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Petroleum Shortage Supply Management: *Options for States*



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Petroleum Shortage Supply Management:

Options for States

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Introduction

In the event of a shortage of petroleum products, the petroleum industry and the marketplace will take action to increase petroleum supplies before, during, and after the event. While state emergency management options may be limited, state energy officials can assist prior to and during a petroleum shortage by monitoring the situation, providing reliable information to policy makers and the public, and working with the state emergency management agency.

States may want to consider two basic approaches to dealing with a petroleum shortage, which can be incorporated into the state's Energy Assurance Plan. The first approach is to rely on traditional emergency response measures used during a fuel shortage. The second approach involves actions that mitigate the consequences of shortages through longer term preparedness to alleviate risks. Both approaches are presented in this guidance.

Should petroleum supply conditions deteriorate sufficiently such that state-assisted supply management is advisable, states may institute a variety of traditional emergency response measures ranging from voluntary to mandatory actions. One of the measures frequently employed is the Petroleum Set-Aside Program, used by nearly every state during shortages that occurred as a result of the Arab Oil Embargo in 1973 and other more minor shortages that followed. States were delegated authority to enact set-aside programs under the Federal Mandatory Petroleum Allocation program that ended in 1981. Following the end of the program, a number of states enacted legislation to provide for this program in the future, should it be necessary.

The purpose of a Petroleum Set-Aside Program is to allow the state to allocate limited fuel supplies to end users critical to assuring the public's health, safety, and welfare, including police, fire, medical, water, food, transportation, and telecommunications services. The program requires each major oil company supplying the state to reserve (set-aside) a fixed percentage of petroleum products that are projected to be delivered to the state for final consumption each month.¹ Petroleum products are then allocated to customers in amounts designated by the state agency administering the program. Implementation of a state's Set-Aside Program involves a number of steps including: 1) the submission of an application for hardship assistance from customers with supporting documentation; 2) the validation of the information submitted and other factors contributing to the problem; and 3) a process for making a decision in each case. In addition, some procedures are required to be in place for follow-up, including appeals and oversight, which in some states would be handled by the attorney general.

Because a State Petroleum Set-Aside program requires at least a month to implement and is labor intensive, it is generally only suitable for dealing with petroleum shortages that are very serious and long-standing, which, for example,

¹ This data is reported to the U.S. Energy Information Administration on its form EIA 782c the Prime Supplier Monthly Report. See: <http://www.eia.gov/survey/>.

are most likely to occur during a long-term international petroleum disruption. Petroleum Set-Aside Programs are not well-suited for events where recovery to normal conditions can be achieved quickly. Therefore, states that rely solely on the use of a Set-Aside Program have few, if any, alternative contingency measures upon which to draw. The purpose of this paper is to offer additional options that states may consider incorporating into their Energy Assurance Plans.

There are two significant market-based issues affecting the state response to a petroleum fuel shortage. The first pertains to the interaction of critical users of petroleum fuels and the means through which they purchase fuel. Experience from several states indicates that supply may be sustained during shortages through careful attention to how fuel is purchased and fuel purchasing contracts. Some large consumers, including some public entities with critical petroleum fuel-using agencies such as police, fire, and public transit, may have opted to reduce the cost of fuel through spot market-based contracts or by contracting for fuel from spot-market dependent vendors. However, spot-market fuel availability diminishes rapidly during a shortage. This is because fuels supplies that are available in excess of that needed to meet contractual obligations are treated as a surplus and sold at a discount. In a shortage, contractual needs are served first and there is little or no surplus. Hence, vendors who rely solely on the spot-market may be unable to supply critical needs customers during a shortage.

As petroleum fuel shortages affect refiners and primary suppliers, they will first meet the needs of customers with firm contracts based on direct supply from the company's primary sources, such as a refinery, pipeline terminal, or waterborne shipment. In the event they are unable to fully meet their contractual obligation they will typically allocate supplies on an equitable basis to the firm contract customers. This means essential public services, supplied by companies that purchase from the spot-market without a direct contract or through a vendor who acquires fuel in that manner, could see supply reduced or suspended. Further, if the overall supply shortage is large, critical needs customers may have to expand their services and response levels and require additional fuel supplies, thus compounding the impact of any supply imbalance. This is in addition to the price impacts resulting from a serious shortage, which will place further strains on the budgets of governments, businesses, and citizens.

The second market-related issue concerns storage. Since the early 1990s, primary petroleum product suppliers have reduced storage capacity significantly.² This has been especially true for secondary storage outside of a refinery or pipeline system where primary suppliers faced three important impacts: (1) the increasing costs of environmental protection requirements or remediation in the event of a spill; (2) the costs of holding inventory; and (3) other costs such as capital and insurance costs.

Major suppliers have been reducing operating costs by decreasing the quantities of

² For Refinery, Bulk Terminal, and Natural Gas Plant gasoline and diesel fuel Stocks by State see: http://www.eia.gov/dnav/pet/pet_stoc_st_a_EPMOF_STR_mbb1_m.htm. This shows the decline by State in stock levels between 1993 and 2011.

fuel held in storage. While this “just-in-time” delivery system reduces operating expenses it also diminishes the time in which a shortage will be first seen by end users. Ordinarily, this risk is manifested in price volatility until supply and demand re-balance. However, in the event of a serious shortage, and depending on events, end users could find it difficult to obtain supplies or deliveries could be significantly delayed. Where critical end users maintain their own onsite storage, they have the option to manage a larger shortage by carefully allocating their own stored supply. Without storage, such users may be unable to fully meet their public service obligations when their spot-market providers are severely curtailed or cut-off.

Options for State Consideration

In order to improve a state’s emergency preparedness and response capabilities for critical users during a petroleum shortage—especially critical users who are expected to turn to their state for assistance—four options are suggested that can enhance the state’s Energy Assurance Plans.

- 1) Adopt a state priority end-user program;
- 2) Develop contractual provisions and language in fuel purchasing contracts for fuel supplies in an emergency;
- 3) Expand fuel storage capacity building on existing storage locations or incorporating larger storage in new facilities that may be constructed in the future; and
- 4) Maximize the use of alternative fuels through increased use of vehicles with flexible or alternative fueling capabilities. This includes the use of hybrid electric and electric vehicles.

The first option is a simpler and more rapid approach to assuring fuel supplies for essential public needs than the use of a State Petroleum Set-aside Program, which many states currently have as part of their Energy Assurance Plans. It is designed to help critical users obtain fuel more rapidly and with less complexity than the use of measures such as a set-aside. The other three options reduce or eliminate the need for short-term emergency actions by taking immediate actions that reduce the risk associated with disruptions or shortages of petroleum supplies in the future.

Longer term plans dealing with energy supplies should consider how to mitigate the impacts of fuel shortages resulting from any hazard affecting the operation of state and local government essential services. Such plans may also be included in Continuity of Operation Plans for essential state and local government or as a part of a state’s overall energy strategy. Additional efforts may be included under the National Infrastructure Protection Plan³ framework as it relates to enhanced resiliency of the public and private sector. Regardless of the lead agency, the initiatives examined here should be addressed in the context of relevant activities being performed within a state. A significant goal for this effort is to increase the

³ See the National Infrastructure Protection Plan, U. S. Department of Homeland Security 2009 at www.dhs.gov/nipp.

coordination and cooperation among all entities involved in the energy assurance planning process.

Consideration should be given to all uses for petroleum products including fuel needed to operate vehicles, especially those which provide essential public services. Considerations should be given to fuel for back-up emergency generators which would be used in the event of a power outage and will need to be refueled from onsite storage or through additional deliveries of fuel for the duration of the outage. In addition, any building that may be heated by oil and, in particular those facilities which support essential operations, should be addressed.

1) State Priority End User Program

States should recognize that these actions must fall within their legal authority while being adapted to meet the particular needs of the state. States are free to use any or all of the following information for inclusion in their plans.

A “Priority End User Program” would require petroleum suppliers to provide sufficient fuel to critical end users such as: police, fire, and emergency medical services (plus any other essential service providers determined by the state or other legal authorities). While this goal stems from the Petroleum Set-Aside Programs initiated in the 1970s, it calls for a new process that accounts for changes in the national petroleum supply market. This program is designed to bring state energy assurance officials and state marketers together to examine options for expediting the sale of critical fuels in times of drastic shortages.

An accepted measure for such supply would be based on an average of previous supply volume during normal delivery. In addition, critical users may need supplementary supply engendered by the nature and scope of the shortage. For example, diesel fuel for backup generators to support water systems may be included in a priority list if the petroleum shortage is coupled with a power outage. Such action could be accomplished quickly, and, if the problem was more protracted and of a larger scale, a Petroleum Set-aside could be considered for implementation.⁴

Appendix A provides a description of this measure based on the Energy Assurance Planning Framework⁵ and is intended to serve as a template which can be adapted to the state plans and formatted according to the structure of the Energy Assurance Plan.

2) Contractual Options

Shopping for fuel can be very difficult in the event of volatile prices. Prior to any disruption, states may wish to consider training critical user organizations about the issues and techniques related to balancing price versus secured contracting. Before undertaking such training the following may be considered:

⁴ See State Energy Assurance Guidelines Appendix F—Petroleum Fuel Set-Aside for further details.

⁵ See the State Energy Assurance Planning framework at: <http://naseo.org/eaguidelines/framework/level3.html>.

Educational Program—In order to effect long-range changes in procurement practices, states may wish to undertake information dissemination and training in coordination with professional buyers and petroleum market entities. Here are some steps to consider when implementing information sharing and training:

1. Contact state and local procurement experts and discuss the aspects of how their agencies contract for fuel.
2. Determine what risk analyses are used to determine how much fuel to purchase at lower (spot-market) cost versus how much to secure for emergencies at a probable higher cost.
3. Meet with the Attorney General and/or other relevant counsel to discuss legal issues in preparation for emergencies.
4. Determine what risk analyses are used to determine how much fuel to purchase at lower (spot-market) cost versus how much to secure for emergencies at a probable higher cost.
5. Risk analysis information may be obtained from economists at state and local universities or through private sector vendors who specialize in risk analysis.
6. Determine what state and local laws pertain to government agency procurement or may affect private sector procurement.
7. Meet with petroleum association representatives to ascertain current practices among state jobbers and retail outlets. This would be a more general discussion as compliance with anti-trust requirements (both state and Federal) means specific pricing policies of specific companies cannot be discussed. Specifically, ascertain whether or not the state petroleum associations support a variable purchase contracting mix containing both lower cost and secure product pricing. In a shortage, prices typically increase and States should clearly understand the relevant laws and policies and their application. Price increase during a disaster may be subject to certain provisions of state law as well.
8. Contact petroleum suppliers to determine if they have special programs designed to provide for fuels supplies in the event of emergencies.
9. Work with interested parties in state and Local government, as well as critical end users, to determine what contracting suggestions best suit the fuel purchasing needs of the critical end users in the State. States may also have consumer protection laws that may be relevant and in some State price increases during disasters may be subject to certain provisions of state laws as well.
10. Develop a prototype purchase program and pilot program it with several critical end use organizations.
11. Critique the outcome of the pilot program and adjust the purchase program in accordance with lessons learned from this analysis.
12. Prepare a seminar to promote the tested and adjusted purchase program to a wider group of critical end users.
13. Ascertain participation and obtain data from new and on-going (pilot program) participants.

Relatively Short-Term Fuel Procurement—Based on results from the pilot program and feedback from voluntary participants, state officials may wish to work with state and Local procurement officials to develop statewide petroleum fuel contract instruments that can be used by public sector critical end users. Steps may include:

- ◆ Working with private sector associations to make state/local contract instruments available for their modification-to-suit and publication to members.
- ◆ Develop a purchase program for coordinated petroleum products acquisition in the face of, or in reaction to, potential shortages.
- ◆ Three examples are noted here to illustrate this suggestion. These provide a middle ground between seasonal fuel purchasing contracts and emergency actions taken to assist critical end users during a crisis. These three examples utilize a team management approach to abet emergency (essentially “last minute”) petroleum fuel acquisition before or during an emergency. The examples noted here are from Texas, Florida, and Chicago:

Texas—The threat of hurricanes in coastal areas sometimes requires large-scale evacuations. As a result, retail outlets along evacuation routes require sufficient fuel supplies to meet a demand surge. To address this need the state formed a State Fuel Team under the State Emergency Management Plan. This team is composed of non-profit trade associations and works with the State Emergency Operations Center before a hurricane makes landfall to coordinate deliveries of additional fuel along evacuation routes. The State Fuel Team also assists with damage assessments after the hurricane has passed to check on refineries, pipelines, terminals, and gas stations to determine the level of damage and the level of effort required to safely return to normal operations.

Florida—Florida also has considerable experience with hurricanes. The potential and actual emergency fuel acquisition efforts in Florida are coordinated through the State Emergency Operations Center. Upon threat of a storm, the State Emergency Operations Center assesses the petroleum fuel supply and coordinates with petroleum suppliers to assure that essential needs are met. The Florida Office of Energy has designated an Emergency Coordinating Officer (ECO) who is responsible for monitoring the prices and availability of petroleum products.

In the event of a shortage the ECO will consult with various state government departments as part of their ESF-12 duties. These departments include:

- ◆ Environmental Protection
- ◆ Transportation
- ◆ Management Services
- ◆ Emergency Management

The ECO also contacts the Florida Petroleum Council, the Florida Petroleum Marketers and Convenience Store Association, and petroleum suppliers. Upon a determination that a shortage is anticipated, or exists, an Executive Order of the Governor can be executed that works through the state's purchase order process to procure additional supplies from emergency fuel providers. This is defined under contract provisions for specific deliverables and performance objectives to provide a minimum of 100,000 gallons of bulk fuel daily to city and county sites designated by ESF-12—Fuels under mutually acceptable terms and conditions.

Chicago—The city of Chicago has included the following provisions in gasoline supply contracts. The same provisions are in diesel fuel contracts where the reference to E-10 and E-85 are replaced by the word "diesel fuel."

11.16. INVENTORY LEAD TIME

The Contractor will maintain an Inventory of sufficient diversity and quantity to ensure the delivery of any E-10 and E-85 Gasoline listed in the Proposal, which is ordered by the City within 24 hours after receipt of a City department's order. In lieu of the inventory, the Contractor must be able to arrange such prompt delivery. Repeated failures of the Contractor to meet the above Stated delivery requirement may be used by the City as grounds for the termination of this contract, and may further affect the Contractor's eligibility for future contract awards.

11.17. PRIORITY SERVICE

Notwithstanding any other provision of this contract, except where expressly limited by applicable law or regulation, the City's orders for the purchase of E-10 and E-85 Gasoline must take precedence over those of any other customer. In an emergency situation, or where Contractor's supply of E-10 and E-85 Gasoline is low; Contractor must fill the City's order before filling the orders of any of its other customers. If the Contractor is aware that his supplies are running low, the Contractor must notify the City immediately upon receipt of such knowledge and must allow the City the right to place an order before filling the orders of its other customers.

11.18. EXCEPTIONS

Any deviations from these specifications must be noted on the Proposal Page or pages attached thereto, with the exact nature of the change outlined in sufficient detail. The reason for which deviations were made should also follow if not self-explanatory. Failure of a bidder to comply with the terms of this paragraph may be cause for rejection.

The City reserves the right to disqualify bids which do not completely meet outlined specifications. The impact of exceptions to the specifications will be evaluated by the City in determining its need.

3. Storage Options

A number of states have bulk fuel storage locations which are used to refuel state vehicles. In some states, this may be managed at a departmental level (e.g., Departments of Transportation, Highways, or Public Safety). A government agency procures this fuel and it is stored in delivery tanks much the same as those found in retail outlets. For some operations refueling may be done at retail gas stations.

In many states, local government fleets may have contracts with local retail gas stations where their fleets refuel. Such facilities or purchase arrangements allow governmental agencies to exercise more control over the use of fuel for agency work.

Where government-owned storage exists, it may be easier to add additional storage over time, rather than create storage at new locations. If new facilities are being planned for construction where fuel storage would be appropriate, there is an opportunity to consider the size of storage and whether to increase the capacity of the storage for emergency needs. It can be assumed that most existing locations have met Federal and state environmental requirements. However, it is always prudent to review such requirements for potential changes that occur on a regular basis. Additional permitting may be required, but may not require extensive determinations depending on the location and potential reaction from nearby citizens. The state may wish to explore expanding bulk storage at such locations. Some suggestions related to this are below:

- ◆ Meet and coordinate with state and local agencies that already have storage to determine existing volumes and protocols and explain the need for expansion.
- ◆ Determine the potential volumes that might be needed for critical end users during a shortage.
- ◆ Relate potential expansion (i.e., size or volume of new tanks) to existing agency and potential priority user requirements.
- ◆ Determine current usage per day for all vehicles that are normally fueled from this fuel storage location, and the subset that are priority vehicles essential for public safety under normal operations.
 - ◇ This can then be divided by the existing storage capacity to determine the number of days of supply, assuming the tank is full.
 - ◇ Determine the number of days between deliveries to refill the tank and the quantity that is typically purchased on average during normal operations.
 - ◇ Determine the quantity of fuel that is available in the tank when it is refilled to ascertain the normal minimum operating reserve.
 - ◇ Make a decision on how much additional storage capacity to add to increase the minimum reserve levels and how many days of supply it will provide. Clearly, this is a decision that will also be based on budgetary considerations.
- ◆ Ascertain the willingness of the fuel-storing agency to expand storage capacity.
 - ◇ Consider fuel-storing costs associated with expansion, maintenance, oversight, potential environmental compliance, capital cost and insurance

- plus unexpected factors with fiscal implications.
- ◇ Use of existing storage location, rental or other use of remote (e.g., non-agency) storage.
- ◇ Investigate various storage options and costs such as:
 - ⇒ Above ground storage.
 - ⇒ Underground storage.
 - ⇒ Replacement of existing tanks with larger tanks.
 - ⇒ Tank vendor involvement such as installation, maintenance and removal.
 - ⇒ Consider insurance needs.
 - ⇒ Discuss usage protocols to turn over stocks to maintain fresh supply.
 - ⇒ Discuss usage protocols to ascertain conditions governing use:
 - * Use in normal use.
 - * Use during shortage.
 - * User refill priorities under both conditions.
- ◇ Work together to seek solutions that meet agency needs in terms of risk and cost.
- ◇ A substantial storage tank market already exists for varying tanks to meet several levels of storage needs. There are existing products for such fuels as diesel, heating oil and motor gasoline, as well as liquefied petroleum gas, ethanol, and bio-diesel among others. Tanks can be ordered in various volumes from a few days to months of supply, or they can be custom built. Such companies can easily be searched on the Internet and followed up with inquiries to storage company sales departments.
- ◇ Other areas that should be researched include:
 - ⇒ Environmental Regulations
 - ⇒ Jurisdictional Regulations
 - ⇒ Fire and Safety Issues
 - ⇒ Waste Management
 - ⇒ Volumetric calculations
- ◆ Work with appropriate private sector vendors to determine viable alternatives such as rental or temporary seasonal storage and all aspects of access and withdrawal of fuel as needed. Some examples of potential storage solutions are:
 - ◇ Above ground holding tanks
 - ◇ ASME tanks
 - ◇ Below ground water tanks
 - ◇ Carbon steel tanks
 - ◇ Double wall tanks
 - ◇ Elliptical tanks
 - ◇ Flat bottom utility tanks
 - ◇ Forkliftable pallet tanks
 - ◇ Horizontal leg tanks
 - ◇ Low profile tanks
 - ◇ Pick-up truck bed tanks
 - ◇ Plastic cone bottom tanks
 - ◇ Stainless steel tanks.

All of the examples included above are intended to be suggestive, not prescriptive. They are included above to illustrate that there is nothing out of the ordinary about examining the need for assurance supply tankage. There is a large existing industry available to assist these efforts, and regulations and other jurisdictional requirements are readily available for examination. Hence, adding petroleum product storage will take time and require additional investigation as state and local authorities are consulted and included in the planning, and possible implementation, process.

4) Fleet Management Options

Over the years a number of state vehicle fleets have purchased alternatively fueled vehicles. These have included flexible fueled vehicles which can use gasoline with ethanol concentrations ranging from 10 percent (E-10) to 85 percent (E-85), Compressed Natural Gas (CNG) and propane fueled vehicles that can use CNG or propane and gasoline, and hybrid electric, plug-in hybrid and all electric vehicles. The uses of alternative fueled vehicles have been driven by various Federal and state policies, programs and incentive programs which have evolved and changed over the years. Technological advances have improved the operations and efficiency of these vehicles and price differences between energy sources used for these vehicles have also been a significant factor over time.

To evaluate these options states should have a complete inventory of alternative and flexible fuel vehicles in the state fleet. This would identify the types of usage these vehicles are assigned to, the number assigned to individuals, the number available in the general motor pool, as well as the general geographic distribution of these vehicles. Next, states would need to examine fuel price differentials between the different energy sources used and determine at what price point alternative fueled vehicles are less costly to operate per mile than conventional gasoline or diesel fueled vehicles.

Next, states need to examine options to maximize use of these vehicles within the limitation of their existing assignments. If information is available on vehicle miles driven by these vehicles in comparison to the fleet average it may be possible to determine if they may be underutilized or alternatively may be at maximum utilization. Finally, states need to consider essential services and the degree to which it may be appropriate to reassign vehicles within limitations to support essential services should the vehicles be appropriate to meet the needs of the activities and utility of the services they need to support. Plans can also be developed for the future purchases of alternative fueled vehicles to diversify transportation fuel sources and provide for greater efficiency. Vehicles can then also be purchased for applications which may be a better fit to the general use of the vehicle. This is a longer term approach that has been and is currently being used by states.

Conclusion

States should review their Energy Assurance Plans and give consideration to the options available to respond to petroleum shortages. This should include the response to a range of shortage conditions ranging from smaller shortages of short duration to ones that could be large and long lasting such as those that could occur as a result of a major international disruption. States should consider what actions they may need to take to assure that essential public needs can be met in a shortage. If states have not considered the options presented herein, but feel these options have applicability to the needs of the state, the next step is a decision on whether these options should be added to the State Energy Assurance Plan. If so, the State Energy Assurance Plan should be adapted as needed and should comply with existing legal authorities, requirements, and state policies.

* * *

A Closing Note on the State Petroleum Set-Aside Program

The State Petroleum Set-Aside is detailed in Appendix F (pp. 106) of the [State Energy Assurance Guidelines](#). A number of States enacted laws or adopted rules for a petroleum set-aside program when the federal Mandatory Petroleum Allocation program ended in 1981. A petroleum set-aside allows the State to require prime suppliers (major oil companies) to set-aside a designated percent of each month's supply during a declared fuel emergency. The set-aside gives the State authority to allocate to customers who have either priority needs or other defined hardships that justify the allocation of additional supplies from the pool of limited supplies that are received during the shortage. This is a form of rationing designed to support end users whose operation is critical to the function of society. It may also allow for the distribution of product over and above a critical end users usual supply volume.

A set-aside program could take up to a month to implement because the prime suppliers would first need to reallocate supply from normal (routine) supply volumes in order to "set-aside" the percentage quantity determined by the set-aside program. Hardship and related critical end-user requests are then filled from this reserved amount.

In order to manage a set-aside, it is necessary to set up a system for informing end users, explaining protocols associated with the program (including the application procedure and information required to be provided), determine an appeals procedure, establish responsibility for oversight, verification of requests, investigation of claims, tracking, and monitoring. In addition, States would need the capability to answer questions quickly from priority end users and others via a "hot line" in real-time. It would also be advisable to utilize the Internet with an appropriate website, and assign and train staff on the administration of the program.

As a result this of this preparation, the set-aside contingency plan is likely to be used only in the event of a shortage that might last for a number of months. This suggests action that may be limited to events such as a world, national, or State petroleum shortage of significant duration. This program is less suitable for meeting short-term shortage priorities. Experience demonstrates that even events such as hurricanes or major infrastructure failures tend to be resolved within a relatively short period of time.

Appendix:
Sample State Priority End User Program

State Priority End User Program

I. Program Elements

Description

Helping to assure petroleum supplies for essential public service during fuel shortages, otherwise known as the Priority End-User Plan, would require petroleum suppliers to provide critical (or priority) end users with 100 percent of their current fuel requirements upon certification to their supplier(s) of the quantity needed to maintain operations at the prevailing contractual price. Fuel supplies are defined as any petroleum based fuel and bio-fuels including ethanol and bio-diesel such as:

- Gasoline and diesel fuel as well as other petroleum products, including propane (LPG), jet fuel, and bio-fuels.
- For the purpose of this measure, the critical end-user would certify this allocation average to their supplier(s). Certification may necessitate supplier and state coordination to resolve any disputes.

Intent of Measure

The Priority End-User Program is designed to guarantee the availability of necessary supplies of petroleum-based fuels for priority end users essential to ensure the health, safety, and welfare of the general public. Priority users would include those noted above plus any other essential service providers determined by the state or other legal authorities.

- *Note: Keeping the list of priority end users limited will tend to better support this measure because it sets priorities by reallocating sales of limited fuel supplies from one group of customers to another. Keep the priority end users limited to critical services for which there is likely to be little public dispute.*

Conditions Under Which the Measure May be Used

The Priority End-User Plan could be used after the Governor declared an Energy Emergency or after a disaster or emergency has been declared under other authorizing authority as determined by state law. The decision to implement the plan could depend upon whether priority end users are receiving sufficient amounts of petroleum products to maintain essential public services. It is suggested that the plan would be implemented when two conditions are widely prevalent:

1. Major petroleum suppliers are unable to fully supply contractually obligated volumes and have limited customers to a percentage of their historical purchases or contractual volumes. They also would have eliminated sales to non-contract customers, (i.e. spot purchasers).

2. Public services and public health and safety are either interrupted or threatened due to inadequate fuel supplies.

This measure is not intended to address instances such as power outages of longer duration or larger scale as destruction may make it impossible, or impractical, for fuel suppliers to immediately meet the needs of their customers; even those that may be a priority. Such needs are more appropriately coordinated through the State Emergency Operations Center on a case by case basis during the early stages of the recovery.

Legal Authority

Legal authority would be based on a public act that authorizes a Governor to initiate this action. This authority exists within most states' emergency powers in a declared state of emergency or disaster in order to provide services essential to the health, safety, and welfare of the residents of the state.

- The suggested format is that the Governor issues an Executive Order to establish a priority end user plan.
- Some states may also authorize a designated agency to provide for resolution of disputes arising from this order.

Other Legal Issues

- Legal Constraints -- By requiring that suppliers provide current requirements, priority users could request volumes in excess of contractual arrangements which could be challenged in the Courts.
- Care must be taken in working with legal counsel to ensure that actions consider the impact on the state's Uniform Commercial Code and widely held definitions of Force Majeure events.
- State Rule Protocols -- There are two additional options to consider in executing such an order:
 1. Include all the necessary detail to effectuate this matter as part of the Executive Order.
 2. Provide additional clarification through the use of state administrative rules.
 3. Such rules would need to be adopted on an emergency basis.
 - a. If there is no foundation by which to do so within state law, it may be better to address these matters in the Governor's emergency Executive Order.
 - b. While administrative rules are used widely by states, they may be ineffective in an emergency situation due to long lead times for approval.
 - c. In those states where they can be effectively employed, administrative rules may be considered as elements of the plans.

II. Coordination

Role of Private and Public Sectors

Petroleum suppliers would need to be notified directly of the implementation of this measure so that they understand:

- How to handle requests for additional fuels from defined critical end users.
- How disputes will be resolved.

State or regional American Petroleum Institute offices and State Petroleum Councils may be able to assist with this notification.

- *Note: This measure could include provisions for petroleum suppliers to check the request submitted against their records to validate and bring any disputes/ disagreements to the state for resolution.*

Relationship to State's Emergency Management Plan

This action would most likely require legal authority that is typically found under a disaster or energy emergency declaration. It is prudent to plan coordination through the states' emergency management system, and include this within the responsibility of Emergency Support Function #12 or ESF-12. Such responses are usually coordinated through the State Emergency Operations Center and fall under the Incident Command Structure as implemented by the state.

Impact on Other Jurisdictions, Regional Entities, and the Federal Government

It is also prudent to consider the possible actions of neighboring jurisdictions, regional entities and the Federal government. States are strongly encouraged to coordinate with neighboring states, including those within the region of the petroleum supply and distribution infrastructure that has been impacted by the disruption. Often events of this nature affect multiple states and it is more effective and efficient if states implement consistent or, at the very least, complementary actions to assure fuel supplies for essential public services. It is also important that these actions are not seen to impact interstate commerce and should only govern supply that has been delivered into a state for final consumption.

Role of Local Governments

Local governments should be notified directly of the implementation of this measure so that local critical end users can submit a timely request to their supplier(s). The state should identify the means for outreach to local governments and publicize this through appropriate channels.

III. Implementation

Budget and Staffing

Costs would cover all organizational and operational logistics in issuing and

implementing the Executive Order including staffing costs. For example:

Start-Up Costs:	\$
Operation Costs including staffing:	\$ _____
TOTAL	\$

Estimated Computer Requirements and Security

This group of costs is not anticipated for states since the transaction will be between the priority end user and their supplier.

- *Note: A state may wish to post a PDF application on an agency website for applicants. If a state has authority to use electronic signature under the Uniform Electronic Transaction act of 1999⁶ this can facilitate the submissions of requests to suppliers.*

Procedures

1. The Governor issues an Executive Order establishing a Priority End User Program.
2. The Governor notifies the representatives of all major petroleum companies operating in the State of the Priority End User Program.
3. Each company is asked to designate a company representative to develop procedures for processing certification applications.
4. An information package containing the Executive Order, a certification application, and all regulations pertaining to the program would be sent to each major petroleum company operating in the state as well as local governments.
5. The designated agency within the state will prepare a press release for the Governor notifying the public that a Priority End User Program will become operational.
6. A unit would be established within the designated agency to handle inquiries, complaints, and resolve any disputes that might arise between those customers designated as Priority End Users and the petroleum companies that supply them.

Implementation Lead Time

Public acceptance of this measure will be enhanced if a state can provide an estimate of how long it will take to put the measure in place and secure the required supply. Lead time would include the time to notify suppliers and priority end users plus the time required for those users to submit requirements to their supplier. It is expected that suppliers should begin to address any additional fuel requirements no more than one week after certifications are submitted.

Operations and Administration

1. The State, in coordination with appropriate petroleum industry representatives, should determine which entities within the petroleum industry should manage supply allocations under the Priority End User

⁶ Section 2(8)

- Program.
2. Priority end users would then certify their current requirements to the designated supplier system. The supplier may be a refiner or a national or regional supplier and may be represented by local wholesaler companies (jobbers) that can then recertify to the designated supplier on behalf of the claimant.
 3. This certification can be in any format preferred by the state . The use of email, websites, and social media can contribute to more rapid implementation though contingencies in the event of electricity outages should be considered to ensure robust communications. The certification should include:
 - a. The name, business address, phone number (including mobile phone numbers), and designated contact of the priority end-user.
 - b. The essential uses for which the petroleum fuels would be consumed by the defined critical agencies.
 - c. The name, address, phone number (including cell phone numbers), and designated contact of the end user's supplier(s).
 - d. The onsite storage capacity if available.
 - e. The last twelve (12) months of purchases from the supplier to whom the certification application is being made (this is the average volume used to certify the amount).
 - f. The anticipated monthly requirements for the next twelve (12) months.
 - g. If volumes are requested in excess of prior year's (total or average) purchases, a written justification indicating the reason for the additional fuel must be included.
 - h. A sworn statement though testifying to the truth and accuracy of the information provided.
 4. Suppliers should be urged to provide requested and certified supply as soon as possible with a maximum of no more than thirty (30) days, upon submission of the certification.
 5. Certification by priority end users to jobbers and distributors should be forwarded to their supplier(s) who, in turn, provide the additional supplies of petroleum-based fuels to that distributor in order to meet the needs of their priority accounts. In order to meet these needs the supply availability for other non-priority customers could be reduced to some degree.
 6. Any dispute should be directed to the designated agency within the state for resolution. This can include both appeals from a priority user or a supplier challenging a certification.

Program Evaluation

Following discontinuance of this program, participating oil companies should be requested to submit a report to a designated agency within the state detailing their operations under the program. Program improvement may be achieved by asking for the oil companies and customers' view on the following:

1. Did the priority end-user plan ensure the availability of adequate supplies of petroleum-based fuels to maintain essential emergency services?
2. Was the supplier company capable of implementing the plan quickly?
3. Were there any disputes between suppliers, jobbers, and priority end users and, if so, were they resolved in a timely manner?
4. Did the company perceive that any priority end users abused the plan by diverting fuel from critical uses?
5. How can the program be improved?

IV. Impact Assessment

It will support future use of this measure if a formal impact assessment is undertaken based upon state and local government experiences and observations in addition to an evaluation provided by the participating petroleum product suppliers. Major impacts are not limited to, but may include:

- Interdependency Effects – Did the change in supply of one type of energy affect the supply of other forms of energy? To what degree did the priority customers reduce the supply to non-priority customers?
- Social Impacts – What measured impacts were observed on the ability of propriety users to sustain operations?
- Economic/Financial Impacts – What, if any, were the estimated impacts on the state's economy? This analysis could include effects on employment, productivity, and revenues.
- Information Management – How effective was the information supplied to critical end users and their customers?
- Programmatic Threats – Were any programmatic problems observed such as non-compliance, attempts to "game" the system, theft, or other acts deemed illegal or inappropriate?

V. Risk Management

This section should identify potential impediments to the program or other reasons that might affect the operational effectiveness of this measure. For example, this could include:

- Historical performance and deviation of response measure (i.e. lessons from the past)
- Define and monitor critical elements for the successful performance of the response measure
- Identify medium-to-long term impacts to reduce unintended consequences.

**Executive Order No. [Insert E.O. Number and Year]
Implementation of Priority End User Plan**

Authority and Scope

Based on the authority vested in me by [Insert Legal Citation], as amended, and upon declaration of a State of Energy Emergency in the Executive Proclamation [Insert Executive Order Number and Year] under this act, I, [Insert Governor's name], Governor, hereby implement a Priority End User Plan, as set forth below, to become effective in the counties of [Insert list of specific counties or indicate "State of _____"] on [Insert time, month, day, year].

Priority End Users

Petroleum suppliers shall supply 100 percent of the current requirements of motor gasoline, distillate fuel oils including kerosene, No. 1 fuel oil, No. 2 fuel oil, diesel fuel (all grades) and propane each month, to police agencies, fire fighting units, and emergency medical services [Insert other priority users and may be appropriate] upon certification to their fuel supplier. The certification to be submitted by a priority end user to their supplier shall contain the following information:

1. The most recent twelve (12) months of fuel purchases in gallons.
2. Anticipated requirements for each of the next twelve (12) months.
3. Written justification explaining the need for any volumes in excess of historical or contractual purchases.
4. A sworn Statement that the information contained in the certification is true and accurate and that the petroleum product to be provided will only be used for priority use as indicated.
5. Suppliers will have thirty (30) work days to begin supplying a priority account with the current requirements upon submission of the certificate of need.

I hereby designate the [Insert the name and Department of the State Agency that will be administering this Order], as the State office responsible for the administration of this program. As such, the [Insert State Agency name], shall promulgate administrative rules that will provide for a mechanism for resolving any disputes arising out of the imposition of the Priority End User Plan.

Violation of this Order

Any person who knowingly violates this directive is guilty of a [Insert allowable penalty as may be provided by State law for example: a misdemeanor punishable by a fine of not more than \$XXX. Each day a violation continues is a separate offense.] The Attorney General or a Prosecuting Attorney of a county may bring an action in a court of competent jurisdiction to prevent a violation of this order or to compel a person to perform a duty imposed on the person under this Executive Order.

Duration of Order

This order shall remain in effect for [Insert # of days] days from its effective date unless amended, superseded, or rescinded by further Executive Order. It shall expire [Insert # of days] days after the proclamation of a [Insert the nature of the declaration] unless extended by as provided by law.

Dated: _____
[Insert City, State]

[Governor's name and the date]

File with the [Insert State Agency name as may be required, if not eliminate this part], on

_____.

Priority End User Plan Appeals Procedure Emergency Rules

These rules take effect upon filing with the *[insert the names of the appropriate State Agency should your State have a requirement for the filing of Administrative rules.]*

(By authority conferred on *[Insert State Agency name]*, by the Governor upon the proclamation of an emergency and by Executive Order *[Insert number]* on *[Insert month, day, year]* under *[Insert full legal citation to the act and section of the act upon which this is based.]*

FINDING OF EMERGENCY

By executive proclamation the Governor has declared that a state of energy emergency exists. Under powers granted to the Governor during a declared state of energy emergency, Executive Order *[Insert number and Year]* was issued establishing a priority end-user plan. In this order, the Governor designated *[Insert State Agency name]*, as the agency responsible for the administration of this program. Further, it required a mechanism to resolve any disputes arising out of the use of this plan. The following rules are intended to outline an appeals procedure which will provide this mechanism.

Delay in establishing rules of procedure to effectively carry out the duties delegated to the *[Insert State Agency name]*, regarding the administration of the priority end-user plan might well constitute a threat to the citizens of the State due to the lack of petroleum products. To avoid this threat and to assure that essential public needs are met *[Insert State Agency name]* finds the following rules are needed for the preservation of public health, safety, and welfare and that an emergency exists within the meaning of *[Insert the legal reference to the State law and executive order under which it is be implemented.]*

Definitions

Rule 1. (1) As used in these rules:

- (a) "Current requirements" means the supply of motor gasoline, distillate fuel oil and propane needed by an end user or wholesale purchaser to meet its present priority end use needs.
- (b) "Department" means the *[Insert State Department name]*.
- (c) "Designated Supplier" (See Supplier below).
- (d) "Director" means the Director of the *[Insert State Agency name]*, or the designee thereof.
- (e) "Distillate Fuel Oil" means a general classification for one of the petroleum fractions produced in conventional distillation operations. It includes diesel fuels and fuel oils. Products known as No. 1, No. 2, and No. 4 diesel fuel are used in on-highway diesel engines, such as those in trucks and automobiles, as well as off-highway engines, such as those in railroad locomotives and agricultural machinery. Products known as No. 1, No. 2, and No. 4 fuel oils are used primarily for space heating and electric power generation.
- (f) "End User" means any person who is an ultimate consumer of a petroleum product other than a wholesale purchaser-consumer.
- (g) "Motor Gasoline" means a complex mixture of relatively volatile hydrocarbons with or without small quantities of additives, blended to form a fuel suitable for use in spark-ignition engines. Motor gasoline, as defined in ASTM Specification D 4814 or Federal Specification VV-G1690C, is characterized as having a boiling range of 122 to 158 degrees Fahrenheit at the 10-percent recovery point to 365 to 374 degrees Fahrenheit at the 90-percent recovery point. "Motor gasoline" includes conventional gasoline; all types of oxygenated gasoline, including various gasoline/ethanol blends; and reformulated gasoline, but exclude aviation gasoline.
- (h) "Person" means an individual, corporation, firm, governmental unit, organization, or any other establishment whatsoever.
- (i) "Propane, Consumer Grade" means a normally gaseous paraffinic compound (C₃H₈), which includes all products covered by Natural Gas Policy Act specifications for commercial use and HD-5 propane and ASTM Specification D 1835. It is a colorless paraffinic gas that boils at a temperature of -43.67°F. It does not include the propane portion of any natural gas liquid mixes, e.g., butane-propane mix.

- (j) “Supplier” means a firm, or a part or subsidiary of a firm, other than the United States Department of Defense, which presently, or during the last twelve (12) months, supplies, sells, transfers, or otherwise furnishes, such as by consignment, motor gasoline, distillate oil and propane to wholesale purchasers or end users, including, but not limited to, a refiner, importer, reseller, jobber, or retailer.⁷

Appeals: petition; stay order; response; decision.

Rule 2. (1) A person aggrieved by a certification of priority end-use may file a written petition of appeal to the *[Insert State name]*. The petition shall include:

- (a) Name and address of the petitioner.
- (b) A concise Statement of facts surrounding the case, including the reason for the appeal and relief sought.
- (c) Names and addresses of persons known to petitioner who may be affected adversely by the outcome of the appeal. The petitioner shall attach a sworn Statement to the petition which States that the information provided in the petition is true to the best of the petitioner’s knowledge.
- (d) *[Insert State Agency Name]* shall, within three (3) work days after the filing of a petition, serve a copy of the petition on known persons who might be affected adversely by the outcome of the appeal. Persons served with a petition may, not later than five (5) work days from service of the petition, file a written reply, supported by a sworn Statement to the effect that the information in the reply is true to the best of the respondent’s knowledge. A copy of the response shall be made available to the petitioner.
- (e) Within twenty (20) work days after the petition of appeal is filed, the *[Insert State Agency Name]* shall render a decision on the appeal and serve it upon all persons who participated in the appellate proceeding and any other person who is aggrieved by the decision and order. A person is deemed to have exhausted is or her administrative remedies once a decision has been rendered on the appeal.

⁷ For further definitions use those found in the Reporting form from the Energy information Administration EIA-782C Monthly Report of Prime Supplier Sales of Petroleum Products Sold For Local Consumption Instructions found at: http://www.eia.gov/pub/oil_gas/petroleum/survey_forms/eia782ci.pdf.