The Corps of Engineers is responsible for improving and maintaining navigation channels and harbors in the United States. The Corps uses its own dredging equipment and also contracts with private dredging firms. Federal expenditures for dredging have averaged about $135 million annually for the past 10 years.

Considerable controversy has existed over the years concerning the Federal Government's dredging role. Recently industry has opposed the Corps' plans to replace several of its older dredges and to buy additional dredges. Industry claims that it should be allowed to perform the dredging work done by the Government.

Because of the large Federal investment in dredging equipment and the high annual Federal dredging expenditure, the General Accounting Office (GAO) reviewed the Corps' current uses and costs of its dredges and its contracting policies and procedures. GAO wanted to determine whether the Corps was obtaining maximum use of its existing equipment and to present the Congress with factors which would affect the Federal role in dredging over the next few years.

**FINDINGS AND CONCLUSIONS**

Because of the nature of the relationship between the Corps and the private dredging industry, each is dependent upon the other. The Corps does not have the capability to meet its annual dredging requirements with its own equipment. Private industry is dependent upon the Corps in that the Federal dredging program provides a large portion of its total work load.

This mutually dependent relationship has resulted in considerable controversy over the years as to what the Federal role should be in meeting the national dredging requirements.

The Corps' inventory of dredging equipment consists of two main types--hopper and pipeline--and is widely dispersed along the coasts and interior waterways of the Nation.

The hopper dredges--self-propelled, oceangoing vessels which work in the large coastal harbors--are being utilized efficiently throughout the country.
The Corps and industry pipelines--dredges of lesser mobility which pump the material from the dredging sites via floating pipelines to disposal areas--are not being used fully. For example, statistical information furnished to GAO by 29 dredging firms that owned 183 dredges showed that the dredges were idle 53 percent of the time during fiscal years 1969 and 1970.

Prior to any future rehabilitation or replacement of pipeline dredges, the Corps should consider realistically alternative means of accomplishing the dredging work load. (See pp. 17 to 30.)

A general lack of coordination among the Corps' district offices has led to inconsistencies in cost-estimating and cost accumulation procedures and practices. (See pp. 32 to 35.)

The Corps' practice of developing Government estimates for bid purposes on the basis of fair and reasonable contractor costs, plus 25 percent, is inconsistent with existing legislation (33 U.S.C. 624) which requires that Government estimates be developed on the basis of in-house costs plus 25 percent. In a prior report GAO recommended that the Corps revise its procedures to comply with the requirements of existing law. The Corps did not accept GAO's earlier recommendation and stated at that time that its practice of basing contractor bids on estimates of the cost to a well-equipped contractor was in accordance with the policies and intentions of both the Congress and the administration.

Contrary to existing regulations, the Corps has allowed certain low bidders on dredging contracts to reduce their bids voluntarily after bid opening to get within the limitation set by 33 U.S.C. 624--25 percent in excess of the Government's estimated cost of doing the work. (See pp. 40 to 43.)

RECOMMENDATIONS OR SUGGESTIONS

The Corps of Engineers

--should undertake a comprehensive study of the national pipeline dredging requirements for the next few years and should consider various alternatives for meeting those requirements in the most economical manner (see p. 30);

--should furnish the results of its comprehensive study to the appropriate congressional legislative committees for their consideration in providing guidance as to the Federal role in meeting the future national dredging requirements;

--should develop consistent, compatible and appropriate accounting procedures so that meaningful cost reports can be presented to management and to the Congress (see p. 34);

--should develop uniform cost-estimating guidelines (see p. 36); and

--should prohibit low bidders from voluntarily reducing their bids to come within the limitations of 33 U.S.C. 624 (see p. 43).
AGENCY ACTIONS AND UNRESOLVED ISSUES

The Corps plans to undertake a comprehensive study of the national pipeline dredging requirements for the next few years. (See p. 31.)

The Corps stated that present cost accounting procedures were adequate in providing data for presentation of meaningful cost reports but acknowledged inconsistencies in the interpretation and application of these procedures by the districts. The Corps has begun to make regulatory changes to reduce the inconsistencies. (See p. 36.)

Although the Corps stated that existing cost-estimating guidelines were adequate, the Corps agreed to hold periodic cost-estimating conferences to ensure the maximum degree of uniformity and realistic consideration of the critical factors affecting dredging estimates. (See p. 37.)

The Corps has not changed its position with respect to basing its dredging estimates on the use of Government plant since GAO's prior report. (See p. 43.)

The Corps agreed to revise its regulations to prohibit the practice of permitting low bidders, whose bids exceed 25 percent of the Government's estimate of the cost of doing the work, to voluntarily reduce their bids after bid opening. (See p. 44.)

MATTERS FOR CONSIDERATION BY THE CONGRESS

In view of the existing and continuing magnitude of the dredging program, the mutually dependent relationship between the Corps and the private dredging industry, and the estimated cost of maintaining and replacing existing Corps dredges, GAO recommends that the Congress provide guidance to the Corps as to what the role of the Federal Government should be in meeting the future national dredging requirements. (See p. 16.) GAO believes that the Corps has the alternatives of (1) maintaining the current level of effort with existing Corps plant, (2) taking over a larger share of the program by expanding the Corps' plant capability, or (3) curtailing the Corps' role and/or getting out of dredging completely. (See p. 13.)

GAO recommends also that, if the requirements of 33 U.S.C. 624 are determined to be a current expression of congressional intent, the inconsistency of the Corps' current practice be considered in future dealings with the Corps. Should the specific requirement of the law no longer be deemed appropriate, GAO recommends that the language be amended to permit the development of Government estimates for dredging contracts on a basis comparable to normal contracting practices of other Federal agencies and consistent with the requirements of the Armed Services Procurement Regulations. (See p. 44.)