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November 10, 2011

Honorable Kimberly D. Bose
Secretary
Federal Energy Regulatory Commission
888 First Street, N.E., Room 1A
Washington, D.C. 20426

Re: *Midwest Independent Transmission System Operator, Inc. v. PJM Interconnection, L.L.C.*, Docket Nos. EL10-45-000, EL10-45-001;
Midwest Independent Transmission System Operator, Inc. v. PJM Interconnection, L.L.C., Docket Nos. EL10-46-000, EL10-46-001;
PJM Interconnection, L.L.C. v. Midwest Independent Transmission System Operator, Inc., Docket Nos. EL10-60-000, EL10-60-001
Midwest Independent Transmission System Operator, Inc. and PJM Interconnection, L.L.C., Docket No. ER11- 3979-003

Dear Ms. Bose:

Pursuant to the Federal Energy Regulatory Commission's ("Commission") Order Approving Contested Settlement issued on June 16, 2011,¹ and the Settlement Agreement and Offer of Settlement ("Settlement") submitted on January 4, 2011, in above referenced docket numbers, PJM Interconnection, L.L.C. ("PJM") and Midwest Independent Transmission System Operator, Inc. ("MISO") submit, in electronic format, revisions to Section 6.6 of Attachment 2 – Congestion Management Process ("CMP") to the Joint Operating Agreement ("JOA") between

¹ *Midwest Independent Transmission Sys. Operator, Inc. v. PJM Interconnection, L.L.C.*, 135 FERC ¶ 61,243 (2011) (the "Settlement Order").

PJM.² PJM and MISO request an effective date of December 1, 2011, in accordance with the Settlement.

I. Background

On January 4, 2011, in accordance with Rule 602 of the Commission's Rules of Practice and Procedure,³ the Settling Parties filed the Settlement to resolve two MISO complaints against PJM, and a PJM complaint against MISO. The Settlement provides that the JOA shall be modified to implement the terms and conditions of the Settlement.⁴ The revisions to the JOA were attached to the Settlement in clean and redlined format as Attachment A and Attachment B, respectively.⁵ On July 1, 2011, a filing (the "July 1 Filing") was submitted by PJM and MISO in compliance with the Settlement Order which directed PJM to submit a compliance filing in electronic format because the revisions to the JOA were filed as part of the Settlement and not through the eTariff system.⁶

As pertinent to this filing, the Settlement provides that PJM and MISO shall revise the methodology for determining the Firm Flow Entitlements in the market-to-market settlement calculation to provide for the use of point-to-point transmission service schedules instead of reservations as of a mutually agreed date following approval and/or acceptance of the Settlement.⁷ The July 1 Filing explained that PJM and MISO were working with OATi on software changes needed to implement this JOA revision which will require several months to complete, and have mutually agreed to a target implementation date on or about November 1,

² PJM also includes in this filing the records for JOA Attachment 2, Sections 4.1, 4.2, 4.3 and 4.4 in RTF format only to correct technical mapping errors in these sections which were erroneously entered during the filing in Docket No. ER11-3979-000 on July 1, 2011.

³ 18 C.F.R. § 385.602 (2011).

⁴ Settlement ¶ 38.

⁵ Settlement ¶ 38.

⁶ Settlement Order P 46. In accordance with Order No. 714, MISO files a certificate of concurrence and will update the JOA kept in its database. The July 1 Filing was amended by two subsequent errata filings submitted on July 8, 2011 and July 21, 2011.

⁷ Settlement ¶ 37.

2011. Once the exact date is known for these OATi software changes, PJM and MISO committed to electronically file with the Commission the revision to Section 6.6 to the CMP as set forth in the Settlement.

Therefore, PJM and MISO did not include the amendments to Section 6.6 to JOA Attachment 2 – CMP consistent with the terms of the Settlement. PJM now submits the amendments to Section 6.6 to JOA Attachment 2 as required by the Settlement.

OATi will complete the necessary software changes needed to implement this JOA revision on or about November 22, 2011, at which time the software will go into production. Thus, the software will be in use by December 1, 2011, allowing PJM and MISO to implement this JOA revision to the methodology for determining the Firm Flow Entitlements in the market-to-market settlement calculation to provide for the use of point-to-point transmission service schedules instead of reservations as required by the Settlement.

II. Description of JOA Revisions

PJM and MISO amend Section 6.6 to JOA Attachment 2 – CMP to state that “Firm Transmission Service impacts will be based on schedules.”

III. Effective Date

PJM and MISO request an effective date of December 1, 2011, consistent with the Settlement and the Settlement Order.⁸

IV. Documents Enclosed

PJM and MISO enclose with this transmittal letter: (i) electronic copies of the clean and redline JOA section; (ii) the MISO Certificate of Concurrence; and (iii) Certificate of Service.

⁸ Settlement ¶ 39; and Settlement Order at P 37.

V. Service

A. Midwest ISO Service

The Midwest ISO hereby respectfully requests waiver of the requirements set forth in 18 C.F.R. § 385.2010 (2006). The Midwest ISO has served a copy of this filing electronically, including attachments, upon all Tariff Customers under the EMT, Midwest ISO Members, Member representatives of Transmission Owners and Non-Transmission Owners, the Midwest ISO Advisory Committee participants, as well as all state commissions within the Region. In addition, the filing has been posted electronically on the Midwest ISO's website at www.midwestmarket.org under the heading "Filings to FERC" for other interested parties in this matter.

Good cause exists for granting this waiver due to the volume of interested parties in this matter, the limited resources available to make service and the financial burden to the Midwest ISO in making and mailing copies of this filing. Many parties, in fact, prefer receiving their copy in electronic format or by the Midwest ISO's website. In addition, the Midwest ISO will provide paper copies to any interested party upon request to counsel of record for the Midwest ISO.

B. PJM Service

PJM has served a copy of this filing on all PJM Members and on all state utility regulatory commissions in the PJM Region by posting this filing electronically. In accordance with the Commission's regulations,⁹ PJM will post a copy of this filing to the FERC filings section of its internet site, located at the following link: <http://www.pjm.com/documents/ferc-manuals/ferc-filings.aspx> with a specific link to the newly-filed document, and will send an e-mail on the same date as this filing to all PJM Members and all state utility regulatory

⁹ See 18C.F.R §§ 35.2(e) and 385.2010(f)(3).

commissions in the PJM Region¹⁰ alerting them that this filing has been made by PJM and is available by following such link. If the document is not immediately available by using the referenced link, the document will be available through the referenced link within 24 hours of the filing. Also, a copy of this filing will be available on the FERC's eLibrary website located at the following link: <http://www.ferc.gov/docs-filing/elibrary.asp> in accordance with the Commission's regulations and Order No. 714.

Respectfully submitted,



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¹⁰ PJM already maintains, updates and regularly uses e-mail lists for all PJM Members and affected state commissions.

Clean Section

6.6 Forward Coordination Processes

1. For each Reciprocal Coordinated Flowgate, a managing entity and an owning entity will be defined. The manager will be responsible for all calculations regarding that Flowgate; the owner will define the set of Firm Transmission Service reservations to be utilized when determining Firm Transmission Service impacts on that Flowgate.
2. Managing entities will calculate both Historic Firm Gen-to-Load Flow impacts and historic Firm Transmission Service impacts for all entities. These impacts will be used to define the Historic Ratio and the Allocation of transmission capability.
3. The managing entity will utilize the current NERC IDC Base Case (or other mutually agreeable base case) to determine impacts. The case should be updated with the most current set of outage data for the time period being calculated.
4. Managing entities will calculate Allocations on the following schedule:

Allocation Run Type	Allocation Process Start	Range Allocated	Allocation Process Complete
April Seasonal Firm	Every April 1 at 8:00 EST	Twelve monthly values from October 1 of the current year through September 30 of the next year	April 1 at 12:00 EST
October Seasonal Firm	Every October 1 at 8:00 EST	Twelve monthly values from April 1 of next year through March 31 of the following year	October 1 at 12:00 EST
Monthly Firm	Every month on the second day of the month at 8:00 EST	Six monthly values for the next six successive months	2 nd of the month at 12:00 EST
Weekly Firm	Every Monday at 8:00 EST	Seven daily values for the next Monday through Sunday	Monday at 12:00 EST
Two-Day Ahead Firm	Every Day at 17:00 EST	One daily value for the day after tomorrow	Current Day at 18:00 EST
Day Ahead Non-Firm	Every Day at 8:00 EST	Twenty-four hourly values for the next 24-hour period (Next Day HE1-HE24 EST)	Current Day at 9:00 EST

5. Historic Ratios are defined during the seasonal runs the first time an impact is calculated. For example, the 2004 April seasonal firm run would define the Historic Ratio for April 2005 – September 2005 (October through March would have been calculated during the 2003 October seasonal firm run). The Historic Ratio is based on the total impacts of the Reciprocal Entity on the Flowgate (Historic Firm Gen-to-Load Flows and historic Firm Transmission Service flows, down to 0%) relative to the total impacts of all other Reciprocal Entities' impacts on the Flowgate. For example, if Reciprocal Entity A had a 30 MW impact on the Flowgate and Reciprocal Entity B had a 70 MW impact on the Flowgate, the Historic Ratios would be 30% and 70%, respectively.

6. The same rules defined in the “Market-Based Operating Entity Congestion Management” Section 5 of this document for use in determining Firm Transmission Service impacts (NNL) shall apply when performing Allocations.
7. Additional rules to be used when considering Firm Transmission Service impacts are defined later within this section.
8. For each firm Allocation run described above, the managing entity will take the following steps to determine Allocations down to 0% for each of the Flowgates, in both the forward and reverse direction, they are assigned to manage:
 - a. Retrieve the Flowgate limit
 - b. Subtract the current Transmission Reliability Margin (TRM) value (may be zero)
 - c. Subtract the sum of all historically determined Firm Flow impacts for all entities based on impacts greater than or equal to 5%
 - d. Accommodation of Capacity Benefit Margin (CBM)
 - If no capacity remains after step (c), entities’ firm Allocation is limited to this amount (i.e., their Firm Flow impacts from impacts of 5% or greater), and the firm Allocation for the entity with functional control over the Flowgate is increased by the current CBM value (may be zero).
 - If capacity does remain after step (c), and the sum of all Reciprocal Entities’ impacts below 5% plus CBM is less than the remaining capacity from step (c), that capacity is allocated to the Reciprocal Entities pro-rata based on their Firm Flow impacts due to impacts less than 5% up to the total amount of their Firm Flow impacts due to impacts less than 5%.
 - If there is not sufficient capacity for all impacts below 5% plus CBM to be accommodated, the current CBM value is subtracted from the remaining capacity from step (c), and granted to the entity with functional control over the Flowgate. Any capacity remaining is allocated to the Reciprocal Entities pro-rata based on their Firm Flow impacts due to impacts less than 5%.
 - e. Any remaining capacity, after step (d) will be considered firm and allocated to Reciprocal Entities based on their Historic Ratio (as described in step 5). If the remaining capacity allocated to the entity with functional control over the Flowgate meets or exceeds the current CBM value, no further effort is needed. If the remaining capacity is less than the CBM, capacity will first be reduced by the CBM, and the entity with functional control over the Flowgate will be granted the capacity needed to support the CBM. In addition each Reciprocal Entity (including the entity with functional control over the Flowgate) will receive allocations determined as a pro-rata share of the remaining capacity (as described in Step 5).
 - f. Upon completion of the Allocation process, the managing entity will compare the current preliminary Allocation to the previous Allocations. For any given Flowgate, the larger of the Allocations will be considered the Allocation (i.e., an Allocation cannot decrease). Once all preliminary Allocations have been compared and the final Allocation determined, the managing entity will distribute the Allocations to the appropriate Reciprocal Entities. This Allocation will consist of the firm Gen-to-Load limit and a portion of capability that can be used either for Firm Transmission Service or additional firm Gen-to-Load service.

9. For the non-firm Allocation run described above, the managing entity will take the following steps to determine Allocations down to 0% for each of the Flowgates, in both the forward and reverse direction, they are assigned to manage. For each hour, the managing entity shall:
 - a. Retrieve the Flowgate limit
 - b. Subtract the current TRM value (may be zero)
 - c. Subtract the sum of all hourly historically determined Firm Flow impacts for all entities based on impacts greater than or equal to 5%
 - d. Subtract the sum of all hourly historically-determined Firm Flow impacts for all Reciprocal Entities based on impacts less than 5%.
 - e. Any remaining capacity will be allocated to Reciprocal Entities based on their Historic Ratio (as described in step 5).
 - f. The two-day ahead firm Allocation is subtracted from the total entity Allocation (from steps c, d, and e).
 - If the result is positive, this value will be equivalent to the Priority 6-NN Allocation/limit, and the Firm Flow Limit for 0% Market Flows will be the two-day ahead firm Allocation.
 - If the result is negative or zero, the Priority 6-NN Allocation will be calculated by subtracting the total entity Allocation (from steps c, d and e) from the two-day ahead firm Allocation. The Firm Flow Limit for 0% Market Flows will be the equivalent of the total entity allocation.
 - g. Upon completion of the Allocation process, the managing entity will distribute the Allocations to the appropriate Reciprocal Entities. These Allocations will be considered non-firm network service.

When a Market-Based Operating Entity is uploading Firm Market Flow contributions to the IDC, they will be responsible for ensuring that any firm Allocations are properly accounted for. If firm Allocations are used to provide additional firm network service, they should be included in the Firm Market Flow contribution. If they are used to provide additional Firm Transmission Service, they should not be included in the Firm Market Flow contribution.

The Market-Based Operating Entities will maintain in real-time their Firm Transmission Service and Network Non-Designated service impacts, including associated Market Flows, within their respective firm and Priority 6 total Allocations. The Firm Transmission Service impacts will be based on schedules. The Operating Entities participating in the Coordinated Process for Reciprocal Flowgates will respect their allocations when granting Firm Transmission Service.

Using the derived firm Allocation value, the Market-Based Operating Entity may choose to enter this value as a Flowgate limit for the respective Flowgate. If entered as a Flowgate limit, the Day-Ahead unit commitment will not permit flows to exceed this value as it selects units for this commitment. Market-Based Operating Entities will use the Flowgate limit to restrict unit outage scheduling for a Coordinated Flowgate when maintenance outage coordination indicates possible congestion and there is recent TLR activity on a Flowgate.

As Reciprocal Entities gain more experience in this process, implement and enhance their systems to perform the Firm Flow calculations and Allocations, they may change the timing requirements for the Forward Coordination Process by mutual agreement.

6.6.1 Determining Firm Transmission Service Impacts

Firm impacts used in the Allocation process incorporate the Firm Transmission Service flows. Similar to the network service calculation described previously, to calculate each Firm Transmission Service transaction's impact on the Flowgate, the following process is utilized:

1. Utilize a base case to determine the Generation Shift Factor for the source Control Area with respect to a specific Flowgate.
2. Utilize the same base case to determine the Generation Shift Factor for the sink Control Area with respect to that Flowgate.
3. Utilize superposition to calculate the TDF for that source to sink pair with respect to that Flowgate.
4. Multiply the transactions energy transfer by the TDF to determine that transactions flow on the Flowgate.

Summing each of these impacts by direction will provide the directional Firm Transmission Service impact on the Flowgate.

Combining the directional Firm Transmission Service impacts with the directional NNL impacts will provide the directional Firm Flows on the Flowgate.

6.6.2 Rules for Considering Firm Transmission Service

1. Firm Transmission Service and Designated Network Resources that have an OASIS reservation are included in the calculation.
2. Reciprocal Entities will utilize a Freeze Date of April 1, 2004. Reciprocal Entities will utilize a reference year of June 1, 2004 through May 31, 2005 for determining the confirmed set of reservations that will be used in the Allocation process. The reference year is used such that reservation impacts in a given month in the reference year are used for each comparable month going forward in the Allocation process. For example, the Allocations for July 2004, July 2005, and July 2006 etc. will always use the July 2004 reservation impacts from the reference year. Confirmed reservations received after the Freeze Date will not be considered.
3. A potential for duplicate reservations exists if a transaction was made on individual CA tariffs (not a regional tariff) and both parties to the transaction (source and sink) are Reciprocal Entities. In this case, each Reciprocal Entity will receive 50% of the transaction impact.
4. To the extent a partial path reservation is known to exist, it will have 100% of its impacts considered on Reciprocal Coordinated Flowgates owned by the party that sold the partial path service, split 50/50 between the Source Reciprocal Entity and the Sink Reciprocal Entity, and 0% of its impacts considered on other Reciprocal Coordinated Flowgates.
5. Because reservations that are totally within the footprint of the regional tariff do not have duplicate reservations, these reservations will have the full impact considered even

though both parties to the transaction (source and sink) are within the boundaries of the regional tariff and will be considered Reciprocal Entities, split 50/50 between the Source Reciprocal Entity and the Sink Reciprocal Entity, which in this case are the same. Similar to the firm network service calculation, the Firm Transmission Service calculation:

- a. Will consider all reservations (including those with less than 5% impact)
- b. Will base response factors on the topology of the system for the period under consideration.
- c. In general, will not make a generation-to-load calculation where a reservation exists.

6.6.3 Limiting Firm Transmission Service

The Flowgate Allocations down to 0% will represent the share of total flowgate capacity (STFC) that a particular entity has been allocated. This STFC represents the maximum total impact that entity is allowed to have on that Flowgate.

In order to coordinate with the existing AFC process, it is necessary that this number be converted to an available STFC (ASTFC) which represents how much Flowgate capability remains available on that Flowgate for use as Transmission Service. In order to accomplish this, the entity receiving STFC will do the following:

Step	Example
1.) Start with the STFC	100
2.) Add all forward Gen to Load impacts (down to 0%) and all Reverse Gen to Load impacts (down to 0%) to obtain the Net Gen to Load impacts. The Gen to Load impacts should be based on the <i>best estimate</i> of firm Gen-to-Load Flow for the time period being evaluated.	$42 + (-20) = 22$
3.) Subtract the net Gen to Load impacts from the STFC	$100 - 22 = 78$
4.) Subtract the CBM to produce an interim STFC	$78 - 0 = 78$
5.) Determine the Transmission Service impacts of service that has been sold. By default, it should be assumed that 100% of forward service and 15% of counterflowing service will be scheduled and used. However, if Flowgate "owner" uses different percentages in their AFC calculation and the Flowgate manager's calculation	$58 + (0.15 (-45)) =$ $58 + (-6.75) \approx$ $58 + (-7) = 51$

<p>engine support it, percentages other than 100% and 15% may be used. Add all forward Transmission Service impacts (down to 0%) and all appropriate reverse Transmission Service impacts (down to 0%) to obtain the weighted net Transmission Service impacts. The Transmission Service impacts should be based on the <i>current</i> set of reservations in effect for the time period being evaluated (<i>not</i> the historic reservation set)</p>	
<p>6.) Subtract the weighted net Transmission Service impacts from the Interim STFC. The result is the ASTFC</p>	<p>$78 - 51 = 27$</p>

The ASTFC values for Reciprocal Coordinated Flowgates will be posted on OASIS along with the Allocation results. This ASTFC can then be compared with the AFC calculated through traditional means when evaluating firm requests made on OASIS.

If the AFC value is LOWER than the ASTFC value, the AFC value should be utilized for the purpose of approving/denying service. In this case, while the Allocation process might indicate that the entity has rights to a particular Flowgate through the Allocation process, current conditions on that Flowgate indicate that selling those rights would result in overselling of the Flowgate, introducing a reliability problem.

If the AFC value is HIGHER than the ASTFC value, the ASTFC value should be utilized for the purpose of approving/denying service. In this case, while the AFC process might indicate that the entity can sell more service than the Allocation might indicate, the entity is bound to not sell beyond their Allocation.

If a Reciprocal Entity uses all of its firm Allocation and desires to obtain additional capacity from another Reciprocal Entity who has remaining capacity, that additional capacity may be obtained using the procedures documented below.

Marked Section

(Redline)

6.6 Forward Coordination Processes

1. For each Reciprocal Coordinated Flowgate, a managing entity and an owning entity will be defined. The manager will be responsible for all calculations regarding that Flowgate; the owner will define the set of Firm Transmission Service reservations to be utilized when determining Firm Transmission Service impacts on that Flowgate.
2. Managing entities will calculate both Historic Firm Gen-to-Load Flow impacts and historic Firm Transmission Service impacts for all entities. These impacts will be used to define the Historic Ratio and the Allocation of transmission capability.
3. The managing entity will utilize the current NERC IDC Base Case (or other mutually agreeable base case) to determine impacts. The case should be updated with the most current set of outage data for the time period being calculated.
4. Managing entities will calculate Allocations on the following schedule:

Allocation Run Type	Allocation Process Start	Range Allocated	Allocation Process Complete
April Seasonal Firm	Every April 1 at 8:00 EST	Twelve monthly values from October 1 of the current year through September 30 of the next year	April 1 at 12:00 EST
October Seasonal Firm	Every October 1 at 8:00 EST	Twelve monthly values from April 1 of next year through March 31 of the following year	October 1 at 12:00 EST
Monthly Firm	Every month on the second day of the month at 8:00 EST	Six monthly values for the next six successive months	2 nd of the month at 12:00 EST
Weekly Firm	Every Monday at 8:00 EST	Seven daily values for the next Monday through Sunday	Monday at 12:00 EST
Two-Day Ahead Firm	Every Day at 17:00 EST	One daily value for the day after tomorrow	Current Day at 18:00 EST
Day Ahead Non-Firm	Every Day at 8:00 EST	Twenty-four hourly values for the next 24-hour period (Next Day HE1-HE24 EST)	Current Day at 9:00 EST

5. Historic Ratios are defined during the seasonal runs the first time an impact is calculated. For example, the 2004 April seasonal firm run would define the Historic Ratio for April 2005 – September 2005 (October through March would have been calculated during the 2003 October seasonal firm run). The Historic Ratio is based on the total impacts of the Reciprocal Entity on the Flowgate (Historic Firm Gen-to-Load Flows and historic Firm Transmission Service flows, down to 0%) relative to the total impacts of all other Reciprocal Entities' impacts on the Flowgate. For example, if Reciprocal Entity A had a 30 MW impact on the Flowgate and Reciprocal Entity B had a 70 MW impact on the Flowgate, the Historic Ratios would be 30% and 70%, respectively.

6. The same rules defined in the “Market-Based Operating Entity Congestion Management” Section 5 of this document for use in determining Firm Transmission Service impacts (NNL) shall apply when performing Allocations.
7. Additional rules to be used when considering Firm Transmission Service impacts are defined later within this section.
8. For each firm Allocation run described above, the managing entity will take the following steps to determine Allocations down to 0% for each of the Flowgates, in both the forward and reverse direction, they are assigned to manage:
 - a. Retrieve the Flowgate limit
 - b. Subtract the current Transmission Reliability Margin (TRM) value (may be zero)
 - c. Subtract the sum of all historically determined Firm Flow impacts for all entities based on impacts greater than or equal to 5%
 - d. Accommodation of Capacity Benefit Margin (CBM)
 - If no capacity remains after step (c), entities’ firm Allocation is limited to this amount (i.e., their Firm Flow impacts from impacts of 5% or greater), and the firm Allocation for the entity with functional control over the Flowgate is increased by the current CBM value (may be zero).
 - If capacity does remain after step (c), and the sum of all Reciprocal Entities’ impacts below 5% plus CBM is less than the remaining capacity from step (c), that capacity is allocated to the Reciprocal Entities pro-rata based on their Firm Flow impacts due to impacts less than 5% up to the total amount of their Firm Flow impacts due to impacts less than 5%.
 - If there is not sufficient capacity for all impacts below 5% plus CBM to be accommodated, the current CBM value is subtracted from the remaining capacity from step (c), and granted to the entity with functional control over the Flowgate. Any capacity remaining is allocated to the Reciprocal Entities pro-rata based on their Firm Flow impacts due to impacts less than 5%.
 - e. Any remaining capacity, after step (d) will be considered firm and allocated to Reciprocal Entities based on their Historic Ratio (as described in step 5). If the remaining capacity allocated to the entity with functional control over the Flowgate meets or exceeds the current CBM value, no further effort is needed. If the remaining capacity is less than the CBM, capacity will first be reduced by the CBM, and the entity with functional control over the Flowgate will be granted the capacity needed to support the CBM. In addition each Reciprocal Entity (including the entity with functional control over the Flowgate) will receive allocations determined as a pro-rata share of the remaining capacity (as described in Step 5).
 - f. Upon completion of the Allocation process, the managing entity will compare the current preliminary Allocation to the previous Allocations. For any given Flowgate, the larger of the Allocations will be considered the Allocation (i.e., an Allocation cannot decrease). Once all preliminary Allocations have been compared and the final Allocation determined, the managing entity will distribute the Allocations to the appropriate Reciprocal Entities. This Allocation will consist of the firm Gen-to-Load limit and a portion of capability that can be used either for Firm Transmission Service or additional firm Gen-to-Load service.

9. For the non-firm Allocation run described above, the managing entity will take the following steps to determine Allocations down to 0% for each of the Flowgates, in both the forward and reverse direction, they are assigned to manage. For each hour, the managing entity shall:
 - a. Retrieve the Flowgate limit
 - b. Subtract the current TRM value (may be zero)
 - c. Subtract the sum of all hourly historically determined Firm Flow impacts for all entities based on impacts greater than or equal to 5%
 - d. Subtract the sum of all hourly historically-determined Firm Flow impacts for all Reciprocal Entities based on impacts less than 5%.
 - e. Any remaining capacity will be allocated to Reciprocal Entities based on their Historic Ratio (as described in step 5).
 - f. The two-day ahead firm Allocation is subtracted from the total entity Allocation (from steps c, d, and e).
 - If the result is positive, this value will be equivalent to the Priority 6-NN Allocation/limit, and the Firm Flow Limit for 0% Market Flows will be the two-day ahead firm Allocation.
 - If the result is negative or zero, the Priority 6-NN Allocation will be calculated by subtracting the total entity Allocation (from steps c, d and e) from the two-day ahead firm Allocation. The Firm Flow Limit for 0% Market Flows will be the equivalent of the total entity allocation.
 - g. Upon completion of the Allocation process, the managing entity will distribute the Allocations to the appropriate Reciprocal Entities. These Allocations will be considered non-firm network service.

When a Market-Based Operating Entity is uploading Firm Market Flow contributions to the IDC, they will be responsible for ensuring that any firm Allocations are properly accounted for. If firm Allocations are used to provide additional firm network service, they should be included in the Firm Market Flow contribution. If they are used to provide additional Firm Transmission Service, they should not be included in the Firm Market Flow contribution.

The Market-Based Operating Entities will maintain in real-time their Firm Transmission Service and Network Non-Designated service impacts, including associated Market Flows, within their respective firm and Priority 6 total Allocations. The Firm Transmission Service impacts will be based on schedules. The Operating Entities participating in the Coordinated Process for Reciprocal Flowgates will respect their allocations when granting Firm Transmission Service.

Using the derived firm Allocation value, the Market-Based Operating Entity may choose to enter this value as a Flowgate limit for the respective Flowgate. If entered as a Flowgate limit, the Day-Ahead unit commitment will not permit flows to exceed this value as it selects units for this commitment. Market-Based Operating Entities will use the Flowgate limit to restrict unit outage scheduling for a Coordinated Flowgate when maintenance outage coordination indicates possible congestion and there is recent TLR activity on a Flowgate.

As Reciprocal Entities gain more experience in this process, implement and enhance their systems to perform the Firm Flow calculations and Allocations, they may change the timing requirements for the Forward Coordination Process by mutual agreement.

6.6.1 Determining Firm Transmission Service Impacts

Firm impacts used in the Allocation process incorporate the Firm Transmission Service flows. Similar to the network service calculation described previously, to calculate each Firm Transmission Service transaction's impact on the Flowgate, the following process is utilized:

1. Utilize a base case to determine the Generation Shift Factor for the source Control Area with respect to a specific Flowgate.
2. Utilize the same base case to determine the Generation Shift Factor for the sink Control Area with respect to that Flowgate.
3. Utilize superposition to calculate the TDF for that source to sink pair with respect to that Flowgate.
4. Multiply the transactions energy transfer by the TDF to determine that transactions flow on the Flowgate.

Summing each of these impacts by direction will provide the directional Firm Transmission Service impact on the Flowgate.

Combining the directional Firm Transmission Service impacts with the directional NNL impacts will provide the directional Firm Flows on the Flowgate.

6.6.2 Rules for Considering Firm Transmission Service

1. Firm Transmission Service and Designated Network Resources that have an OASIS reservation are included in the calculation.
2. Reciprocal Entities will utilize a Freeze Date of April 1, 2004. Reciprocal Entities will utilize a reference year of June 1, 2004 through May 31, 2005 for determining the confirmed set of reservations that will be used in the Allocation process. The reference year is used such that reservation impacts in a given month in the reference year are used for each comparable month going forward in the Allocation process. For example, the Allocations for July 2004, July 2005, and July 2006 etc. will always use the July 2004 reservation impacts from the reference year. Confirmed reservations received after the Freeze Date will not be considered.
3. A potential for duplicate reservations exists if a transaction was made on individual CA tariffs (not a regional tariff) and both parties to the transaction (source and sink) are Reciprocal Entities. In this case, each Reciprocal Entity will receive 50% of the transaction impact.
4. To the extent a partial path reservation is known to exist, it will have 100% of its impacts considered on Reciprocal Coordinated Flowgates owned by the party that sold the partial path service, split 50/50 between the Source Reciprocal Entity and the Sink Reciprocal Entity, and 0% of its impacts considered on other Reciprocal Coordinated Flowgates.
5. Because reservations that are totally within the footprint of the regional tariff do not have duplicate reservations, these reservations will have the full impact considered even

though both parties to the transaction (source and sink) are within the boundaries of the regional tariff and will be considered Reciprocal Entities, split 50/50 between the Source Reciprocal Entity and the Sink Reciprocal Entity, which in this case are the same. Similar to the firm network service calculation, the Firm Transmission Service calculation:

- a. Will consider all reservations (including those with less than 5% impact)
- b. Will base response factors on the topology of the system for the period under consideration.
- c. In general, will not make a generation-to-load calculation where a reservation exists.

6.6.3 Limiting Firm Transmission Service

The Flowgate Allocations down to 0% will represent the share of total flowgate capacity (STFC) that a particular entity has been allocated. This STFC represents the maximum total impact that entity is allowed to have on that Flowgate.

In order to coordinate with the existing AFC process, it is necessary that this number be converted to an available STFC (ASTFC) which represents how much Flowgate capability remains available on that Flowgate for use as Transmission Service. In order to accomplish this, the entity receiving STFC will do the following:

Step	Example
1.) Start with the STFC	100
2.) Add all forward Gen to Load impacts (down to 0%) and all Reverse Gen to Load impacts (down to 0%) to obtain the Net Gen to Load impacts. The Gen to Load impacts should be based on the <i>best estimate</i> of firm Gen-to-Load Flow for the time period being evaluated.	$42 + (-20) = 22$
3.) Subtract the net Gen to Load impacts from the STFC	$100 - 22 = 78$
4.) Subtract the CBM to produce an interim STFC	$78 - 0 = 78$
5.) Determine the Transmission Service impacts of service that has been sold. By default, it should be assumed that 100% of forward service and 15% of counterflowing service will be scheduled and used. However, if Flowgate "owner" uses different percentages in their AFC calculation and the Flowgate manager's calculation	$58 + (0.15 (-45)) =$ $58 + (-6.75) \approx$ $58 + (-7) = 51$

<p>engine support it, percentages other than 100% and 15% may be used. Add all forward Transmission Service impacts (down to 0%) and all appropriate reverse Transmission Service impacts (down to 0%) to obtain the weighted net Transmission Service impacts. The Transmission Service impacts should be based on the <i>current</i> set of reservations in effect for the time period being evaluated (<i>not</i> the historic reservation set)</p>	
<p>6.) Subtract the weighted net Transmission Service impacts from the Interim STFC. The result is the ASTFC</p>	<p>$78 - 51 = 27$</p>

The ASTFC values for Reciprocal Coordinated Flowgates will be posted on OASIS along with the Allocation results. This ASTFC can then be compared with the AFC calculated through traditional means when evaluating firm requests made on OASIS.

If the AFC value is LOWER than the ASTFC value, the AFC value should be utilized for the purpose of approving/denying service. In this case, while the Allocation process might indicate that the entity has rights to a particular Flowgate through the Allocation process, current conditions on that Flowgate indicate that selling those rights would result in overselling of the Flowgate, introducing a reliability problem.

If the AFC value is HIGHER than the ASTFC value, the ASTFC value should be utilized for the purpose of approving/denying service. In this case, while the AFC process might indicate that the entity can sell more service than the Allocation might indicate, the entity is bound to not sell beyond their Allocation.

If a Reciprocal Entity uses all of its firm Allocation and desires to obtain additional capacity from another Reciprocal Entity who has remaining capacity, that additional capacity may be obtained using the procedures documented below.

CERTIFICATE OF CONCURRENCE

This is to certify that the Midwest Independent Transmission System Operator, Inc. (“MISO”) assents and concurs with the revisions to the Joint Operating Agreement Between Midwest Independent Transmission System Operator, Inc. and PJM Interconnection, L.L.C. (“PJM”), submitted on November 11, 2011, in Docket No. ER11-3979-003, pursuant to the Settlement Agreement and Offer of Settlement in Docket Nos. EL10-45, EL10-46 and EL10-60 and approved by the Commission.¹ The Midwest ISO hereby files this Certificate of Concurrence in lieu of filing the rate schedule specified below.

Tariff Designations:

Midwest Independent Transmission System Operator, Inc.
FERC Electric Tariff, Second Revised Rate Schedule FERC No. 5

PJM Interconnection, L.L.C.
FERC Electric Tariff, Second Revised Rate Schedule FERC No. 38

Respectfully submitted,

Midwest Independent Transmission System Operator, Inc.

By: /s/ Gregory A. Troxell

Gregory A. Troxell
Assistant General Counsel
Midwest Independent Transmission System Operator, Inc.

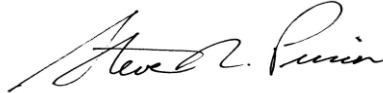
Dated: November 10, 2011

¹ Midwest Indep. Transmission Sys. Operator, Inc., 135 FERC ¶ 61,243 (2011). On June 16, 2011, the Commission issued an Order approving Contested Settlement (“June 16 Order”).

CERTIFICATE OF SERVICE

I hereby certify that I this day served the foregoing document upon each person designated on the official service list compiled by the Secretary in Commission Docket Nos. ER11-3979-000, EL10-45-000, EL10-46-000 and EL10-60-000.

Dated at Norristown, PA this 10th day of November 2011.



Steven R. Pincus
Assistant General Counsel
PJM Interconnection, L.L.C.