

Review of NS Power's 2025 IRP Action Plan and Roadmap Update

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NS Power's 2025 IRP Update is generally reasonable, but the Board should direct NS Power to initiate work – to be completed by the NSIESO – on IRP modeling, particularly considering the urgency of proceeding with some level of fast-acting generation procurement. In addition, the Board should direct several other areas of inquiry and consideration in that IRP modeling, as discussed below. But it may be necessary for expedited modeling to be completed for direct support of any fast-acting generation procurement, with broader modeling to be completed subsequently, but also without delay.

While the NSIESO is expected to take responsibility for system planning in the next four months, delays in such administrative transfers can and often do occur. The Board should not allow for delay of critical system planning work to begin while the NSIESO transfer process is completed.

1. Update to Evergreen IRP

The NSIESO expects to assume responsibility for system planning, transmission interconnection, and energy and capacity procurement functions in Q4 2025.¹ Synapse Recommendation 1 appropriately points to the need to update the resource plan to reflect the schedule for the Reliability Tie, including the 100 MW of incremental firm import,² to assess the scale of need for new CTs in Nova Scotia.

Synapse also points to the need to further evaluate Mersey's economic prudence; the Mersey redevelopment project has not been evaluated since the 2020 IRP. In comments for the CA on the 2020 IRP, we noted that, "It is our understanding that NS Power intends to use the results of its modeling for the 2.1C.Mersey case to provide key inputs into the replacement energy cost for hydro generation used in the Company's economic analysis model."³ The 2020 IRP modeling is out of date for many reasons, and any decision to proceed with Mersey should be considered using IRP modeling data, not an Economic Analysis Model.

Synapse also recommends that NS Power complete the ELCC studies and Net Zero Atlantic's hybrid peak assessment to be used as inputs to the next IRP. The hybrid peak assessment is scheduled for Q1 2026.⁴ The Board should encourage that early findings be provided for use in the next IRP so that the IRP itself is not delayed to accommodate the hybrid peak assessment.

¹ Exhibit N-1(i), M12412, p. 8.

² NS Power clarifies that the additional 100 MW of firm import also requires system reliability upgrades currently before the New Brunswick Energy and Utilities Board. NSEB RIR-4(a).

³ Resource Insight, *Review of Nova Scotia Power's 2020 Integrated Resource Plan* (January 20, 2021), p. 9.

⁴ NSEB RIR-8.

Furthermore, initial evaluation results from the Dynamic Line Ratings Project should also be considered in the next IRP.⁵

The Board should direct NS Power to make substantial progress on the next IRP modeling effort even prior to the transfer of system planning responsibilities to the NSIESO. As noted in the NSIESO's 2026 assessment application, the NSIESO is required to offer employment to NS Power employees for positions or roles transferred to the IESO. As the system resources and staff for system planning activities can be expected to transfer to the NSIESO, there will be no inefficiency introduced if NS Power initiates the next round of IRP modeling and it is concluded under the direction of the IESO Board.

While Synapse suggest that the IRP modeling should be complete by late 2026 or early-to-mid 2027, this schedule should not be delayed due to any transition schedule issues. Work should begin as expeditiously as feasible given any other system planning priorities.

2. Stage 2 of the NS-NB Reliability Intertie Project Application

Similar to the Evergreen IRP, NS Power does not identify a schedule for the Stage 2 Reliability Intertie. This resource has been identified as critical to increasing access to market power, which could provide both economic and reliability benefits for NS Power customers. NS Power states that understanding this project requires "further study," but provides no timeline for this study.⁶

This project should be carefully studied, similar to the Mersey redevelopment project, in the next Evergreen IRP update. One important reason for studying this project now is the increased reliance on higher-cost peak resources, such as HFO- and LFO-fueled units.⁷

3. Procurement Schedule for Fast-Acting Generation Project

In its 2025 10-Year System Outlook, NS Power states that it does not expect the 300 MW of new thermal generation expected for 2027 in-service will be available for the 2027-28 winter season. NS Power states that, "A delay in timing will mean that all 600 MW of new fast-acting generation will need to be procured and built at the same time as opposed to the two-stage approach originally planned for within the 2030 Clean Power Plan, NS Power's The Path to 2030, and the 2023 Evergreen IRP."⁸

It is worth noting that although NS Power states that the need for 600 MW of new fast acting generation is "in alignment with the 2025 10-Year System Outlook,"⁹ nowhere in the 2025 Outlook does it state that NS Power conducted updated system modeling to support this finding.

The Synapse report points out that the need (both total capacity and schedule) for new CT capacity are potentially influenced by the ELCC study, the Net Zero Atlantic study, and changes in the load forecast since those recommendations were developed. Furthermore, not only have lead times for fast-acting generation increased, but also unit pricing. Updated modeling reflecting current construction schedules

⁵ CA RIR-6.

⁶ CA RIR-1.

⁷ CA RIR-3(b).

⁸ Exhibit N-1, M12386, p. 22.

⁹ Synapse RIR-3(d).

and updated pricing for CT capacity, battery storage, and other potential capacity resources could result in substantially different model outcomes.

Yet NS Power states that it “is not currently re-evaluating the relative investment between various resources for the elements required to meet the 2030 targets.”¹⁰

To protect customers from inefficient investment choices, it is essential that NS Power and the NSIESO move forward quickly with updated IRP modeling, and then to adjust resource procurement decisions accordingly. It may be necessary to conduct expedited modeling focused on the amount of fast-acting generation that should be procured “at the same time,” which could be an amount that is different than 600 MW; this information could be developed in advance of the full range of IRP modeling activity focused on post-2030 planning.

4. Relative Rate Impact Evaluation

The last relative rate impact evaluation was provided in the 2020 IRP. In any direction the Board makes to the NSIESO, it should identify an update to the relative rate impact evaluation as an important component of the report. NS Power currently has no plans to conduct such an analysis.¹¹ This information was useful in placing the findings of the 2020 IRP in context, and should be included in IRP model updates at least every five years.

¹⁰ CA RIR-5(e).

¹¹ CA RIR-7.