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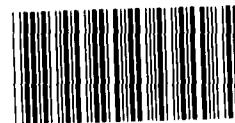
Comptroller General

OF THE UNITED STATES

Defense Fuel Supply Center Procedures For Purchasing Strategic Petroleum Reserve Oil

As one of a series of reviews on the Strategic Petroleum Reserve, GAO examined the procedures that the Defense Fuel Supply Center used to acquire about 130 million barrels of crude oil for the Reserve from February 1981 to May 1983. GAO found that the purchasing procedures generally assured that purchase prices were fair and reasonable and resulted in the lowest overall cost to the government.

GAO found, however, that the Defense Fuel Supply Center could have paid about \$1.9 million less during the period evaluated, and still acquired oil of acceptable quality, if it had been more flexible in its purchase practices by allowing exceptions to its pricing criteria. GAO recommends that the Defense Fuel Supply Center develop formal guidelines for making exceptions to its pricing criteria, including consideration of offers that slightly exceed the market high price but result in lower per barrel acquisition costs.



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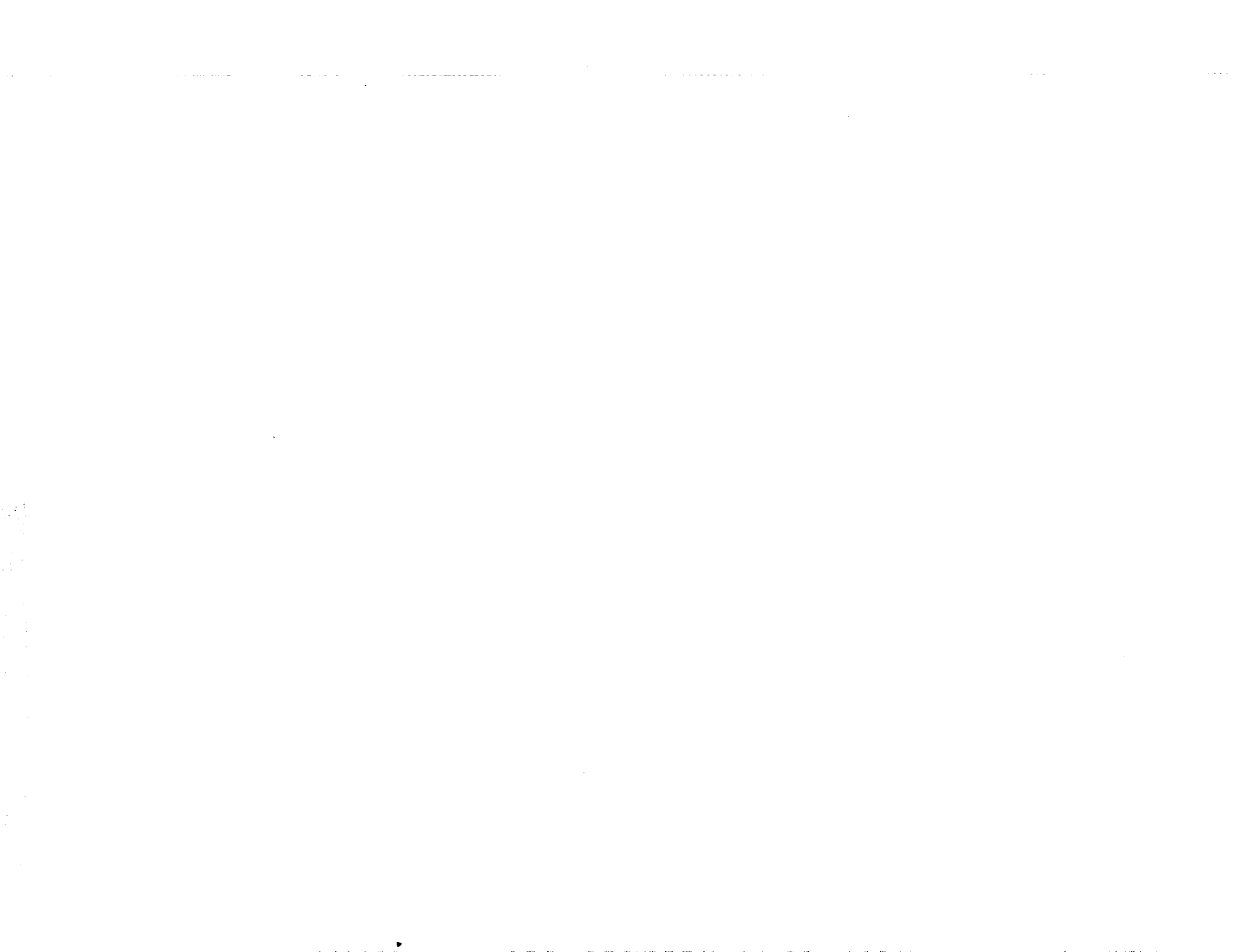
The Honorable James A. McClure
Chairman, Committee on Energy and
Natural Resources
United States Senate

The Honorable J. Bennett Johnston
Ranking Minority Member, Committee
on Energy and Natural Resources
United States Senate

This report presents the results of our review of the Defense Fuel Supply Center's efforts to purchase crude oil for the Strategic Petroleum Reserve. The review was made as part of a comprehensive effort to evaluate the government's performance in developing, filling, and maintaining the Strategic Petroleum Reserve. As you requested on March 8, 1984, we are providing you with the results of our review.

Copies of the report are being sent to the Secretary of Defense, the Secretary of Energy, and the Director, Office of Management and Budget.

Charles A. Bowles
Comptroller General
of the United States



D I G E S T

The Strategic Petroleum Reserve was established in 1975 to reduce United States vulnerability to world oil supply interruptions. The Department of Energy (DOE), which administers the Reserve program, proposes to fill a 750-million-barrel Reserve by the end of 1990. As of August 31, 1984, the Reserve contained 429 million barrels of oil.

In 1977, the Federal Energy Administration (DOE's predecessor) and the Department of Defense (DOD) signed an interagency agreement authorizing the Defense Fuel Supply Center, a DOD agency, to purchase crude oil for the Reserve. The Fuel Supply Center has purchased about 75 percent of the Reserve's oil inventory. GAO reviewed Fuel Supply Center procedures in 1980 and concluded that purchases through June 1979 were made at fair prices.¹

In January 1981, DOE authorized the Fuel Supply Center to buy oil regularly on the crude oil spot (short-term) market.² From February 1981 to May 1983, the Fuel Supply Center purchased 121 million barrels of oil on the spot market at a cost of about \$4.1 billion and 8.5 million barrels of oil through long-term contracts at a cost of about \$292 million. More than 100 types of crude oil are available on the international market; each has different physical properties and consequently a different price.

GAO's review of the Fuel Supply Center's oil purchasing procedures from February 1981 to May 1983 is one of a series of reviews to evaluate

¹Purchase Price of Strategic Petroleum Reserve Oil Fair But Payment Timing Is Costly (PSAD-80-30, Apr. 3, 1980).

²The spot market is an informal, world-wide network of oil companies, traders, and brokers who buy and sell oil in an open and unregulated market.

the Reserve's development, fill, and operation. In a March 8, 1984, letter, the Chairman and the Ranking Minority Member of the Senate Committee on Energy and Natural Resources requested that GAO report findings and recommendations of these reviews to the Committee.

GAO concluded that the Fuel Supply Center's procedures (1) conformed to DOD's acquisition regulations, (2) were followed, and (3) generally assured fair and reasonable purchase prices at the lowest overall cost to the government. However, GAO found that a minor change in Fuel Supply Center purchase procedures--making an exception to its price criteria in order to reduce the government's overall oil acquisition cost--could have reduced costs by about \$1.9 million in three instances.

PURCHASE PROCEDURES GENERALLY
ASSURED FAIR AND REASONABLE
PRICES AT LOWEST OVERALL COST

DOD's acquisition regulations establish criteria for the Fuel Supply Center's purchase procedures and require that negotiated contract prices be fair and reasonable and calculated to result in the lowest overall cost to the government. Because of the nature of the oil acquisition program, the regulations require that the Fuel Supply Center use competitive procedures and a price or cost analysis to determine whether offers are fair and reasonable.

The Fuel Supply Center has used an open, continuous solicitation to request spot market offers. It developed a 2-week cycle to solicit offers, conduct a market price analysis and negotiate with offerors, ask for best and final offers, and award contracts. Crude oil bought through larger, periodic, long-term contracts followed similar procedures but took longer to negotiate.

The Fuel Supply Center has used a price analysis to determine whether offers are fair and reasonable. DOD's acquisition regulations specify several ways that the price analysis can be done, including a comparison of offered prices to published price lists, published market prices, or similar indicators. The Fuel Supply Center regularly has used oil producers' official selling prices, trade journal reports of spot market transactions, and/or prices obtained by its market price analyst through spot market

contacts. Because of the confidential nature of the spot market transactions, market traders, brokers, and trade journalists generally rely on trusted contacts for price and other information. (See p. 8.)

If current spot market price information on certain infrequently traded crude oil types was not available, the Fuel Supply Center estimated a fair price. It based the price estimate on past market price relationships between the crude oil type offered and another type regularly traded on the spot market and for which current prices were available. (See p. 9.)

The Fuel Supply Center used its market price analysis to establish a range of fair spot market prices for each crude oil type. Between February 1981 and May 1983, its policy was to pay no more than the high of the spot market price range or the producer's official selling price for a crude oil type, whichever was lower. The Fuel Supply Center then selected the offers within its price ranges that minimized the government's total acquisition cost. (See p. 9.)

THE FUEL SUPPLY CENTER FOLLOWED
ITS POLICIES AND PROCEDURES

GAO examined Fuel Supply Center pre-award files for all 42 spot market solicitation closings between February 1981 and May 1983 to determine whether the Fuel Supply Center adhered to its pricing policies and procedures. For each closing, the Fuel Supply Center performed a price analysis that used the price sources described in its procedures.

In fiscal year 1982, the Fuel Supply Center awarded 41 spot market oil contracts. Prices for 37 contracts fell within the spot market price range. Prices for the other four contracts exceeded the spot market high price.³ However, DOD's acquisition regulations recognize that it is not always possible to meet the

³These prices, however, were less than or equal to the producing country's official selling price. The Fuel Supply Center determined that substantial third party transactions were being made at the official selling prices.

government's pricing objectives and require the contracting officer to exercise judgment in making a final award decision. In examining each of these four cases, GAO found no basis for questioning the contracting officer's determination that prices were fair and reasonable under the circumstances and that the purchase was in the government's best interest. (See pp. 10 and 11.)

PRICES COMPARED FAVORABLY TO GENERAL SPOT MARKET PRICES

GAO tested the overall price results of Fuel Supply Center's purchase procedures and policies by comparing each fiscal year 1982 purchase with the Fuel Supply Center's spot market price range for the purchases. For 34.7 million barrels of oil, the Fuel Supply Center paid an average of 14 cents per barrel less than its market high price and 19 cents per barrel more than its market low price.

Market confidentiality and inaccessibility of documents precluded GAO from verifying that the Fuel Supply Center's price ranges were in fact the actual prices transacted. However, spot market traders and observers that GAO interviewed⁴ all expressed the opinion that the Fuel Supply Center's prices were generally comparable to other spot market transactions at the time of the purchases. GAO's report comparing Reserve oil prices with average commercial prices further supported this assessment.⁵ (See p. 11.)

MAKING AN EXCEPTION TO PRICE CRITERIA IN CERTAIN CIRCUMSTANCES COULD REDUCE COSTS

The confidentiality and inaccessibility of spot market price data make the determination of a reasonable price for a crude oil type imprecise at best. Traders and observers that GAO interviewed indicated that this range could extend 5 to 15 cents per barrel above spot market prices that trade journals or contacts reported.

⁴GAO interviewed officials from eight spot market trading companies, two oil industry trade journals, and one oil industry consulting firm.

⁵Comparison of Strategic Petroleum Reserve Oil Prices and Commercial Oil Prices (GAO/RCED-83-156, Sept. 30, 1983).

The Fuel Supply Center's policy is to pay no more than the high of its spot market price range for any particular crude type. A lower priced type of oil at 1 cent per barrel above its market high price would, therefore, be rejected to purchase a higher priced oil type at or below its market high price, even though both are acceptable oils for filling the Reserve. (According to DOE's Deputy Assistant Secretary for the Reserve, DOE is indifferent to which crude oil types are purchased as long as they meet general oil quality specifications.) In the three instances when this situation occurred between October 1981 and May 1983, oil acquisition costs could have been reduced by about \$1.9 million if the Fuel Supply Center had made an exception and allowed a variance of up to 15 cents per barrel. (See pp. 13 to 16.)

The Fuel Supply Center made exceptions to its pricing criteria for four fiscal year 1982 contracts, but it has not developed formal guidelines for exceeding the high price criteria. GAO believes that the Fuel Supply Center should make an exception to its spot market high price criteria when relatively small adjustments would result in lower per barrel acquisition costs. This would be consistent with DOE and DOD objectives to minimize overall oil acquisition costs. (See p. 17.)

RECOMMENDATION

GAO recommends that the Secretary of Defense instruct the Commander, Defense Fuel Supply Center, to develop formal guidelines for the contracting officer to use for making exceptions to the Fuel Supply Center's purchase procedures. In particular, the guidelines should allow for consideration of offers for acceptable quality oil that slightly exceed the spot market high price but result in lower per barrel acquisition costs. (See p. 18.)

AGENCY COMMENTS AND GAO'S EVALUATION

The draft of this report was sent to DOD and DOE for review. DOD provided official oral comments, and DOE provided written comments. (See app. V for DOE's comments.) GAO made changes in the report, as appropriate, based on their comments.

Both DOD and DOE concurred with GAO's conclusion that the Fuel Supply Center's procedures generally assured that purchase prices were fair and reasonable and at the lowest overall cost to the government. However, DOD and DOE disagreed with GAO's conclusion that the Fuel Supply Center could have reduced costs by making an exception to its price criteria in certain circumstances. DOD stated that paying an unreasonable price for lower quality oil does not represent a savings and the savings projected by GAO are illusory. DOE said that the estimated savings do not reflect the decreased revenue that will result from future sales of lower quality oil.⁶

DOD and DOE also disagreed with GAO's recommendation that the Fuel Supply Center consider offers for acceptable quality oil that slightly exceed its assessment of the spot market high price but result in lower per barrel acquisition costs. As support, DOD cited the legislative objective of minimizing the Fuel Supply Center's impact on the market prices and the contracting officer's need to rely on market prices to qualify for exemption from the Truth in Negotiations Act requirement that contractors submit certified cost or pricing data with their bids. DOE stated that implementing the recommendation would introduce several judgmental factors into the procurement process that would cast doubt on the actual savings achieved.

GAO believes that paying a price slightly higher than the Fuel Supply Center's high market price range is not unreasonable when (1) the oil meets the Reserve's quality standard, (2) the price results in a lower per barrel acquisition cost, and (3) the price is lower than long-term contract prices. Further, GAO believes that lower acquisition costs are real, not illusory, because they are immediate, while the added value of higher quality crude oil would not be realized until the oil is sold in response to a supply disruption. In present value terms, a dollar now is worth more than a dollar received in the future. If the time value of money is considered, the cost reductions achieved by purchasing a lower priced oil are likely to exceed

⁶The government would sell Reserve oil in response to an oil supply disruption in order to reduce the disruption's impact on the economy.

the net revenue obtained from selling a higher value, higher cost oil at some future time when discounted to the time the oil was acquired.

It is also not clear that the full incremental difference in the value of the higher cost oil will be realized when it is sold since the oil is mixed with various quality oils in 10-million-barrel caverns at the Reserve's storage sites. Oil samples taken from filled caverns at the storage sites indicate a high degree of mixing takes place among the various oils injected. Therefore, the sale price for oil from a particular cavern will depend on the average quality of the entire cavern. The quality of a specific shipment will only marginally affect the overall quality of oil in a cavern.

GAO believes that compliance with its recommendation will not unduly influence market prices because (1) the occasions that would give rise to paying slightly over the Fuel Supply Center's market price range are relatively infrequent and (2) the market does not recognize a precise price range but allows for deviations that are considered to represent fair and reasonable prices. Over the 20-month period that GAO reviewed in detail, the Fuel Supply Center had only three opportunities to select a lower priced crude oil that slightly exceeded its spot market price range instead of a higher priced crude oil that was within its spot market range.

In addition, the GAO recommendation provides flexibility by calling for the Fuel Supply Center to consider, but not necessarily purchase, crude oil that slightly exceeds its spot market price range. One consideration would be the impact of the purchase on the crude oil spot market. In GAO's opinion, however, the opportunity to accept such offers would be infrequent enough to minimize any impact on the market.

GAO also believes that compliance with the recommendation will not exceed the contracting officer's authority. GAO noted that on four occasions during fiscal year 1982, the Fuel Supply Center paid more than its spot market high price and still met exemption requirements of the Truth in Negotiations Act. The Fuel Supply Center did this by using the higher long-term contract prices as its market price

range. In addition, the Fuel Supply Center cited other compelling reasons for paying the higher prices. GAO believes that reducing oil acquisition costs--a legislative objective--is also a compelling reason for making an exception. (See pp. 18 to 20.)

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ABBREVIATIONS

DAR	Defense Acquisition Regulation
DFSC	Defense Fuel Supply Center
DOD	Department of Defense
DOE	Department of Energy
GAO	General Accounting Office
SPR	Strategic Petroleum Reserve

CHAPTER 1

INTRODUCTION

To reduce the nation's vulnerability to oil supply interruptions, the Energy Policy and Conservation Act (Public Law 94-163, Dec. 22, 1975) authorized the creation of a Strategic Petroleum Reserve (SPR) to store up to one billion barrels of crude oil and/or petroleum products. The Department of Energy (DOE) has responsibility for managing the SPR program and is storing crude oil at five storage sites in Texas and Louisiana. DOE currently plans to acquire 750 million barrels of crude oil for the SPR by the end of 1990. As of August 31, 1984, DOE had 429 million barrels of oil in storage, or 57 percent of its goal.

A 1977 interagency agreement between DOE's predecessor--the Federal Energy Administration--and the Department of Defense (DOD) delegated authority for purchasing crude oil to the Defense Fuel Supply Center (DFSC), a DOD agency. DOE has issued to DFSC periodic oil acquisition orders that specified quantities, types, and physical properties of crude oil to be purchased for the SPR and schedules for filling it. DFSC then has solicited offers from oil companies and traders to sell oil to the SPR either through the world crude oil spot, or short-term, market or through long-term contracts. Since August 1981, DOE has also purchased oil for the SPR through direct long-term contracts with Petroleos Mexicanos (PEMEX), the Mexican national oil company.

DOD's Military Sealift Command, at DFSC's request, has provided freight rate estimates for use in evaluating offers and to charter tankers for transporting oil. SPR oil deliveries are subject to the Cargo Preference Act of 1954 (46 U.S.C. 1241(b)). The act requires the SPR program, as a government procurement program using ocean-going vessels, to transport at least 50 percent of the oil in commercial U.S.-flag tankers (tankers registered in the United States) to the extent that such vessels are available at fair and reasonable rates.¹ To comply with the act, DOE requested DFSC during the period of our review to give preference to offers for which U.S.-flag tankers could be used to transport the oil. Consequently, DFSC generally encouraged offers for oil deliveries in U.S.-flag tankers or oil that the government could take possession of at the cargo's port of origin so that the Military Sealift Command could charter a U.S.-flag tanker.

¹DOE and the Maritime Administration, which administers federal government compliance with the Cargo Preference Act, have agreed to measure compliance in long ton-miles. This accounts for the quantity of oil transported and the distance it is moved.

DFSC began purchasing oil for the SPR in 1977. However, due to tight world oil supplies, DOE suspended oil purchases from April 1979 to August 1980. When DFSC resumed buying oil, it used a one-time acquisition program to exchange Naval Petroleum Reserve oil for oil delivered to the SPR. On January 27, 1981, DOE authorized DFSC to buy oil regularly on the crude oil spot market.

This report examines DFSC procedures for buying SPR oil on the spot market and through long-term contracts from February 13, 1981, to May 17, 1983. During this period, DFSC purchased 121 million barrels of crude oil on the spot market at a cost of \$4.1 billion and 8.5 million barrels through long-term contracts at a cost of \$292 million. In addition, DOE received about 75 million barrels of oil during this period through the PEMEX contracts.

THE CRUDE OIL MARKET

Over 100 types of crude oil are available and sold in the international oil market. Prices of crude oil types vary, depending primarily on the physical properties, such as the sulfur content and specific gravity of the oil. (Prices also vary to some degree due to market conditions for the different crude oil types.) An oil's physical properties affect refinery costs and petroleum product yields. High sulfur oil is more costly to refine than low sulfur oil, and refineries that process low gravity oil need special equipment. A high gravity oil will yield more gasoline and jet fuel than a low gravity oil.

DOE categorizes SPR crude oil as either sweet (less than 0.5 percent sulfur content) or sour (from 0.5 percent to 1.99 percent sulfur content).² DFSC has not bought crude oil types with higher sulfur contents. DOE's sweet and sour categories contain numerous acceptable crude oil types. (See app. I for information on 23 crude oil types from 16 countries that DFSC purchased between February 1981 and May 1983.)

Oil is traded in the international marketplace in two ways: through term contracts--which may be for periods of from several months to more than a year--or through single, or spot, transactions. The long-term market consists primarily of contracts between oil producers and oil refiners.

The spot market is an informal, world-wide network of traders who specialize in spot transactions, larger oil companies, and brokers who arrange transactions by bringing buyers and sellers together. It is essentially an open, free, and unregulated market. The market's trading activity and prices are related to supply and demand conditions of the total world oil

²DOE further subdivides acceptable sweet crudes into four categories and acceptable sour crudes into two categories.

market. Generally, when supplies are abundant, as they have been for the last 3-1/2 years, spot trading flourishes and prices tend to fall below the posted official selling prices (posted prices) and long-term contract prices. The reverse may occur in short supply conditions. Spot market prices are more volatile than long-term contract prices, which are normally pegged to an oil producer's posted prices. This is because spot market prices reflect short- and long-term supply and demand for oil.

Because spot market prices can change quickly, spot market participants and observers³ seek to obtain the most current information available about transactions and offers to buy or sell oil. Prices paid in spot market transactions are not publicly listed, except for those transactions that trade publications are able to report based on their market intelligence efforts. Market traders and observers generally rely on informal networks of trusted market contacts for price and other information about transactions or offers to buy or sell in the market.

As of May 1983, Free World oil production was about 37.4 million barrels per day and spot prices for oil acceptable to the SPR ranged from about \$27 to \$30 per barrel.

DFSC PROCEDURES FOR BUYING OIL

The interagency agreement between DOE and DOD gives DFSC the discretion to determine the appropriate method for buying crude oil, but also requires it to comply with the Defense Acquisition Regulation (DAR).⁴ From February 1981 to May 1983, DFSC bought oil predominantly through a series of single purchase transactions on the spot market. DFSC also bought oil through four term contracts. (See app. II for a summary of the DFSC purchases.)

Spot market purchases

DFSC purchases oil on the spot market through open, continuous solicitations for offers to sell oil to the SPR through negotiated, firm, fixed-priced contracts. The DAR requires that, for negotiated contracts, supplies and services be procured from responsible sources at fair and reasonable prices calculated to result in the lowest ultimate overall cost to the government. The Energy Policy and Conservation Act also has an objective that SPR costs be minimized.

³In addition to traders, brokers, and other participants, spot market activities are tracked closely by the oil industry, including oil companies and producing countries, oil industry trade publications and consultants, and DOE and other federal agencies.

⁴In April 1984, the DAR was superseded by the Federal Acquisition Regulation and the DOD supplement. The DAR's requirements affecting DFSC's SPR oil acquisition effort did not change.

Through the open, continuous solicitation, DFSC announces its intention to receive offers from interested, responsible suppliers every 2 weeks unless otherwise announced. These buying cycles begin with the opening of a solicitation for 1 week during which offers can be submitted. At the end of the week, the solicitation is closed, and DFSC does not accept any other offers until the next solicitation cycle. During the following week, DFSC evaluates spot market oil prices, negotiates with offerors, requests best and final offers, and then awards contracts for offers that it considers acceptable.

For each offered crude oil type, DFSC performs a market analysis to establish what it considers to be a fair and reasonable market price. DFSC primarily uses spot market contacts and prices published in trade journals to establish a spot market price range for each individual crude oil type. An offer of a crude oil type can be for delivery at the port of origin or an intermediate transshipment point or it can be for delivery at the SPR receiving terminal in a U.S.-flag or a foreign-flag tanker. During the period of our review, DFSC used Military Sealift Command tanker transportation estimates to standardize the offers to the cost of delivering the oil to the SPR receiving terminal in a foreign-flag tanker.⁵

DFSC's market analyst regularly updates the oil price data during the week after the solicitation closes. DFSC compares offers against its spot market price range for the crude oil types and negotiates with offerors to lower prices and accommodate desirable delivery terms (compatible with SPR fill schedules and delivery by U.S.-flag tankers). Offerors may change the terms of their offers, including price or quantity, and may add or withdraw offers.

Following negotiations, DFSC declares a deadline for best and final offers. It then evaluates these offers and awards contracts the following day. Normally, DFSC only awards a contract for an offer that falls within its spot market price range for the given crude oil type. In making awards, DFSC usually (1) gives preference to offers that can be delivered in U.S.-flag tankers in order to comply with the Cargo Preference Act and then (2) selects offers that have the lowest per barrel cost, using

⁵For example, DFSC might receive an offer for Arabian Light oil delivered to the SPR in a U.S.-flag tanker. To assess the reasonableness of the offer and to compare it to the other offers of Arabian Light oil, DFSC would use the Military Sealift Command's estimates of the cost to transport oil in a U.S.-flag tanker and in a foreign-flag tanker from Saudi Arabia to an SPR terminal. To standardize the offer to a delivered-on-a-foreign-flag-tanker basis, DFSC would subtract the U.S.-flag tanker cost estimate and add the foreign-flag tanker cost estimate.

its standardized transportation estimates, in order to minimize the overall cost to the government.

Term purchases

DFSC awarded one term contract in December 1981 and three term contracts in September 1982 through two requests for proposals to sell oil. For term purchases, DFSC has used negotiated, firm, fixed-priced contracts with price adjustment provisions. Price adjustment clauses allow price changes whenever there is evidence of changes in term market prices or posted prices, depending on which is used as a reference base price in the contract.

DFSC uses the same general procedures for evaluating term purchases as for spot market purchases--receipt of offers, closing, market analysis, negotiations, best and final offers, evaluation of final offers, and awards. However, more time is taken to award term contracts because prices are not as time sensitive or volatile as spot prices and because the contracts are more complicated, due to the price adjustment clauses, and require more negotiation and review.

PREVIOUS GAO WORK

We have issued several reports that discuss DFSC's SPR oil acquisition activities. (See app. III.) Our report, Purchase Price of Strategic Petroleum Reserve Oil Fair but Payment Timing Is Costly (PSAD-80-30, Apr. 3, 1980), found that DFSC paid fair and reasonable prices and that price competition was generally adequate from the inception of the program through June 30, 1979. Our report, Comparison of Strategic Petroleum Reserve Oil Prices and Commercial Oil Prices (GAO/RCED-83-156, Sept. 30, 1983), compared DFSC's spot market and long-term contract prices for oil purchased in 1981 and 1982 to average prices that oil companies paid. The report did not assess the adequacy of DFSC's oil acquisition policies and procedures for acquiring SPR crude oil.

OBJECTIVES, SCOPE, AND METHODOLOGY

This review is one of a series of reviews to evaluate the government's performance in developing, filling, and operating the SPR. On March 8, 1984, the Chairman and Ranking Minority Member of the Senate Committee on Energy and Natural Resources asked that findings and any recommendations resulting from these reviews be reported to the Committee. The objectives of our review were to evaluate the adequacy of DFSC procedures for acquiring SPR crude oil and to determine whether DFSC was following its procedures. Specifically, we assessed

- the adequacy and reliability of DFSC's market price analyses (pricing guidelines) as criteria for purchase decisions,

--the offer evaluation procedures and policies to determine if they have resulted in purchases at fair and reasonable prices and at the lowest overall cost to the government, and

--whether DFSC has followed its policies and procedures.

To evaluate DFSC's oil acquisition program, we reviewed appropriate laws, appropriate sections of the DAR, and DFSC policies and records, including pre-award and contract files. We evaluated step-by-step procedures and logic for evaluating offers and making awards, and we assessed data sources for developing market prices for spot solicitations.

We interviewed DOE and DFSC officials about SPR oil acquisition policies and procedures and about DFSC's performance. We also interviewed a number of crude oil spot market traders and observers to obtain diverse perspectives on spot market dynamics, DFSC's performance, and the impact of DFSC purchases on the market. (See app. IV.) These included executives from eight companies that had sold crude oil to DFSC with varying frequency and in varying quantities and that were active in the crude oil spot and long-term markets, trade journalists who reported on crude oil market activities, and a crude oil market consultant who had previously been a participant in the National Petroleum Council (an advisory group to DOE, including the SPR program) and whom the council identified as being knowledgeable about the spot market.

Our review covered 42 open, continuous solicitation closings from February 13, 1981, when DFSC began to buy oil on the spot market, through May 17, 1983, the termination point for DFSC's 1982 solicitation. Because of the volume of records, we tested DFSC's adherence to its procedures and policies by examining in detail 41 contract awards for the 17 solicitation closings in fiscal year 1982. During our evaluation, we identified a closing in fiscal year 1982 when DFSC could have reduced the overall oil acquisition cost if it had awarded a contract to an offeror whose price slightly exceeded DFSC's market high range instead of awarding a contract to an offer for better quality, but more expensive, oil. To determine if more such instances occurred and, consequently, to determine if the issue was significant, we extended this analysis to cover an additional 10 contract awards for 9 closings from January 1983 to May 17, 1983. (See ch. 3.)

We accepted DOE's oil acquisition orders to DFSC as valid. That is, we did not examine DOE's acquisition strategy--whether the ratio of sweet and sour volumes ordered to be purchased was the most economical combination or whether other mechanisms, such as acquiring Naval Petroleum Reserve oil owned by the federal government, would have been more economical.

We did not examine the accuracy of transportation rate estimates furnished by the Military Sealift Command to DFSC for offer evaluation purposes. DFSC from time to time has performed its own analysis of the reliability of the Military Sealift Command's furnished rates. We also did not evaluate DFSC's policy to give preference to offers that could use U.S.-flag tankers because DOE requested DFSC to do this in order to comply with the Cargo Preference Act.

Our review was conducted from January 1983 through August 1983 in accordance with generally accepted government auditing standards.

CHAPTER 2

PURCHASE PROCEDURES GENERALLY ASSURE THAT

PRICES ARE FAIR AND REASONABLE AND AT

LOWEST TOTAL COST TO THE GOVERNMENT

The Defense Acquisition Regulation requires that acquisitions be made at fair and reasonable prices calculated to result in the lowest overall cost to the government. It identifies a number of procedures that can be followed in negotiated procurements to assure that the government paid fair and reasonable prices. In our opinion, DFSC's procedures to determine fair market prices and evaluate sellers' offers satisfied DAR requirements and generally assured that it purchased crude oil at fair and reasonable prices and at the lowest overall cost to the government.

DFSC PRICING METHODS MEET DAR REQUIREMENTS

To establish fair and reasonable prices, the DAR requires that either a cost or price analysis be performed in connection with every negotiated procurement action. We examined DFSC records for each closing from the time it began buying crude oil on the spot market in 1981 until the last closing under its 1982 solicitation in May 1983. In each of the 42 closings during this period, DFSC performed its own independent analysis of market prices and established price guidelines for negotiating and awarding contracts to supply crude oil.

The DAR specifies several ways that the price analysis may be accomplished, including the comparison of offered prices with prices set forth in published price lists, published market prices of commodities, and similar indicators. DFSC's general established procedure for performing its price analyses was to use a combination of these price sources. It developed a market price range for each offered crude oil type by using posted prices of oil producers, prices reported in oil industry trade journals or by knowledgeable market contacts, and in some cases by constructing what it considered to be a fair price.

As was mentioned earlier, spot market traders are not required to report sales transactions. As a result, the spot market traders and observers we interviewed indicated that traders, brokers, and trade journalists primarily use personal contacts with other participants and observers to identify current spot market prices because the contacts are the most reliable source available to them and can provide the most current price information. DFSC's market analyst obtained prices of known transactions or offers to buy or sell oil through various persons active in spot market trading or knowledgeable of spot market

conditions and transactions, and who were, according to DFSC's market analyst, independent from DFSC suppliers.

When current spot market price information for an offered crude oil type was not available, the analyst constructed a price based on the past price relationship between it and another crude oil type for which current spot market prices were available. For example, Egypt's Gulf of Suez Blend crude oil and Dubai Fateh crude oil generally are of comparable quality and trade on the spot market for about the same price. If current market information was not available for the Gulf of Suez Blend crude oil, the DFSC market analyst would use current Dubai Fateh prices to estimate a price. Several spot market traders we interviewed said that this is a valid way to estimate a fair price in the absence of current, direct price information for a particular crude type.

DFSC records indicated that posted prices, prices reported by trade journals or market contacts, and constructed prices were used as the basis for price analysis in the last 33 of the 42 spot market solicitation closings from February 1981 to May 1983. Price sources were not specifically documented for the first nine closings of the period (February 1981 to June 1981). Discussions of prices in the market analysis reports indicated, however, that producers' posted prices and prices published in the trade press were heavily relied on during these closings as price sources, with occasional reference made to unspecified sources or market data supplied by offerors.

The DFSC market analyst for the first nine closings told us that during this period DFSC also was using confidential contacts with persons knowledgeable of the market, but to a lesser extent than in later closings. This was because (1) DFSC subsequently developed a broader base of knowledgeable market contacts and (2) Organization of Petroleum Exporting Countries price decreases in April 1981 caused a sharp drop in spot prices and created a more active and volatile spot market, requiring more timely price information which could better be supplied by market contacts. According to the market analyst, DOE price data collected on a voluntary basis from traders and oil companies were also used as a general backup price reference.

OFFER EVALUATION AND CONTRACT AWARD
PROCEDURES GENERALLY ASSURE THAT PURCHASE
PRICES ARE REASONABLE AND AT LOWEST COST

In addition to evaluating DFSC pricing methods, we assessed DFSC's policies and procedures for evaluating and awarding crude oil offers. DFSC has considered any price above its spot market price range as not fair and reasonable. During the period of our review, unless there were compelling reasons for an exception, DFSC's policy was to not accept an offer that exceeded the high

of the spot market price range, as determined by its price analysis, or the producer's posted prices, whichever was lower.¹ Subsequently, in June 1983, DFSC began to use only its spot market price range to make its purchase decision. (Because of the reduction in world oil demand and the shift of buyers to the crude oil spot market, the availability of third-party long-term contract data was reduced.) For offers that are within the spot market price range, DFSC's policy is to award contracts to the lowest total per barrel cost offers, including transportation, that are consistent with cargo preference requirements and that can meet SPR delivery schedules.

The highest price that DFSC is willing to pay for a crude oil type is based on market analysis policies and procedures that we believe meet DAR requirements for identifying current fair and reasonable prices. Therefore, DFSC's offer evaluation and award procedures give reasonable assurance that the prices paid at any given closing are fair and reasonable. Also, since DFSC selects the lowest total-cost, qualifying, fair and reasonable offer, the procedures generally assure that spot purchases are at the lowest cost.

DFSC's policy to give preference to offers that can be delivered in U.S.-flag tankers is in response to DOE's request. As a result of this preference, DFSC normally will pay a higher total per barrel cost (including transportation) for the offer of oil that will use a U.S.-flag tanker than it would for another offer of oil that would use a foreign-flag tanker. During the period of our review, U.S.-flag transportation rates generally were two to three times higher than foreign-flag rates (\$3 or more per barrel to deliver oil from the Middle East). The Cargo Preference Act requirement that at least 50 percent of the SPR oil be transported in U.S.-flag tankers adds to the SPR program's oil acquisition cost. In return, the requirement benefits the U.S. merchant marine and may benefit DOD, which may need U.S.-flag tankers to respond to national security emergencies.

DFSC generally adhered to its purchasing procedures

To test whether DFSC followed its procedures, we examined DFSC records for fiscal year 1982 spot market closings, which consisted of 41 contracts awarded in the 17 closings. For 37 contracts, the price was at or below DFSC's spot market high prices, while for 4 contracts DFSC made an exception for offers that exceeded the spot market high price. Each of the 37 contracts that met the price criteria also was the lowest overall cost offer that qualified and that met delivery requirements,

¹The latter criterion was instituted to prevent the government from being in the position of encouraging oil prices to rise above current official prices.

except when DFSC passed over lower cost offers in favor of those that could be delivered in U.S.-flag tankers.

Pricing judgment is allowed and was exercised

In describing its general policy to buy at fair and reasonable prices, the DAR states that good pricing depends primarily on the exercise of sound judgment by all personnel concerned with the procurement. It recognizes that it is not always possible to meet the government's pricing objectives and requires the contracting officer to exert judgment in making a final award decision. In each of the four cases in which DFSC paid more than its spot market high price for a crude oil, the contracting officer judged that prices were nevertheless fair and reasonable under existing market circumstances or that the awards were in the best interest of the government.

We examined the circumstances and reasoning documented by DFSC for making an exception to its price guidelines in the four cases and did not find any basis for questioning DFSC's judgments. Instead of using its spot market price range, DFSC used higher long-term contract prices because substantial third-party sales occurred at the higher long-term contract prices and because, in DFSC's opinion, other compelling reasons justified its decision to exceed the high of the spot market price range.

In one case the contract price exceeded the spot market high price by 3 cents per barrel but allowed a tanker carrying a previously contracted partial load of oil to be filled completely, thus saving the government about 69 cents per barrel in shipping costs. In two cases, DFSC paid 4 cents and 20 cents per barrel over its market high price because it had other indicators that higher prices were being paid for long-term contracts and the offers would facilitate making up a deficit of U.S.-flag tanker usage required by the Cargo Preference Act. In the fourth case, DFSC paid 69 cents per barrel over its market high price during an outbreak of hostilities between Iran and Iraq because (1) it needed the oil to meet SPR fill schedules, (2) the spot market high price was based on pre-hostility transactions, (3) spot market prices were expected to rise sharply, (4) all other lower price offers had been withdrawn, and (5) the price was equal to the producer's posted price for the crude oil.

Prices awarded compare favorably with other spot market purchases

To assess DFSC's performance in buying oil on the spot market, we compared DFSC's fiscal year 1982 contract prices with its spot market price range for each crude oil that it purchased. (We could not verify the accuracy of the market ranges because of the confidentiality of the market and inaccessibility of sales documents.) For 34.7 million barrels of crude oil, DFSC's prices were on average 14 cents per barrel below the market high price and 19 cents per barrel above the market low price.

Our report, Comparison of Strategic Petroleum Reserve Oil Prices and Commercial Oil Prices, compared DFSC's spot market prices from February 1981 to December 1982 to prices reported in trade journals at the time. The report stated that DFSC paid from 12 cents per barrel to 28 cents per barrel more, depending on transportation estimates used, for 93.5 million barrels of oil than it would have if it had paid average prices paid by other spot market oil traders. For the period after April 1981, however, when DFSC began to make more extensive use of market contacts, DFSC paid from 3 cents per barrel less to 15 cents per barrel more than average spot prices, depending on transportation estimates used.

In addition, all of the spot market traders and observers we interviewed generally gave DFSC good marks for the prices it paid for spot purchases. Each said that on the whole DFSC had fared well in terms of prices it paid. Several stated that DFSC has obtained excellent prices, especially considering that it must comply with DOE and DAR procurement requirements while private spot market traders are not similarly constrained.

CONCLUSIONS

Between February 1981 and May 1983, DFSC's offer evaluation and contract award procedures for SPR crude oil acquisition satisfied DAR requirements and generally assured that purchases were at fair and reasonable prices and at the lowest overall cost to the government. During this period, DFSC followed its procedures. Our comparisons of DFSC's prices with spot market prices and interviews with spot market traders and observers indicate that, on the whole, DFSC paid fair and reasonable prices.

CHAPTER 3

MAKING EXCEPTIONS TO PRICE GUIDELINES IN CERTAIN CIRCUMSTANCES COULD REDUCE COSTS

As discussed in chapter 2, DFSC's policy is to not accept an offer which exceeds the high of its spot market price range for the given crude oil type, unless there are compelling reasons for making an exception. DFSC made exceptions for 4 of the 41 contracts awarded in fiscal year 1982. The contracting officer justified the exceptions on the basis of saving money by sending a tanker with a full cargo instead of a partial cargo, using U.S.-flag tankers, meeting SPR program needs for a steady oil supply, and/or changing spot market conditions.

We found three cases between October 1981 and May 1983 when DFSC could have bought a lower priced oil of equal acceptability if DFSC had made an exception in order to slightly exceed its spot market price range. If DFSC had done this in the three cases, it would have reduced its acquisition costs by about \$1.9 million for the amount of oil it purchased.

PRICE FLEXIBILITY WOULD HAVE REDUCED COSTS IN PAST AWARDS

As discussed in chapter 1, DOE has established minimum quality specifications for SPR oil. According to the Deputy Assistant Secretary for the SPR, DOE is indifferent to which crude oil types are supplied to the SPR as long as they meet DOE's general specifications for sweet or sour oil. Normally, if DFSC has a choice of two crude oil types that are priced within its spot market price range and both use either a U.S.-flag or a foreign-flag tanker, it will select the offer with the lower per barrel cost.

Table 1 shows 3 instances among 51 contracts awarded from October 1981 to May 1983--the period that we examined purchases in detail--when DFSC declined to buy less expensive types of oil that exceeded its spot market high prices by 15 cents per barrel or less.¹ Instead, DFSC selected a crude oil type that was within or, in one case, that slightly exceeded its spot market high price. (The Qatar Marine crude oil shown in table 1 exceeded its spot market price range by 4 cents per barrel and is one of the four exceptions discussed in chapter 2. On the same date,

¹We chose 15 cents per barrel over market prices as a limit in our analysis because that was generally about the upper limit on prices that most market traders and observers we spoke with said would still be considered reasonable under normal market conditions. A few respondents said that up to 25 cents per barrel might be considered reasonable.

Table 1

DFSC Opportunities For Reduced Costs

	Crude oil type	Quantity (barrels)	Offered price, delivered ^a	Market high price, delivered ^a	Amount over(+)/under(-) market high price	Total estimated delivered cost
			(\$/barrel)			
<u>Case 1</u> (Jan. 6, 1982)						
Offer awarded	Qatar Marine	730,000	\$36.43	\$36.39	+ .04	\$26,593,900
Offer not awarded	Dubai	900,000	<u>35.39</u>	35.28	+ .11	<u>25,834,700^b</u>
Reduced costs for first 730,000 barrels			1.04			759,200
<u>Case 2</u> (Apr. 15, 1983)						
Offer awarded	Ninian	500,000	30.25	30.30	\$-.05	\$15,125,000
Offer not awarded	Kole Marine	675,000	<u>30.05</u>	29.90	+ .15	<u>15,025,000^c</u>
Reduced costs for first 500,000 barrels			.20			100,000
<u>Case 3</u> (May 17, 1983)						
Offer awarded	Bonny Light	1,000,000	30.49	30.50	-.01	30,490,000
Offer not awarded	Kole Marine	750,000	29.36	29.23	+ .13	22,020,000
Offer not awarded	Ninian	500,000	<u>29.73</u>	29.63	+ .10	<u>7,432,500^d</u>
Total			<u>\$29.45^e</u>			<u>\$29,452,500</u>
Reduced cost for first 1,000,000 barrels			1.04			1,037,500
Total estimated acquisition cost reductions for 2,230,000 barrels ^f			\$ <u>.858</u>			\$ <u>1,896,700</u>

^aPrice at origin port plus DFSC estimate of transportation rates for delivery in a foreign flag tankers.

^bTotal estimated cost for first 730,000 barrels.

^cTotal estimated cost for first 500,000 barrels.

^dTotal estimated cost for first 250,000 barrels.

^eAverage price is \$29,452,500 ÷ 1,000,000 barrels.

^f730,000 barrels + 500,000 barrels + 1,000,000 barrels.

^gAverage acquisition cost reductions per barrel is \$1,896,700 ÷ 2,230,000 barrels.

Source: DFSC and GAO calculations.

DFSC also awarded a contract for three million barrels of Oman crude oil that exceeded DFSC's spot market price range by 20 cents per barrel. We used the Qatar Marine award because it more nearly matched the quantity of oil of the alternative offer that was not accepted.) In each case, DFSC could have reduced its overall oil acquisition costs if it had awarded contracts for the offers it rejected. This is because the three offers that DFSC rejected were for lower quality, but acceptable, crude oil that cost from 20 cents to \$1.04 per barrel less than the crude oil that DFSC bought. If DFSC had made an exception to its pricing criteria, it would have paid about \$1.9 million less.²

DFSC does not have formal guidelines that identify acceptable considerations that the contracting officer can cite for making an exception to the market high price criteria. DFSC's unwritten policy is that exceptions are decided on a case-by-case basis. We believe that DFSC should establish guidelines that identify special circumstances, such as DOE or DOD objectives, SPR program needs, or oil spot market conditions, that may warrant DFSC making an exception to its policies and procedures. In particular, we believe that DFSC should consider making an exception to the spot market high price criteria when relatively small adjustments would result in lower per barrel acquisition costs for acceptable SPR crude oil. (This would be consistent with DOE and DOD objectives to minimize overall oil acquisition costs.) We recognize that DFSC would have to be sensitive to how much it could deviate from known spot market prices before it pays prices that the market would consider unreasonable based on prevailing prices. DFSC's market analyst for these cases would need to evaluate the market's sensitivity to price deviations.

DFSC's REASONS FOR NOT MAKING
EXCEPTIONS TO ITS PRICE CRITERIA

DFSC officials gave the following reasons why DFSC did not make an exception to its pricing criteria in the three cases we identified and should not do so in similar future circumstances:

- The market would not consider the price fair and reasonable because market traders are able to discern the same market prices as DFSC, and anything paid above those prices would be considered excessive or unreasonable.
- If sellers were to realize that DFSC was willing to pay above market prices, DFSC's leverage to negotiate offered prices downward would be eroded and, ultimately, overall higher prices would result.

²This represents acquisition cost reductions but does not account for revenue received when the oil is sold. Actual savings from these cost reductions could be greater or less than \$1.9 million, depending on how long the oil is stored, interest rates during the intervening period, and the price that buyers would pay.

--The Energy Policy and Conservation Act requires DFSC to minimize its impact on supply levels and market forces, and exceeding DFSC's spot market high prices would either firm or bolster market prices.

Fair and reasonable prices cannot be identified with precision

Our interviews with spot market traders and observers indicated that the market does not recognize a precise price bracket beyond which prices would not be considered fair and reasonable. This is because different participants and observers would hear about different spot market transactions. Also, information about the terms of delivery, such as the amount of oil bought or the delivery date, affect market perceptions about the price paid. Most respondents said that the closest a fair price could be pinpointed at any given time would be plus or minus 5 to 15 cents per barrel in steady markets for commonly traded crude oil types. A few said plus or minus 25 cents might be the closest it could be pinpointed. In more volatile conditions, or when there is low market activity, the consensus was that even less precision can be obtained, with some respondents citing an imprecision of up to 50 to 75 cents per barrel.

Consequently, if DFSC exceeded the price it identified as the highest recent price transacted--i.e., the high of the market price range derived from its market analysis--by small amounts, the market likely would perceive the price transacted as fair and reasonable because of uncertain price information in the market. The extent to which DFSC could exceed known market prices and still be perceived by the market as paying reasonable prices would depend on the market conditions existing at the time of purchase.

DFSC bargaining position probably would not be affected

Most spot market traders and observers we interviewed said that generally the market would not know when DFSC was exceeding its price criteria and would not perceive that it was paying unreasonable prices unless it exceeded market prices by large amounts. This is because DFSC keeps its pricing criteria secret and because different participants and observers will hear about different transactions. Furthermore, most said that even if an offeror perceived that DFSC was occasionally exceeding its own price criteria or generally recognized market high prices on frequently traded crudes, DFSC's bargaining position would not be affected unless offerors perceived that DFSC exceeded market high prices consistently. Several also said that DFSC's prerogative to decline offers at any price gives them additional bargaining leverage to hold prices at reasonable market levels.

Occasional price exceptions
would probably not adversely
affect market forces

The general consensus of spot market traders and observers we talked with was that DFSC transactions do not significantly influence the market prices under normal market conditions. Also, even if DFSC were to exceed other known market prices by up to 5 or 15 cents per barrel, the prices generally would be considered reasonable by the market and would not have significant influence on market prices.

Generally, they said that only if DFSC were (1) buying in large volumes relative to the market, (2) buying in a low activity or short supply market, or (3) exceeding market prices consistently or by large amounts would DFSC have an impact on market prices. Most respondents said that DFSC's prices are given no more or less weight as reference prices than any other transactions quoted in the market. One said that DFSC prices would normally be given less regard than others because DFSC lacks the profit motive of others when buying oil. Another respondent also remarked that many factors influence market movement, including political and economic events, and that DFSC transactions were of insufficient significance to influence overall market trends.

Also, the DFSC contracting officer decided to exceed the market high prices for four awards in 1982 and 1983 with no apparent effect on spot market prices. This does not support DFSC's perception that exceeding the identified market high price by relatively small amounts would adversely influence spot market prices and affect the crude oil market.

CONCLUSIONS

In three instances between October 1981 and May 1983, DFSC could have paid about \$1.9 million less by making an exception to its pricing criteria in order to purchase offered crude oil that slightly exceeded the high of its spot market price range. Because there is doubt that fair spot market prices can be determined with precision, exceeding identified spot market prices by small amounts for good reasons can still result in paying fair and reasonable prices. Further, on the basis of comments from the spot market traders and observers we contacted, it seems that market forces and DFSC bargaining leverage would not likely be affected in these circumstances unless DFSC frequently exceeded its spot market high price.

DFSC has not developed formal guidelines that identify acceptable considerations that the contracting officer can cite for making an exception to the spot market high price criteria. We believe that DFSC should establish guidelines that identify special circumstances that may warrant DFSC's making an exception to its policies and procedures. In particular, DFSC should consider

making an exception to the spot market high price criteria when relatively small adjustments would result in lower per barrel acquisition costs for acceptable SPR oil. In deciding whether to make such exceptions to the pricing criteria, DFSC will need to evaluate the market's sensitivity to price deviations and exercise judgment on the extent to which it deviates from known prices.

RECOMMENDATION

GAO recommends that the Secretary of Defense instruct the Commander, DFSC, to develop formal guidelines for the contracting officer to use for making exceptions to DFSC's purchase procedures. In particular, the guidelines should allow for consideration of offers for acceptable quality oil that slightly exceed the spot market high price but result in lower per barrel acquisition costs.

AGENCY COMMENTS AND OUR EVALUATION

DOD and DOE disagreed with our conclusion that DFSC could have reduced costs by making an exception to its price criteria in certain circumstances, and they disagreed with our recommendation. Both DOD and DOE questioned whether purchasing lower cost, lower quality oil at above spot market range prices would in reality represent a cost savings over paying a reasonable price for a higher quality crude oil. DOD stated that paying an unreasonable price for lower quality oil does not represent a savings and the savings projected by GAO are illusory. DOE stated that, while it is indifferent about which crude oil types are purchased provided they meet minimum SPR oil quality specifications, DOE is not indifferent to the price paid for a crude oil with respect to its market value. DOE also stated that the total cost to the government--reflecting both the acquisition cost and the sales revenue--must be considered.

We recognize that a crude oil's value is an important consideration for the purchase decision, and we agree with DOE that the value of an oil when purchased will affect the net revenue the government will receive when the oil is sold. However, lower acquisition costs are immediate, while the added value of a higher quality crude oil would not be realized until the oil is sold in response to a supply disruption. In present value terms, a dollar now is worth more than a dollar received in the future. If the time value of money is considered, the cost reductions achieved by purchasing a lower priced oil are likely to exceed the net revenue obtained from selling a higher value, higher cost oil at some future time when discounted to the time the oil was acquired. Furthermore, it is not clear that the full incremental difference in value of the higher cost oil will be realized when it is sold since it is mixed with various quality oils in 10-million-barrel caverns at the SPR storage sites. Oil samples taken from filled caverns at the storage sites indicate a high

degree of mixing takes place among the various oils injected. Therefore, the sale price for oil from a particular cavern will depend on the average quality of the entire cavern. The quality of a specific shipment will only marginally affect the overall quality of oil in a cavern.

DOD stated that, in addition to the objective of minimizing oil acquisition costs, DFSC is required to ensure that its purchases have minimal impact on market forces and supply availability and that prices are fair and reasonable. DOD said that we understated the potential impact of DFSC's purchases on the crude oil market and that the market situation must be constantly monitored to assure that SPR oil purchases do not become a factor in setting the market price.

We agree with DOD that these are valid concerns. As a result, we have not proposed that DFSC change its procedures. Rather, our recommendation would fine tune existing procedures so that the contracting officer would consider offers that slightly exceed the spot market high price but would result in lower per barrel acquisition costs. One consideration would be the impact of the purchase on the crude oil spot market. In our opinion, however, the opportunity to accept such offers would be infrequent enough to minimize any impact on the market.

DOD disagreed with our recommendation, stating that a policy of paying more than a market price range that DFSC has determined to be a fair and reasonable price would exceed the contracting officer's authority under the Federal Acquisition Regulation and the DOD supplement. DOD also stated that the market price range is used by DFSC to determine whether contracts awarded for SPR oil comply with cost accounting standards and truth in negotiations legislation. Contractors with cost contracts over \$100,000 must comply with cost accounting standards promulgated by the Cost Accounting Standards Board. Additionally, the Truth in Negotiations Act requires that prime contractors for negotiated contracts over \$500,000 submit certified cost or pricing data to the government. These requirements, however, need not be complied with when such contracts are based on market prices. DOD expressed concern that compliance with our recommendation would invalidate the market price exemption.

We agree with DOD that DFSC must comply with federal procurement laws, but we disagree that compliance with our recommendation would invalidate the market exemption. During the period of our review, DFSC's policy was to use the lower of either its spot market high price or long-term contract prices to determine a fair and reasonable price for each offered crude oil type. However, in four cases DFSC exceeded its spot market high prices. It determined that substantial sales occurred at higher long-term contract prices and that other compelling reasons justified its decision. (We agree with DOD's position that if an offered spot market price is below long-term contract prices that are based on

substantial third-party sales, DFSC can pay up to the long-term contract price and still comply with cost accounting standards and qualify for the exemption allowed in the Truth in Negotiations Act.) In our discussion of making an exception to DFSC's pricing criteria, we intended only to refer to DFSC's more stringent policy to pay no more than the high of the spot market price range or long-term contract prices, whichever is lower. We have made changes in the final report to clarify this.

CRUDE OIL DELIVERED TO THE SPR THAT WAS
PURCHASED BY DFSC FROM FEBRUARY 1981 TO MAY 1983

<u>Crude type (country)</u>	<u>*API gravity</u>	<u>Percent sulfur content</u>	<u>May 1983 spot market prices^a</u>
<u>Sweet crude oil</u>			
Brent (U.K.)	38.0	0.34	\$29.00-29.70
Forties (U.K.)	36.3	0.31	28.00-29.50
Ninian (U.K.)	35.2	0.42	28.35-29.15
Es Sider (Libya) ^b	37.4	0.40	29.10-29.55
Sirtica Blend (Libya) ^b	37.0	0.10	c
Zarzaitine (Algeria)	42.2	0.08	29.50-30.00
Forcados (Nigeria) ^d	30.0	0.20	29.00-29.30
Escravos (Nigeria)	36.0	0.16	29.30-29.85
Bonny Light (Nigeria)	36.0	0.14	29.40-29.80
Kole Marine (Cameroon)	34.4	0.37	c
Loreto (Peru) ^d	29.3	0.54	c
<u>Sour crude oil</u>			
Alaskan North Slope (U.S.)	26.5	1.04	28.30-28.80 ^e
West Texas Sour (U.S.)	33.0	1.90	28.90
Isthmus (Mexico)	33.3	1.39	c
Oriente (Ecuador) ^d	30.0	0.95	27.25
Flotta (U.K.)	35.4	1.27	c
Arab Light (Saudi Arabia)	33.2	1.71	28.40-28.75
Dubai (Dubai)	31.2	1.89	27.50-28.20
Qatar Marine (Qatar)	36.0	1.50	c
Oman (Oman)	33.0	1.30	28.00-28.45
Iranian Light (Iran) ^b	33.4	1.37	27.75-28.10
Suez Blend (U.A.R.)	32.6	1.42	27.30-27.60
Mandji (Gabon) ^d	30.0	1.00	26.75

^aTypical spot market prices reported by oil industry trade journals during May 1983. Prices for a crude oil type vary with contract terms including the quantities purchased and lift dates.

^bDOE no longer accepts oil from Libya or Iran.

^cPrice data were not available.

^dForcados, Loreto, Oriente, and Mandji no longer meet minimum SPR oil quality specifications.

^eIncludes cost of delivery to U.S. Gulf Coast.

DFSC CRUDE OIL PURCHASES FOR THE SPR FROM FEBRUARY 1981 THROUGH MAY 1983

Table 1
Spot Contract Awards

1981 Solicitation (February 1981 to April 1982)

Closing no. and date	Award date	Awardee	Quantity ^a		Unit price ^b	Total price ^c		Crude type ^b
			Minimum	Maximum		Minimum	Maximum	
			(barrels)		(\$/barrel)			
1 - 2/10/81	2/13/81	Derby & Co., Inc.	300,000	350,000	\$39.60	\$11,880,000	\$13,860,000	Basket-sweet
		Derby & Co., Inc.	300,000	350,000	39.85	11,955,000	13,947,500	Basket-sweet
		Amoco Oil Co.	700,000	-	40.23	28,161,000	-	Ninian
2 - 2/17/81	2/20/81	Derby & Co., Inc.	400,000	500,000	39.495	15,798,000	19,747,500	Basket-sweet
		Derby & Co., Inc.	800,000	1,000,000	39.735	31,788,000	39,735,000	Basket-sweet
		Derby & Co., Inc.	400,000	500,000	39.815	15,926,000	19,907,500	Basket-sweet
		British Petroleum Oil Development	1,875,000	-	38.10	71,437,500	-	Forties
		Motor Oil Hellas	915,000	-	39.00	35,685,000	-	Es Sider
3 - 2/24/81	No award	-	-	-	-	-	-	
4 - 3/3/81	3/6/81	Derby & Co., Inc.	500,000	600,000	39.78	19,890,000	23,868,000	Basket-sweet
		Derby & Co., Inc.	800,000	1,000,000	39.76	31,808,000	39,760,000	Basket-sweet
		Derby & Co., Inc.	800,000	1,000,000	39.98	31,984,000	39,980,000	Basket-sweet
		Listo Energy, Inc.	600,000	-	39.95	23,970,000	-	Basket-sweet
		Houston Oil & Refining, Inc.	1,850,000	-	39.731- 39.751	73,502,350	73,539,350	Basket-sweet
		Coral Petroleum	1,000,000	-	39.80	39,800,000	-	Basket-sweet
5 - 3/10/81	3/13/81	British Petroleum Oil Development	1,650,000	-	38.00	62,700,000	-	Forties
			1,650,000	-	38.00	62,700,000	-	Forties
		Coastal States Trading Co.	600,000	-	36.75	22,050,000	-	ANS

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Table 1 (cont.)

Closing no. and date	Award date	Awardee	Quantity		Unit price	Total price		Crude type
			Minimum	Maximum		Minimum	Maximum	
			(barrels)		(\$/barrel)			
6 - 3/24/81	3/31/81	Derby & Co., Inc.	900,000	1,200,000	\$35.93	\$32,337,000	\$43,116,000	ANS
		Derby & Co., Inc.	450,000	600,000	37.45	16,852,500	22,470,000	Basket-sour
		Derby & Co., Inc.	900,000	1,200,000	35.86	32,274,000	43,032,000	ANS
		Derby & Co., Inc.	1,000,000		37.45	37,450,000		Basket-sour
		Derby & Co., Inc.	900,000	1,200,000	35.86	32,274,000	43,032,000	ANS
		Derby & Co., Inc.	800,000	1,200,000	37.45	29,960,000	44,940,000	Basket-sour
		Derby & Co., Inc.	450,000	600,000	37.35	16,807,500	22,410,000	Suez
		Derby & Co., Inc.	450,000	600,000	37.55	16,897,500	22,530,000	Suez
		Derby & Co., Inc.	450,000	600,000	37.55	16,897,500	22,530,000	Suez
		Derby & Co., Inc.	900,000	1,200,000	38.00	34,200,000	45,600,000	Basket-sweet
		Derby & Co., Inc.	900,000	1,100,000	37.70	33,930,000	41,470,000	Ninian
		Coastal States Trading Co.	650,000	-	41.10	26,715,000	-	Basket-sweet
		Listo Energy, Inc.	1,050,000	-	36.05	37,852,500	-	ANS
		Amerada Hess Corp. U.S. & S.A. Enterprises	2,000,000	-	38.80	77,600,000	-	Es Sider
		Houston Oil & Refining, Inc.	4,200,000	-	35.65	149,730,000	-	ANS
		Houston Oil & Refining, Inc.	1,000,000	1,500,000	38.51	38,510,000	57,765,000	Basket-sweet
Houston Oil & Refining, Inc.	1,000,000	1,500,000	35.89- 37.41	35,890,000	56,115,000	Basket-sour		
Coral Petroleum	1,000,000	-	38.90	38,900,000	-	Basket-sweet		
7 - 4/21/81	No award	-	-	-	-	-	-	
8 - 6/2/81	6/9/81	U.S. & S.A. Enterprises	800,000	-	33.50	26,800,000	-	Basket-sweet
		Chevron, USA, Inc.	726,000	-	31.70	23,014,200	-	ANS
		Conoco, Inc.	1,000,000	-	32.00	32,000,000	-	Brent
		Exxon Co. USA	3,000,000	-	32.20	96,600,000	-	ANS

Table 1 (cont.)

Closing no. and date	Award date	Awardee	Quantity		Unit price	Total price		Crude type	
			Minimum	Maximum		Minimum	Maximum		
			(barrels)		(\$/barrel)				
24	9 - 6/16/81	6/25/81	U.S. & S.A.						
			Enterprises	1,000,000	-	\$32.10	\$32,100,000	-	ANS
			Exxon International	550,000	-	33.45	18,397,500	-	Basket-sweet
			Texaco, USA	511,500	-	33.00	16,879,500	-	West Texas sour
			Derby & Co., Inc.	700,000	900,000	33.40	23,380,000	\$30,060,000	Basket-sweet
			Derby & Co., Inc.	1,200,000	-	33.30	39,960,000	-	Basket-sweet
			Derby & Co., Inc.	1,300,000	1,500,000	31.71	41,223,000	47,565,000	Arab Light
			Houston Oil & Refining Ltd.	1,000,000	-	33.25	33,250,000	-	Basket-sour
			Coastal (Bermuda) Ltd.	1,000,000	-	31.70	31,700,000	-	Arab Light
			Amoco Oil Company	800,000	-	32.70	26,160,000	-	Dubai
	6/26/81	Listo Energy Inc.	550,000	-	32.10	17,655,000	-	Brent	
10 - 6/30/81	7/9/81	Exxon International	1,000,000	-	34.25	34,250,000	-	Basket-sweet	
		Mobil Oil Corp.	1,935,000	-	31.94	61,803,900	-	ANS	
		Texaco USA	775,000	-	33.35	25,846,250	-	West Texas sour	
		Exxon Co. USA	1,500,000	-	32.44	48,660,000	-	ANS	
11 - 7/14/81	7/21/81	Texaco International	1,800,000	-	33.50	60,300,000	-	Dubai	
		Texaco Intrenational	300,000	-	32.00	9,600,000	-	Oriente	
		Texaco International	900,000	-	30.75	27,675,000	-	Oriente	
12 - 7/23/81	8/5/81	Exxon International	2,300,000	-	33.60	77,280,000	-	Basket-sour	
		Derby & Co., Inc.	725,000	-	31.85	23,091,250	-	Mandji	
13 - 8/13/81	8/19/81	Coastal States Trading Co.	150,000	-	37.50	5,625,000	-	Zarzaitine	
		Exxon Co. USA	1,000,000	-	32.85	32,850,000	-	ANS	
		Arco Petroleum Products	350,000	-	33.00	11,550,000	-	ANS	
		Derby & Co., Inc.	450,000	-	36.10	16,245,000	-	Basket-sweet	
		Derby & Co., Inc.	500,000	-	31.84	15,920,000	-	Basket-sweet	

Table 1 (cont.)

Closing no. and date	Award date	Awardee	Quantity		Unit price	Total price		Crude Type
			Minimum	Maximum		Minimum	Maximum	
			(barrels)		(\$/barrel)			
14 - 8/25/81	9/1/81	Exxon International	6,000,000	-	33.55	\$201,300,000	-	Basket-sour
		Derby & Co., Inc.	450,000	-	35.50	15,975,000	-	Basket-sweet
		Derby & Co., Inc.	850,000	-	31.65	26,902,500	-	Mandji
		Derby & Co., Inc.	700,000	-	33.58	23,506,000	-	Suez
15 - 9/8/81	9/15/81	Derby & Co., Inc.	50,000	-	33.38	1,669,000	-	Suez
		Derby & Co., Inc.	900,000	-	33.40	30,060,000	-	Basket-sour
16 - 9/15/81	9/28/81	Exxon International	2,270,000	-	33.65	76,385,500	-	Basket-sour
		Exxon International	1,000,000	-	34.00- 34.14	34,000,000	\$34,140,000	Isthmus
17 - 10/6/81	10/13/81	Derby & Co., Inc.	375,000	-	33.67	12,626,250	-	Basket-sour
18 - 10/20/81	No award	-	-	-	-	-	-	-
19 - 11/3/81	No Award	-	-	-	-	-	-	-
20 - 11/17/81	11/25/81	U.S. & S.A. Enterprises	625,000	-	33.68	21,050,000	-	ANS
		Derby & Co., Inc.	1,050,000	-	36.07	37,873,500	-	Ninian
		Derby & Co., Inc.	390,000	-	37.76	14,726,400	-	Brent
		Derby & Co., Inc.	500,000	-	33.95	16,975,000	-	Suez
21 - 12/1/81	12/8/81	Derby & Co., Inc.	350,000	-	33.42	11,697,000	-	ANS
		Derby & Co., Inc.	700,000	-	33.42	23,394,000	-	ANS
		Derby & Co., Inc.	450,000	-	35.40- 35.65	15,930,000	16,042,500	Basket-sour
		Derby & Co., Inc.	500,000	-	33.85	16,925,000	-	Suez

Table 1 (cont.)

Closing no. and date	Award date	Awardee	Quantity		Unit price (\$/barrel)	Total price		Crude type	
			Minimum	Maximum		Minimum	Maximum		
			(barrels)						
<u>Special oral solicitation^d</u>									
	12/10/81	12/11/81	Derby & Co., Inc.	100,000	-	\$36.07	\$ 3,607,000	-	Ninian
22 -	12/15/81	12/22/81	Derby & Co., Inc.	1,100,000	-	33.74	37,114,000	-	Dubai
			Gatoil International	800,000	-	33.74	26,992,000	-	Suez
			Tradax Petroleum	600,000	-	33.28	19,968,000	-	ANS
			T.W. Oil (Houston) Inc.	900,000	-	33.75	30,375,000	-	Dubai
23 -	12/29/81	1/6/82	Gatoil International	800,000	-	33.74	26,992,000		Suez
			TW Oil (Houston), Inc.	3,000,000	-	35.00	105,000,000		Oman
			Derby & Co., Inc.	900,000	-	35.20-			
						35.45	31,680,000	\$31,905,000	Basket-sour
			Derby & Co., Inc.	730,000	-	34.89	25,469,700	-	Qatar Marine
		1/7/82	Derby & Co., Inc.	730,000	-	33.78	24,659,400	-	Dubai
24 -	1/12/82	1/20/82	U.S. & S.A. Enterprises	900,000	-	33.15	29,835,000	-	ANS
			Tradax Petroleum	650,000	-	33.14	21,541,000	-	ANS
			Derby & Co., Inc.	1,200,000	-	33.32	39,984,000	-	Dubai
			Texas Energy Reserve Corp.	450,000	-	33.00	14,850,000		Dubai

Table 1 (cont.)

Closing no. and date	Award date	Awardee	Quantity		Unit price (\$/barrel)	Total price		Crude type
			Minimum	Maximum		Minimum	Maximum	
25 - 4/13/82	4/22/82	Exxon International	1,000,000	-	\$32.09- 32.31	\$32,090,000	\$32,310,000	Oman
		Exxon International	1,500,000	-	30.73- 31.10	46,095,000	46,650,000	Oman
		Gatcoil, International	1,800,000	-	29.51	53,118,000	-	Iranian Light
		Amoco Oil Co.	1,500,000	-	31.75	47,625,000	-	Suez
		Amoco Oil Co.	450,000	-	31.75	14,287,500	-	Suez
Total, 1981 Solicitation			<u>98,232,500</u>	<u>103,032,500</u>		<u>\$3,418,205,700</u>	<u>\$3,600,473,700</u>	

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Table 1 (cont.)

1982 Solicitation (April 1982 to May 1983)

Closing no. and date	Award date	Awardee	Quantity (barrels)	Unit price (\$/barrel)	Total price		Crude type
					Minimum	Maximum	
1 - 4/27/82	No award	-	-	-	-	-	-
2 - 5/11/82	5/18/82	Derby & Co., Inc.	960,000	\$33.10	\$31,776,000	-	Dubai
		Derby & Co., Inc.	380,000	34.40	13,072,000	-	Loretto
3 - 5/25/82	No award	-	-	-	-	-	-
4 - 6/8/82	6/15/82	Derby & Co., Inc.	900,000	32.47	29,223,000	-	Dubai
5 - 6/22/82	No award	-	-	-	-	-	-
6 - 7/6/82	7/15/82	Exxon International	1,500,000	33.35	50,025,000	-	Isthmus
7 - 7/20/82	7/27/82	Derby & Co., Inc.	1,000,000	31.99	31,990,000	-	Kole Marine
8 - 8/3/82	8/10/82	Derby & Co., Inc.	1,000,000	33.53	33,530,000		Brent
		Derby & Co., Inc.	500,000	32.05	16,025,000		Ninian
		Derby & Co., Inc.	1,000,000	33.00-			
		Derby & Co., Inc.	600,000	34.64	33,000,000	\$34,640,000	Basket-sweet
				32.15-			
		Coral Petroleum	500,000	32.79	19,290,000	19,674,000	Basket-sweet
		Coral Petroleum	500,000	32.10	16,050,000		Ninian
		Coral Petroleum	500,000	30.385	15,192,500		Suez
			300,000	31.785-			
				32.49	9,535,500	9,747,000	Basket-sweet
		U.S. & S.A. Enterprises	500,000	32.05	16,025,000	-	Ninian
		U.S. & S.A. Enterprises	1,000,000	30.65	30,650,000	-	Dubai

Table 1 (cont.)

Closing no. and date	Award date	Awardee	Quantity (barrels)	Unit price (\$/barrel)	Total price		Crude type
					Minimum	Maximum	
9 - 1/4/83	No award	-	-	-	-	-	-
10 - 2/0/83	No award	-	-	-	-	-	-
11 - 2/15/83	No award	-	-	-	-	-	-
12 - 3/1/83	No award	-	-	-	-	-	-
13 - 3/15/83	3/22/83	Derby & Co., Inc.	1,000,000	\$27.70- 28.11	\$27,700,000	\$ 28,110,000	Basket-sweet
		Derby & Co., Inc.	1,000,000	27.70- 28.17	27,700,000	28,110,000	Basket-sweet
29 14 - 3/29/83	No award	-	-	-	-	-	-
15 - 4/13/83	4/15/83	Transocean Gulf Oil Co.	500,000	29.20- 29.75	14,600,000	17,785,000	Basket-sweet
		Gatoil U.S.A., Inc.	804,022	30.25	24,321,665	-	Saharan
		Coral Petroleum	500,000	29.25	14,625,000	-	Ninian
16 - 4/26/83	5/4/83	T.W. Oil (Houston), Inc.	1,500,000	29.30- 29.87	43,950,000	44,805,000	Basket-sweet
		Transocean Gulf Oil Co.	500,000	29.65- 29.77	14,825,000	14,885,000	Basket-sweet

Table 1 (cont.)

Closing no. and date	Award date	Awardee	Quantity		Unit price	Total price		Crude type
			Minimum	Maximum		Minimum	Maximum	
			(barrels)		(\$/barrel)			
17 - 5/10/83	5/17/83	Gulf-Tex, Resources Inc.	900,000	-	\$31.08- 31.48	\$27,972,000	\$28,332,000	Basket-sweet
		Shell International Trading	1,000,000	-	29.39	29,390,000	-	Bonny
Total, 1983 Solicitation			<u>18,344,022</u>	-	-	<u>570,466,665</u>	<u>575,133,165</u>	
Total, Spot Awards			<u>116,576,522</u>	<u>121,376,522</u>		<u>\$3,988,672,365</u>	<u>\$4,175,606,865</u>	

^aAwards were sometimes made for a range of quantity to be supplied at the seller's option.

^bA "basket"--a combination of several crude oil types -- may be offered and awarded. All crude types of the basket may be offered at a single unit price and the type(s) to be supplied is at the seller's option, or various unit prices may be offered for each crude type in the basket and the type(s) supplied is at the seller's option. Where a unit price range is indicated, the figures indicate the lowest to the highest prices offered in the basket. Unit prices may reflect port of origin or delivered costs, depending on the terms of the offer. ANS = Alaska North Slope oil.

^cPrice ranges indicate minimum to maximum costs corresponding to the options contained in the award. These are the projected contracted costs, not the actual delivered costs.

^dThis was a special sole-source oral solicitation to fill a vessel delivering oil from a previously awarded contract and was not actually a part of closing 21.

Source: DFSC.

Table 2

<u>Term Contract Awards</u>						
<u>Award date</u>	<u>Awardee</u>	<u>Crude type</u>	<u>Unit price</u>	<u>Quantity</u>	<u>Total award price</u>	<u>Delivery period</u>
			(\$/barrels)	(barrels)		
12/4/81	Arco Petroleum Products	ANS	\$29.90	299,711 ^a	\$ 8,961,346	4/1/82 - 10/31/82 ^a
9/1/82	Citation Oil & Gas Ltd.	Brent and/or Forties	33.40	730,000	24,382,346	9/1/82 - 8/30/83
9/1/82	Exxon International	Brent or Forties or Ninian	35.73 35.73	3,830,000	136,845,900 ^b	10/1/82 - 12/31/82
9/1/82	Transocean Gulf Oil Co.	Brent or Ninian or Forties	33.50- 33.10 ^c	3,650,000	122,275,000 ^c	10/1/82 - 9/30/83
Total				<u>8,509,711</u>	<u>\$292,464,246</u>	

^aContract for 2,140,000 barrels was cancelled in April 1982 subsequent to a price adjustment disagreement between DFSC and Arco. One delivery of 299,711 barrels was received under the contract.

^bIndicates maximum price possible under the contract terms.

^cPrices were subsequently adjusted downward due to reduction of British National Oil Company's official selling price.

Source: DFSC.

PRIOR RELATED GAO REPORTS

Status of Strategic Petroleum Reserve Activities as of March 31, 1984 (GAO/RCED-84-148, Apr. 13, 1984).

Comparison of Strategic Petroleum Reserve Oil Prices and Commercial Oil Prices (GAO/RCED-83-156, Sept. 30, 1983).

Strategic Petroleum Reserve: Substantial Progress Made, but Capacity and Oil Quality Concerns Remain (EMD-82-19, Dec. 31, 1981).

Purchase Price of Strategic Petroleum Reserve Oil Fair but Payment Timing Is Costly (PSAD-80-30, Apr. 3, 1980).

CRUDE OIL MARKET TRADERS AND OBSERVERS

CONTACTED BY GAO

Industry contacts

B.P. North America Trading, Inc.
Coastal States Trading, Inc.
Conoco, Inc.
Exxon International Company
Gulf Oil Trading Company
Gatol (U.S.A.), Inc.
T.W. Oil (Houston), Inc.
U.S. & S.A. Enterprises, Inc.

Trade publications

Petroleum Argus, London, England (New York Office)
Platt's Oilgram Price Report, New York, N.Y.

Trade consultants

Petroleum Industrial Research Foundation, New York, N.Y.



**Department of Energy
Washington, D.C. 20585**

MAY 23 1984

Mr. J. Dexter Peach
Director, Resources, Community and
Economic Development Division
U.S. General Accounting Office
Washington, D.C. 20548

Dear Mr. Peach:

The Department of Energy (DOE) appreciates the opportunity to review and comment on the General Accounting Office (GAO) draft report entitled, "Defense Fuel Supply Center Procedures for Purchasing Strategic Petroleum Reserve Oil," GAO/RCED-84-61. We believe that, in general, the report documents the very commendable job the Defense Fuel Supply Center (DFSC) has performed in acquiring oil for the Strategic Petroleum Reserve (SPR). Since the report primarily addresses procurement procedures under the purview of DFSC, we have restricted our comments to those areas in which DOE programmatic guidance to DFSC may have influenced those procedures or areas where we believe clarifications are required.

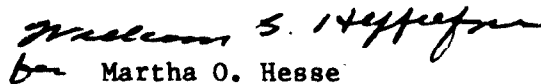
DOE does seek to minimize costs in developing the SPR, consistent with statutory requirements and program goals, including assurance that crude oil acquired for storage is compatible with refiners' capabilities and affords the necessary flexibility in product slates to respond to various supply interruptions. The report seems to recognize the necessity to establish minimum crude oil quality standards to achieve these goals. However, we are concerned that the statement attributed to the Deputy Assistant Secretary of the SPR on page 14 of the report that "DOE is indifferent to which crude oil types are supplied to the SPR as long as they meet DOE's minimum quality specifications...." may have been misinterpreted in view of the discussion, conclusions and recommendations which follow in the report. It is correct that any crude oil falling within the established specifications for a particular SPR crude type will meet programmatic requirements. However, DOE is not indifferent to the price paid for a particular crude oil with respect to its market value, since this directly relates to the net revenue which will be received from future SPR sales and, therefore, the overall program costs. For this reason, DOE has not advised DFSC to acquire the lowest price oil offered, irrespective of its fair market value. In general, DOE supports the DFSC practice of establishing a market range for each generic crude type offered and awarding contracts only when prices offered for an individual generic crude type fall within the market range, unless exceptions are clearly justified. We believe this practice has served to assure that the SPR receives full value for its oil acquisition funds and to protect the best interests of the Government.

The GAO recommendations to acquire the lowest priced, lower quality oil even if above market value and the estimated savings which potentially could have been achieved by following this practice in the past appear to consider only acquisition costs and not the ultimate cost to the Government. Again, the estimated savings do not take into account the reduced revenue which would be received from the future sale of lower quality oil from the SPR. Therefore, the GAO estimated savings of \$1.9 million is based on a comparison of the prices of commodities with demonstrably different values which we believe is inappropriate.

The Department will continue to work closely with DFSC to seek opportunities for reducing program costs through the SPR oil acquisition program. In evaluating such opportunities, we believe that the total cost to the Government must be considered and not only acquisition costs. We have serious doubt whether purchasing of lower cost, lower quality oil at above market range prices as recommended by GAO would in fact result in a net savings to the program. As the report notes, such a practice would introduce several additional judgmental factors into the procurement process, including judgments about the future such as impacts on market prices and the value of SPR oil at the time of drawdown. We are concerned that such judgments could not be made with sufficient accuracy to assure that a net savings would ultimately accrue to the Government. Therefore, we tend to believe that relying on relative market values at the time of contract award is the most reliable method of making purchase decisions.

The Department of Energy appreciates the opportunity to comment on this draft report and trusts that the General Accounting Office will consider the comments in preparing the final report.

Sincerely,


Martha O. Hesse
Assistant Secretary
Management and Administration





04441

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