



Opening Statement
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National Association of State Energy Officials
Quadrennial Energy Review
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Vulnerabilities and Desirable Characteristics of the Future Energy System

Good morning, my name is Jeffrey Pillon, and I am here in behalf of the National Association of State Energy Officials, (NASEO) where I serve as Director of Energy Assurance.

NASEO appreciates Secretary Moniz, Secretary Jewell, and Senator Heinrich's support of this effort and the opportunity to share our views regarding the state and local energy infrastructure issues. We would also like to acknowledge Melanie Kenderdine, Director of the Office of Energy Policy and Systems Analysis at the U.S. Department of Energy (DOE) who has supported state and local input to this process and provided great leadership in support of the Quadrennial Energy Review (QER).

NASEO and our 56 state and territory members have long been concerned about the nation's and state's energy infrastructure and the vital role it plays in meeting our energy, economic, and environmental goals. We have worked with states to help them assess risks and to prepare, update, and exercise state energy assurance plans. These plans include actions to respond to energy emergencies, mitigate future disruptions, and actions to minimize energy sector risks.

As important, NASEO works with state energy directors and governors' energy advisors to develop and address forward-looking energy infrastructure policy set by the governors and legislators. These state policies and programs are distinct from regulatory approaches that are necessarily more reactive and implementation oriented. The policies and vision set by the governors and legislators with the support of the energy offices are essential to states' long-term economic development and ensuring resilient electricity, natural gas, and liquid fuel energy systems.

Quantifying the economic and human consequences, vulnerabilities, and threats of energy supply disruptions aids in understanding energy sector risks and interdependencies. This quantification serves as a foundation for the public and private sector planning and investments needed to reduce system risks. When examining vulnerabilities of our energy system, we must consider natural disasters, aging or inadequate infrastructure, pandemics, changing energy flows, and even deliberate attacks on both the physical and cyber aspects of our infrastructure. These events can cause billions of dollars in damage and risk human life and safety. In many cases, it is far less costly to mitigate these recurring risks than it is to respond to, recover, and rebuild following a disaster.

State Energy Offices often carefully consider the nation's dependence on petroleum from a security and economic perspective as they develop and implement program and policy initiatives. Their efforts include nearly every aspect of energy, such as grid modernization,

distributed resources, transportation fuels and efficiency, and demand side programs in the industrial and buildings sectors. The particular focus they bring to petroleum is well founded. According to the U.S. Energy Information Administration, the total U.S. energy expenditure in 2012 was \$1.4 trillion with spending on petroleum products totaling \$884 billion – or 65 percent of total U.S. energy spending. The impact of petroleum, both in terms of the benefits of production and the concentration of risks, must be considered by state and private sector energy planners given the history of price volatility and the global nature of oil markets and pricing.

The tremendous shift in the sources of our domestic oil and gas supplies has created new challenges to adapting the transportation infrastructure needed to move these resources to markets. For example, substantial investments by the private sector to increase pipeline capacity and move Canadian crude oil to the Midwest has resulted in billions of dollars in new investment, increased pipeline safety, and provided new jobs at refineries. Conversely, the temporary shutdown of the Cochin pipeline last fall contributed to a shortage of propane in the upper Midwest. Some customers were unable to obtain any propane supplies; other customers received only partial tank fills; high prices created a severe economic hardship for both businesses and consumers; and taxpayer funds were needed to aid low-income consumers in paying heating bills. Moreover, the repurposing of this pipeline means it will not be available to move propane this winter, placing a greater reliance on more expensive rail and truck shipments.

State Energy Offices also work with the private sector to support the National Infrastructure Protection Plan and energy assurance planning activities led by DOE. The result of these efforts is a nation better able to respond to energy emergencies as they arise and increasingly robust policies lead to improved resilience in the longer term. Most states engage in some form of strategic energy planning – often led by the State Energy Office – to examine ways in which they can work with the private sector to achieve an optimal energy future with diversified supplies and increased integration of renewable energy and efficiency. These efforts clearly align themselves with the objectives of the QER because states recognize that they are dependent on an energy supply chain which is regional, national, and international in nature.

The role of State Energy Offices is largely focused on policy and program driven initiatives, working at the direction of governors and legislatures and in partnership with other state agencies, the federal government, and the private sector. By building constructive public-private partnerships states are improving our nation's critical energy infrastructure. These efforts benefit greatly from the dialogue and modeling of initiatives such as the QER, and the important analytical, planning, and coordination efforts of DOE's Office of Electricity Delivery and Energy Reliability. We look forward to continuing the states collaborative work with DOE and strongly support the Secretary's efforts to improve our energy system reliability and resilience, economic competitiveness, and the environment through infrastructure planning and modernization.