



**Net Energy Metering Senior Task Force (NEMSTF)
Tier 1 CONSENSUS PROPOSAL REPORT
May 25, 2012
Research, Findings and Recommendations**

INTRODUCTION

The creation of a Net Energy Metering Senior Task Force (NEMSTF) was recommended to establish a venue and forum for Net Energy Metering (NEM) practitioners to facilitate and examine the impact of NEM initiatives within the PJM region¹. Through state interconnection processes and regulations, NEMs are generally permitted to interconnect to the distribution systems of PJM Electric Distribution Companies (EDCs) and may involve payments by the EDCs to NEM project owners on a “net” basis for any excess energy flowing on to the distribution system from the NEM site. Due to evolving laws and regulations which, in some cases, permit project sizing in excess of historical customer consumption, increasing concern arises that NEM projects may, at some point, simultaneously generate energy in excess of localized distribution-level consumption. When this occurs, the potential for reverse power flows from the distribution system to the transmission system may result. The NEMSTF was asked to review circumstances such as this and investigate relevant regulations, jurisdictional rules, operational impacts, and evolving NEM topics such as resource aggregation.

Moreover, the NEMSTF was formed to work with the appropriate PJM personnel and other stakeholders to recommend appropriate modifications to the PJM tariff, manuals, or business rules as well as support the scoping and conceptual design of any potential changes to settlement systems, generator interconnection processes, or operational modeling.

The NEMSTF consensus proposal described below is recommended for endorsement and approval by the members of the Markets and Reliability Committee (MRC) to address reporting, assessment, modeling and settlement issues associated with potential NEM energy flows onto the bulk transmission system administered by PJM. This report will further document and advise of additional potential future considerations to PJM operations, reliability and markets should reverse power flows proliferate as a result of the increasing amount of NEM facilities.

Consensus was achieved using the Tier 1 decision-making method of the PJM stakeholder process. This report was developed in accordance with procedures documented in Section 7 of the PJM Stakeholder Process Manual (M-34). No Operating Agreement or Tariff revisions are proposed resulting from the NEMSTF efforts. Several recommendations surrounding modeling and settlements are proposed by the NEMSTF for MRC consideration. The NEMSTF stakeholders seek MRC concurrence for minor PJM Manual amendments to accommodate PJM’s members confronted with NEM implications. Additionally, under the “Alternative Design Components Considered” section of this report, the NEMSTF stakeholders point out several potential areas for continued monitoring. These areas may be revisited as NEM penetration continues and or further evolves.

¹ For purposes of this report and discussion of net injections/reverse power flows, the reader is advised this report solely addresses energy flows due to net energy metering projects.



BACKGROUND

IMPORTANT NOTE: NEM is a retail construct and the associated laws, regulations and guidelines applicable to NEM implementation and operation are specific and unique to each state. The NEMSTF recognized the retail origins of NEM and was chartered to focus on the potential impacts and accommodations when considered solely within the framework of PJM administered markets and services. In other words, the NEMSTF focused only on wholesale implications of NEM projects and, similarly, was explicit that it did not seek to interpret, amend or influence retail statutory or regulatory NEM standards.²

PJM POSITION

- PJM sees NEM as a retail mechanism which promotes distributed generation, utilization of renewable energy sources and permits net settlements between EDCs and NEM customers on a monthly/annual basis.
- PJM provides planning, operational, market and settlement services to the wholesale sector and conducts settlements between PJM members on an hourly/weekly basis.
- The fundamental design to PJM's operations, markets, and settlements is real-time measurement that results in publication of 5-minute Locational Marginal Prices (LMPs)
- Since PJM calculates settlements in real-time and settles on an hourly integrated basis, PJM strives to preserve and enhance the accuracy of and reliance upon LMP. Therefore, PJM asserts that:
 - Net energy injections should be modeled, metered or calculated as generation at a specific node or LMP bus in the PJM system model
 - Consumption (load), obtained as an aggregate value from the Load Serving Entities (LSE) and EDCs, should be modeled, metered or calculated as a withdrawal at the applicable node or load bus in the PJM system model
 - Load buses should not exhibit persistent "negative load" values due to reverse power injections (whether by NEM or any other source)
 - PJM does not support methods that may distort the locational aspect of LMPs (such as broad geographic modeling or aggregation)

1. RECOMMENDED PROPOSAL

The NEMSTF recommends the following specific actions be taken with respect to reverse power flows (net energy injections) due to generation in excess of load that appears at a PJM transmission system load bus.

a. Modeling

- i. **Design Component** - Analyze net negative MWh load buses (pnodes) related to NEM generation.
- ii. **Status Quo** – To date, PJM has not monitored or modeled this behavior, however an initial assessment by PJM suggests that only a *de minimis* number of load buses exhibit net negative values and are not currently persistent over time.

² Throughout the proceedings of this senior task force, concerns regarding interconnections, state NEM initiatives, public policy goals and federal jurisdiction surfaced. On April 5, 2012, PJM received a resolution from the Organization of PJM States, Inc. (OPSI) and is attached in Appendix II., Supplemental Documents.



- iii. **Recommendation & Implementation points** – PJM will implement a periodic assessment process to determine a relevant net generation injection threshold at a load bus that may impact LMP accuracy. PJM will document this process in the PJM Manuals. If persistent negative load bus readings occur, PJM will work with the local EDC to determine if the cause is erroneous modeling or actual reverse power flows from distribution-level system(s) to a load bus. PJM and EDCs shall coordinate to resolve or reconcile modeling as necessary to ensure that net energy injections are properly modeled as generation. PJM will implement a quarterly review as described above and will trend overall incidents of net energy injections at load buses.
- b. **Settlements** –
- i. **Design Component** - Adjust the load obligations of LSEs to reflect a net injection of energy / net consumption offset during a NEM billing cycle.
 - ii. **Status Quo** - LSE load obligations may be adjusted on a two-month lag via the existing load reconciliation process (Settlement B). EDCs also have the ability to have PJM perform subsequent load reconciliation within a two year window if all affected LSEs agree to it (Settlement C). Additionally, while individual load responsibility eSchedules may carve out negative load MWh, the total load carved out to a given LSE must result in a positive value. Negative MWh of load for an LSE account will not flow through the PJM Settlement A calculations.
 - iii. **Recommendation & Implementation points** - Utilize existing PJM business process(es) to accommodate reconciliation of net load MWh. LSE/EDC manages individual load responsibilities via eSchedules, including the reconciliation process. PJM will notate the reconciliation treatment, which may be used by LSE/EDC, of net load MWh in the PJM Manuals. The PJM eSchedules process remains unchanged and continues to only allow positive load MWh values for LSEs.
- c. **Settlements Reporting** -
- i. **Design Component** - Creation of aggregate pnode to allow aggregation of hourly, interval metered NEMs that are below a certain threshold.
 - ii. **Status Quo** - Generation MWh values submitted to eMTR must be attributed to a single pnode in the PJM network bus model, not to multiple pnodes. Aggregated NEM generation may be able to be calculated and attributed across multiple pnodes or attributed to a representative pnode on a case by case basis.
 - iii. **Recommendation & Implementation points** – EDCs may modify their own applications to account for this. PJM will work with the EDC to determine an appropriate methodology for aggregating and/or estimating net generation injections into the PJM network transmission model due to NEM facilities.
- d. **Settlements** -
- i. **Design Component** - Allow financial adjustment mechanism for non-hourly, non-interval metered NEMs, similar to the existing monthly meter correction process (reflecting EDC materiality threshold as applicable).
 - ii. **Status Quo** - EDCs may submit generation meter correction MWh in the first three business days of the following month. For each generation correction, the financial true-up uses a monthly generation-weighted average LMP at that generator's location. Note that the EDC and generator may also calculate and submit a mutually



agreed to financial adjustment to PJM to pass through a billing adjustment in the PJM billing statements.

- iii. **Recommendation & Implementation points** – Utilize existing PJM business process to accommodate end-of-month meter corrections for NEM "generation" true-ups. PJM will notate in PJM Manuals the available treatment of net injections in the meter correction process.

2. ALTERNATE PROPOSAL(S) –

- a. As a Tier 1 Consensus was achieved – no alternative proposals were pursued or necessary.

3. ALTERNATIVE DESIGN COMPONENTS CONSIDERED - The following two Design Components and respective Options were examined and a majority vote of the stakeholders offered guidance to maintain the current status quo regarding these topics. While the status quo was recommended, the NEMSTF concluded that these items are deemed worthy of future or foreseeable consideration by interested stakeholders. Pursuit of the following design components may be considered through a future problem statement brought to the MRC or other responsible standing committees for consideration.

a. Business Process -

- i. **Design Component** – Adopt a reporting requirement by which PJM must be notified of attachment of NEM generators rated in excess of a given MW capability threshold.
- ii. **Status Quo** – PJM OATT Schedule 15 provides that all generators are reported to PJM except for retail Behind the Meter and NEM.
- iii. **Recommendation** – No recommendation was supported at this time, however one stakeholder suggested voluntarily reporting sizable NEM projects including location, capability, and generator type to PJM.

b. Business Process -

- i. **Design Component** - Update Metering and Communications - Manual 14D Exhibit 4 (page 25) to include specific NEM guidance
- ii. **Status Quo** – Existing PJM Manual 14D standards for types, sizes, accuracy of meters and communication devices
- iii. **Recommendation & Implementation points** – No recommendation was supported at this time, however, some stakeholders noted that future discussions may be needed with increasing NEM penetration.

4. STAKEHOLDER PROCESS SUMMARY

Stakeholder Meetings - The NEMSTF stakeholder meetings were conducted between January 4, 2012 and May 30, 2012 and involved 14 scheduled meetings over this period. The NEMSTF was formally chartered by the MRC on February 23rd, 2012. The NEMSTF Charter is attached via hyperlink in the following Appendix.

Education - As its first task, the NEMSTF stakeholders engaged in a 5 sessions of mutual education and multi-lateral learning to ensure that all participants were of similar understanding



of the issues at hand. The uniqueness of the state-by-state NEM definitions and rules coupled with the breadth of the investigation of potential NEM impacts across PJM's services and accountabilities required a more thorough education phase than is typical. The education phase concluded with a day of panel presentations by NEM practitioners. The senior task force subsequently developed the attached [Table of NEM Provisions by State](#) to provide a centralized PJM resource to permit stakeholders to research, sort and filter relevant NEM provisions.

Status Reporting – Regular status reports were provided over the course of the senior task force's efforts. Reports were provided to the TOA-AC, TODO, MRC, and OPSI representatives. Formal minutes were promptly posted to the PJM NEMSTF website and monthly status reports were submitted to the MRC.

Interest identification, Design Components, Solution Options – The NEMSTF stakeholders participated in formal interest identification, design component development, option examination and rounds of polling and formal voting. A design principle agreed upon by the stakeholders was to seek to develop designs that were “permissive” and allowed the individual stakeholder the decision, timing and option (as opposed to the obligation) to adopt a change consistent with NEM designs and timing in their respective state. The NEMSTF followed the Manual 34 guidelines to manage its efforts.

Final report - The NEMSTF reached a Tier 1 Consensus Package which forms the basis of its report. The NEMSTF completed its work to support a MRC report and recommendation no later than June 1, 2012.

4. APPENDIX I: STAKEHOLDER PARTICIPATION

A list is provided here of the NEMSTF stakeholders who participated at the meetings where the interests/design components/options/alternatives were developed.

Company Name	Last Name	First Name	Sector
AEP Appalachian Transmission Company, Inc.	Myser	Carole	Transmission Owner
American Municipal Power, Inc.	Norton	Chris	Generation Owner
American Municipal Power, Inc.	Walker	Alice	Generation Owner
Appalachian Power Company	Feliks	Kent	Transmission Owner
Appalachian Power Company	Laios	Takis	Transmission Owner
Appalachian Power Company	Ondayko	Brock	Transmission Owner
Atlantic City Electric Company	Juhrden	Jane	Electric Distributor
Atlantic City Electric Company	Steffel	Steve	Electric Distributor
Baltimore Gas and Electric Company	Fernandes	John	Transmission Owner
Baltimore Gas and Electric Company	Fernandez	John	Transmission Owner
Baltimore Gas and Electric Company	Guy	Gary	Transmission Owner
Baltimore Gas and Electric Company	Kotras	Craig	Transmission Owner
Castlebridge Energy Group, LLC	Wallace	Daniel	Other Supplier
Commonwealth Edison Company	Gilchrist	Joe	Transmission Owner
Commonwealth Edison Company	McInerney	Timothy	Transmission Owner
Commonwealth Edison Company	McNulty	James	Transmission Owner
Commonwealth Edison Company	Miller	John	Transmission Owner



Constellation Energy Commodities Group, Inc.	Barker	Jason	Transmission Owner
Constellation NewEnergy, Inc.	Miller	Bryan	Transmission Owner
Covanta Energy Group, Inc.	Hebert	Damase	Generation Owner
Customized Energy Solutions, Ltd.*	Filomena	Guy	Not Applicable
Customized Energy Solutions, Ltd.*	McDonald	Steven	Not Applicable
Customized Energy Solutions, Ltd.*	Paulson	Erik	Not Applicable
Customized Energy Solutions, Ltd.*	Schofield	William	Not Applicable
Dayton Power & Light Company (The)	Horstmann	John	Transmission Owner
Dayton Power & Light Company (The)	Sobecki	Judi	Transmission Owner
DE Public Service Commission	Farber	John	Not Applicable
Delmarva Power & Light Company (DPL DE GSP)	Steffel	Steve	Electric Distributor
Direct Energy	Scarp	Dave	Other Supplier
District of Columbia Public Service Commission	Cleverdon	Dan	Not Applicable
Division of the Public Advocate of State of Delaware	Maucher	Andrea	End User Customer
Dominion Virginia Power	Payne	Harold	Generation Owner
Downes Associates, Inc.	Hirsch	Stephen	Other Supplier
DPL	Sabecki	Judy	Transmission Owner
Duke Energy Business Services LLC	Jennings	Kenneth	Generation Owner
Duke Energy Commercial Asset Management (CGE)	Jennings	Kenneth	Generation Owner
Duke Energy Ohio, Inc.	Abbott	Tim	Transmission Owner
Duquesne Light Company	Clover	Bernita	Transmission Owner
Duquesne Light Company	Flaherty	Dale	Transmission Owner
Edison Mission Marketing and Trading, Inc.	Ellis	Jeffrey	Generation Owner
Ellis Power	Hoatson	Tom	Transmission Owner
Energy Consulting Services, LLC	Hamilton	Brian	Other Supplier
Energy Curtailment Specialists, Inc.	Ainspan	Malcolm	Other Supplier
EnergyConnect, Inc.	Campbell	Bruce	Other Supplier
Exelon Business Services Co., LLC	Kuflik	Jennifer	Transmission Owner
Exelon Generation Co., LLC (ComEd Gen)	Pratzon	David	Transmission Owner
Exelon Generation Co., LLC (ComEd Gen)	Stadelmeyer	Rebecca	Transmission Owner
FirstEnergy Corporation	Sealy	Karen	Transmission Owner
FirstEnergy Corporation	Thorn	Mike	Transmission Owner
FirstEnergy Solutions Corporation	Bell	PD	Transmission Owner
FirstEnergy Solutions Corporation	Lindeman	Tony	Transmission Owner
FirstEnergy Solutions Corporation	Marton	David	Transmission Owner
FirstEnergy Solutions Corporation	Miller	Don	Transmission Owner
FirstEnergy Solutions Corporation	Rommel	B	Transmission Owner
FirstEnergy Solutions Corporation	Stein	Ed	Transmission Owner
IMM	Mayes	Jeffrey	Not Applicable
Indiana Municipal Power Agency	Brown	Larry	Generation Owner
Interstate Renewable Energy Council	Culley	Thad	Not Applicable
Interstate Renewable Energy Council	Keyes	Jason	Not Applicable
JP Morgan	O'Connell	Bob	Other Supplier
Long Island Lighting Company d/b/a LIPA	Johnson	Carl	Other Supplier
Maryland Energy Administration	Lucas	Kevin	None
Maryland PSC	Krauthamer	Michael	Not Applicable
McNees Wallace & Nurick LLC	Bruce	Susan	Not Applicable



McNees Wallace & Nurick LLC	Karandrikas	Vasiliki	Not Applicable
MD Public Service Commission	Mosier	Kevin	Not Applicable
NJBPU	Hunter	Scott	Not Applicable
North American Electric Reliability Corporation	Hamilton	Brian	Not Applicable
North Carolina Electric Membership Corporation	Beadle	Robert	Electric Distributor
North Carolina Electric Membership Corporation	Bennett	Tim	Electric Distributor
North Carolina Electric Membership Corporation	Huis	Diane	Electric Distributor
Not Listed	Prabhakher	Pritham	Not Applicable
NRDC-FERC Project	Black	Terry	Not Applicable
NRG Power Marketing, LLC	Esposito	Patricia	Generation Owner
NRG Power Marketing, LLC	Walters	Jason	Generation Owner
Office of the People's Counsel for the District of Columbia	Garg	Rishi	Not Applicable
Office of the People's Counsel for the District of Columbia	Mariam	Yohannes	Not Applicable
Old Dominion Electric Cooperative	Lieberman	Steven	Electric Distributor
OPSI	Barua	Raj	Not Applicable
Other, Not Provided	Hunter	Benjamin	Not Provided
Other, Not Provided	Winka	Michael	Not Provided
PBF Power Marketing LLC	Fuess	Jay	Generation Owner
PBF Power Marketing LLC	McCabe	Jim	Generation Owner
PECO Energy Company	Carrado	Regina	Transmission Owner
PECO Energy Company	Reilly	Carol	Transmission Owner
PECO Energy Company	Zacconi	Bruno	Transmission Owner
Pennsylvania Electric Company	Stein	Ed	Transmission Owner
Pennsylvania Public Utility Commission	Brown	Kriss	Not Applicable
Pennsylvania Public Utility Commission	Good	Meghan	Not Applicable
PEPCO Holdings	Bladen	Lisa	Electric Distributor
PEPCO Holdings	Cadoret	Joshua	Electric Distributor
PHI	Zelius	Stephen	EDC
PJM Interconnection, LLC	Anders	David	Not Applicable
PJM Interconnection, LLC	Baim	Matthew	Not Applicable
PJM Interconnection, LLC	Barrett	Fran	Not Applicable
PJM Interconnection, LLC	Berner	Aaron	Not Applicable
PJM Interconnection, LLC	Bharavaju	Murty	Not Applicable
PJM Interconnection, LLC	Burdis	Tim	Not Applicable
PJM Interconnection, LLC	Burlew	Sarah	Not Applicable
PJM Interconnection, LLC	Callis	Joe	Not Applicable
PJM Interconnection, LLC	Chandler	Priscilla	Not Applicable
PJM Interconnection, LLC	Covino	Susan	Not Applicable
PJM Interconnection, LLC	Dessenger	Harry	Not Applicable
PJM Interconnection, LLC	Dirani	Rami	Not Applicable
PJM Interconnection, LLC	Dolan	James	Not Applicable
PJM Interconnection, LLC	Egan	Amanda	Not Applicable
PJM Interconnection, LLC	Eichorn	Sarah	Not Applicable
PJM Interconnection, LLC	Elmy	Alan	Not Applicable
PJM Interconnection, LLC	Esterly	Terry	Not Applicable



PJM Interconnection, LLC	Fabiano	Janell	Not Applicable
PJM Interconnection, LLC	Foley	Pauline	Not Applicable
PJM Interconnection, LLC	Ford	Adrien	Not Applicable
PJM Interconnection, LLC	Graff	Ken	Not Applicable
PJM Interconnection, LLC	Keshavamurthy	Bhavana	Not Applicable
PJM Interconnection, LLC	Klepper	Nancy	Not Applicable
PJM Interconnection, LLC	Marks	Lorrie	Not Applicable
PJM Interconnection, LLC	Miehlike	Tracy	Not Applicable
PJM Interconnection, LLC	Nice	Ryan	Not Applicable
PJM Interconnection, LLC	O'Neil	Jack	Not Applicable
PJM Interconnection, LLC	Pinkerton	Lew	Not Applicable
PJM Interconnection, LLC	Reynolds	John	Not Applicable
PJM Interconnection, LLC	Scheidecker	Paul	Not Applicable
PJM Interconnection, LLC	Schmitt	Jeff	Not Applicable
PJM Interconnection, LLC	Smith	Bradley	Not Applicable
PJM Interconnection, LLC	Walter	Laura	Not Applicable
PJM Interconnection, LLC	Weiss	Glenn	Not Applicable
PJM Interconnection, LLC	Whooley	Jerry	Not Applicable
PJM Interconnection, LLC	Williams	Don	Not Applicable
Platts	Hamilton	T.L.	Not Applicable
Potomac Electric Power Company	Cook	Patrick	Electric Distributor
Potomac Electric Power Company	Pritham	Pritham	Electric Distributor
Potomac Electric Power Company	Razze	Scott	Electric Distributor
Potomac Electric Power Company	Schuhart	William	Electric Distributor
Potomac Electric Power Company	Shaffer	Brian	Electric Distributor
Potomac Electric Power Company	Swink	Rick	Electric Distributor
Potomac Electric Power Company	Tolson-Cooper	Rita	Electric Distributor
PPL Electric Utilities Corp. dba PPL Utilities (LSE)	Beam	George	Transmission Owner
PPL Electric Utilities Corp. dba PPL Utilities (LSE)	Hartman	Gary	Transmission Owner
PPL Electric Utilities Corp. dba PPL Utilities (LSE)	Hassler	Dennis	Transmission Owner
PPL Electric Utilities Corp. dba PPL Utilities (LSE)	Rouland	Jim	Transmission Owner
PSEG Energy Resources and Trade LLC	Citrolo	John	Transmission Owner
Public Service Electric & Gas Company	Calore	James	Transmission Owner
Public Service Electric & Gas Company	Cooke	Donald	Transmission Owner
Public Service Electric & Gas Company	Ellis	David	Transmission Owner
Public Service Electric & Gas Company	Kelly	Sheree	Transmission Owner
Public Service Electric & Gas Company	Kimmish	Steven	Transmission Owner
Public Service Electric & Gas Company	Krauss	Robert	Transmission Owner
Public Service Electric & Gas Company	Ledford	Calvin	Transmission Owner
Public Service Electric & Gas Company	Mendez	Maria	Transmission Owner
Public Service Electric & Gas Company	Moran	Terrence	Transmission Owner
Public Service Electric & Gas Company	Saxe	Barbara	Transmission Owner
Public Utilities Commission of Ohio	Goodge	Anne	Not Applicable
Public Utilities Commission of Ohio	Heizer	Fred	Not Applicable
PUCO	Laurent	Paul	Not Applicable
Shell Energy North America (US), LP	Brodbeck	John	Other Supplier
Sierra Club	Worthem	Dennis	Not Applicable



Solar Energy Industries Association	Adamson	Daniel	Not Applicable
SunPower	Torpey	Jim	Not Applicable
Tangent Energy Solutions, Inc.	Scoglietti	Barbara	Other Supplier
The Federal Energy Regulatory Commission	Logan	Sharon	Not Applicable
The Federal Energy Regulatory Commission	Siqveland	Kevin	Not Applicable
The Vote Solar Initiative	Olmsted	Peter	Not Provided
Unknown	Bolcar	Katie	Unknown
Vineland Municipal Electric Utility	Jablonski	James	Electric Distributor
Virginia Electric & Power Company	Cosby	Sarah	Transmission Owner
Virginia Electric & Power Company	Flavin	Andy	Transmission Owner
Virginia Electric & Power Company	Lacy	Catharine	Transmission Owner
Virginia Electric & Power Company	Lowe	Connie	Transmission Owner
Virginia Electric & Power Company	Reynolds	Karen	Transmission Owner
Virginia Electric & Power Company	Slade	Louis	Transmission Owner
Virginia Electric & Power Company	Thain	Peter	Transmission Owner
Viridity Energy, Inc.	Wolfe	Samuel	Other Supplier

5. APPENDIX II – SUPPLEMENTAL DOCUMENTS

The NEMSTF Charter and Responsibilities may be found at the following PJM web site addresses or links.

- a. NEM Problem Statement –
<http://pjm.com/committees-and-groups/task-forces/~media/committees-groups/task-forces/nemstf/postings/draft-problem-statement.ashx>
- b. NEMSTF Final Charter -
<http://pjm.com/committees-and-groups/task-forces/~media/committees-groups/task-forces/nemstf/postings/final-approved-charter.ashx>
- c. Charter Responsibilities – Table of Compliance/Completion –
<http://pjm.com/~media/committees-groups/task-forces/nemstf/20120511/20120511-charter-responsibilities-table-of-compliance-completion.ashx>
- d. Options and Solutions Matrix
<http://pjm.com/~media/committees-groups/task-forces/nemstf/20120511/20120511-draft-options-matrix.ashx>
- e. Physical Interconnection and Energy Sales – Jurisdiction Decision Tree
<http://pjm.com/committees-and-groups/task-forces/~media/committees-groups/task-forces/nemstf/postings/jurisdictional-decision-tree.ashx>
- f. Table of NEM Provisions by State
<http://pjm.com/committees-and-groups/task-forces/~media/committees-groups/task-forces/nemstf/postings/table-of-nem-provisions-by-state.ashx>
- g. Voting results presentation



<http://pjm.com/~media/committees-groups/task-forces/nemstf/20120511/20120511-may-11-meeting-slides-and-voting-results.ashx>

- h. OPSI – 2012-5 Resolution Regarding PJM Involvement in Net Energy Metering
<http://pjm.com/~media/committees-groups/task-forces/nemstf/20120416/20120416-opsi-resolution-opsi-2012-5.ashx>