



# Monthly Report

February 2017

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# ***Operations Performance Metrics Monthly Report***



## ***February 2017 Report***

### **Operations & Reliability Department New York Independent System Operator**

Prepared by NYISO Operations Analysis and Services, based on settlements initial invoice data collected on or before March 8, 2017.

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## February 2017 Operations Performance Highlights

- Peak load of 22,215 MW occurred on 02/09/2017 HB 18
- All-time winter capability period peak load of 25,738 MW occurred on 1/7/2014 HB 18
- 2.2 hours of Thunder Storm Alerts were declared
- 0 hours of NERC TLR level 3 curtailment
- NYISO and PJM mutually agreed to deactivate 5 M2M Re-dispatch flow gates on 02/08/2017. The deactivations are reflected on the Coordinated Flowgates and Entitlements web posting.
- Implementation of Hybrid GT Pricing Improvements on 02/28/2017 that will allow GTs to be eligible to set price in more instances by discontinuing the practice of block-loading GTs in the pricing pass when those units are within their minimum run time and uneconomic.
- The following table identifies the estimated production cost savings associated with the Broader Regional Market initiatives.

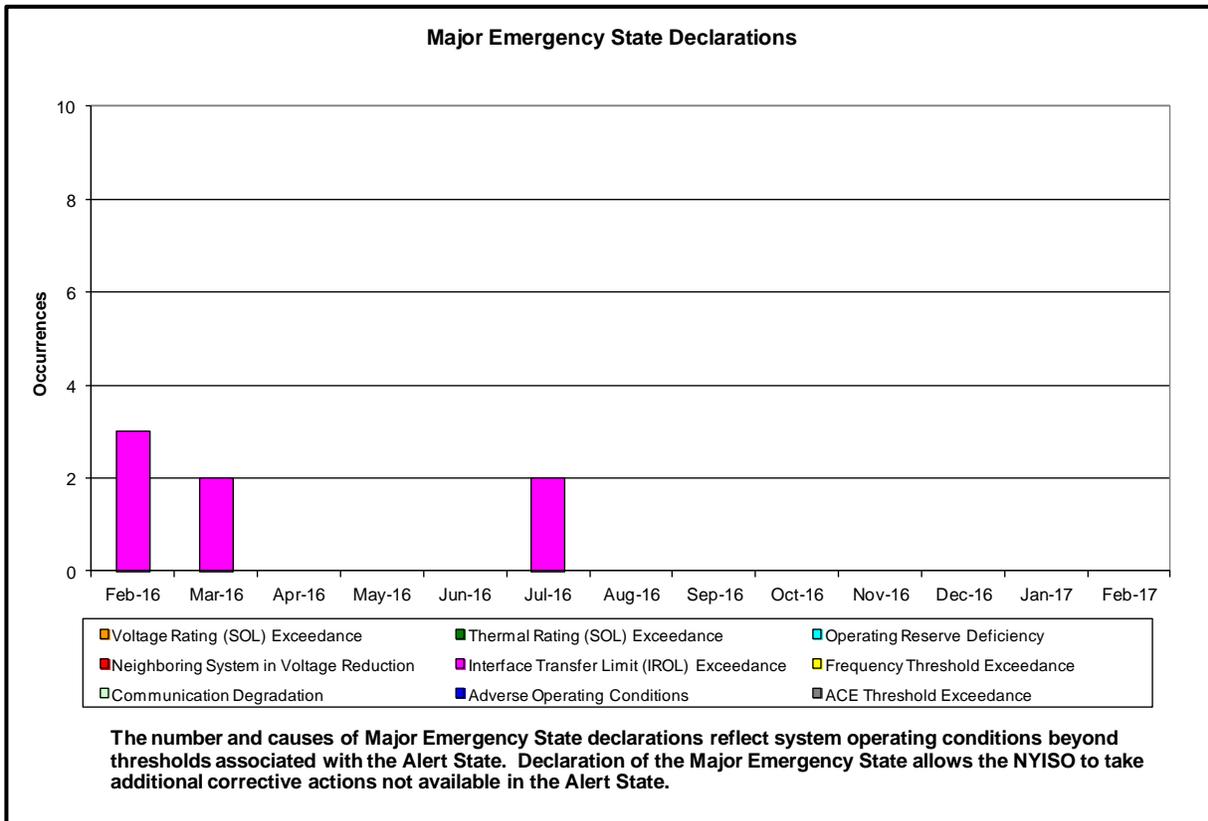
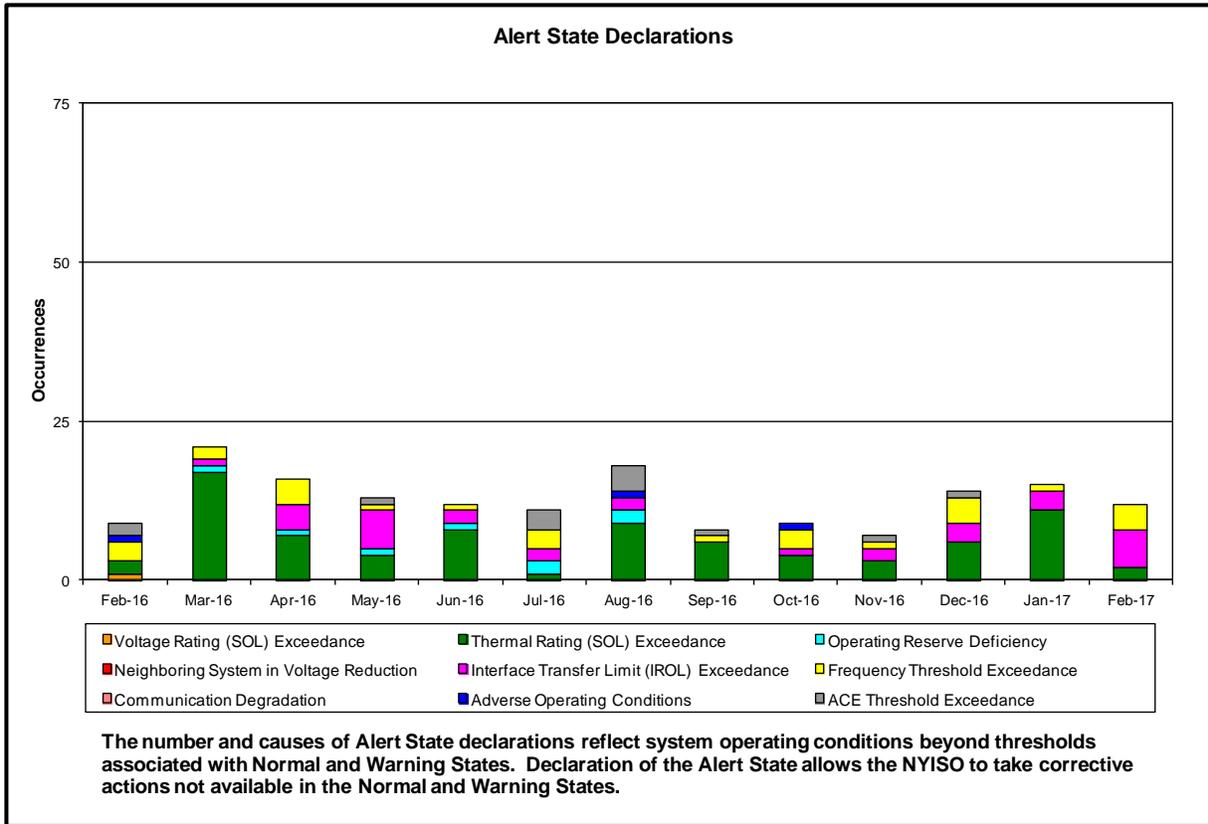
	Current Month Value (\$M)	Year-to-Date Value (\$M)
<b>NY Savings from PJM-NY Congestion Coordination</b>	\$0.85	\$2.54
<b>NY Savings from PJM-NY Coordinated Transaction Scheduling</b>	\$0.02	\$0.03
<b>NY Savings from NE-NY Coordinated Transaction Scheduling</b>	(\$0.16)	(\$0.42)
<b>Total NY Savings</b>	\$0.71	\$2.15
<b>Regional Savings from PJM-NY Coordinated Transaction Scheduling</b>	\$0.07	\$0.20
<b>Regional Savings from NE-NY Coordinated Transaction Scheduling</b>	\$0.07	\$0.15
<b>Total Regional Savings</b>	\$0.14	\$0.35

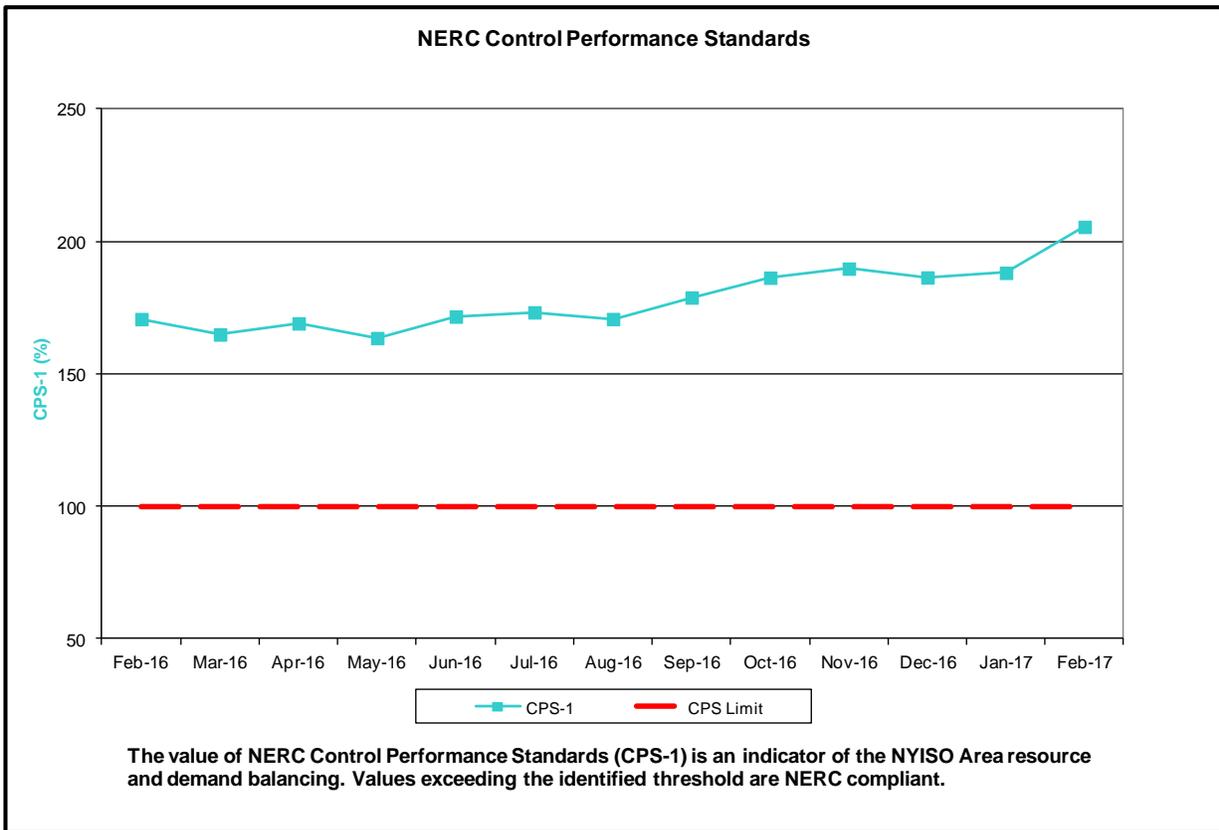
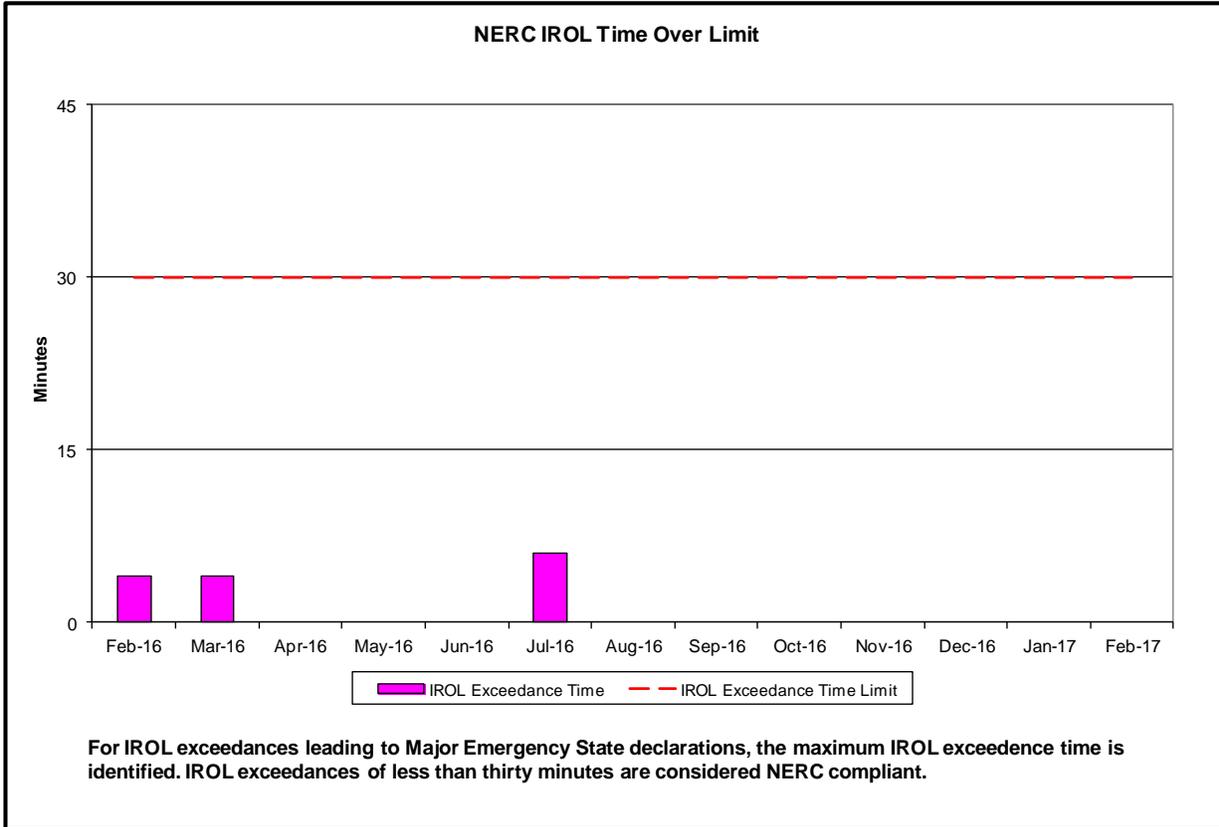
- Statewide uplift cost monthly average was (\$0.67)/MWh
- The following table identifies the Monthly ICAP spot market prices by locality and price delta

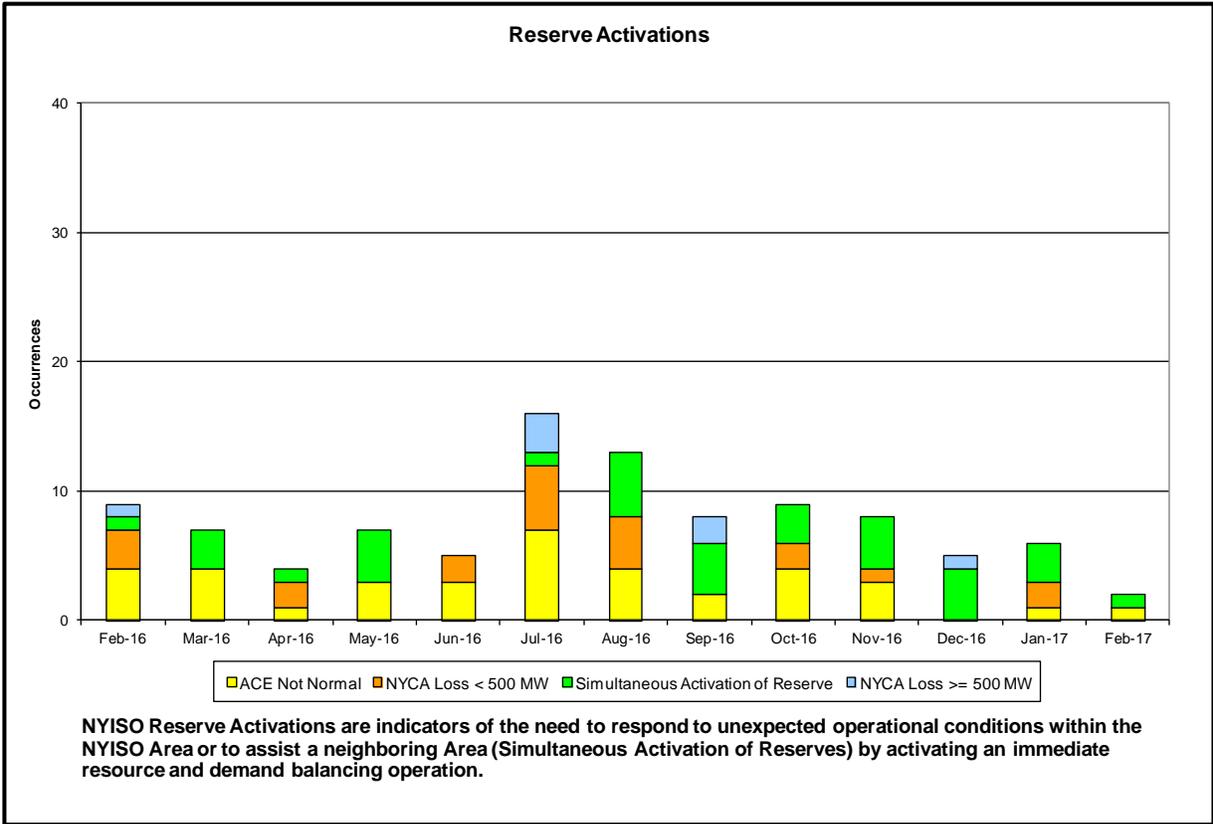
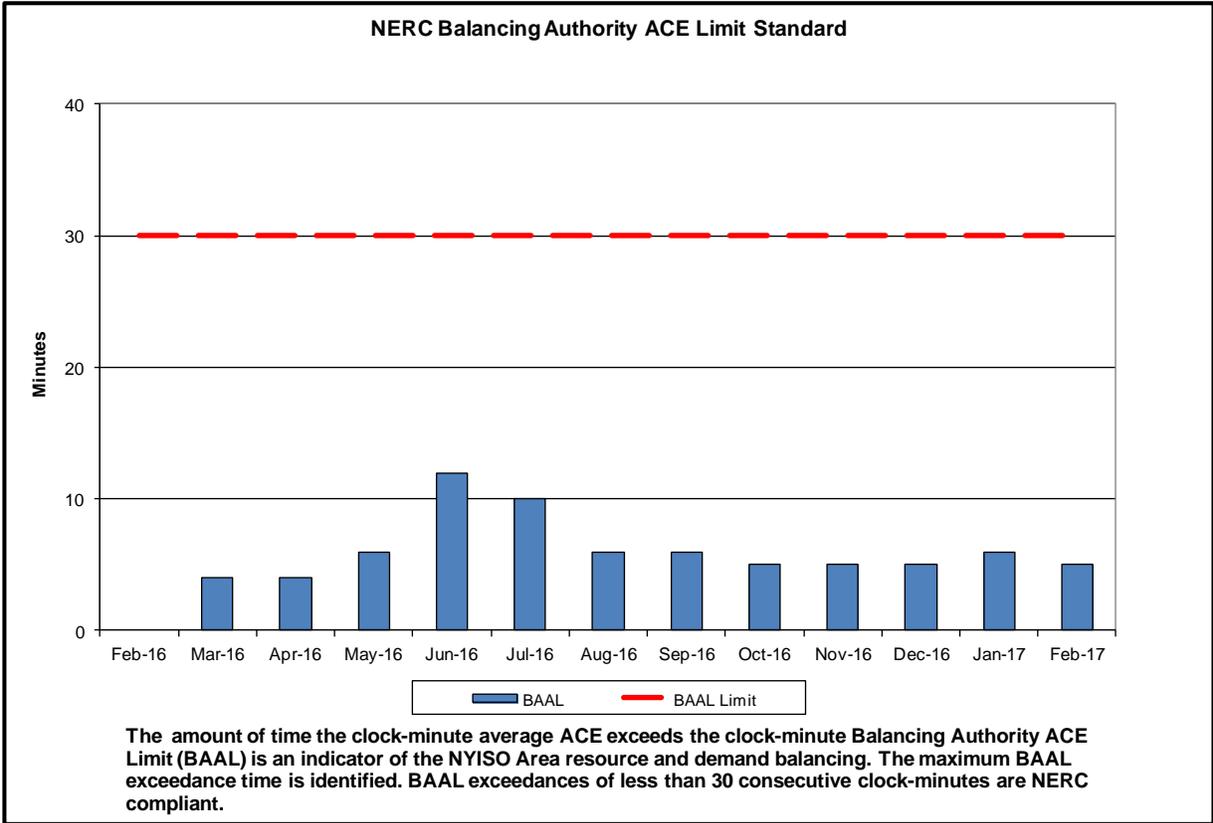
Spot Auction Price Results	NYCA	Lower Hudson Valley Zones	New York City Zone	Long Island Zone
March 2017 Spot Price	\$0.71	\$3.30	\$3.30	\$0.71
February 2017 Spot Price	\$0.54	\$3.47	\$3.47	\$0.54
Delta	\$0.17	(\$0.17)	(\$0.17)	\$0.17

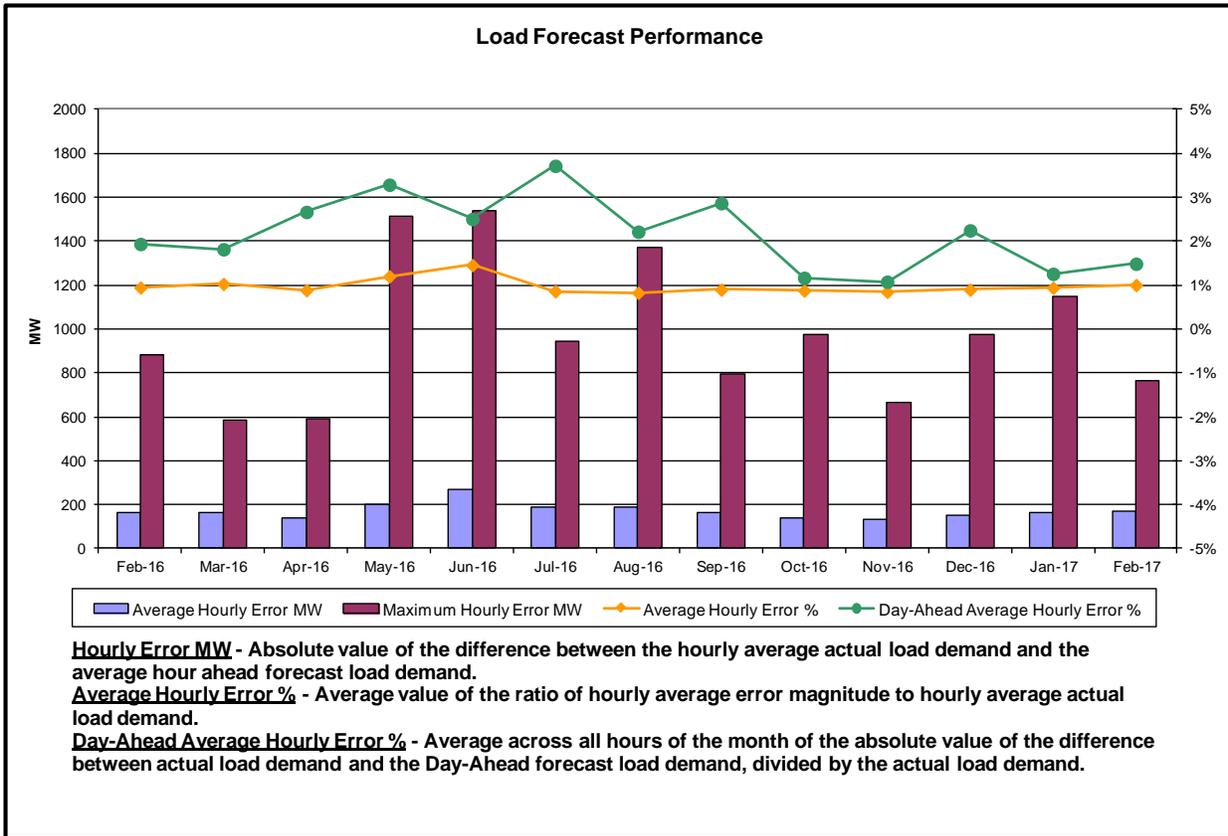
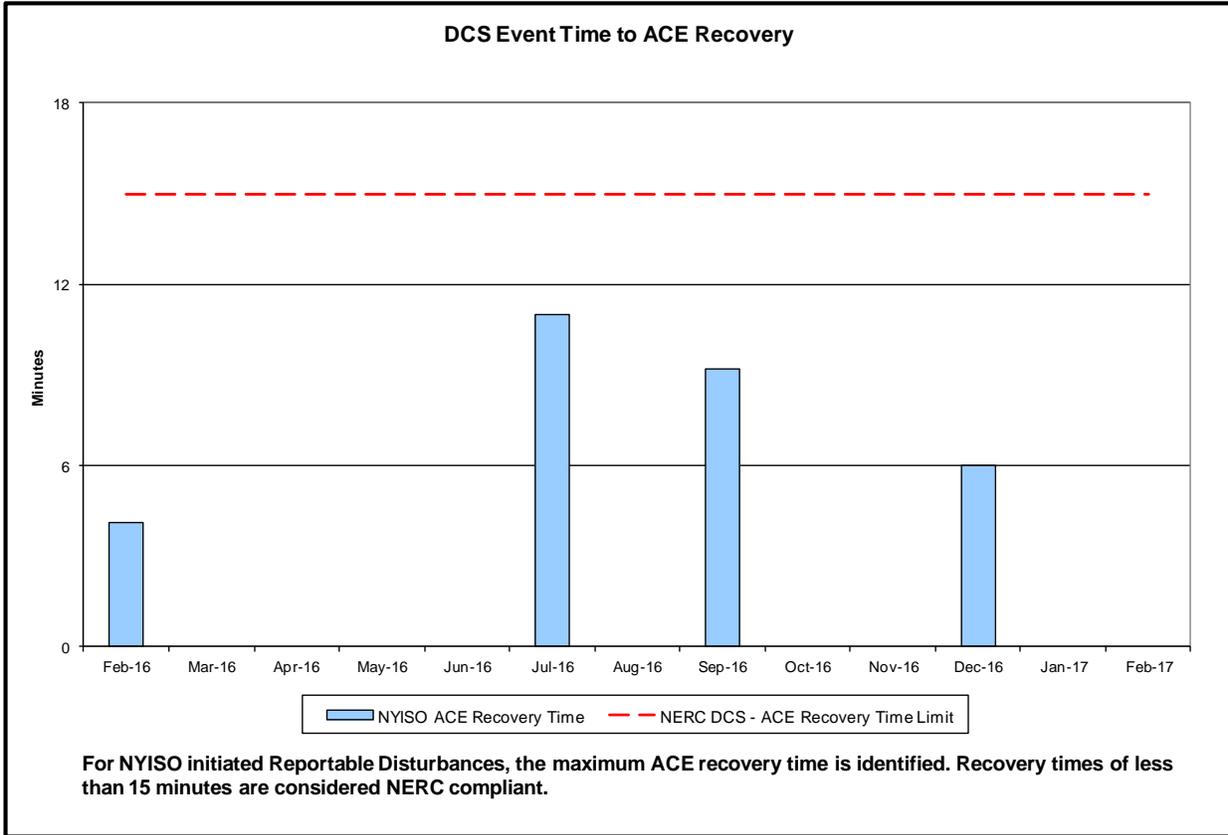
- NYCA Price converged with the LI Price
- LHV Price converged with the NYC Price

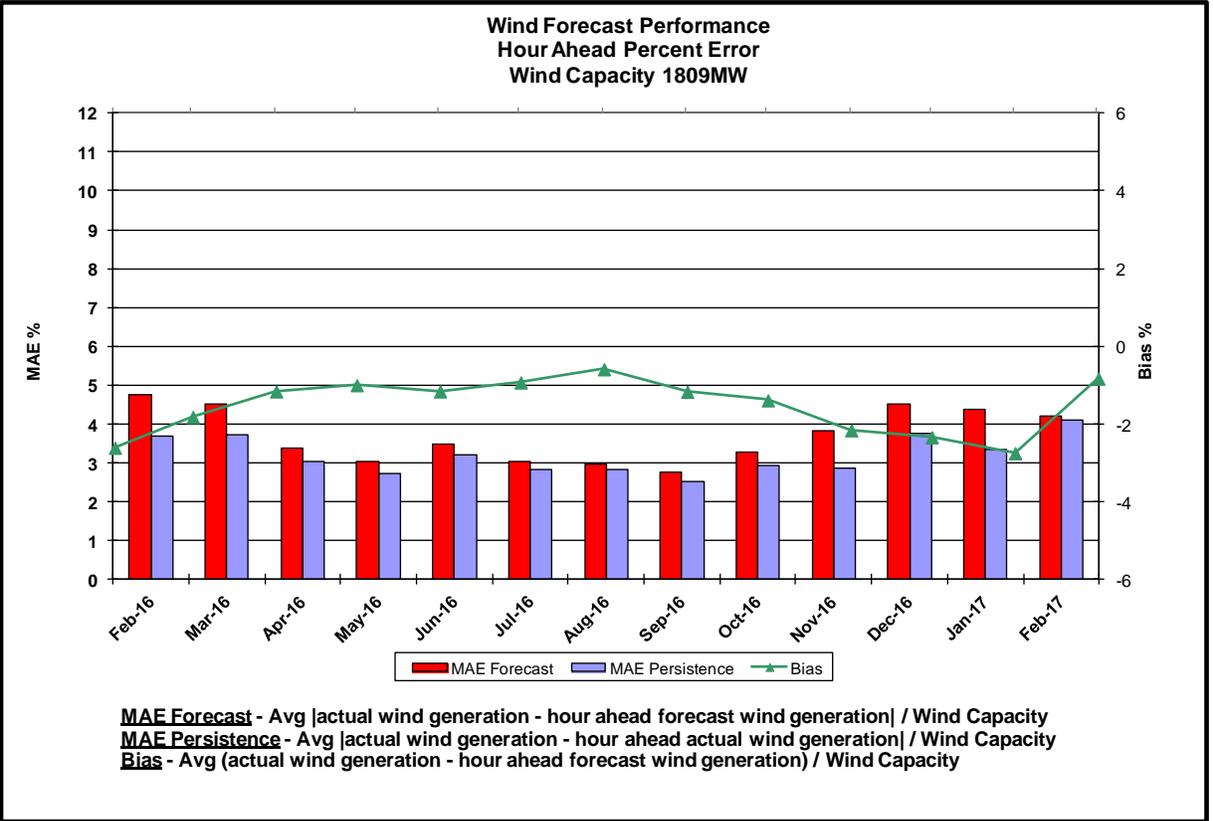
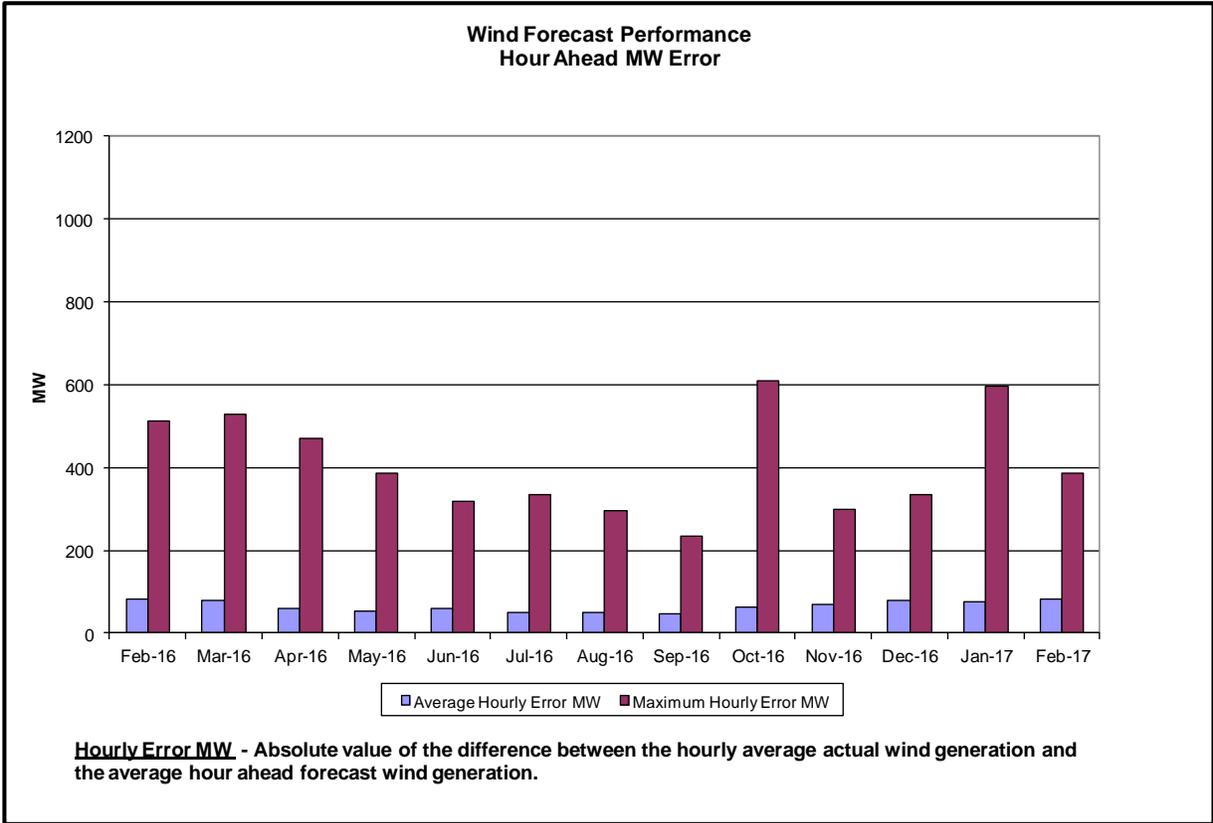
- Reliability Performance Metrics

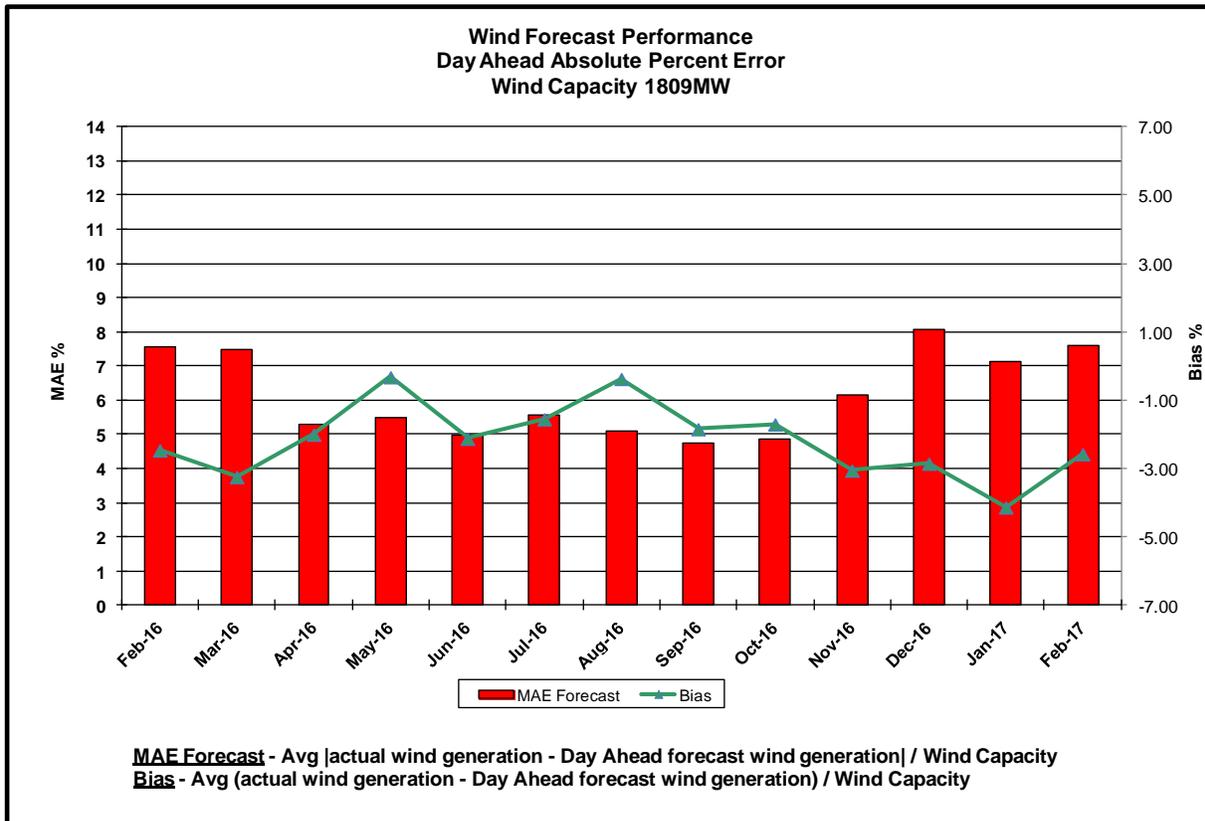
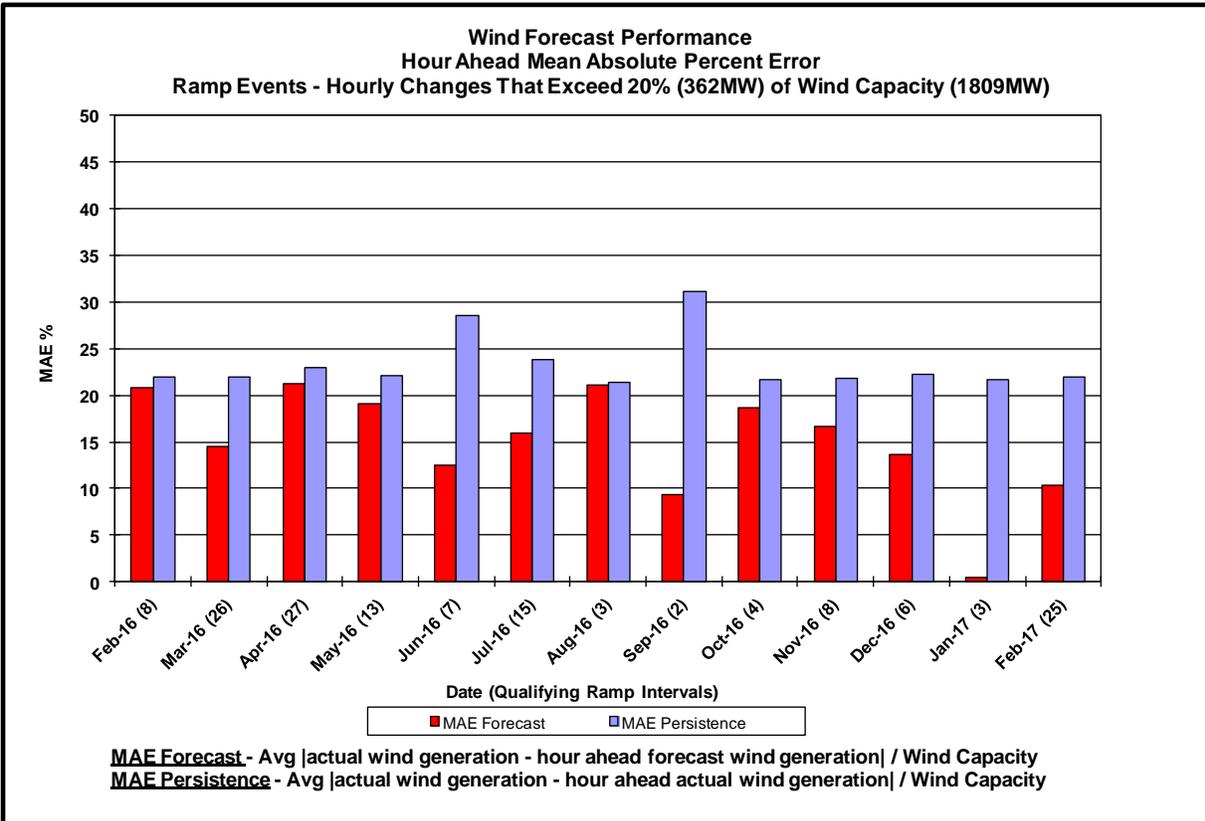


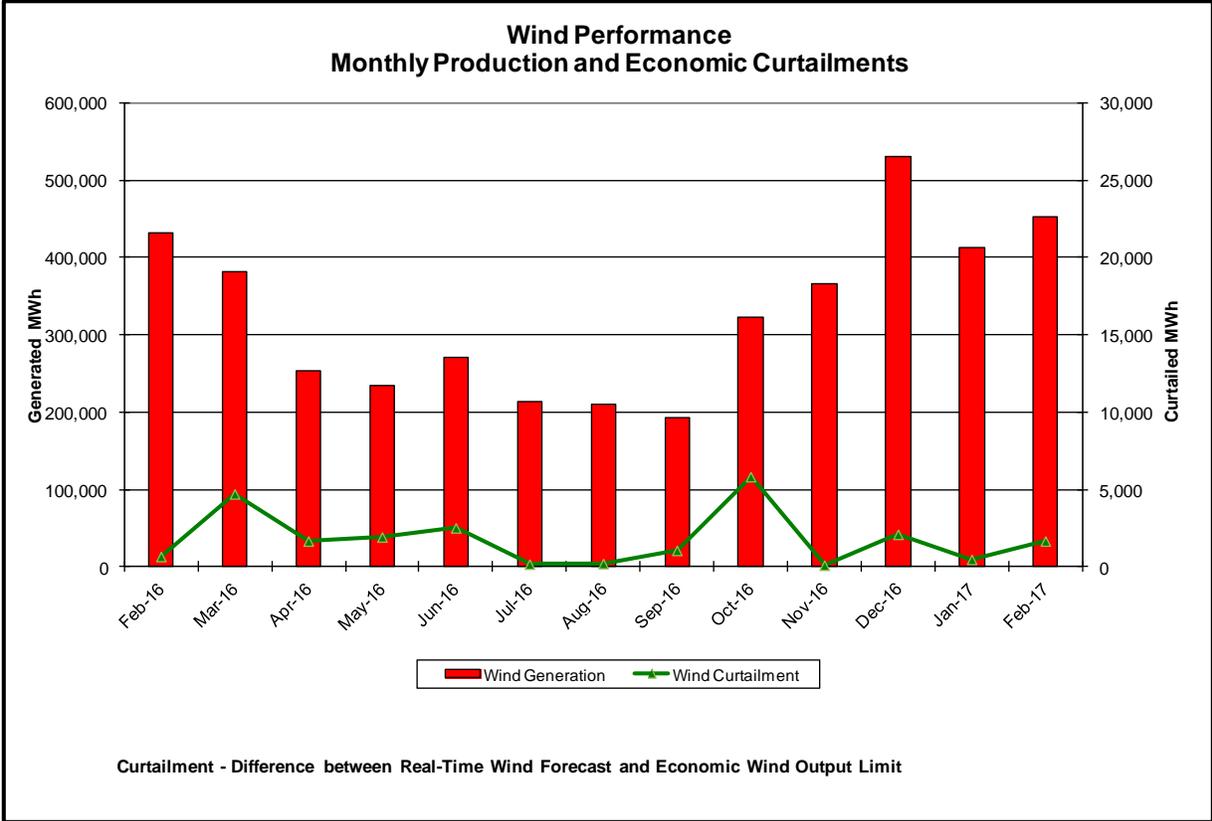


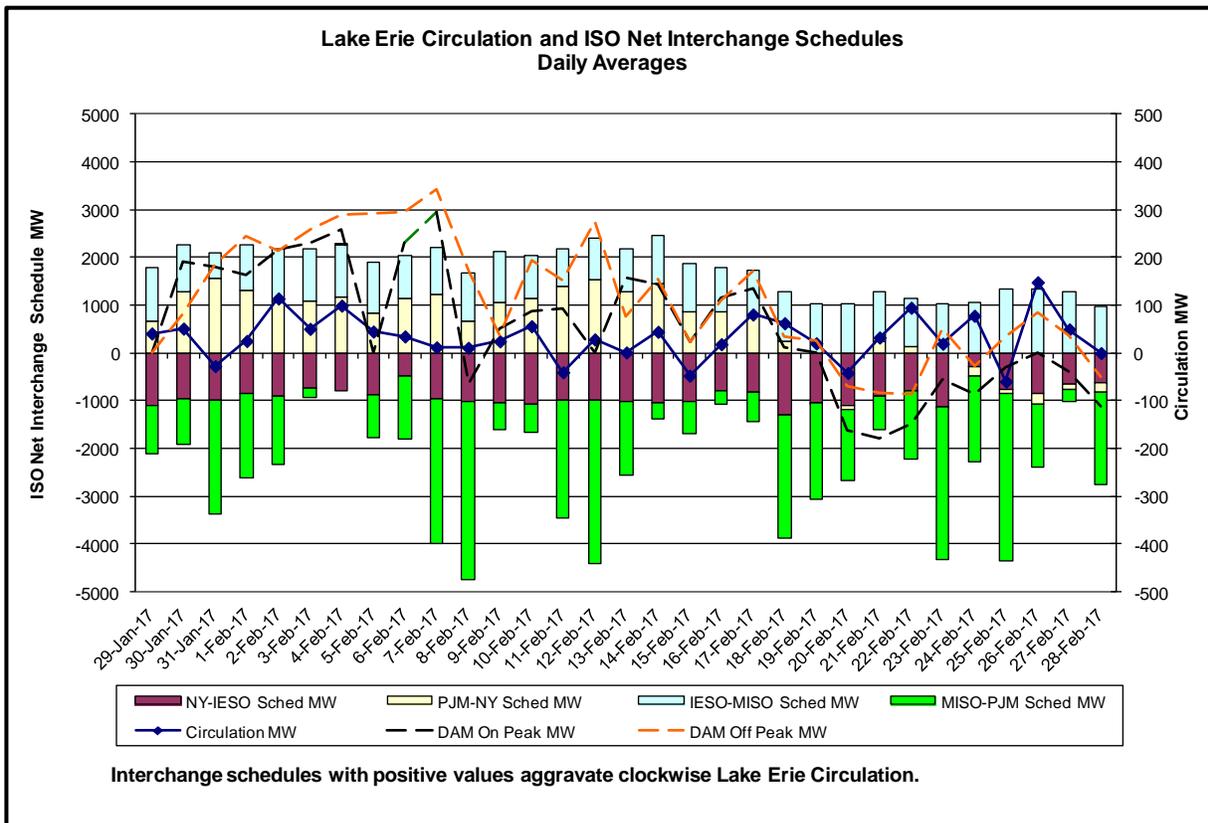
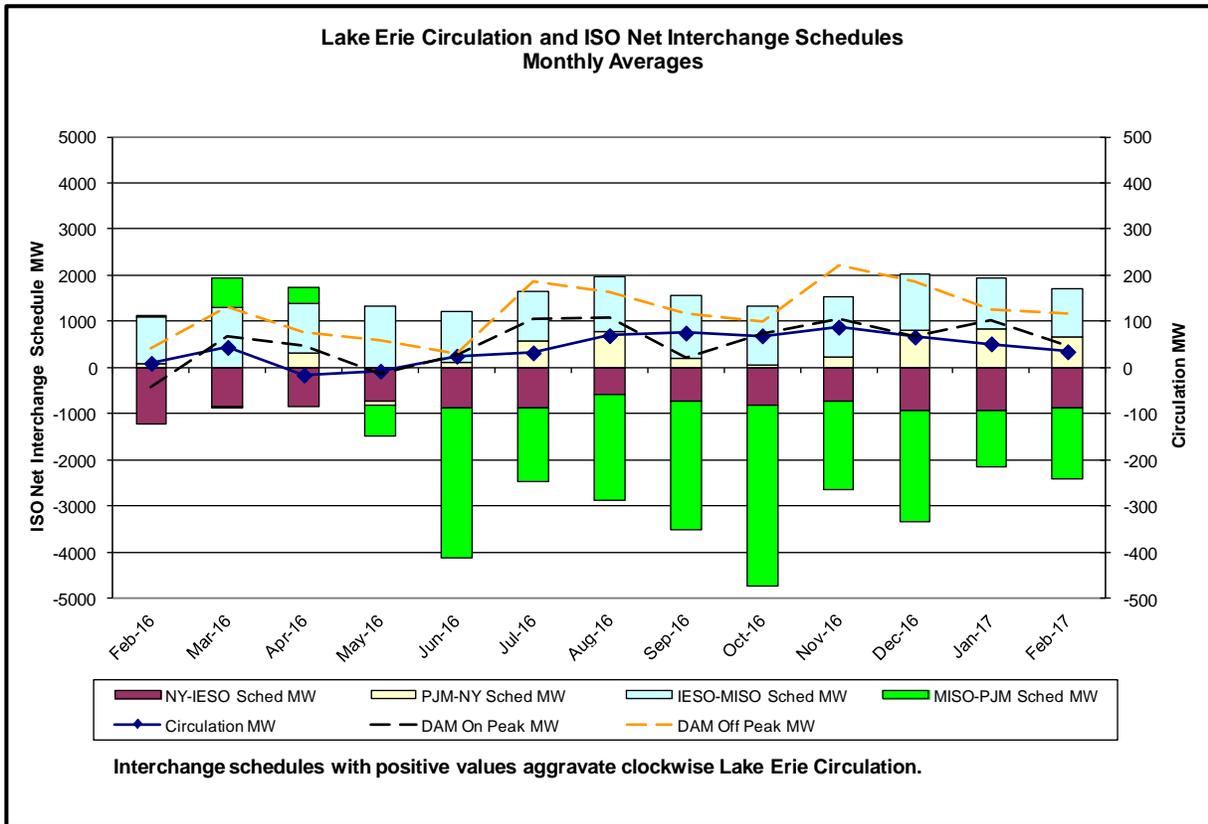




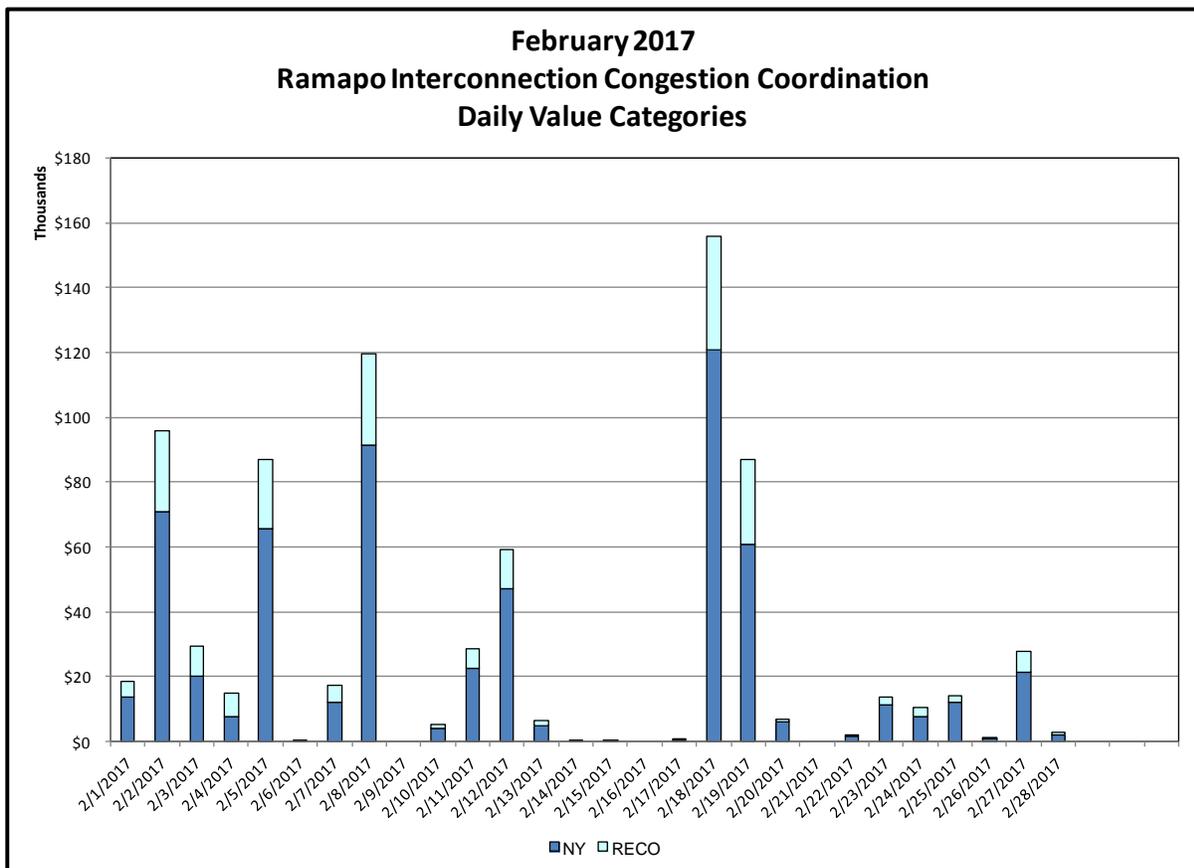
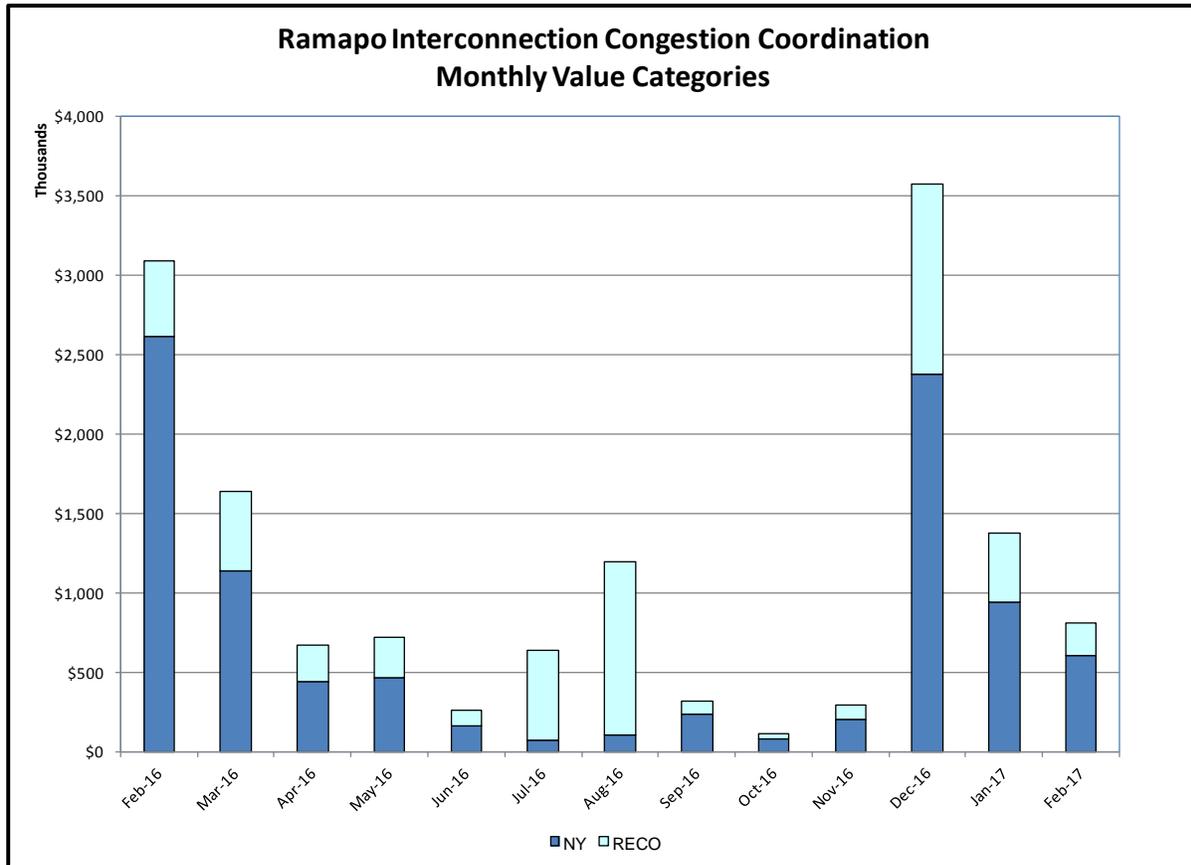






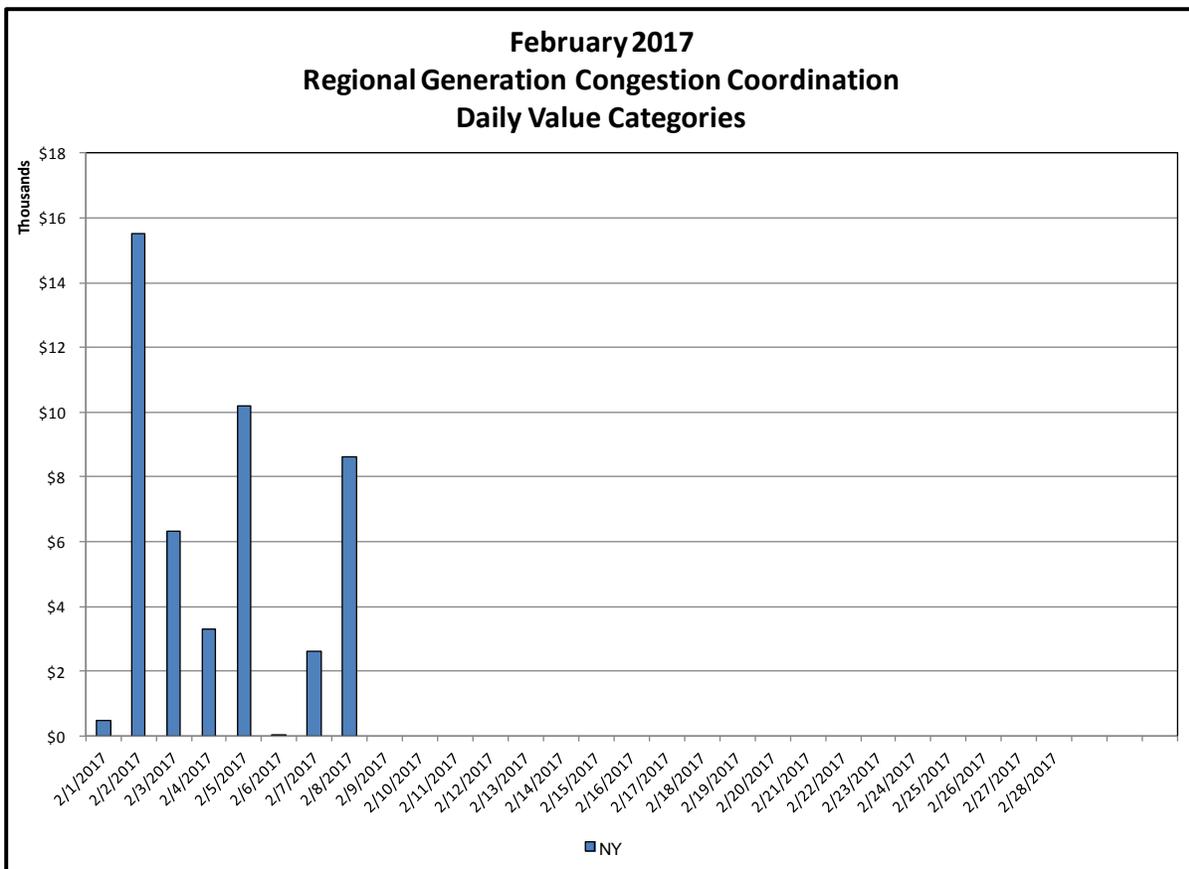
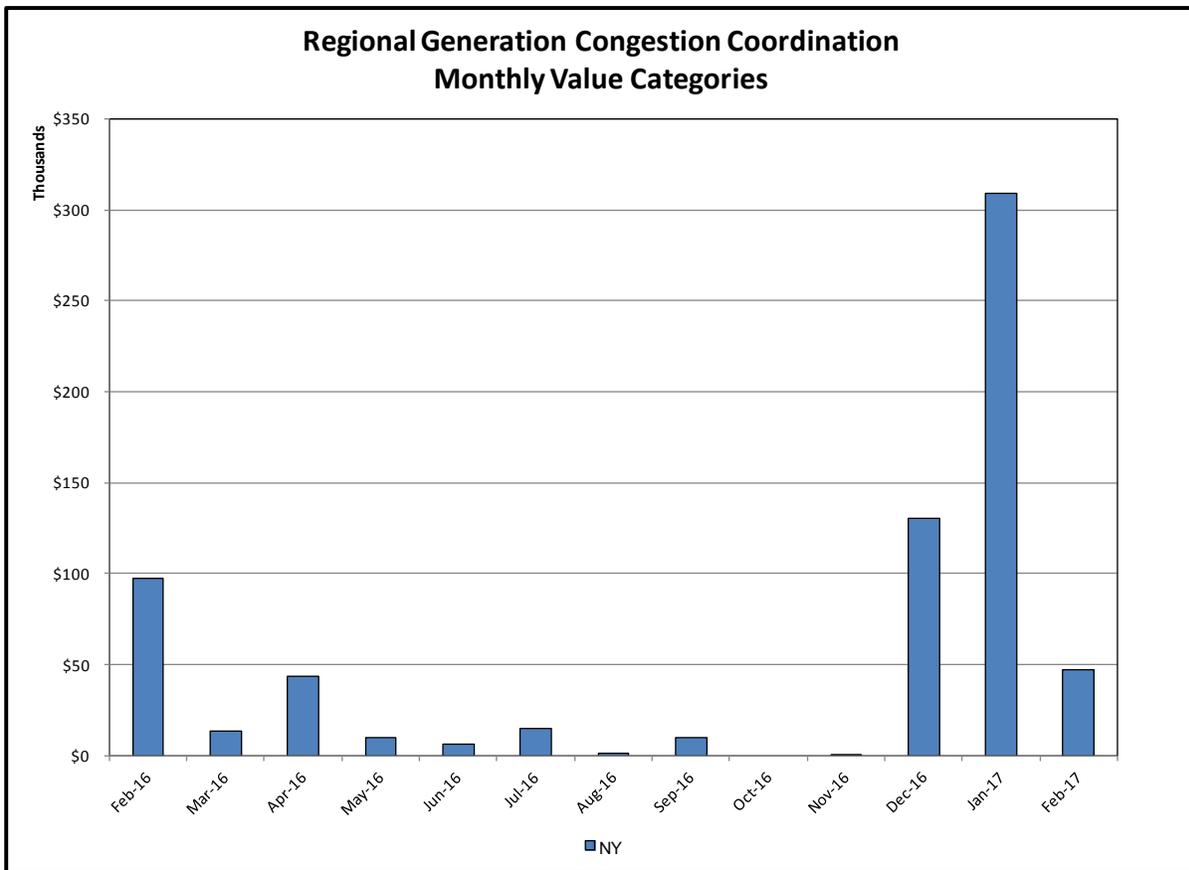


## Broader Regional Market Performance Metrics



**Ramapo Interconnection Congestion Coordination**

<u>Category</u>	<u>Description</u>
NY	Represents the value NY realizes from Market-to-Market Ramapo Coordination. When experiencing congestion, this includes (1) the estimated savings to NY for additional deliveries into NY, plus (2) PJM compensation to NY for additional deliveries into PJM (as compared to the Ramapo Target level, excluding RECO). This is net of any settlements to PJM when they are congested.
RECO	Represents the value of PJM's obligation to deliver 80% of service to RECO load over Ramapo 5018. This includes (1) the estimated reduction in NYCA congestion due to the PJM delivery of RECO over Ramapo 5018, plus (2) PJM compensation to NY for NYCA congestion for the under-delivery or inability to deliver service to RECO load over Ramapo 5018.



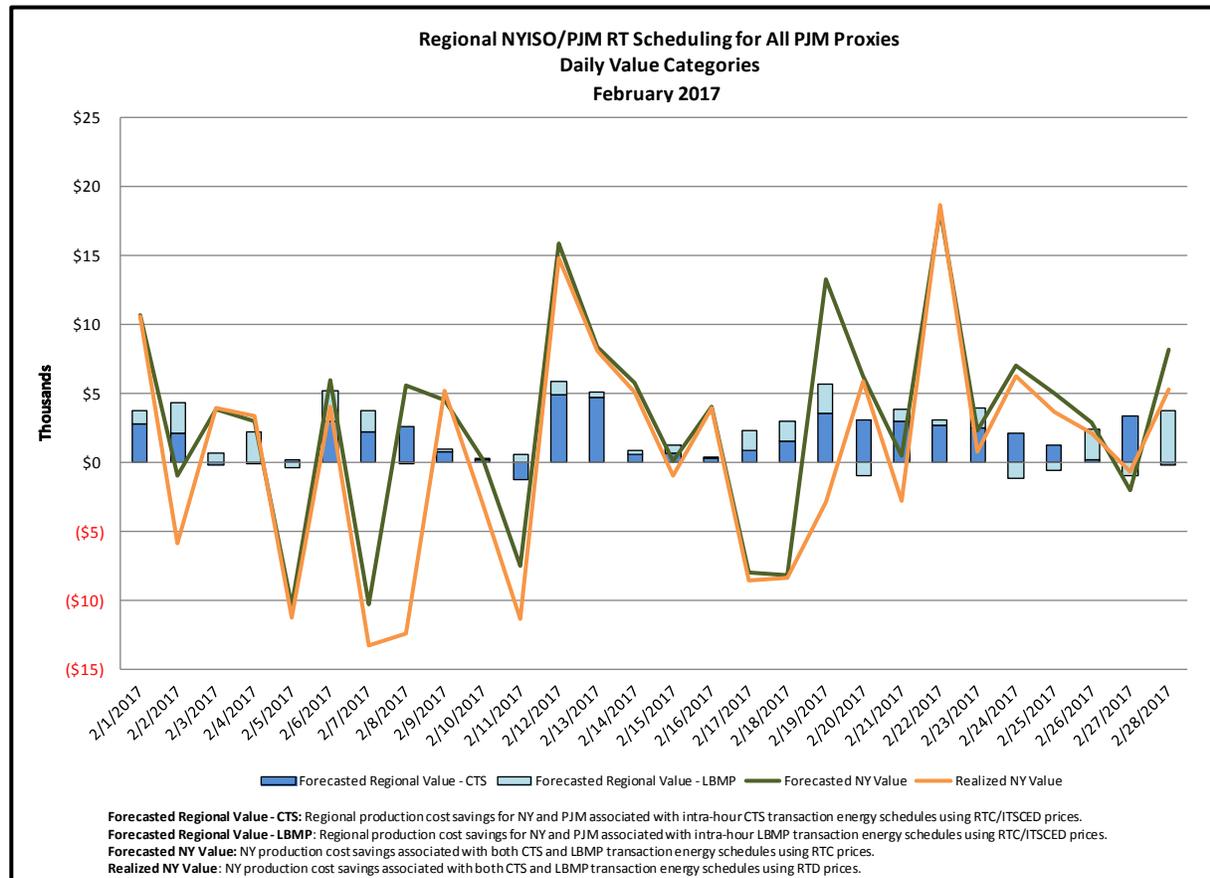
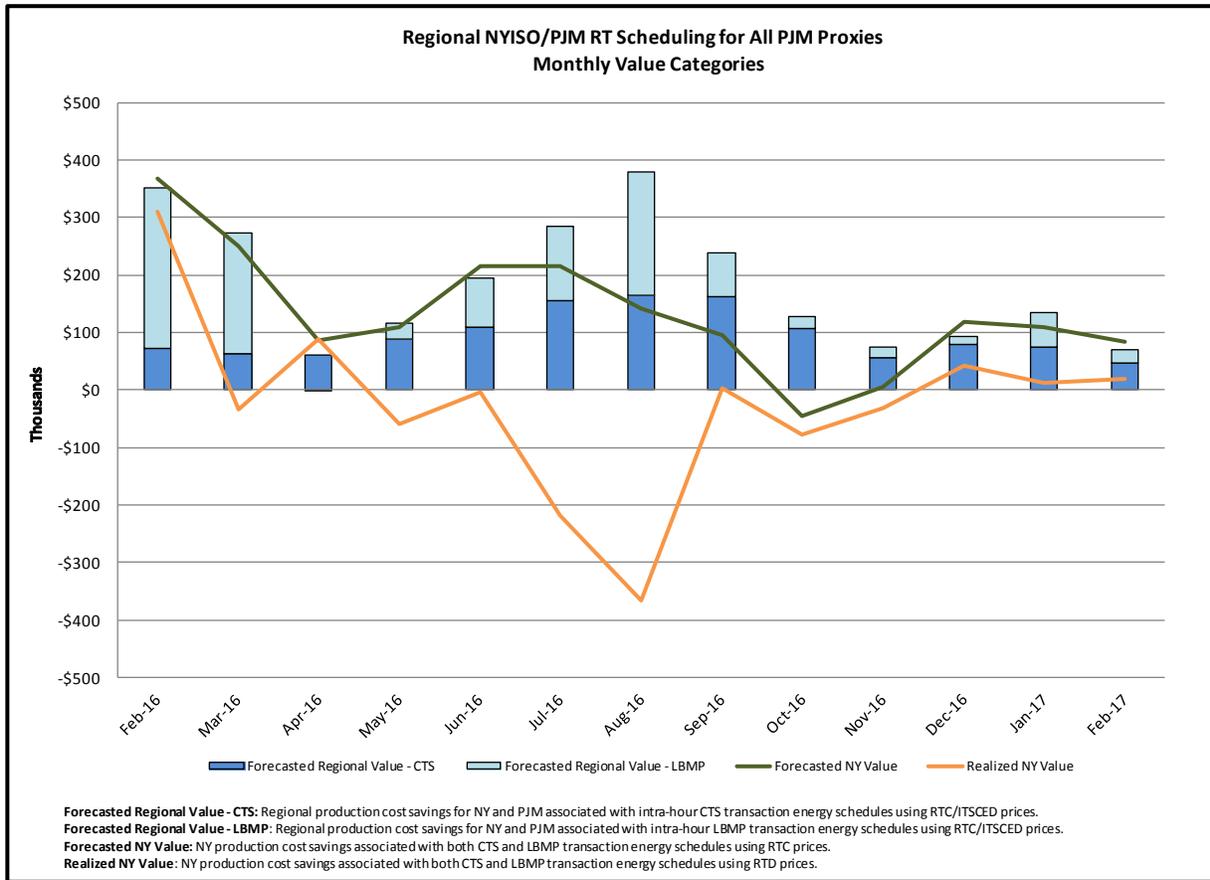
### Regional Generation Congestion Coordination

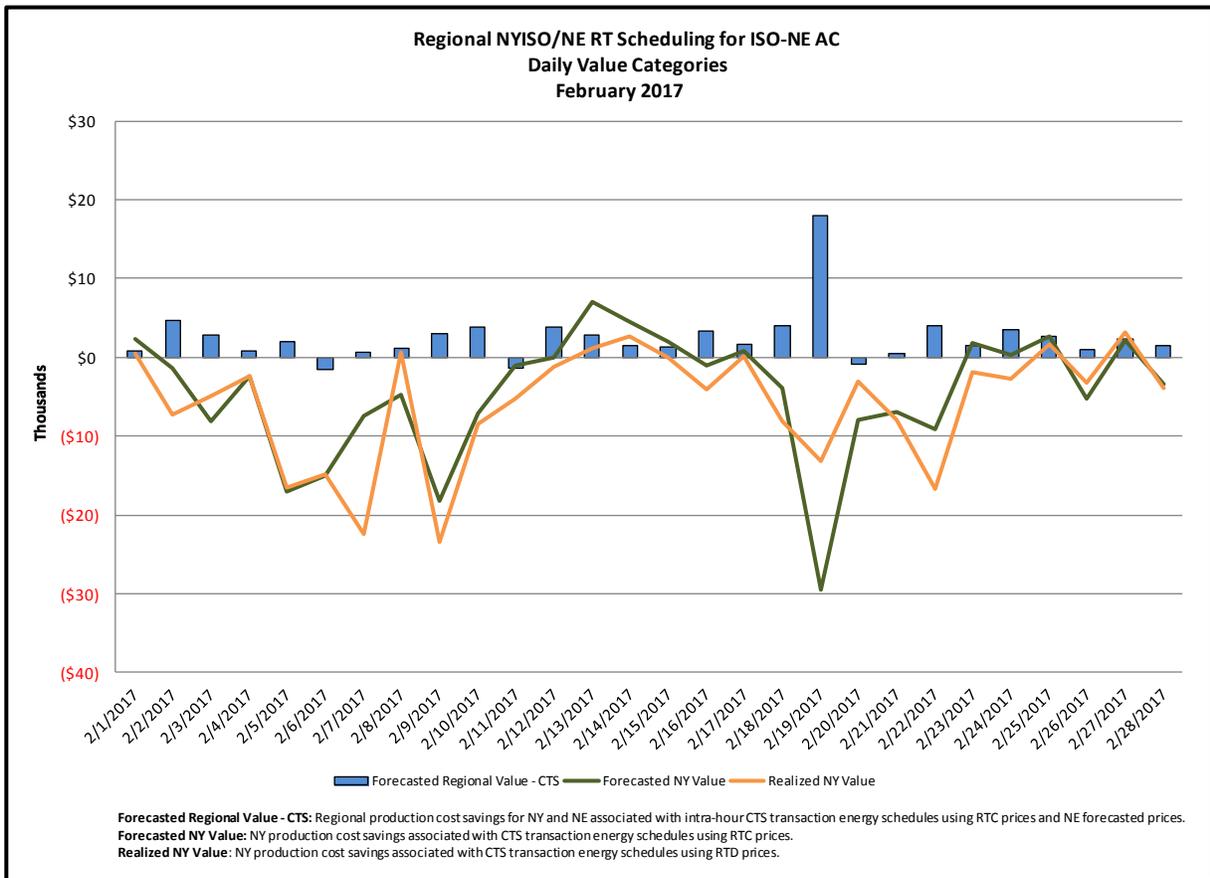
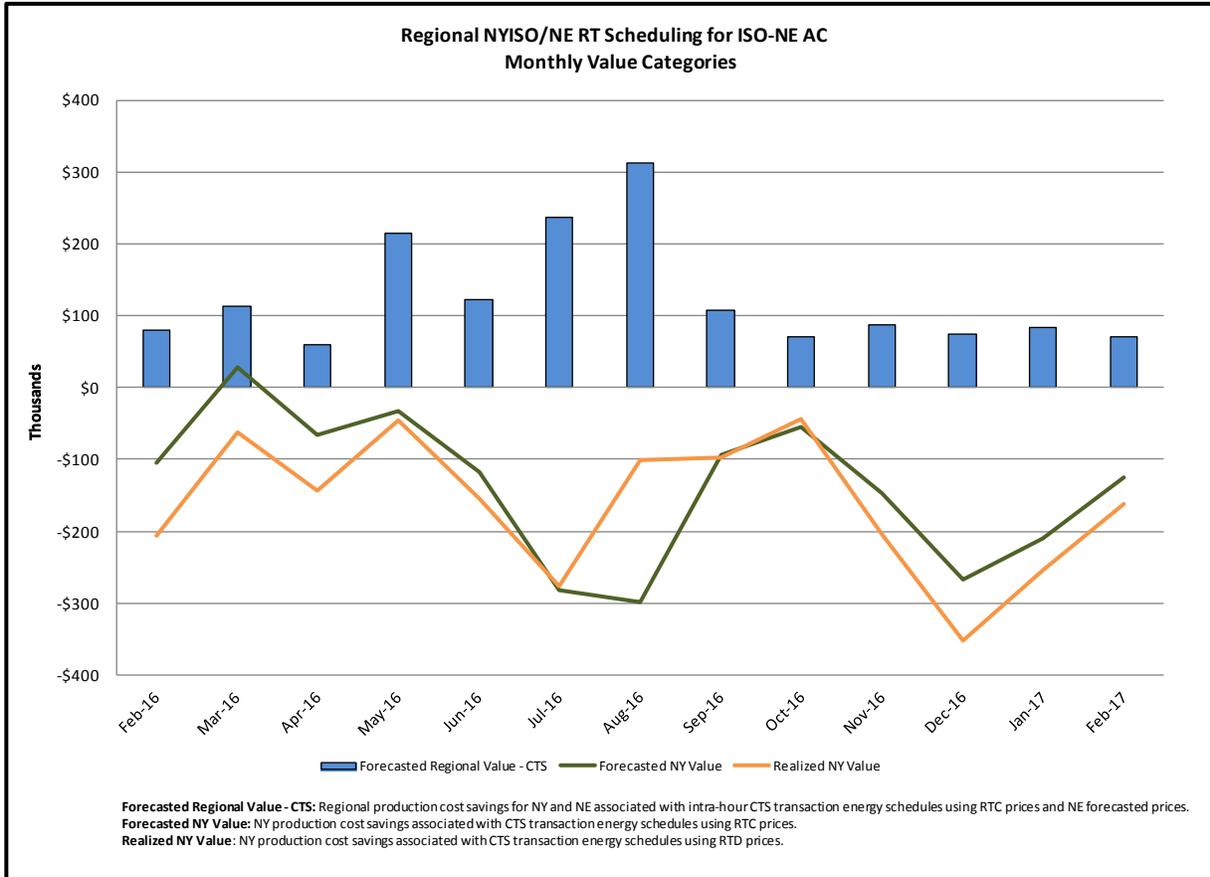
Category

NY

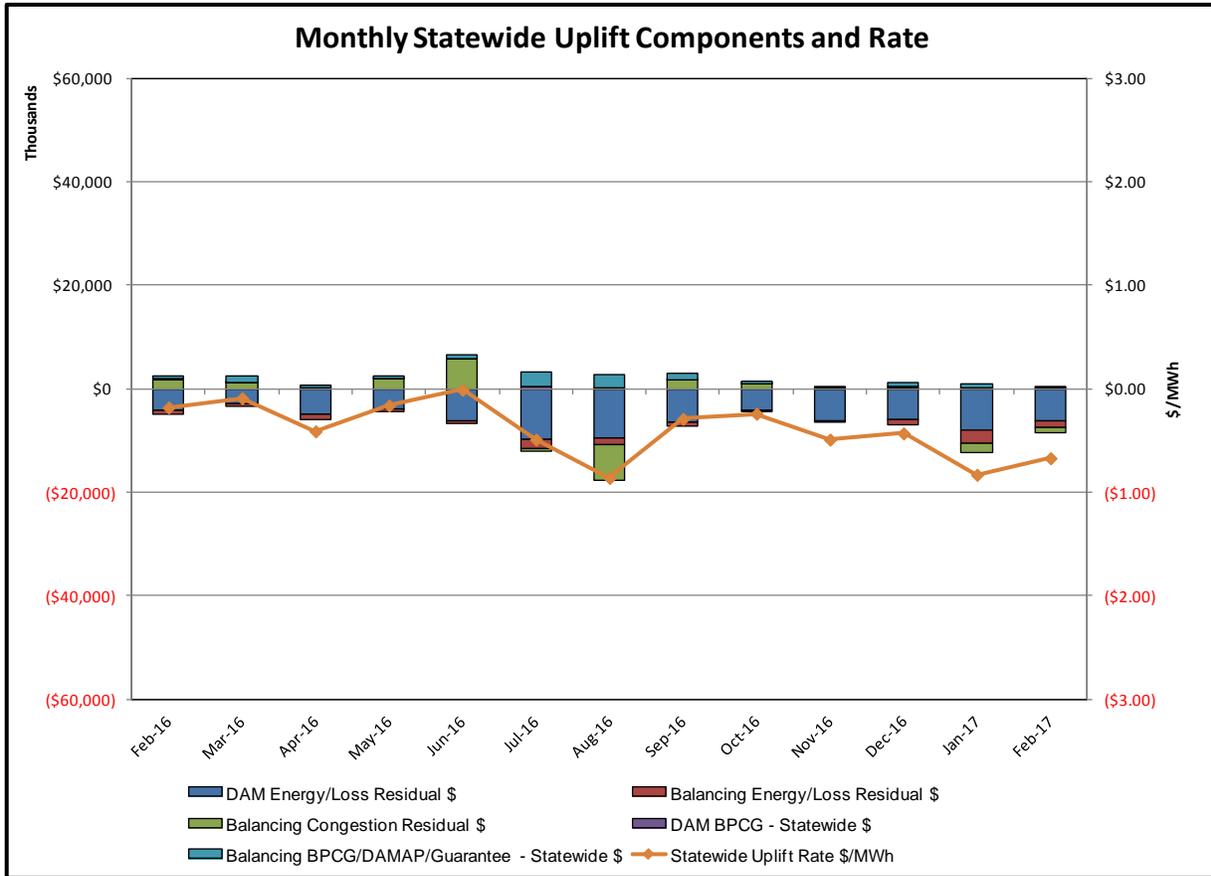
Description

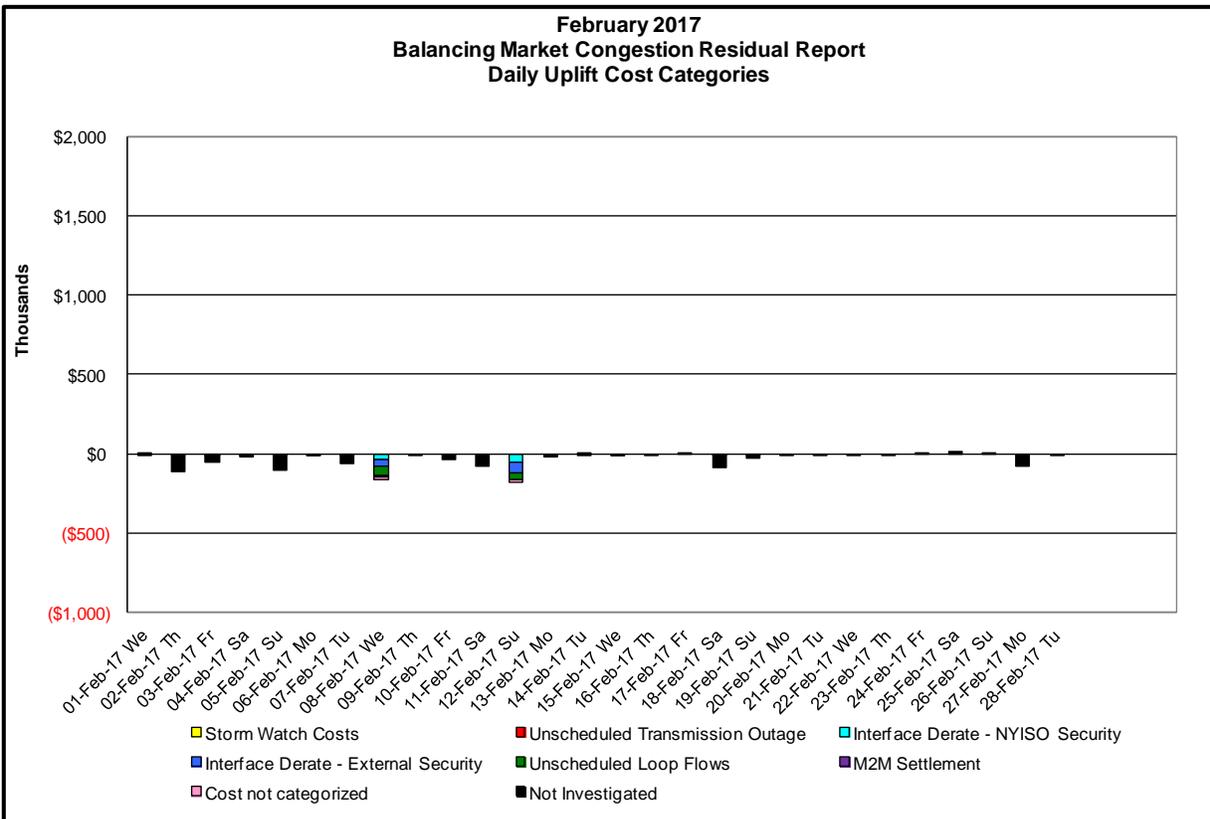
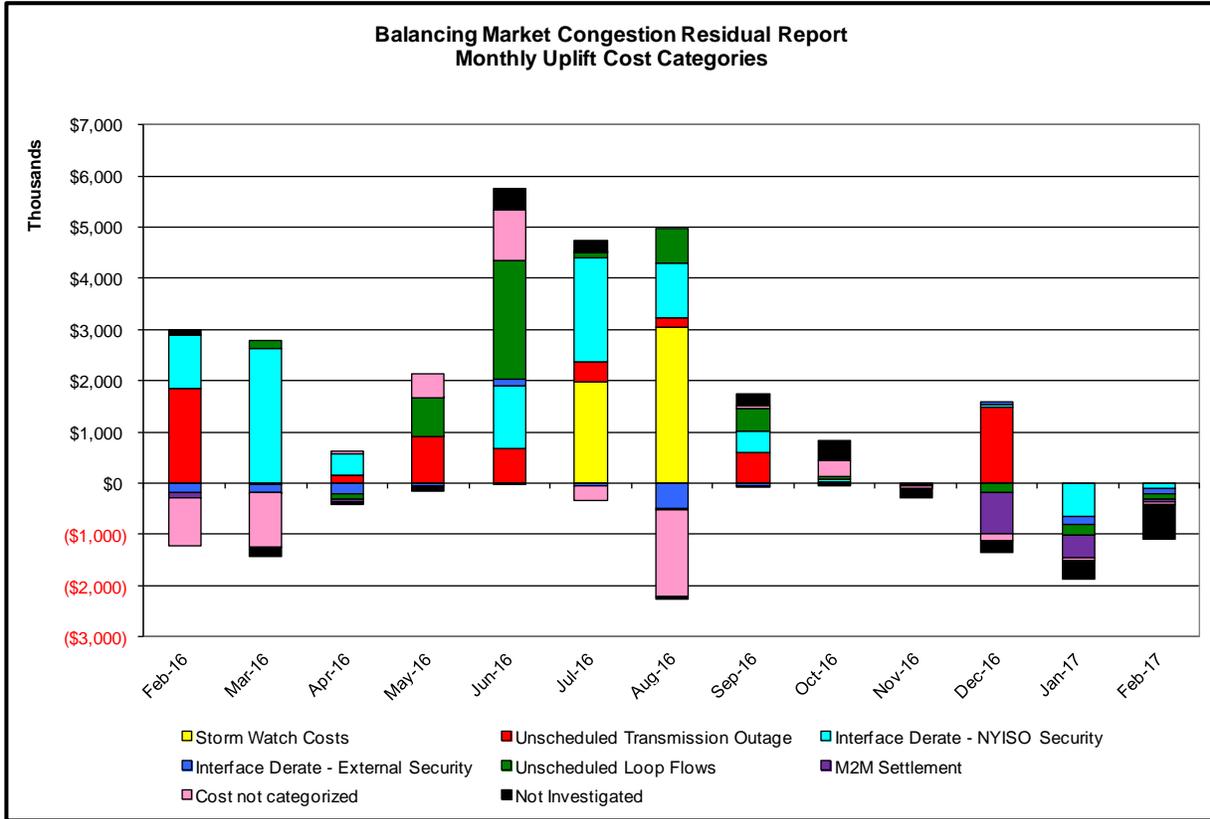
NYISO savings that result from PJM payments to NYISO when PJM's transmission use (PJM's market flow) is greater than PJM's entitlement of the NY transmission system and NYISO is incurring Western or Central NY congestion. Additionally, NYISO savings may result from the more efficient regional utilization of PJM's generation resources to directly address Western or Central NY transmission congestion.





## Market Performance Metrics





Day's investigated in February: 8, 12

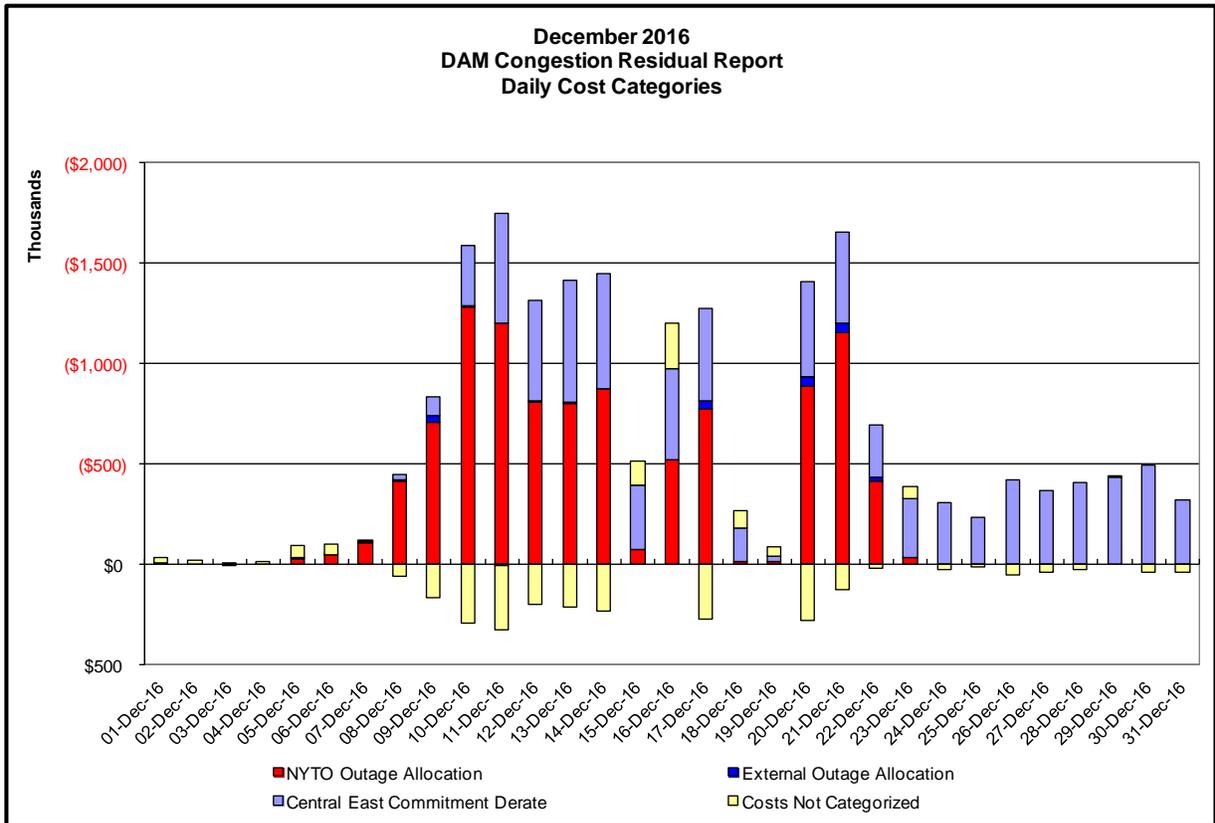
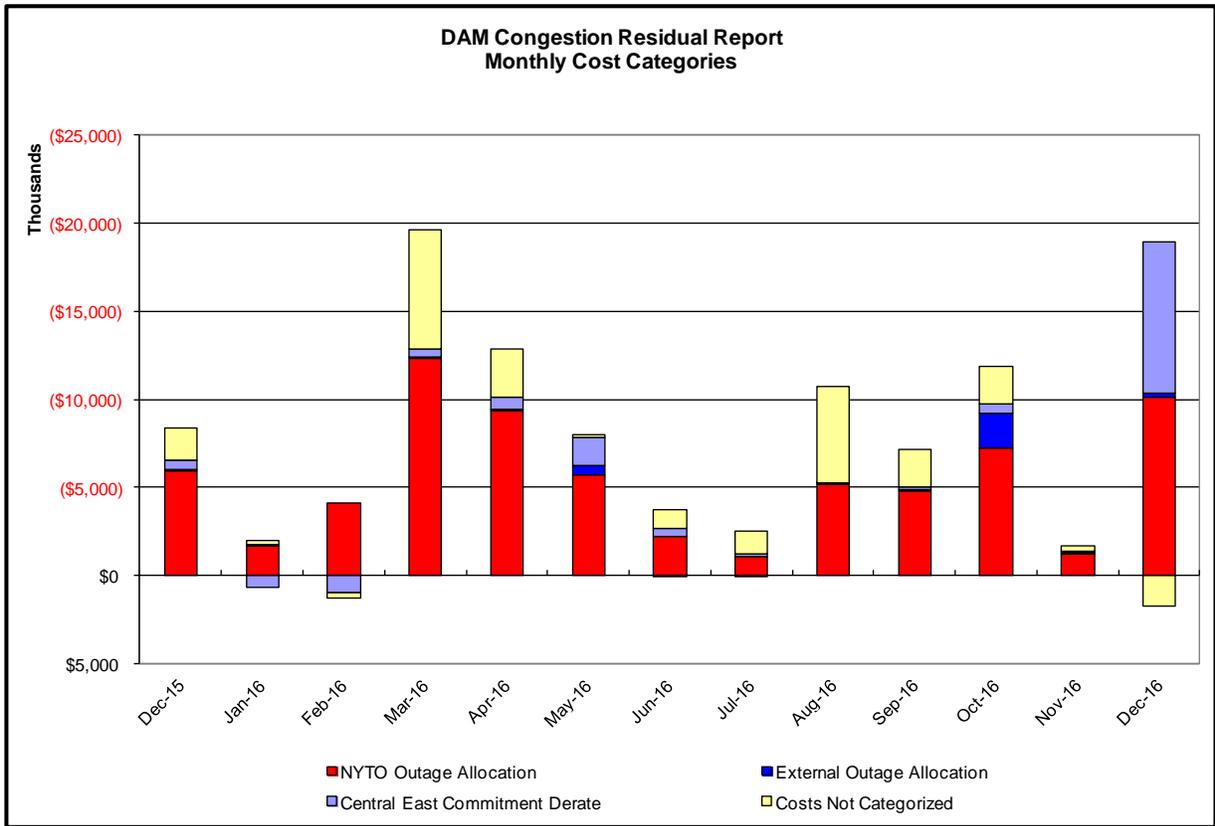
Event	Date (yyyymmdd)	Hours	Description
	2/8/2017	2-4,6,7	Uprate Central East
	2/8/2017	1	NYCA DNI Ramp Limit
	2/8/2017	0-2	NE_AC DNI Ramp Limit
	2/8/2017	6,7,9	NE_AC - NY Scheduling Limit
	2/8/2017	0-4,6,7,9	Lake Erie Circulation, DAM-RTM exceeds +/-125MW; Central East
	2/12/2017	3,4,10-12,15-19	Uprate Central East
	2/12/2017	1-4,11,12,15-19	NE_AC - NY Scheduling Limit
	2/12/2017	11,12,15,16	PJM_AC-NY Scheduling Limit
	2/12/2017	3,4,11,15-19	Lake Erie Circulation, DAM-RTM exceeds +/-125MW; Central East

**Real-Time Balancing Market Congestion Residual (Uplift Cost) Categories**

<u>Category</u>	<u>Cost Assignment</u>	<u>Events Types</u>	<u>Event Examples</u>
Storm Watch	Zone J	Thunderstorm Alert (TSA)	TSA Activations
Unscheduled Transmission Outage	Market-wide	Reduction in DAM to RTM transfers related to unscheduled transmission outage	Forced Line Outage, Unit AVR Outages
Interface Derate - NYISO Security	Market-wide	Reduction in DAM to RTM transfers not related to transmission outage	Interface Derates due to RTM voltages
Interface Derate - External Security	Market-wide	Reduction in DAM to RTM transfers related to External Control Area Security Events	TLR Events, External Transaction Curtailments
Unscheduled Loop Flows	Market-wide	Changes in DAM to RTM unscheduled loop flows impacting NYISO Interface transmission constraints	DAM to RTM Lake Erie Loop Flows exceeding +/- 125 MW
M2M Settlement	Market-wide	Settlement result inclusive of coordinated redispatch and Ramapo flowgates	

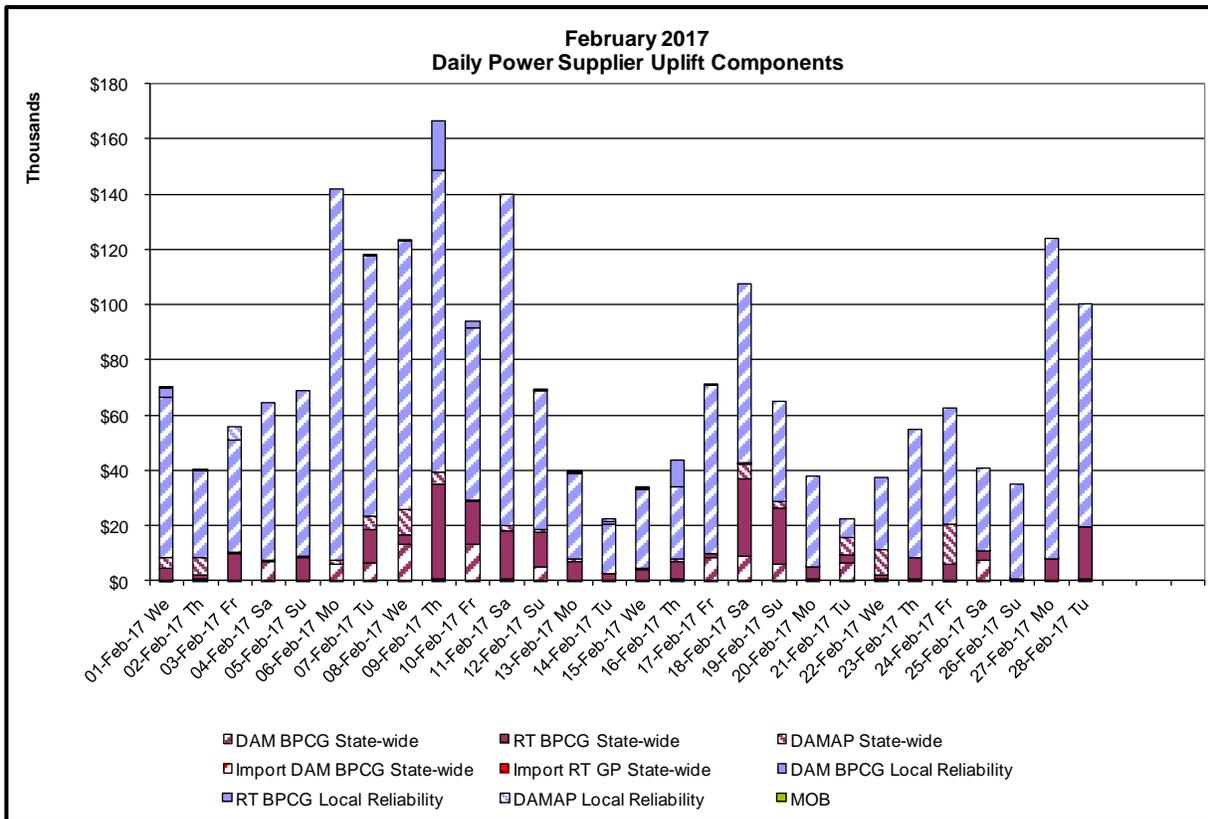
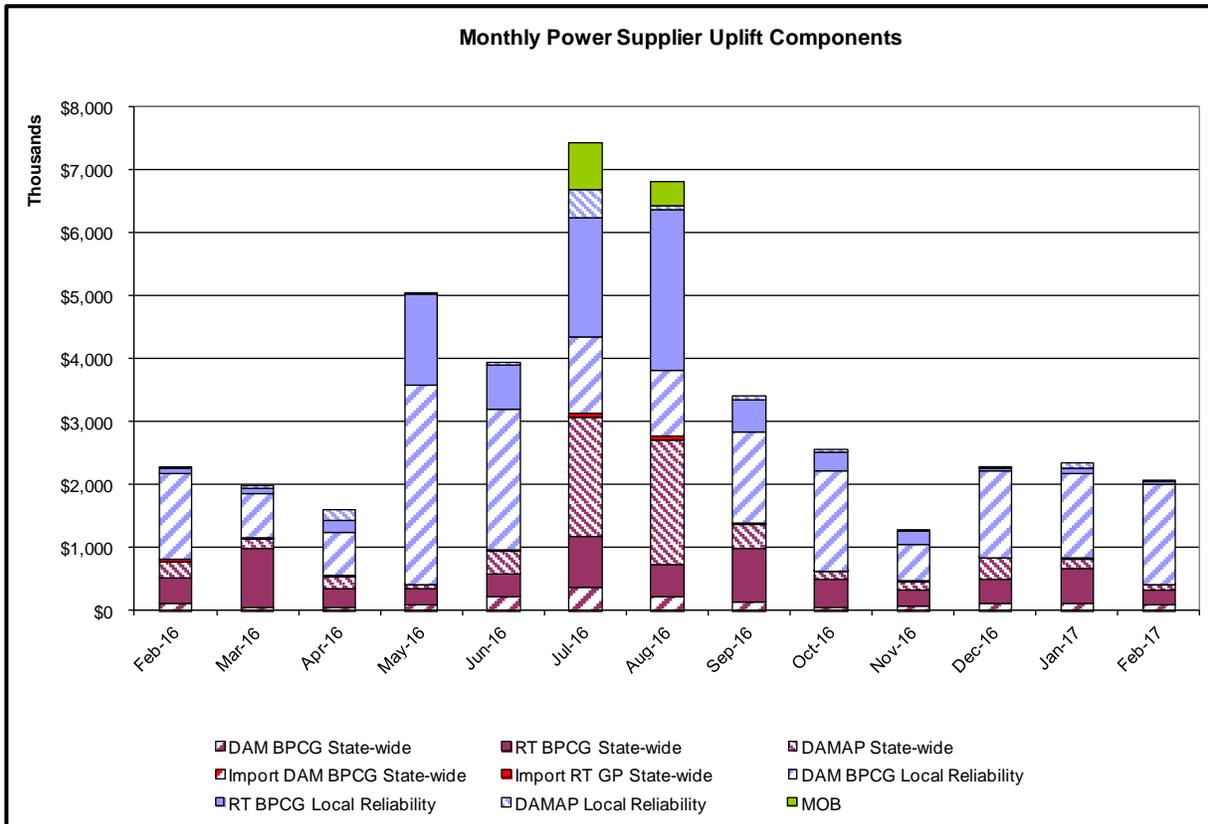
**Monthly Balancing Market Congestion Report Assumptions/Notes**

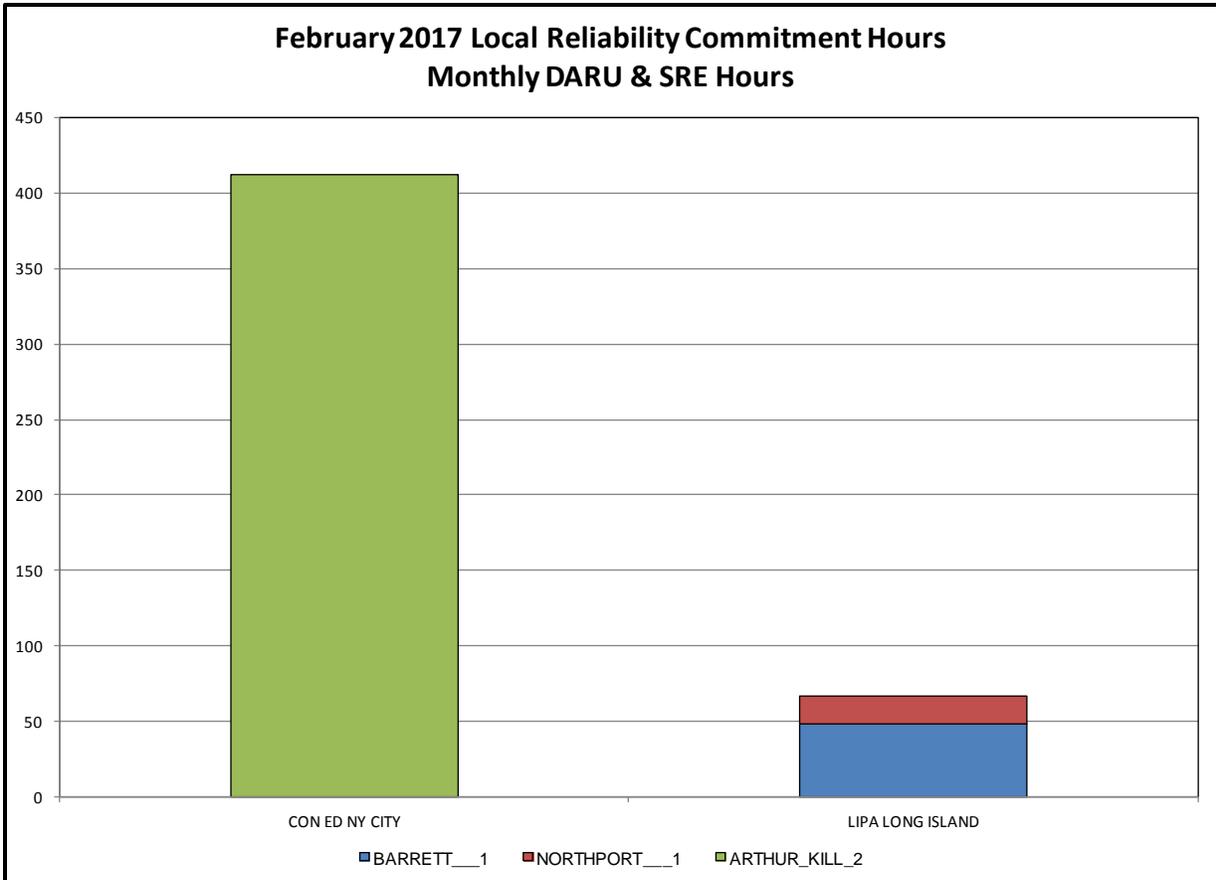
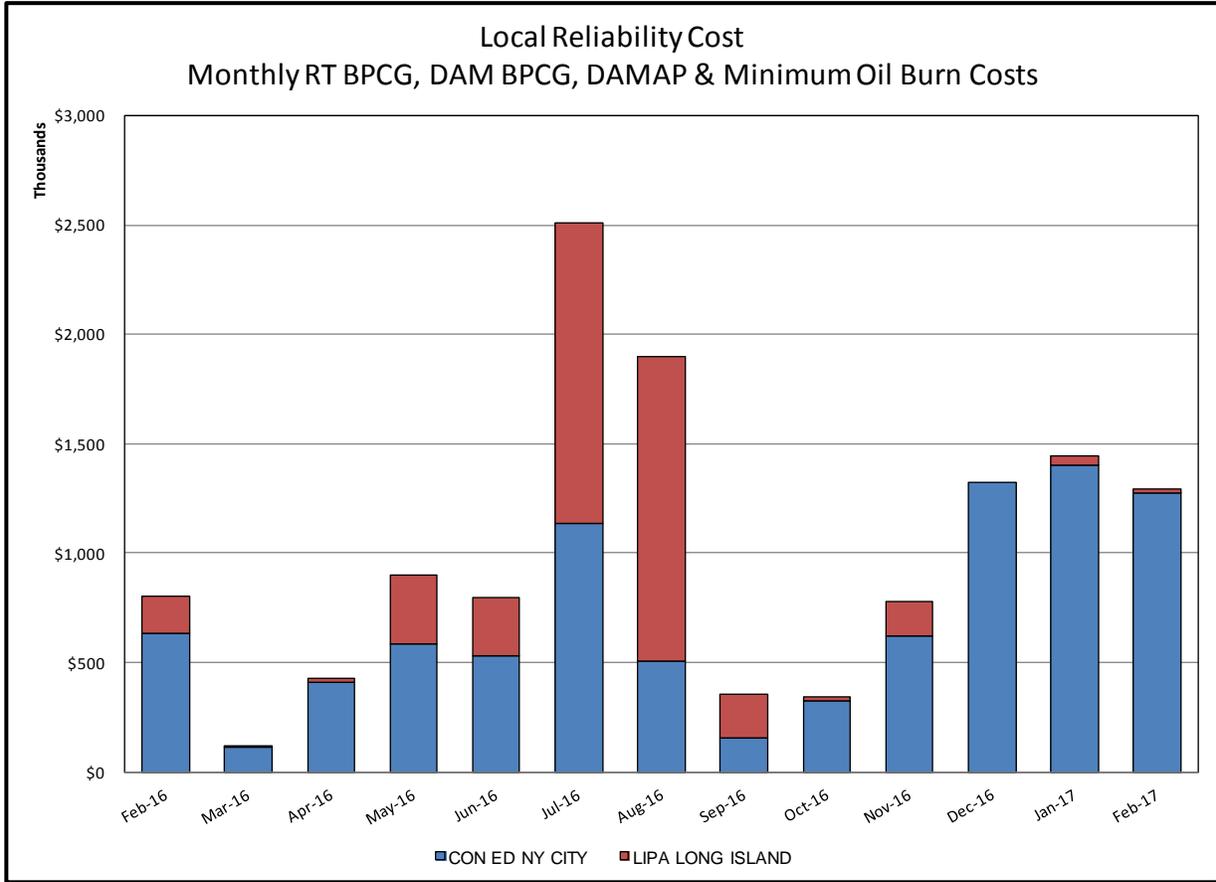
- 1) Storm Watch Costs are identified as daily total uplift costs
- 2) Days with a value of BMCR less M2M Settlement of \$100K/HR, shortfall of \$200K/Day or more, or surplus of \$100K/Day or more are investigated.
- 3) Uplift costs associated with multiple event types are apportioned equally by hour

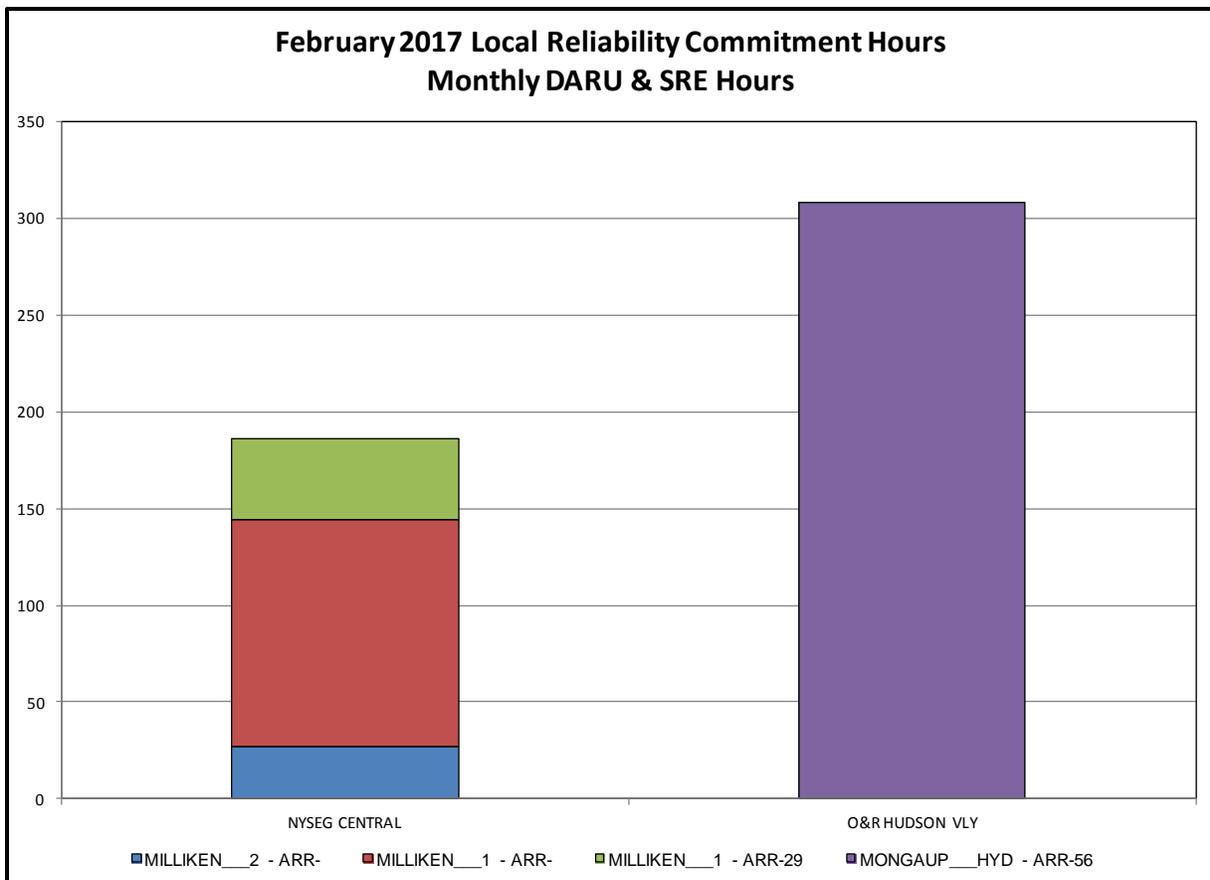
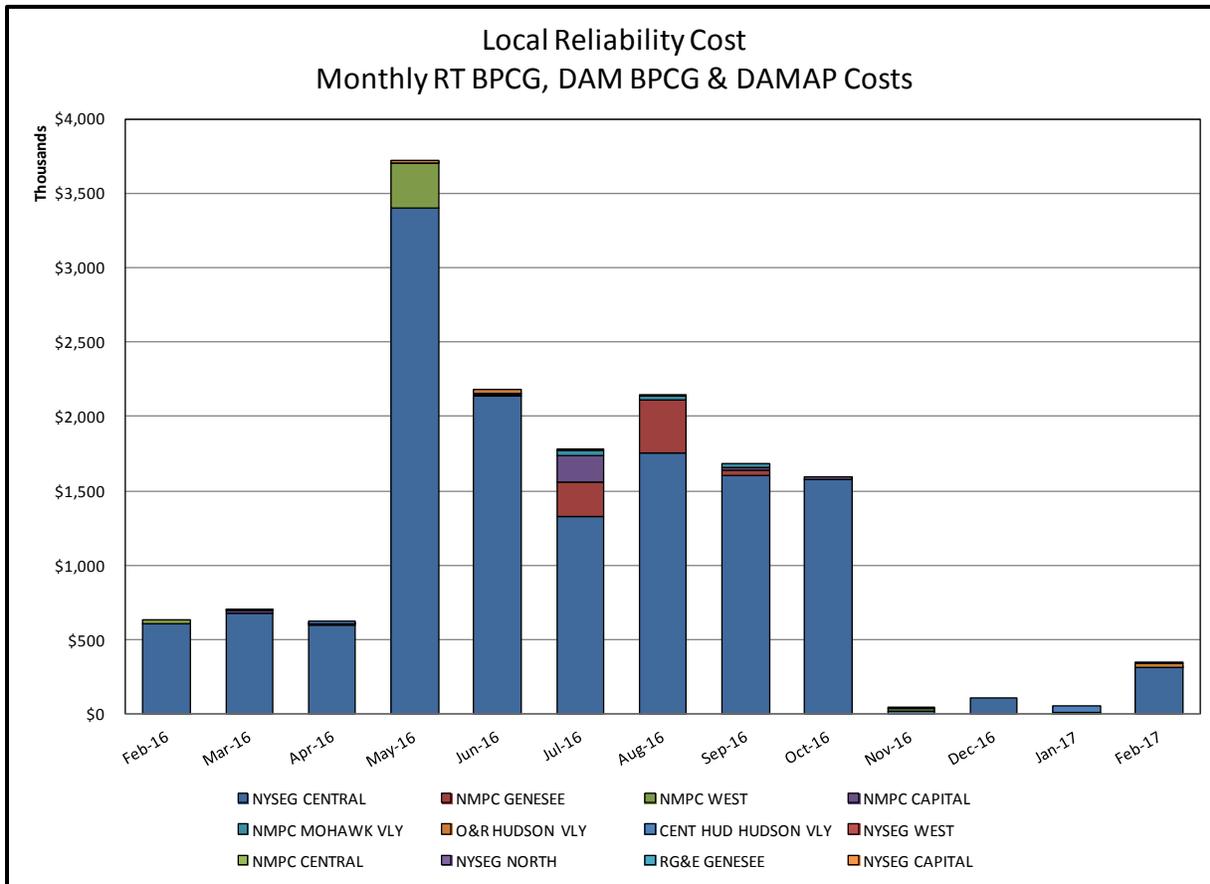


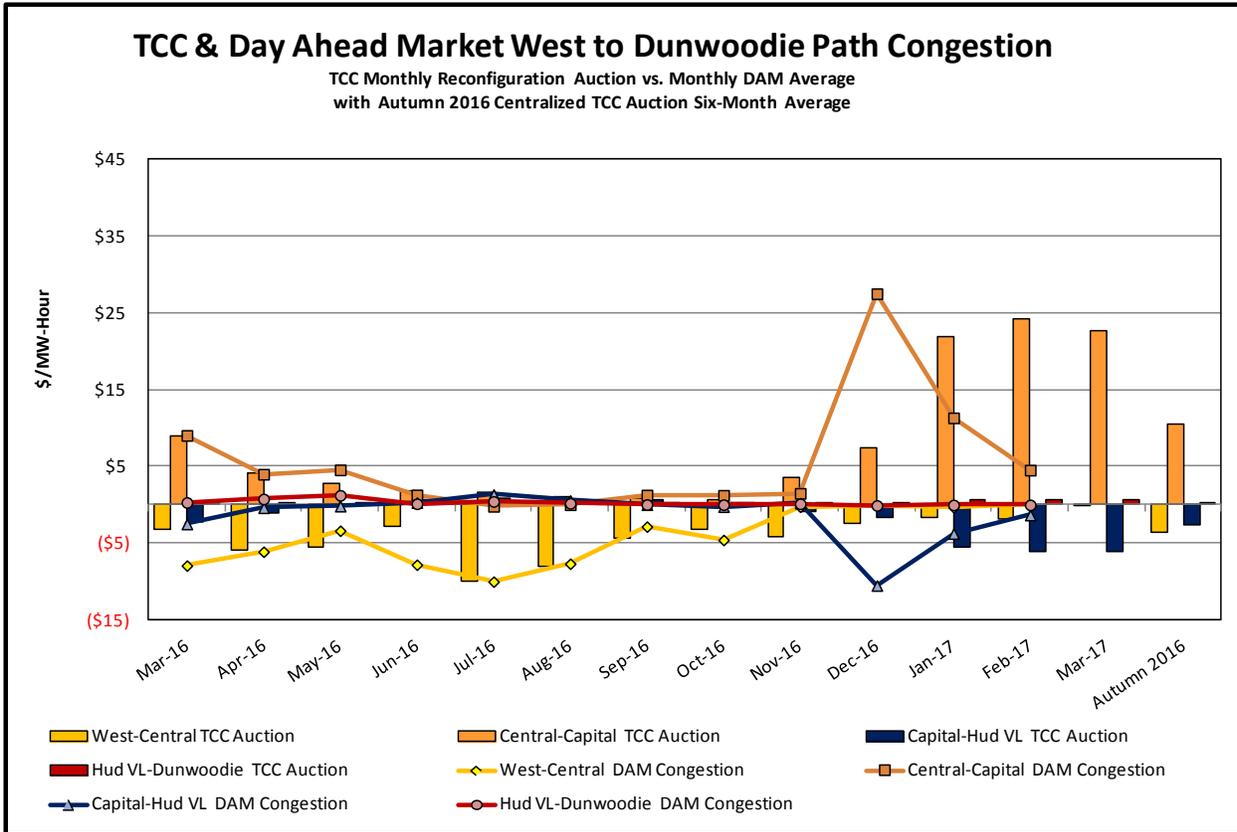
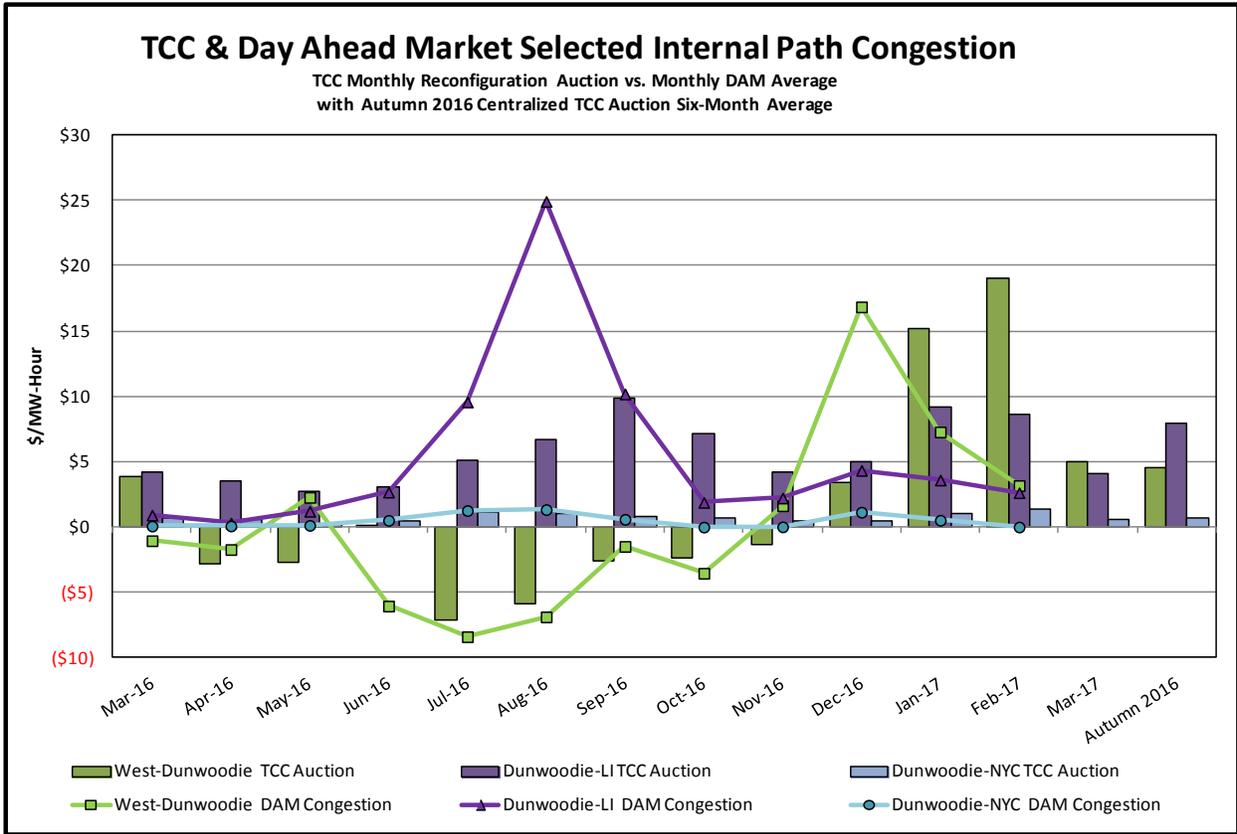
**Day-Ahead Market Congestion Residual Categories**

<u>Category</u>	<u>Cost Assignment</u>	<u>Events Types</u>	<u>Event Examples</u>
NYTO Outage Allocation	Responsible TO	Direct allocation to NYTO's responsible for transmission equipment status change.	DAM scheduled outage for equipment modeled in-service for the TCC Auction.
External Outage Allocation	All TO by Monthly Allocation Factor	Direct allocation to transmission equipment status change caused by change in status of external equipment.	Tie line required out-of-service by TO of neighboring control area.
Central East Commitment Derate	All TO by Monthly Allocation Factor	Reductions in the DAM Central East_VC limit as compared to the TCC Auction limit, which are not associated with transmission line outages.	



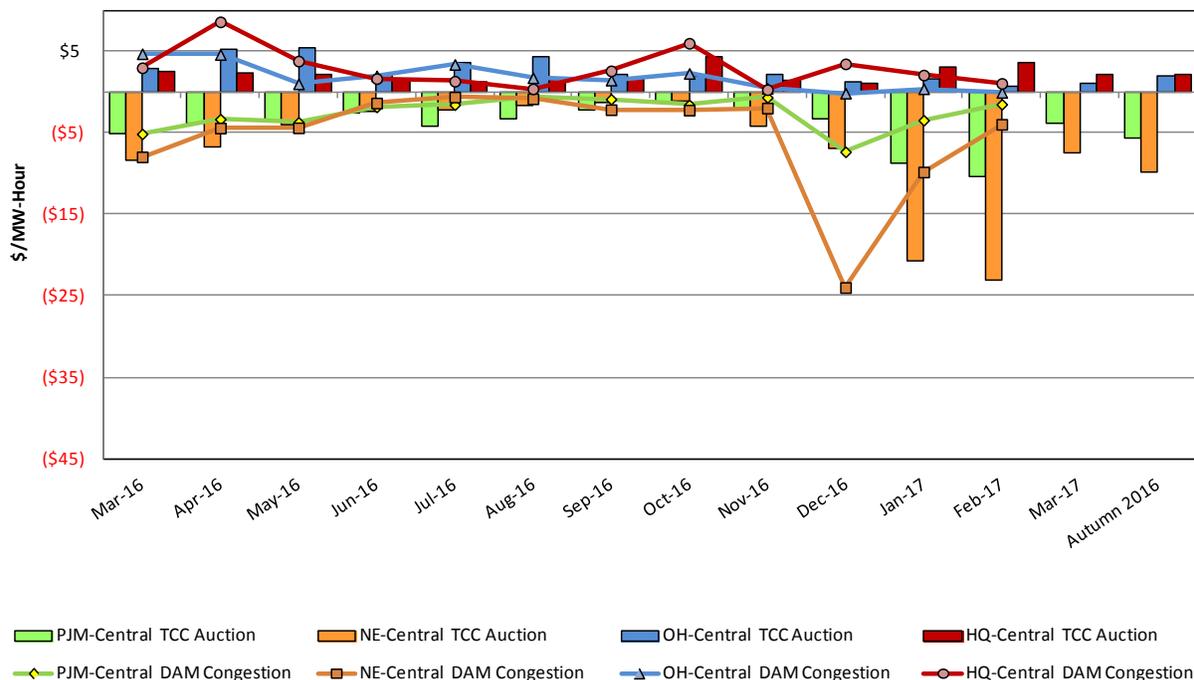


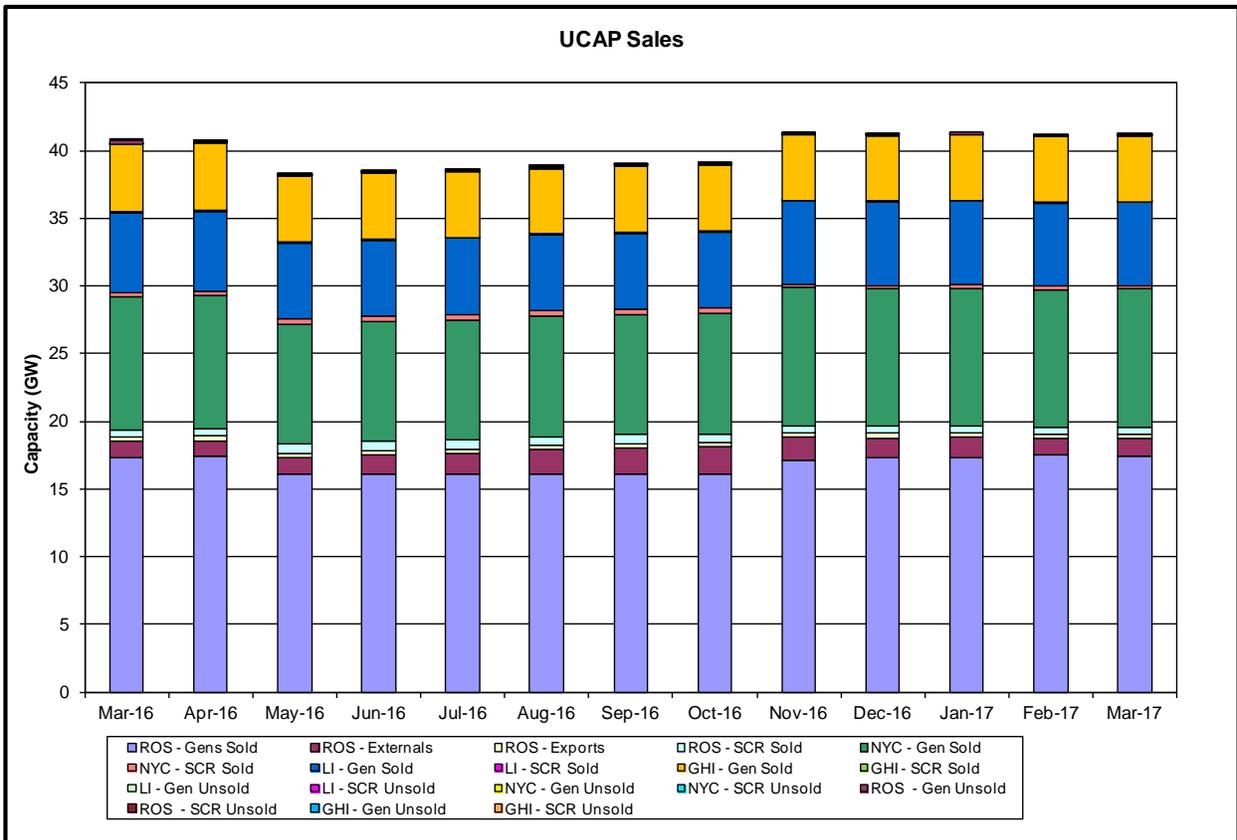
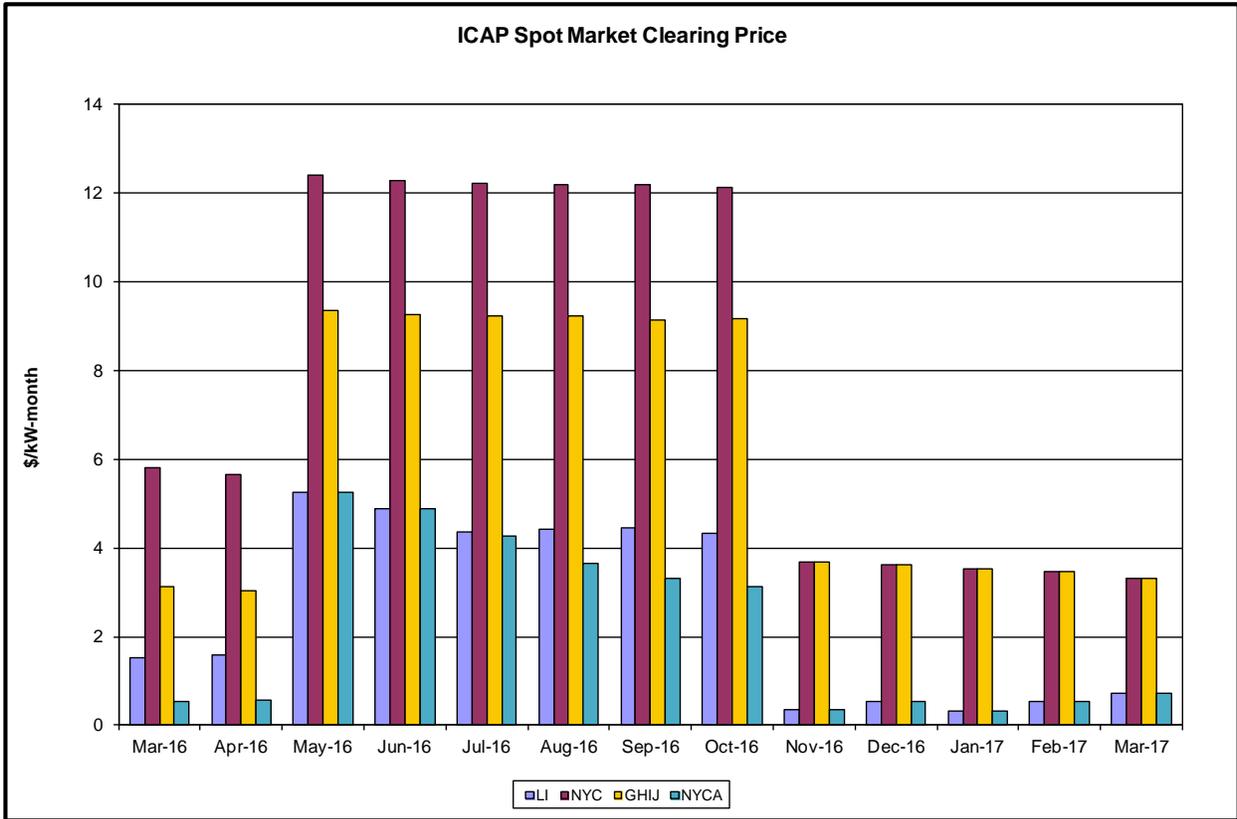




### TCC & Day Ahead Market Selected External Path Congestion

TCC Monthly Reconfiguration Auction vs. Monthly DAM Average  
with Autumn 2016 Centralized TCC Auction Six-Month Average

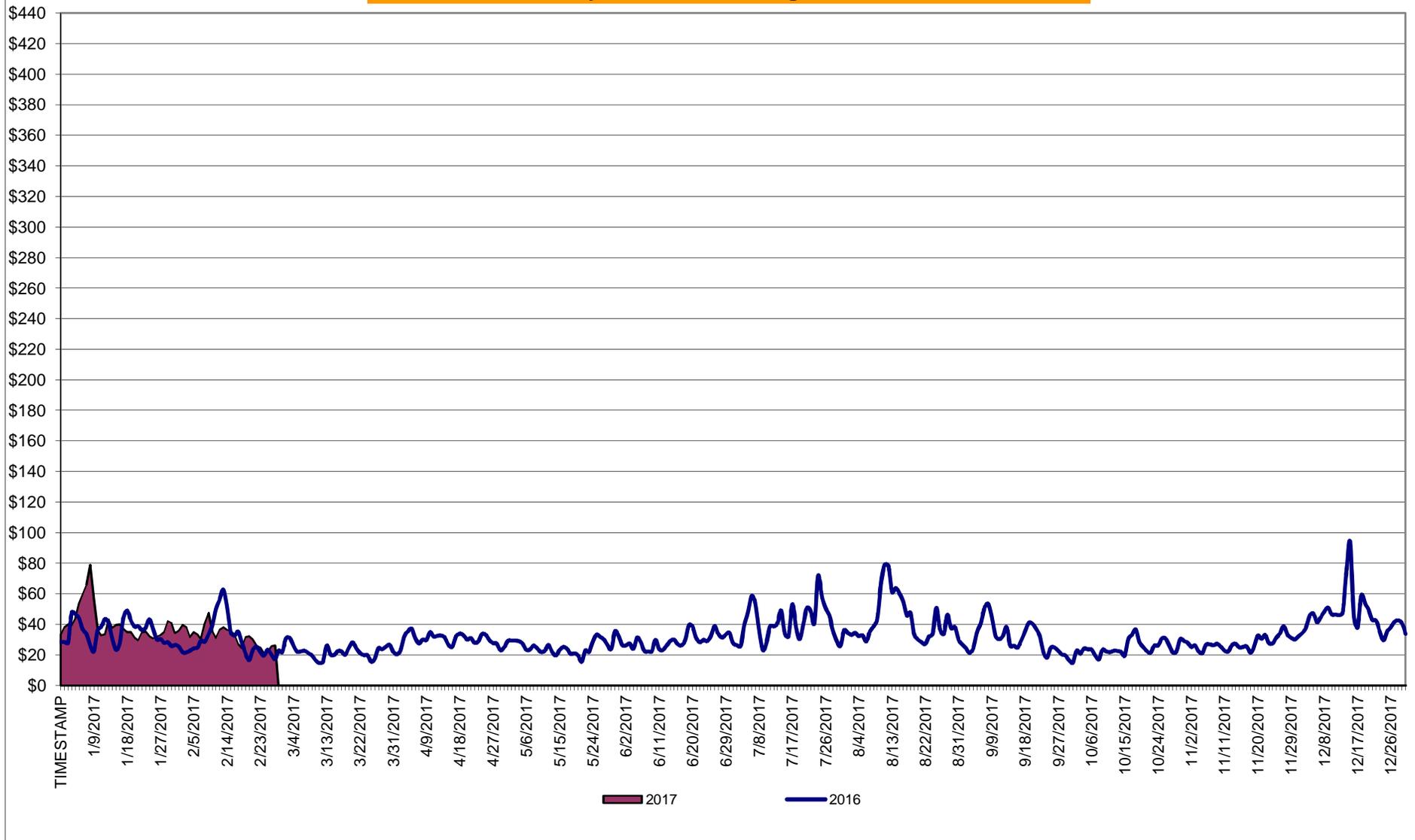




# Market Performance Highlights for February 2017

- LBMP for February is \$30.95/MWh; lower than \$40.07/MWh in January 2017 and higher than \$28.71/MWh in February 2016.
  - Day Ahead and Real Time Load Weighted LBMPs are lower compared to January.
- February 2017 average year-to-date monthly cost of \$38.02/MWh is a 12% increase from \$34.02/MWh in February 2016.
- Average daily sendout is 418 GWh/day in February; lower than 431 GWh/day in January 2017 and 436 GWh/day in February 2016.
- Natural gas prices were lower and distillate prices were higher compared to the previous month.
  - Natural Gas (Transco Z6 NY) was \$2.83/MMBtu, down from \$3.82/MMBtu in January.
  - Natural gas prices are down 6.1% year-over-year.
  - Jet Kerosene Gulf Coast was \$11.48/MMBtu, up from \$11.24/MMBtu in January.
  - Ultra Low Sulfur No.2 Diesel NY Harbor was \$11.63/MMBtu, up from \$11.61/MMBtu in January.
  - Distillate prices are up 57.9% year-over-year.
- Uplift per MWh is higher compared to the previous month.
  - Uplift (not including NYISO cost of operations) is (\$0.54)/MWh; higher than (\$0.73)/MWh in January.
    - Local Reliability Share is \$0.13/MWh, higher than \$0.10/MWh in January.
    - Statewide Share is (\$0.67)/MWh, higher than (\$0.83)/MWh in January.
  - TSA \$ per NYC MWh is \$0.00/MWh.
  - Total uplift costs (Schedule 1 components including NYISO Cost of Operations) are higher than January.

**Daily NYISO Average Cost/MWh (Energy & Ancillary Services)\***  
**2016 Annual Average \$34.28/MWh**  
**February 2016 YTD Average \$34.02/MWh**  
**February 2017 YTD Average \$38.02/MWh**



\* Excludes ICAP payments.

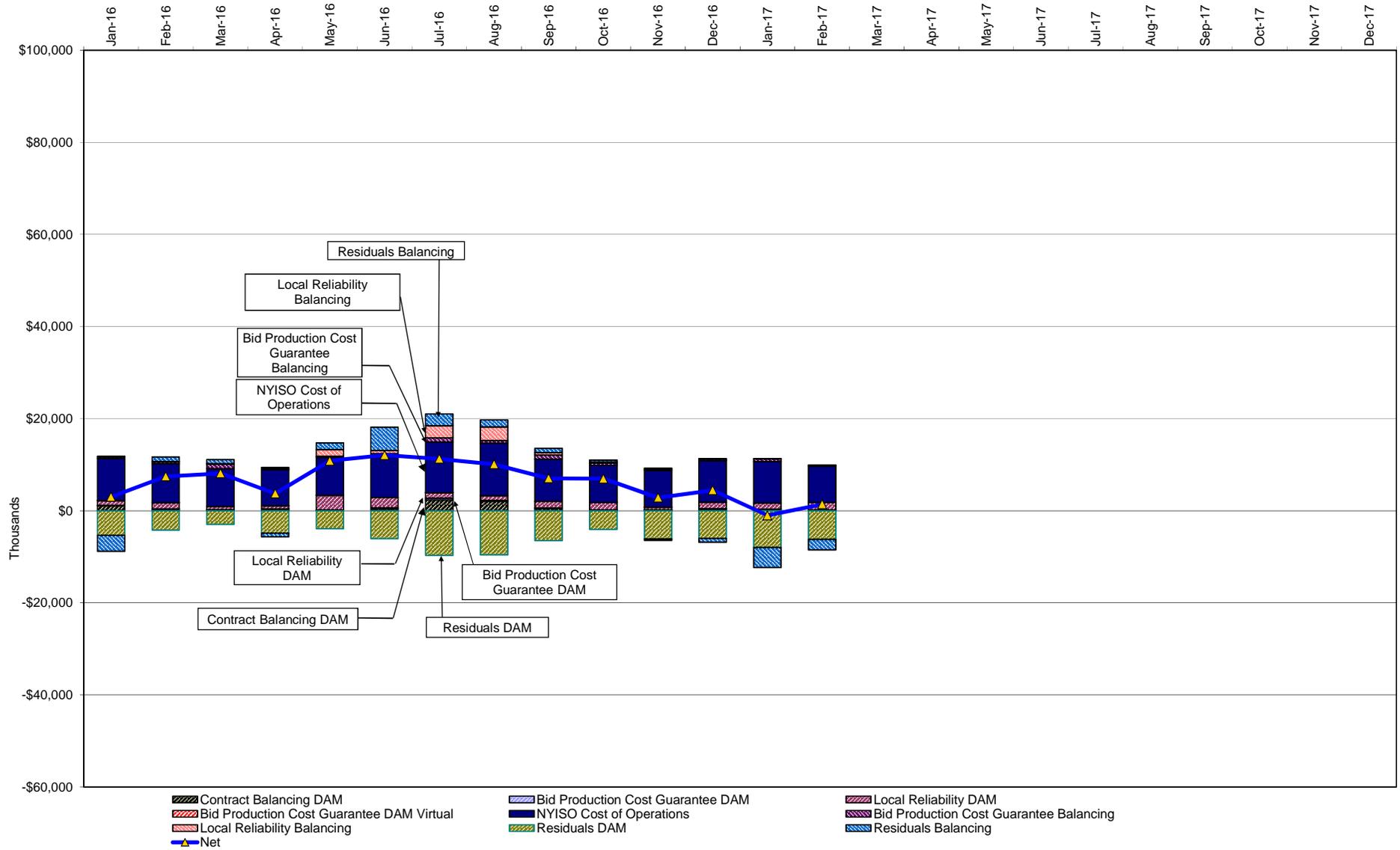
**NYISO Average Cost/MWh (Energy and Ancillary Services)\*  
from the LBMP Customer point of view**

<b>2017</b>	<u>January</u>	<u>February</u>	<u>March</u>	<u>April</u>	<u>May</u>	<u>June</u>	<u>July</u>	<u>August</u>	<u>September</u>	<u>October</u>	<u>November</u>	<u>December</u>
LBMP	40.07	30.95										
NTAC	0.66	1.11										
Reserve	0.70	0.67										
Regulation	0.14	0.12										
NYISO Cost of Operations	0.65	0.65										
FERC Fee Recovery	0.09	0.10										
Uplift	(0.73)	(0.54)										
Uplift: Local Reliability Share	0.10	0.13										
Uplift: Statewide Share	(0.83)	(0.67)										
Voltage Support and Black Start	0.37	0.37										
<b>Avg Monthly Cost</b>	<b>41.96</b>	<b>33.44</b>										
Avg YTD Cost	41.96	38.02										
TSA \$ per NYC MWh	0.00	0.00										
<b>2016</b>	<u>January</u>	<u>February</u>	<u>March</u>	<u>April</u>	<u>May</u>	<u>June</u>	<u>July</u>	<u>August</u>	<u>September</u>	<u>October</u>	<u>November</u>	<u>December</u>
LBMP	34.29	28.71	20.66	27.96	23.31	27.35	40.01	42.99	30.89	22.33	26.31	43.90
NTAC	0.59	0.78	0.62	1.14	1.10	0.93	0.78	0.54	0.55	0.86	0.79	0.97
Reserve	0.77	0.73	0.73	0.87	0.71	0.59	0.67	0.68	0.69	0.77	0.68	0.63
Regulation	0.12	0.12	0.12	0.12	0.11	0.12	0.10	0.10	0.10	0.15	0.13	0.17
NYISO Cost of Operations	0.64	0.65	0.65	0.64	0.65	0.66	0.65	0.65	0.64	0.64	0.64	0.64
FERC Fee Recovery	0.09	0.10	0.11	0.10	0.09	0.09	0.07	0.06	0.08	0.10	0.10	0.08
Uplift	(0.43)	(0.07)	(0.03)	(0.34)	0.19	0.20	(0.26)	(0.63)	(0.15)	(0.09)	(0.42)	(0.33)
Uplift: Local Reliability Share	0.09	0.11	0.06	0.07	0.35	0.21	0.23	0.22	0.14	0.15	0.07	0.10
Uplift: Statewide Share	(0.52)	(0.18)	(0.09)	(0.41)	(0.16)	(0.01)	(0.49)	(0.86)	(0.29)	(0.24)	(0.49)	(0.43)
Voltage Support and Black Start	0.35	0.36	0.36	0.35	0.36	0.36	0.36	0.36	0.36	0.36	0.36	0.35
<b>Avg Monthly Cost</b>	<b>36.42</b>	<b>31.37</b>	<b>23.23</b>	<b>30.84</b>	<b>26.52</b>	<b>30.29</b>	<b>42.40</b>	<b>44.75</b>	<b>33.16</b>	<b>25.12</b>	<b>28.61</b>	<b>46.42</b>
Avg YTD Cost	36.42	34.02	30.68	30.71	29.85	29.93	32.32	34.43	34.31	33.54	33.16	34.28
TSA \$ per NYC MWh	0.00	0.00	0.05	0.00	0.00	0.02	0.84	1.64	0.00	0.00	0.00	0.00
<b>2015</b>	<u>January</u>	<u>February</u>	<u>March</u>	<u>April</u>	<u>May</u>	<u>June</u>	<u>July</u>	<u>August</u>	<u>September</u>	<u>October</u>	<u>November</u>	<u>December</u>
LBMP	59.61	114.37	52.09	28.36	32.98	28.20	34.77	33.09	34.40	30.05	24.83	20.91
NTAC	0.32	0.35	0.41	0.64	0.56	0.80	0.54	0.60	0.63	0.53	0.68	1.05
Reserve	0.27	0.37	0.56	0.36	0.38	0.24	0.27	0.20	0.28	0.28	0.47	0.60
Regulation	0.10	0.18	0.11	0.12	0.10	0.13	0.12	0.12	0.10	0.12	0.13	0.13
NYISO Cost of Operations	0.70	0.70	0.70	0.70	0.70	0.70	0.70	0.70	0.70	0.69	0.70	0.69
Uplift	(0.48)	(1.08)	(0.68)	(0.15)	0.26	0.33	0.04	0.03	(0.15)	0.10	0.44	(0.07)
Uplift: Local Reliability Share	0.25	0.33	0.13	0.27	0.30	0.37	0.35	0.36	0.22	0.33	0.20	0.12
Uplift: Statewide Share	(0.73)	(1.41)	(0.81)	(0.42)	(0.05)	(0.04)	(0.30)	(0.33)	(0.37)	(0.23)	0.25	(0.18)
Voltage Support and Black Start	0.39	0.39	0.39	0.39	0.39	0.39	0.39	0.39	0.39	0.39	0.39	0.38
<b>Avg Monthly Cost</b>	<b>60.91</b>	<b>115.27</b>	<b>53.58</b>	<b>30.41</b>	<b>35.37</b>	<b>30.79</b>	<b>36.84</b>	<b>35.14</b>	<b>36.35</b>	<b>32.18</b>	<b>27.64</b>	<b>23.71</b>
Avg YTD Cost	60.91	87.74	76.64	66.82	60.96	56.02	52.77	50.20	48.59	47.17	45.66	44.10
TSA \$ per NYC MWh	0.00	0.00	0.00	0.00	0.17	0.50	0.07	0.06	0.01	0.00	0.00	0.00

\* Excludes ICAP payments.  
Market Mitigation and Analysis  
Prepared: 3/9/2017 11:14 AM

As of Jan. 2016, the annual FERC fee is recovered separately from Cost of Ops.

## NYISO Dollar Flows - Uplift - OATT Schedule 1 components - Data through February 28, 2017



DAM Contract Balancing amounts are for payments made to generating units to make them whole for being dispatched below their Day-Ahead schedule, as a result of out-of-merit dispatches.  
 DAM Bid Production Cost Guarantees for Virtual Transactions are included in the chart and are shown from the inception of Virtual Transactions. These values are small and cannot be identified on the chart.  
 DAM residuals consist of both energy and loss revenue collections and payments. By design, there is a net over collection of revenues due to the difference between the marginal losses paid to generation and the average losses charged to loads.

## NYISO Markets Transactions

2017	January	February	March	April	May	June	July	August	September	October	November	December
<b>Day Ahead Market MWh</b>	14,135,019	12,565,206										
DAM LSE Internal LBMP Energy Sales	57%	57%										
DAM External TC LBMP Energy Sales	2%	2%										
DAM Bilateral - Internal Bilaterals	32%	32%										
DAM Bilateral - Import/Non-LBMP Market Bilaterals	5%	5%										
DAM Bilateral - Export/Non-LBMP Market Bilaterals	2%	2%										
DAM Bilateral - Wheel Through Bilaterals	2%	2%										
<b>Balancing Energy Market MWh</b>	-256,448	-407,284										
Balancing Energy LSE Internal LBMP Energy Sales	-157%	-132%										
Balancing Energy External TC LBMP Energy Sales	64%	39%										
Balancing Energy Bilateral - Internal Bilaterals	15%	8%										
Balancing Energy Bilateral - Import/Non-LBMP Market Bilaterals	0%	4%										
Balancing Energy Bilateral - Export/Non-LBMP Market Bilaterals	10%	7%										
Balancing Energy Bilateral - Wheel Through Bilaterals	-32%	-26%										
<b>Transactions Summary</b>												
LBMP	58%	57%										
Internal Bilaterals	33%	34%										
Import Bilaterals	5%	5%										
Export Bilaterals	2%	2%										
Wheels Through	2%	2%										
<b>Market Share of Total Load</b>												
Day Ahead Market	101.8%	103.3%										
Balancing Energy +	-1.8%	-3.3%										
Total MWh	13,878,571	12,157,922										
Average Daily Energy Sendout/Month GWh	431	418										

2016	January	February	March	April	May	June	July	August	September	October	November	December
<b>Day Ahead Market MWh</b>	14,760,915	13,614,754	13,413,781	12,496,141	12,959,886	14,095,904	16,950,819	17,413,898	14,563,318	13,014,354	12,770,775	14,245,185
DAM LSE Internal LBMP Energy Sales	54%	55%	55%	57%	58%	60%	64%	63%	60%	56%	56%	58%
DAM External TC LBMP Energy Sales	4%	2%	1%	5%	2%	1%	1%	3%	3%	2%	2%	3%
DAM Bilateral - Internal Bilaterals	34%	34%	35%	28%	31%	30%	28%	27%	30%	33%	32%	31%
DAM Bilateral - Import/Non-LBMP Market Bilaterals	5%	5%	5%	6%	5%	5%	4%	4%	5%	5%	5%	5%
DAM Bilateral - Export/Non-LBMP Market Bilaterals	2%	1%	2%	2%	2%	2%	1%	1%	1%	2%	2%	2%
DAM Bilateral - Wheel Through Bilaterals	2%	2%	2%	2%	2%	2%	2%	2%	2%	2%	3%	2%
<b>Balancing Energy Market MWh</b>	-522,919	-580,900	-741,701	-303,313	-180,848	-143,015	-86,025	224,316	-250,802	-477,109	-394,575	-127,836
Balancing Energy LSE Internal LBMP Energy Sales	-125%	-114%	-118%	-76%	-147%	-203%	-347%	42%	-139%	-111%	-102%	-269%
Balancing Energy External TC LBMP Energy Sales	12%	13%	19%	-13%	55%	77%	204%	56%	49%	21%	28%	138%
Balancing Energy Bilateral - Internal Bilaterals	19%	9%	4%	8%	27%	47%	62%	28%	18%	6%	9%	65%
Balancing Energy Bilateral - Import/Non-LBMP Market Bilaterals	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	0%	4%
Balancing Energy Bilateral - Export/Non-LBMP Market Bilaterals	6%	5%	3%	5%	7%	10%	15%	5%	5%	4%	6%	27%
Balancing Energy Bilateral - Wheel Through Bilaterals	-12%	-12%	-8%	-24%	-42%	-32%	-34%	-31%	-32%	-21%	-40%	-66%
<b>Transactions Summary</b>												
LBMP	56%	56%	54%	62%	59%	61%	65%	66%	62%	57%	57%	60%
Internal Bilaterals	36%	36%	37%	29%	32%	31%	28%	27%	30%	35%	34%	32%
Import Bilaterals	5%	5%	6%	6%	5%	5%	4%	4%	5%	5%	6%	5%
Export Bilaterals	2%	2%	2%	2%	2%	2%	1%	1%	1%	2%	2%	2%
Wheels Through	1%	1%	1%	1%	2%	2%	1%	1%	2%	1%	2%	2%
<b>Market Share of Total Load</b>												
Day Ahead Market	103.7%	104.5%	105.9%	102.5%	101.4%	101.0%	100.5%	98.7%	101.8%	103.8%	103.2%	100.9%
Balancing Energy +	-3.7%	-4.5%	-5.9%	-2.5%	-1.4%	-1.0%	-0.5%	1.3%	-1.8%	-3.8%	-3.2%	-0.9%
Total MWh	14,237,996	13,033,853	12,672,080	12,192,828	12,779,038	13,952,889	16,864,794	17,638,213	14,312,516	12,537,245	12,376,200	14,117,349
Average Daily Energy Sendout/Month GWh	439	436	397	385	397	456	532	548	458	391	398	433

+ Balancing Energy: Load(MW) purchased at Real Time LBMP.

\* The signs for the detail section intuitively reflect the direction of power flow eliminating the use of double negatives when Balancing Energy is negative.

Notes: Percent totals may not equal 100% due to rounding.  
Virtual Transactions are not reflected in this chart.

### NYISO Markets 2017 Energy Statistics

	<u>January</u>	<u>February</u>	<u>March</u>	<u>April</u>	<u>May</u>	<u>June</u>	<u>July</u>	<u>August</u>	<u>September</u>	<u>October</u>	<u>November</u>	<u>December</u>
<b><u>DAY AHEAD LBMP</u></b>												
Price *	\$37.22	\$28.84										
Standard Deviation	\$13.20	\$7.97										
Load Weighted Price **	\$38.42	\$29.66										
<b><u>RTC LBMP</u></b>												
Price *	\$32.87	\$24.09										
Standard Deviation	\$14.57	\$9.52										
Load Weighted Price **	\$33.96	\$24.81										
<b><u>REAL TIME LBMP</u></b>												
Price *	\$34.61	\$25.14										
Standard Deviation	\$18.20	\$14.21										
Load Weighted Price **	\$35.80	\$25.84										
Average Daily Energy Sendout/Month GWh	431	418										

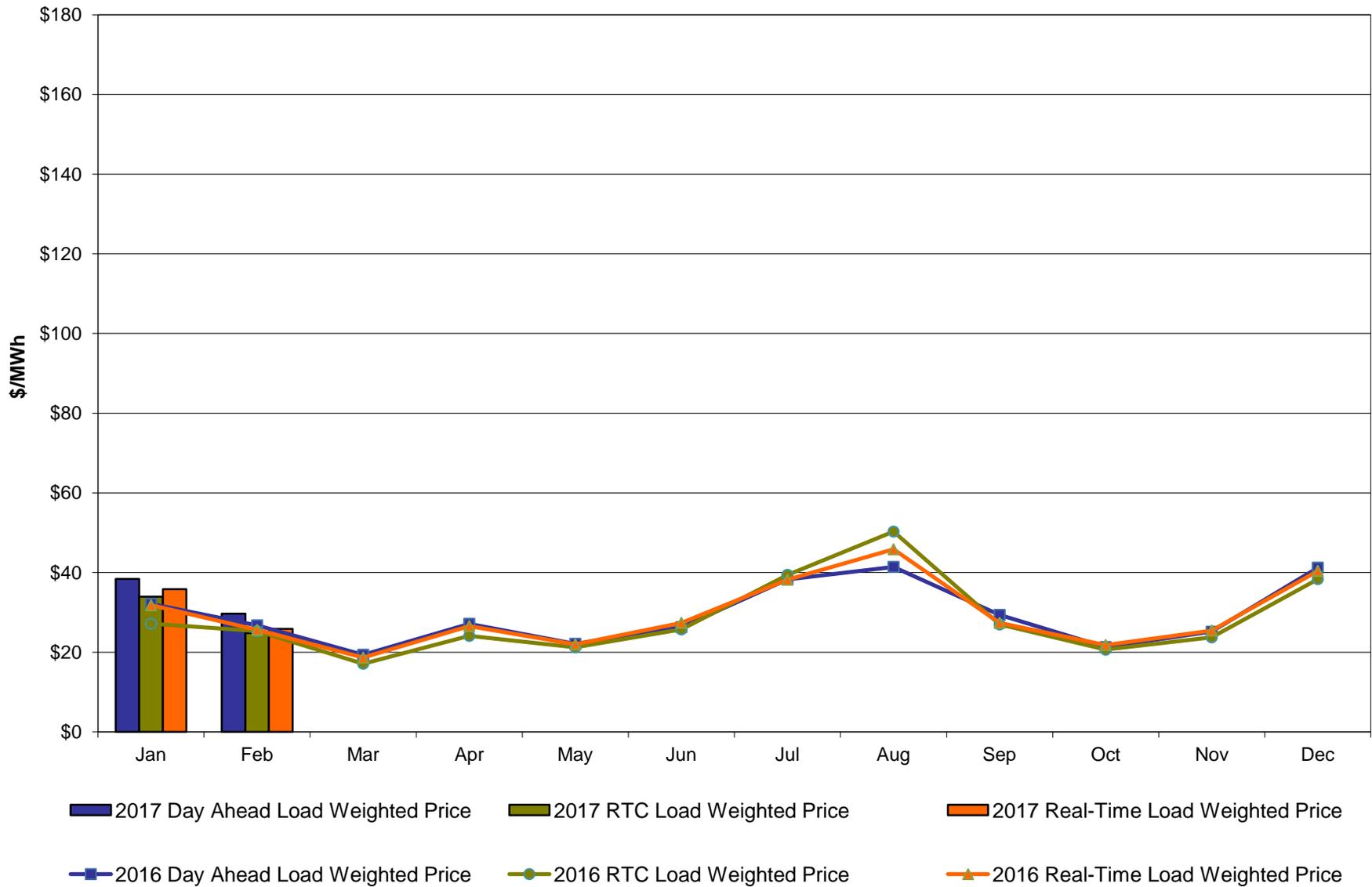
### NYISO Markets 2016 Energy Statistics

	<u>January</u>	<u>February</u>	<u>March</u>	<u>April</u>	<u>May</u>	<u>June</u>	<u>July</u>	<u>August</u>	<u>September</u>	<u>October</u>	<u>November</u>	<u>December</u>
<b><u>DAY AHEAD LBMP</u></b>												
Price *	\$31.01	\$25.76	\$18.63	\$26.39	\$21.07	\$24.83	\$35.24	\$38.25	\$27.15	\$20.37	\$24.35	\$39.83
Standard Deviation	\$10.86	\$12.46	\$6.99	\$6.95	\$7.04	\$9.21	\$18.37	\$20.59	\$13.55	\$7.48	\$7.32	\$15.08
Load Weighted Price **	\$32.13	\$26.75	\$19.37	\$27.14	\$22.12	\$26.30	\$38.29	\$41.41	\$29.38	\$21.29	\$25.15	\$41.22
<b><u>RTC LBMP</u></b>												
Price *	\$26.12	\$24.10	\$16.41	\$23.41	\$19.96	\$24.29	\$36.22	\$45.03	\$24.70	\$19.76	\$23.02	\$37.08
Standard Deviation	\$16.06	\$17.89	\$11.32	\$9.09	\$11.44	\$16.58	\$38.04	\$70.57	\$17.46	\$8.96	\$9.49	\$16.72
Load Weighted Price **	\$27.16	\$25.29	\$17.11	\$24.10	\$21.23	\$25.73	\$39.42	\$50.28	\$26.97	\$20.64	\$23.73	\$38.35
<b><u>REAL TIME LBMP</u></b>												
Price *	\$30.15	\$24.28	\$17.84	\$25.71	\$20.67	\$25.87	\$34.40	\$40.87	\$24.90	\$20.91	\$24.72	\$39.00
Standard Deviation	\$60.09	\$18.19	\$15.06	\$16.59	\$12.84	\$19.27	\$38.56	\$52.85	\$20.70	\$12.15	\$12.71	\$20.92
Load Weighted Price **	\$31.80	\$25.61	\$18.64	\$26.57	\$21.99	\$27.39	\$38.20	\$45.82	\$27.38	\$21.81	\$25.45	\$40.42
Average Daily Energy Sendout/Month GWh	439	436	397	385	397	456	532	548	458	391	398	433

\* Average zonal load weighted prices.

\*\* Average zonal load weighted prices, load weighted in each hour.

### NYISO Monthly Average Internal LBMPs 2016- 2017

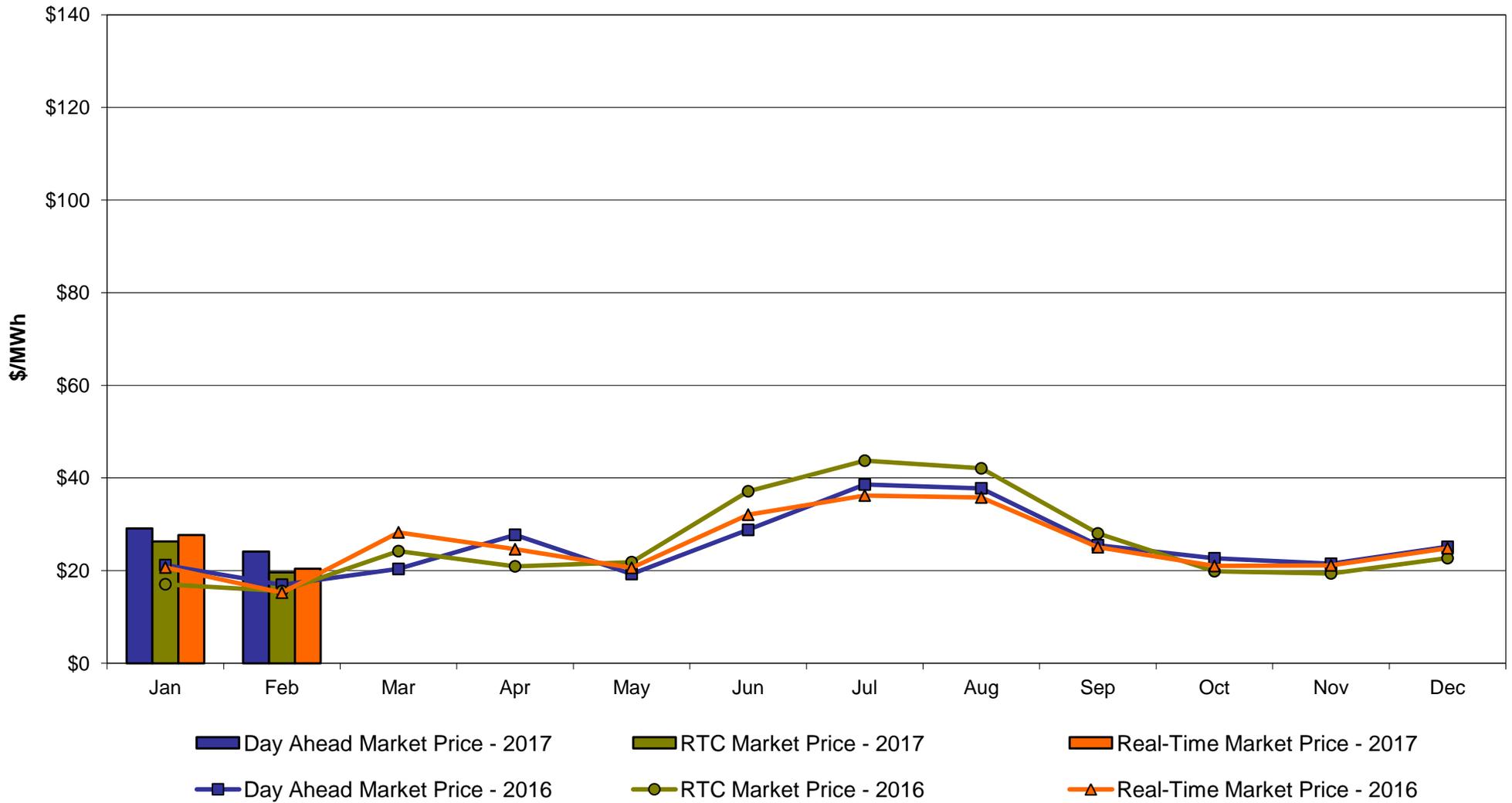


**February 2017 Zonal LBMP Statistics for NYISO (\$/MWh)**

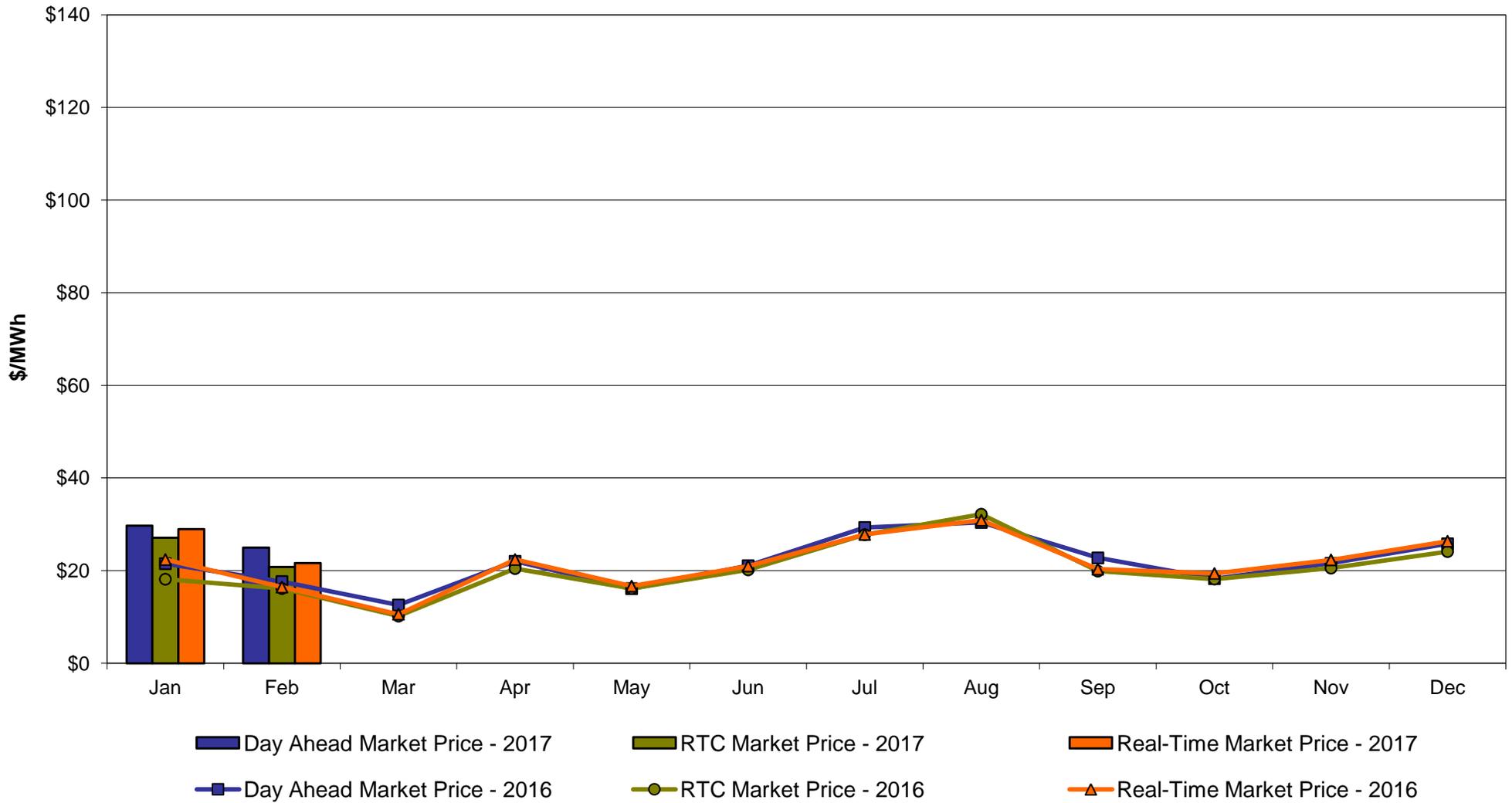
	<u>WEST Zone A</u>	<u>GENESEE Zone B</u>	<u>NORTH Zone D</u>	<u>CENTRAL Zone C</u>	<u>MOHAWK VALLEY Zone E</u>	<u>CAPITAL Zone F</u>	<u>HUDSON VALLEY Zone G</u>	<u>MILLWOOD Zone H</u>	<u>DUNWOODIE Zone I</u>	<u>NEW YORK CITY Zone J</u>	<u>LONG ISLAND Zone K</u>
<b><u>DAY AHEAD LBMP</u></b>											
Unweighted Price *	24.14	24.22	22.45	24.98	25.46	30.83	30.29	30.38	30.31	30.55	33.77
Standard Deviation	6.93	7.21	7.45	7.40	7.66	8.32	8.17	8.18	8.13	8.20	10.66
<b><u>RTC LBMP</u></b>											
Unweighted Price *	19.59	20.10	18.76	20.81	21.29	25.79	25.24	25.27	25.20	25.44	28.99
Standard Deviation	8.61	9.12	10.34	9.29	9.56	10.42	9.64	9.65	9.59	9.66	20.57
<b><u>REAL TIME LBMP</u></b>											
Unweighted Price *	20.42	20.91	19.29	21.64	22.13	27.50	26.71	26.75	26.69	26.92	29.26
Standard Deviation	12.33	12.93	14.16	13.20	13.52	18.27	15.87	15.92	15.82	15.88	19.10
	<u>ONTARIO IESO Zone O</u>	<u>HYDRO QUEBEC (Wheel) Zone M</u>	<u>HYDRO QUEBEC (Import/Export) Zone M</u>	<u>PJM Zone P</u>	<u>NEW ENGLAND Zone N</u>	<u>CROSS SOUND CABLE Controllable Line</u>	<u>NORTHPORT- NORWALK Controllable Line</u>	<u>NEPTUNE Controllable Line</u>	<u>LINDEN VFT Controllable Line</u>	<u>HUDSON Controllable Line</u>	<u>Dennison Controllable Line</u>
<b><u>DAY AHEAD LBMP</u></b>											
Unweighted Price *	23.59	22.75	22.75	26.70	30.45	33.02	32.75	31.93	30.39	30.45	21.95
Standard Deviation	6.71	7.47	7.47	7.15	8.14	10.43	10.17	9.79	8.12	8.17	7.21
<b><u>RTC LBMP</u></b>											
Unweighted Price *	19.32	19.04	19.04	22.03	26.91	28.87	28.36	27.59	25.17	25.28	18.33
Standard Deviation	8.45	9.63	9.63	8.32	13.80	21.51	20.24	18.72	9.55	9.61	10.05
<b><u>REAL TIME LBMP</u></b>											
Unweighted Price *	20.22	19.53	19.53	23.13	27.77	29.58	28.63	28.04	26.67	26.77	18.35
Standard Deviation	12.20	13.42	13.42	12.77	17.81	22.81	18.03	17.57	15.80	15.86	13.63

\* Straight LBMP averages

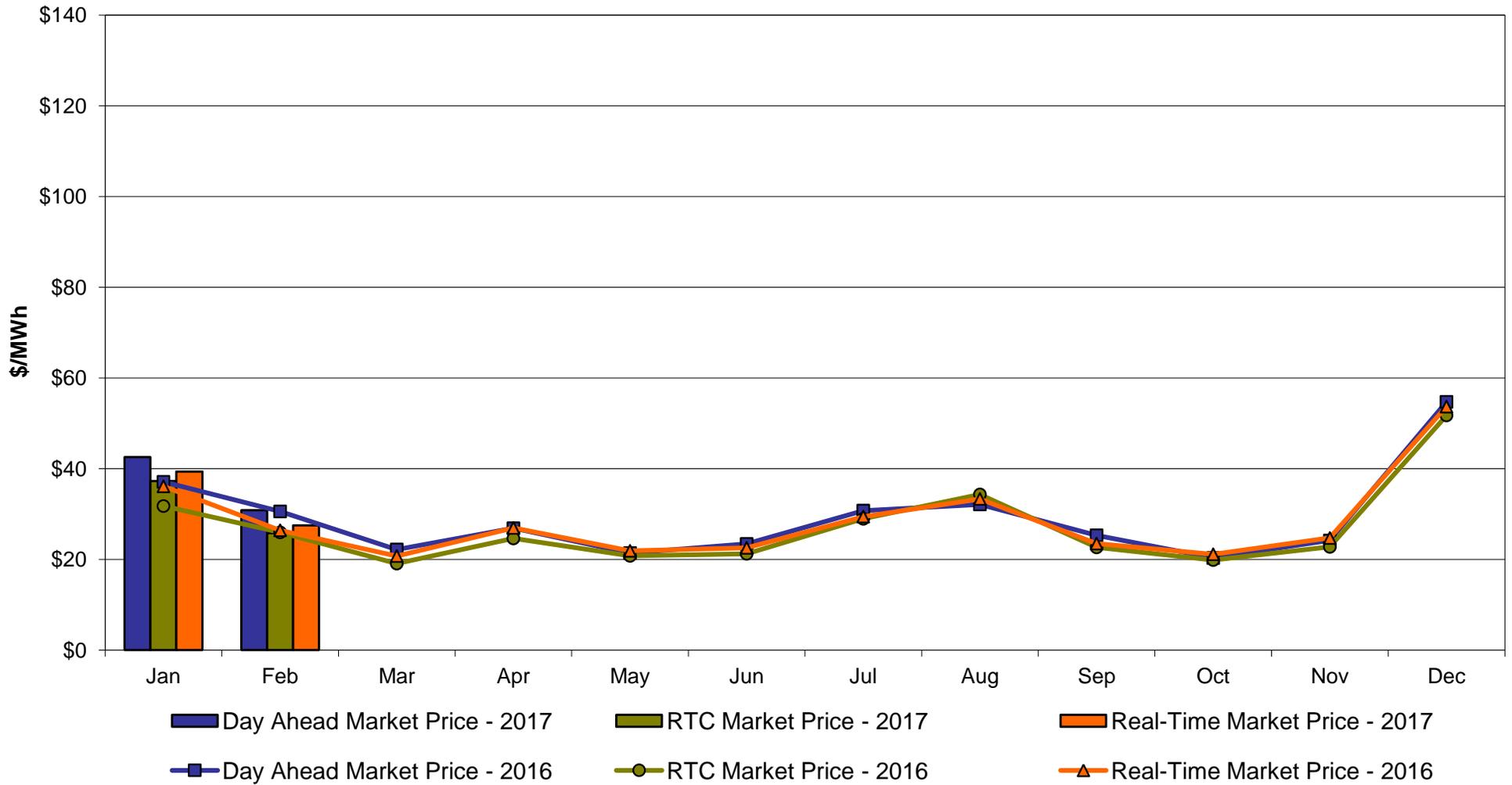
## West Zone A Monthly Average LBMP Prices 2016 - 2017



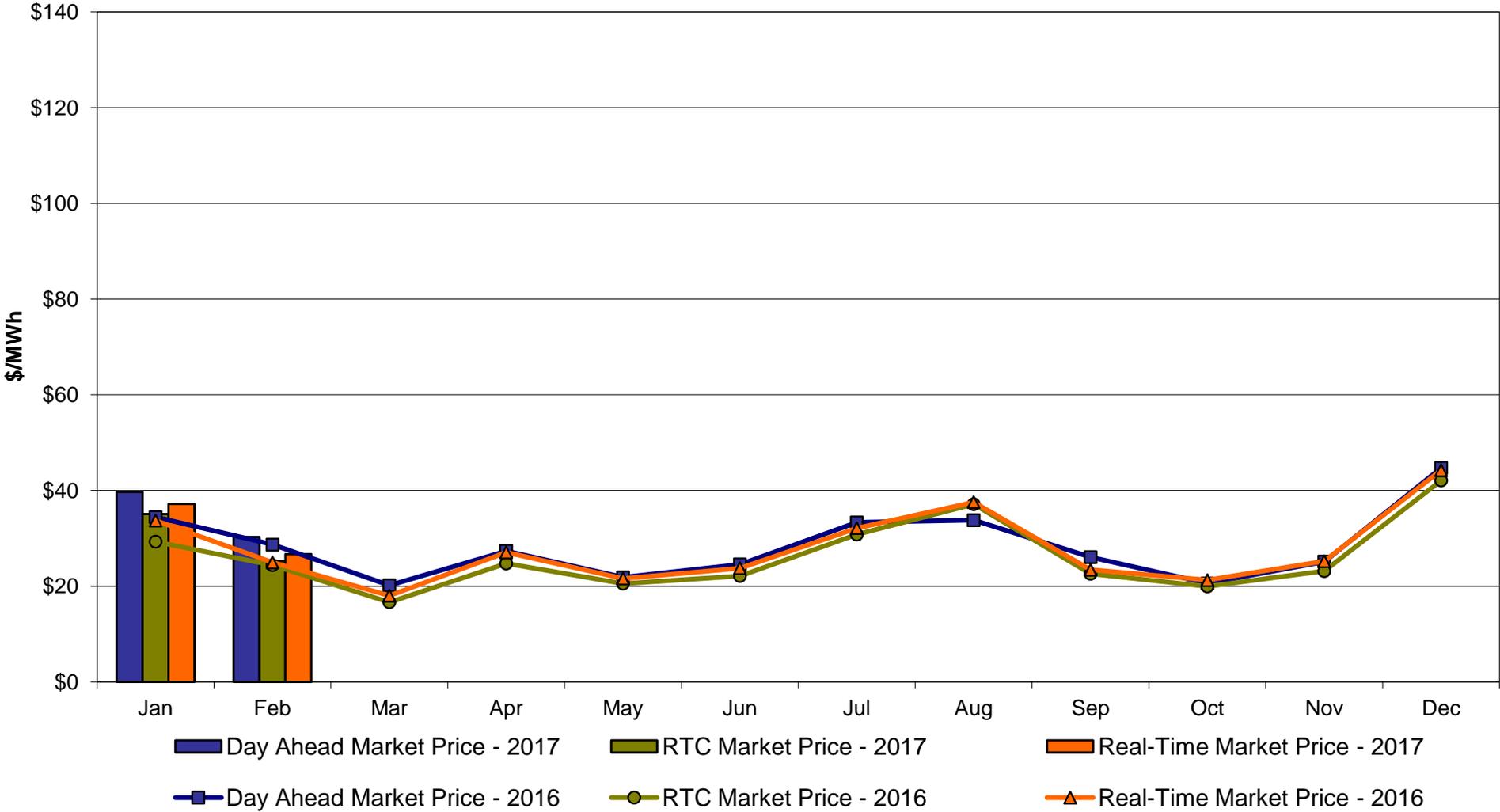
**Central Zone C  
Monthly Average LBMP Prices 2016 - 2017**



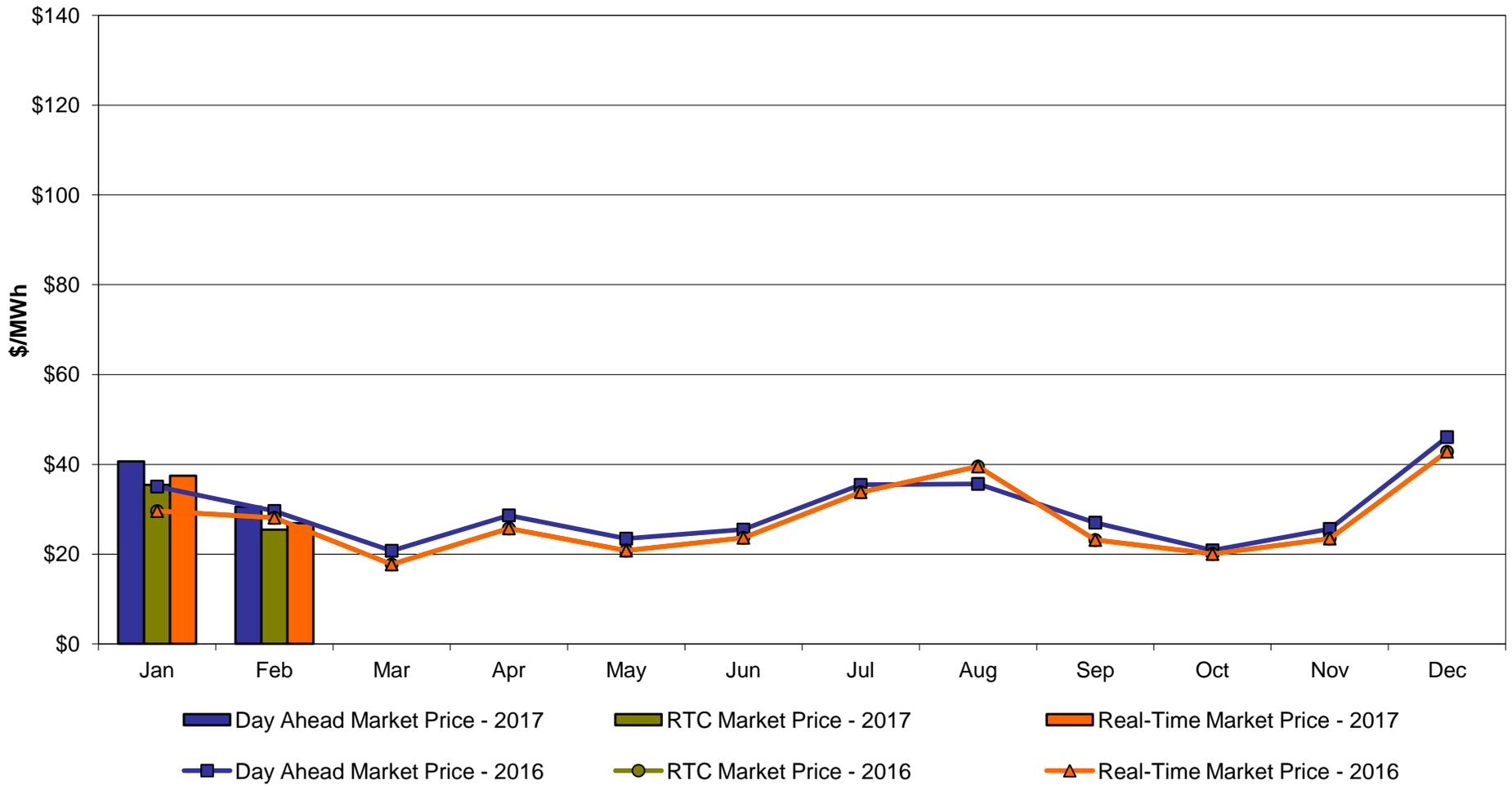
## Capital Zone F Monthly Average LBMP Prices 2016 - 2017



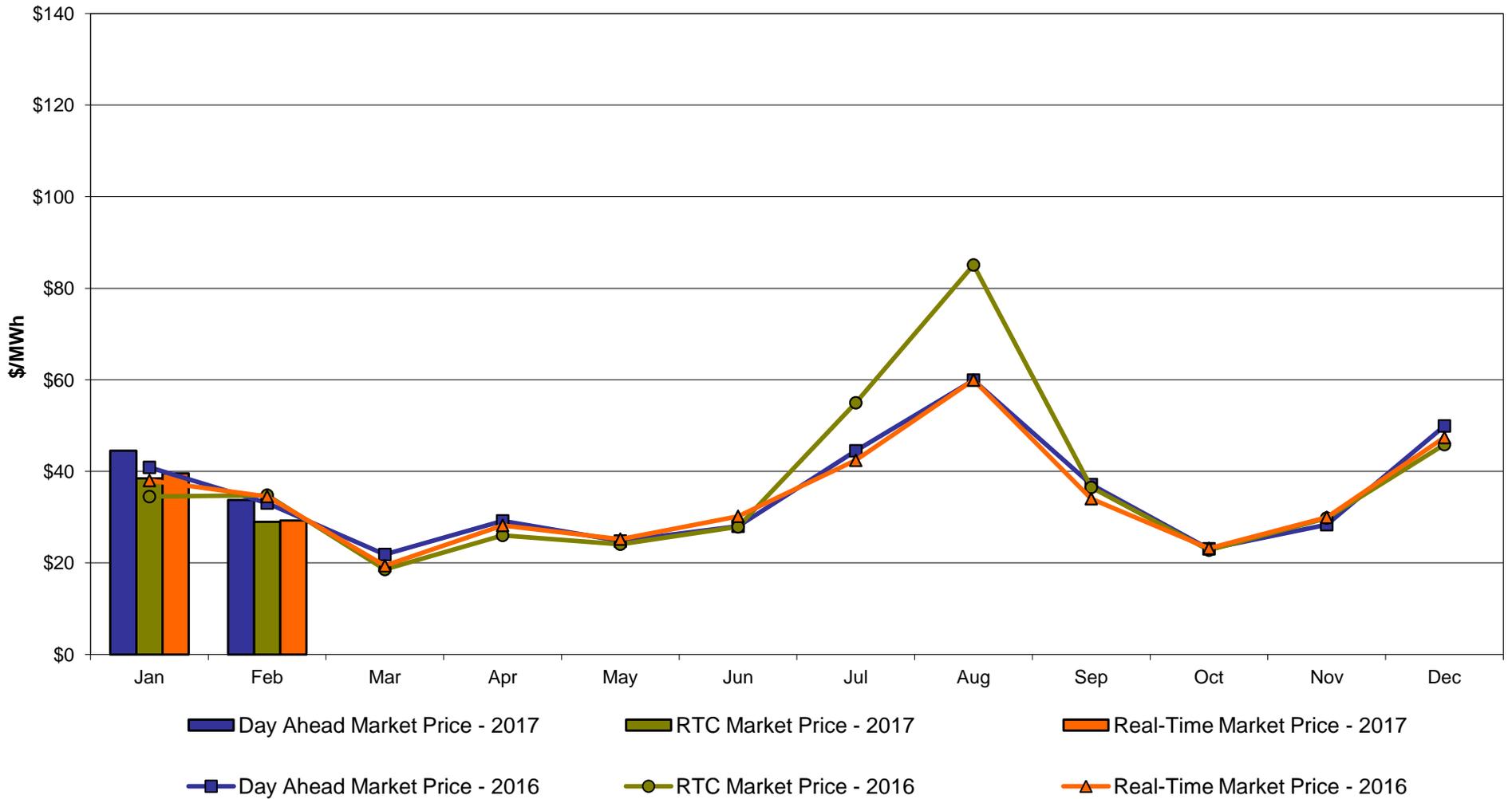
### Hudson Valley Zone G Monthly Average LBMP Prices 2016 - 2017



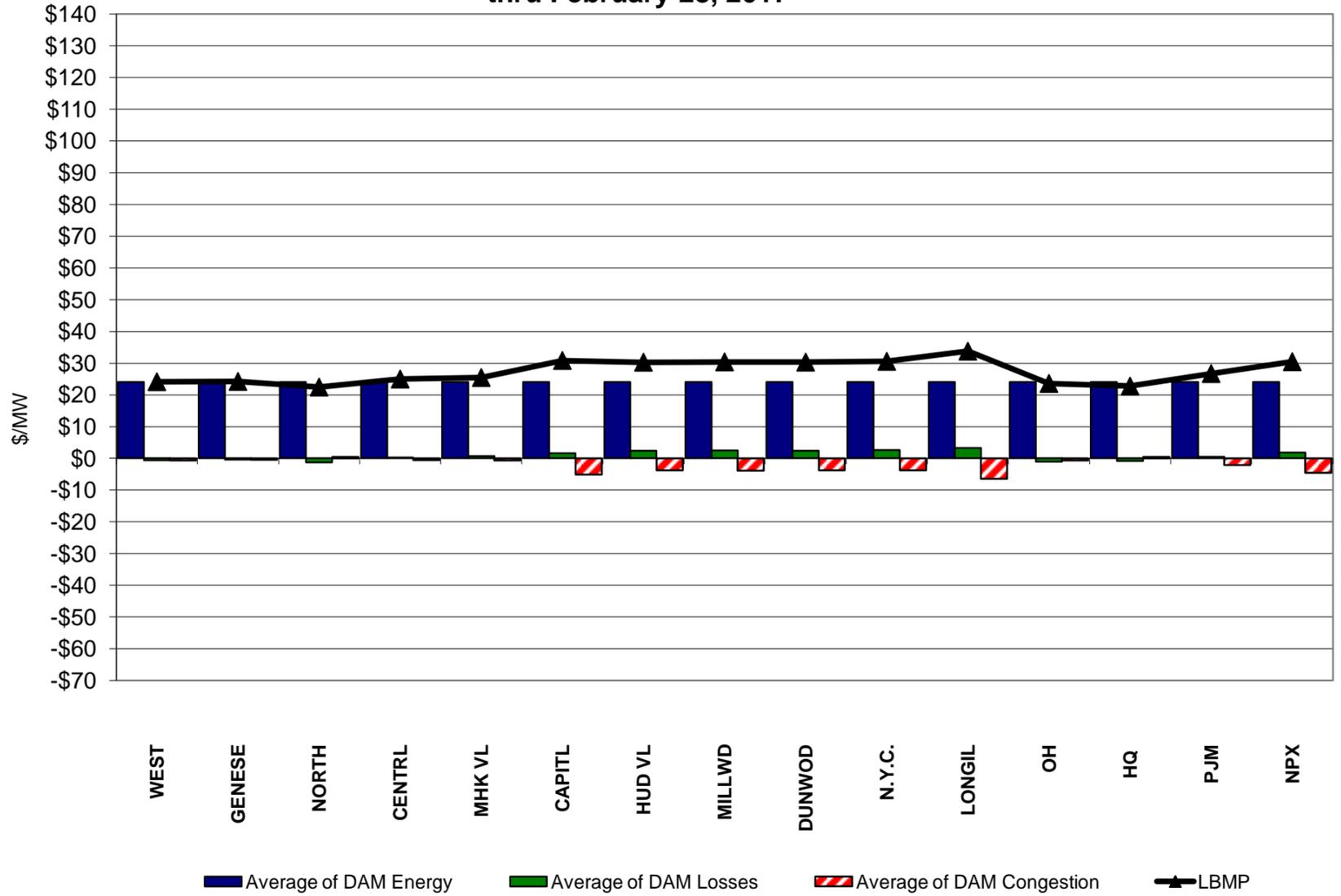
## NYC Zone J Monthly Average LBMP Prices 2016 - 2017



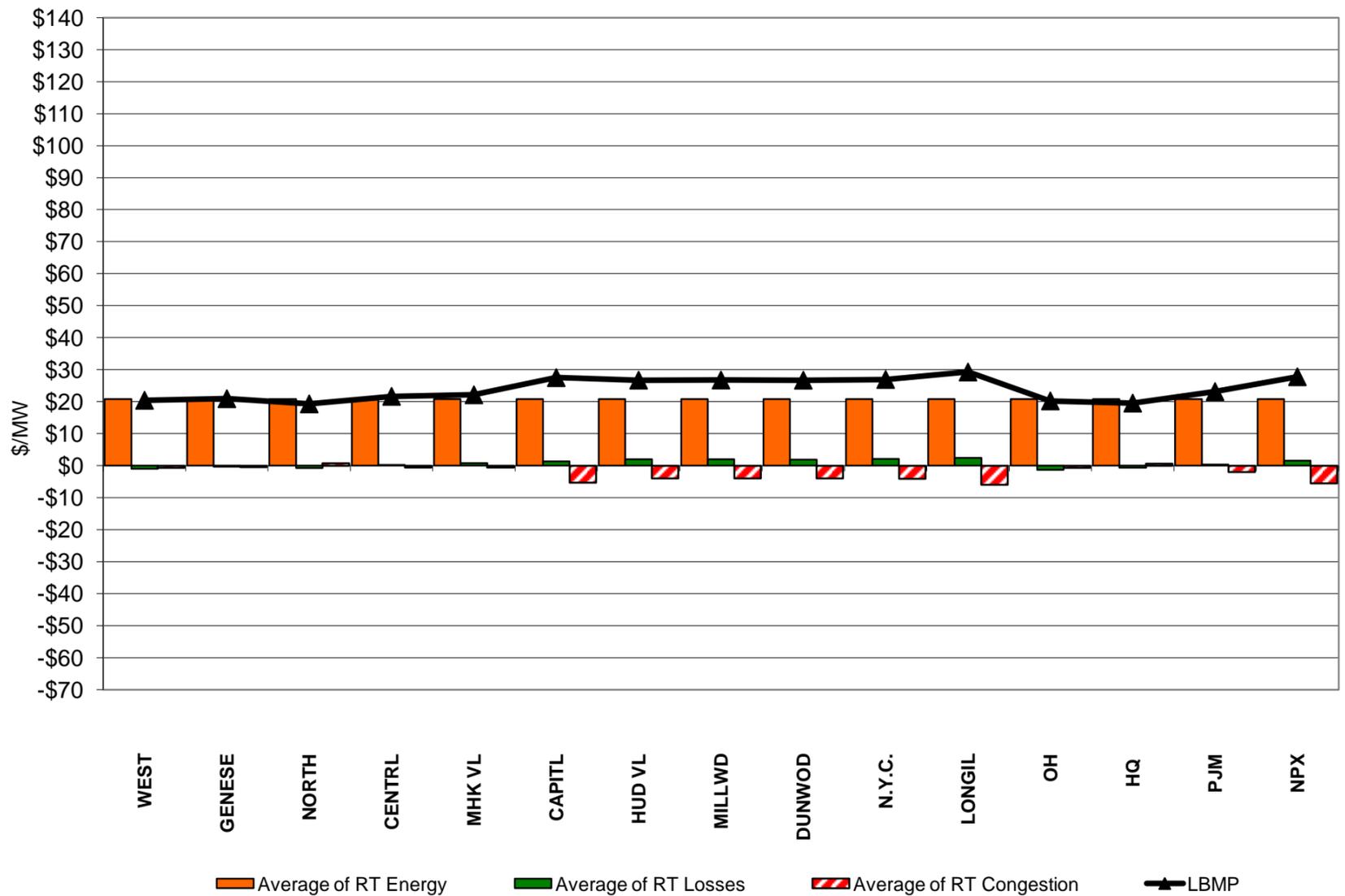
## Long Island Zone K Monthly Average LBMP Prices 2016 - 2017



**DAM Zonal Unweighted Monthly Average LBMP Components  
thru February 28, 2017**

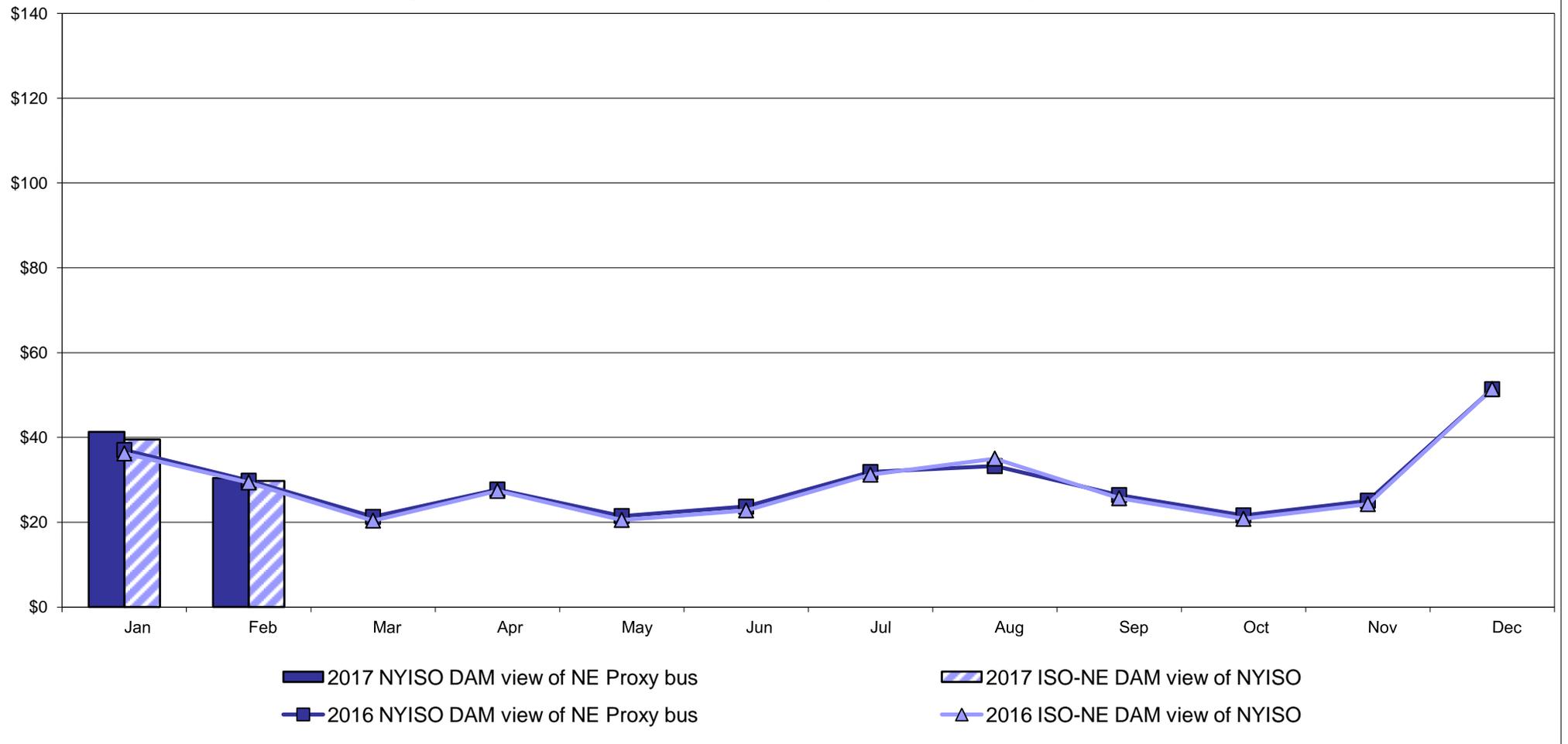


**RT Zonal Unweighted Monthly Average LBMP Components  
thru February 28, 2017**

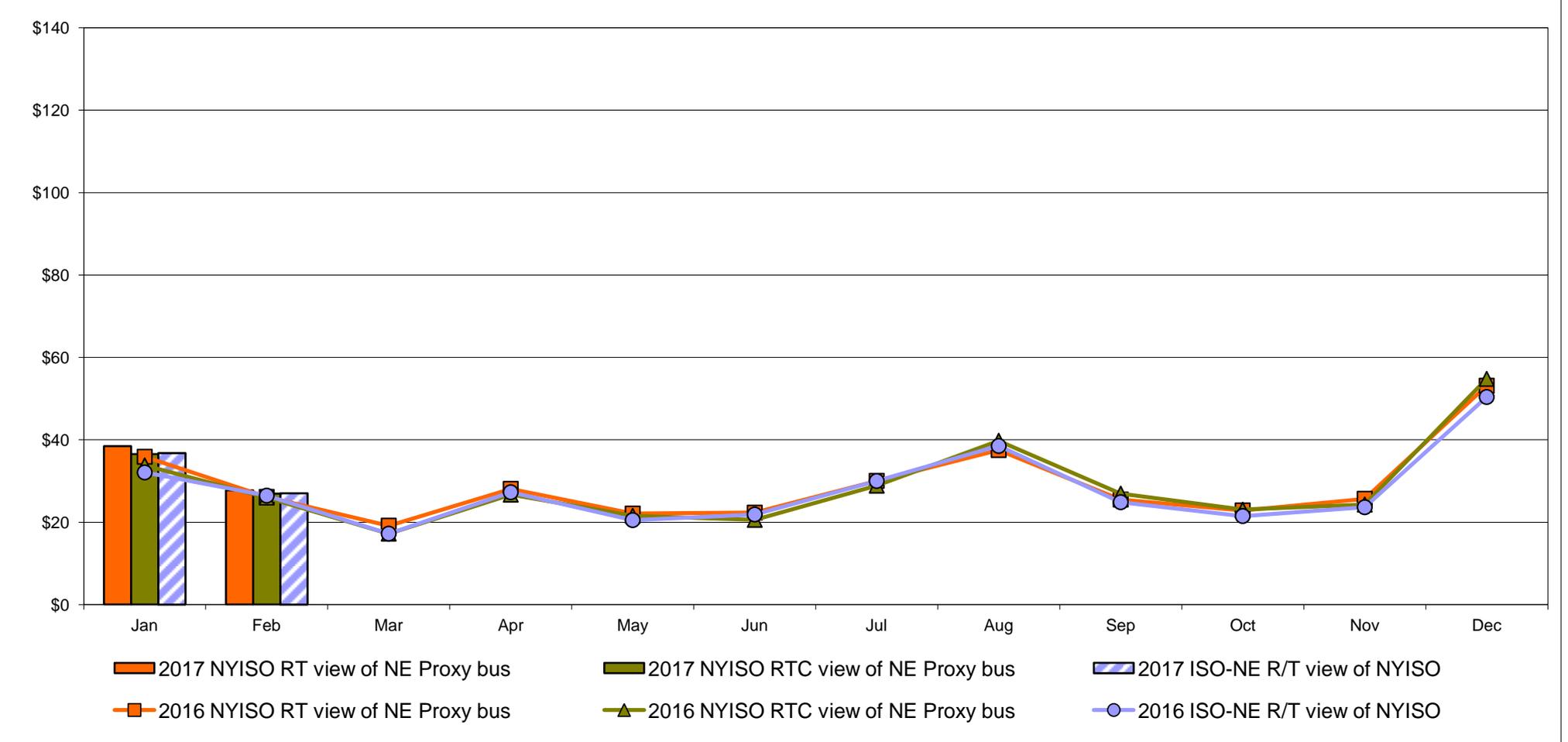


# External Comparison ISO-New England

### Day Ahead Market External Zone Comparison: ISO-NE (\$/MWh)

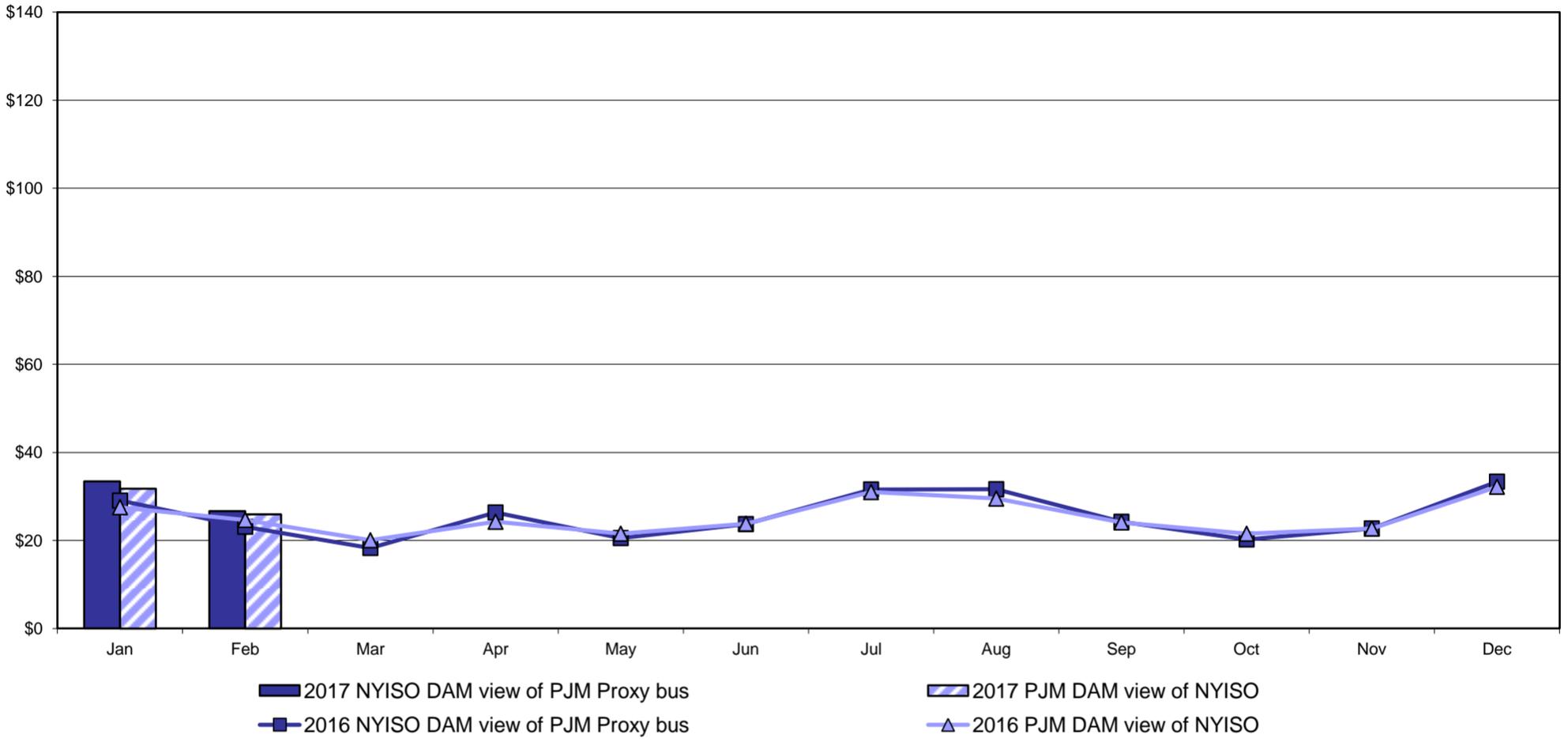


### Real Time Market External Zone Comparison: ISO-NE (\$/MWh)

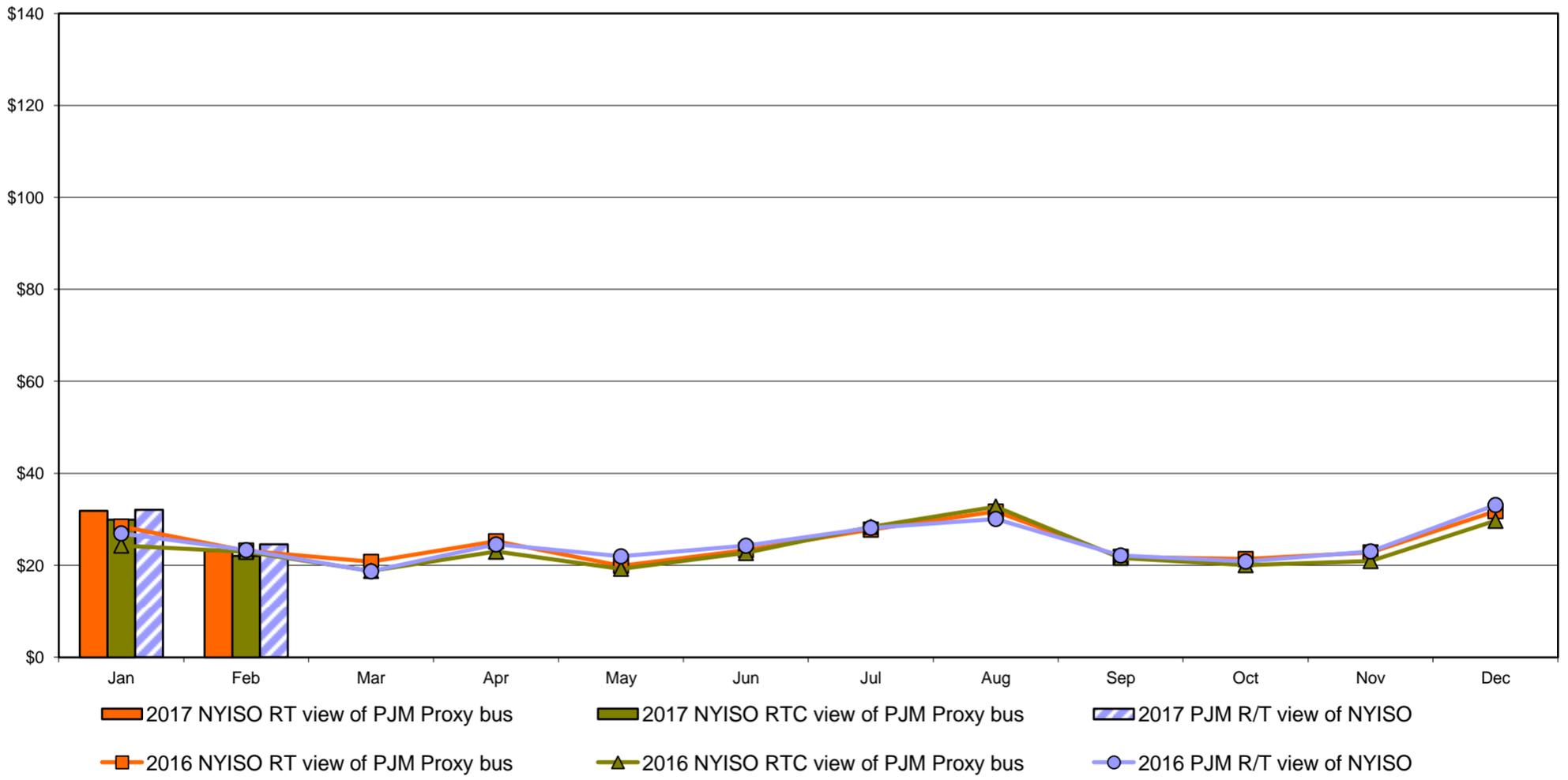


# External Comparison PJM

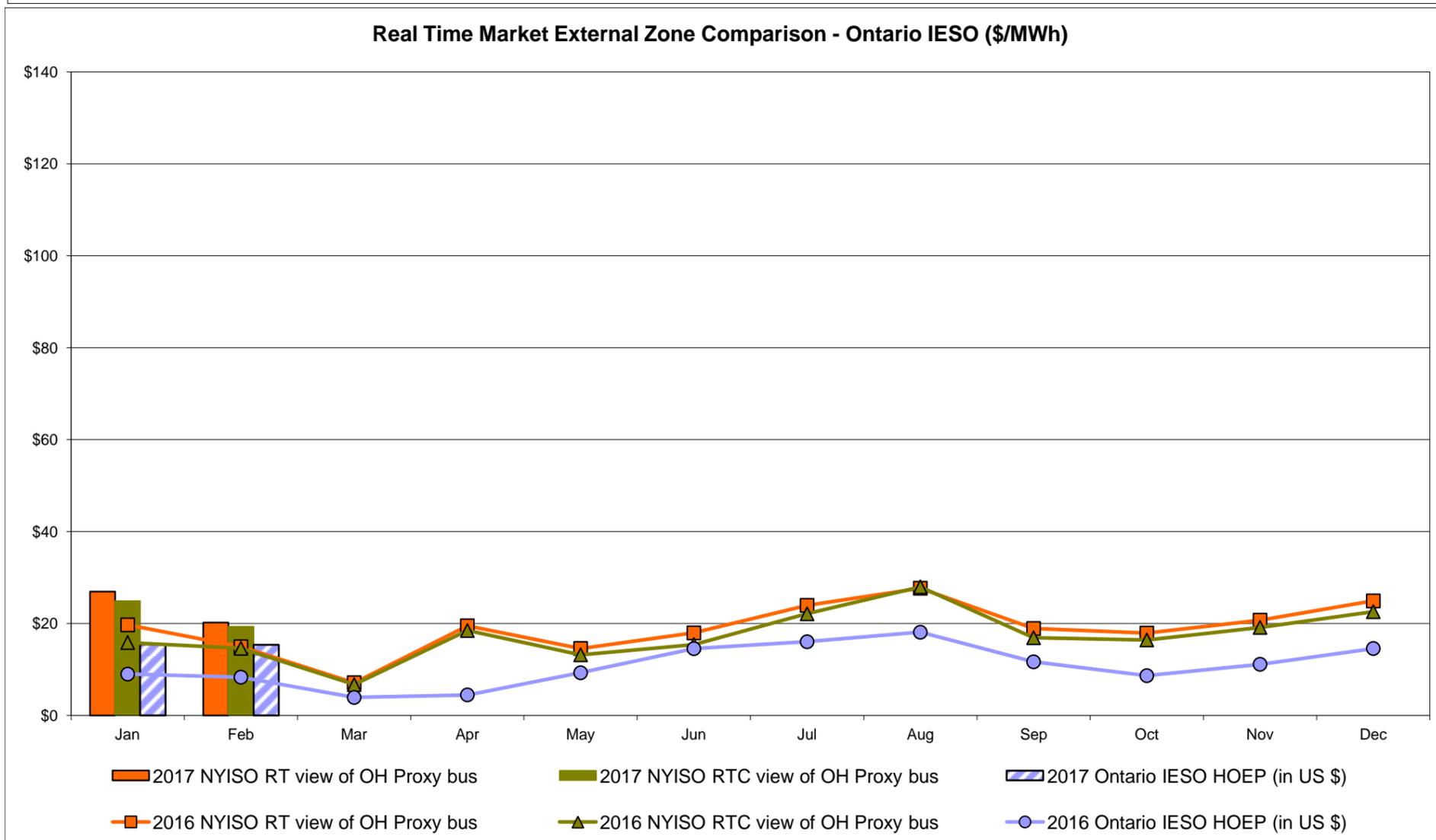
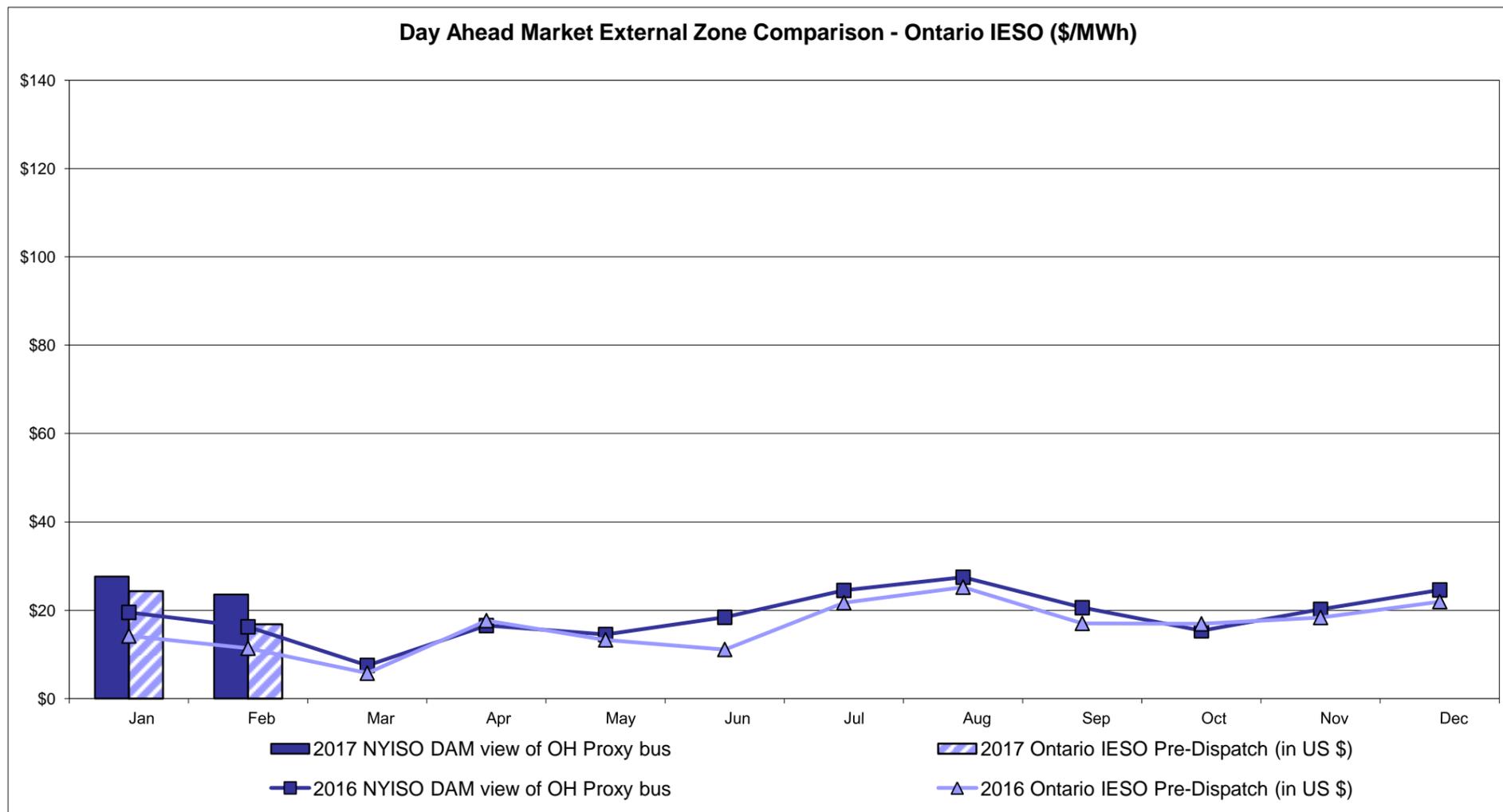
## Day Ahead Market External Zone Comparison - PJM (\$/MWh)



## Real Time Market External Zone Comparison - PJM (\$/MWh)

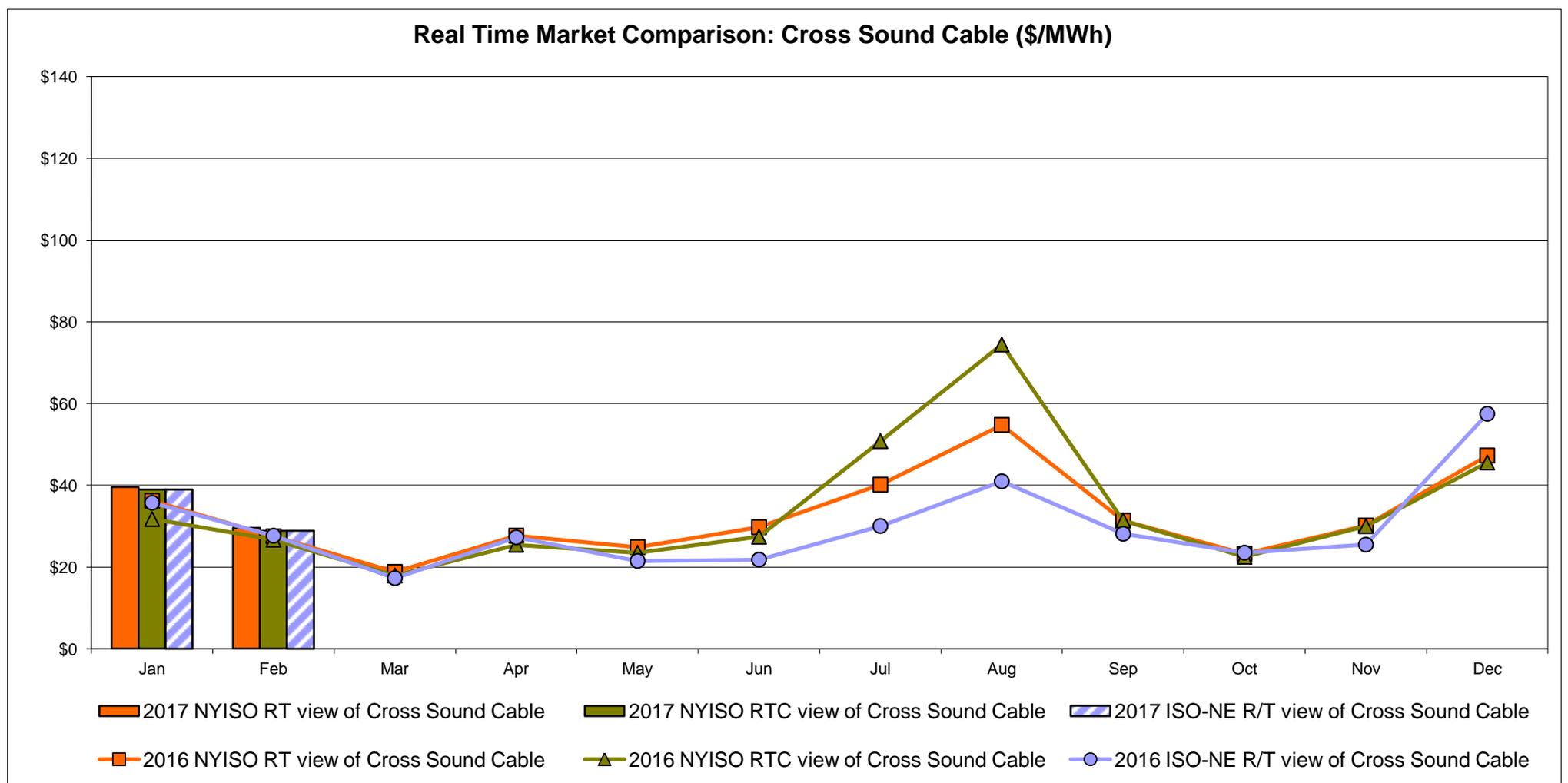
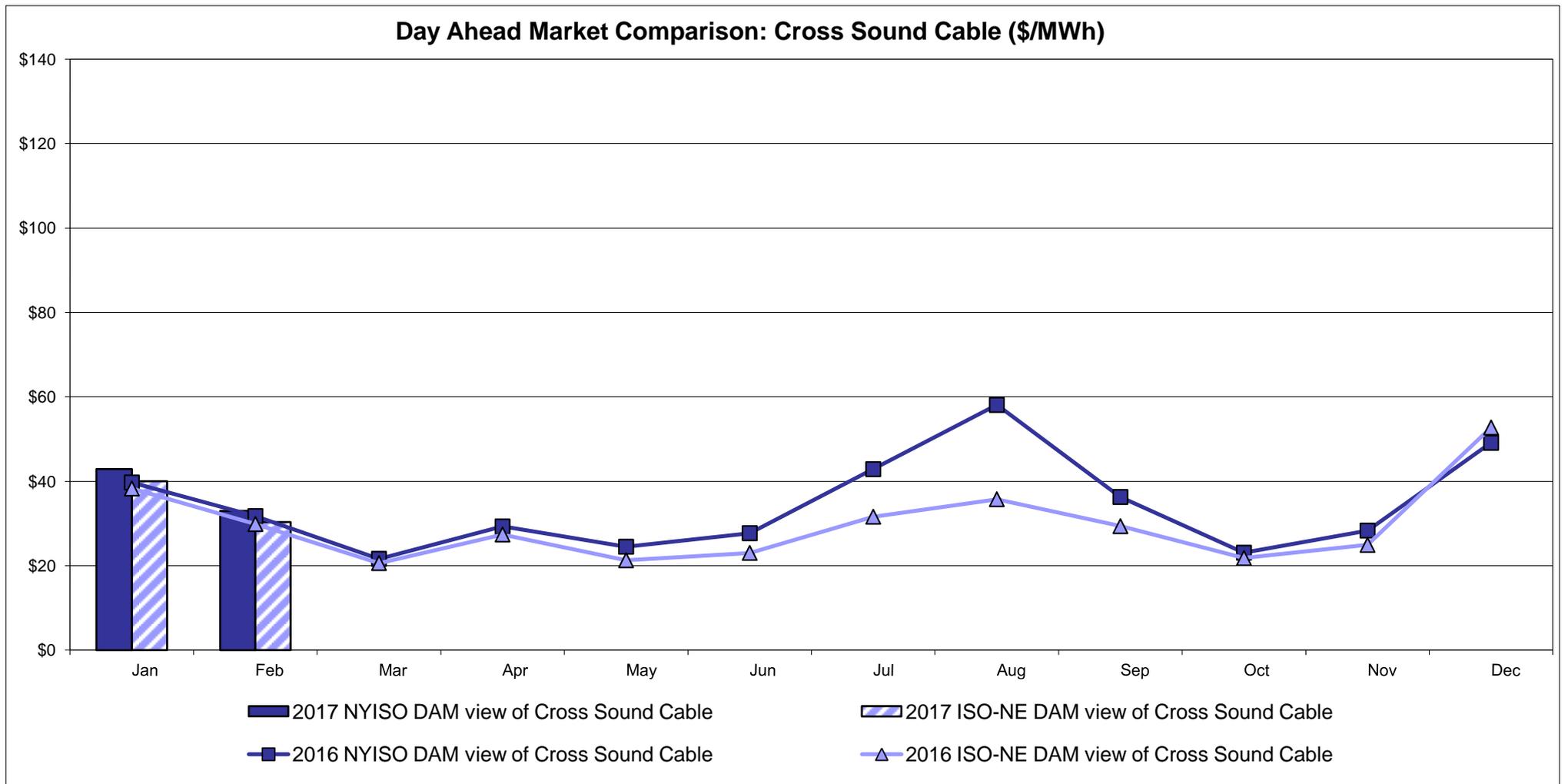


# External Comparison Ontario IESO



Notes: Exchange factor used for February 2017 was 0.763242253 to US  
 HOEP: Hourly Ontario Energy Price  
 Pre-Dispatch: Projected Energy Price

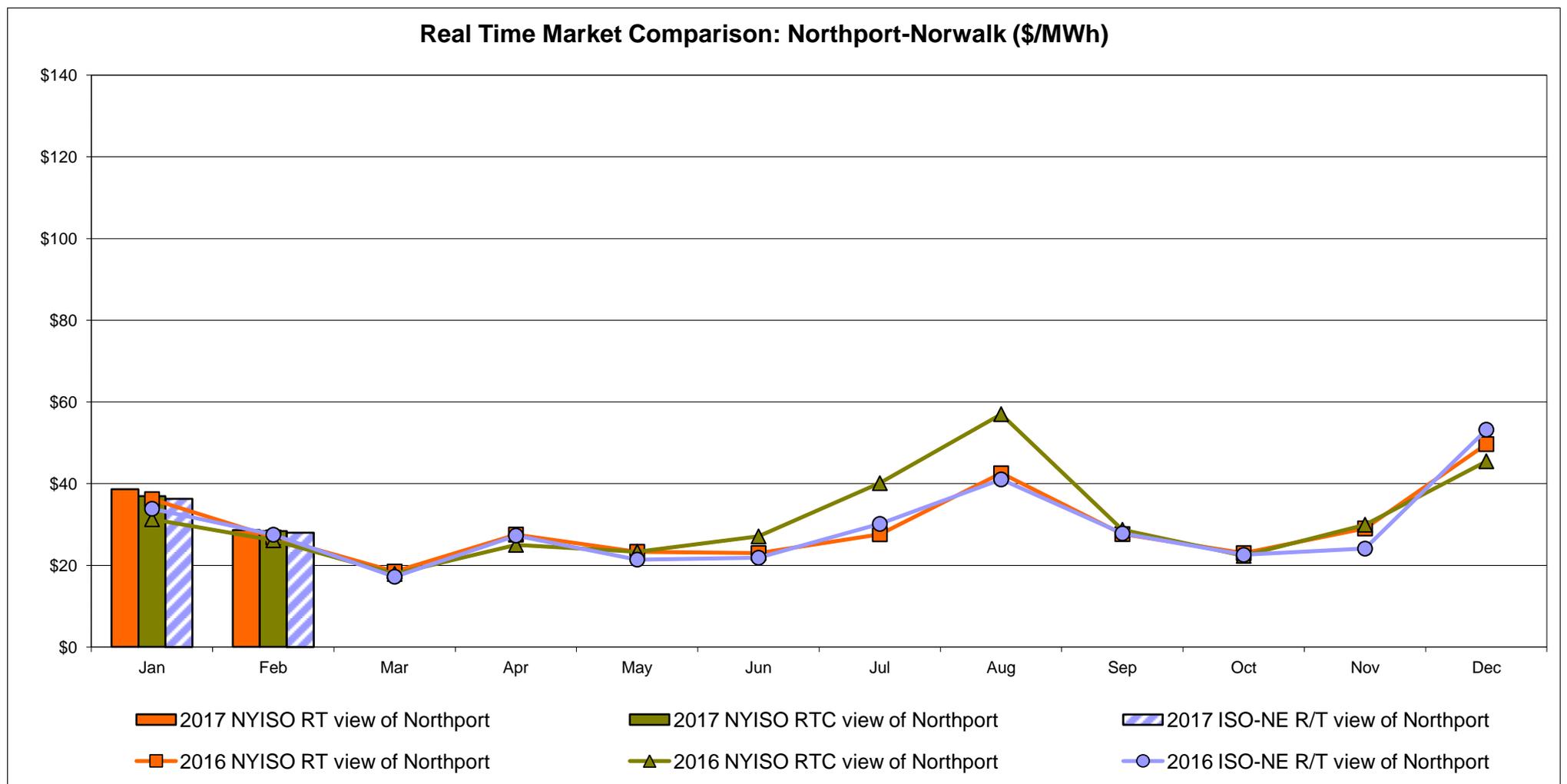
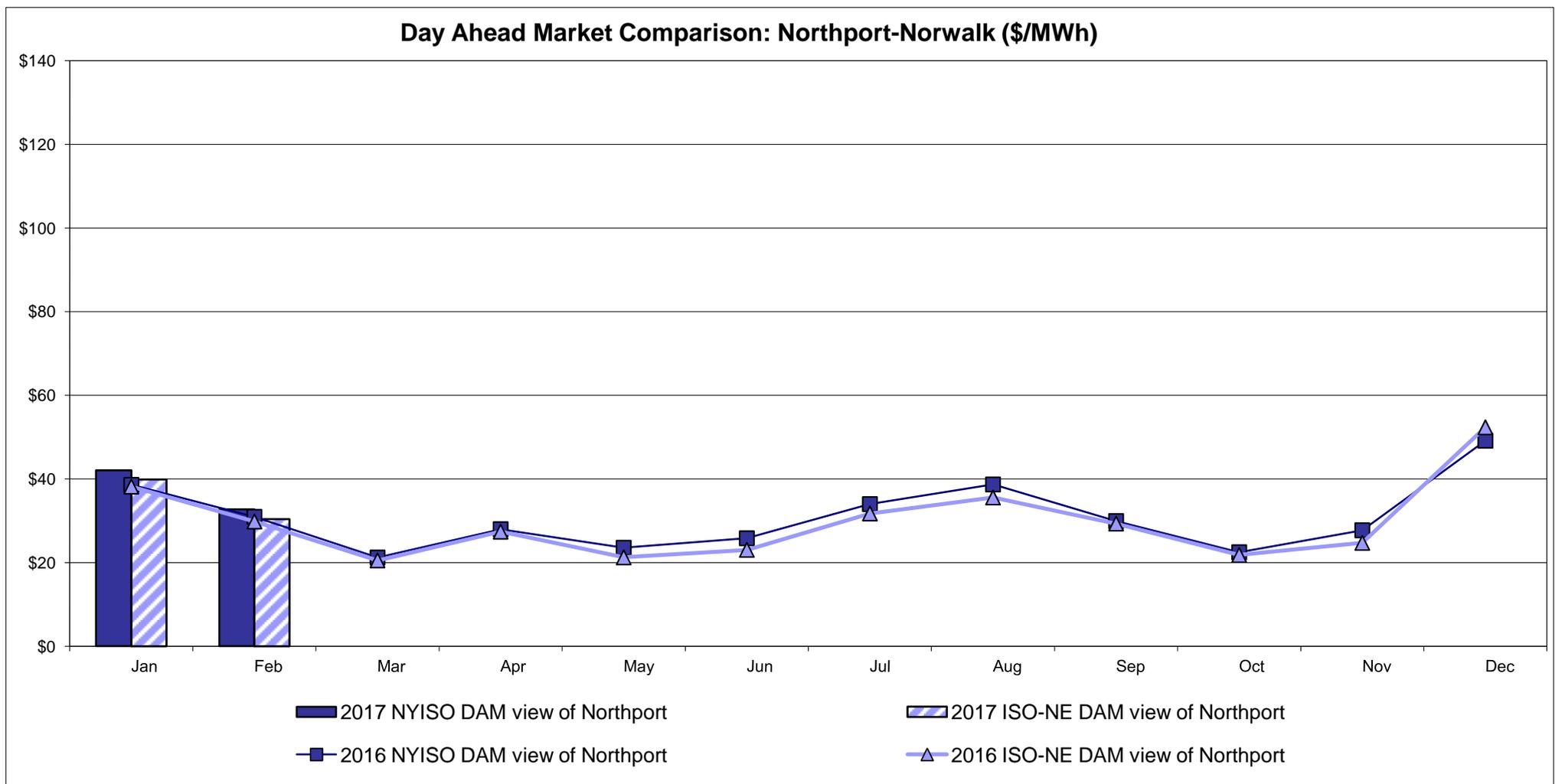
# External Controllable Line: Cross Sound Cable (New England)



**Note:**

ISO-NE Forecast is an advisory posting @ 18:00 day before.  
 The DAM and R/T prices at the Shorham 13899 interface are used for ISO-NE.  
 The DAM and R/T prices at the CSC interface are used for NYISO.

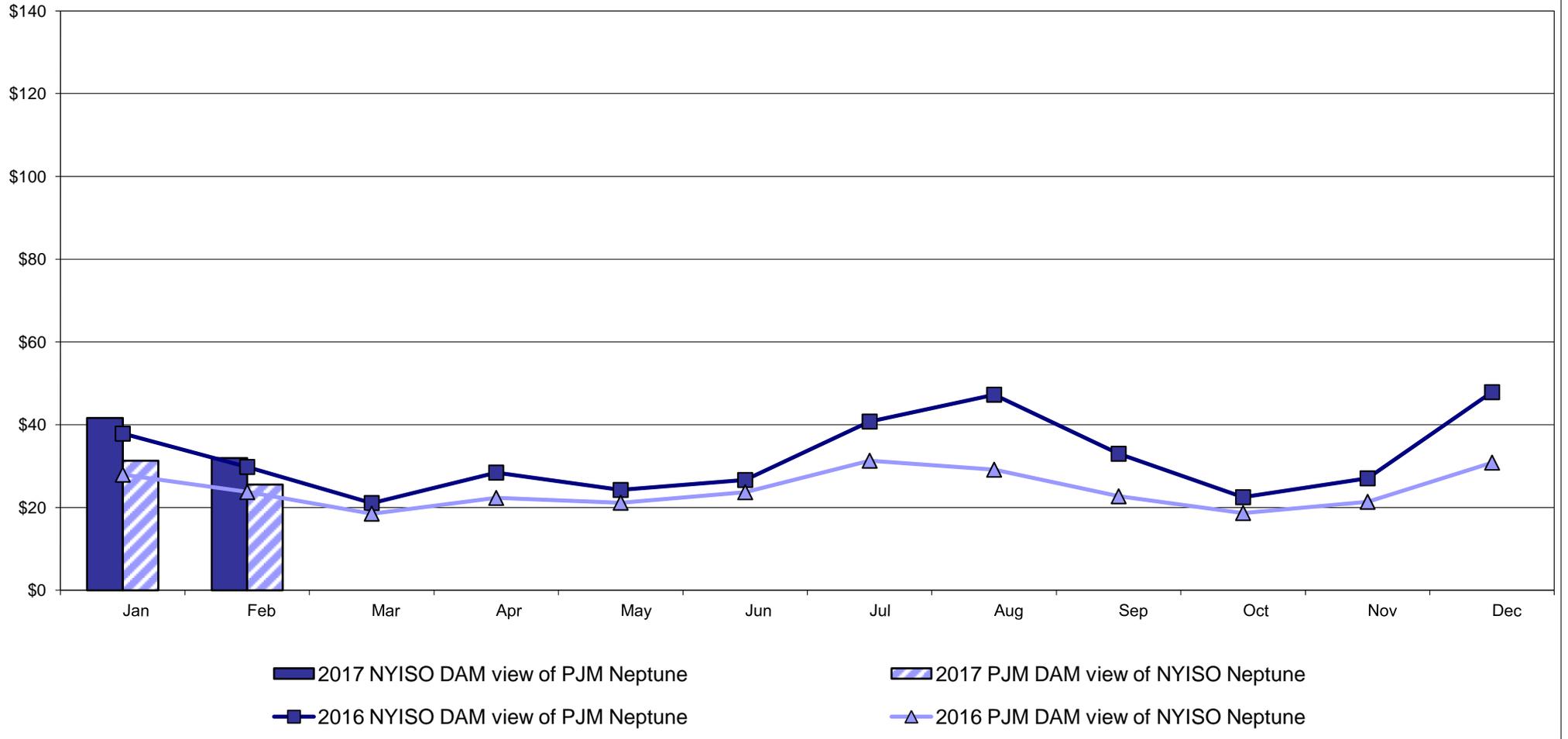
# External Controllable Line: Northport - Norwalk (New England)



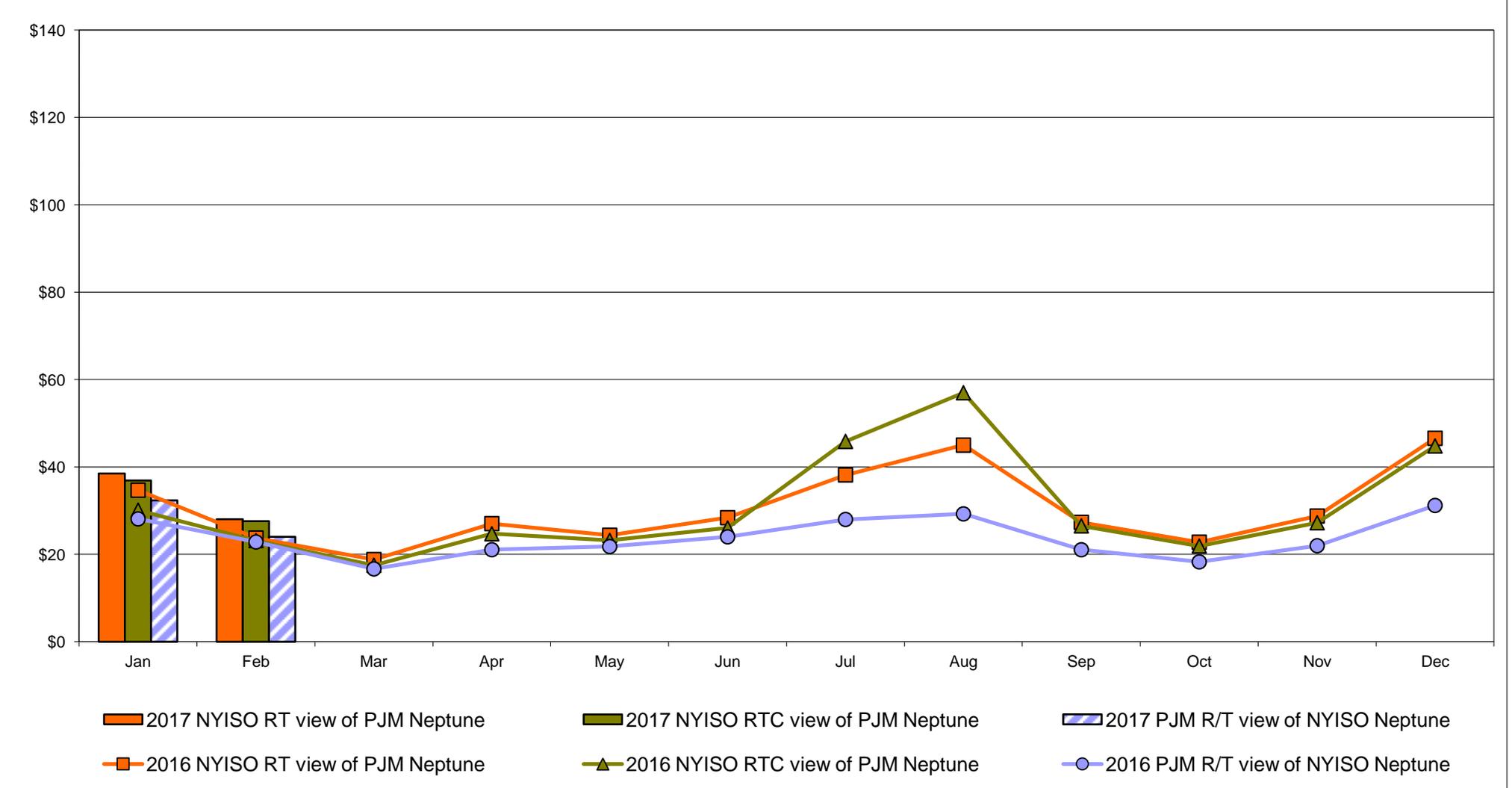
Note:  
 ISO-NE Forecast is an advisory posting @ 18:00 day before.  
 The DAM and R/T prices at the Northport 138 interface are used for ISO-NE.  
 The DAM and R/T prices at the 1385 interface are used for NYISO.

# External Controllable Line: Neptune (PJM)

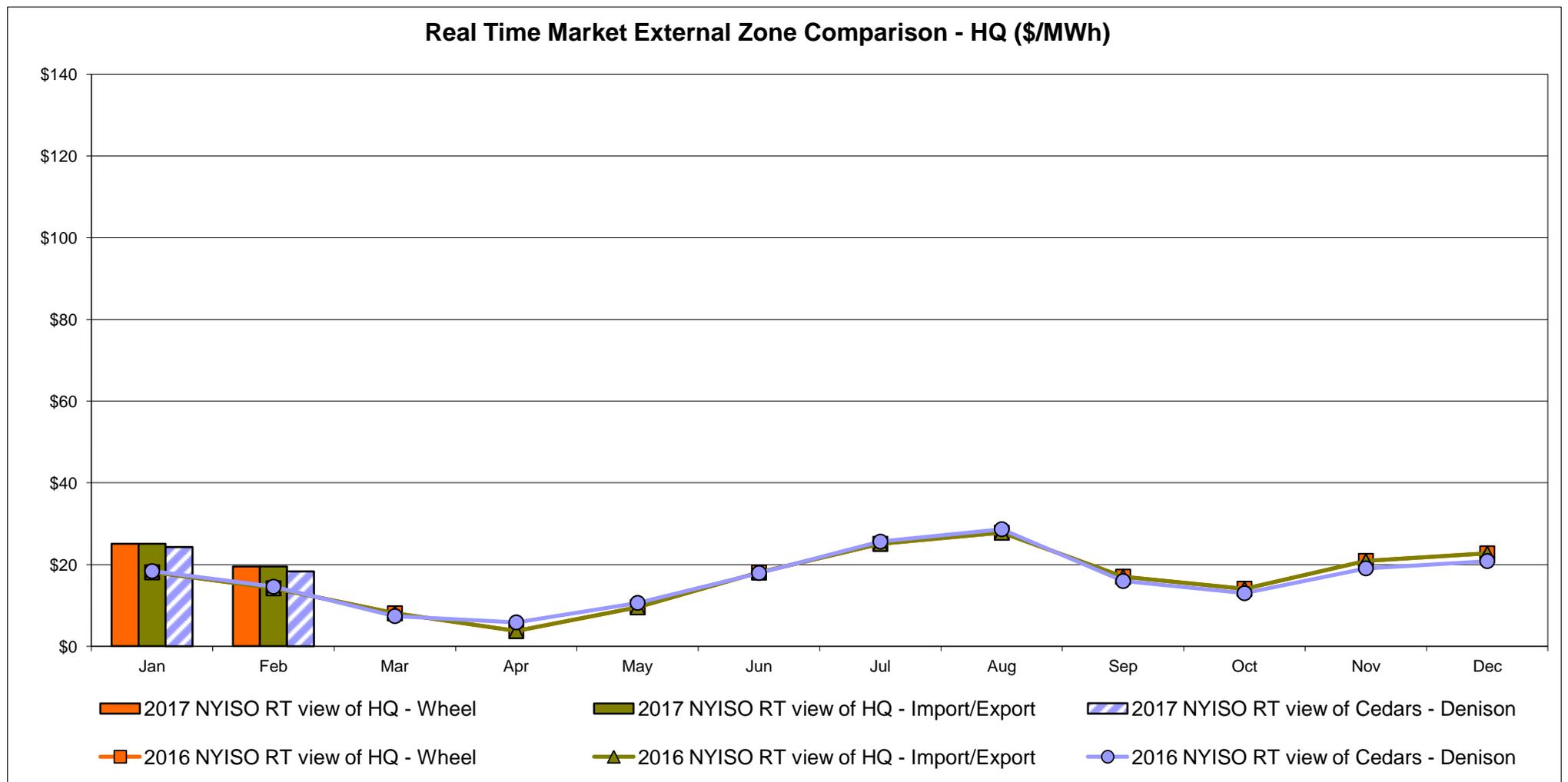
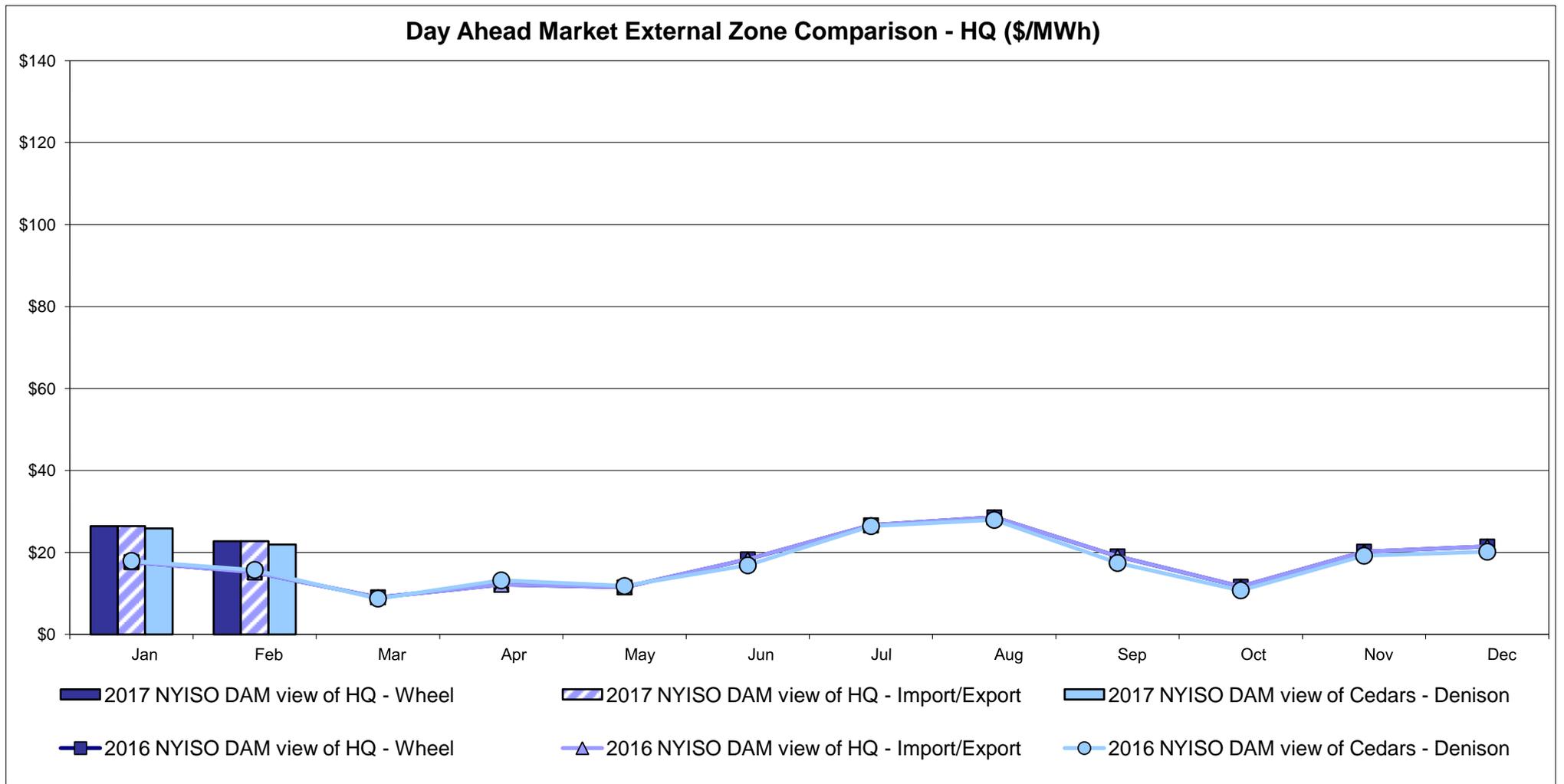
### Day Ahead Market Comparison: Neptune (\$/MWh)



### Real Time Market Comparison: Neptune (\$/MWh)

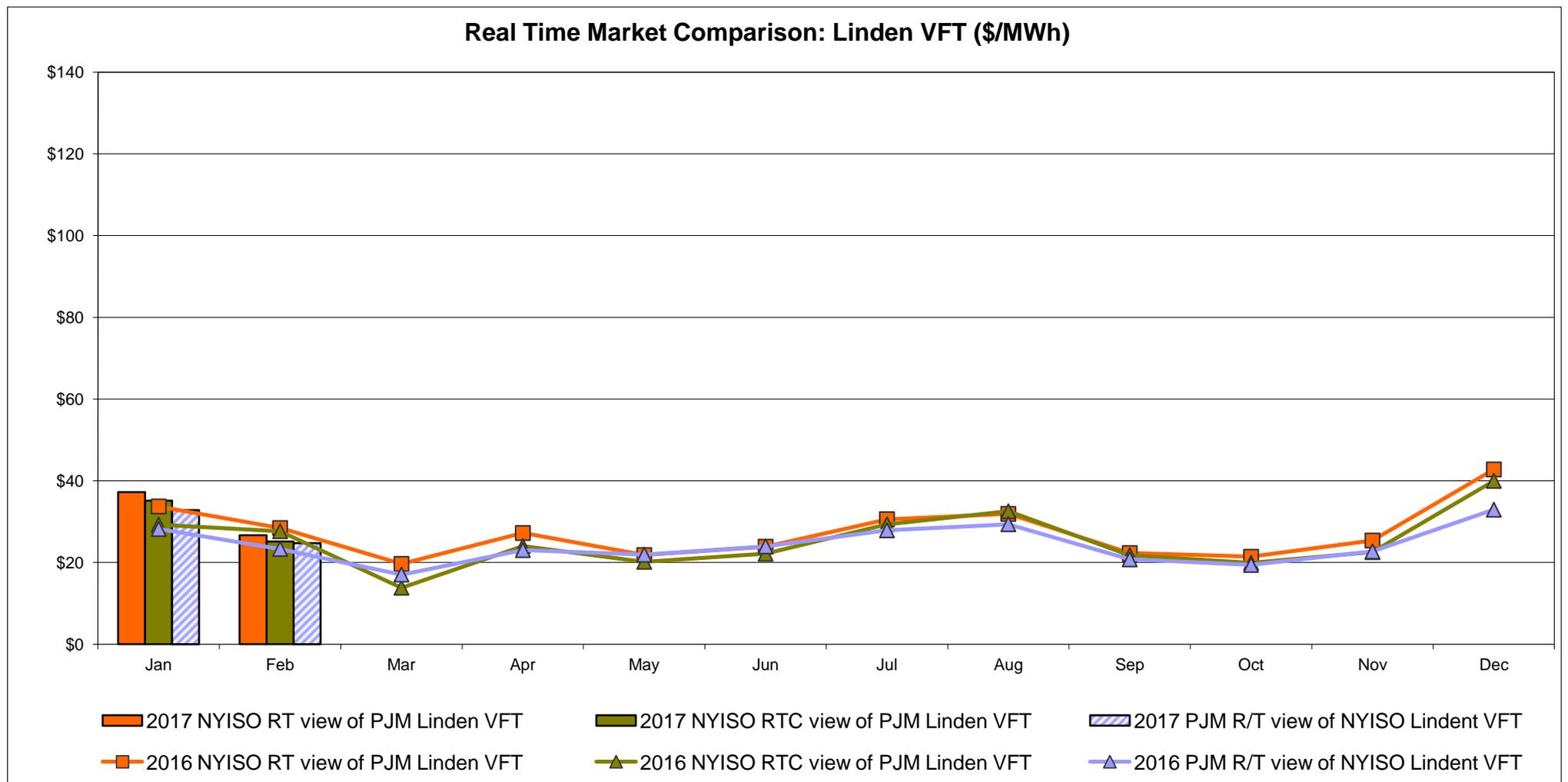
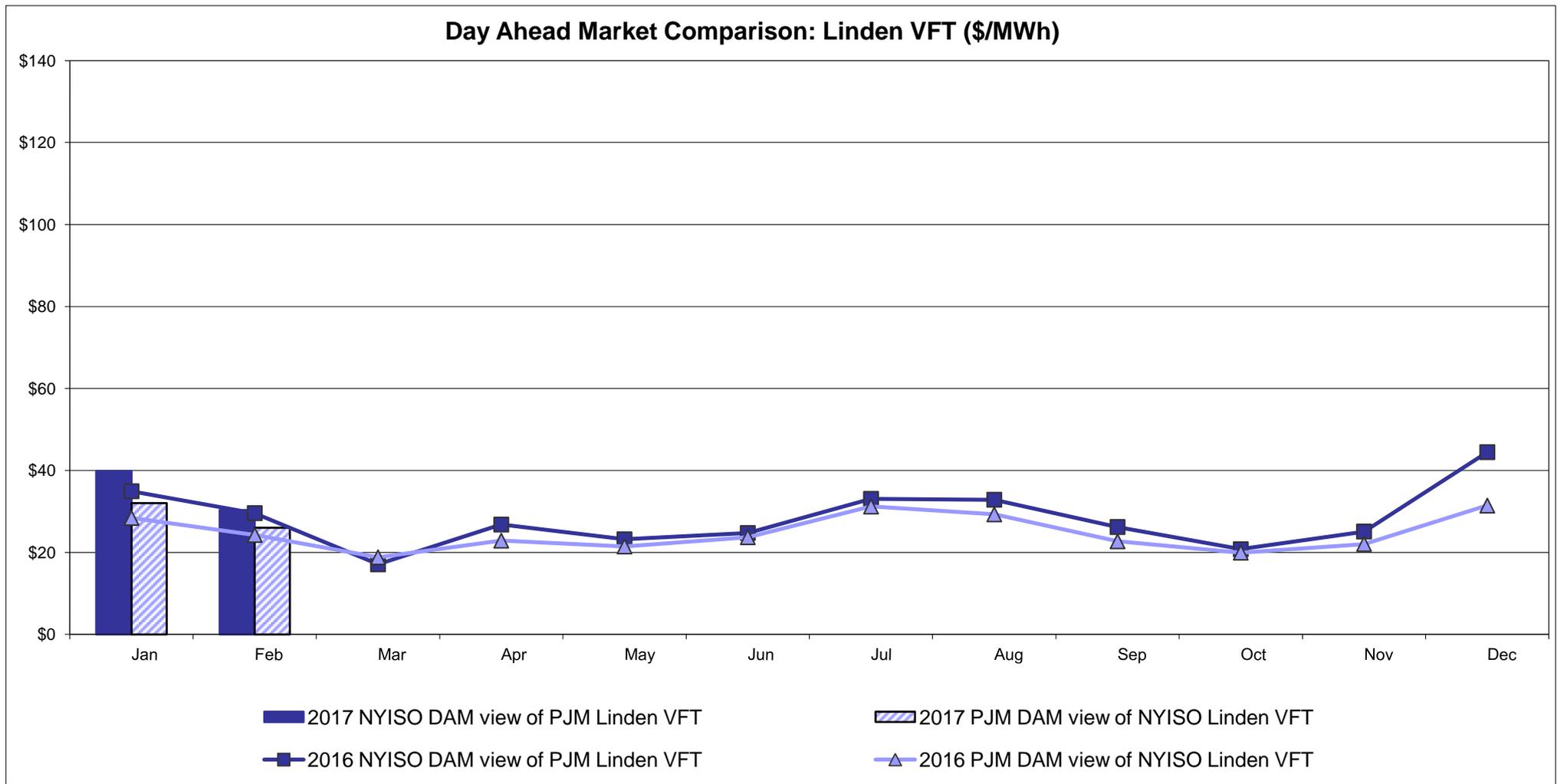


# External Comparison Hydro-Quebec

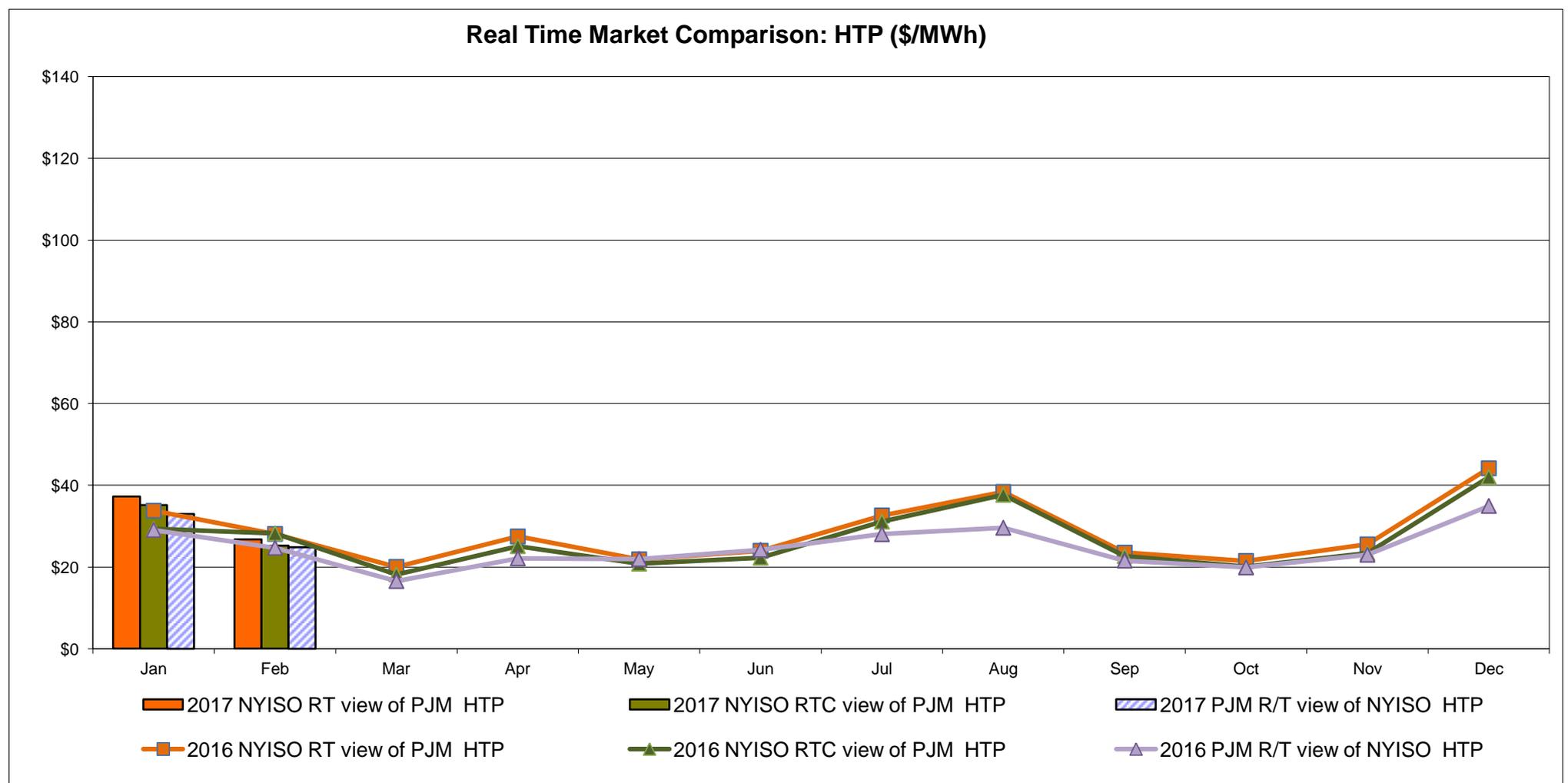
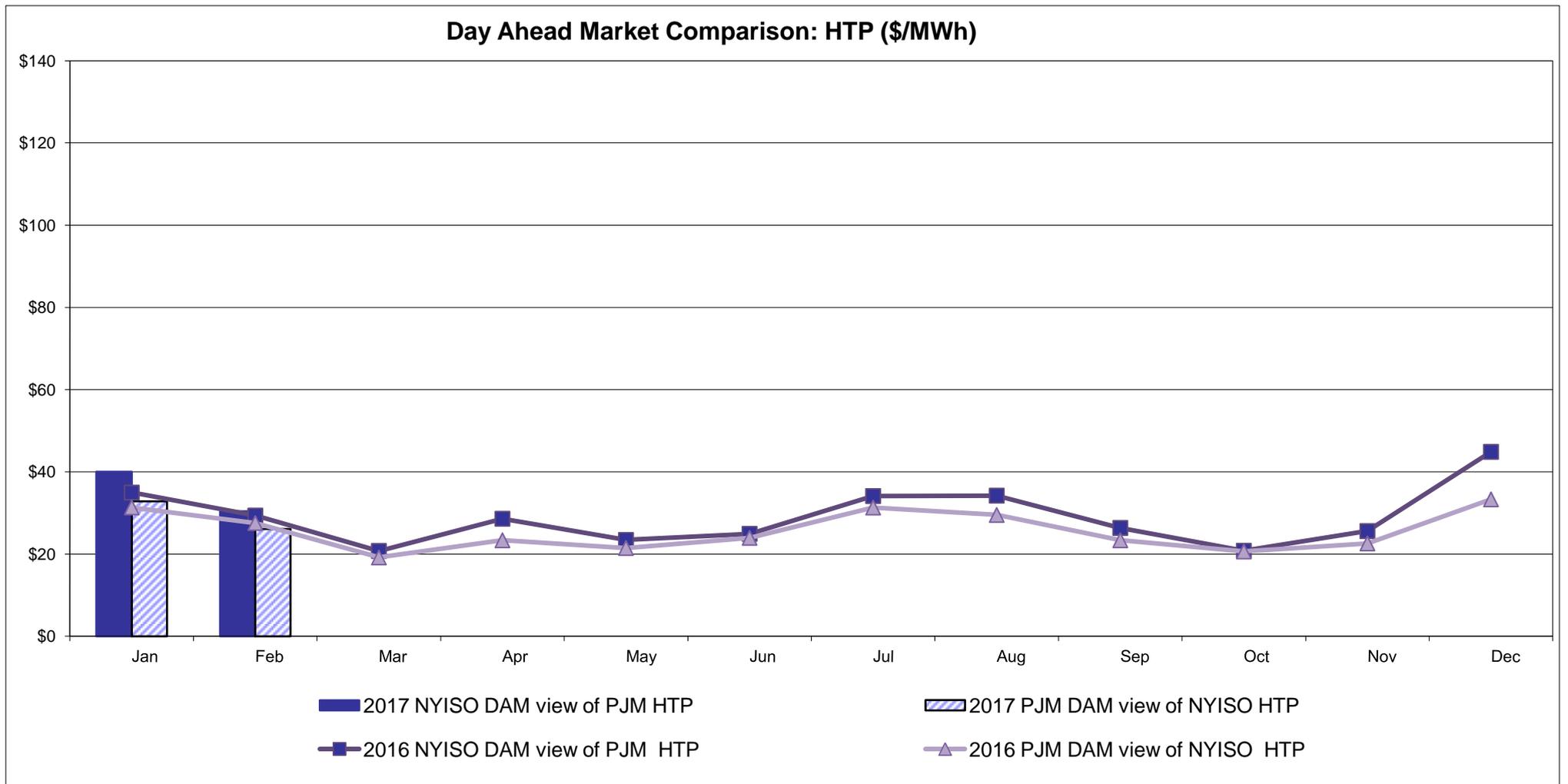


Note:  
Hydro-Quebec Prices are unavailable.

## External Controllable Line: Linden VFT (PJM)



## External Controllable Line: Hudson (PJM)

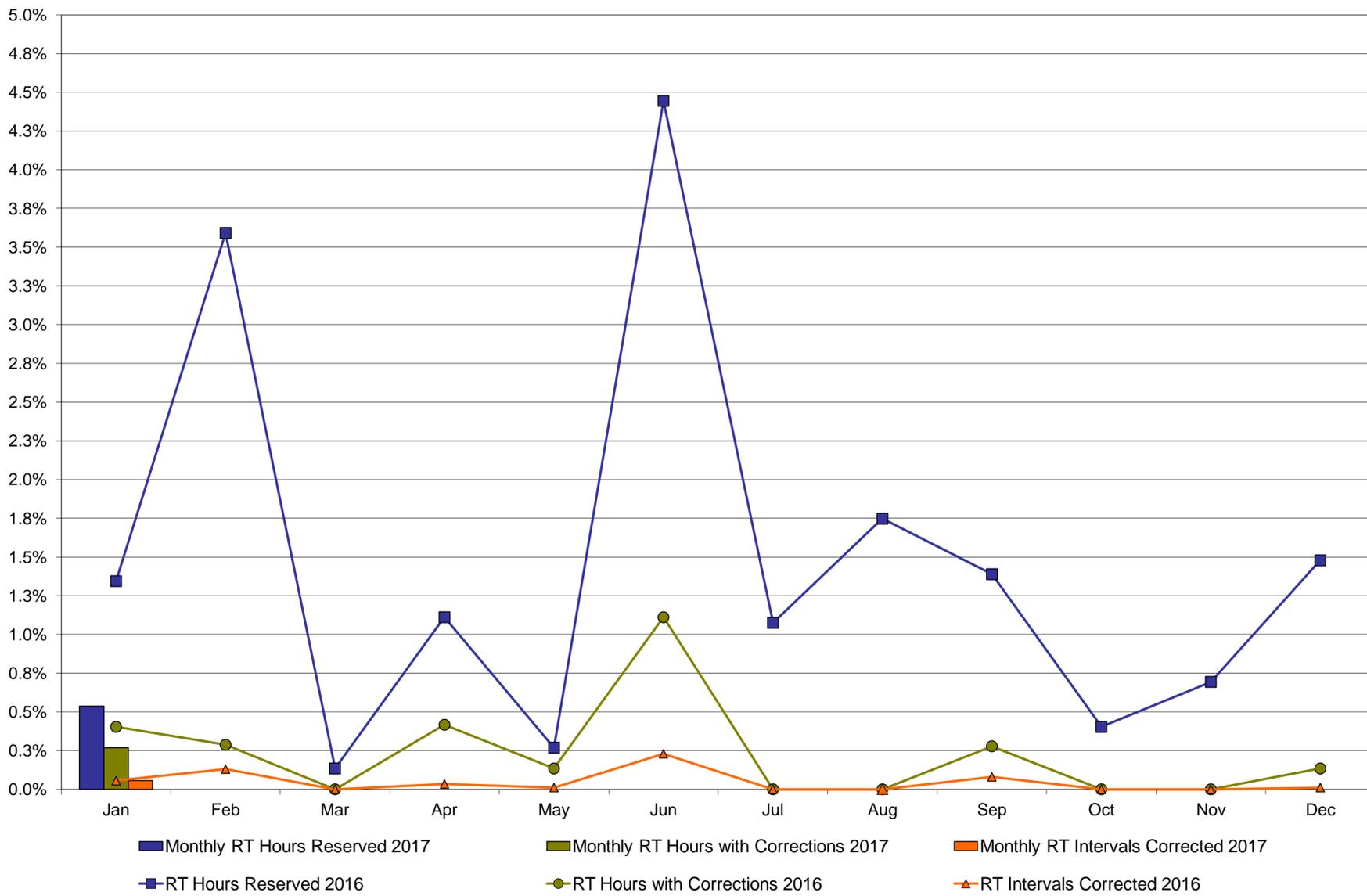


**NYISO Real Time Price Correction Statistics**

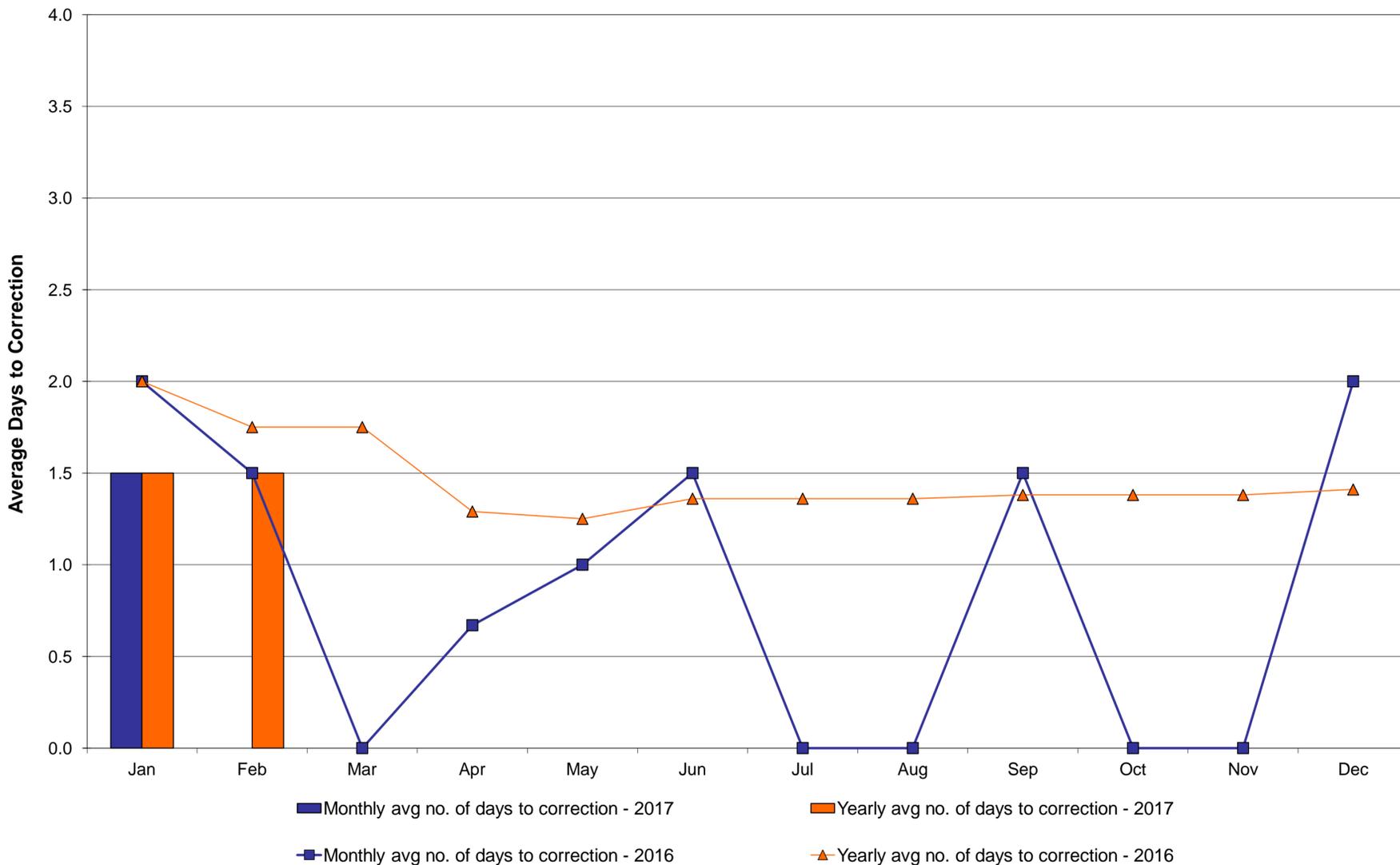
<b>2017</b>		<u>January</u>	<u>February</u>	<u>March</u>	<u>April</u>	<u>May</u>	<u>June</u>	<u>July</u>	<u>August</u>	<u>September</u>	<u>October</u>	<u>November</u>	<u>December</u>
<b>Hour Corrections</b>													
Number of hours with corrections	in the month	2	0										
Number of hours	in the month	744	672										
% of hours with corrections	in the month	0.27%	0.00%										
% of hours with corrections	year-to-date	0.27%	0.14%										
<b>Interval Corrections</b>													
Number of intervals corrected	in the month	5	0										
Number of intervals	in the month	8,983	8,101										
% of intervals corrected	in the month	0.06%	0.00%										
% of intervals corrected	year-to-date	0.06%	0.03%										
<b>Hours Reserved</b>													
Number of hours reserved	in the month	4	0										
Number of hours	in the month	744	672										
% of hours reserved	in the month	0.54%	0.00%										
% of hours reserved	year-to-date	0.54%	0.28%										
<b>Days to Correction *</b>													
Avg. number of days to correction	in the month	1.50	0.00										
Avg. number of days to correction	year-to-date	1.50	1.50										
<b>Days Without Corrections</b>													
Days without corrections	in the month	29	28										
Days without corrections	year-to-date	29	57										
<b>2016</b>		<u>January</u>	<u>February</u>	<u>March</u>	<u>April</u>	<u>May</u>	<u>June</u>	<u>July</u>	<u>August</u>	<u>September</u>	<u>October</u>	<u>November</u>	<u>December</u>
<b>Hour Corrections</b>													
Number of hours with corrections	in the month	3	2	0	3	1	8	0	0	2	0	0	1
Number of hours	in the month	744	696	743	720	744	720	744	744	720	744	721	744
% of hours with corrections	in the month	0.40%	0.29%	0.00%	0.42%	0.13%	1.11%	0.00%	0.00%	0.28%	0.00%	0.00%	0.13%
% of hours with corrections	year-to-date	0.40%	0.35%	0.23%	0.28%	0.25%	0.39%	0.33%	0.29%	0.29%	0.26%	0.24%	0.23%
<b>Interval Corrections</b>													
Number of intervals corrected	in the month	5	11	0	3	1	20	0	0	7	0	0	1
Number of intervals	in the month	9,000	8,440	8,995	8,724	8,987	8,725	9,038	9,048	8,713	8,960	8,724	9,034
% of intervals corrected	in the month	0.06%	0.13%	0.00%	0.03%	0.01%	0.23%	0.00%	0.00%	0.08%	0.00%	0.00%	0.01%
% of intervals corrected	year-to-date	0.06%	0.09%	0.06%	0.05%	0.05%	0.08%	0.06%	0.06%	0.06%	0.05%	0.05%	0.05%
<b>Hours Reserved</b>													
Number of hours reserved	in the month	10	25	1	8	2	32	8	13	10	3	5	11
Number of hours	in the month	744	696	743	720	744	720	744	744	720	744	721	744
% of hours reserved	in the month	1.34%	3.59%	0.13%	1.11%	0.27%	4.44%	1.08%	1.75%	1.39%	0.40%	0.69%	1.48%
% of hours reserved	year-to-date	1.34%	2.43%	1.65%	1.52%	1.26%	1.79%	1.68%	1.69%	1.66%	1.53%	1.46%	1.46%
<b>Days to Correction *</b>													
Avg. number of days to correction	in the month	2.00	1.50	0.00	0.67	1.00	1.50	0.00	0.00	1.50	0.00	0.00	2.00
Avg. number of days to correction	year-to-date	2.00	1.75	1.75	1.29	1.25	1.36	1.36	1.36	1.38	1.38	1.38	1.41
<b>Days Without Corrections</b>													
Days without corrections	in the month	29	27	31	27	30	24	31	31	28	31	30	30
Days without corrections	year-to-date	29	56	87	114	144	168	199	230	258	289	319	349

\* Calendar days from reservation date.

### Percentage of Real-Time Corrections

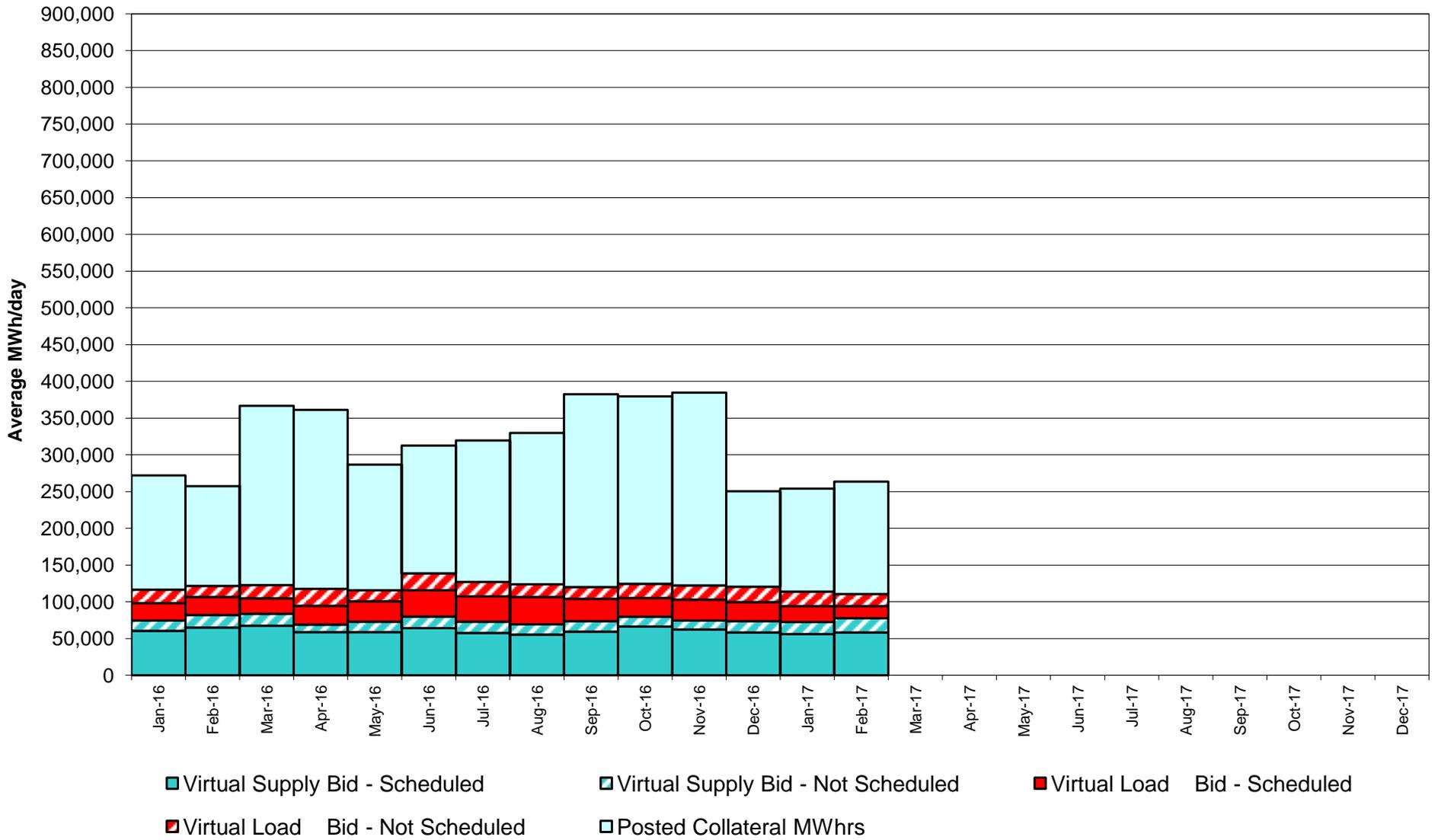


### Annual average time period for making Price Corrections (from reservation date) \*

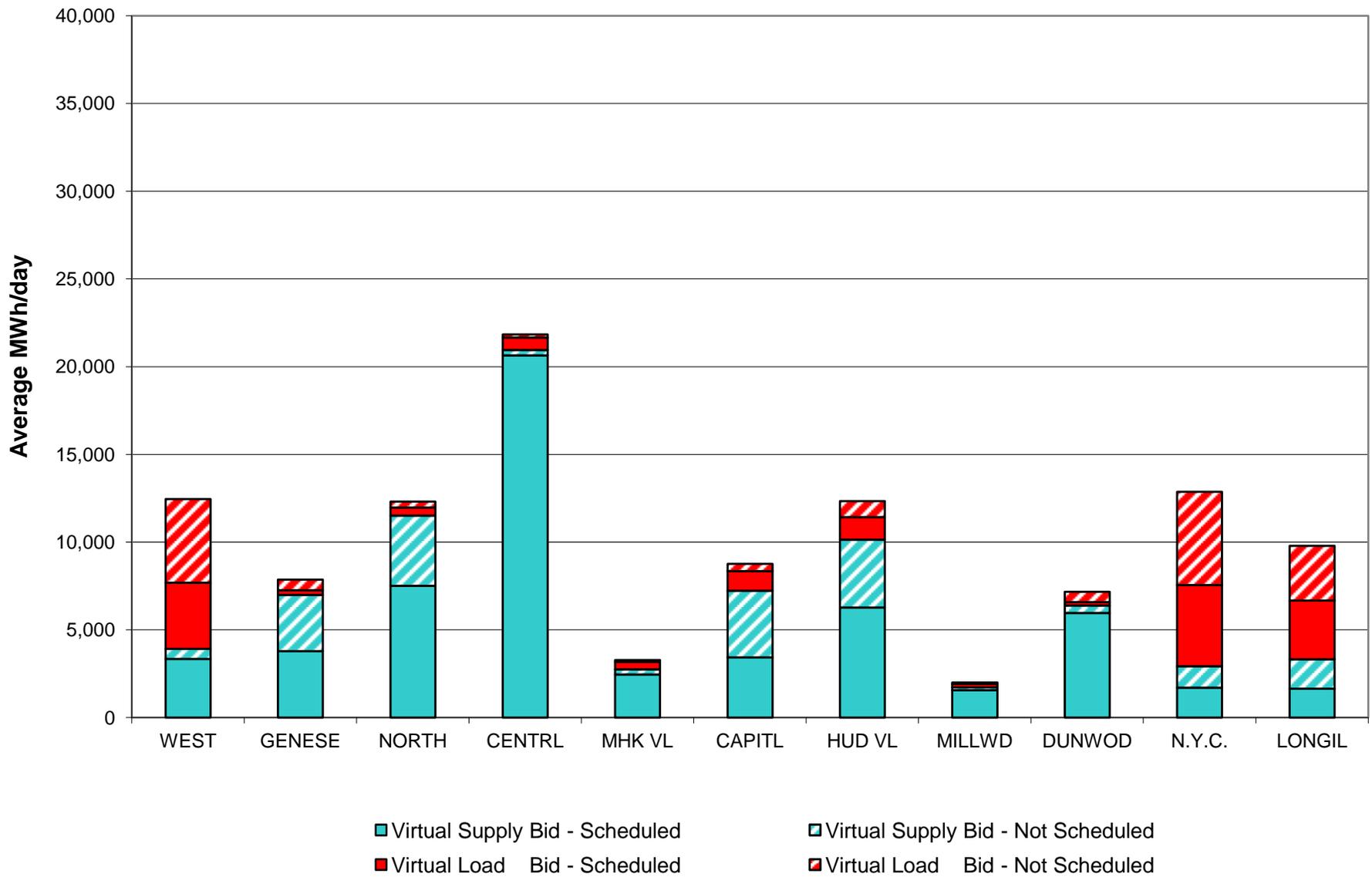


\* Calendar days from reservation date.

### NYISO Virtual Trading Average MWh per day



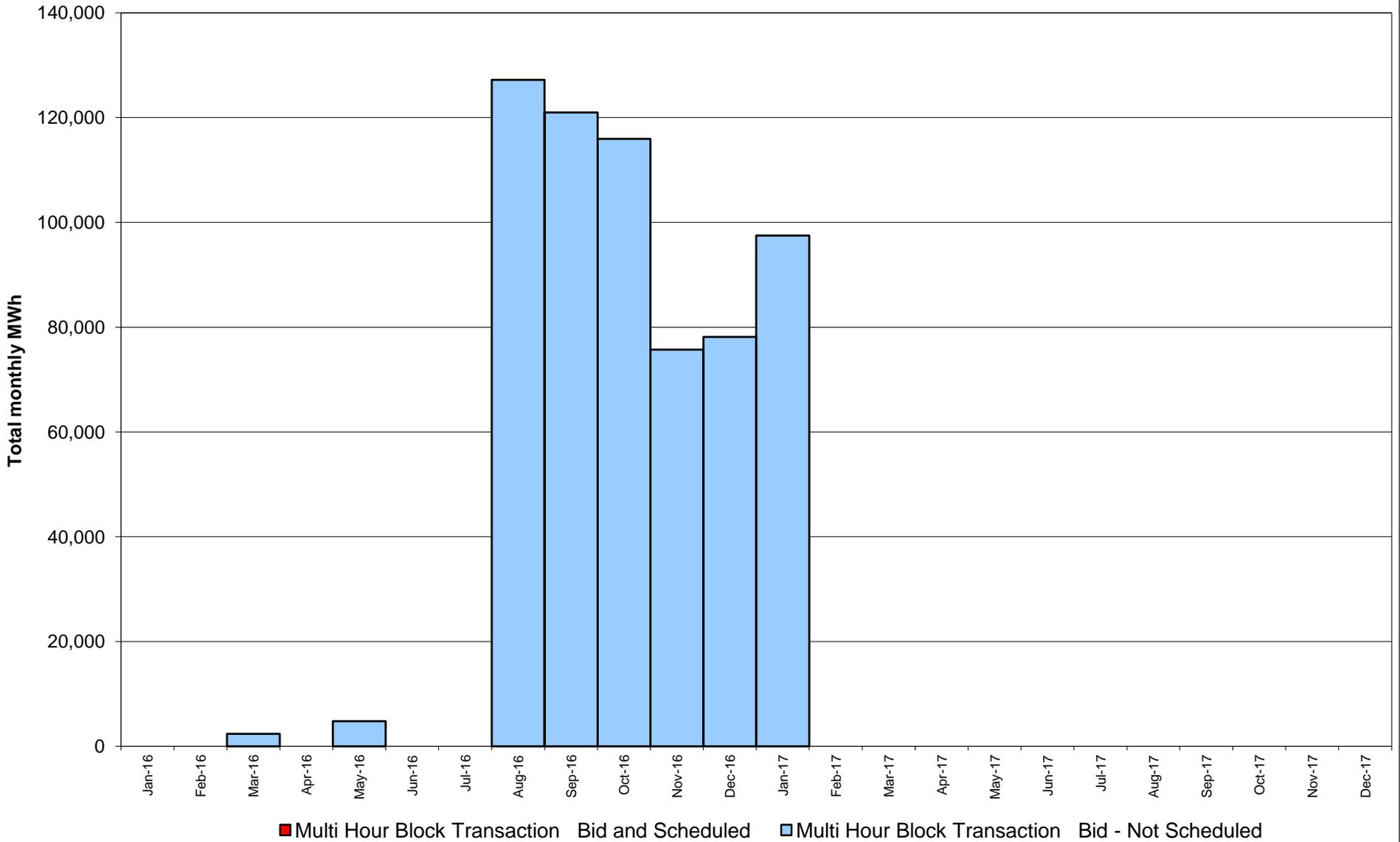
### Virtual Load and Supply Zonal Statistics through February 28, 2017



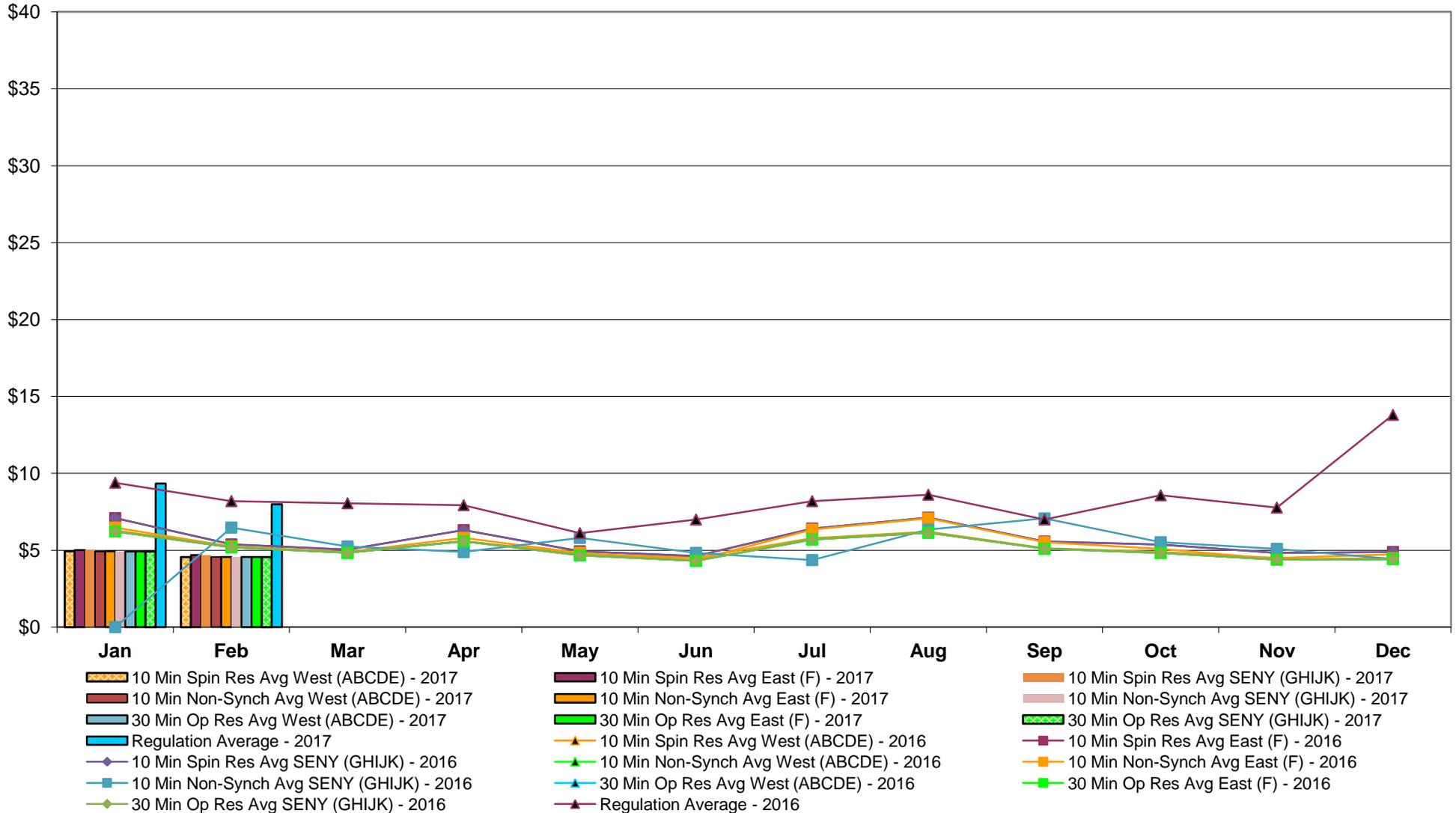
**Virtual Load and Supply Zonal Statistics (Average MWh/day) - 2017**

		Virtual Load Bid		Virtual Supply Bid				Virtual Load Bid		Virtual Supply Bid				Virtual Load Bid		Virtual Supply Bid	
Zone	Date	Scheduled	Not Scheduled	Scheduled	Not Scheduled	Zone	Date	Scheduled	Not Scheduled	Scheduled	Not Scheduled	Zone	Date	Scheduled	Not Scheduled	Scheduled	Not Scheduled
<b>WEST</b>	Jan-17	6,094	5,795	2,019	337	<b>MHK VL</b>	Jan-17	566	202	2,022	131	<b>DUNWOD</b>	Jan-17	304	832	5,708	389
	Feb-17	3,771	4,772	3,346	567		Feb-17	422	100	2,459	293		Feb-17	193	585	5,966	424
	Mar-17						Mar-17						Mar-17				
	Apr-17						Apr-17						Apr-17				
	May-17						May-17						May-17				
	Jun-17						Jun-17						Jun-17				
	Jul-17						Jul-17						Jul-17				
	Aug-17						Aug-17						Aug-17				
	Sep-17						Sep-17						Sep-17				
	Oct-17						Oct-17						Oct-17				
	Nov-17						Nov-17						Nov-17				
	Dec-17						Dec-17						Dec-17				
<b>GENESE</b>	Jan-17	654	1,282	3,652	2,482	<b>CAPITL</b>	Jan-17	1,291	666	3,990	3,861	<b>N.Y.C.</b>	Jan-17	5,761	5,474	1,543	1,008
	Feb-17	276	600	3,782	3,206		Feb-17	1,115	409	3,432	3,798		Feb-17	4,622	5,309	1,712	1,219
	Mar-17						Mar-17						Mar-17				
	Apr-17						Apr-17						Apr-17				
	May-17						May-17						May-17				
	Jun-17						Jun-17						Jun-17				
	Jul-17						Jul-17						Jul-17				
	Aug-17						Aug-17						Aug-17				
	Sep-17						Sep-17						Sep-17				
	Oct-17						Oct-17						Oct-17				
	Nov-17						Nov-17						Nov-17				
	Dec-17						Dec-17						Dec-17				
<b>NORTH</b>	Jan-17	655	316	6,415	3,473	<b>HUD VL</b>	Jan-17	911	817	5,317	3,064	<b>LONGIL</b>	Jan-17	3,559	3,788	1,354	1,367
	Feb-17	465	338	7,504	4,006		Feb-17	1,292	915	6,266	3,873		Feb-17	3,341	3,127	1,653	1,667
	Mar-17						Mar-17						Mar-17				
	Apr-17						Apr-17						Apr-17				
	May-17						May-17						May-17				
	Jun-17						Jun-17						Jun-17				
	Jul-17						Jul-17						Jul-17				
	Aug-17						Aug-17						Aug-17				
	Sep-17						Sep-17						Sep-17				
	Oct-17						Oct-17						Oct-17				
	Nov-17						Nov-17						Nov-17				
	Dec-17						Dec-17						Dec-17				
<b>CENTRL</b>	Jan-17	1,482	455	22,561	196	<b>MILLWD</b>	Jan-17	435	91	1,422	128	<b>NYISO</b>	Jan-17	21,713	19,719	56,001	16,436
	Feb-17	707	177	20,639	320		Feb-17	202	74	1,555	164		Feb-17	16,405	16,406	58,312	19,537
	Mar-17						Mar-17						Mar-17				
	Apr-17						Apr-17						Apr-17				
	May-17						May-17						May-17				
	Jun-17						Jun-17						Jun-17				
	Jul-17						Jul-17						Jul-17				
	Aug-17						Aug-17						Aug-17				
	Sep-17						Sep-17						Sep-17				
	Oct-17						Oct-17						Oct-17				
	Nov-17						Nov-17						Nov-17				
	Dec-17						Dec-17						Dec-17				

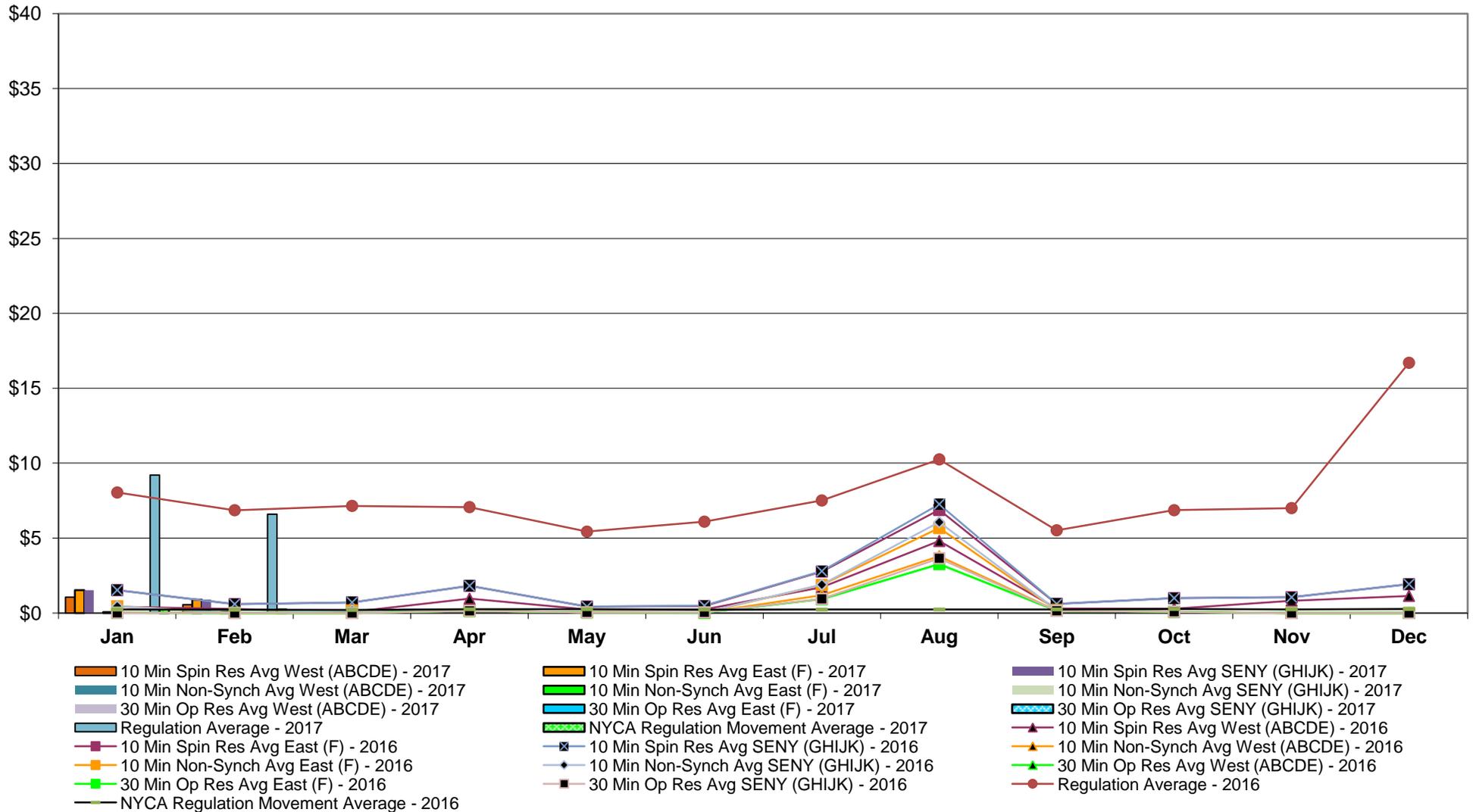
## NYISO Multi Hour Block Transactions Monthly Total MWh



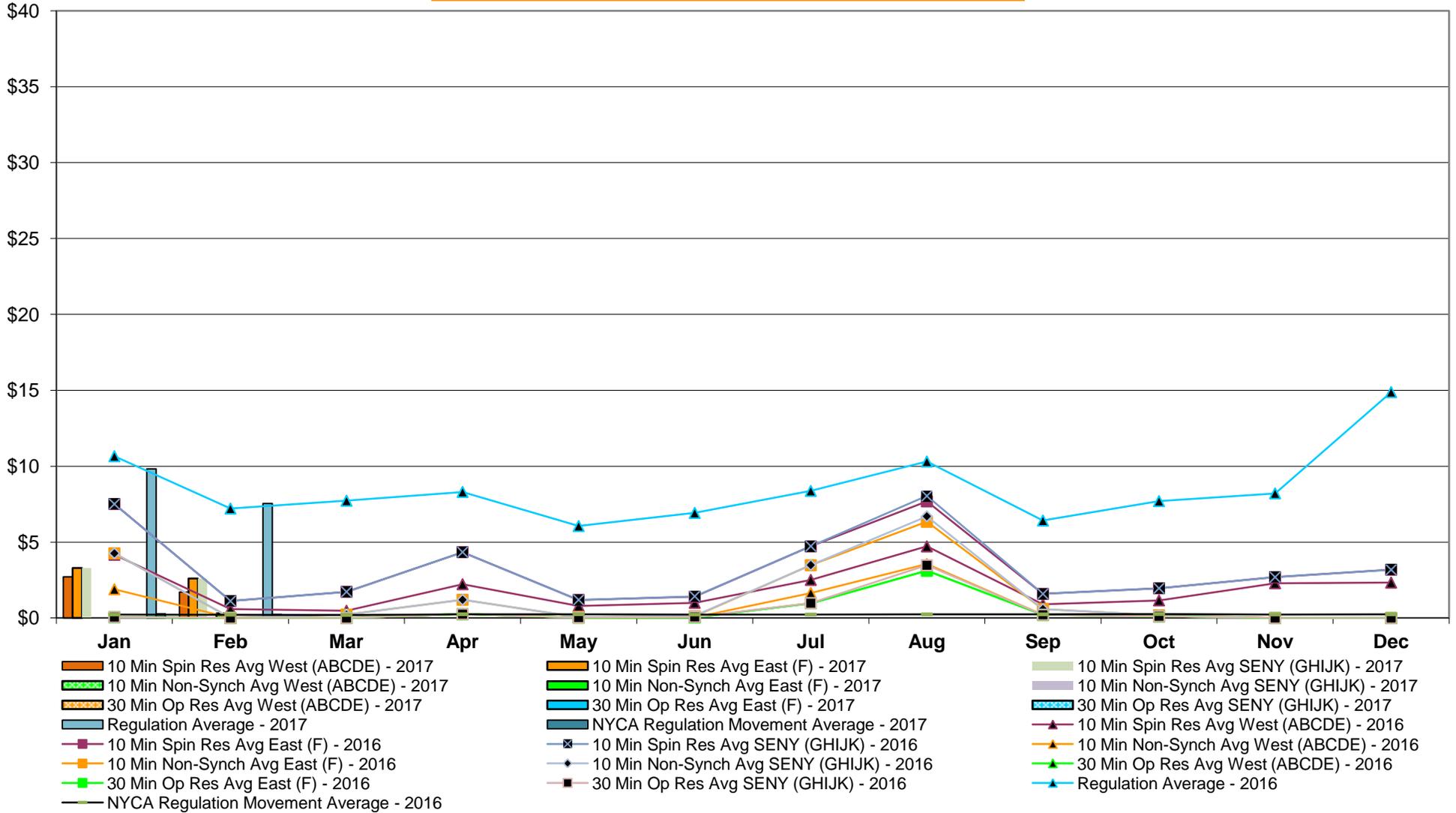
## NYISO Monthly Average Ancillary Service Prices Day Ahead Market 2016 - 2017



## NYISO Monthly Average Ancillary Service Prices RTC Market 2016 - 2017



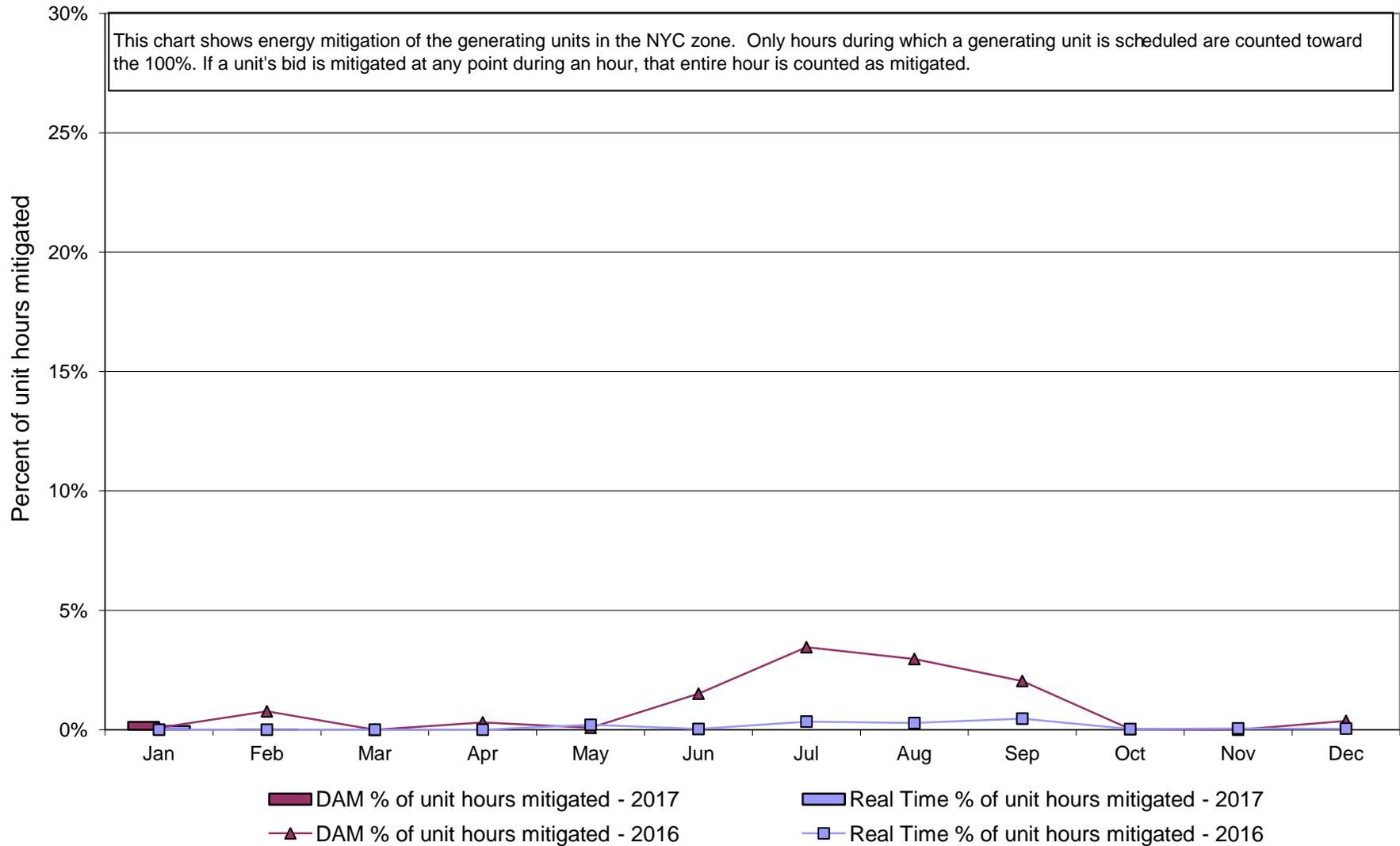
## NYISO Monthly Average Ancillary Service Prices Real Time Market 2016 - 2017



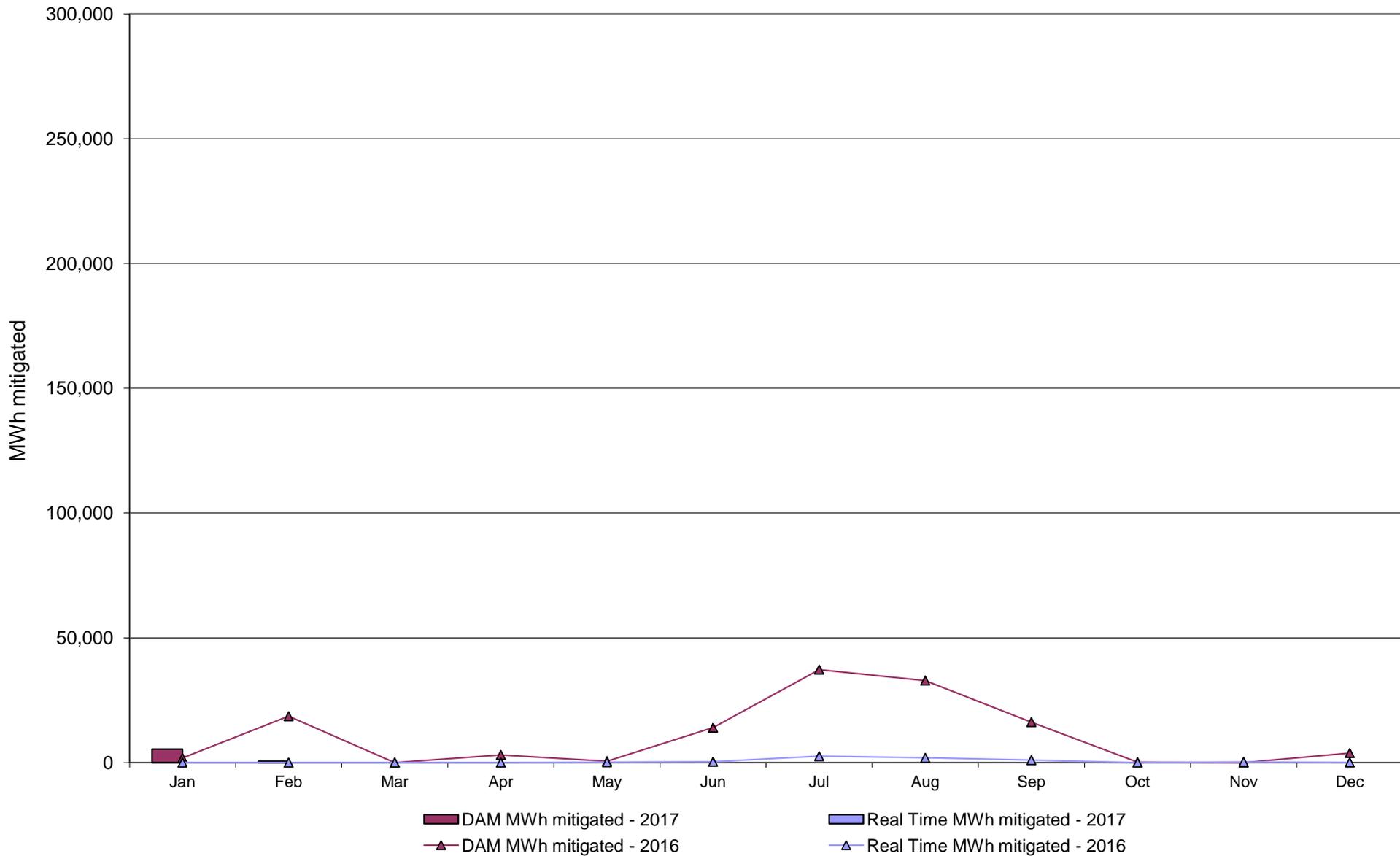
## NYISO Markets Ancillary Services Statistics - Unweighted Price (\$/MWH)

2017	January	February	March	April	May	June	July	August	September	October	November	December
<b>Day Ahead Market</b>												
10 Min Spin SENY (GHIJK)	5.01	4.68										
10 Min Spin East (F)	5.01	4.68										
10 Min Spin West (ABCDE)	4.94	4.56										
10 Min Non Synch SENY (GHIJK)	4.94	4.57										
10 Min Non Synch East (F)	4.94	4.57										
10 Min Non Synch West (ABCDE)	4.92	4.56										
30 Min SENY (GHIJK)	4.92	4.56										
30 Min East (F)	4.92	4.56										
30 Min West (ABCDE)	4.92	4.56										
Regulation	9.34	7.99										
<b>RTC Market</b>												
10 Min Spin SENY (GHIJK)	1.53	0.89										
10 Min Spin East (F)	1.53	0.89										
10 Min Spin West (ABCDE)	1.06	0.55										
10 Min Non Synch SENY (GHIJK)	0.06	0.06										
10 Min Non Synch East (F)	0.06	0.06										
10 Min Non Synch West (ABCDE)	0.00	0.00										
30 Min SENY (GHIJK)	0.00	0.00										
30 Min East (F)	0.00	0.00										
30 Min West (ABCDE)	0.00	0.00										
Regulation	9.21	6.59										
NYCA Regulation Movement	0.27	0.24										
<b>Real Time Market</b>												
10 Min Spin SENY (GHIJK)	3.29	2.61										
10 Min Spin East (F)	3.29	2.61										
10 Min Spin West (ABCDE)	2.71	1.71										
10 Min Non Synch SENY (GHIJK)	0.00	0.31										
10 Min Non Synch East (F)	0.00	0.31										
10 Min Non Synch West (ABCDE)	0.00	0.00										
30 Min SENY (GHIJK)	0.00	0.00										
30 Min East (F)	0.00	0.00										
30 Min West (ABCDE)	0.00	0.00										
Regulation	9.83	7.54										
NYCA Regulation Movement	0.27	0.24										
<b>2016</b>												
<b>Day Ahead Market</b>												
10 Min Spin SENY (GHIJK)	7.09	5.38	5.04	6.31	4.93	4.62	6.41	7.12	5.57	5.37	4.83	4.89
10 Min Spin East (F)	7.09	5.38	5.04	6.31	4.93	4.62	6.41	7.12	5.57	5.37	4.83	4.89
10 Min Spin West (ABCDE)	6.28	5.25	4.84	5.60	4.77	4.52	5.78	6.20	5.14	4.89	4.50	4.73
10 Min Non Synch SENY (GHIJK)	6.47	5.25	4.88	5.80	4.83	4.36	6.34	7.07	5.52	5.09	4.43	4.49
10 Min Non Synch East (F)	6.47	5.25	4.88	5.80	4.83	4.36	6.34	7.07	5.52	5.09	4.43	4.49
10 Min Non Synch West (ABCDE)	6.23	5.20	4.84	5.58	4.68	4.32	5.72	6.15	5.10	4.82	4.39	4.43
30 Min SENY (GHIJK)	6.23	5.20	4.84	5.58	4.67	4.32	5.70	6.15	5.10	4.82	4.39	4.43
30 Min East (F)	6.23	5.20	4.84	5.58	4.67	4.32	5.70	6.15	5.10	4.82	4.39	4.43
30 Min West (ABCDE)	6.23	5.20	4.84	5.58	4.67	4.32	5.70	6.15	5.10	4.82	4.39	4.43
Regulation	9.39	8.19	8.05	7.93	6.11	7.00	8.19	8.61	7.00	8.57	7.77	13.80
<b>RTC Market</b>												
10 Min Spin SENY (GHIJK)	1.53	0.59	0.71	1.81	0.43	0.49	2.79	7.26	0.61	0.99	1.05	1.92
10 Min Spin East (F)	1.53	0.59	0.71	1.81	0.43	0.46	2.77	6.88	0.61	0.99	1.05	1.92
10 Min Spin West (ABCDE)	0.42	0.26	0.08	0.95	0.23	0.24	1.72	4.80	0.30	0.29	0.82	1.14
10 Min Non Synch SENY (GHIJK)	0.45	0.00	0.17	0.14	0.05	0.05	1.89	6.06	0.21	0.09	0.00	0.00
10 Min Non Synch East (F)	0.45	0.00	0.17	0.14	0.05	0.02	1.87	5.67	0.21	0.09	0.00	0.00
10 Min Non Synch West (ABCDE)	0.04	0.00	0.00	0.14	0.04	0.02	1.18	3.80	0.16	0.08	0.00	0.00
30 Min SENY (GHIJK)	0.01	0.00	0.00	0.14	0.04	0.04	0.94	3.65	0.15	0.08	0.00	0.00
30 Min East (F)	0.01	0.00	0.00	0.14	0.04	0.02	0.93	3.27	0.15	0.08	0.00	0.00
30 Min West (ABCDE)	0.01	0.00	0.00	0.14	0.04	0.02	0.93	3.27	0.15	0.08	0.00	0.00
Regulation	8.04	6.86	7.15	7.07	5.43	6.09	7.51	10.25	5.52	6.86	7.00	16.70
NYCA Regulation Movement	0.23	0.21	0.20	0.25	0.25	0.23	0.23	0.24	0.24	0.26	0.24	0.26
<b>Real Time Market</b>												
10 Min Spin SENY (GHIJK)	7.51	1.12	1.73	4.34	1.19	1.43	4.73	8.04	1.59	1.96	2.69	3.18
10 Min Spin East (F)	7.51	1.12	1.73	4.34	1.19	1.40	4.72	7.68	1.59	1.96	2.69	3.18
10 Min Spin West (ABCDE)	4.17	0.58	0.48	2.23	0.79	1.00	2.51	4.72	0.90	1.16	2.29	2.33
10 Min Non Synch SENY (GHIJK)	4.26	0.00	0.22	1.20	0.06	0.15	3.49	6.70	0.59	0.18	0.00	0.00
10 Min Non Synch East (F)	4.26	0.00	0.22	1.20	0.06	0.11	3.48	6.34	0.59	0.18	0.00	0.00
10 Min Non Synch West (ABCDE)	1.89	0.00	0.00	0.26	0.03	0.04	1.65	3.56	0.21	0.11	0.00	0.00
30 Min SENY (GHIJK)	0.06	0.00	0.00	0.25	0.03	0.07	0.98	3.48	0.21	0.11	0.00	0.00
30 Min East (F)	0.06	0.00	0.00	0.25	0.03	0.04	0.97	3.12	0.21	0.11	0.00	0.00
30 Min West (ABCDE)	0.06	0.00	0.00	0.25	0.03	0.04	0.97	3.12	0.21	0.11	0.00	0.00
Regulation	10.66	7.21	7.73	8.30	6.06	6.92	8.37	10.31	6.42	7.70	8.21	14.88
NYCA Regulation Movement	0.23	0.22	0.20	0.25	0.25	0.23	0.23	0.24	0.24	0.26	0.23	0.24

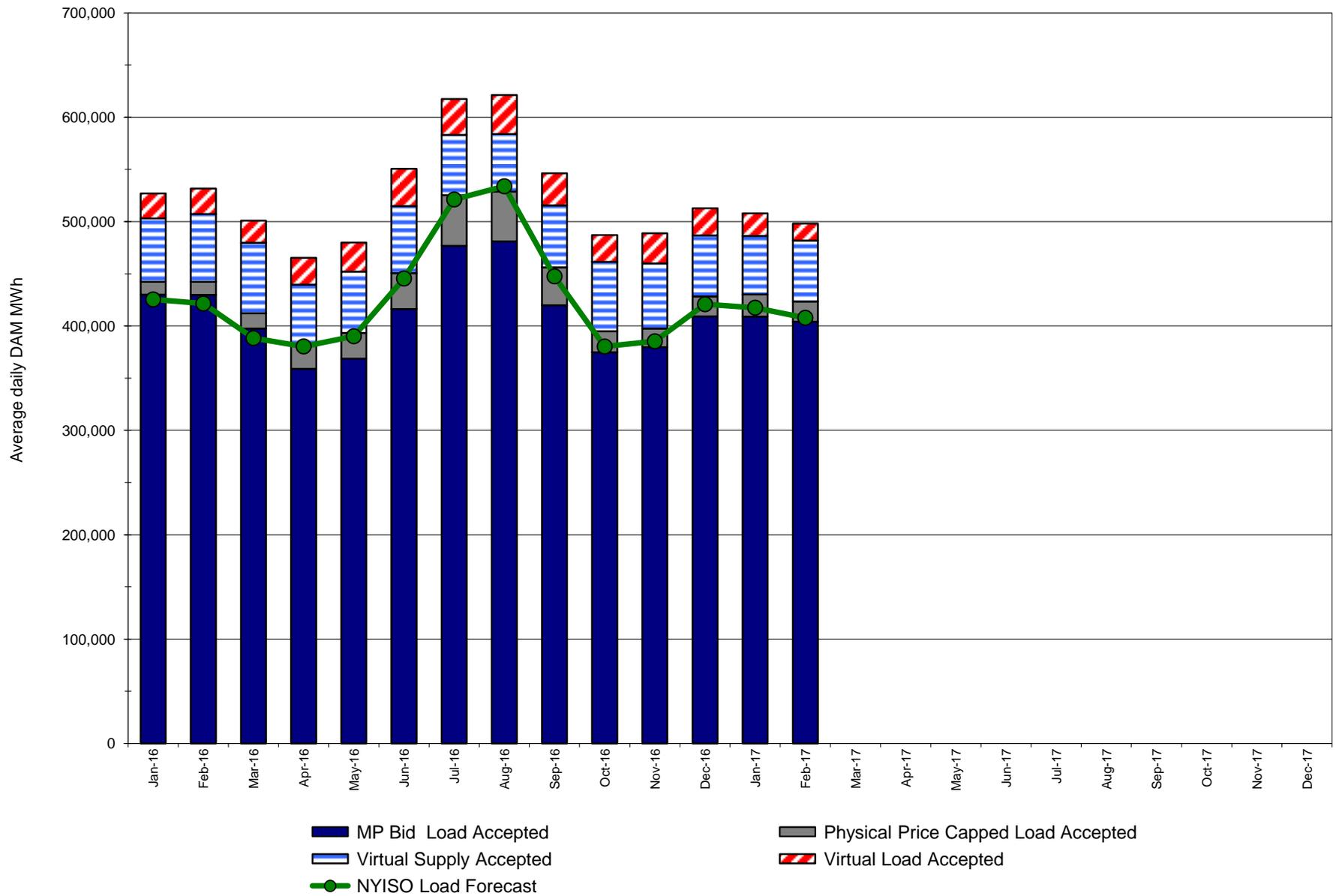
## NYISO In City Energy Mitigation - AMP (NYC Zone) 2016 - 2017 Percentage of committed unit-hours mitigated



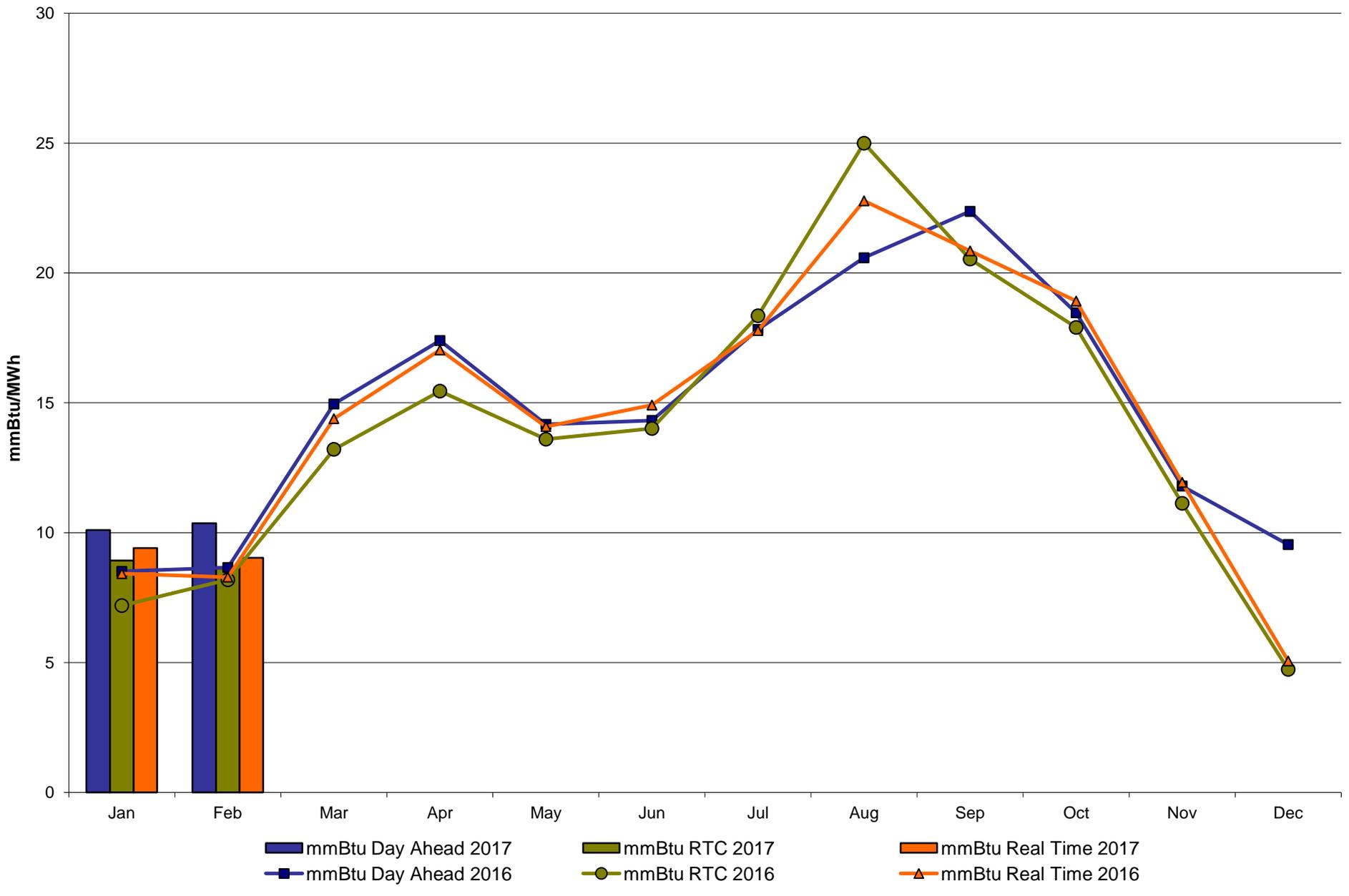
**NYISO In City Energy Mitigation (NYC Zone) 2016 - 2017**  
**Monthly megawatt hours mitigated**



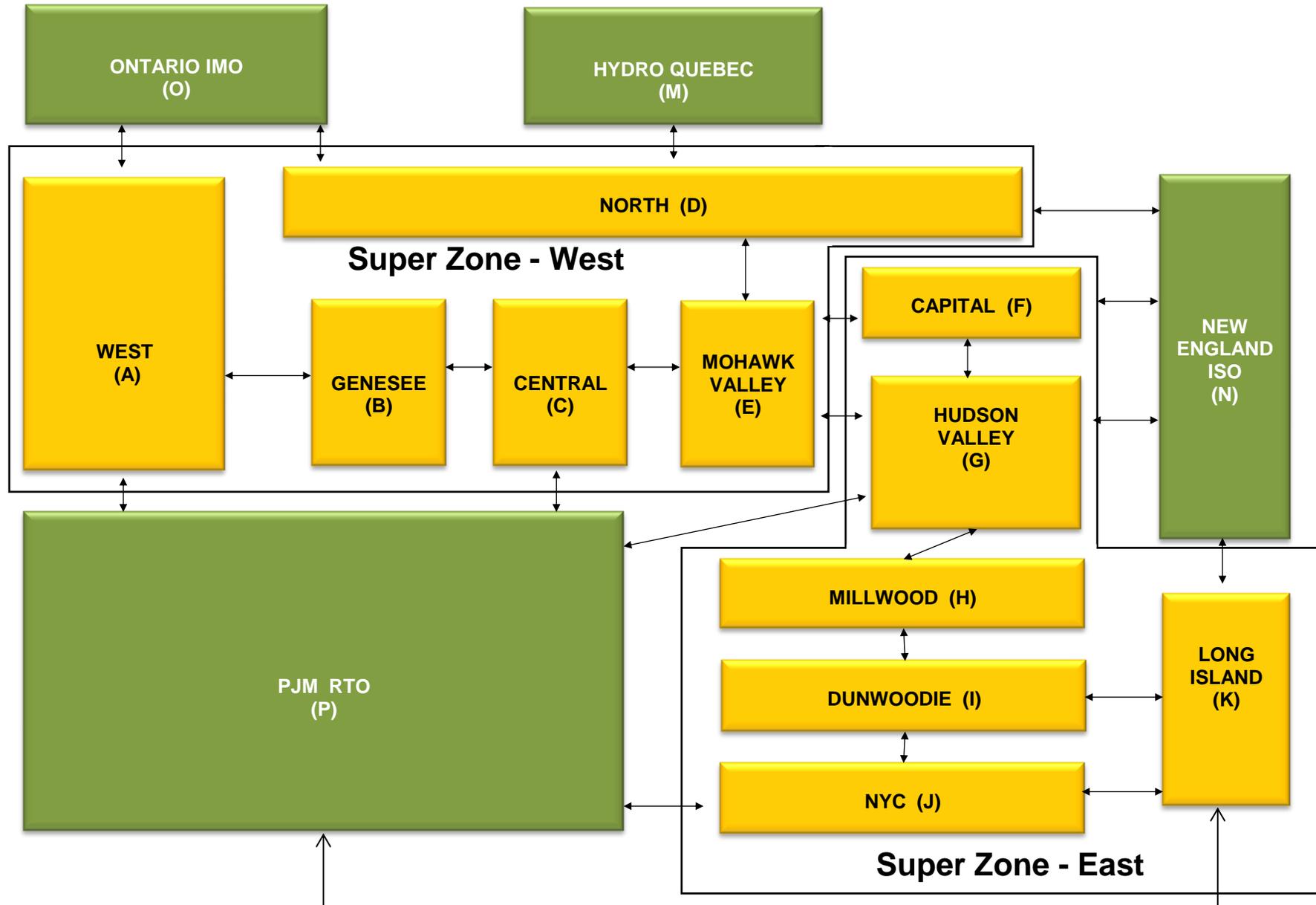
### NYISO Average Daily DAM Load Bid Summary



## Monthly Implied Heat Rate 2016-2017



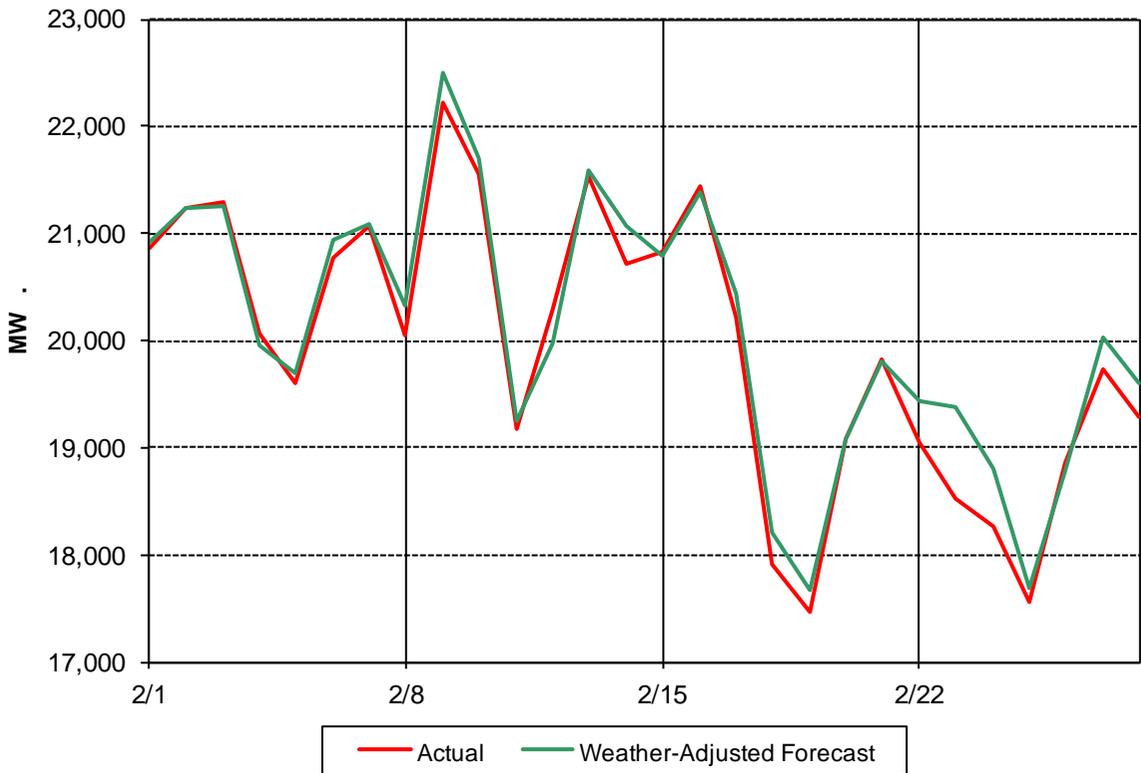
# NYISO LBMP ZONES



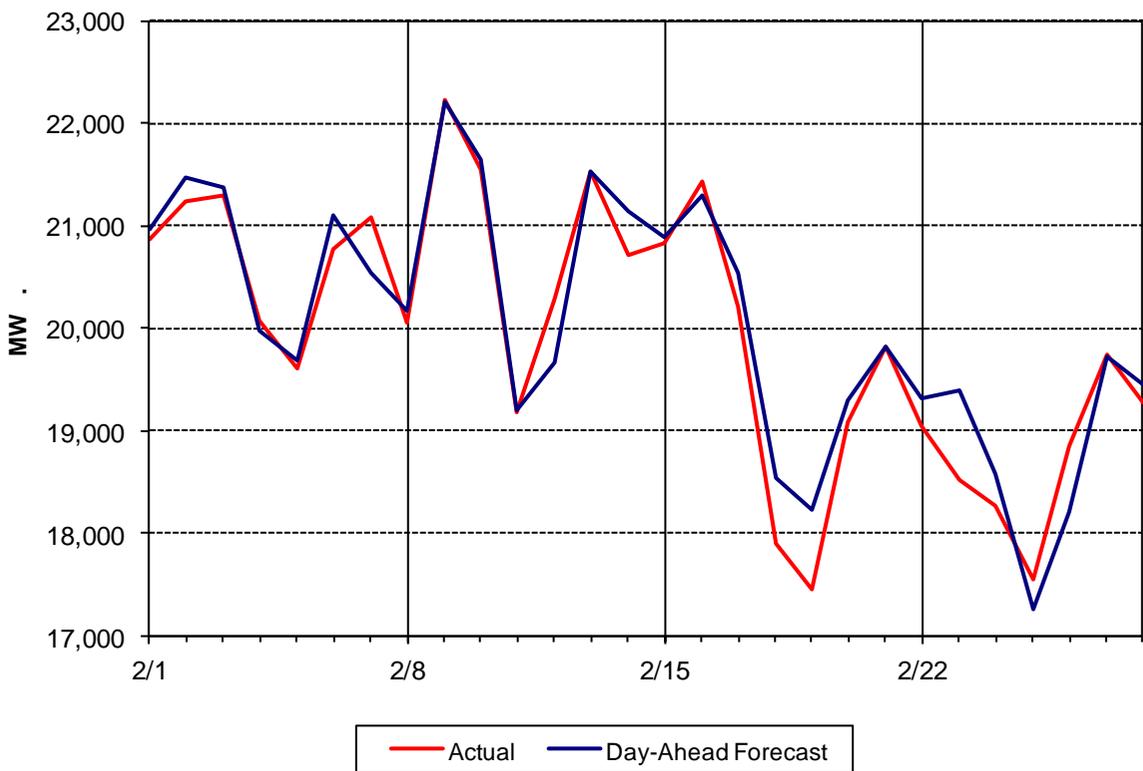
**Billing Codes for Chart C**

<b>Chart - C Category Name</b>	<b>Billing Code</b>	<b>Billing Category Name</b>
Bid Production Cost Guarantee Balancing	81203	Balancing NYISO Bid Production Cost Guarantee - Internal Units
Bid Production Cost Guarantee Balancing	81204	Balancing NYISO Bid Production Cost Guarantee - External Units
Bid Production Cost Guarantee Balancing	81205	Balancing NYISO Bid Production Cost Guarantee Expenditure due to Curtailed Imports
Bid Production Cost Guarantee Balancing	81208	Balancing NYISO Bid Production Cost Guarantee - Internal Units
Bid Production Cost Guarantee Balancing	81209	Balancing NYISO Bid Production Cost Guarantee - External Units
Bid Production Cost Guarantee Balancing	81213	Balancing NYISO Bid Production Cost Guarantee Expenditure due to Curtailed Imports
Bid Production Cost Guarantee DAM	81201	DAM NYISO Bid Production Cost Guarantee - Internal Units
Bid Production Cost Guarantee DAM	84001	EDRP/SCR Demand Response - Local
Bid Production Cost Guarantee DAM	84101	EDRP/SCR Demand Response - NYISO Wide
Bid Production Cost Guarantee DAM	81401	DAM Price Responsive Load Program
Bid Production Cost Guarantee DAM	81202	DAM NYISO Bid Production Cost Guarantee - External Units
Bid Production Cost Guarantee DAM	81206	DAM NYISO Bid Production Cost Guarantee - Internal Units
Bid Production Cost Guarantee DAM	81207	DAM NYISO Bid Production Cost Guarantee - External Units
Bid Production Cost Guarantee DAM Virtual	81501	DAM Virtual Bid Production Cost Guarantee
DAM Contract Balancing	81315	DAM Contract Balancing
DAM Contract Balancing	81317	DAM Contract Balancing
Local Reliability Balancing	81002	Balancing Local Reliability Bid Production Cost Guarantee
Local Reliability Balancing	83901	Margin Restoration (MOB) Revenue
Local Reliability DAM	81001	DAM Local Reliability Bid Production Cost Guarantee
NYISO Cost of Operations	80901	NYISO Cost Of Operations
NYISO Cost of Operations	80902	NYISO Cost Of Operations
NYISO Cost of Operations	83501	NYISO Cost Of Operations
NYISO Cost of Operations	83502	NYISO Cost Of Operations
Residuals Balancing	81302	Balancing Market Energy Residual
Residuals Balancing	81304	Balancing Market Loss Residual
Residuals Balancing	81305	Balancing Market Congestion Balancing
Residuals Balancing	81306	Emergency Energy Purchases
Residuals Balancing	81307	Emergency Energy Sales
Residuals Balancing	81309	Balancing Market Energy Residual
Residuals Balancing	81311	Balancing Market Loss Residual
Residuals Balancing	81312	Balancing Market Congestion Balancing
Residuals Balancing	81313	Emergency Energy Purchases
Residuals Balancing	81314	Emergency Energy Sales
Residuals DAM	81301	Day Ahead Market Energy Residual
Residuals DAM	81303	Day Ahead Market Loss Residual
Residuals DAM	81308	Day Ahead Market Energy Residual
Residuals DAM	81310	Day Ahead Market Loss Residual

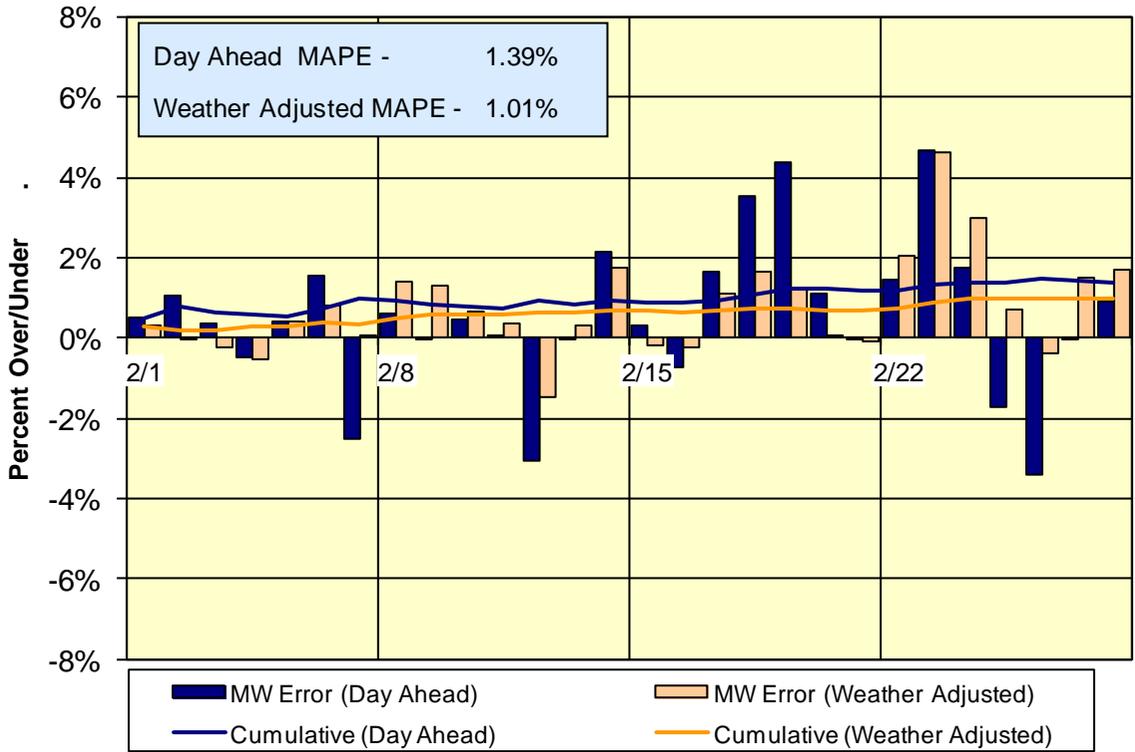
**NYISO Daily Peak Load - February 2017  
Actual vs. Weather-Adjusted Forecast**



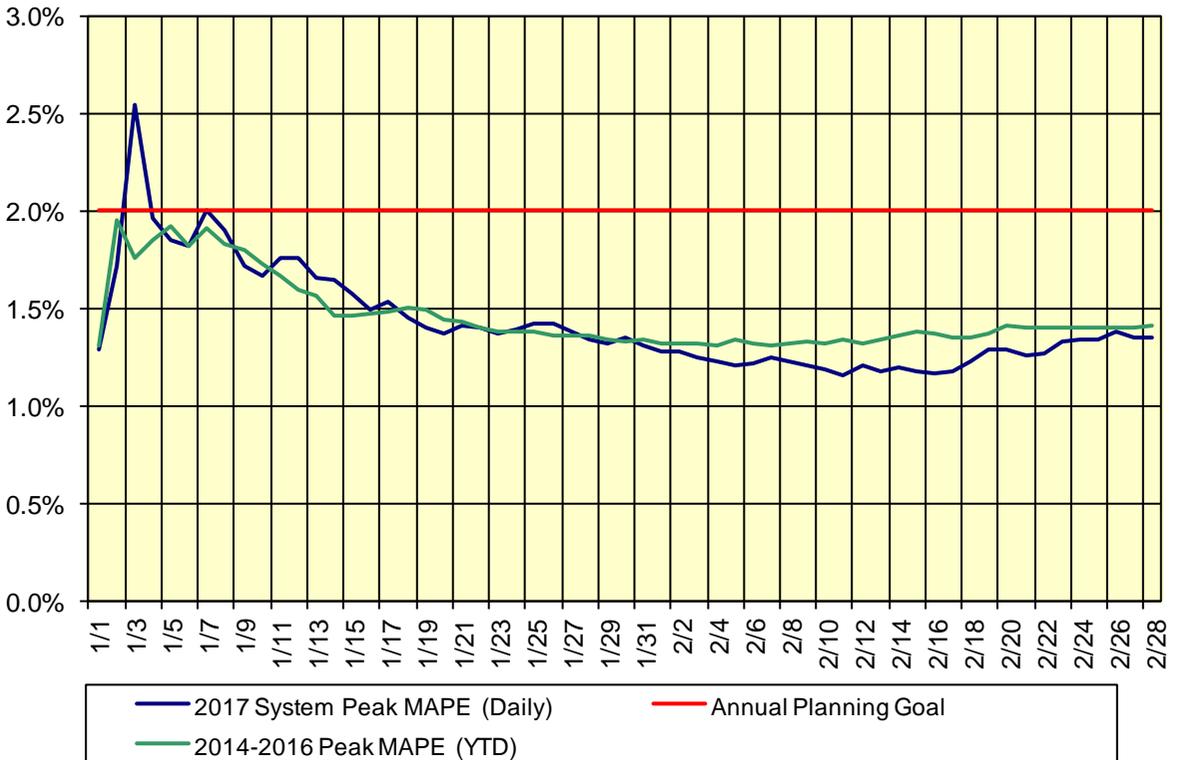
**NYISO Daily Peak Load - February 2017  
Actual vs. Forecast**



### Day Ahead Peak Forecast - February 2017 Percent Error - Actual & Weather Adjusted



### Day-Ahead Forecast Accuracy - Cumulative Performance 2017 Year-to-Date



## Summary Description of Regulatory Filings, Investigations, Rulemakings and Related Orders in NYISO Matters – February 2017

Filing Date	Filing Summary	Docket	Order Date	Order Summary
03/30/2015 04/20/2015	03/30/2015 NYISO request for clarification of 03/19/2015 order re: whether treatment of rebates/benefits from state programs received by SCRs is applicable to Mitigated Capacity Zones other than NYC 04/20/2015 NYISO compliance filing re: provide that the change in the Offer Floor calculation is only applicable to SCRs in NYC	EL07-39-007 EL07-39-008 ER08-695-005 ER08-695-006 ER10-2371-001 ER10-2371-002 ER10-2371-003	02/03/2017	FERC order dismissed as moot the requests for rehearing and clarification and dismissed as moot NYISO's compliance filing, with no substitute tariff filing required
06/24/2016 07/21/2016	06/24/2016 NYPSC, et. al. complaint v. NYISO re: application of buyer-side market power mitigation rules limits Special Case Resource participation in the ICAP market 07/21/2016 NYISO filing re: answer to the complaint	EL16-92-000	02/03/2017	FERC order granted the complaint in part and denied in part, and required NYISO to make a compliance filing within 30 days (i.e., 03/06/2017) to exempt prospective SCRs from the buyer-side market power mitigation rules
12/16/2016	NYISO filing on behalf of Niagara Mohawk Power Corporation re: Cost Reimbursement Agreement (SA 2324) between Niagara Mohawk and Erie Boulevard Hydropower	ER15-566-000	02/10/2017	FERC letter order accepted filing effective 10/18/2016, as requested
01/11/2017	NYISO filing re: explanation of tariff compliance with Order No. 825: Settlement Intervals and Shortage Pricing in Markets Operated by RTOs and ISOs	RM15-24-000 ER17-782-000	02/24/2017	FERC letter order accepted compliance filing
01/23/2017	NYISO 205 filing re: interconnection process improvements related to regulatory milestone requirements	ER17-830-000	02/21/2017	FERC letter order accepted filing effective 02/22/2017, as requested
02/02/2017	NYISO compliance filing re: notice of the effective date for the ICAP Demand Curve reset process revisions	ER16-1751-001		
02/02/2017	NYISO filing on behalf of NYPA re: tariff records reflecting the approved settlement of NYPA's formula rate template and formula rate implementation protocols	ER16-835-001		
02/03/2017	NYISO compliance filing re: effective date designation for UDR related tariff revisions	ER16-959-001		
02/06/2017	NYISO compliance filing re: removal of the proposed one-year transition mechanism for the Locality Exchange factor for capacity exports	ER17-446-001		

02/06/2017	NYISO 205 filing re: amend MST 23.4.5.5 governing the circumstances under which a Market Party will be deemed to be a Pivotal Supplier in a Mitigated Capacity Zone	ER17-941-000		
02/06/2017	IRC filing with DOE re: comments on the US DOE's proposed procedural regulations concerning the Secretary of Energy's issuance of an emergency order following the declaration of a Grid Security Emergency by the President	RIN 1901-AB40		
02/10/2017	NYISO filing re: amendment to its 02/06/2017 compliance filing concerning the removal of the proposed one-year transition mechanism for the Locality Exchange factor for capacity exports	ER17-446-001		
02/10/2017	IRC filing re: request for extension of time to file NOPR comments concerning reforms to the <i>pro forma</i> large generator interconnection procedures and <i>pro forma</i> large generator interconnection agreement	RM17-8-000	02/23/2017	FERC notice extended the comment submission deadline up to and including 04/13/2017
02/13/2017	NYISO NOPR comments re: electric storage participation in markets operated by RTOs and ISOs	RM16-23-000 AD16-20-000		
02/13/2017	IRC NOPR comments re: electric storage participation in markets operated by RTOs and ISOs	RM16-23-000 AD16-20-000		
02/13/2017	NYISO motion to intervene and protest re: NRG Curtailment Solutions request for tariff waiver concerning penalties on responsible interface parties who enroll ineligible special case resources and fail to deliver their full UCAP sold in the ICAP auctions	ER17-834-000		
02/14/2017	NYISO compliance filing re: notice of effective date for revised fixed block unit pricing logic	ER17-549-001		
02/15/2017	NYISO compliance filing re: to remove inclusion of SCR emissions controls in the peaking plant design for the NYCA ICAP Demand Curve	ER17-386-001		
02/15/2017	NYISO confidential filing to the NYPSC re: three-month report for the period ending 01/31/2017 related to generators committed to ensure compliance with reliability requirements	PSC Matter No. 10-02007		
02/15/2017	NYISO filing on behalf of Niagara Mohawk Power Corporation re: amendment filing to correct typographical errors in the 01/30/2017 filing of revisions to the transmission service charge formula rate template	ER17-884-001		

02/17/2017	NYISO confidential filing to the NYPSC re: Quarterly Project Tracking Report charting the current development status of proposed generation and transmission projects	PSC Matter No. 10-02007		
02/17/2017	NYISO compliance filing re: exempt new Special Case Resources from the buyer-side market power mitigation rules	ER17-996-000		
02/22/2017	NYISO 205 filing on behalf of NYPA re: updated depreciation rates to be used in the calculation of NYPA's transmission service charges under Attachment H of the NYISO OATT	ER17-1010-000		
02/28/2017	NYISO comment filing re: NOPR to revise regulations to require each RTO and ISO to incorporate market rules that meet certain requirements when pricing fast-start resources	RM17-3-000		