

NYISO Consumer Interest Liaison Weekly Summary

July 4 – July 8, 2016

Notices:

• The New York Independent System Operator (NYISO) released its annual <u>Power Trends</u> report, which provides an in-depth look at the forces shaping the future of the New York State electric grid.

The 2016 report examines shifting patterns of electricity use, a growing need for investment in transmission infrastructure, persistently low natural gas prices, and public policies promoting renewable and distributed resources. These dynamics are all combining to reshape the energy landscape, the report finds.

Meeting Summaries:

Tuesday, July 5, 2016

Joint Electric System Planning Working Group/Transmission Planning Advisory Subcommittee

2016 RNA Draft 1 Report

Bill Lamanna of the NYISO presented the draft 2016 Reliability Needs Assessment (RNA). The RNA is the foundation study used in the development of the NYISO Comprehensive Reliability Plan (CRP). The RNA is performed to evaluate electric system reliability for both transmission security and resource adequacy over a 10-year study period. Mr. Lamanna noted the process change to the RNA highlighted in Section 2 of the report. The primary change to the Comprehensive System Planning Process (CSPP) that affects the processing of the 2016 RNA is the implementation of a two pass process for the identification of Reliability Needs in the RNA. The first pass ("First Pass") is considered "preliminary" with the NYISO releasing preliminary RNA results and a draft report to the Stakeholders. Thereafter, the NYISO starts the second pass ("Second Pass") to determine if the preliminary Reliability Needs identified in the First Pass should be updated in light of subsequent system updates that may impact those needs. In finalizing the Reliability Needs during the Second Pass, system changes that occurred since the initial lock down date of the RNA assumptions matrix will be considered. Mr. Lamanna led a review of the report while highlighting areas that will be completed in the Second Pass step. To



see the Draft 1 Report, please go to:

http://www.nyiso.com/public/webdocs/markets_operations/committees/bic_espwg/meeting_mate rials/2016-07-05/2016RNA_ReliabilityNeedsReport.pdf

NYISO CPP Study Plan -- Phase I Status Report and Preliminary Findings

Peter Carney of the NYISO presented the preliminary findings of Phase I of the Clean Power Plan (CPP) Study Plan. The goal of Phase I of the CPP study is to provide:

- Estimates of renewable resources necessary to comply with RGGI, CPP, and CSAPR in 2024
- Identification of generation operational limits and possible requirement for new market products
- Potential changes in production metrics for 2024
- Estimates of allowances levels or Emission Rate Credits necessary to achieve compliance

Mr. Carney began by displaying a chart comparing the CPP Mass and Rate Limits to the limits for the Regional Greenhouse Gas Initiative (RGGI) that NY currently participates in. The goal values of the two programs differ but are close in the end results.

Mr. Carney provided the scenarios the NYISO studied and provided an explanation for each case that was chosen. The preliminary findings show that compliance with the CPP Initial Period can be achieved, although compliance and resource mix changes come with a significant increase in costs:

•Simulated Production Cost increases: 14%–22%

•Simulated Load Weighted LMP increases: 15%–20%

Mr. Carney provided emissions data resulting from the simulations and compared results from the scenarios. It was noted that the complete report for Phase I of the study will be available on the NYISO website within two weeks of the presentation.

For Phase II of the study, significant work remains to fully evaluate potential changes in resources and networks in terms of:

- Resource Adequacy
- Transmission Security
- System Stability
- Extreme weather analysis
- Simulations for 2030
- Sub-hourly simulations

The draft Phase II report is anticipated to be delivered by November 15, 2016 with the final report currently scheduled for December 15, 2016. To see the presentation please go to: http://www.nyiso.com/public/webdocs/markets_operations/committees/bic_espwg/meeting_mate rials/2016-07-05/NYISO%20CPP%20Study.pdf

2016 CARIS 2 -- Preliminary Base Case Results



Tim Duffy of the NYISO presented the preliminary Base Case results for the 2016 Congestion Assessment and Resource Integration Study (CARIS) Phase 2. The NYISO must update and extend the CARIS 1 database for Phase 2 studies until 2034. Mr. Duffy led a review of the assumptions and noted updated areas. A complete assumption matrix was provided and included a comparison of the CARIS 1 and CARIS 2 Base Cases, highlighting updates in red. Mr. Duffy then led a review of the preliminary results projected out to 2034. The NYISO expects to present the updates to the CARIS model to the BIC at the July 13, 2016 meeting. To see the complete presentation please go to:

http://www.nyiso.com/public/webdocs/markets_operations/committees/bic_espwg/meeting_mate rials/2016-07-05/CARIS%202%20Database.pdf

Wednesday, July 6, 2016

Installed Capacity Working Group

Forecast Enhancements in the Buyer-side Mitigation Rules

Julia Popova of the NYISO presented the proposal to enhance the Installed Capacity (ICAP) forecasts utilized in the Buyer-side Mitigation (BSM) Exemption Test process. The proposed framework would include units in the BSM ICAP forecast that are:

- Currently operating (i.e., Gold Book)
- Forced Outage
- Inactive Reserve
 - unless there publicly available information definitively indicating a unit will not continue operation

In addition to above, the following units would not be included in the BSM forecast:

- Retired
- Relinquishing/Transferring CRIS
- Other publicly available information definitively indicating a unit will not continue operation

Also included in the BSM ICAP forecast are resources with the following outage status that will be returning to service and exhibit "positive indicators":

- ICAP Ineligible Forced Outage ("IIFO"), including units that were determined to have had a Catastrophic Failure
- Mothball Outage
- Partial long-term derate

Generating units that do not fit the above conditions would be subjected to an "inclusion test" to determine inclusion or exclusion in the BSM ICAP forecast.

Ms. Popova detailed the positive indicators including indications of repair evidence or indication of anticipating a return-to-service, providing examples of each for additional clarity.

The inclusion test was presented as a test to evaluate whether a resource might return to service, or remain in service (as applicable), over a given time period of time. The proposal would develop factors that would help determine whether or not a generator would be economic based



on specific unit cost factors as compared to revenue forecasts to indicate inclusion or exclusion in the BSM ICAP forecast. A generator owner's portfolio would be examined for incentives to withhold and measured as an adjustment for the minimum level of ICAP price that would ensure that the owner of that unit would not reduce its total ICAP revenue for its portfolio as a result of returning the unit to service.

Ms. Popova noted stakeholder comments throughout the presentation and requested that additional comments be submitted for consideration as the proposal progresses. To see Ms. Popova's complete presentation, please go to:

http://www.nyiso.com/public/webdocs/markets_operations/committees/bic_icapwg/meeting_mat_erials/2016-07-06/Forcast% 20Enhancements% 20BSM% 2006292016.pdf

FERC Filings

There were no filings made to FERC by the NYISO for this week.

FERC Orders

July 8, 2016

FERC Letter Order granted NYISO's March 24, 2015 motion to terminate its reporting obligation in Docket No. ER10-2220-000 regarding the status of stakeholder discussions addressing RMR compensation

Link to FERC Filings and Orders:

http://www.nyiso.com/public/markets_operations/documents/tariffviewer/index.jsp