission end purposes of the agency and the needs they serve. Activities would be funded not by the type of work involved but, instead, by what they are intended to accomplish.

Mission budgeting offers significant possibilities for improving the budgetary process because it opens up congressional review to the policy aspects, priorities, and assumptions underlying spending decisions. It also strengthens congressional control over Federal programs by funding, at the outset of a new program, a need instead of a program solution. This permits the Congress to assess the need and priority for a new program before the program acquires momentum and to fund the creation and exploration of the most promising solutions, as well as test demonstrations, before the Government gets locked prematurely into the largely uncontrollable costs of any one solution. Additional advantages seen for the new budget concept are:

- Clarifying mission responsibilities of the Federal agencies and keeping them relevant to national policies and needs.
- Achieving public accountability on the basis of end results, that is, in terms of the level of mission performance funded by the Congress.
- Having one budget system oriented to both executive and congressional needs.
- Providing a structural foundation to (1) coordinate or reorganize Government agencies and functions according to major end purposes and (2) implement "zero-base" budgeting and pending "sunset" legislation.

GAO recommended to the Congress that it begin to experiment with this new concept by testing its usefulness on a small scale. (PSAD-77-124, July 27, 1977.)

### Appropriation

All Federal agencies--defense and civil.

### Appropriation Committee Issues

Devising an approach to conducting an experiment of the new budget concept; one way of approaching the experiment is to:

- Select one or more agency missions or mission areas for experimentation.
- Arrange with an agency to make presentation.
- Form small committee task force with Congressional Budget Office staff support to
  1. work with agency and
  2. evaluate results.
- Approve in advance
  1. the experimental mission structure and
  2. mission budget outline.
- After committee budget review, convert back to traditional presentation for regular authorization/appropriation.

### Need for a Government-wide Budget Classification Structure for Federal Research and Development

#### Departments of the Army, Navy, and Air Force

GAO developed a proposed budget structure for presenting Federal research and development (R&D) funding requests to the Congress in a manner more directly related to specific national objectives. The structure was developed with the assistance of many Federal agencies. The Office of Management and Budget (OMB) with the assistance of 15 agencies conducted a test covering several major segments of the structure in late January and early February 1976 as a supplementary presentation to the President's Budget for 1977. OMB further indicated that it would be desirable to conduct a more

complete test through a dry run after the 1977 budget was submitted. Despite GAO's repeated offers of encouragement and assistance, OMB never conducted the full test of the structure which the Director proposed.

GAO believes that the proposed R&D structure is needed and further, that it is feasible. If properly implemented, the improved presentations could provide significant assistance to the Congress in its review of Federal R&D authorization and budget requests. This would affect OMB and all Federal agencies funding research and development. (PAD-77-14, Mar. 3, 1977.)

### Appropriation

Research and development (all agencies funding R&D).

### Appropriation Committee Issues

1. The supplementary presentation proposed for Federal research and development could facilitate assessment of the overall R&D budget of the Federal Government. It could also assist in establishing national R&D priorities and could further facilitate the identification of potential duplication of R&D efforts among the various Federal agencies.
2. Department of Defense and all Federal agencies should be requested to implement the proposed structure and provide the necessary information to OMB for use in developing a consolidated Government-wide submission to the Congress. The cooperation and assistance of all Federal agencies with research and development funding is essential for the successful implementation of this Government-wide effort.

### CIVIL PREPAREDNESS

#### Civil Defense: Are Federal, State, and Local Governments Prepared For Nuclear Attack?

#### Defense Civil Preparedness Agency

GAO reported to the Congress that the possibilities for surviving nuclear attack and the costs of various survival alternatives require more public attention and discussion.

Civil Defense in the United States has not been a high-priority or high-dollar program. Enacting legislation makes Federal, State, and local governments jointly responsible for civil defense. However, joint efforts have been weakened by (1) the program's relatively low priority, (2) the program's dependence on voluntary State and local participation, and (3) State and local government disagreement and disinterest in nationally set civil defense goals.

GAO's review disclosed various conflicting views regarding the ability of our complex socio-economic structure to survive a nuclear attack. These need to be fully examined by all involved as a prerequisite for determining whether or not a stronger civil defense program is needed and, if so, how much we are willing to pay for it.

The Department of Defense agreed with GAO's recommendations. (LCD-76-464, Aug. 8, 1977.)

Defense stated that a system for determining the currency of local emergency operations plans has been implemented. This system was not operational at the time of GAO's review.

Preliminary Defense findings in the Northeast Corridor study of crisis relocation indicate a need for regional planning. Comprehensive regional plans could take several years to develop.

### Appropriation

Civil Defense.

### Appropriation Committee Issues

1. Requirements and funding for regional crisis relocation programs should be identified.
2. Consideration of requirements and funding for Federal Regional Centers is needed.
3. Consideration of problems associated with joint Federal, State, and local civil preparedness programs is needed.

## FOREIGN MILITARY SALES

### Millions Of Dollars Of Costs Incurred In The Sale Of Defense Articles To Foreign Governments

#### Department of Defense

In maintaining inventories, the Department of Defense incurs normal inventory losses, such as damage, deterioration, obsolescence, and pilferage. Since these losses are a normal cost of maintaining Defense inventories, the pricing of items sold to foreign governments from Defense inventories should include a factor for recovering the losses. Including these losses in determining total cost would be consistent with the intent of the Arms Export Control Act that Department of Defense appropriations should not subsidize the foreign military sales program.

GAO reported to the Secretary of Defense that the military services were not recovering from foreign governments millions of dollars of costs incurred in the sale of articles from Defense inventories because the Department's pricing policies and the pricing systems used by military services to recover normal inventory losses were inadequate. In the Air Force alone, GAO estimated that such unrecovered costs approximate \$30 million each year.

GAO recommended that Defense revise its pricing policy for foreign military sales to require the inclusion of normal inventory losses in charges to foreign governments for items sold from Defense inventories. GAO also recommended that the military services attempt to recover previously unbilled costs for normal inventory losses on the sale of inventory items. (FGMSD-77-43, Sept. 8, 1977.)

#### Appropriations

Procurement (All Defense organizations).

Operation and Maintenance (All Defense organizations).

#### Appropriation Committee Issues

The Committee should determine the progress made in (1) revising the pricing policies for foreign military sales and (2) recovering previously unbilled costs.

## GOVERNMENT POLICY OF SELF-INSURANCE

### Extending Government's Policy of Self-Insurance in Certain Instances Could Result in Great Savings

Department of Defense  
National Aeronautics and Space Administration  
Energy Research and Development Administration

GAO reported to the Congress that the Government could have saved \$27 million over the 5-year period ended June 30, 1973, by extending its policy of self-insurance to: (1) certain categories of inventories under negotiated fixed-price contracts and subcontracts thereunder, (2) all Government property in the hands of commercial shipyards under ship repair contracts, and (3) facilities leased to contractors and users. Accordingly, GAO recommended that the Department of Defense (DOD), National Aeronautics and Space Administration, (NASA) and the Energy Research and Development Administration (ERDA) extend the self-insurance policy to these areas. GAO also recommended that DOD and ERDA jointly study extending self-insurance to special nuclear material held by contractors under fixed-price contracts.

The Office of Management and Budget believes that our recommendations are feasible and is evaluating whether the level of savings would justify the costs involved. GAO believes extending the self-insurance policy would result in significant savings. DOD is awaiting ERDA to initiate a study to determine the feasibility of self-insurance nuclear material held by contractors. (PSAD-75-105, Aug. 26, 1975.)

#### Appropriation

Procurement (Army) (Navy) (Air Force) (NASA) (ERDA).

#### Appropriation Committee Issues

1. The Committee should pursue the reasons why the Government's policy of self-insurance has not been extended to:

--The categories of inventories under negotiated fixed-price contracts, when similar inventories under cost-type contracts are self-insured, and in some instances, located in the same production facility.

--All Government property in the hands of commercial shipyards under ship repair contracts, when the Government self-insures (a) all losses or damages to its property in excess of \$300,000 and (b) all Government property under new ship construction contracts.

--Facilities leased to contractors and users.

2. The Committee should inquire as to the status of studies aimed at determining the feasibility of self-insuring nuclear materials held by contractor's under fixed-price contracts.

### INTERNAL AUDITS

#### Computer Auditing in the Executive Departments: Not Enough Is Being Done

##### Government-wide

GAO reported to the Congress that there is a continuing and growing need for auditor involvement in a number of phases of computer-based information system development and operation in Federal agencies. The growth of Federal automatic data processing (ADP) costs to well over \$10 billion annually and the pervasive impact of the computer on the accomplishment of agency missions mandate that management be assured--through the internal audit process--that such systems are performing efficiently, economically, and effectively.

However, many audit organizations have avoided contact with the computer, and the report was issued to inform the Congress on the levels of internal audit involvement as well as to stimulate greater Federal internal audit activity in the computer area. The report suggests that, in the appropriations hearings for each agency, inquiry be made of the extent of internal audit involvement in evaluating utilization of ADP resources. Agencies commenting on the report agreed with its conclusions and recommendations. (FGMSD-77-82, Sept. 28, 1977.)

##### Appropriations

Various appropriations that include funds for internal audits.

### Appropriation Committee Issue

The Committee should ascertain whether agency requests indicate appropriate internal audit attention is being devoted to this area, as exemplified by past work, present assignments, and future plans for audit work, together with a plan for developing and maintaining the requisite level of technical proficiency on the part of agency audit staffs.

## CHAPTER 4

### WEAPON SYSTEMS

#### INDIVIDUAL SYSTEM STUDIES

##### The Effectiveness of the Attack Submarine in the Direct Support Role

###### Departments of Defense and the Navy

The Navy considers the Nuclear Attack Submarine (SSN) to be one of its most effective antisubmarine warfare weapons against a numerically superior Soviet general purpose submarine force. In this regard, the Navy plans to achieve and maintain a force level of 90 SSNs, (Classified) percent of which are justified on its use in the direct support role. The results of studies and exercises indicate, however, that operational limitations exist which have an adverse impact on the SSNs' effectiveness in the direct support role. As a result the question is raised as to whether or not direct support could be more cost effective provided by other systems in development such as the Light Airborne Multi-Purpose System and Tactical Towed Array Sonar System.

Defense stated that the role of the nuclear attack submarine in the direct support of surface ships is still under study and that it has not yet developed a firm position on its effectiveness in the direct support role or its impact on nuclear attack submarine force levels. Defense also stated that the next generation SSN and the value of speed and depth capabilities will be subjected to critical review during budget review and weapons systems acquisition review processes. (PSAD-77-89, Apr. 29, 1977.)

###### Appropriations

Research and Development (Navy).  
Procurement (Navy).

###### Appropriation Committee Issues

1. In reviewing budget requests for additional nuclear attack submarines, the Committees should carefully evaluate Defense's force level plans of which a significant part is justified in direct support of surface forces. Specifically, Defense should be required to demonstrate the effectiveness of the nuclear attack submarine in the

direct support role and determine whether more cost-effective alternatives are or will be available.

2. The Committees should also require that Defense demonstrate that budget requests for the next generation SSN as well as for design improvements, such as speed or depth capabilities, are commensurate with expected gains in mission effectiveness.

### Need to Assure Base Level of Reliability Before Production of the CAPTOR

#### Department of the Navy

CAPTOR is a new Navy deep sea mine designed to attack submerged enemy submarines using the Mark-46 torpedo.

GAO found that the Navy's desire to maintain the CAPTOR program schedule and stay within approved funding levels influenced decisions to cut back the development effort. This resulted in a system which entered into limited production before major technical problems had been resolved and its operational effectiveness demonstrated.

Follow-on testing and evaluation is planned to determine if the design changes made to correct technical problems will result in an operationally effective system. The results of these tests are intended to provide the basis for accelerated and full-scale production decisions. This testing, however, will not provide any statistical assurance as to the system's long-term reliability. Such assurance would require more extensive funding and testing than the Navy deems appropriate. (PSAD-77-44, Mar. 15, 1977.)

#### Appropriations

Research and Development (Navy).  
Procurement (Navy).

#### Appropriation Committee Issues

The Navy unquestionably initiated production of a system that had not demonstrated its required design parameters. The extent that departure from established design parameters adversely affects the cost-effectiveness of the system is currently unknown. The heart of the issue is, however, whether the system will perform over its expected in-water life. While the Navy doesn't believe it is worth the funding and testing required

to obtain statistical assurance that the system meets its in-water design parameters, the Committee should obtain some type of specific assurance as to what the CAPTOR is supposed to do and for how long before it approves funding for full-scale production.

Status of the Light  
Airborne Multi-Purpose  
System

Department of Defense

The Navy's Light Airborne Multi-Purpose System (LAMPS) is a development program combining helicopters and ships to protect aircraft carrier task groups, amphibious forces, merchant shipping, and underway replenishment groups. The system's primary missions are antisubmarine warfare and anti-ship surveillance and targeting.

GAO reviewed the program in order to evaluate its current cost, performance, and schedule. In this regard, the following matters were noted:

- The system's program cost estimate was \$2.5 billion as of June 30, 1976, \$1.2 billion greater than the 1973 planning estimate. GAO did note, however, that the estimate does not include \$359 million in program costs directly related to the system: (1) \$154 million for procurement and installation of system equipment on 34 new ships, (2) \$13 million for military construction, and (3) \$192 million for equipment needed to hauldown, secure, and traverse helicopters on ships.
- The program cost could increase about \$718 million as a result of (1) increasing the procurement objective to include two helicopters per ship and (2) redeveloping the software package.
- Major system program decisions have been made without adequate supporting analysis, and an ongoing force mix study continues to lack adequate scope relative to LAMPS cost effectiveness. In addition, the Navy has not been able to obtain agreement from the Office of the Secretary of Defense on cost, schedule, and performance baselines for the extended mission system. In this regard, the Office of the Secretary of Defense has questioned the appropriate LAMPS mission range and recommended the Navy develop a system mission requirement substantiated by an operational need. (PSAD-77-43, Mar. 18, 1977.)

## Appropriation

Procurement (Navy).

## Appropriation Committee Issues

GAO believes that the cost of the LAMPS program is understated and that the cost effectiveness of the system as opposed to other alternatives has not been fully demonstrated. The Congress should require the Secretary of Defense to provide:

--An accurate estimate of total program cost which (1) includes all costs directly related to the program, (2) is based on a more reasonable prediction of the quantities required, and (3) takes account of all of the risks associated with the program.

## Confusion and Uncertainty as to the Need for and Use of Air Launched and Tomahawk Cruise Missile Programs

### Departments of the Navy and Air Force

In the past few years, cruise missiles have moved from low to high priority Navy and Air Force programs with variants for different missions. Cruise missiles are also associated with the current Strategic Arms Limitation Talks (SALT), and GAO reported that it is possible that the future role of cruise missiles will be determined more by the outcome of the SALT discussions than by military need.

GAO reported that the planned use for cruise missiles has changed and the military need continues to be uncertain for certain versions. For example, during 1976 the Air Force planned to develop its air-launched cruise missile (ALCM) as a relatively short-range missile sized to fit on existing missile racks within the aircraft. However, a Department of Defense decision in January 1977 gave priority to a larger size missile with greater range. During 1976, the Navy's planned use of its long-range Tomahawk cruise missile changed. Navy sea-launched cruise missiles will now be used to complement or augment existing theater nuclear forces rather than employment as strategic weapons. In January 1977, the Department of Defense directed development of a ground-launched version of the Navy's Tomahawk to be used by the Air Force. The impact on existing theater nuclear weapons, by use of the ground-launched version of Tomahawk, is not clear.

GAO recommended that the Secretary of Defense reevaluate the role for cruise missiles to assure that continued development is directed toward specific military requirements that relate to mission needs. Specifically, GAO recommended a thorough evaluation of the need for cruise missiles based on the threat; each service's requirements and, in particular, the Navy requirements for nuclear cruise missiles; and the operational effectiveness of each cruise missile program. The Department of Defense had not responded to our recommendations as of September 1977. (PSAD-77-36, Apr. 26, 1977.)

#### Appropriations

Procurement (Navy) (Air Force).  
Research and Development (Navy) (Air Force).

#### Appropriation Committee Issue

Decisions on mission needs and which versions of the cruise missile are to be pursued would result in substantial savings to the Department of Defense and to other agencies.

## CHAPTER 5

### DEPARTMENT OF DEFENSE--PROCUREMENT AND CONTRACTS

#### ADMINISTRATIVE CONTROL OF FUNDS

##### Legislative Suggestions For Improved Congressional Control Over Reimbursement To Appropriations

###### Department of Defense

Reimbursements are amounts collected or to be collected by an agency for the cost of material, work, or services furnished or to be furnished to others. Various laws provide the Department of Defense (DOD) with options for crediting the reimbursements. The Department's practice permitted the crediting of reimbursements to the appropriation current at the time of collection in those cases where the reimbursements were earned during a prior year.

GAO reported that as a result of this practice the Congress does not have adequate control over the use of these funds and recommended that legislative changes be made to give the Congress increased control over reimbursements.

In its report on DOD's fiscal year 1978 appropriation request, the House Appropriations Committee stated full agreement with the GAO report and that they were considering GAO's legislative proposals. The Committee told Defense that, in the interim, consistent with GAO's conclusions and legislative proposals, the Department should credit reimbursements to only the fiscal year's appropriations current when the reimbursements were earned. (FGMSD-75-52, Nov. 1, 1976.)

###### Appropriations

All appropriations receiving reimbursements (Defense)  
(Army) (Navy) (Air Force).

###### Appropriation Committee Issue

Legislation which authorized DOD's practices needs to be amended by the Congress so that all reimbursements are credited to appropriations current in the year the reimbursements are earned.

## Serious Breakdown In The Army's Financial Management System

### Department of the Army

In October 1975, the Army notified the Chairman of the House Committee on Appropriations that there had been a serious breakdown in financial controls over Army procurement appropriations resulting in apparent overobligations in its procurement accounts. In accordance with a request from the Chairman, GAO reported on the procedures used by the Army to determine amounts of overobligations totaling more than \$225 million in procurement accounts and the causes of the violations of the Anti-Deficiency Act.

Acting on the GAO recommendations, the Army awarded a contract for development of a procurement appropriation accounting system which conforms to Comptroller General principles and standards. Also, the Army has initiated a program to get all other accounting systems in conformance with the Comptroller General's principles and standards and to obtain approval of those systems within 3 years.

GAO also found that the Army recorded unsupported accounting adjustments in its fiscal year 1972 Other Procurement, Army appropriation account which improperly increased fund resources by \$33 million. The adjustments may have had the effect of masking a violation of the Anti-Deficiency Act.

The Army has identified many corrective actions needed in its procurement accounting and fund control systems, many of which have been implemented. GAO is currently evaluating the adequacy of the corrective actions identified by the Army and the status of implementation. (FGMSD-76-74, Nov. 5, 1976.)

### Appropriations

- Procurement of Ammunition (Army).
- Procurement of Aircraft (Army).
- Procurement of Missiles (Army).
- Procurement of Weapons and Tracked Combat Vehicles (Army).
- Other Procurement (Army).

### Appropriation Committee Issue

The Committees should determine the progress in implementing accounting systems and other corrective action.

## CONTRACTORS' PENSION PLAN PRACTICES

### Improvements Needed In Government Oversight of Contractor's Pension Plan Practices

#### Department of Defense National Aeronautics and Space Administration

The Department of Defense (DOD) makes an estimated \$1 billion annual contribution to contractors' pension plan funds.

GAO reported that of nine DOD contractors reviewed, eight had over \$100 million of questionable pension plan costs, excluding profit, that were or may be charged to Government contracts because (1) unrealistic actuarial assumptions were used, (2) allocation of pension plan costs and pension fund assets was inequitable, and (3) DOD lacked personnel with actuarial skills to monitor such costs. GAO also questioned DOD's curtailment of reviews for reasonableness of certain contractors' pension plan costs. DOD has recovered \$1.8 million so far and is pursuing additional recoveries.

DOD has promised some action to help prevent overpayments of pension plan costs. However, we do not believe the action promised is enough. We recommended additional staffing with actuarial skills and more indepth reviews of pension plan costs if other overpayments are to be detected and recovered. (PSAD-77-100, May 19, 1977.)

#### Appropriations

Procurement (Army) (Navy) (Air Force) (NASA).  
Operations and Maintenance (Army).

#### Appropriation Committee Issue

The Committee may want to consider whether additional staffing with actuarial skills should be provided.

## MEDICAL REIMBURSEMENTS

### Loss of Revenue Because of Inadequate Charges For Medical Care

#### Department of Defense

Persons other than active and retired military and their dependents must pay for the medical care they get in military medical facilities. Legislative history indicates that the charges should be high enough to recover the costs of the medical care provided.

GAO reported to the Congress that (1) certain rates charged for patient care provided in military hospitals were not revised, as intended by law, to recover full costs and (2) cost data used for computing medical reimbursement rates were not complete and consistent. As a result, the Government was not being reimbursed for the full costs of medical care provided in military hospitals for certain patients required to pay for that care. The recommendations were that Defense (1) revise rates periodically to recover full costs as intended by law, (2) provide guidance to the services for reporting accounting data so complete cost data are available for computing reimbursement rates, and (3) establish procedures to assure that all applicable costs are included in rate computations.

The Department of Defense agreed that not all costs are included in rate computations and stated that a high priority has been given to developing the uniform accounting procedures needed to provide more complete information for determining reimbursement rates. (FGMSD-76-102, Mar. 8, 1977.)

#### Appropriations

Operation and Maintenance (Army) (Navy) (Air Force).  
Military Personnel (Army) (Navy) (Air Force).

#### Appropriation Committee Issue

The Committees should determine whether adequate reimbursement rates for medical care have been established and the progress in developing uniform accounting procedures.

## OPERATION AND MAINTENANCE FUNDS

### Navy Ship Repairs and Overhaul

#### Department of the Navy

The Department of the Navy awarded private shipyards \$250 million in contracts for repairs and overhaul in fiscal year 1974. Navy ship repair contracts generally are awarded using formal advertising, sealed bid procedures even though effective competition is not present and the scope of the work is unknown at the time of awards. GAO recommended that the Navy try, on a test basis, procurement techniques used in competitively negotiated contracts. The Navy agreed and will test the concept with the overhaul of the USS Mullinnix (DD-944). (PSAD-77-47, Dec. 10, 1976.)

#### Appropriation

Operation and Maintenance (Navy).

#### Appropriation Committee Issues

1. Ship repair and overhaul costs could be reduced and claims under such contracts could be minimized with appropriate use of negotiated contracts.
2. The Appropriations Committee may wish to have the Navy's assessment of the test project on the USS Mullinnix.

## PROCUREMENT

### An Organized Approach to Improvement

#### Department of Defense

This report follows up on a recommendation of the House Government Operations Committee and the Commission on Government Procurement that a continuing program of research be used to create better procurement practices and to design and test the best ways to carry out new policies.

A number of large Government agencies, such as Defense, Energy, Transportation, Space, and General Services, rely on procurement to accomplish their primary missions. About \$70 billion a year and some 60,000 Federal workers are involved. Efforts to solve problems in the past on an ad hoc basis have resulted in a complex patchwork of laws, methods, regulations,

procedures, and administrative requirements. Basic redirections are beginning to take shape as a result of numerous congressional hearings, studies by commissions, and a continuing overview by the Office of Federal Procurement Policy.

Except for a few recent efforts in the Department of Defense, no program of organized research into procurement activities exists today on a Government-wide basis or within any executive department. GAO's report depicts the present posture of procurement research in the Federal Government. Specific uses of such research are discussed and an organized approach to a Government-wide program is illustrated, including

- basic prerequisites for operating the program;
- roles of participants: the Federal agencies, the Federal Procurement Institute, and the Office of Federal Procurement Policy; and
- operating approaches to screening research needs, selecting projects, conducting the research itself, and evaluating results.

GAO recommended that OMB establish a strong program for procurement research with active participation by the major agencies. The major agencies would use the program to:

- Cope with procurement problems peculiar to their agency operations as they arise.
- Design the best ways of giving effect to new policies.
- Evaluate experiences, achieve innovative improvements, develop training materials, and participate in Government-wide research. (PSAD-77-128, Sept. 30, 1977.)

#### Appropriations

All Federal agencies--defense and civil.

#### Appropriation Committee Issues

1. Status of Government-wide program in each agency having major procurement activities.

2. Agency use of research done by other agencies.
3. Extent of agency coordination with the Office of Federal Procurement Policy and the Federal Procurement Institute.

Procurement of Beef by the Department of Defense--Are We Getting Our Money's Worth?

Department of Defense (Defense Logistics Agency)

GAO reported to the Congress that the Department of Defense had not received the quality of beef for which it paid. GAO recommended that the Secretary of Defense re-appraise the policy of using special military beef specifications when there exists alternative institutional meat purchase specifications which are accepted by meat processors, institutional customers, grocery stores, and Government agencies.

The Department is testing the use of institutional specifications for beef; however, the test results will not be available until the spring of 1978. This test will involve the use of U.S. Department of Agriculture (USDA) quality assurance inspectors to replace the Army's Health Service inspectors. The House Appropriations Committee reduced the number of billets for Army and Air Force veterinarian specialists and veterinarians for fiscal year 1978 and ordered the Defense Department to turn over this responsibility to USDA.

Also, GAO recommended that the Secretary of Defense improve the existing beef procurement practices and procedures to obtain better competition, lower administrative costs, and possible economies of scale available through increasing the size of individual contract amounts. The Department has reviewed its procurement practices and procedures and is exploring alternatives. (PSAD-76-142, May 25, 1976.)

Appropriation

Procurement - Subsistence (Army) (Navy) (Air Force).

Appropriation Committee Issues

The Department of Defense should adopt commercial specifications for food items to (1) improve its position in the market place and (2) perform its procurement function more effectively and efficiently. The Committee should

evaluate the Department's progress in adopting commercial specifications.

## RESEARCH, DEVELOPMENT, TEST, AND EVALUATION

### Independent Research and Development

#### Department of Defense

Independent research and development (IR&D) is that part of a contractor's total research and development program not otherwise required by a contract or grant. The contractor decides what technical work to do. The Department considers expenditures for this work to be a legitimate business cost, supported by both the contractor's Government and commercial business.

Contractors also do technical work known as product support to bring products in use up to specifications or to solve any problems with them. The costs of supporting commercial products should be paid with company funds.

Two aircraft engine manufacturers have charged some costs for product support of commercial engines to IR&D, causing a portion of these costs to be allocated to Government contracts. GAO believes such allocations are inappropriate.

GAO recommended a revision to the Armed Services Procurement Regulation that would clearly define IR&D to exclude the costs of (1) commercial product support and (2) technical work implicitly required of the contractor to fulfill a purchaser's requirement under terms of a contract. GAO also recommended that Government reviewers be provided with the means of verifying the allowability of costs, revising the Armed Services Procurement Regulation if necessary to specifically authorize the Government to review contractors' commercial records.

Defense advised GAO that it agreed with the recommendations and had instituted a certificate procedure. Contractors are to certify that no costs are being charged to IR&D which would either explicitly or implicitly be required in the performance of contracts, grants, or other arrangements, commercial or Government. Defense believes that, by requiring the contractor to sign the certificate, a provision for access to the contractor's commercial records becomes a moot point.

GAO questions the effectiveness of this approach. In the absence of a clear definition in the procurement regulation, explicitly and implicitly required technical effort will not be mutually understood by contractors and Defense. More importantly, the Department will not have access to commercial records to verify the validity of the cost data being certified.

If the Department's administrative actions cannot provide enough access to contractors' commercial records to enable verification of the allowability of IR&D costs, legislative action by the Congress may be necessary. (PSAD-77-57, Feb. 28, 1977.)

Prior GAO reports also have contained recommendations on the need for actions by Defense and/or the Congress to strengthen the administration of contractors' IR&D programs. (PSAD-75-5, Dec. 10, 1974; PSAD-75-82, June 5, 1975.)

### Appropriations

Procurement.  
Research, Development, Test, and Evaluation.  
Operations and Maintenance.

### Appropriation Committee Issue

Determine whether section 203 of Public Law 91-441 should be amended to provide that the Government have access to contractors' commercial records when needed to determine that IR&D costs are allowable.

### SHIPBUILDING CLAIMS

#### Problems in the Quality of Design Packages for Ships and Needed Changes in Shipbuilding Claims Procedures

##### Department of the Navy

Continuing its longstanding interest in the shipbuilding claims problem, GAO has issued another of a series of reports. GAO examined four settled claims to determine if the settlements were reasonable and concluded that, generally, the Navy is currently doing a good job in settling claims--a considerable improvement over conditions previously reported.

However, GAO noted several important areas where improvements are needed and the Navy has generally agreed. The Navy

should provide specific instructions to contractors on the minimum documentation needed to support a claim, develop standard guidelines on settling claims for disruption, allow prompt temporary payment on line items in the claim, and analyze the underlying causes of claims to assure that corrective action to minimize claims is working.

While the Navy has agreed to implement the recommendations on claim settlements, this does not in any way solve the problems of claims. The Navy believes its management improvements will prevent claims. GAO observed that a recent award will in all likelihood result in claims based on the Navy's inadequate technical package and the current difficulties between the Navy and the contractor in pricing the changes to fix the technical errors.

GAO is presently examining the quality of the technical packages that are issued for bidding purposes. (PSAD-77-135, Aug. 9, 1977.)

### Appropriation

Procurement (Navy).

### Appropriation Committee Issues

1. The Committee should determine what problems the Navy is experiencing in the quality of its design packages for ships and the actions being taken to rectify them.
2. Determine the current status on the changes in shipbuilding claims procedures the Navy has agreed to implement.

### SUBCONTRACTS FOR MINORITIES

#### Program to Help Minority-Run Businesses Get Subcontracts Not Working Well

#### Department of Defense

GAO issued a report at the request of the Chairman, Subcommittee on SBA Oversight and Minority Enterprise, House Committee on Small Business, which noted that contract requirements were not adequate for assuring that prime contractors actively sought minority subcontractors. GAO recommended changes in the procurement regulations and in the administration of prime contracts.

The Department responded by drafting changes in its regulations and, in its view, rectified the problem of few minority subcontractors.

GAO is not satisfied that adequate changes are being made to carry out the program in an effective manner. First, the requirement for inserting the Minority Business Subcontract Program clause is still left to the discretion of the contracting officer. Second, evidence has not been provided showing that changes are being made in the contract administration area to assure contractor compliance with the clause. (PSAD-77-76, Feb. 28, 1977.)

### Appropriations

Procurement (Army) (Navy) (Air Force).  
Operation and Maintenance (Army) (Navy) (Air Force).

### Appropriation Committee Issues

1. The Committees should determine if the Department has taken action to assure that contracts over \$500,000 include the Minority Business Enterprise Program clause.
2. The Committees should determine that actions have been taken to improve contract administration of the program.

N A T U R A L R E S O U R C E S , E N V I R O N M E N T ,  
A N D E N E R G Y

CHAPTER 6

WATER RESOURCES AND POWER

BENEFIT-COST ANALYSES

Improvements Needed in Making  
Benefit-Cost Analyses for Federal  
Water Resources Projects

Department of the Army (Corps of Engineers)

Federal water resources projects are seldom authorized unless their estimated benefits exceed their estimated costs. GAO reviewed methods and procedures used by the Bureau of Reclamation, Department of the Interior; the Corps of Engineers (Civil Functions); the Soil Conservation Service, Department of Agriculture; and the Tennessee Valley Authority for making benefit-cost analyses for water resources development projects for such purposes as flood control, irrigation, power, recreation, fish and wildlife enhancement, and municipal and industrial water supply.

Because of the importance of the benefit-cost analysis to decisionmaking, benefits and costs should be determined by using uniform methods and procedures consistent with the governing criteria and considering all pertinent beneficial and adverse effects.

Executive branch policies, standards, and procedures for formulation, evaluation, and review of individual project plans for developing water resources were issued in May 1962 and printed as Senate Document 97.

GAO reported that:

1. Benefits had not been computed in a consistent manner.
2. Benefits had not been based on analyses of conditions with and without the project.
3. Benefit computations had not been adequately supported.

4. Project costs and induced costs (uncompensated adverse effects caused by construction and operation of a project) had not been fully considered in the benefit-cost determinations.

Causes of the problems in the benefit-cost determinations included:

1. Generalized and incomplete agency guidance and instructions.
2. Varying interpretations and inconsistent applications of Senate Document 97 criteria and agency implementing procedures.
3. A lack of or incomplete studies and analyses by the agencies of data pertinent to making determinations and computations.

The Water Resources Council developed "Principles and Standards for Planning Water and Related Land Resources," which became effective on October 25, 1973, superseding Senate Document 97. These principles were intended to provide the broad policy for planning activities, and the standards were intended to provide for uniformity and consistency in comparing, measuring, and judging beneficial and adverse effects of alternative plans.

GAO made the following recommendations to the Secretary of the Army for the Corps of Engineers; to the Secretaries of Agriculture and the Interior; and to the Chairman of the Board, Tennessee Valley Authority:

1. Revise or develop, as necessary, detailed procedures for making benefit-cost determinations and submit them to the Water Resources Council.
2. Periodically evaluate detailed procedures to recognize changed objectives, needs, and conditions and improved methods and procedures.
3. Strengthen internal management procedures for assessing (a) benefit-cost determinations for conformance to the governing principles and standards, (b) implementing detailed procedures, and (c) the completeness and adequacy of supporting documentation.

GAO also recommended that the Chairman, Water Resources Council, have the Council:

1. Review the agencies' detailed procedures for uniformity and consistency with the principles and standards.
2. Periodically review the principles and standards to recognize changed objectives, needs, and conditions, and improved methods and procedures.

The Council and the agencies generally agreed with the conclusions and recommendations. The Council told GAO in September 1975 that the involved Federal agencies were taking action to implement the recommendations. (RED 75-264, Sept. 20, 1974.)

### Appropriations

General Civil Construction (Army: Corps of Engineers, Civil Functions).  
Soil Conservation Service (Agriculture).  
Bureau of Reclamation (Interior).  
Payment to Tennessee Valley Authority Fund (Tennessee Valley Authority).

### Appropriation Committee Issue

The adequacy of the corrective action to be taken by the Council and the agencies should be considered when reviewing appropriation requests for Federal water resources projects.

### DAM SAFETY

#### Actions Needed to Increase the Safety of Dams Built by the Bureau of Reclamation and the Corps of Engineers

##### Department of the Army (Corps of Engineers)

After reviewing procedures and practices used by the Bureau of Reclamation in constructing the Teton Dam, which collapsed in 1976, GAO reported to the Chairman, Environment, Energy, and Natural Resources Subcommittee, House Committee on Government Operations, that the Bureau

- used questionable design practices and did not use an independent study review process to confirm its design decisions;
- did not always implement the designer's intent;
- took unnecessary risks and relied too much on the adequacy of its design instead of monitoring and controlling dam safety during reservoir filling;
- did not heed a lesson on reservoir filling which it identified 10 years earlier when another dam almost failed, and
- did not establish an effective emergency preparedness plan.

To improve dam safety GAO recommended that the Secretary of the Interior direct the Bureau of Reclamation to

- include in Bureau instructions the requirement for an independent review of its design for all storage dams,
- address the questionable design practices identified by the Independent Panel in the independent review of the Bureau's technical procedures,
- develop instructions and drawings that more clearly reflect the intent of its designers, and
- require that Bureau designers visit the site frequently to be as sure as possible that design intent is achieved.

GAO also recommended that the Secretary of Defense require the Corps of Engineers to revise its procedures and practices to make sure that the designs for all storage dams, where there is or could be a potential hazard to public safety, be reviewed by independent consultants.

GAO also recommended that the Bureau and Corps revise their policies and procedures concerning various matters, such as requirements for the amount and use of instrumentation for monitoring changing conditions inside the dam and the abutments and the need for improved emergency preparedness plans.

In April 1977, the President issued a memorandum directing the head of each Federal agency that has a role

affecting the safety of dams to immediately undertake a thorough review of its practices. These reviews will be used to coordinate dam safety programs and develop proposed Federal dam safety guidelines. GAO recommended to the Chairman of the Federal Coordinating Council for Science, Engineering, and Technology that the actions taken or planned by the Bureau and Corps on its recommendations be specifically addressed in the reports on the reviews performed in accordance with the April 1977 memorandum and the applicability of our recommendations to the Federal agencies in addition to the Bureau and Corps be evaluated in developing the proposed Federal dam safety guidelines.

The Chairman of the Federal Coordinating Council for Science, Engineering, and Technology advised GAO that he agreed with the findings and recommendations in the report and that a report will be issued by October 1, 1977, proposing Federal dam safety guidelines for future management procedures in order to insure dam safety. The Department of the Interior generally agreed with GAO's recommendations and stated that it had taken corrective action regarding some of our recommendations and would study the others further. (CED-77-85, June 3, 1977.)

#### Appropriation

General Construction (Army: Corps of Engineers, Civil Functions).

#### Appropriation Committee Issue

In reviewing future appropriation requests for the construction of dams, the Committees should determine the extent that GAO's recommendations have been implemented at each project.

#### Slow Progress in Developing and Implementing a National Dam Safety Program

##### Department of the Army (Corps of Engineers)

The National Dam Inspection Act of 1972 provided, among other things, for the Corps of Engineers to inventory and inspect dam structures throughout the United States. The purpose of the act was to protect life and property and provide information for designing a comprehensive national dam safety program.

GAO reported to the Congress that the Corps' dam inventory was not adequately developed and that the Army had never requested enough money from the Congress to inspect dams or to design a comprehensive national dam safety program.

GAO recommended that the Congress direct the Corps to supplement its November 1976 report to the Congress by providing:

- Information based on actual inspections of a scientific sampling of dams.
- Verified inventory data.
- Pertinent information showing whether Federal participation is needed to make certain of an effective national dam safety program and, if so, the nature of involvement. The information should include estimates of the cost of dam inspections and remedial actions needed and the availability of non-Federal funds for such actions.
- Possible alternatives for a dam safety program.

GAO also recommended that, before the Congress decides on a national dam safety program which requires Federal participation, it should be assured that the program includes

- an accurate inventory of dams, with realistic hazard ratings;
- mandatory minimum inspection criteria;
- provisions for requiring remedial measures for unsafe dams;
- other safety precautions, such as improved warning systems, zoning laws, and public education; and
- a system for Federal or State monitoring of the program.

Corps officials did not object to the general message of the report or to making required dam inspections if the Congress appropriated funds for these inspections. They stated that most States could probably finance an effective dam safety program if they considered such a program of sufficient priority; however, this might result in a cutback on other high-priority State activities. The Federal Coordinating Council For Science, Engineering, and Technology

advised GAO on September 16, 1977, that the Council had circulated to concerned Federal agencies an issue paper on the role of the States and the Federal Government in non-Federal dam safety. It defined four alternatives for dealing with the problems and recommended Federal incentive action providing for immediate inspection and long-term State responsibility. (CED-77-94, June 29, 1977.)

### Appropriation

General Investigations (Army: Corps of Engineers, Civil Functions).

### Appropriation Committee Issues

Funding will be necessary for the Corps to conduct inspection on a scientific sampling of dams, verify inventory data, and incorporate this data into a comprehensive national dam safety program. Further funding may be necessary to conduct other inspections and to implement a national safety program.

### FEDERAL HYDROELECTRIC SYSTEMS

#### Federal Hydroelectric Plants Can Increase power Production

##### Department of the Army (Corps of Engineers)

GAO assessed the potential for increasing power production at existing Federal hydroelectric power plants by modernizing turbines to increase their efficiencies and capacities and modernizing generators to increase their power producing capacity. Worn out turbine and generator components replaced at existing plants resulted in increased efficiency and capacity through design improvements. The increases from design improvements were of such importance that replacing components at other plants, before they wear out, may be economical. Increased hydroelectric power production displaces oil and coal consumption, thus contributing to energy conservation and pollution reduction; it may also displace or delay construction of alternate power sources and increase Federal revenues.

GAO recommended that the agencies involved in hydroelectric power operations--U.S. Army Corps of Engineers (Corps), the Department of the Interior's Bureau of Reclamation (Bureau), and the Tennessee Valley Authority (TVA):

- Identify opportunities to improve hydropower production through equipment modernization, implement those that are economically justified, and consider making changes before the end of the equipment's (or its components') useful life.
- Include in the economic analysis (1) the value of oil or coal consumption displaced and (2) either directly or indirectly the value of maintenance costs reduced by installing new equipment.
- Include feasible turbine and generator modernization in their overall hydroelectric power expansion plans.
- Develop systems to make sure that future technological improvements are recognized and considered for implementation in existing systems.

The Bureau, Corps, and TVA agreed in concept that efficiencies and capacities may be increased at some plants. TVA officials agreed that it would be worthwhile to make preliminary studies to identify potentials. The Bureau has conducted a preliminary study which showed the potential for 584 megawatts of increased capacity. The Corps believes that opportunities for improvements are slight at its dams. (EMD-77-22, Mar. 16, 1977.)

### Appropriations

General Investigations and Construction and Rehabilitation, Department of the Interior (Bureau of Reclamation).  
 Power Program, Tennessee Valley Authority.  
 General Investigation, U.S. Army Corps of Engineers (Civil).

### Appropriation Committee Issues

The extent of equipment modernization has not yet been identified by TVA or the Corps. The Bureau has identified potential increases in a preliminary study and is going to study this in detail to support authorization for funding. The potential cost of modernization cannot be made until the potentials have been identified.

## INLAND NAVIGATION

### More Information Needed on Economic and Environmental Issues in Maintaining the Nation's Inland Navigation System

#### Department of the Army (Corps of Engineers)

GAO reported to the Congress that dredged-material disposal may be harmful to the environment. Ongoing research on the topic is not complete, and the extent of the risks of traditional dredged-material disposal practices are not yet fully known. There are alternatives to traditional dredged-material disposal practices which may be more environmentally desirable, but they generally cost more.

GAO recommended that, for those dredging projects where the Environmental Protection Agency (EPA) objects to the method or location of the Corps' dredged-material disposal practices, the Corps, in coordination with EPA, should include in its budget justification for those projects:

- The estimated cost of proposed alternatives as compared to current costs.
- A description of the Corps' current and EPA's proposed disposal method or location.
- Reasons for EPA's suggested change in disposal method or location, including environmental benefits expected to be achieved or adverse effects expected to be avoided by the change.
- The effect of the proposed change on the economic feasibility of the project.

GAO believes this information would be helpful to the Congress in making trade-offs between economic and environmental values in appropriating funds for controversial dredging projects.

The Department of the Army told GAO that it believed that only those cases should be highlighted where significant cost increases occur due to environmental conditions. This approach, however, would not bring to the Congress' attention those cases where EPA objected to or questioned the Corps' practices, and changes were not made and additional funds were not requested.

GAO believes that the Congress should have the opportunity to participate in selecting between environmental and economic considerations in appropriating funds for controversial dredging projects. The information called for in the recommendation would give the Congress a valuable tool for such participation and, consequently, GAO believes the additional information should be included in the Corps' budget justifications for each dredging project where EPA individually questions or objects to the Corps' practices. (CED-77-74, June 28, 1977.)

### Appropriation

Operation and Maintenance (Army: Corps of Engineers, Civil Functions).

### Appropriation Committee Issue

The Committee should obtain information concerning the cost of and basis for alternatives to those proposed Corps dredging projects where EPA objects to the disposal method or location so that the Committee can evaluate the trade-offs between economic and environmental values.

## CHAPTER 7

### CONSERVATION AND LAND MANAGEMENT

#### WILDLIFE CONSERVATION

##### Military Fish and Wildlife Management and Public Outdoor Recreation Planning Needs Greater Emphasis

###### Departments of the Army, Navy, and Air Force

GAO reported to the Secretary of Defense that while some Defense installations have strong and aggressive fish and wildlife conservation programs, others suffer from inadequate or outdated management plans a lack of funds to implement the plans, or lack of funds to start programs where potential exists.

In addition, the Department of Defense has been slow to develop cooperative plans with the Department of the Interior and the applicable States for the development, enhancement, operation, and maintenance of public outdoor recreation resources at military installations. Although some installations plan for and provide public outdoor recreation, significant potential may be lost because the opportunities and need for such activities have not been identified. Funds are needed for development and maintenance of recreational facilities.

The Sikes Act of 1960, as amended in 1968 and 1974, authorizes Defense to develop cooperative plans with the Department of the Interior and applicable States for both fish and wildlife and public outdoor recreation activities. Annual appropriations have been authorized since 1968 for implementing the act, but the Defense budget did not request any funds for these purposes. The appropriation authorization ends in fiscal year 1978.

GAO recommended that Defense require the military services to place increased emphasis on their planning for and provision of fish and wildlife conservation and public outdoor recreational opportunities. GAO also recommended that Defense request an extension beyond fiscal year 1978 for the funding authorization under the Sikes Act and request appropriation of authorized funds.

Defense officials agreed with GAO's conclusions and recommendations. (CED-77-106, Aug. 3, 1977.)

## Appropriation

Operation and Maintenance (Army) (Navy) (Air Force).

## Appropriation Committee Issues

1. The military services need to place greater emphasis on developing and implementing cooperative plans for fish and wildlife conservation and public outdoor recreation programs.
2. Funds are needed to more fully develop the potential for fish and wildlife conservation and public outdoor recreation opportunities.
3. Defense has not requested funds authorized by the Sikes Act, as amended.

## CHAPTER 8

### POLLUTION CONTROL AND ABATEMENT

#### ENVIRONMENT

#### Improving Military Solid Waste Management

##### Department of Defense

GAO reported that although the services have reduced pollution by eliminating most open burning and dumps, they have not demonstrated leadership in pollution abatement. The low priority the services gave solid waste management and the absence of Defense deadlines for complying with Environmental Protection Agency standards contributed to the lack of leadership.

GAO believes that the Department's revised procedures for applying Environmental Protection Agency guidelines and its ongoing test for carrying out the beverage container guidelines will improve the recycling of materials at military installations.

With current technology, use of solid waste for energy can be economical and deserves systematic consideration as a method of waste disposal. The installations that considered recovery of energy from refuse generally planned only for their own needs and therefore did not evaluate a joint or regional system that may have been more economical. Defense can help insure that the most beneficial energy recovery systems are considered by issuing criteria and guidelines for making feasibility studies and coordinating the requirements of the various installations.

GAO recommended that Defense should

- Publish guidance for determining whether and under what circumstances bases should initiate energy recovery projects.
- Issue specifications to the services for preparing energy recovery system proposals.
- Designate a focal point for reviewing such project proposals and establishing priorities for their funding.

Although Defense commented on the prudence of installing several types of energy recovery systems, it did not say whether it intended to carry out the recommendations which GAO considers necessary for an orderly and economic selection of energy recovery systems. (LCD-76-345, June 2, 1977.)

### Appropriations

Operation and Maintenance (Army) (Navy) (Air Force).  
Military Construction (Army) (Navy) (Air Force).

### Appropriation Committee Issue

Defense policy guidance to the military services is needed for studying the feasibility and coordination installation requirements for using solid waste in energy recovery systems.

### Defense Air Pollution Control: Progress and Delays

#### Department of Defense

GAO reported to the Congress that about 70 percent of the Department's major emitters were in compliance with air pollution standards in January 1977 but that pollution from stationary sources (all sources except vehicles) at some installations will continue for several years. Defense generally agreed with GAO's recommendations for monitoring controllable causes delaying compliance and attaining full compliance. Defense said that it has always acted quickly to attain full compliance, but the Government budget system takes 3 years to move an abatement project from inception to approval.

GAO also reported the status of the dispute between the Navy and the State of California concerning whether the Clean Air Act, as amended, makes emissions from jet engines tested in test cells subject to stationary source air pollution standards. GAO recommended that the Congress amend the law to clarify the issue. (LCD-77-305, July 18, 1977.)

### Appropriations

Operation and Maintenance (Army) (Navy) (Air Force).  
Military Construction (Army) (Navy) (Air Force).

## Appropriation Committee Issue

Clarification of the law is needed to avoid the adverse effects of potential successive suits against the Federal Government on the issue of whether emissions from jet engines tested in test cells do or do not fit the definition of a stationary source of air pollution.

## Ways to Improve Oil Recycling

### Department of Defense

Because there is no central agency to manage used oil conservation and disposal in the Federal sector, we proposed that one be designated. The Office of Management and Budget said that this action would be premature before completing a plan for improving all Federal energy activities.

Although Federal installations generally were aware of the economic value of used oil and its potential for environmental damage, their practices were not achieving the greatest possible recovery and some were contributing to environmental pollution.

Because Defense is responsible for the specifications and procurement of lubricating oil for all agencies and is the largest Government user, GAO recommended that the Secretary:

- Create a system to develop policies and procedures for recovering used oil.
- Classify used oil as an asset, rather than as scrap.
- Define requirements for segregating, collecting, or storing used oil by physical characteristics, where practicable.
- Determine the feasibility of entering into regional agreements with re-refiners to refine used lubricating oil back to reusable lubricants.

Defense agreed that the first three recommendations are desirable but said that it cannot use recycled oil as an automotive engine oil until evaluations of re-refining processes are completed. Nevertheless, Defense should investigate the feasibility of agreements for re-refining used oil into lubricants which have no prohibition against re-refined materials with a view toward expanding agreements

to include re-refined engine oil as soon as such oil can meet Defense's specifications. (LCD-77-307, Sept. 28, 1977.)

Appropriation

Operation and Maintenance (Army) (Navy) (Air Force).

Appropriation Committee Issue

Policy guidance is needed on a Government-wide system for managing the recovery and recycling of used lubricating oil.

C O M M E R C E A N D T R A N S P O R T A T I O N

CHAPTER 9

WATER TRANSPORTATION

INLAND WATERWAYS

Federal Efforts to Extend Winter  
Navigation on the Great Lakes and  
the St. Lawrence Seaway--Status  
and Problems to be Resolved

Department of the Army (Corps of Engineers)

In 1970, the Congress authorized the Corps of Engineers to demonstrate the feasibility of winter navigation on the Great Lakes-St. Lawrence Seaway system. Commerce on these waterways traditionally was suspended for about 3 1/2 months during the winter because of severe weather.

During the 4 years of the program the winter traffic has been extended in some of the Great Lakes. Much of the traffic, however, is not a direct result of the program.

GAO reported to the Congress that major problems had to be resolved before conclusive judgments could be made on the practicability of a permanently extended navigation system on the Great Lakes and the St. Lawrence Seaway. The major problems are (1) the competing use of the waterways during the winter season by power and navigation interests, (2) a lack of a coordinated plan of action with Canada, and (3) potential environmental damage. In addition, the program's preliminary economic analysis does not realistically portray the potential benefits and costs of a permanently extended navigation season program.

GAO recommended that the Secretary of the Army:

- direct the Corps to reevaluate its procedures for determining traffic claimed for the demonstration program.
- Require the Corps to include information in its funding requests and reports to the Congress on all participating agencies' use of their regular appropriations for the demonstration program.

--Direct the Corps to (a) resolve the problem between power and navigation interests, (b) work toward an agreement with Canada, and (c) complete the overall assessment of the expected environmental impacts.

--Require the Corps to resolve questions on the preliminary benefit-cost analysis.

The agencies concerned generally agreed with GAO's conclusions and recommendations and indicated that corrective action would be taken. (RED-76-76, Apr. 20, 1976.)

#### Appropriation

General Investigations (Army: Corps of Engineers, Civil Functions).

#### Appropriation Committee Issue

Major problems need to be resolved before the practicality of a permanently extended season can be determined.