New England States Committee on Electricity

April 1, 2010

ISO-NE Planning Advisory Committee c/o Mr. Stephen Rourke Vice President, System Planning ISO New England Inc. One Sullivan Road Holyoke, MA 01040

Re: New England States Committee on Electricity Request for Economic Study

Dear Mr. Rourke:

The New England States Committee on Electricity (NESCOE) submits this request for economic studies to ISO New England, Inc. (ISO-NE), pursuant to Attachment K of ISO-NE's Open Access Transmission Tariff (OATT).

NESCOE requests that ISO-NE conduct a study of New England's power system twenty (20) years into the future. The purpose of the study would be to forecast reliability, cost, and policy compliance outcomes that would be expected for New England's power system over a twenty (20) year period under assumptions that reflect status quo market and reliability constructs. In this context, a twenty (20) year study generally means data for one (1) year twenty (20) years into the future, not twenty (20) years worth of data. In addition to this "reference case" study, we are requesting two additional studies related to (1) market-sourced replacement or repowering of existing carbon-heavy traditional generating resources (i.e., coal and oil fired) that could be approaching the end of their useful economic lives, and (2) replacement of the same through the competitive procurement of additional renewable resources for New England electricity consumers from New England and neighboring Canadian provinces.

Such analyses will assist the New England states in meeting our Governors' goals to pursue power system evolution in a way that minimizes consumer costs while responding aggressively to our nation's energy and climate challenges. In addition, they will address key power system issues related to the possible turnover of New England electricity infrastructure over a twenty-year period.

Additionally, the analyses that we request will provide a solid and critically-important baseline for comparing our region's future to scenario analyses that will be carried out on an interconnect-wide basis. Specifically, the Eastern Interconnection Planning Collaborative (EIPC) intends to model regional transmission expansion scenarios across the entire Eastern Interconnection over a twenty-year time horizon.¹ The expansion scenarios will be developed through a stakeholder process under the EIPC efforts, and so may not necessarily reflect our region's perspectives on regulatory and market structures. Nor will they necessarily reflect our

¹ http://www.eipconline.com/documentlibrary/EIPC_Revised_DOE_Statement_of_Project_Objectives-021610.pdf representing the collective interests of the six New England states <u>www.nescoe.com</u>

states' energy and environmental policy goals. While EIPC intends to use as a starting point the *ten-year* regional transmission expansion plans developed in New England and elsewhere, the year-ten roll up of regional plans will not be a reasonable basis for comparing the impacts of year-twenty expansion scenarios.

Consistent with the approach, modeling methods, and assumptions used in development of New England's current regional system plan, the twenty (20) year study should: (a) forecast future loads; (b) address how identified demand may be satisfied with various demand and supply resources; (c) identify transmission upgrades or additions needed to continue to meet federal reliability; and (d) apply policy and market assumptions based on existing economic forecasts, up-to-date fuel and capital cost assumptions for power system technologies, and existing state and federal energy and policy requirements including, but not limited to, existing Renewable Portfolio Standard compliance, energy efficiency goals, and the influence of the price of carbon.

In addition to enabling objective comparisons against future hypothetical build out scenarios as described above, such a twenty (20) year New England study, in combination with the two other proposed studies, would further inform issues associated with the *New England Governors Renewable Energy Blueprint*. NESCOE hopes that ISO-NE will be able to make use of data from related, prior studies. A twenty (20) year study based on current regulatory and reliability requirements would provide useful information concerning New England's long-term system needs in connection with deliverability of local renewable resources to load.

In addition to this 20-year reference case study, NESCOE requests two additional studies conducted to pursue options under an assumption that some or all of the older, carbon-heavy resources (i.e., coal and oil fired) within our region retire at some point prior to the year of study (year 20). The first would replace this capacity with efficient natural gas-fired generation at the same location as the retiring capacity. The second would assume such capacity is replaced by additional renewable resources in New England and/or neighboring Canadian provinces, with additional transmission constructed as needed to ensure reliable delivery to New England load.

NESCOE looks forward to an opportunity to present this request to the Planning Advisory Committee. In the meantime, please let us know if you have any questions or would like to discuss this request in further detail.

Sincerely,

Heather Hunt

Heather Hunt Executive Director NESCOE 203-380-1477 HeatherHunt@nescoe.com