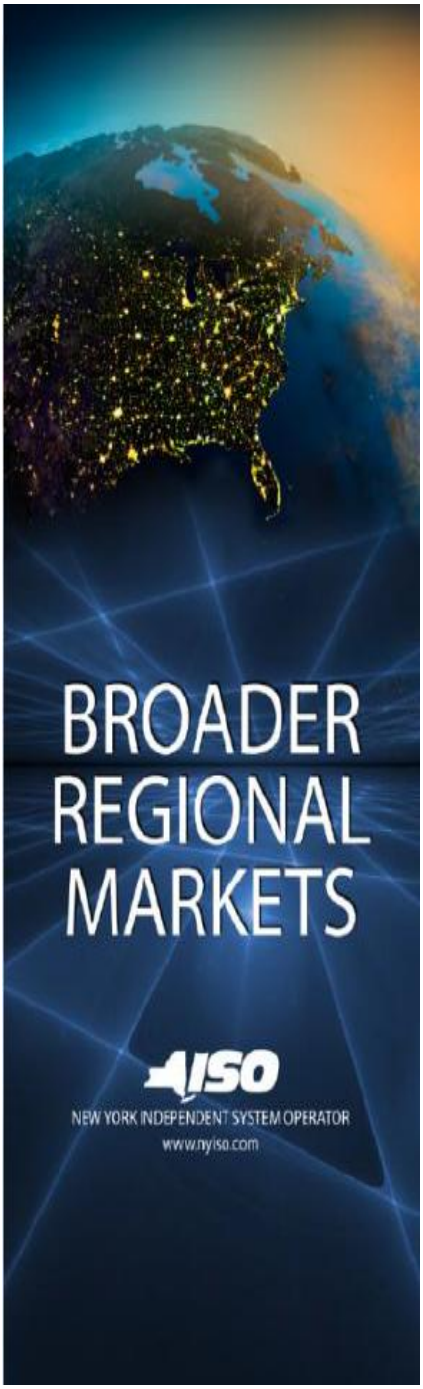


Broader Regional Market Metrics

New York Independent System Operator

February 2015

Prepared by NYISO Operations Regional Market Coordination

Highlights

Regional NYISO/PJM RT Scheduling Monthly Value: $1,168,021.24
Regional NYISO/PJM RT Scheduling Year-to-Date Value: $1,587,625.52

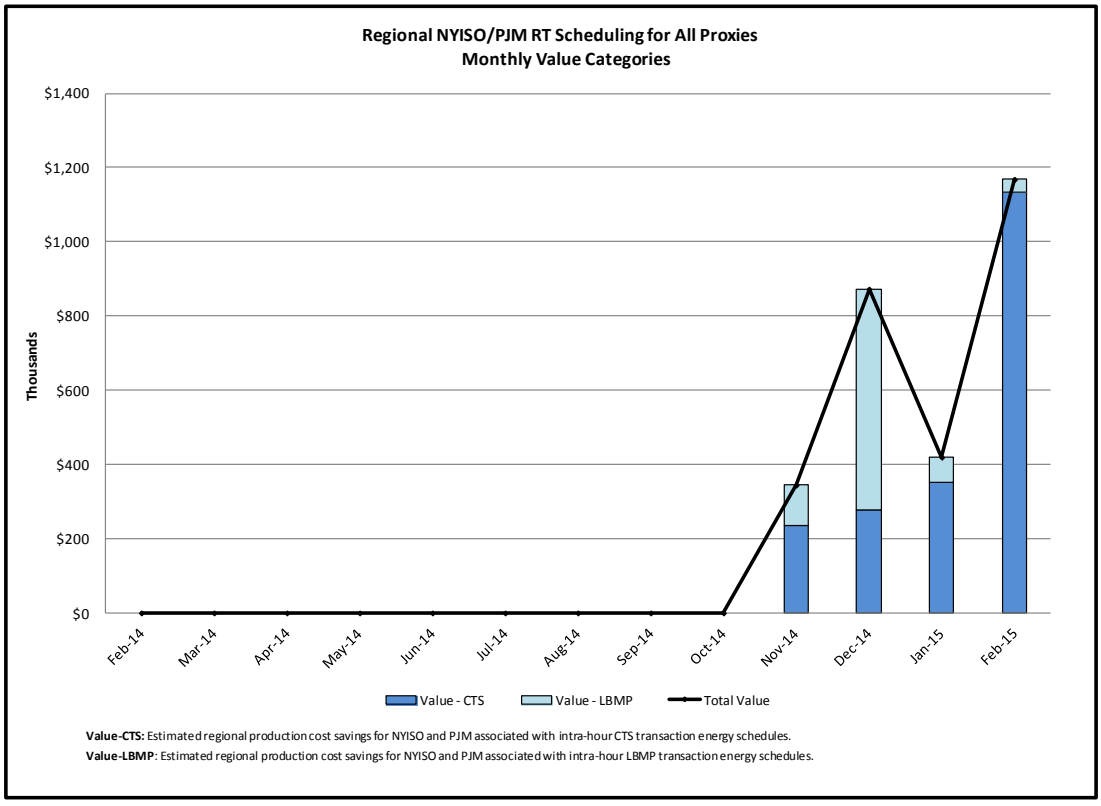
15-Minute Bidding and Scheduling Data[1]

Interface	CTS				LBMP			
	Avg Offered (MW)	Avg Scheduled (MW)	Max Offered (MW)	Max Scheduled (MW)	Avg Offered (MW)	Avg Scheduled (MW)	Max Offered (MW)	Max Scheduled (MW)
Keystone	989	183	1583	1150	3426	2403	4244	3765
All Scheduled Lines	121	47	865	575	1090	813	1527	1422

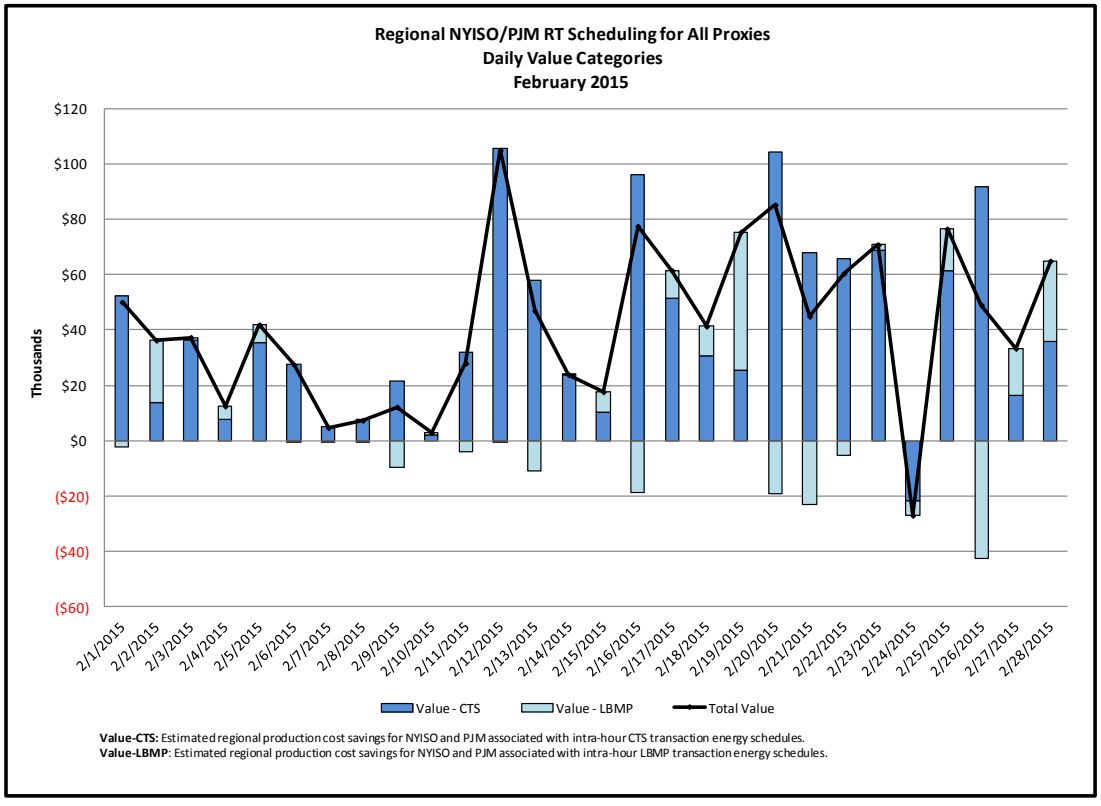
Pricing Data[2]

Interface	Max Forecasted Price Spread	Min Forecasted Price Spread	Forecasted Price Spreads vs. Real-time Price Spreads							
			< $-20	$-20 to $-10	$-10 to $-5	$-5 to $0	$0 to $5	$5 to $10	$10 to $20	> $20
Keystone	$397.83	($470.25)	31.4%	8.5%	5.6%	7.3%	6.8%	5.1%	7.2%	28.0%
HTP	$767.47	($950.85)	34.0%	6.2%	4.6%	6.5%	5.8%	3.9%	5.5%	33.6%
NEPTUNE	$955.06	($484.25)	37.3%	8.2%	5.8%	6.9%	6.6%	4.1%	6.3%	24.8%
VFT	$696.26	($461.53)	34.5%	7.8%	5.1%	7.7%	7.1%	4.7%	6.5%	26.6%

1. All MW Values include the absolute sum of both imports + exports. Wheels have been excluded.
2. "Forecasted Prices" refer to NYISO's RTC LBMP and PJM's ITSCED LMP. "Real-time Prices" refer to NYISO's RTD LBMP and PJM's RTSCED LMP. Forecasted Prices are used during NYISO's RTC evaluation to schedule transactions. Real-time Prices are used to settle transactions. Price Spreads are always calculated as NYISO's LBMP minus PJM's LMP.



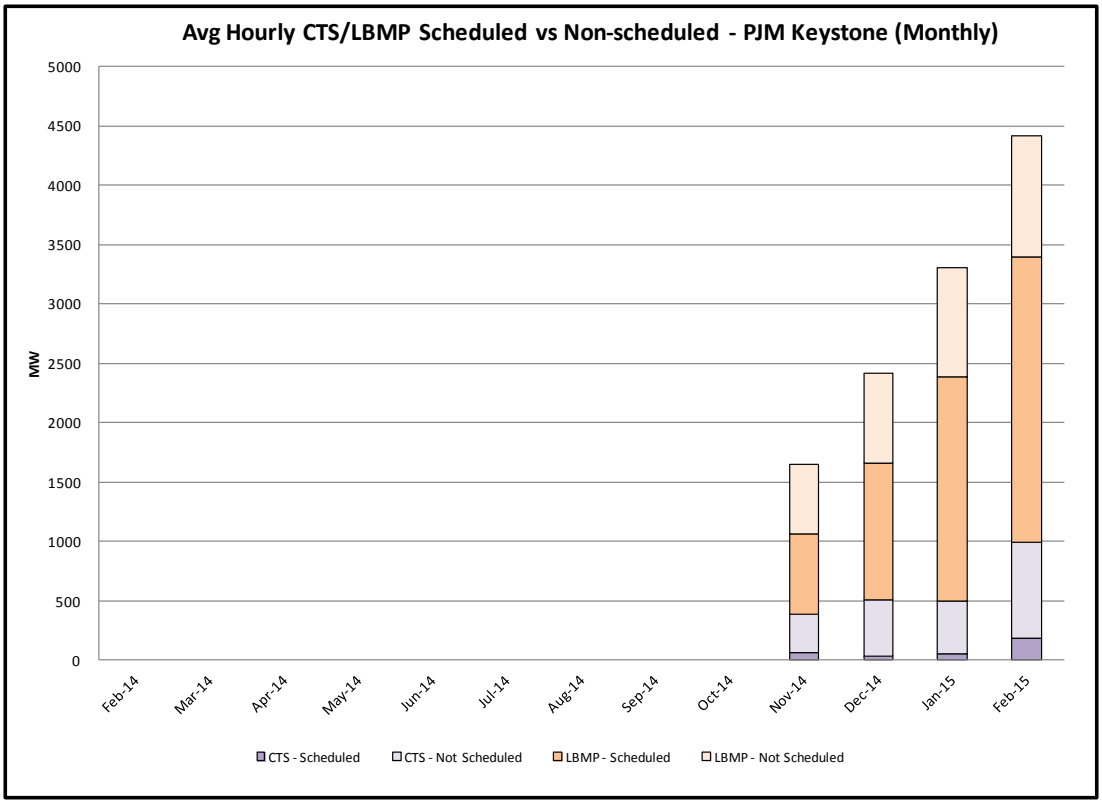
Value-CTS: Estimated regional production cost savings for NYISO and PJM associated with intra-hour CTS transaction energy schedules.
Value-LBMP: Estimated regional production cost savings for NYISO and PJM associated with intra-hour LBMP transaction energy schedules.

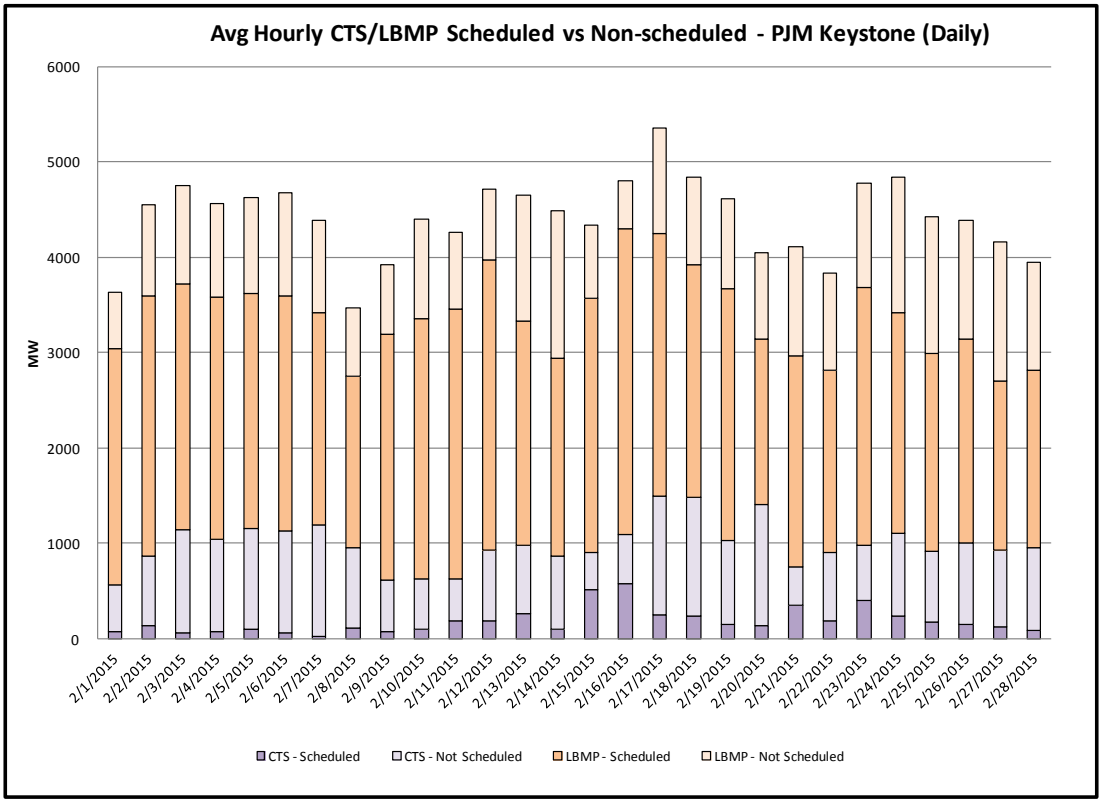


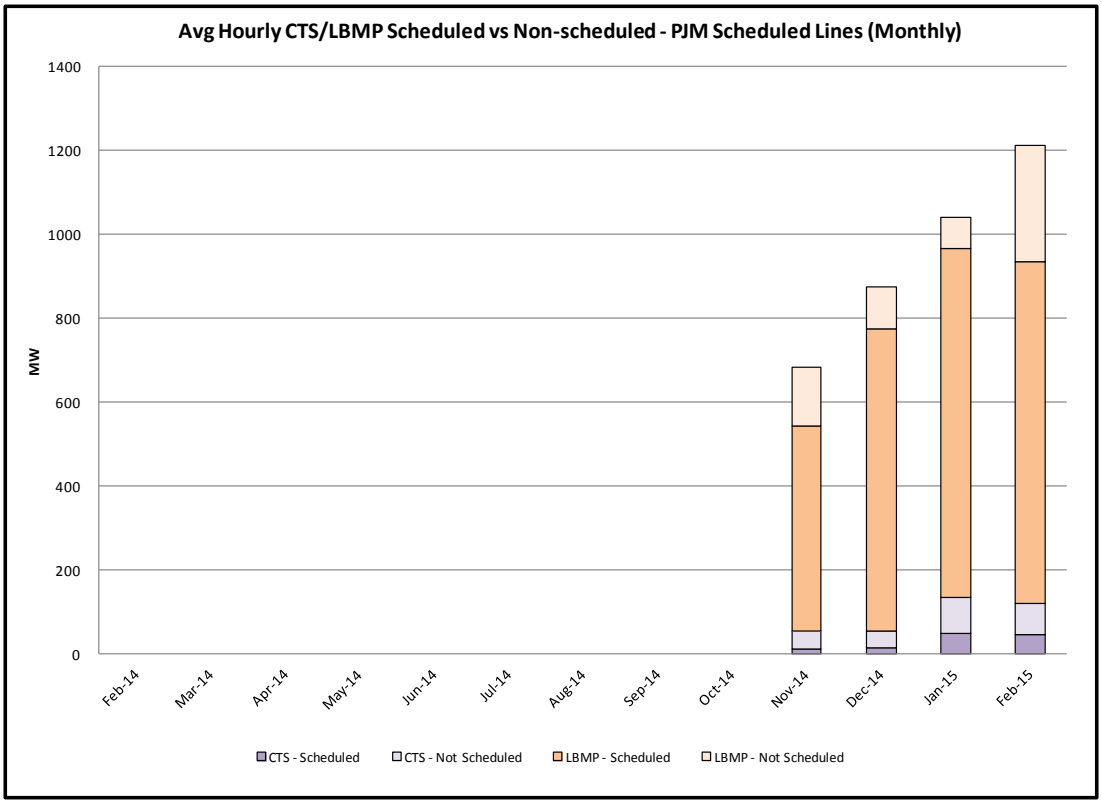
Value-CTS: Estimated regional production cost savings for NYISO and PJM associated with intra-hour CTS transaction energy schedules.
Value-LBMP: Estimated regional production cost savings for NYISO and PJM associated with intra-hour LBMP transaction energy schedules.

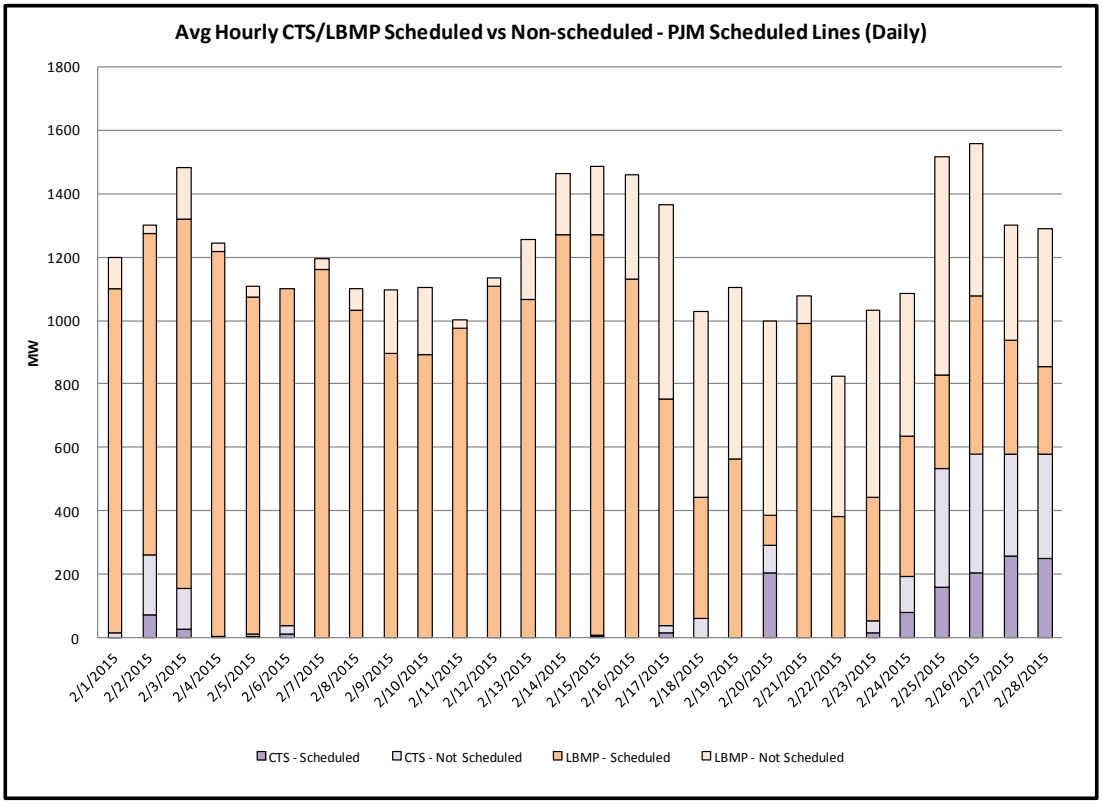
Regional NYISO/PJM RT Scheduling for All Proxies

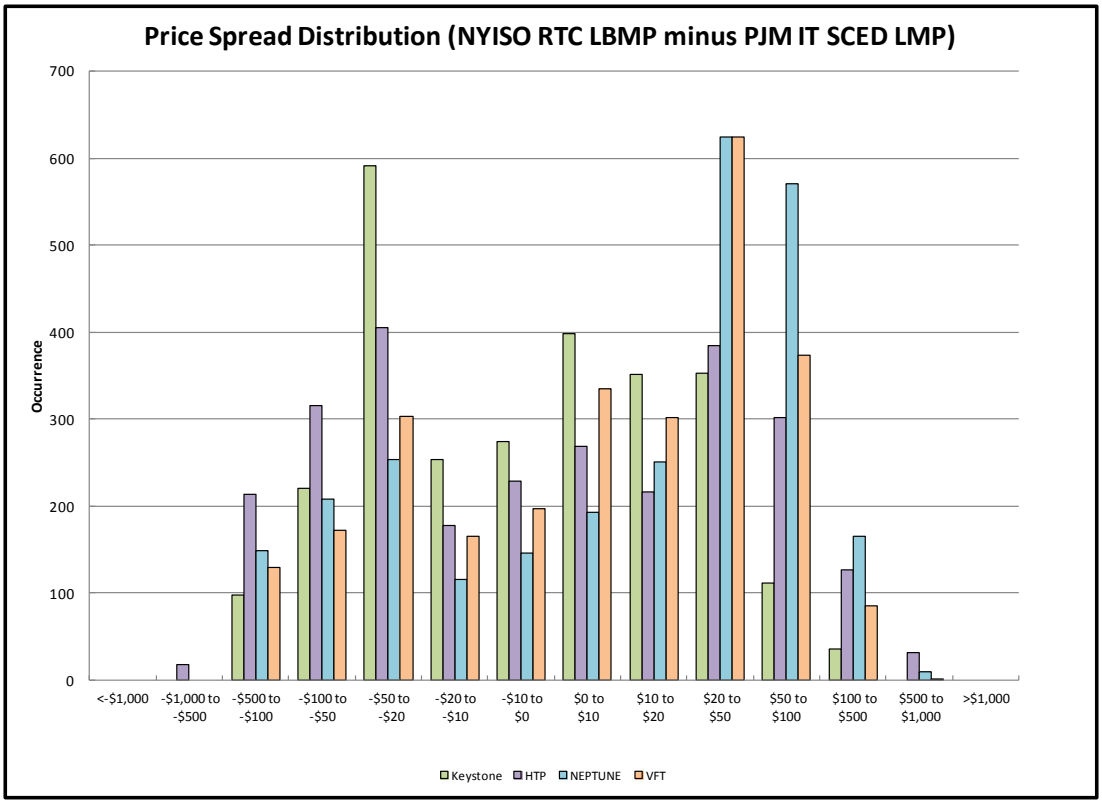
Category	***Description***
Value-CTS	Estimated regional production cost savings from the intra-hour (non-TOH) energy schedule changes on CTS bids (Intra-hour CTS Schedule Changes * [NY RTC LBMP - PJM IT SCED LMP]).
Value-LBMP	Estimated regional production cost savings from the intra-hour (non-TOH) energy schedule changes on LBMP bids (Intra-hour LBMP Schedule Changes * [NY RTC LBMP - PJM IT SCED LMP]).

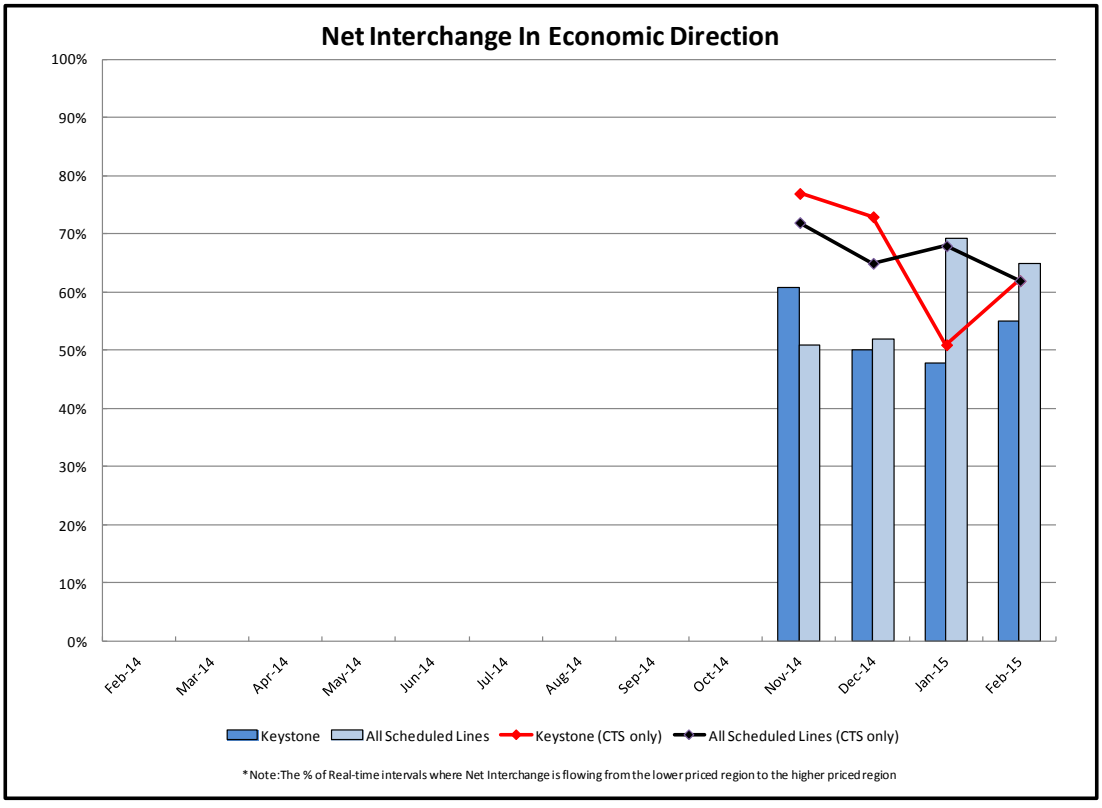

Avg Hourly CTS/LBMP Scheduled vs Non-scheduled - PJM Keystone (Monthly)
MW
5000
4500
4000
3500
3000
2500
2000
1500
1000
500
0
Feb-14
Mar-14
Apr-14
May-14
Jun-14
Jul-14
Aug-14
Sep-14
Oct-14
Nov-14
Dec-14
Jan-15
Feb-15
CTS - Scheduled
CTS - Not Scheduled
LBMP - Scheduled
LBMP - Not Scheduled


Avg Hourly CTS/LBMP Scheduled vs Non-scheduled - PJM Keystone (Daily)
MW
6000
5000
4000
3000
2000
1000
0
2/1/2015
2/2/2015
2/3/2015
2/4/2015
2/5/2015
2/6/2015
2/7/2015
2/8/2015
2/9/2015
2/10/2015
2/11/2015
2/12/2015
2/13/2015
2/14/2015
2/15/2015
2/16/2015
2/17/2015
2/18/2015
2/19/2015
2/20/2015
2/21/2015
2/22/2015
2/23/2015
2/24/2015
2/25/2015
2/26/2015
2/27/2015
2/28/2015
CTS - Scheduled
CTS - Not Scheduled
LBMP - Scheduled
LBMP - Not Scheduled


Avg Hourly CTS/LBMP Scheduled vs Non-scheduled - PJM Scheduled Lines (Monthly)
MW
1400
1200
1000
800
600
400
200
0
Feb-14
Mar-14
Apr-14
May-14
Jun-14
Jul-14
Aug-14
Sep-14
Oct-14
Nov-14
Dec-14
Jan-15
Feb-15
CTS - Scheduled
CTS - Not Scheduled
LBMP - Scheduled
LBMP - Not Scheduled


Avg Hourly CTS/LBMP Scheduled vs Non-scheduled - PJM Scheduled Lines (Daily)
MW
1800
1600
1400
1200
1000
800
600
400
200
0
2/1/2015
2/2/2015
2/3/2015
2/4/2015
2/5/2015
2/6/2015
2/7/2015
2/8/2015
2/9/2015
2/10/2015
2/11/2015
2/12/2015
2/13/2015
2/14/2015
2/15/2015
2/16/2015
2/17/2015
2/18/2015
2/19/2015
2/20/2015
2/21/2015
2/22/2015
2/23/2015
2/24/2015
2/25/2015
2/26/2015
2/27/2015
2/28/2015
CTS - Scheduled
CTS - Not Scheduled
LBMP - Scheduled
LBMP - Not Scheduled


Price Spread Distribution (NYISO RTC LBMP minus PJM IT SCED LMP)
Occurrence
700
600
500
400
300
200
100
0
<-$1,000
-$1,000 to -$500
-$500 to -$100
-$100 to -$50
-$50 to -$20
-$20 to -$10
-$10 to $0
$0 to $10
$10 to $20
$20 to $50
$50 to $100
$100 to $500
$500 to $1,000
>$1,000
Keystone
HTP
NEPTUNE
VFT


Net Interchange In Economic Direction
100%
90%
80%
70%
60%
50%
40%
30%
20%
10%
0%
Feb-14
Mar-14
Apr-14
May-14
Jun-14
Jul-14
Aug-14
Sep-14
Oct-14
Nov-14
Dec-14
Jan-15
Feb-15
Keystone
All Scheduled Lines
Keystone (CTS only)
All Scheduled Lines (CTS only)
*Note:The % of Real-time intervals where Net Interchange is flowing from the lower priced region to the higher priced region