



Market Implementation Committee WebEx Only / Conference & Training Center June 8, 2022 9:00 a.m. – 3:45 p.m. EPT

Administration

Nicholas DiSciullo reviewed the Antitrust, Code of Conduct, Public Meetings/Media Participation and the WebEx Participant Identification Requirements.

The Committee approved the draft minutes from the May 11, 2022 Market Implementation Committee with **0 objections and 0 abstentions**.

Endorsements/Approvals

2. Manuals 18 and 28: Load Management / Price Responsive Demand Testing Changes Jack O'Neill reviewed conforming changes to Manual 18: PJM Capacity Market and Manual 28: Operating Agreement Accounting to support the implementation of new testing requirements which were approved in Docket No. ER19-1590 and will become effective with the 2023/2024 Delivery Year.

The committee endorsed the Manual 18 and Manual 28 revisions by acclamation with 0 objections and 0 abstentions.

Issue Tracking: Load Management Testing Requirements

First Readings

3. Variable Environmental Costs and Credits

Melissa Pilong provided a second first read of a proposal providing detailed guidance and updates to rules related to variable environmental charges and/or credits and their inclusion in cost-based energy offers. The committee will be asked to endorse the package at its next meeting.

Issue Tracking: Variable Environmental Costs and Credits

4. Market Suspension

Stefan Starkov provided a second first read of the revised PJM/IMM Package addressing the treatment of long-term market suspensions. The committee will be asked to endorse the package at its next meeting.

Issue Tracking: Rules Related to Market Suspension

5 Manual 6 Revisions

Emmy Messina provided a first read of revisions to Manual 6: Financial Transmission Rights as part of the periodic review and ARR FTR Market Task Force-based conforming changes (Docket No. ER22-797-000). An update on the implementation plans for the first phase of ARR FTR Market Task Force-based conforming changes (Docket No. ER22-797-000) was provided. The committee will be asked to endorse the revisions at its next meeting.

6. Manual 18 Revisions: Hybrid Resources





Andrew Levitt provided an update on the recent hybrids filing (Docket No. ER22-1420) and provided a first read of conforming revisions to Manual 18: PJM Capacity Market. The committee will be asked to endorse the revisions at its next meeting.

Issue Tracking: Solar-Battery Hybrid Resources

7. Manual 28 Revisions: Start-Up Cost Offer Development

Rebecca Stadelmeyer reviewed revisions to Manual 28: Operating Agreement Accounting to support the Startup Cost Offer Development proposal the committee approved at the April 2022 meeting. The committee will be asked to endorse the revisions at its next meeting.

Issue Tracking: Start-Up Cost Offer Development

8. DR/PRD Compliance Construct for Weather Sensitive Load

Sharon Midgley, Exelon, provided a first read of a Problem Statement and Issue Charge addressing the exploration of an alternative DR/PRD compliance construct for weather sensitive load. Exelon and PJM will work offline to evaluate the proposed stakeholder group assignment and timing. This issue will return to the July MIC for endorsement if the Demand Response Subcommittee remains the proposed stakeholder group assignment, or for an update to the extent there is a recommendation to move it to another forum.

Working Items

9. Capacity Offer Opportunities for Generation with Co-Located Load

Lisa Morelli facilitated a discussion to gather solution options from the committee for the Capacity Offer Opportunities for Generation with Co-Located Load matrix. A post-meeting version of the matrix has been posted to the meeting materials. The committee will continue working the Consensus Based Issue Resolution (CBIR) process by revisiting solution options and reviewing initial packages at its next meeting. Additional interests, design components, and solution options, as well as specific requests for education are encouraged in advance of the next meeting.

Issue Tracking: Capacity Offer Opportunities for Generation with Co-Located Load

10. Operating Reserve Clarification for Resources Operating as Requested by PJM

Janell Fabiano facilitated a discussion to review and identify additional interests for the Operating Reserve Clarification for Resources Operating as Requested by PJM Matrix. Lisa Morelli reviewed the Design Component Details and Status Quo. No updates were made to the Matrix during the meeting. Stakeholders are encouraged to provide additional interests and design components in advance of the next meeting. The committee will continue working the Consensus Based Issue Resolution (CBIR) process on this issue at its next meeting.

Issue Tracking: Operating Reserve Clarification for Resources Operating as Requested by PJM

11 Quadrennial Review

Rebecca Carroll facilitated a discussion to begin developing proposals for the Quadrennial Review matrix.

- a) Melissa Pilong provided additional design components and solution options and reviewed PJM's initial proposal resulting from the Quadrennial Review of the capacity market.
- b) Joe Bowring, IMM, provided an update on the IMM Proposal resulting from the Quadrennial Review of the capacity market.





Additional proposals were captured during the meeting and a post-meeting version of the matrix has been posted to the meeting materials. The committee will continue working the Consensus Based Issue Resolution (CBIR) process on this issue at its next meeting.

Issue Tracking: 2022 Quadrennial Review

Additional Items

12. nGEM Project Update

Ray Fernandez provided an update on the Next Generation Energy Market (nGEM) project.

13. Intelligent Reserve Deployment Deficiency Notice

Ilyana Dropkin provided an update on the deficiency notice from FERC related to the Intelligent Reserve Deployment (IRD) filing (Docket No. ER22-1200-000).

Issue Tracking: Synchronized Reserve Event Actions and Expectations

14. Cost Development Subcommittee Update

Nicole Scott provided an informational update on the work to be performed at the Cost Development Subcommittee.

15. Order Directing Reports on Energy and Ancillary Service Market Reforms

Dennis Hough and Rebecca Carroll provided an overview of the FERC order directing reports on energy and ancillary service market reforms (FERC Docket No. AD21-10) and reviewed the plan for soliciting stakeholder input.

16. PJM Comments on Proposed Securities & Exchange Commission Rule Changes

Gary Helm updated stakeholders on PJM's intent to file comments on the Securities and Exchange Commission's (SEC) proposed rule changes that would require registrants to provide certain climate-related information in their registration statements and annual reports. (SEC File No. S7-10-22).

17. Voting Application: Active Voter Registration Changes

Amanda Egan provided a demonstration of upcoming changes to the process of registering as an Active Voter within the Voting Application, which will go-live on June 15th.

Informational Section

Interregional Coordination Update

Materials are posted as informational only.

Fast Start Pricing Monthly Metrics Update

Materials are posted as informational only.

ARR FTR Market Task Force (AFMTF)

Meeting materials are posted to the AFMTF website.





Reactive Power Compensation Task Force (RPCTF)

Meeting materials are posted to the RPCTF website.

Cost Development Subcommittee (CDS)

Meeting materials are posted to the CDS website.

Demand Response Subcommittee (DRS)

Meeting materials are posted to the **DRS** website.

DER & Inverter-based Resources Subcommittee (DIRS)

Meeting materials are posted to the **DIRS** website.

Market Settlements Subcommittee (MSS)

Meeting materials are posted to the MSS website.

OC/MIC Fuel Requirements for Black Start Resources

Meeting materials are posted to the Operating Committee website.

Report on Market Operations

The Report on Market Operations will be reviewed during the MC Webinar.

		Future Meeting Dates and Materials	Materials Due to Secretary	Materials Published
Date	Time	Location	5 p.m.	4 p.m.
July 13	9 a.m.	WebEx / Conference & Training Center	June 30	July 6
August 10	9 a.m.	WebEx / Conference & Training Center	July 29	August 3
September 7	9 a.m.	WebEx / Conference & Training Center	August 26	August 31
October 6	9 a.m.	WebEx / Conference & Training Center	September 26	September 29
November 2	9 a.m.	WebEx / Conference & Training Center	October 21	October 26
December 7	9 a.m.	WebEx / Conference & Training Center	November 23	November 30

Author: Nicholas DiSciullo

In-Person Meeting Attendees

Names	Company Name	Sector
Morelli, Lisa (Chair)	PJM Interconnection, LLC	Not Applicable
Anders, David	PJM Interconnection, LLC	None
Anderson, Bob	Tenaska Power Services Co.	Generation Owner
Brodbeck, John	EDP Renewables North America LLC	Generation Owner
Chang, Sean	Shell Energy North America (US), L.P.	Other Supplier
Fabiano, Janell	PJM Interconnection, LLC	None
Graham, Sophie	Adapt2 Solutions, Inc.	None





Greening, Michele	PJM Interconnection, LLC	None
Helm, Gary	PJM Interconnection, LLC	None
Hudis, Gabriella	Jersey Green Energy LLC	Other Supplier
Kogut, George	New York Power Authority	Other Supplier
Messina, Emmy	PJM Interconnection, LLC	None
Midgley, Sharon	Exelon Business Services Company, LLC	Transmission Owner

Mohler, Tina PJM Interconnection, LLC None
Muhl, Nancy PJM Interconnection, LLC None
Pilong, Melissa PJM Interconnection, LLC None

Scarpignato, David Calpine Energy Services, L.P. Generation Owner Souder, Michelle PJM Interconnection, LLC None Sweeney, Rory GT Power Group, LLC None Terranova, Chris PJM Interconnection, LLC None

WebEx Meeting Attendees

Names	Company Name	Sector
DiSciullo, Nicholas (Secretary)	PJM Interconnection, LLC	Not Applicable
Baizman, Aaron	PJM Interconnection, LLC	None
Barker, Jason	Constellation Energy Generation, LLC	Generation Owner
Bastian, Jeff	PJM Interconnection, LLC	None
Beban, Madalyn	PJM Interconnection, LLC	None
Benchek, Jim	American Transmission Systems, Inc.	Transmission Owner
Bleiweis, Bruce	DC Energy LLC	Other Supplier
Bloom, David	Baltimore Gas and Electric Company	Transmission Owner
Bowker, Shannon	PJM Interconnection, LLC	None
Bowring, Joseph	Monitoring Analytics, LLC	None
Boyle, Glen	PJM Interconnection, LLC	None
Bruno, Patrick	PJM Interconnection, LLC	None
Callaghan, Chris	PJM Interconnection, LLC	None
Callen, Zachary (Zac)	Illinios Commerce Commission	None
Canter, David	AEP Appalachian Transmission Company, Inc.	Transmission Owner
Cao, Roger	PJM Interconnection, LLC	None
Carroll, Rebecca	PJM Interconnection, LLC	None
Caven, Augustine	PJM Interconnection, LLC	None
Chmielewski, Brian	PJM Interconnection, LLC	None
Christopher, Mahila	Public Utilities Commission of Ohio (The)	None
Chu, George	PJM Interconnection, LLC	None
Colaresi, Chandra	Cpower Energy Management	None
Corash, Richard (Rich)	PSEG Energy Resources & Trade LLC	Other Supplier
Coyne, Suzanne	PJM Interconnection, LLC	None
Croop, Danielle	PJM Interconnection, LLC	None
Dailey, Michael	Northern Virginia Electric Cooperative	Electric Distributor
D'Antonio, Phil	PJM Interconnection, LLC	None
Davis, David	Strata Solar	None
Di Iorio, Michelle	PSEG Energy Resources & Trade LLC	Other Supplier
DiNicola, Laura	FirstEnergy Corporation	Transmission Owner
Domian, Christin	Duquesne Light Company	Transmission Owner
Dorko, Keri	Monitoring Analytics, LLC	None
Dorner, Amber	Consolidated Edison Company of New York, Inc	Transmission Owner
Downs, Jere	PJM Interconnection, LLC	None
Drom, Richard (Rick)	Eckert Seamans	None





Dropkin, Ilyana Duensing, Allison Dugan, Chuck Dumitriu, Nicolae Edgar-Smith, Collin Egan, Amanda Elkins, Rachel

Esquivel, Manuel Fan, Zhenyu Fazio, Danielle Fernandez, Ray Filomena, Guy Fink, Regan

Fitzpatrick, Brian Foladare, Kenneth (Ken) Franks, Christine Fuess, Christian Garnett, Bryan

Gilani, Rehan Gorman, Brad Graf, Walter Greiner, Gary Guntle, Vince

Halay, Alina Hatch, Kevin Hauske, Thomas Heinle, Frederick (Erik) Hepplewhite, Peter

Hoatson, Thomas (Tom) Hohenshilt, Jennifer Holter, Natasha Horger, Tim Horning, Lynn Marie Horstmann, John Hough, Dennis

Hsia, Eric Hull, Gerit Hurwich, Mark Hyzinski, Tom Iler, Arthur (Art) Jardot, Gina

Johnson, Carl Johnston, David Kalaskar, Rahul Karnik, Rashmi Kauffman, Brian Kazerooni, Hamid Keech, Adam

Kelly, Stephen Kenney, Susan Kent, Janessa

PJM Interconnection, LLC Saracen Energy East LP

East Kentucky Power Cooperative, Inc.

PJM Interconnection, LLC PJM Interconnection, LLC PJM Interconnection, LLC FirstEnergy Corporation Enel X North America, Inc.

Noble Americas Gas & Power Corp.

PJM Interconnection, LLC

PJM Interconnection, LLC

Customized Energy Solutions, Ltd.* Pine Gate Mid-Atlantic, LLC PJM Interconnection, LLC Geenex Solar LLC PJM Interconnection, LLC PBF Power Marketing, LLC

Duke Energy Ohio, Inc. ConEdison Energy, Inc.

American Transmission Systems, Inc.

PJM Interconnection, LLC

PSEG Energy Resources & Trade LLC American PowerNet Management

The Federal Energy Regulatory Commission PJM Interconnection, LLC

PJM Interconnection, LLC

Office of the Peoples Counsel for the District of Columbia

Wrigley Capital LLC Riverside Generating, LLC Talen Energy Marketing, LLC PJM Interconnection, LLC PJM Interconnection, LLC

Customized Energy Solutions, Ltd.* Dayton Power & Light Company (The) The Federal Energy Regulatory Commission

PJM Interconnection, LLC American Municipal Power, Inc. Elliott Bay Energy Trading, LLC

GT Power Group

Indiana Office of Utility Consumer Counsel Essential Power Rock Springs, LLC Customized Energy Solutions, Ltd.* Indiana Utility Regulatory Commission

Hartigen Solutions, LLC Enel X North America, Inc. PJM Interconnection, LLC PJM Interconnection, LLC Brookfield Energy Marketing LP PJM Interconnection, LLC

Duquesne Light Company

AES Ohio Generation, LLC

None

Other Supplier Transmission Owner

None None

Transmission Owner Other Supplier

None

Other Supplier

None None

Other Supplier None

Other Supplier

None

Generation Owner Transmission Owner Other Supplier Transmission Owner

None

Other Supplier **End-Use Customer**

None None None

End-Use Customer Other Supplier Generation Owner Generation Owner

None None None

Transmission Owner

None None

Electric Distributor Other Supplier

None

End-Use Customer Generation Owner

None None

Generation Owner

None

Other Supplier None

None Other Supplier

Transmission Owner





Kilgallen, Kevin Kimmel, David Kingston, Amber Lai, Erin

Laios, Takis Langbein, Pete

LaRocque, Matthew (Matt)

Leicar, Jamie Levitt, Andrew Liang-Nicol, Cecilia Libbos, Robin Loftus, Chad Lu, Chen

Luna, Joel Mabry, David Marcino, Angelo Matheson, Eric Matuszak, Alex

McDaniel, John

McGill, Susan McLaverty, Megan Miller, John Mooney, Jeff Moye, Bob

Nix, Emma Okenfuss, James Ondayko, Brock

O'Neill, Jack Pacella, Chris

Patel, Keyurbhai (Keyur)

Peoples, John Picarelli, David Pilong, Christopher Poulos, Greg Pratt, Nicholas (Nick)

Price, Ruth Procuniar, Jason Raghavan, Vijay Rahimi, Farrokh

Reagan, Ryann Redwine, Arlo Roberts, Casey

Robinson, Becky Ruck, Andrew Rutledge, Craig

Sasser, Jonathan

Schroeder, Connie Schuyler, Ken Schwarz, Stephanie

Scott, Nicole Servera, Max Avangrid Renewables LLC PJM Interconnection, LLC

North Carolina Electric Membership Corporation

PJM Interconnection, LLC

AEP Appalachian Transmission Company, Inc.

PJM Interconnection, LLC PJM Interconnection, LLC

Allegheny Electric Cooperative, Inc.

PJM Interconnection, LLC

Monongahela Power Company d/b/a Allegheny Power

FirstEnergy Corporation PJM Interconnection, LLC PJM Interconnection, LLC Monitoring Analytics, LLC McNees Wallace & Nurick LLC PJM Interconnection. LLC

Pennsylvania Public Utility Commission

UGI Energy Services, LLC

Baltimore Gas and Electric Company

PJM Interconnection, LLC PJM Interconnection, LLC Commonwealth Edison Company FirstEnergy Corporation

Rainbow Energy Marketing Corporation

Gable and Associates

Savion, LLC

AEP Appalachian Transmission Company, Inc.

PJM Interconnection, LLC PJM Interconnection, LLC PJM Interconnection, LLC **Duquesne Light Company** PJM Interconnection, LLC PJM Interconnection, LLC

CAPS

PPL Electric Utilities Corp. dba PPL Utilities

Division of the Public Advocate of the State of Delaware

Buckeye Power, Inc. BioUrga Trading LLC **OATI Energy Trading**

New Jersey Board of Public Utilities The Federal Energy Regulatory Commission

Sierra Club

Vista Energy Marketing, L.P. Freepoint Commodities LLC

AEP Appalachian Transmission Company, Inc.

Customized Energy Solutions, Ltd.* Virginia Electric & Power Company

PJM Interconnection, LLC PJM Interconnection, LLC PJM Interconnection, LLC Unicia Energy LP

Generation Owner

None

Electric Distributor

None

Transmission Owner

None None

Electric Distributor

None

Transmission Owner Transmission Owner

None None None None None None

> Other Supplier Transmission Owner

None None

> Transmission Owner Transmission Owner Other Supplier

None None Transmission Owner

None

None

None Transmission Owner None None

None Transmission Owner

End-Use Customer Electric Distributor Other Supplier None

None None Other Supplier Other Supplier Transmission Owner

None

None

Transmission Owner

None None None

Other Supplier



Shanker, Roy

Draft Meeting Minutes

Other Supplier

None

None

Shegarfi, Roozbeh Exelon Business Services Company, LLC Transmission Owner Smith, Kara Buckeye Power, Inc. Electric Distributor Sorrels, James AEP Appalachian Transmission Company, Inc. Transmission Owner Sotkiewicz, Paul E-Cubed Policy Associates None PJM Interconnection, LLC Stadelmeyer, Rebecca None Starkov, Stefan PJM Interconnection, LLC None Stern, Alexander (Alex) Public Service Electric & Gas Company Transmission Owner Stone, Andy PJM Interconnection, LLC None Stuchell, Jeff FirstEnergy Corporation Transmission Owner Sturgeon, John Duke Energy Carolinas, LLC Other Supplier Sussler, Philip State of Maryland None Svenson, Heather Public Service Electric & Gas Company Transmission Owner Swalwell, Brad Tangent Energy Solutions, Inc. Other Supplier Tacka, Natalie PJM Interconnection, LLC None Theodore, Sharon Electric Power Supply Association None Tyler, Catherine Monitoring Analytics, LLC None Electric Distributor Vayda, Brian Borough of Park Ridge, NJ

H.Q. Energy Services (U.S.), Inc.

Walcavich, Colin National Grid Renewables, LLC None Ward, Michael PJM Interconnection, LLC None Warshel, Kim PJM Interconnection, LLC None Weathers. Brian PJM Interconnection, LLC None Whitehead, Jeffrey (Jeff) **GT Power Group** None Wilson, James Wilson Energy Economics None Wray, Gizelle Solar Energy Industries Association None Xu. Xu PJM Interconnection, LLC None Yoder, Michael **RTO Insider** None Yoo, Kyungjin PJM Interconnection. LLC None

PJM Interconnection, LLC

PJM Interconnection, LLC

Antitrust:

Yovanovich, Laura

Zhang, Michael (Mike)

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During a Meeting



To enter the question queue (does not work during a vote)



To be removed from the question queue



To signal for PJM support staff assistance

During an Acclamation Vote

Please log in to the voting application at **voting.pjm.com**, so that you can be registered as the active voter prior to the start of the meeting.



Yes



Abstain



No

To signal for PJM support staff assistance

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- Dialing *1 enters you into the question queue; the three dial tones are an auditory indication that you have successfully been placed in the queue.
- · Questions are taken during the meeting when natural breaks occur and are asked in the order they are received.

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- 3. Call in to the operator-assisted number

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