



October 28, 2019

Ms. Kara Sargeant  
Mass. Department of Energy Resources  
100 Cambridge Street, Suite 1020  
Boston, MA 02114

Re: Clean Peak Energy Standard

Dear Ms. Sargeant:

The Northeast Gas Association (NGA) appreciates the opportunity to provide comments on the current stakeholder review process being undertaken by the Department of Energy Resources (DOER) in regards to The Clean Peak Standard (CPS) regulation, developed in response to the 2018 energy legislation (225 CMR 21—Clean Peak Energy Portfolio Standard).

NGA is a non-profit trade association of natural gas companies based in Needham. Our members are the local gas distribution companies (LDCs) that serve the states of Massachusetts, Connecticut, Maine, New Hampshire, New Jersey, New York, Pennsylvania, Rhode Island and Vermont. Our members also include interstate pipeline companies that transport natural gas into the region; liquefied natural gas (LNG) suppliers; compressed natural gas (CNG) suppliers; and other industry participants.

Our comments focus on two areas: consideration of the beneficial contribution of combined heat and power (CHP) facilities to the Commonwealth's energy system as a low-carbon power input; and the potential role of renewable natural gas (RNG) inputs in assisting the Commonwealth meet its future low-carbon requirements.

**CHP as a Component of CPS**

Combined heat and power – or CHP – offers great benefits for the Commonwealth, as a Class III APS, and in our view should be included within the categorization of qualified resources.

As defined on the MA Department of Energy Resources web site, "Combined Heat and Power (CHP) system (or cogeneration) can effectively and reliably generate useful heat and electric power using less fuel than a typical system that generates power only. CHP systems offer tremendous opportunities for customers with predictable and consistent heat and power needs (particularly large commercial, industrial, and institutional facilities), providing potential for significant economic savings and reductions in fuel consumption and greenhouse gas emissions."

Natural gas fuels about 70% of existing CHP capacity in the U.S. and is likely to be the key fuel input for CHP going forward. As NRRI observes: "The abundance of natural gas will make gas-fired CHP systems the preferred technology of the future. The scale of CHP systems ranges from the micro, residential scale of around 1 kW to large-scale industrial systems with a capacity greater than 100 MW."

The U.S. EPA notes that "gas turbines produce a high quality (high temperature) thermal output suitable for most combined heat and power applications...There is a significant amount of gas turbine based CHP capacity operating in the United States located at industrial and institutional facilities. Much of this capacity is concentrated in large combined-cycle CHP systems that maximize power production for sale to the grid. However, a significant number of simple-cycle gas turbine based CHP systems are in operation at a variety of applications including oil recovery, chemicals, paper production, food processing, and universities."

CHP is environmentally beneficial. EPA reports that, "because of their relatively high efficiency and reliance on natural gas as the primary fuel, gas turbines emit substantially less carbon dioxide (CO<sub>2</sub>) per kilowatt-hour (kWh) generated than any other fossil technology in general commercial use."

We encourage DOER to include CHP as part of the Commonwealth's plan to expand the implementation of the CPS.

**Growing Potential Role for Renewable Natural Gas (RNG) in Energy Systems in the Commonwealth – Supporting Reliability and Improved Air Quality**

Massachusetts and the entire New England region have made significant strides in reducing air emissions from the power generation sector in the last several years. As reported by ISO New England, the region over the last sixteen years has reduced sulfur dioxide emissions by 98%, nitrous oxide emissions by 74%, and carbon dioxide emissions by 34%. Natural gas is the key reason for this improved air quality situation, as it has displaced more polluting fuels in the regional power mix.

Natural gas continues to support the state's electricity system. A new natural gas combined-cycle power plant (674 MWs) began operation in Salem in mid-2018; a new 200 MW gas peaker unit began operation this spring in Medway; and a new natural gas combustion turbine for peaking service (333 MW) was added at the Canal plant in Sandwich in June. These units contribute to power system reliability in the Commonwealth with highly efficient and up-to-date technology that bring overall benefits to the state's economy and environment.

The incorporation of renewable natural gas (RNG) into the pipeline system would bring a lower-carbon supply – and one drawn from local resources – to enhance the current natural gas system. Natural gas fuels over half the homes in the Commonwealth and, according to U.S. EIA, accounted for 67% of the state's electricity in 2018. Reducing the carbon content through the greater use of RNG would bring considerable environmental benefits.

We appreciate your consideration of our comments.

Thank you.



Stephen J. Leahy  
Vice President