Agenda Item 4.1: ICS Report to NYSRC Executive Committee (EC)
October 1, 2025, ICS Meeting #308
Prepared for: October 9, 2025, EC Meeting #318
Prepared by: William Gunther (Con Edison)

4.1.1 Additional Agenda Items
W. Gunther shared that the CHPE website was recently updated and indicates the project is on track for a May 2026 start. For generator retirements in J and K, W. Gunther raised the timing concern that the Q3 STAR results will not be released until 10/14, which is after the 10/9 EC meeting to approve the FBC assumptions matrix. ICS agreed to proceed with the best available assumptions as of ICS #308 and reflect STAR results as part of special sensitivity case if needed.

4.1.2 2026-2027 IRM PBC Sensitivity Results – Unchanged Since Last Month
W. Gunther raised the IRM PBC 2026-2027 Sensitivity Results as an ICS (but not EC) approval item per the IRM Milestone Schedule. ICS approved the IRM PBC 2026-2027 Sensitivity Results.

4.1.3 RA Modeling Improvements 2026 Strategic Plan – See Attached Slides
D. Zhang presented an update on the Resource Adequacy Modeling Improvements Strategic Plan (2026-2030). Recommended Strategic Plan updates include:

- Deprioritize future work on "Tan45 Methodology Review" for 2026 and remove "Comprehensive IRM/LCR Stability Review"
- Work towards "Seasonal Topology" in 2026
- Continue "ELR Modeling Improvements" into 2027
- Defer the "Winter Emergency Assistance" review to 2027
- Expand the "Synthetic Load Shapes" initiative and reframe as "Large Loads & Load Shape Review"
- Addition of "Maintenance Modeling & Output Factor Curves" and "Parametric Process Improvements" starting in 2026

M. Mager asked if the impact of seasonal resources on the Tan45 annual shifting construct will be evaluated. D. Zhang responded that it is baked into the 2027-2028 Seasonal Reliability Enhancements project and that there would be some interrelation with the NYISO Winter Reliability Capacity Enhancements proposal. M. Cadwalader noted that Winter Reliability Capacity Enhancements would create some consistency with the IRM model provided that the project proceeds as scheduled. M. Mager asked if NYISO can quantify the impact of seasonal resources/elections. D. Zhang noted that it would be difficult to quantify without a complete market design from ICAPWG.

W. Gunther indicated that examining winter emergency assistance from neighboring regions was already a 2024 NYSRC goal that was pushed back to 2026 and now to 2027. R. Gonzales followed up asking if deferral of this project would result in retaining summer emergency assistance limits year-round. NYISO replied that the EA limitations were based on summer data observations.

Additional questions and comments include:

- G. Jordan noted that GE is adding MARS model enhancements to simplify fuel constraints logic.
- M. DeSocio asked if the MARS software supports seasonal topology. Yes.
- M. DeSocio commented that NYISO should explore charging logic constraints for ELRs such that ELR charging does not take margins to 0. He believes operations would require some non-zero margin to charge storage.
- M. Mager asked if NYISO will investigate how possibly more restrictive maintenance scheduling would impact outage patterns on the future system beyond historical patterns. NYISO confirmed they will.
- J. Popova asked if NYISO will account for possible "double dipping" in derating factors with firm fuel performance and fuel availability constraints. NYISO confirmed they will.
- T. Primrose asked if NYISO will look at the subset of units now bidding in the market with a derate post-sunset of the CLR provision and that may have additional capacity available under emergency conditions. NYISO replied

that they will see if it is appropriate to include as an emergency operating procedure step or other modeling construct.

M. Mager, G. Jordan, M. DeSocio, and other stakeholders expressed significant support for rapid development of parametric process improvements. G. Jordan indicated that the parametric method is not in Policy 5 as it does not impact the final IRM and can therefore be readily updated. T. Primrose suggested a possible Tan45 "lite" to reduce computational requirements by finding a low point and 6 following points at 1% IRM granularity instead of 0.5%. G. Jordan stated that this alternative approach could save half the runs but would still require significantly more computational effort than the current parametric method.

G. Jordan added that introduction of winter LOLE fundamentally changes how the 0.1 day/year LOLE criteria is viewed. He noted that until now this criterion was effectively 0.1 day/summer criteria but with winter risk in the model, summer risk is also lower. M. Cadwalader noted that ICS needs to be wary of downstream impacts of seasonal criteria and alternative metrics such as EUE should be considered. W. Gunther noted that with an annual criterion but seasonal resources, an "apparent" deficiency can be demonstrated without necessarily having a realized deficiency.

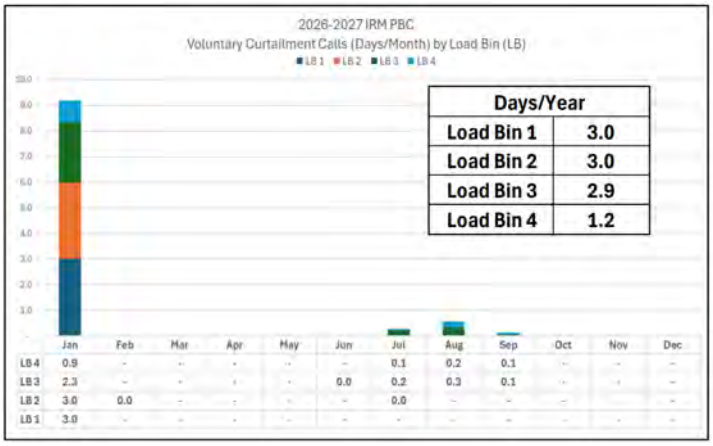
Finally, W. Gunther overviewed proposed 2026 ICS goals (see Draft 2026 NYSRC Goals earlier on agenda).

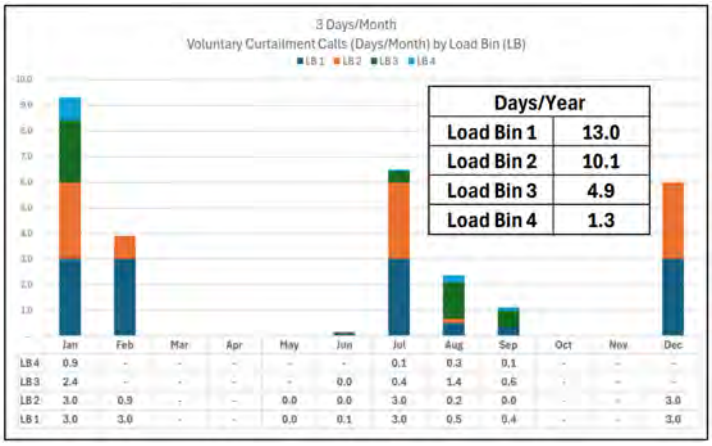
4.1.4 Fuel Constraints Whitepaper – See Attached Draft

L. Carr presented a draft of the Winter Fuel Availability Constraints Modeling Whitepaper – Phase 2. This draft summarizes key changes and updates since completion of Phase 1 (available oil duration requirements, available gas regression, consideration of firm fuel elections, interaction between CHPE and fuel constraints). NYISO requested feedback and comments on this draft by mid-October to facilitate approval at the November ICS.

4.1.5 Emergency Operating Procedures – Voluntary Curtailments and Public Appeals

L. Carr presented an analysis for public appeals/voluntary industrial curtailments incorporating feedback from the 9/3 ICS and 9/12 EC. Using a 3 day/month limit on voluntary industrial curtailments (retaining the current 3 day/year limit for public appeals) showed 0.4% IRM reduction under parametric analysis. Statistics on monthly voluntary industrial curtailment calls from the 2026-2027 PBC and 3 day/month alternative test cases appear below.





NYISO recommended implementing the revised limit of 3 days/month for voluntary industrial curtailments as part of the 2026-2027 IRM FBC.

Stakeholder discussion ensued regarding the merits of different call limit structures. Prior to 2024, the model permitted unlimited calls, but ICS reduced it to 3 days/year last year. Applying a maximum of 3 days/year resulted in an expected value of 1.4 days/year, which may be tighter than initially intended. With a limit of 3 days/month, the model only exceeds 3 days/year in the highest 3 load bins, and the expected value is 2.4 days/year. Load bins 1, 2, and 3 occur 0.62%, 6.06% and 24.17% of the time respectively. In practice, NYISO Ops will call EOPs as many times as needed in a year.

With the 3 day/year limit and calendar (vs capability) year representation, the call allowance is often exhausted in January. W. Gunther added that exhaustion of calls prior to a season impacts the winter/summer risk split and

downstream firm/non-firm CAFs. R. Gonzalez suggested that once MARS can set seasonal limits, we should use 3 days in the summer and 3 days in the winter and M. DeSocio agreed.

Stakeholder discussion ensued regarding implementation of a 3 day/month limit on voluntary industrial curtailments as an interim step until seasonal limitations on calls are added to the MARS model. M. DeSocio suggested a 1 call/month limitation and T. Primrose agreed. A. Evans noted support for the 3 call/month limitation presented earlier. ICS agreed to a limit of 3 calls/month for voluntary industrial curtailments and 3 calls/year for public appeals in the FBC.

4.1.6 Hydro Quebec (HQ) Chateauguay Modeling Recommendation

L. Carr proposed a HQ Chateauguay modeling update to capture monthly import variation and use a curtailable contract approach rather than corresponding adjustments to capacity in Load Zone D and the interface limit. Parametric analysis indicates the modeling updates drive a 0.09% increase to the IRM.

Month	Nov	Dec	Jan	Feb	Mar	Apr
Current MWs Assumed	308	308	308	308	308	308
Recommended MWs Assumed	914	0	0	0	20	914
Delta	+606	-308	-308	-308	-288	+606

A. Evans asked for additional details on how the monthly assumptions were formed. NYISO replied that these assumptions were based on external CRIS rights for HQ into Zone D. M. DeSocio pointed out that the monthly schedule represents external CRIS rights, not historic sales, and thus there is still some misalignment. M. Cadwalader suggested HQ can only curtail the line in proportion to how much it curtails its own load. As such, the likelihood of curtailment is even less than the current modeling approach checking if HQ has sufficient resources. W. Gunther asked how must-offer requirements in recent ICAP-WG materials would be considered. NYISO noted that the proposals are not misaligned because must offer requirements apply to seasonal UDR elections. T. Abate asked how this methodology would capture future changes in HQ imports. NYISO replied that they will continue to look at operational trends and that market design changes will lead to better understanding of future HQ imports.

4.1.7 2026-2027 IRM Fall Load Forecast

M. Schuler presented the 2026-2027 IRM Fall Load Forecast including details on the forecasting process.

- Adjustments for RLGFs, large loads, and BTM:NG resources
- 2025 Weather Normalized NYCA Coincident Peaks and pooled models for CTHI

One notable change from the Gold Book forecast is a 30%+ drop in zone D resulting from loss of a large load.

2026 Summer Coincident Peak Forecast Comparison - MW

Zone	A	B	C	D	E	F	G	H	I	J	K	NYCA
2025 Gold Book Forecast for 2026	2,943	1,854	2,568	1,042	1,298	2,255	2,304	620	1,320	10,790	4,996	**31,990**
2026 IRM Forecast	2,913	1,846	2,580	659	1,275	2,261	2,290	600	1,321	10,807	5,001	**31,552**
Difference	-30	-8	12	**-383**	-23	6	-14	-20	1	17	5	**-438**
% Change	-1.0%	-0.4%	0.4%	**-36.8%**	-1.8%	0.3%	-0.6%	-3.2%	0.1%	0.2%	0.1%	**-1.4%**

2026-27 Winter Coincident Peak Forecast Comparison - MW

2026 IRM Difference w.r.t. GB	-10	0	-72	**-422**	0	0	10	0	0	0	0	**-494**
2026 IRM % Change w.r.t. GB	-0.4%	0.0%	-2.8%	**-33.8%**	0.0%	0.0%	0.6%	0.0%	0.0%	0.0%	0.0%	**-2.0%**

2026 Annual Energy Forecast Comparison - GWh

2026 IRM Difference w.r.t. GB	-60	0	-510	**-2,690**	0	0	-50	0	0	0	0	**-3,310**
2026 IRM % Change w.r.t. GB	-0.4%	0.0%	-3.4%	**-32.4%**	0.0%	0.0%	-0.5%	0.0%	0.0%	0.0%	0.0%	**-2.1%**

G. Jordan asked if the large load removed from Zone D is permanently gone or solely removed for 2026-2027. NYISO replied that large loads will be evaluated periodically, and updates will be provided for the Gold Book. W. Gunther asked about inclusion of the 6/24/25 heat wave given the official peak day must occur in July and August. While not the official peak day, it is included in the analysis and has notable impact given its placement near the extremes of the regression. ICS approved the 2026-2027 IRM Fall Load Forecast.

4.1.8 2026-2027 IRM FBC New Generator Screening

H. Fox provided an update on the 2026-2027 IRM FBC New Generator Screening. Four additional projects totaling 400 MW are recommended for inclusion in the 2026-2027 IRM FBC (Baron Winds-Phase 2, Steel Wind, Erie Wind, and Cassadaga Wind). NYISO also recommended inclusion criteria for DER resources covering DERs that have been submitted for enrollment to date as well as certain resources participating in the Demand Side Ancillary Services Program (DSASP)

that are currently completing transition to the DER participation model. For future years, NYISO recommends including DERs in the FBC that have been submitted for enrollment prior to the presentation of final SCR and DER value assumptions at a September ICS meeting of each study year. NYISO also recommended final SCR and DER values for the FBC Assumptions Matrix.

SCR ICAP Values

Capacity Region	Recommended Final SCR Max Modeled Capacity (MW)	SCR Max Modeled Capacity (MW) Presented at 9/3/25 ICS #307
A-E	239.2	357.6
F	78.3	78.3
G-I	61.7	61.7
J	330.3	330.3
K	17.4	17.4

DER Aggregation ICAP Values

Capacity Region	Recommended DER Aggregation ICAP (MW)	DER Aggregation ICAP (MW) Presented at 9/3/25 ICS #307	Technology Type
A-E	480.4	361.4	Demand Side Resource (DSR)
F	0	0	-
G-I	0.1	0	Demand Side Resource (DSR)
J	0	0	-
K	0	0	-

M. Cadwalader asked if all resources transitioning to DER participation are included. Some DSASP participants may not make the transition but are aware of the program sunset on Oct 31. All resources working to transition are included. M. Mager inquired about zonal patterns in SCR to DER resource conversions. NYISO replied that most resources transitioning to DERs are from DSASP, which historically are primarily upstate.

4.1.9 2026-2027 IRM FBC Results

R. Subramanian presented an update on the IRM 2026-2027 FBC parametric results with material changes as shown below:

Number	Adjustment Type	Description	Impact on Margins			
			NYCA	NYC	LI	LHV
		2026-2027 IRM Preliminary Base Case	**27.3**	**80.6**	**106.9**	**89.7**
1	G-K	Unforced Capacity Deliverability Rights (UDR) Elections	-0.26	-1.15	0.55	-0.69
2	A-K	Special Case Resources (SCR) MW Update	-1.52	0.00	0.15	-0.03
3	A-F	Inclusion of Distributed Energy Resources (DERs)	0.10	0.00	0.00	0.00
4	G-K	Resource Deactivations	0.31	1.26	-1.89	1.31
5	A-F	Revised SCR Start Times	-0.25	0.00	0.00	0.00
		Sum of Material Changes	-1.62	0.11	-1.19	0.58
		Non Material Changes	-0.02	-0.01	-0.01	-0.01
		Final Base Case Parametric Results **	25.67	80.70	105.70	90.27

As a result of the continued transition to DER participation, the SCR MW update now decreases the IRM by 1.52% and the inclusion of DER resources only increases the IRM by 0.1%. Remaining changes include New Generator Inclusion, Voluntary Curtailment Call Limit Update, HQ Imports Modeling Update, NERC EFORd: 2020-2024, Load Zone K Topology Update, Fall Load Forecast, Manual Voltage Reduction MW Update, and Remote Voltage Reduction MW Update.

M. DeSocio asked for more details on the UDR election change. NYISO replied that UDR elections are confidential and reflect the latest elections provided by August 1.

4.1.10 2026-2027 IRM FBC Assumptions Matrix – EC Approval Item – See Attached

R. Subramanian presented the IRM 2026-2027 FBC Assumptions Matrix. Noteworthy updates include peak load and energy forecasts, deactivations and removals, existing and proposed wind units, DERs, capacity purchases, interface limits, EOPs, and MARS version. See attached assumption matrix for complete details. G. Jordan asked for confirmation that the presented assumptions matrix reflects inclusion of CHPE and removal of the Gowanus and Narrows barges. NYISO indicated yes. M. DeSocio asked NYISO to provide a listing of Zone K topology changes. ICS approved the 2026-2027 FBC Assumptions Matrix with no changes.

4.1.11 SCR Response Rates Analysis

B. Prinsloo provided an analysis extending SCR response rates to 7 hours for Zones A-E, G-I and J showing 0.11% IRM reduction (parametric). M. Mager thanked NYISO for running these sensitivities and commented that the assumed extended response rates are likely to reflect reality; however, he is amenable to continue the existing process given this problem will be solved in the next IRM cycle (by increased data availability). M. Cadwalader noted that ICS makes assumptions in the absence of data availability in other cases but concurred with M. Mager that the issue is effectively solved for the next IRM cycle. M. Mager and M. Cadwalader both added that they would have continued to advocate for a resolution in this IRM cycle if the IRM impact were significantly larger.