

NYSRC Fall Forecast Update: 2023 IRM Forecast

Revised posting

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Revised Posting

 Revised presentation – all O&R, G-to-J, and Zone G weather adjusted peaks and forecast values are increased by approximately 4 MW relative to the original ICS posting on 9/29, based upon final Orange & Rockland updates



Agenda

Summary and Background

2022 Weather Normalized Peaks

2023 IRM Forecast

Appendix - Coincident Peak Weather Normalization Models



Summary and Background

2022 Weather Normalized Coincident Peak

- Actual 2022 coincident peak hour load (7/20/22 hour beginning 17)
- Coincident peak weather adjustment
- Estimated demand response and municipal self-generation impacts
- The sum of these components yields the final 2022 weather normalized coincident peak by Transmission District

2023 IRM Coincident Peak Forecast

- Transmission District Regional Load Growth Factors (1+RLGF)
- Large Load growth, i.e., projected 2023 forecast for large load projects relative to 2022 actual coincident load
- BTM:NG forecast: projected BTM:NG resource load based primarily upon actual load during the 2022 NYCA peak
- Transmission District IRM coincident peak forecasts are the product of the 2022 weather normalized peak and the 1+RLGF, plus large load growth and BTM:NG load
- The NYCA coincident peak forecast is the sum of Transmission District forecasts



Summary and Background (cont.)

2023 IRM Locality Peak Forecasts

- Zonal shares are applied to Transmission District values to calculate Locality coincident peaks
- Locality non-coincident peak forecasts are calculated by multiplying the coincident peak forecast by the non-coincident to coincident peak (NCP to CP) ratio

2023 IRM Zonal Peak Forecasts

- Zonal shares are applied to Transmission District values to calculate Zonal coincident peaks
- Zonal non-coincident peak forecasts are calculated by multiplying the coincident peak forecast by the NCP to CP ratio
- Zonal forecasts are presented in two forms:
 - ➤ Before BTM:NG adjustments these forecasts are analogous to the Gold Book forecast
 - After BTM:NG load adjustments these forecasts are used for IRM modeling, as BTM:NG generation is modeled as a resource



Summary and Background (cont.)

- The NYISO first performed independent analyses
 - Weather adjusted coincident Transmission District peaks
 - NCP/CP ratios and weather adjusted Locality peaks
 - Preliminary 1+RLGFs based upon the 2022 Gold Book forecast
- Information submitted by the Transmission Owners was incorporated into the 2023 IRM forecast as appropriate
 - Actual coincident peak load values
 - Coincident and/or non-coincident weather adjustments
 - Coincident and/or non-coincident weather adjusted peaks
 - Updated Regional Load Growth Factors (RLGFs)



Summary and Background (cont.)

Changes since the 9/27 LFTF meeting – informed by TO updates

- Updated Con Edison Regional Load Growth Factor
 - 1+RLGF increased from 1.0082 to 1.0219
 - > 171 MW increase in the 2023 Con Ed coincident peak forecast
 - > Proportional increases in the Zone J and G-to-J Locality forecasts, and Zones H&I forecasts
 - ➤ The increased RLGF (reflecting growth in the 2023 forecast peak relative to the 2022 weather adjusted peak) is driven by increased electric vehicle and appliance electrification drivers, decreased energy efficiency and storage peak reduction impacts, strong commercial and residential load growth, and a continued load recovery from the COVID-19 pandemic
- Updated National Grid weather adjusted peak
 - 37 MW decrease in the 2022 National Grid weather normalized coincident peak and 2023 IRM forecast
 - Proportional changes filter through to the Zones A through F forecasts
- Updated Orange & Rockland RLGF
 - > 1+RLGF increased from 0.9964 to 1.0037
 - ➤ Increase of approximately 7 MW to the O&R, G-to-J Locality, and Zone G forecasts
 - Change relative to the original ICS posting on 9/29

Additional detail is available from the 9/16 and 9/27 LFTF meetings

- September 16th Load Forecasting Task Force
- September 27th Load Forecasting Task Force



2022 Weather Normalized Peaks



Summary of 2022 Transmission District Weather Normalization NYCA Coincident Peak

| | | | 2022 W | eather Normaliz | ed Coincident | : Peak Load | | | |
|--------------------------|--|--------------------------------------|--------------------------------------|---|-----------------------------|-------------------------------------|---|------------------------------------|--|
| (1) | (2) | (3) | (4) | (5) = (2) + (3) + (4) | (6) | (7) = (5) + (6) | (8) | (9) = (8) - (7) | (10) = (9) / (8) * 100% |
| Transmission District | 2022 Actual MW, 7/20/2022 HB 17 | Demand Response Estimate MW | Estimated Muni Self- Gen MW | 2022 Actual MW, with Estimated DR and Muni Self Gen MW | Weather Adjustment MW | 2022 Weather Normalized MW | 2022 ICAP Forecast, Prior to BTM:NG Resources MW | TO Forecast, Over / Under MW | TO Forecast Delta, Percent Over /Under |
| Con Edison | 11,457.1 | 241.0 | 0.0 | 11,698.1 | 749.9 | 12,448.0 | 12,401.7 | -46.3 | -0.37% |
| Cen Hudson | 1,020.0 | 0.0 | 0.0 | 1,020.0 | -1.0 | 1,019.0 | 1,077.3 | 58.3 | 5.41% |
| LIPA | 5,121.6 | 16.0 | 0.0 | 5,137.6 | -74.9 | 5,062.7 | 5,056.1 | -6.6 | -0.13% |
| Nat. Grid | 6,789.3 | 243.0 | 39.0 | 7,071.3 | -74.7 | 6,996.6 | 6,990.6 | -6.0 | -0.09% |
| NYPA | 474.6 | 0.0 | 0.0 | 474.6 | -0.4 | 474.2 | 459.8 | -14.4 | -3.13% |
| NYSEG | 3,084.7 | 53.0 | 0.0 | 3,137.7 | 44.1 | 3,181.8 | 3,102.8 | -79.0 | -2.55% |
| O&R | 1,038.7 | 0.0 | 0.0 | 1,038.7 | 29.7 | 1,068.4 | 1,111.2 | 42.8 | 3.85% |
| RG&E | 1,506.3 | 7.0 | 0.0 | 1,513.3 | 10.6 | 1,523.9 | 1,566.0 | 42.1 | 2.69% |
| NYCA | 30,492.3 | 560.0 | 39.0 | 31,091.3 | 683.3 | 31,774.6 | 31,765.5 | -9.1 | -0.03% |

Notes: NYCA peak load hour is defined by measurements from the NYISO EMS system (PI Historian). Actual load data is from DSS/TO.

Demand Response and Muni Self-Gen impacts are estimates; and may be revised for the ICAP Market forecast.



Summary of 2022 Weather Normalized Locality Peaks

| | | | | 20 | 22 Weather N | Normalized Loc | ality Peaks | | | | | |
|---------------|--------------------------------|---|--|-------------------------------------|---|--|---|---|---|---------------------------------------|----------------------------------|---|
| (1) | (2) | (3) | (4) | (5) | (6) = (3) + (4) + (5) | (7) | (8) | (9) = (7) * (8) | (10) = (9) - (6) | (11) | (12) = (11) - (9) | (13) = (12) / (11) * 100% |
| | | 2022 Locali | ty Peak Inforr | mation | | | 2022 | Locality Weath | er Normalizati | on Calculation | 1 | |
| Locality | Locality Peak Date and Time | Actual Load at Locality Peak Date and Time MW | DR Estimate at Locality Peak Date and Time MW | Estimated Muni Self-Gen MW | 2022 Actual MW, with Estimated DR and Muni Self-Gen MW | 2022 Weather Normalized Coincident Peak Deamnd MW | NCP to CP Ratio (15 year avg. with outliers removed) | 2022 Locality Weather Normalized MW | Locality Weather Adjustment MW | 2022 ICAP Market Forecast MW | Forecast Over /Under MW | Forecast Delta, Percent Over /Under |
| Zone J - NYC | 8/9/2022 HB 16 | 10,766.9 | 233.0 | 0.0 | 10,999.9 | 10,808.4 | 1.0196 | 11,020.2 | 20.3 | 10,906.0 | -114.2 | -1.0% |
| Zone K - LIPA | 8/9/2022 HB 17 | 5,214.6 | 16.0 | 0.0 | 5,230.6 | 5,062.7 | 1.0166 | 5,146.5 | -84.1 | 5,137.5 | -9.0 | -0.2% |
| Zones G-to-J | 8/9/2022 HB 17 | 14,884.0 | 258.0 | 0.0 | 15,142.0 | 14,915.2 | 1.0133 | 15,113.6 | -28.4 | 15,125.2 | 11.6 | 0.1% |

Notes: Locality peak load hours are defined by measurements from the NYISO EMS system (PI Historian).

Actual load data is from DSS/TO.

Demand Response and Muni Self-Gen impacts are estimates; and may be revised for the ICAP Market forecast.



2023 IRM Forecast



2023 IRM Forecast - NYCA Coincident Peak

| | | | 2023 | IRM Coincid | ent Peak Foreca | st | | | |
|--------------------------|--|--|--|--------------------------------------|--|---------------------------------|---|--------------------------|---|
| (1) | (2) | (3) | (4) = (2) + (3) | (5) | (6) = (4) * (5) | (7) | (8) = (6) + (7) | (9) | (10) = (8) + (9) |
| Transmission District | 2022 Actual MW, 7/20/2022 HB 17 | Total Adjustment (Demand Response + Muni Self-Gen + Wthr Adjustment) MW | 2022 Weather Normalized Coincident Peak MW | Regional Load Growth Factor | 2023 Forecast, Before Adjustments MW | Large Load Forecast MW | 2023 IRM Forecast, With Large Load Growth, Before BTM:NG Adjustments MW | BTM:NG Forecast MW | TO Forecast, With Large Load Growth and BTM:NG Adjustments MW |
| Con Edison | 11,457.1 | 990.9 | 12,448.0 | 1.0219 | 12,720.6 | 0.0 | 12,720.6 | 23.4 | 12,744.0 |
| Cen Hudson | 1,020.0 | -1.0 | 1,019.0 | 0.9963 | 1,015.2 | 0.0 | 1,015.2 | 0.0 | 1,015.2 |
| LIPA | 5,121.6 | -58.9 | 5,062.7 | 0.9896 | 5,010.0 | 0.0 | 5,010.0 | 40.3 | 5,050.3 |
| Nat. Grid | 6,789.3 | 207.3 | 6,996.6 | 1.0000 | 6,996.6 | 93.0 | 7,089.6 | 1.7 | 7,091.3 |
| NYPA | 474.6 | -0.4 | 474.2 | 1.0000 | 474.2 | 24.7 | 498.9 | 0.0 | 498.9 |
| NYSEG | 3,084.7 | 97.1 | 3,181.8 | 0.9831 | 3,127.9 | 30.0 | 3,157.9 | 39.6 | 3,197.5 |
| O&R | 1,038.7 | 29.7 | 1,068.4 | 1.0037 | 1,072.4 | 0.0 | 1,072.4 | 0.0 | 1,072.4 |
| RG&E | 1,506.3 | 17.6 | 1,523.9 | 1.0000 | 1,523.9 | 0.0 | 1,523.9 | 52.5 | 1,576.4 |
| NYCA | 30,492.3 | 1,282.3 | 31,774.6 | 1.0052 | 31,940.8 | 147.7 | 32,088.5 | 157.5 | 32,246.0 |
| | | | | 2023 Fore | cast from 2022 | Gold Book | 32,018.0 | | |
| | | | | Change f | rom 2022 Gold | Book | 70.5 | | |
| | | | | Percent (| Change | | 0.2% | | |

2023 IRM Forecast - Locality Peaks

| | • | | 2023 | B IRM Locality Pea | k Forecasts | | | | |
|---------------|--------------------------------|---|--------------------------------------|--|--|--|---|--------------------------|--|
| (1) | (2) | (3) | (4) | (5) = (3) * (4) | (6) | (7) = (6) - (5) | (8) =(7)/(6) | (9) | (10) = (8) + (9) |
| Locality | 2022 Locality Peak MW | 2022 Weather Normalized Locality Peak MW | Regional Load Growth Factor | 2023 IRM Locality Peak Forecast Before BTM:NG Adjustments MW | 2023 Forecast from 2022 Gold Book MW | Change from Gold Book Forecast MW | Percent Change from Gold Book Forecast | BTM:NG Forecast MW | Locality Peak Forecast, Including BTM:NG Adjustments MW |
| Zone J - NYC | 10,766.9 | 11,020.2 | 1.0219 | 11,261.6 | 11,001.0 | 260.6 | 2.4% | 23.4 | 11,285.0 |
| Zone K - LIPA | 5,214.6 | 5,146.5 | 0.9896 | 5,093.0 | 5,031.0 | 62.0 | 1.2% | 40.3 | 5,133.3 |
| Zones G-to-J | 14,884.0 | 15,113.6 | 1.0179 | 15,383.4 | 15,223.0 | 160.4 | 1.1% | 23.4 | 15,406.8 |



2022 Weather Adjusted Coincident Peak by Subzone

| | | 2022 \ | Weather-A | djusted Coi | ncident Pe | ak, Includin | g Demand I | Response a | nd Muni Se | lf-Gen | | |
|----------|---------|---------|-----------|-------------|------------|--------------|------------|------------|------------|----------|---------|----------|
| (1) | (2) | (3) | (4) | (5) | (6) | (7) | (8) | (9) | (10) | (11) | (12) | (13) |
| | Α | В | С | D | E | F | G | Н | I | J | K | Total |
| Con Ed | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 272.5 | 1,367.1 | 10,808.4 | 0.0 | 12,448.0 |
| Cen Hud | 0.0 | 0.0 | 0.0 | 0.0 | 3.4 | 0.0 | 1,015.6 | 0.0 | 0.0 | 0.0 | 0.0 | 1,019.0 |
| LIPA | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 5,062.7 | 5,062.7 |
| Nat Grid | 1,977.3 | 413.7 | 1,305.2 | 90.4 | 928.6 | 2,281.4 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 6,996.6 |
| NYPA | 0.0 | 0.0 | 0.0 | 474.2 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 474.2 |
| NYSEG | 674.1 | 0.0 | 1,424.8 | 107.5 | 429.3 | 162.9 | 21.7 | 361.5 | 0.0 | 0.0 | 0.0 | 3,181.8 |
| O&R | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 1,068.4 | 0.0 | 0.0 | 0.0 | 0.0 | 1,068.4 |
| RG&E | 0.0 | 1,523.9 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 1,523.9 |
| Total | 2,651.4 | 1,937.6 | 2,730.0 | 672.1 | 1,361.3 | 2,444.3 | 2,105.7 | 634.0 | 1,367.1 | 10,808.4 | 5,062.7 | 31,774.6 |

Notes: Con Edison Zone G losses moved to Zone J.

Transmission District actual loads and weather adjustments apportioned to zones using sub-zonal shares presented at 9/16 LFTF.

Sub-zonal demand response and Muni self-gen estimates are applied independently.



2023 Forecast With Large Load Growth, Before BTM:NG Adjustments NYCA Coincident Peak

| : | 2023 IRM Co | oincident Po | eak Forecas | t by Transn | nission Dist | rict and Zor | ne, With La | rge Load Gr | owth, Befo | re BTM:NG | Adjustmen | nts | |
|-------------|-------------|--------------|-------------|-------------|--------------|--------------|-------------|-------------|------------|-----------|-----------|----------|--------|
| (1) | (2) | (3) | (4) | (5) | (6) | (7) | (8) | (9) | (10) | (11) | (12) | (13) | |
| | Α | В | С | D | Е | F | G | Н | I | J | К | Total | RLGF |
| Con Ed | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 278.5 | 1,397.0 | 11,045.1 | 0.0 | 12,720.6 | 1.0219 |
| Cen Hud | 0.0 | 0.0 | 0.0 | 0.0 | 3.4 | 0.0 | 1,011.8 | 0.0 | 0.0 | 0.0 | 0.0 | 1,015.2 | 0.9963 |
| LIPA | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 5,010.0 | 5,010.0 | 0.9896 |
| Nat Grid | 2,070.3 | 413.7 | 1,305.2 | 90.4 | 928.6 | 2,281.4 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 7,089.6 | 1.0000 |
| NYPA | 0.0 | 0.0 | 0.0 | 498.9 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 498.9 | 1.0000 |
| NYSEG | 662.7 | 0.0 | 1,430.7 | 105.7 | 422.0 | 160.1 | 21.3 | 355.4 | 0.0 | 0.0 | 0.0 | 3,157.9 | 0.9831 |
| O&R | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 1,072.4 | 0.0 | 0.0 | 0.0 | 0.0 | 1,072.4 | 1.0037 |
| RG&E | 0.0 | 1,523.9 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 1,523.9 | 1.0000 |
| Total | 2,733.0 | 1,937.6 | 2,735.9 | 695.0 | 1,354.0 | 2,441.5 | 2,105.5 | 633.9 | 1,397.0 | 11,045.1 | 5,010.0 | 32,088.5 | |
| Large Loads | 93.0 | 0.0 | 30.0 | 24.7 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | | • |

Note: Sub-zonal coincident peak forecasts are calculated by multiplying the 2022 weather adjusted coincident peak by the Transmission District RLGF; and adding projected large load growth.



2023 Forecast With Large Load Growth, Before BTM:NG Adjustments Non-Coincident Peaks

| 2023 IRM Non | -Coinciden | t Peak Fore | cast by Tra | nsmission [| District and | Zone, With | Large Load | Growth, B | efore BTM: | NG Adjustn | nents |
|---------------------|------------|-------------|-------------|-------------|--------------|------------|------------|-----------|------------|------------|---------|
| (1) | (2) | (3) | (4) | (5) | (6) | (7) | (8) | (9) | (10) | (11) | (12) |
| | Α | В | С | D | E | F | G | Н | I | J | K |
| Con Ed | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 284.0 | 1,424.4 | 11,261.6 | 0.0 |
| Cen Hud | 0.0 | 0.0 | 0.0 | 0.0 | 3.5 | 0.0 | 1,032.1 | 0.0 | 0.0 | 0.0 | 0.0 |
| LIPA | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 5,093.0 |
| Nat Grid | 2,139.7 | 422.8 | 1,337.7 | 93.1 | 954.6 | 2,314.7 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| NYPA | 0.0 | 0.0 | 0.0 | 513.5 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| NYSEG | 684.9 | 0.0 | 1,466.3 | 108.8 | 433.8 | 162.4 | 21.7 | 362.3 | 0.0 | 0.0 | 0.0 |
| O&R | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 1,094.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| RG&E | 0.0 | 1,557.4 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Total | 2,824.6 | 1,980.2 | 2,804.0 | 715.4 | 1,391.9 | 2,477.1 | 2,147.8 | 646.3 | 1,424.4 | 11,261.6 | 5,093.0 |
| NCP/CP Ratio | 1.0335 | 1.0220 | 1.0249 | 1.0294 | 1.0280 | 1.0146 | 1.0201 | 1.0196 | 1.0196 | 1.0196 | 1.0166 |

Notes: NCP/CP calculations shown in 9/16 LFTF materials. Updated Zone K ratio, informed by LIPA TO analyses.



2023 Forecast With Large Load Growth and BTM:NG Adjustments NYCA Coincident Peak

| | 2023 IRM | Coincident | Peak Forec | ast by Trans | smission Di | strict and Z | one, With I | arge Load (| Growth and | BTM:NG A | djustments | |
|----------|----------|------------|------------|--------------|-------------|--------------|-------------|-------------|------------|----------|------------|----------|
| (1) | (2) | (3) | (4) | (5) | (6) | (7) | (8) | (9) | (10) | (11) | (12) | (13) |
| | Α | В | С | D | E | F | G | Н | I | J | К | Total |
| Con Ed | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 278.5 | 1,397.0 | 11,068.5 | 0.0 | 12,744.0 |
| Cen Hud | 0.0 | 0.0 | 0.0 | 0.0 | 3.4 | 0.0 | 1,011.8 | 0.0 | 0.0 | 0.0 | 0.0 | 1,015.2 |
| LIPA | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 5,050.3 | 5,050.3 |
| Nat Grid | 2,070.3 | 413.7 | 1,305.2 | 90.4 | 930.3 | 2,281.4 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 7,091.3 |
| NYPA | 0.0 | 0.0 | 0.0 | 498.9 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 498.9 |
| NYSEG | 662.7 | 0.0 | 1,470.3 | 105.7 | 422.0 | 160.1 | 21.3 | 355.4 | 0.0 | 0.0 | 0.0 | 3,197.5 |
| O&R | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 1,072.4 | 0.0 | 0.0 | 0.0 | 0.0 | 1,072.4 |
| RG&E | 0.0 | 1,576.4 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 1,576.4 |
| Total | 2,733.0 | 1,990.1 | 2,775.5 | 695.0 | 1,355.7 | 2,441.5 | 2,105.5 | 633.9 | 1,397.0 | 11,068.5 | 5,050.3 | 32,246.0 |
| BTM:NG | 0.0 | 52.5 | 39.6 | 0.0 | 1.7 | 0.0 | 0.0 | 0.0 | 0.0 | 23.4 | 40.3 | |



G-to-J Locality Weather Normalized Peak and 2023 Forecast

| | 2022 We | ather-Adju | sted G-to- | J Locality Pea | k |
|--------------|----------------|------------|------------|----------------|--------------|
| (1) | (2) | (3) | (4) | (5) | (6) |
| | G | н | ı | J | G-to-J Total |
| Con Ed | 0.0 | 276.1 | 1,385.3 | 10,952.2 | 12,613.6 |
| Cen Hud | 1,029.1 | 0.0 | 0.0 | 0.0 | 1,029.1 |
| LIPA | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Nat Grid | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| NYPA | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| NYSEG | 22.0 | 366.3 | 0.0 | 0.0 | 388.3 |
| O&R | 1,082.6 | 0.0 | 0.0 | 0.0 | 1,082.6 |
| RG&E | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 |
| Total | 2,133.7 | 642.4 | 1,385.3 | 10,952.2 | 15,113.6 |
| NCP/CP Ratio | 1.0133 | 1.0133 | 1.0133 | 1.0133 | |

| | 2023 G- | to-J Locali | ty Peak Foi | recast With B | TM:NG Adjustment | S | |
|----------|---------|-------------|-------------|---------------|------------------|--------|--------------------|
| (1) | (2) | (3) | (4) | (5) | (7) | (8) | (9) |
| | G | н | I | J | G-to-J Total | RLGF | BTM:NG Forecast |
| Con Ed | 0.0 | 282.1 | 1,415.6 | 11,215.5 | 12,913.2 | 1.0219 | 23.4 |
| Cen Hud | 1,025.3 | 0.0 | 0.0 | 0.0 | 1,025.3 | 0.9963 | 0.0 |
| LIPA | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 0.9896 | 0.0 |
| Nat Grid | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 1.0000 | 0.0 |
| NYPA | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 1.0000 | 0.0 |
| NYSEG | 21.6 | 360.1 | 0.0 | 0.0 | 381.7 | 0.9831 | 0.0 |
| O&R | 1,086.6 | 0.0 | 0.0 | 0.0 | 1,086.6 | 1.0037 | 0.0 |
| RG&E | 0.0 | 0.0 | 0.0 | 0.0 | 0.0 | 1.0000 | 0.0 |
| Total | 2,133.5 | 642.2 | 1,415.6 | 11,215.5 | 15,406.8 | 1.0179 | 23.4 |

Note: The G-to-J Locality weather adjusted zonal peaks are obtained by multiplying the weather adjusted coincident peaks (slide 14) by the G-J NCP/CP ratio shown above.



2023 IRM Zonal Forecast

2023 IRM Zonal Peak Forecasts Before BTM:NG Adjustments

| | Zonal Coincident Peak Forecast Before BTM:NG Adjustments | | | | | | | | | | | | |
|---------|---|--|--|--|--|--|--|--|--|--|--|--|--|
| Α | A B C D E F G H I J K NYCA | | | | | | | | | | | | |
| 2,733.0 | 2,733.0 1,937.6 2,735.9 695.0 1,354.0 2,441.5 2,105.5 633.9 1,397.0 11,045.1 5,010.0 32,088.5 | | | | | | | | | | | | |

| | | Zonal | Non-Coinc | ident Peak | Forecasts B | efore BTM: | :NG Adjustr | nents | | | | | |
|---------|--|-------|-----------|------------|-------------|------------|-------------|-------|--|--|--|--|--|
| Α | A B C D E F G H I J K | | | | | | | | | | | | |
| 2,824.6 | 2,824.6 1,980.2 2,804.0 715.4 1,391.9 2,477.1 2,147.8 646.3 1,424.4 11,261.6 5,093.0 | | | | | | | | | | | | |

| | G-to-J Locality Peak Forecast Before BTM:NG Adjustments | | | | | | | | | | |
|---|---|---|---|---|---|---------|-------|---------|----------|---|----------|
| Α | В | С | D | E | F | G | Н | 1 | J | K | G-to-J |
| | | | | | | 2,133.5 | 642.2 | 1,415.6 | 11,192.1 | | 15,383.4 |

Note: All forecast values include impacts of large load growth



2023 IRM Zonal Forecast (cont.)

2023 IRM Zonal Peak Forecasts With BTM:NG Adjustments

| | BTM:NG Adjustments to Load | | | | | | | | | | |
|---|----------------------------|------|---|-----|---|---|---|---|------|------|-------|
| Α | В | С | D | E | F | G | Н | 1 | J | K | NYCA |
| | 52.5 | 39.6 | | 1.7 | | | | | 23.4 | 40.3 | 157.5 |

| | Zonal Coincident Peak Forecast With BTM:NG Adjustments | | | | | | | | | | |
|---------|--|---------|-------|---------|---------|---------|-------|---------|----------|---------|----------|
| Α | В | С | D | E | F | G | Н | I | J | K | NYCA |
| 2,733.0 | 1,990.1 | 2,775.5 | 695.0 | 1,355.7 | 2,441.5 | 2,105.5 | 633.9 | 1,397.0 | 11,068.5 | 5,050.3 | 32,246.0 |

| | Zonal Non-Coincident Peak Forecasts With BTM:NG Adjustments | | | | | | | | | |
|---------|---|---------|-------|---------|---------|---------|-------|---------|----------|---------|
| Α | В | С | D | E | F | G | Н | 1 | J | K |
| 2,824.6 | 2,032.7 | 2,843.6 | 715.4 | 1,393.6 | 2,477.1 | 2,147.8 | 646.3 | 1,424.4 | 11,285.0 | 5,133.3 |

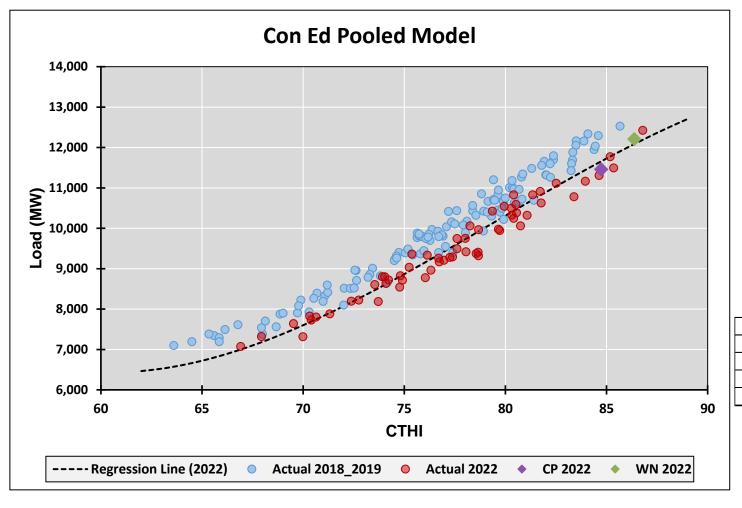
| | G-to-J Locality Peak Forecast With BTM:NG Adjustments | | | | | | | | | | |
|---|---|---|---|---|---|---------|-------|---------|----------|---|----------|
| Α | В | С | D | E | F | G | Н | I | J | K | G-to-J |
| | | | | | | 2,133.5 | 642.2 | 1,415.6 | 11,215.5 | | 15,406.8 |

Note: All forecast values include impacts of large load growth

Questions?



Appendix: Coincident Peak Weather Normalization Models

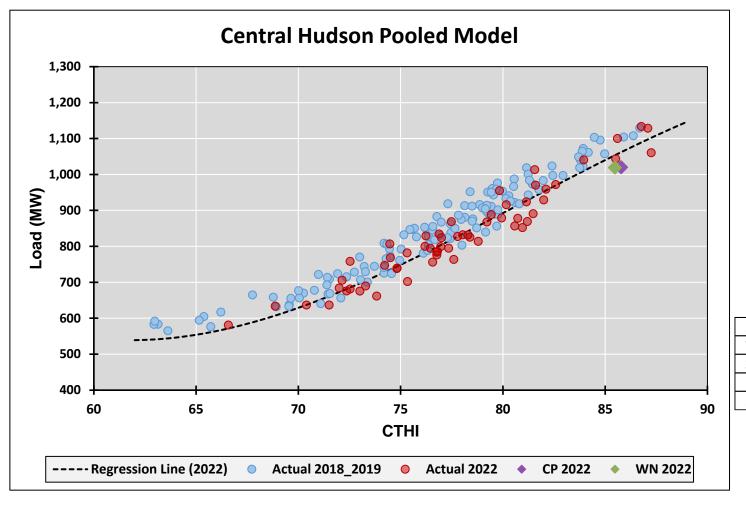


Purple dot shows 2022 coincident peak.

Green dot shows 2022 weather normalized coincident peak.

| 11,457.1 |
|----------|
| 749.9 |
| 12,207.0 |
| 241.0 |
| 12,448.0 |
| |



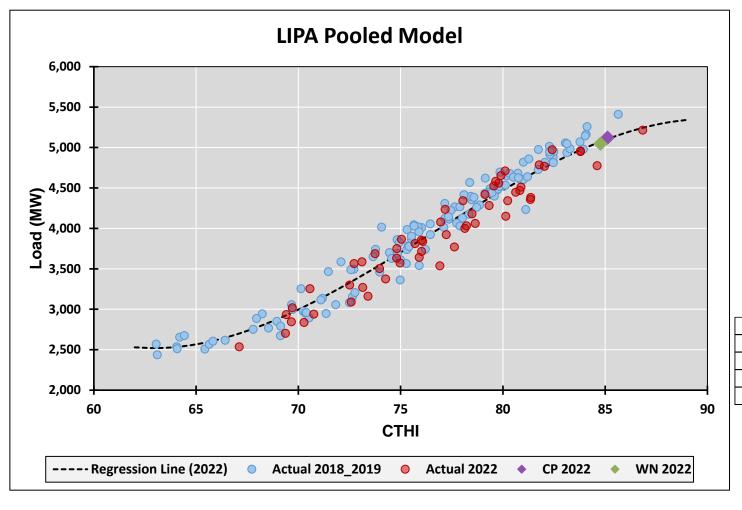


Purple dot shows 2022 coincident peak.

Green dot shows 2022 weather normalized coincident peak.

| 2022 CP | 1,020.0 |
|---------------------------|--------------------|
| Weather Adj | -1.0 |
| 2022 MM CD /h afarra adi) | 4 040 0 |
| 2022 WN CP (before adj) | 1,019.0 |
| Demand Response | 1,019.0 0.0 |



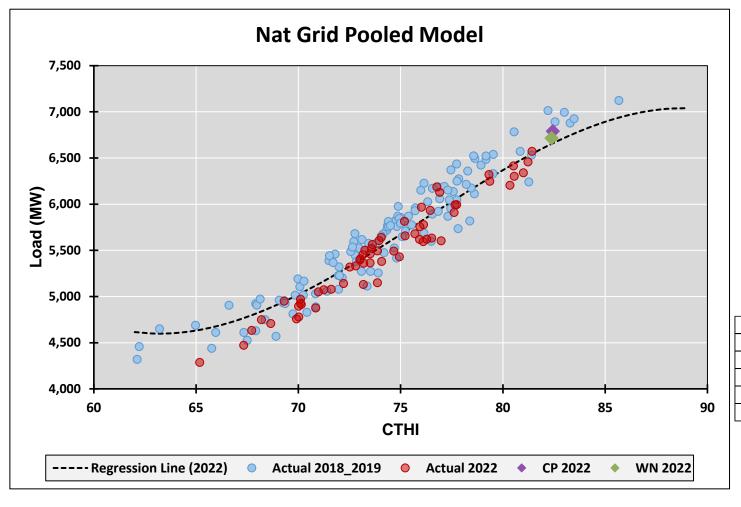


Purple dot shows 2022 coincident peak.

Green dot shows 2022 weather normalized coincident peak.

| 2022 CP | 5,121.6 |
|-------------------------|---------|
| Weather Adj | -74.9 |
| 2022 WN CP (before adj) | 5,046.7 |
| Demand Response | 16.0 |
| 2022 Final WN CP | 5,062.7 |
| | |



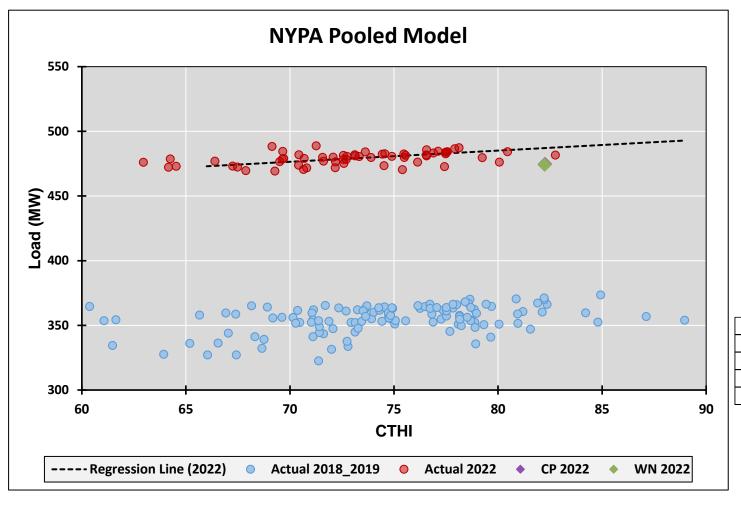


Purple dot shows 2022 coincident peak.

Green dot shows 2022 weather normalized coincident peak.

| 2022 CP | 6,789.3 |
|-------------------------|---------|
| Weather Adj | -74.7 |
| 2022 WN CP (before adj) | 6,714.6 |
| Demand Response | 243.0 |
| Muni Self Gen (est.) | 39.0 |
| 2022 Final WN CP | 6,996.6 |



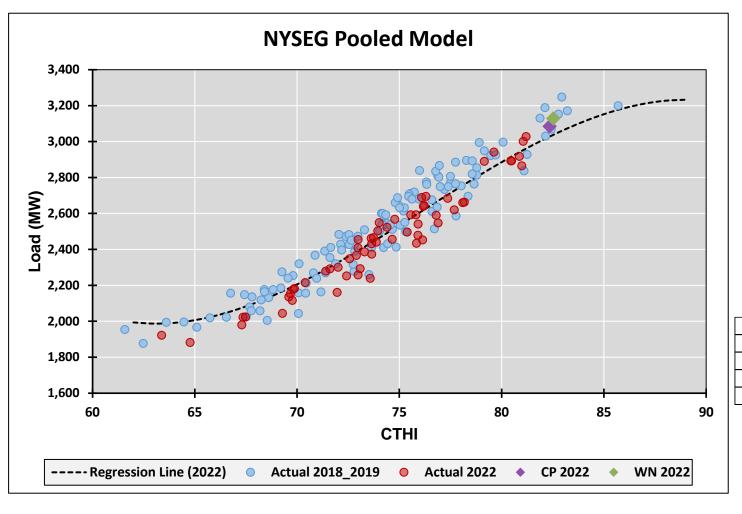


Purple dot shows 2022 coincident peak.

Green dot shows 2022 weather normalized coincident peak.

| 474.6 |
|-------|
| -0.4 |
| 474.2 |
| 0.0 |
| 474.2 |
| |



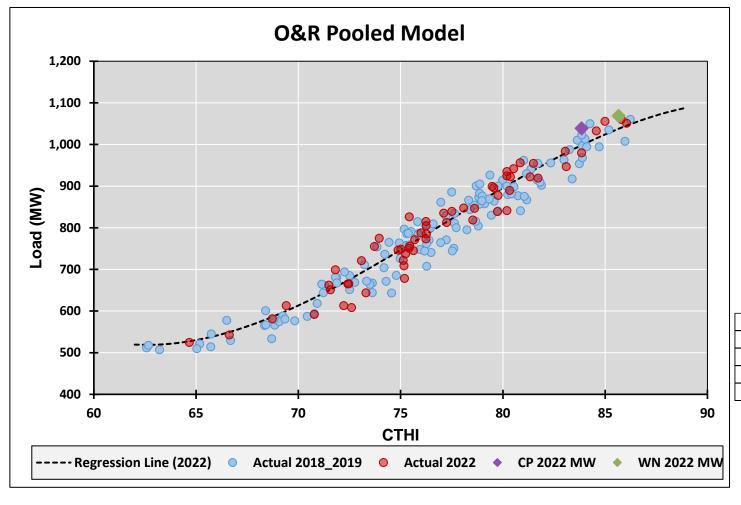


Purple dot shows 2022 coincident peak.

Green dot shows 2022 weather normalized coincident peak.

| 2022 CP | 3,084.7 |
|-------------------------|---------|
| Weather Adj | 44.1 |
| 2022 WN CP (before adj) | 3,128.8 |
| Demand Response | 53.0 |
| 2022 Final WN CP | 3,181.8 |



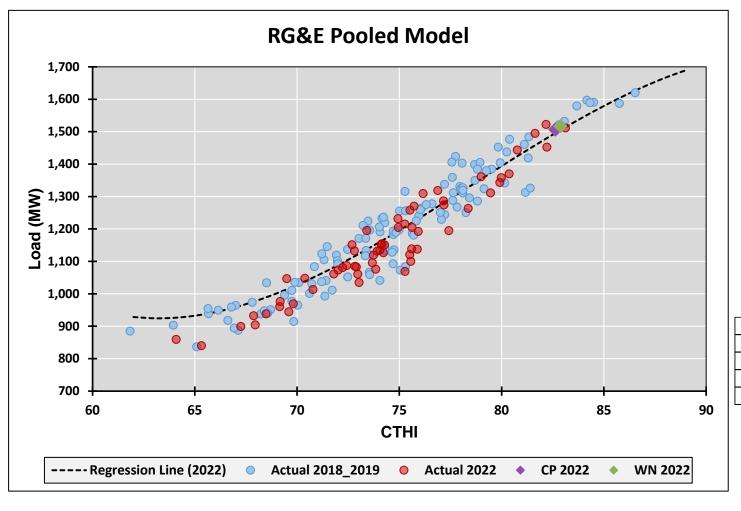


Purple dot shows 2022 coincident peak.

Green dot shows 2022 weather normalized coincident peak.

| 2022 CP | 1,038.7 |
|-------------------------|---------|
| Weather Adj | 29.7 |
| 2022 WN CP (before adj) | 1,068.4 |
| Demand Response | 0.0 |
| 2022 Final WN CP | 1,068.4 |
| | |





Purple dot shows 2022 coincident peak.

Green dot shows 2022 weather normalized coincident peak.

| 2022 CP | 1,506.3 |
|-------------------------|---------|
| Weather Adj | 10.6 |
| 2022 WN CP (before adj) | 1,516.9 |
| Demand Response | 7.0 |
| 2022 Final WN CP | 1.523.9 |



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

