IESO Engagement

From: Jesse Shopa
Sent: November 3, 2022 12:58 PM
To: IESO Engagement
Cc: Daryl Scheerer; Roslyn McMann
Subject: E-LT1 Additional Comments

Hello,

We would like to further clarify and expand on a few points made as part of our comments on the Oct 18th draft E-LT1 contract in hopes to provide additional context and clarity:

Interconnection

Schedule: We would like to reiterate our concerns with the lack of interconnection relief within the contract. As currently drafted, the contractual provisions are in essence giving preference to those projects with existing advanced queue positions. We note that Hydro One's interconnection queue includes 5 storage queued projects totaling 1,910 MW that could potentially achieve the Expedited RFP COD timeframes. Given the current lack of interconnection relief, these 5 projects have a significant competitive advantage and will accordingly price that competitive advantage in their capacity bid price submissions. We believe this limited field of proponents and lack of competitive tension will lead to higher proposed capacity prices and thus higher costs to Ontario rate payers than would otherwise be the case if the procurement promoted greater competition.

We understand IESO's position to not offer a contractual offramp w/r/t interconnection delays due to the significant capacity needs in the system. We request that IESO reconsiders interconnection relief and considers a structure / concept that would allow for a day-for-day extension of the Milestone COD caused by interconnection delays without LDs for a period of up to 12 months, after which LDs would become effective. We believe this is a potential 'middle ground' in that it keeps proponents committed to the project and committed to achieving COD, while also providing proponents a degree of needed protection relative to this key schedule risk. We also believe, to our point above, that this would increase the competition of the process and lead to lower proposed capacity prices and thus lower costs to Ontario rate payers.

Costs: In regards to interconnection facilities cost, we agree with IESO that external consultants can be used to estimate a +/- 50% interconnection costs but a large degree of overhanging risk will still exist is not known until well into the HONI connection process. Proponents will price this remaining risk into their bids in the form of a higher capacity price. A mechanism that the IESO could utilize would be for proponents to submit their interconnection cost estimate at the time of bid submission, with a contractual mechanism to adjust the capacity price upwards or downwards once the true cost is known in the future. Proponents could include proposed price adjustments in the bid submission. There would be contractual obligations re: transparency from proponents in this matter. For example:

	Interconnection Cost	Capacity Price Adjustment
Estimate at Submission	$5,000,000	None
True Cost (Range)	$4,000,000 - $4,999,999	-$Y/MW-Biz Day
True Cost (Range)	$5,000,001 - $6,000,000	+$Z/MW-Biz Day

(and so on and so forth…rather than distinct $ value ranges, %s could also be considered).

During the last webinar, the IESO suggested that proponents should engage with HONI to further explore issues pertaining to interconnection. However, we would like to note that HONI is unwilling to engage with proponents until after the Deliverability Test Results stage. Please see below the specific feedback we've received from HONI as of Nov 1st:

"Due to high volume of inquiries for the IESO's LT RFP and aggressive deadlines, Hydro One can only have further discussions/comments or initiate a pre-consultation on your specific questions in the next stage, after the IESO's has reviewed and provided the findings of their deliverability assessment. Connection and/or facilities requirements can also only be ascertained at that stage."

Revenue Structure

We are appreciative and supportive of IESO offering proponent's the ability to set their adjustment factors from 0.0 – 0.2 in the MPSAF. We believe the current revenue structure is adequate and provides adequate lender certainty, provides adequate competitive tension on energy revenue, and provides adequate incentives for market participation. We believe it is too late in the process to consider alternative revenue structures.

Reimbursement Reference Efficiency

If IESO's intent is to reimburse the regulatory charge credit only up to a certain percentage and storage proponents are anticipated to bear a portion of Global Adjustment charges, then this comment can be ignored. However, assuming IESO's intent is for Battery Storage projects to be exempt from Global Adjustment charges to minimize capacity payment bid prices to the benefit of Ontario rate payers, then as we noted in our previous comments list, we believe the RRE factor is too high in consideration of the parasitic load, losses, and month-to-month discharge variability associated with BESS.

The embedded assumption in the current factor of 0.80 seems to be that the battery will be discharged daily which likely will not be the case and does not consider the standby/idle durations during the rolling 3 month measurement period of the regulatory charge credit. The standby period of continuous station service load draw, will result in the gap between Delivered Electricity and Withdrawn Electricity over the three month measurement period.

We hope the example below helps demonstrate this issue more clearly. This is presented on a simplified 2 month basis:

Idle Parasitic Load	[MWh AC/Idle Hr]
Total Hours in Month	[Hours]
Charge Duration	[Hours]
Number of Charge Events in Month	[#]
Hours Spent Charging	[Hours]
Discharge Duration	[Hours]
Number of Charge Events in Month	[#]
Hours Spent Discharging	[Hours]
Hours Spent Idle	[Hours]
Parasitic Load When Idle	MWh/AC]
MW Capacity	[MW]
Discharge Duration	[Hours]
Number of Discharge Events in Month	[#]
Delivered Energy in Month	
Discharge Capacity at POI	[MW]
Discharge Losses from Battery to POI	[MW]
Charge Duration	[Hours]
Number of Discharge Events in Month	[#]
Withdrawn Electricity for Purposes of Charging	[MWh/AC]
Withdrawn Electricity from Parasitic Load	[MWh/AC]
Total Withdrawn Electricity in Month	[MWh/AC]
Delivered Energy in Month	[MWh/AC]
Withdrawn Electricity in Month	[MWh/AC]
Round Trip Efficiency	[RTE%]

We would also like to take this opportunity to thank the IESO for its continued engagement on this process and consideration of all Proponent comments and concerns. We understand the IESO is in a challenging position given the current constraints and appreciate the ongoing consultation and dialogue between industry and the system operator.

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