

Planning Committee
PJM Conference and Training Center, Audubon, PA
November 3, 2016

Administration

1. Mr. Paul McGlynn, PJM, called the meeting to order and asked if the Planning Committee had any additional items for the agenda. There were no suggestions for additional agenda items.
2. Mr. McGlynn asked Mr. Mike Herman to review the meeting minutes of the October 6, 2016 Planning Committee meeting. Mr. McGlynn asked the Planning Committee to approve the minutes. Mr. Dave Pratzon made a motion to approve the minutes. Mr. Dan Griffiths seconded the motion. In a voice vote, the Planning Committee approved the October 6 Planning Committee Minutes.

Endorsements/Approvals

3. **PJM Manual 14B Updates**

Mr. Mike Herman, PJM, presented modifications to PJM Manual 14B (PJM Region Transmission Planning Process) regarding the CIL procedure. The procedure resides in Attachment G.11 of M14B. Mr. Herman will work with stakeholders to clarify red line language in advance of the November Markets and Reliability Committee. Mr. Dave Pratzon made a motion to endorse and Mr. Barry Trayers seconded the motion, there were no objections and no abstentions. **In a voice vote, the Planning Committee endorsed these updates for Manual 14B.**

4. **Manual 21 Updates**

Mr. Jerry Bell, PJM, reviewed proposed draft changes for Manual 21 (Rules and Procedures for Determination of Generating Capability) related to generator testing requirements. Mr. Dave Pratzon made a motion to endorse and Mr. Dave Scarpignato seconded the motion, there were no objections and no abstentions. **In a voice vote, the Planning Committee endorsed these updates for Manual 21.**

5. **Updates to Manual 14A**

Mr. Ed Franks, PJM, presented updates to Part VI – 217.3a of the Tariff and Manual 14A (Generation and Transmission Interconnection Process) that are a result of discussions at the Special PC sessions regarding New Service Request Cost Allocation & Study Methods. Mr. Dave Pratzon made a motion to endorse and Mr. Carl Johnson seconded the motion, there were no objections and one abstention. **In a voice vote, the Planning Committee endorsed these updates for Manual 14A and the Tariff.**

6. TO/TOP Matrix Changes

Mr. Sri Kappagantula reviewed the proposed updates to the TO/TOP matrix. Mr. Pulin Shah made a motion to endorse and Mr. Dave Pratzon seconded the motion, there were no objects and no abstentions. **In a voice vote, the Planning Committee provided a recommendation for approval.**

7. Winter Weekly Reserve Target

Mr. Patricio Rocha Garrido, PJM, presented the winter weekly reserve target results. Mr. Dave Pratzon made a motion to endorse and Mr. Barry Trayers seconded the motion, there were no objects and five abstentions. **In a voice vote, the Planning Committee endorsed the winter weekly reserve target results.**

First Readings

8. Manual 14C Updates

Ms. Sue Glatz, PJM, presented a first read for changes to Section 6.1.6 of Manual 14C (Generation and Transmission Interconnection Facility Construction). The revised tie line changes are included in the revised timeline diagram. This will be brought to the next Planning Committee meeting for endorsement.

Informational Updates

9. PJM Regional Transmission Expansion Plan (RTEP) Case Updates

Ms. Amber Thomas, PJM, provided an update regarding RTEP Case Updates. RTEP trial 2 cases were sent on November 2nd, TO updates are requested by November 18th. Short Circuit case distributions will occur early November and TOs will be asked to review and confirm breaker replacements in late November.

10. JOA Deactivation Update

Mr. Alex Worcester, PJM, provided an update on modifications to the PJM/MISO Joint Operating Agreement to codify coordination of generation retirement studies. Draft JOA language was presented for stakeholder review at the October 28 PJM/MISO IPSAC meeting; comments are due November 11. The RTOs expect to present final language at the November 15 Joint and Common Market meeting. The proposed revisions are on target to be filed with the FERC on or before December 15.

11. New Service Request Study Methods

Mr. Ed Franks, PJM, provided an update on items under discussion at the Special PC Sessions for New Service Request Study Methods. The PC sub-group has agreed to move forward with adding a Feasibility Study to the Long Term Firm Transmission Service customers and the Upgrade customers study process. The PC sub-group has agreed to continue discussions that would include

removal of the Alternate Queue Process as well as change the less than \$5M cost allocation rule back to a first to cause methodology.

12. Initial Review of Market Efficiency Project Selection Guidelines

Mr. Asanga Perera, PJM, reviewed the draft guidelines for Market Efficiency Project Selection. He also provided examples and decision tree diagrams to further demonstrate the draft guidelines.

13. 2016 Operations and Planning Audit Results

Mr. Kappagantula, PJM, provided an update on the results of the 2016 Operations and Planning Audit Results. PJM had a successful Audit with no violations. Further information regarding the audit results can be found under the November 3rd Planning Committee Material at the [Planning Committee Website](#).

14. NERC/RRO Update

Mr. Kappagantula, PJM, will provided an update on recent NERC activities and PJM compliance activities. NERC standards subject to future enforcement can be found under the November 3rd Planning Committee Material at the [Planning Committee Website](#).

15. PJM/NYISO Wheel Modeling

Mr. Sims, PJM, provided an update regarding updates to the operational and planning protocols related to the termination of the ConEd Wheel. There was discussion regarding operational base flow treatment in planning and near term use in operations. Members are encouraged to participate in these joint meetings regarding the termination of the ConEd wheel. Please email RTEP@pjm.com if you have additional questions or concerns.

Informational Section

DEDSTF Update

The Designated Entity Design Standards Task Force (DEDSTF) last met on 10/25/2016. At that meeting the three sub groups (Substations, lines and protection) continued discussions on the organization/development of the Design Standards as well as the process of reviewing the existing materials. The Substation sub group will be holding a webex on 11/1 and the Lines sub group will be holding a webex on 11/8. The next meeting of the DEDSTF is 11/15/2016. All registrations are available on the DEDSTF website. [DEDSTF website](#)

Order 1000 Update

Special PC Sessions on Order 1000 were held on September 16, 2016, October 3, and October 21. Additional sessions are scheduled for November 11, 2016; December 8, 2016; January 13, 2017; and February 10, 2017 (all 9am – 12 Noon). At the most recent session, we introduced future discussion topics: (1) TEAC Redesign and (2) RTEP Schedule, as well as review of the draft Market Efficiency Project Selection Guidelines.

Future Meeting Dates

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|--------------------|-----------|---|---|
| November 11, 2016 | 9:00 a.m. | Special PC Session: Order 1000 | PJM Conference and Training Center, Audubon, PA |
| November 11, 2016 | 1:00 p.m. | Special PC Session: New Service Request Study Methods | Teleconference |
| December 8, 2016 | 9:00 a.m. | Special PC Session: TEAC Redesign and RTEP Cycle | PJM Conference and Training Center, Audubon, PA |
| December 15, 2016 | 9:30 a.m. | Planning Committee | PJM Conference and Training Center, Audubon, PA |
| January 12, 2017 | 9:30 a.m. | Planning Committee | PJM Conference and Training Center, Audubon, PA |
| January 13, 2017 | 9:00 a.m. | Special PC Session: TEAC Redesign and RTEP Cycle | PJM Conference and Training Center, Audubon, PA |
| February 9, 2017 | 9:30 a.m. | Planning Committee | PJM Conference and Training Center, Audubon, PA |
| February 10, 2017 | 9:00 a.m. | Special PC Session: TEAC Redesign and RTEP Cycle | PJM Conference and Training Center, Audubon, PA |
| March 9, 2017 | 9:30 a.m. | Planning Committee | PJM Conference and Training Center, Audubon, PA |
| April 13, 2017 | 9:30 a.m. | Planning Committee | PJM Conference and Training Center, Audubon, PA |
| May 4, 2017 | 9:30 a.m. | Planning Committee | PJM Conference and Training Center, Audubon, PA |
| June 8, 2017 | 9:30 a.m. | Planning Committee | PJM Conference and Training Center, Audubon, PA |
| July 13, 2017 | 9:30 a.m. | Planning Committee | PJM Conference and Training Center, Audubon, PA |
| August 10, 2017 | 9:30 a.m. | Planning Committee | PJM Conference and Training Center, Audubon, PA |
| September 14, 2017 | 9:30 a.m. | Planning Committee | PJM Conference and Training Center, Audubon, PA |
| October 12, 2017 | 9:30 a.m. | Planning Committee | PJM Conference and Training Center, Audubon, PA |
| November 9, 2017 | 9:30 a.m. | Planning Committee | PJM Conference and Training Center, Audubon, PA |
| December 14, 2017 | 9:30 a.m. | Planning Committee | PJM Conference and Training Center, Audubon, PA |

Author: Bridgid Cummings

Attendees

| Attendees | Company | Sector |
|------------------|---|----------------------|
| Sean Black | Ameren Corporation | Not Applicable |
| Toby Hu | Ameren Corporation | Not Applicable |
| Kiran Thammineni | Ameren Corporation | Not Applicable |
| Chris Norton | American Municipal Power, Inc. | Electric Distributor |
| Edward Tatum | American Municipal Power, Inc. | Electric Distributor |
| Gary Fuerst | American Transmission Systems, Inc. | Transmission Owner |
| David Tate | American Transmission Systems, Inc. | Transmission Owner |
| Jim Zweig | American Transmission Systems, Inc. | Transmission Owner |
| Brock Ondayko | Appalachian Power Company | Transmission Owner |
| Eric Swanger | Appalachian Power Company | Transmission Owner |
| David Canter | Appalachian Power Company | Transmission Owner |
| Takis Laios | Appalachian Power Company | Transmission Owner |
| Craig Lockwood | Appalachian Power Company | Transmission Owner |
| Markian Melnyk | Atlantic Grid Operations A, LLC | Other Supplier |
| Hugh Scott | Baltimore Gas and Electric Company | Transmission Owner |
| James Jablonski | Borough of Butler, Butler Electric Division | Electric Distributor |
| Diane Janicki | Boston Energy Trading and Marketing LLC | Generation Owner |
| Travis Bouslog | Burns McDonnell | Not Applicable |
| Tom Hoatson | Carroll County Energy LLC | Other Supplier |
| Michael Natrin | Carroll County Energy LLC | Other Supplier |
| Yan Du | Central Transmission, LLC | Transmission Owner |
| Barry Trayers | Citigroup Energy, Inc. | Other Supplier |
| William Allen | Commonwealth Edison Company | Transmission Owner |
| John Garavaglia | Commonwealth Edison Company | Transmission Owner |
| Thomas Leeming | Commonwealth Edison Company | Transmission Owner |
| Paul Mills | Commonwealth Edison Company | Transmission Owner |

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| Ronald Regner | Commonwealth Edison Company | Transmission Owner |
| Diana McNally-Barsotti | Consolidated Edison | Other Supplier |
| Dan Griffiths | Consumer Advocates of PJM States | Not Applicable |
| Bruce Campbell | Cpower | Other Supplier |
| Jamie Lejcar | CPS Energy | Electric Distributor |
| Guy Filomena | Customized Energy Solutions, Ltd.* | Not Applicable |
| Carl Johnson | Customized Energy Solutions, Ltd.* | Not Applicable |
| Jonathan Sasser | Customized Energy Solutions, Ltd.* | Not Applicable |
| John Horstmann | Dayton Power & Light Company (The) | Transmission Owner |
| Mike Hurd | Dayton Power & Light Company (The) | Transmission Owner |
| Michael Russ | Dayton Power & Light Company (The) | Transmission Owner |
| Hertzel Shamash | Dayton Power & Light Company (The) | Transmission Owner |
| Joseph DeLosa | DE Public Service Commission | Not Applicable |
| John Farber | DE Public Service Commission | Not Applicable |
| Jaclyn Cantler | Delmarva Power & Light Company | Electric Distributor |
| Rebekah Kelman | DNVGL | Not Applicable |
| Ronnie Bailey | Dominion Virginia Power | Transmission Owner |
| Craig Crider | Dominion Virginia Power | Transmission Owner |
| Kyle Hannah | Dominion Virginia Power | Transmission Owner |
| Randi Heise | Dominion Virginia Power | Transmission Owner |
| Frank Zhang | Dominion Virginia Power | Transmission Owner |
| George Owens | Downes Associates, Inc. | Other Supplier |
| Greg Pakela | DTE Energy Trading, Inc. | Other Supplier |
| Steve Steinkuhl | Duke Energy Business Services LLC | Transmission Owner |
| Julie Mason | Duke Energy Ohio, Inc. | Transmission Owner |
| Chad Hirsh | Duquesne Light Company | Transmission Owner |
| Tonja Wicks | Duquesne Light Company | Transmission Owner |
| Jason Cox | Dynegy Power Marketing, Inc. | Generation Owner |
| Iker Chocarro | E.on Climate & Renewables North America, Inc | Generation Owner |
| Chris Adams | East Kentucky Power Cooperative, Inc. | Transmission Owner |
| Darrin Adams | East Kentucky Power Cooperative, Inc. | Transmission Owner |
| Chuck Dugan | East Kentucky Power Cooperative, Inc. | Transmission Owner |
| Wes Fluty | East Kentucky Power Cooperative, Inc. | Transmission Owner |
| John Brodbeck | EDP Renewables North America, LLC | Other Supplier |
| Gina Jardot | Essential Power, LLC | Generation Owner |
| Nick Gangi | Eversource Energy | Not Applicable |
| Melanie Sanders | Exelon Business Services Company, LLC | Transmission Owner |
| Robert Taylor | Exelon Business Services Company, LLC | Transmission Owner |
| Kevin Thundiyil | Exelon Business Services Company, LLC | Transmission Owner |
| Sharon Midgley | Exelon Generation Co., LLC | Generation Owner |
| Roozbeh Shegarfi | Exelon Generation Co., LLC | Generation Owner |
| Thomas Bainbridge | FirstEnergy Solutions Corp. | Transmission Owner |
| Jim Benchek | FirstEnergy Solutions Corp. | Transmission Owner |
| Martin Bolan | FirstEnergy Solutions Corp. | Transmission Owner |
| Lou D'Alessandris | FirstEnergy Solutions Corp. | Transmission Owner |
| Jonathan Loesch | FirstEnergy Solutions Corp. | Transmission Owner |

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| David Marton | FirstEnergy Solutions Corp. | Transmission Owner |
| Jeff Stuchell | FirstEnergy Solutions Corp. | Transmission Owner |
| John Syner | FirstEnergy Solutions Corp. | Transmission Owner |
| Gabriella Hudis | Gabel and Associates | Not Applicable |
| Travis Stewart | Gabel and Associates | Not Applicable |
| Rachel Hulett | Gridliance, GP, LLC | Not Applicable |
| Derek Hagaman | GT Power Group | Not Applicable |
| David Pratzon | GT Power Group | Not Applicable |
| Jim Nash | Hudson Transmission Partners, LLC | Other Supplier |
| Joe Staszowski | ISO New England | Not Applicable |
| Kaustubh Deshmukh | ITC Holdings | Not Applicable |
| John Kopinski | ITC Mid-Atlantic Development LLC | Other Supplier |
| Brenda Prokop | ITC Mid-Atlantic Development LLC | Other Supplier |
| Sean Powers | Linde Energy Services, Inc | End User Customer |
| Robert Colozza | LS Power Transmission, LLC | Transmission Owner |
| Joshua York | LS Power Transmission, LLC | Transmission Owner |
| Robert O'Connell | Main Line Electricity Market Consultants | Not Applicable |
| Heather Thomson | Marec | Not Applicable |
| Morris Schreim | Maryland Public Service Commission | Not Applicable |
| David Mabry | McNees Wallace & Nurick LLC | Not Applicable |
| Erik Hanser | Michigan Public Service Commission | Not Applicable |
| Adam Solomon | Midwest Independent Transmission System Operator, Inc. | Not Applicable |
| Radha Soorya | Navigant | Not Applicable |
| Matt Stajcar | Navigant | Not Applicable |
| Douglas Dickson | New Jersey Board of Public Utilities | Not Applicable |
| George Kogut | New York Power Authority | Other Supplier |
| David Davis | NextEra Energy Power Marketing, LLC | Generation Owner |
| Stephen Gibelli | NextEra Energy Power Marketing, LLC | Generation Owner |
| Frederico Von Pinho | NextEra Energy Transmission, LLC | Other Supplier |
| Gabriel Hollis | Nextera Energy, Inc | Other Supplier |
| John Lemire | North Carolina Electric Membership Corporation | Electric Distributor |
| James Manning | North Carolina Electric Membership Corporation | Electric Distributor |
| Miles Taylor | Northern Indiana Public Service Company | Other Supplier |
| Brian Kauffman | NRG Curtailment Solutions | Other Supplier |
| Neal Fitch | NRG Power Marketing LLC | Generation Owner |
| John Donelson | Old Dominion Electric Cooperative | Electric Distributor |
| Mark Ringhausen | Old Dominion Electric Cooperative | Electric Distributor |
| James Wright | Old Dominion Electric Cooperative | Electric Distributor |
| Gregory Carmean | OPSI | Not Applicable |
| Mike Donnelly | PECO Energy Company | Transmission Owner |
| Pulin Shah | PECO Energy Company | Transmission Owner |
| Dhruv Acharya | PEPCO Holdings, Inc. | Transmission Owner |
| Gloria Godson | PEPCO Holdings, Inc. | Transmission Owner |
| Patricia Kurowski | PEPCO Holdings, Inc. | Transmission Owner |
| Scott Razze | PEPCO Holdings, Inc. | Transmission Owner |
| Dave Anders | PJM Interconnection, LLC | Not Applicable |

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| Jerry Bell | PJM Interconnection, LLC | Not Applicable |
| Tim Burdis | PJM Interconnection, LLC | Not Applicable |
| Augustine Caven | PJM Interconnection, LLC | Not Applicable |
| Kyle Clifford | PJM Interconnection, LLC | Not Applicable |
| Phil D'Antonio | PJM Interconnection, LLC | Not Applicable |
| Mary Ellen Driscoll | PJM Interconnection, LLC | Not Applicable |
| Suzie Fahr | PJM Interconnection, LLC | Not Applicable |
| Zhenyu Fan | PJM Interconnection, LLC | Not Applicable |
| Ed Franks | PJM Interconnection, LLC | Not Applicable |
| Suzanne Glatz | PJM Interconnection, LLC | Not Applicable |
| Andrew Gledhill | PJM Interconnection, LLC | Not Applicable |
| Jim Glennon | PJM Interconnection, LLC | Not Applicable |
| Michael Herman | PJM Interconnection, LLC | Not Applicable |
| Frank Koza Jr. | PJM Interconnection, LLC | Not Applicable |
| Paul McGlynn | PJM Interconnection, LLC | Not Applicable |
| Molly Mooney | PJM Interconnection, LLC | Not Applicable |
| Dave Pomian | PJM Interconnection, LLC | Not Applicable |
| Jason Quevada | PJM Interconnection, LLC | Not Applicable |
| John Reynolds | PJM Interconnection, LLC | Not Applicable |
| Patricio Rocha Garrido | PJM Interconnection, LLC | Not Applicable |
| Jason Shoemaker | PJM Interconnection, LLC | Not Applicable |
| Mark Sims | PJM Interconnection, LLC | Not Applicable |
| Amber Thomas | PJM Interconnection, LLC | Not Applicable |
| Jeanine Watson | PJM Interconnection, LLC | Not Applicable |
| Glenn Weiss | PJM Interconnection, LLC | Not Applicable |
| Alex Worcester | PJM Interconnection, LLC | Not Applicable |
| Scott Gass | PowerGEM | Not Applicable |
| Zelalem Tekle | PowerGEM | Not Applicable |
| Shadab Ali | PPL Electric Utilities Corp. dba PPL Utilities | Transmission Owner |
| Michele Greening | PPL Electric Utilities Corp. dba PPL Utilities | Generation Owner |
| Laura Lehmann | PPL Electric Utilities Corp. dba PPL Utilities | Transmission Owner |
| Phil Penney | PPL Electric Utilities Corp. dba PPL Utilities | Transmission Owner |
| Frank Richardson | PPL Electric Utilities Corp. dba PPL Utilities | Transmission Owner |
| Ray DePillo | PSEG Energy Resources and Trade LLC | Transmission Owner |
| Sam Giordano | PSEG Energy Resources and Trade LLC | Transmission Owner |
| Gary Greiner | PSEG Energy Resources and Trade LLC | Transmission Owner |
| Cara Lewis | PSEG Energy Resources and Trade LLC | Transmission Owner |
| Qamar Arsalan | Public Service Electric & Gas Company | Transmission Owner |
| James Caristia | Public Service Electric & Gas Company | Transmission Owner |
| Kathleen Crowley | Public Service Electric & Gas Company | Transmission Owner |
| Elizabeth Gostkowski | Public Service Electric & Gas Company | Transmission Owner |
| Leonid Lyakhovich | Public Service Electric & Gas Company | Transmission Owner |
| Rich Marinelli | Public Service Electric & Gas Company | Transmission Owner |
| Jerry Martinez | Public Service Electric & Gas Company | Transmission Owner |
| John Nagurney | Public Service Electric & Gas Company | Transmission Owner |
| Greg Player | Public Service Electric & Gas Company | Transmission Owner |



Draft Minutes

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|---------------------|--|--------------------|
| Ming Zhou | Public Service Electric & Gas Company | Transmission Owner |
| Chandana Bommareddy | Quanta Technology | Not Applicable |
| Ray Mason | Reliability First | Not Applicable |
| Rory Sweeney | RTO Insider | Not Applicable |
| Gerry Binder | SESCO Enterprises LLC | Other Supplier |
| Andy Peebles | Shell Energy North America (US), LP | Other Supplier |
| Jack Halpern | Stantec | Not Applicable |
| Leonard Collins | State of Delaware | Not Applicable |
| Pati Esposito-Hils | TransCanada Power Marketing Ltd. | Other Supplier |
| Eric Sorber | UGI Utilities, Inc. | Transmission Owner |
| Pat Hayes | Union Electric Company d/b/a Ameren Missouri | Other Supplier |
| Adam Weber | Union Electric Company d/b/a Ameren Missouri | Other Supplier |
| Adam Camp | | |