

GAO Highlights

Highlights of [GAO-18-209T](#), a testimony before the Subcommittee on Energy, Committee on Energy and Commerce, House of Representatives

Why GAO Did This Study

Over 4 decades ago, Congress authorized the SPR—the world's largest government-owned stockpile of emergency oil—to release oil to the market during supply disruptions and protect the U.S. economy from damage. The SPR is managed by DOE. According to DOE's strategic plan, the SPR benefits the nation by providing an insurance policy against actual and potential interruptions in U.S. petroleum supplies caused by international turmoil and hurricanes, among other things. The SPR also helps the United States meet its obligations, including to holding reserves of oil or refined petroleum products equaling 90 days of net petroleum imports, as one of 29 members of the IEA—an international energy forum established to help members respond to major oil supply disruptions. The SPR held almost 674 million barrels of oil at the end of September 2017.

This testimony primarily focuses on preliminary observations from ongoing work on (1) DOE's use of the SPR in response to domestic petroleum supply disruptions, (2) the extent to which the SPR is able to respond to domestic petroleum supply disruptions, and (3) how other IEA members structure their strategic reserves and extent to which DOE has examined these structures. GAO reviewed past work from August 2006 through September 2014 and DOE and IEA documentation. GAO also interviewed DOE and IEA officials, as part of GAO's ongoing work.

What GAO Recommends

GAO is not making recommendations but will consider making them, as appropriate, as it finalizes its work.

View [GAO-18-209T](#). For more information, contact Frank Rusco at (202) 512-3841 or ruscof@gao.gov.

November 2, 2017

STRATEGIC PETROLEUM RESERVE

Preliminary Observations on the Emergency Oil Stockpile

What GAO Found

GAO's preliminary analysis of Department of Energy (DOE) documents indicates that DOE has primarily used the Strategic Petroleum Reserve (SPR) to an exchange of oil to companies in response to domestic supply disruptions, such as hurricanes. In the event of a supply disruption, the SPR can supply the market by either exchanging oil for an equal quantity of oil plus an additional amount as a premium to be returned to the SPR in the future or selling stored oil. Since the SPR was authorized in 1975, DOE has released oil 11 times in response to domestic supply disruptions. All but one were in the form of an exchange, including six exchanges in response to hurricanes. For example, Hurricane Harvey in 2017 closed or restricted ports through which 2 million barrels of oil per day were imported. In response, DOE exchanged 5 million barrels of oil to Gulf Coast refineries. According to DOE officials, exchanges from the SPR allowed refineries to operate, ensuring continued production of refined petroleum products for use by consumers.

Based on past GAO work and preliminary observations, the SPR is limited in its ability to respond to domestic supply disruptions, including severe weather events, for three main reasons. First, as GAO reported in September 2014 (GAO-14-807), the SPR is almost entirely composed of oil and not refined products like gasoline, which may not be effective in responding to all disruptions. For example, following Hurricanes Katrina and Rita, nearly 30 percent of U.S. refining capacity was shut down for weeks, disrupting supplies of gasoline and other petroleum products. The SPR could not mitigate the effects of disrupted supplies. Second, as GAO also reported in September 2014, the SPR is nearly entirely located in the Gulf Coast, so it may not be responsive to disruptions in other regions, such as the West Coast. Third, GAO's ongoing work reviewed DOE and energy task force reports that found that statutory authorities governing SPR releases may inhibit their use for regional disruptions.

GAO's preliminary observations show that other International Energy Agency (IEA) member countries generally have used one of five reserve structures configured in various ways. The structures are defined by whether countries hold either public reserves (e.g., the SPR), industry reserves (e.g., placing reserve holding requirements on industry), or a combination. Most IEA members hold refined petroleum products in reserve, with many members holding at least a third of their reserves in these products. For example, in Germany, 55 percent of reserves are in petroleum products. In addition, some IEA members' reserves are geographically dispersed in their countries to respond to disruptions. For example, France has reserves in each of its seven regions and has used these to address fuel supply disruptions as a result of recent domestic strikes. DOE has taken some steps to evaluate other structures but has not formally evaluated the structures of other countries in over 35 years. In addition, DOE contractors studied the feasibility of regional product reserves in the Southeast and West Coast regions to address supply vulnerabilities from hurricanes and earthquakes, respectively but DOE did not finalize the two 2015 studies. In 2016, DOE released a long-term strategic review of the SPR that Congress had required and GAO recommended. However, DOE did not include the results of the two studies in its 2016 review.