

November 22, 2024

NESCOE
4 Bellows Road
Westborough, MA 01581

Acadia Center Comments to NESCOE Regarding Letter on Potential Transmission Needs for Longer-Term Transmission Planning RFP

In response to the New England States Committee on Electricity's (NESCOE) October 16th letter to ISO New England (ISO-NE), Acadia Center submits these comments in support of NESCOE's proposal to initiate an RFP pursuant to the second phase of ISO-NE's Longer-Term Transmission Planning (LTP) process.

Acadia Center's mission is to advance bold, effective clean energy solutions for a livable climate and a stronger, more equitable economy. Acadia's work focuses on the Northeast, with over 20 years of organizational experience pushing for regional climate action and transmission buildout. Acadia Center is an active voting member of the NEPOOL End User Sector, participating in various NEPOOL and ISO-NE meetings to advocate for the public interest.

First and foremost, Acadia Center wishes to thank NESCOE and officials from the six New England states for all the work conducted to date in initiating and advancing the LTP process. The region is fortunate to have a coalition of states working proactively for well-planned public policy transmission investments. Your efforts will help make substantial progress for the region to ensure there is enough clean energy on the grid, that the system is reliable and cost-efficient, and that decarbonization targets will be achieved. We also want to acknowledge the role ISO-NE has played in conducting the 2050 Transmission Study to initiate the LTP process, helping to inform the planning and procurement decisions that the region will now collectively make.

Acadia Center has also signed onto comments separately submitted by the Conservation Law Foundation and other public interest organizations in response to NESCOE's request for written feedback. We express our general support for these coalition comments, and Acadia Center offers our own individual comments in this letter to provide additional input and points of emphasis for NESCOE's consideration.

Regarding the coalition letter, Acadia Center concurs with the letter's strong recommendation that solicitations be conducted as soon as possible, perhaps even with "the possibility of initiating a second solicitation before the completion of the first." Acadia Center also agrees with the coalition about the importance of public engagement and minimizing community impacts by drawing from recent best practices from around the region. And perhaps most critically, we agree about the appropriateness of the four longer-term transmission needs that NESCOE seeks to address, especially supporting the focus on the critical Maine-New Hampshire and Surowiec-South Interfaces in light of the 2050 Transmission Study's analysis on these constrained areas¹.

With all of this in mind, Acadia Center offers the following additional observations and suggestions.

Responses to Four Solicitation Options Identified by NESCOE (Points 1-4)

Regarding point 1, in line with the analysis completed by the 2050 Transmission Study – which identified the Maine-New Hampshire Interface as one of the key areas of concern regarding transmission bottlenecks – Acadia Center agrees with NESCOE's proposed focus on Maine-New Hampshire. Regarding the Surowiec-South interface, we note that building a new AC or HVDC line from the Surowiec substation to different points in New England was mentioned in multiple roadmap solutions as part of the 2050 Transmission Study;² as such, we also acknowledge the important role that expanding the Surowiec-South interface will play in strengthening this portion of the region's transmission network. We also encourage

¹ See 2050 Transmission Study, ISO-NE, at 22 (Feb. 12, 2024).

² Id.

NESCOE to consider proposals that support and enable *future* increases in interface capacity at these locations. To address point 2, Acadia Center also supports a potential requirement regarding increased capacity of the North-South interface. It is worth noting the recommendations stemming from Maine's draft Pathways to 2040 report³, which state that (1) Maine should be in "support of North/South Boston import upgrades" in line with the ISO's 2050 Transmission Study recommendations, that (2) Maine will need upgrades to access 1.2-2.4 GW of onshore wind stemming from Northern Maine, and (3) other future upgrades will be necessary to integrate up to 3,000 MW of offshore wind in the Gulf of Maine as well. When all three of these solutions are considered together, they will "result in lower cost solutions [as] compared to evaluating each need separately, as the needs overlap."⁴ Acadia Center contends that all three priorities are critical not only for the state of Maine but for all six New England states, and thus, we believe they are essential to both this and future LTTP procurements. As such, Acadia encourages NESCOE to balance the current and future needs of Northern Maine onshore wind, North-South interface expansion, and future Gulf of Maine offshore wind in designing the first LTTP solicitation. Acadia Center understands that there will be multiple solicitation processes in addition to this first RFP. However, when addressing one priority, there should be ways to structure solicitations that will ensure future compatibility across related needs and pave the way for multi-value, less siloed solutions.

Beyond these upgrades in Maine, there are also broader regional imperatives that necessitate an increase in the capacity of the North-South interface. To begin enabling a future transmission paradigm that can accommodate a substantially greater amount of bidirectional flow with the region and beyond (that is: both south-to-north and north-to-south), solutions that increase the North-South interface should be valued highly in the forthcoming RFP. Even though solutions proposed in response to this RFP may be focused in/around Maine, increases to capacity across the North-South interface will likely have spillover benefits in enabling greater bidirectional flows to address both other identified regional needs, such as load growth in the greater Boston area or in Northwest Vermont, as well as longer-term interregional load balancing opportunities to optimize use of renewable production, such as surplus shoulder-season offshore wind or mid-day solar production. Acadia Center recognizes that interregional considerations may be beyond the immediate scope of the first RFP, but – given the targeted timeframe of 2035 – we believe it would be prudent to factor in how in-region solutions can play a role in the broader evolution of the macro-regional grid, and to evaluate solutions proposed in this RFP accordingly.

Finally, regarding points 3 and 4, we agree with NESCOE's focus on finding solutions to interconnect new generation capacity north of the Surowiec-South interface; however, we recommend taking a flexible and creative approach to doing so. Rather than setting a minimum amount of new nameplate capacity required north of the interface, we recommend including supplemental resource categories that can make future increases in 'capacity' more flexible. Those supplemental resources can include non-wires alternatives (NWA) like energy efficiency and demand response, storage (as a transmission asset or otherwise), "virtual" (distributed) power plants, and other distributed energy resources (DERs). Overall, we suggest including these alternative means to make the process of selecting transmission solicitations more flexible and multi-pronged to meet projected load growth and current demand.

Additionally, if the solicitation embraces one or both of points 3 and 4, we recommend that it evaluate the ability to increase both in-region generation capacity and interregional transfer capability in the future, inclusive of new renewable resources in Eastern/Atlantic Canada. A 2020 study showed that bidirectional interregional supply exchanges among the power grids of the Northeast U.S. and Eastern/Atlantic Canada can reduce power system costs by 5-6%⁵ and improve reliability.

Other Recommended Priorities for Solicitation Structure

Acadia Center supports and proposes a multifaceted evaluation strategy for the solicitation that provides due recognition of both price and non-price criteria key to bringing forth and procuring the most beneficial solutions. This approach will allow ISO-NE and the States to rank projects according to certain policy factors in alignment with a more holistic "loading order" framework for prudent transmission system enhancements. Solidifying a consistent set of these policy factors will allow

³ DRAFT: Maine Pathways to 2040: Analysis and Insights, Brattle Group, Nov 2024, p.60 [Maine Pathways to 2040: Analysis and Insights](#)

⁴ Id.

⁵ [Delivering the Transmission Needs for Energy Transition - Deep Decarbonization in the Northeastern U.S. and Quebec - CEEPR](#)

ISO-NE and NESCOE to evaluate an array of multifaceted, complex solutions for the RFP that address multiple issues against a common rubric. Each of these factors' significance is described below, with information on the role we see them playing in the LTTP process.

Prioritizing use of existing rights of way

Leveraging existing rights of way (ROW) for transmission is a critical strategy to enhance capacity while minimizing incremental impacts to communities and the environment. Acadia Center strongly encourages non-price evaluation criteria that reflect the use of existing rights of way as a prioritized factor for project selection. This criterion should support proposals that involve the construction of new builds, or the rehabilitation/replacement (rebuilding) of existing transmission infrastructure within established ROW.

Reconductoring

The rehabilitation of existing transmission lines was mentioned multiple times as a necessity across all roadmaps in the 2050 study for the North/South interface – even in scenarios with new HVDC and AC lines.⁶ Given the salience of necessary rebuilds, Acadia Center recommends placing extra weight on reconductoring as a solicitation factor. Reconductoring can reduce the cost and necessary miles for a rebuild, reduce the number of replacement transmission towers, and can maximize right-sizing processes and full-use of ROW spacing. Acadia Center also encourages both ISO-NE and NESCOE to evaluate projects more favorably that propose upgrading lines to higher voltages to accommodate future needs, as well as projects taking advantage of rightsizing.

Grid Enhancing and Advanced Transmission Technologies (GETs/ATTs)

Countless examples and new legislation nation-wide⁷ have demonstrated how GETs/ATTs (advanced power flow control, dynamic line ratings, topology optimization, high-performance conductors) can help cost-effectively and reliably maximize transmission line capacity, while also reducing environmental impact and the need for new builds. It is worth noting that this approach is also consistent with Maine's Pathways study, which encouraged ISO-NE to survey other RTOs to see how they have integrated GET/ATTs into their planning process,⁸ and to examine best practices for regional operators to learn from each other. Acadia Center also underscores part of NESCOE's rehearing request for FERC Order 1920, which recommends "transmission providers to prioritize consideration of alternative transmission technologies when evaluating potential transmission solutions."⁹ This approach also aligns with comprehensive climate legislation signed into law by Massachusetts earlier this week, which requires distribution and transmission companies to "conduct a cost-effectiveness and timetable analysis of multiple strategies...[to determine] where advanced transmission technologies, advanced conductors, grid-enhancing technologies...offer a more cost-effective strategy for achieving...transmission goals."¹⁰ We strongly encourage NESCOE to incorporate these same values and strategies in the first LTTP RFP, with the utilization of GET/ATTs prioritized. This should include non-price evaluation points as well as the natural opportunity for solutions with low-cost GETs/ATTs elements to compete directly on price.

HVDC (High Voltage Direct Current)

HVDC transmission was cited as a key potential solution in the 2050 roadmap for the North/South interface, with one potential HVDC line necessary to meet the peak 51 GW scenario, and two lines for the 57 GW scenario.¹¹ We support the consideration of HVDC transmission lines, given their ability to efficiently carry power over large distances point-to-point, as well as their technological compatibility with the transmission design for many offshore wind systems. If the solicitation will

⁶ See 2050 Transmission Study, ISO-NE, at 29 (Feb. 12, 2024).

⁷ WATT: Main homepage (last visited Nov. 19, 2024), [WATT – Working for Advanced Transmission Technologies \(watt-transmission.org\)](https://watt-transmission.org)

⁸ DRAFT: Maine Pathways to 2040: Analysis and Insights, Brattle Group, Nov 2024, p.61 [Maine Pathways to 2040: Analysis and Insights](#)

⁹ Request for Clarification and Rehearing of Certain Features of Order 1920, NESCOE, at [74]. [Request for Clarification and Rehearing of Certain Features of Order 1920 | NESCOE](#)

¹⁰ From Massachusetts Bill S.2967, 193rd Session, Section 150(b), at 1966-1972. ([Bill S.2967](#))

¹¹ See, 2050 Transmission Study, ISO-NE, at 29 (Feb. 12, 2024).

consider HVDC solutions, we encourage (1) requiring that HVDC engineering and supply chain choices be consistent and compatible with offshore wind state planning that is underway, (2) pushing proposals to be consistent across the region, by promoting the joint procurement of HVDC project materials to overcome supply chain shortages, and (3) following best practices to adjust for inflation and revenue uncertainty in the solicitation.¹²

Infrastructure that will be compatible with future buildouts

We encourage NESCOE and ISO-NE to consider including RFP evaluation factors that will make transmission projects compatible with other future needs related to offshore wind development in the Gulf of Maine and elsewhere around the region. For instance, the RFP should reward transmission solutions that would be offshore wind-ready, similar to other states' efforts to ensure offshore wind proposals are "mesh-ready" (i.e., setting equipment and interoperability requirements for AC and DC solutions that would make substations within the same offshore wind area compatible with each other). Taking a similar approach for this RFP would involve scoring transmission upgrades higher if they include express design choices to promote compatibility with offshore wind transmission upgrades needed or planned for the future.

Interregional transmission

The North American Electric Reliability Corporation's (NERC) interregional transfer capacity capability study was filed with FERC earlier this week. The full Canadian analysis is expected to be released in Quarter 1 of 2025, but Part 1 of the study finds, among other data, that there is 2,225 MW in transfer capacity potential between Quebec and New England.¹³ Overall, NERC's study recommends adding 35,000 MW of interregional transmission capacity nationwide as "prudent additions" to address grid resiliency needs.¹⁴ We strongly encourage this and future solicitations to include evaluation criteria rewarding solutions that strategically improve and integrate bidirectional, cross-border transfers of power between Canada and the ISO-NE control area (as well as between ISO-NE and NY-ISO). Such evaluation criteria would favor projects strategically planning upgrades to existing interties, or for future interties between the neighboring regions. In the immediate RFP, this may be most salient for connections between northern Maine and New Brunswick, recognizing the proximity between mature generation resources, recently proposed transmission solutions to enable their interconnection, and the Maine/New Brunswick border.

Community Engagement

Acadia Center views equitable community engagement and support as crucial to successful project development and eventual implementation, and as such, we urge the inclusion of RFP evaluation criteria related to community benefits and engagement to be central to the selection of future project proposals. We strongly encourage the inclusion of evaluation criteria in this first RFP that confer the highest possible value on proposals that detail the stakeholder processes that will be conducted in each community that would be impacted by the proposed project. First, we encourage emulating the requirements in FERC Order 1920, which state that "transmission providers must identify and publicly post the information identified ...[and]...we require that the regional transmission planning process *include at least three publicly-noticed stakeholder meetings* per regional transmission planning cycle."¹⁵ We thus encourage NESCOE to require project proponents to host three forums in the communities that would be affected by proposed projects and specify that this level of engagement is a minimum requirement.

Additionally, we encourage NESCOE to go above and beyond, including clear evaluation criteria that require a robust community engagement plan as a minimum eligibility criterion for bids to be eligible for the solicitation. Acadia Center strongly believes that, absent specifics regarding funding and planning related to community engagement, the

¹² Offshore Wind Procurement: The Driver of Economy-Wide Decarbonization. rep. Analysis Group.

https://www.analysisgroup.com/globalassets/insights/publishing/2024_offshore_wind_white_paper.pdf (Accessed: 2024).

¹³ Interregional Transfer Capability Study, NERC, p.45 (last visited November 19, 2024),

https://www.nerc.com/pa/RAPA/Documents/ITCS_Part_1_Results.pdf.

¹⁴ Id.

¹⁵ From FERC Docket No. RM21-17-000, Order No. 1920, 2024, Section 1625-1626.

implementation of even the best designed project will be at risk. As such, we ask that NESCOE give significant weight to non-price evaluation criteria associated with community engagement and support, treating these factors as key to project viability.

Some suggested factors for project evaluation include:

- Require engagement of all potentially impacted communities, with an emphasis on environmental justice and other underserved communities that are identified, using federal/state screening tools that consider population density, economic status, race, and/or other factors;
- Thoughtful planning to minimize community impacts and maximize host community benefits, and an engagement plan that will build support within affected communities through public involvement and allow community members to see meaningful, positive benefits from the project;
- Bonus factors can include: multilingual, proactive outreach; utilizing trusted messengers in the community; multi-pronged engagement with as many stakeholders affected by the project as possible, including ratepayers, municipalities, local actors, utilities, etc.

Conclusion

Acadia Center expresses in advance its gratitude to NESCOE and the New England States for the review of stakeholder feedback received in response to the October 16 letter. We very much appreciate your consideration of these comments and your commitment to advancing prudent, proactively planned transmission investments to the benefit of New England families, businesses, and communities.

Thank you,
 Anya Poplavska
 RMI Transmission Advocacy Fellow
 Acadia Center
 8 Summer Street., PO Box 583
 Rockport, ME 04856
apoplavska@acadiacenter.org

