

### DER Participation Model – Group 1 Concepts & Draft Manual Language Continued

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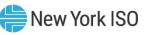
### Agenda

- Background & Overview
- Feedback & Updates
- Manual Sections
- Additional Feedback
- Next Steps



### **Background & Overview**

- On March 25 and April 6, 2022, the NYISO presented an initial draft of portions of the Aggregation Manual as well as modifications to the Emergency Operations Manual, Transmission and Dispatch Operations Manual, Day-Ahead Scheduling Manual, Ancillary Services Manual, and Control Center Requirements Manual to support the deployment of the DER Participation Model.
- The NYISO sought stakeholder feedback of the Manual modifications.
- NYISO has reviewed and incorporated feedback provided thus far.

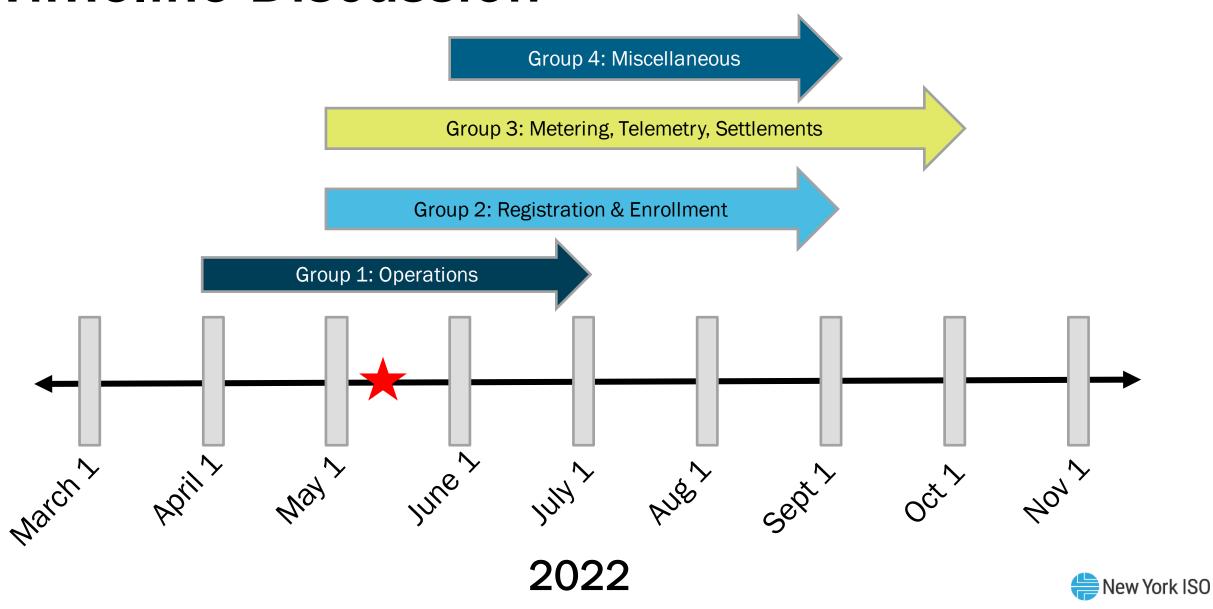


### **Background & Overview**

- Today's discussion will review the feedback and accompanying updates to the:
  - Emergency Operations Manual;
  - Transmission & Dispatch Operations Manual;
  - Day-Ahead Scheduling Manual; and
  - Control Center Requirements Manual.
- NYISO is still evaluating comments received on the draft Aggregation Manual Part I and Ancillary Services Manual; feedback and accompanying updates will be presented at a future working group.



### **Timeline Discussion**



| Document                                  | Progress                                    | Milestones                         |
|---|---|------------------------------------|
| Aggregation Manual Part I                 | Reviewed – Posted, NYISO reviewing feedback | TBD                                |
| Emergency Operations Manual               | Complete for Vote - Posted                  | 5/11 ICAPWG<br>5/12 SOAS           |
| Transmission & Dispatch Operations Manual | Complete for Vote - Posted                  | 5/11 ICAPWG<br>5/12 SOAS           |
| Day Ahead Scheduling Manual               | Complete for Vote - Posted                  | 5/11 ICAPWG<br>5/12 SOAS           |
| Ancillary Services Manual                 | Reviewed – Posted, NYISO reviewing feedback | TBD                                |
| Control Center Requirements Manual        | Complete for Vote - Posted                  | 5/11 ICAPWG<br>5/12 SOAS &<br>CDAS |
| Outage Scheduling Manual                  | Internal review                             | TBD                                |
| Outage Scheduler User's Guide             | Internal review                             | TBD                                |
| GOCP User's Guide                         | Internal review                             | TBD                                |

### Feedback and Updates



### **Control Center Requirements Manual**

#### Feedback received:

- Section 2.6 Generation Provider Communications
  - Minor grammatical update.
- Section 3.2.2. Present Design Overview
  - "Please add clarification that SD-WAN is available to Suppliers only."

### Response and update:

- Grammatical update in Section 2.6.
- "SD-WAN shall be an acceptable alternative telecommunications technology for suppliers to directly communicate with NYISO."



#### Feedback received:

- Section 2.2.7.1. Resource Response during Reserve Activation
  - Recommendation to include language addressing settlement for Withdrawal Eligible Resources dispatched to withdraw during a RPU.

### Response and update:

 "Withdrawal-Eligible Resources may receive a basepoint to withdraw during a reserve pickup. Withdrawal-Eligible Resources that withdraw less than basepoint are charged for actual withdrawals only."



### Day-Ahead Scheduling Manual

#### Feedback received:

- Section 2.5.4. Energy Market Functions
  - Minor grammatical changes.
- Section 4.2.3. Initial Generator Status and Commitment Rules
  - Minor grammatical changes.

### Response and update:

- Grammatical updates regarding description of Grid Operations Coordination Portal (GOCP).
- Grammatical updates regarding the term 'ESR.'



#### Feedback received:

- Section 2.5.4. Energy Market Functions
  - Minor grammatical changes.

### Response and update:

Grammatical updates regarding description of Grid Operations
 Coordination Portal (GOCP) accepted and included in latest redlined
 draft.



# Draft Manual Language for Discussion



### **Manual Sections**

### Day-Ahead Scheduling Manual

- 2.3.2. Supporting Functions
- 4.2.3. Initial Generator Status and Commitment Rules

### Control Center Requirements Manual

- 2.6. Generation Provider Communications
- 3.2.2. Present Design Overview

### Transmission & Dispatch Operations Manual

- 2.2.7.1. Resource Response during Reserve Activation
- 2.5.4. Energy Market Functions



## Additional Feedback – Manual Drafts

(Not including Aggregation Manual or Ancillary Services Manual feedback)



- Feedback received:
  - Section 2.1.2. NYISO Objective
    - "In the last paragraph, the redlined additions states that, "[t]he ISO and Transmission Owners shall coordinate scheduling and dispatch for all Resources engaged in Dual Participation giving priority to: 1) minimizing the magnitude of reliability impacts, 2) resolving actual impacts over predicted impacts." How do the NYISO and TO's assess the reliability of impacts, and is there any metric or methodology that will be used to compare the magnitude of reliability impacts that may cause an Aggregation's schedule or dispatch instructions to be altered by either the NYISO or the TO? Are there any other pertinent references that should be provided in this section?
- Response on following slide.



### Response:

- The NYISO will follow the operating procedures defined throughout the Emergency Operations and Transmission and Dispatch Operations Manuals to assess and resolve any impacts to reliability. As described in the manuals and the Services Tariff, Aggregation wholesale market offers should reflect its nonwholesale (e.g., retail) obligations. As is the case for conventional generators operating in the NYISO markets, qualified Aggregations may be requested for out of merit actions or derates if the NYISO and TO identify the need to resolve concerns for reliability. These actions have the potential to impact schedules or dispatch instructions issued by the NYISO.
- Evaluation of the reliability impact of a given schedule depends on the nature of the issue identified.



- Feedback received:
  - Section 2.1.2. NYISO Objective
    - "Additionally in the same paragraph, the redlined additions state that the Aggregator shall report any derates in the GOCP and modify its Bids as necessary to comply with any DSO/TSO instructions, while the NYISO will issue final dispatch instructions to the Resources. What happens in the case where notification of a distribution reliability/safety issue comes after the RTM window has closed for the operating hour and the Aggregator is unable to update its schedule to reflect the change. If the NYISO will be issuing the final schedule, how will those near-real-time notifications be taken into account in the dispatch instructions from the NYISO so that any charges or other penalties if the Aggregation deviates from the schedule in light of the notification from the TSO/DSO?"
- Response on following slide.



### Response:

• If a notification of distribution reliability or safety issues is issued after the close of the RTM bid/offer window, and a Bid adjustment by the Aggregator is therefore not feasible based on the timing, the Aggregator must report a full or partial outage for the Aggregation using the NYISO's Grid Operations Coordination Portal (GOCP).



#### Feedback received:

- Section 3.3. Periodic Monitoring of Fuel and Resource Availability
  - "Does the requirement to submit Fuel and Environmental Restriction Data apply to Local Generators, as well as any DERs participating as part of an Aggregation that utilize fuel-supplied generation on-site as part of the response?"

#### Response:

- All ICAP Suppliers are required to provide this information, as described in Section 3.3
  of the Transmission & Dispatch Operations Manual. Aggregations may qualify to be
  ICAP Suppliers, and thus would be subject to this requirement. The requirement does
  not pertain to specific DER, but rather to Aggregations as ICAP Suppliers, regardless of
  Aggregation type and composition.
- As such, the reporting requirement will be at the Aggregation level, as a summary of any applicable DER facilities within the Aggregation.



#### Feedback received:

- Section 6.7.17. Supplemental Resource Availability (SRA)
  - "This new proposed section states that SRAs can be submitted by both TOs/DSOs and the NYISO to request an "Aggregation has a specified amount of available operating capacity at a specified period," for local or NYISO reliability requirements. Upon what data or other information provided by the Aggregator are the SRA requests to be made through the GOCP?"

### Response:

 This information will be detailed in the forthcoming GOCP User's Guide, and accompanying presentation to ICAPWG.



### **Emergency Operations Manual**

- Feedback received:
  - Section 1.2.2. Operating Objectives
    - "The same questions above from Section 2.1.2 of the Transmission and Dispatch Operations Manual apply to the redline edits added in the last paragraph of this section."
- Response: Please see slide 16.



# Additional Feedback – 3/25/22 Presentation



- Slide 7 We appreciate that the NYISO will create a dedicated location on its website to track progress towards completion of specific manuals that require development or updates along with the most current redlined versions of each draft document. This will be helpful to monitor progress and allow stakeholders to be aware of the up-to-date materials under consideration.
  - NYISO Response: This web page location is now operational at the following link:
    - https://www.nyiso.com/manuals-tech-bulletins-user-guides



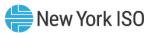
- Slide 12 In sub-bullet #2, it states, "All operating data, including telemetry and revenue grade metering data, that is received by the Distribution Utility from the Aggregator for any Aggregation must be provided to the applicable Transmission Owner in order to communicate such information to the NYISO (e.g. Real-Time dispatch telemetry)." While there is yet to have been substantive stakeholder discussion on the TO telemetry communications requirements for Aggregators and Aggregations, there has been no discussion or indication to our knowledge that there would be a requirement for Aggregators to provide telemetry or revenue-grade meter data to the DU. This issue is highlighted further in our feedback to some of the draft manual language below within the Aggregation Manual, but should updates be necessary to the draft manual language, this bullet point should be clarified or revised accordingly.
  - NYISO Response: NYISO does not require that telemetry and revenue grade meter data be exchanged with the applicable Distribution Utility. The NYISO is aware of at least one Transmission Owner that receives distribution-level data through its distribution utility counterpart, rather than directly to the TO. While this may not always be the case for each TO in NYCA, the NYISO included this option to address the range of possible configurations.



- Slide 17 Can the NYISO please clarify the fourth sub-bullet, which states "Aggregations shall be required to respond to reserve pickup signals"? Is this applicable to Aggregations that do not contain one or more DERs qualified to provide reserves (or do not have a schedule for a reserve product at the time of the reserve pickup signal)?
  - NYISO Response: Aggregations that are qualified to provide Operating Reserves
    will be required to respond to reserve pick up signals if an Aggregation
    contains DER that are not capable of providing Operating Reserves, it will not
    be awarded reserves schedules, however it may receive an energy dispatch
    upwards during a reserve pick up.
    - Any energy dispatch during a reserve activation of an Aggregation would be limited to the Aggregation's UOL.



- The 6th sub-bullet states that, "Aggregations containing DER subject to emissions compliance are relieved of restrictions in the event of a Major Emergency." Can the NYISO please confirm whether the action by the NYISO in calling a Major Emergency only relieves DERs with emissions compliance restrictions from being dispatched by the NYISO, or whether this information is provided to all applicable emissions regulators (at the federal, state, or local level) and specifics regarding those DERs relieved of those restrictions? In section 4.4. Shortage of Meeting Load (Including the Inability to Reach a "0" ACE) - Real Time of the Emergency Operations Manual, it states under step 9 under "Declare Major Emergency that the NYISO will, "Direct all TOs, via Emergency Hot Line, to notify appropriate Market Participants that the NYSDEC air emissions waiver is in effect and to go to Resource maximum capability even if it may result in temporary exceedance of NOx RACT air emission limits on opacity requirement." This seems to indicate that only the NYSDEC's requirements are waived. Has the NYISO looked at whether further updates to this section may be necessary pertaining to any federal (EPA) or local (ex. NYC DEP) should be referenced in this section as well?
  - NYISO Response: As cited above, this waiver will only apply to the emissions standards maintained by the NYS DEC.
    - NYISO does not envision creating additional emissions waivers.



- Slide 33 Can the NYISO please clarify (either in response to these comments or in its future presentation of the draft GOCP Manual and User Guide) the approval process of NYISOinitiated SRA requests? What role will the TO or DU play in reviewing and approving such requests so that Aggregations under SRA request consideration do not exacerbate reliability or safety issues on the distribution system?
  - NYISO Response: Further details on the SRA process and securing Aggregations for reliability needs will be provided in the GOCP User's Guide, which will be accompanied by a presentation at a future ICAPWG.



- Slide 37 We recognize that the NYISO does not plan to incorporate any requirements associated with FERC Order 2222 in its initial implementation of the approved DER model Tariff. However, should FERC issue an Order to the NYISO where some changes directed can be realistically adopted upon implementation, the NYISO should make all reasonable efforts to do so to prevent the need for significant changes to be adopted by Market Participants after participation in the DER model has begun.
  - NYISO Response: The NYISO continues to target implementation of the scope from its FERC accepted 2020 market design. The NYISO will evaluate the feasibility of additional scope once a final ruling is issued for Order 2222.



- Slide 38 As noted during the March 25th meeting, as well as in prior meetings, there is need for prospective Aggregators to be aware of, be prepared for, and have the opportunity to provide feedback on the requirements that may be applicable under Step 2 (Utility MP registration process). We request that the NYISO facilitate discussion of these requirements, and for the Joint Utilities (or each individual DU, if there are variations on requirements between utilities) to present on the Utility MP registration process.
  - NYISO Response: The NYISO is aware of interest in a collaborative working session including the Aggregators, Joint Utilities, and DPS staff. As noted at the end of the 4/6/22 ICAPWG/MIWG, the Joint Utilities are hosting a series of stakeholder engagements to address these types of issues (The first of which occurred on 04/29/2022). NYISO recommends that additional topic requests be sent directly to the JU, to the extent the topic is not yet captured in the draft agenda.



### Next Steps



### **Next Steps**

- NYISO seeks ICAPWG recommendation of the following updated manuals for a BIC vote in November 2022.
  - Transmission & Dispatch Operations
  - Emergency Operations
  - Day-Ahead Scheduling
  - Control Center Requirements
- NYISO will return to discuss concepts and supporting language for Group 1 Operations continued at further ICAPWG, CDAS, and SOAS in May and June.
- NYISO will return to initiate Group 2 language updates at a future ICAPWG.
- Please send any questions that were not addressed during this presentation to: DER\_Feedback@nyiso.com
  - Comments/feedback submitted to the NYISO will be posted publicly unless the NYISO is specifically asked not to do so.



### Our Mission & Vision



#### **Mission**

Ensure power system reliability and competitive markets for New York in a clean energy future



#### **Vision**

Working together with stakeholders to build the cleanest, most reliable electric system in the nation



### Questions?

