M-3 Process Lessons Learned

PJM Load Group Perspective

American Municipal Power, Inc.
Old Dominion Electric Cooperative
PJM Industrial Customer Coalition
Consumer Advocates Offices

Date: July 12, 2019
Timeline

- 3 Year PJM Stakeholder process seeking sufficient transparency for Supplemental Projects
  - Initial and primary focus was end of life projects
- FERC Technical Conference November 2015
- PJM Stakeholder Process began January 2016
- FERC Show Cause Order August 2016
- FERC Order February 2018
  - M-3 Process established based on TO filings
- FERC Order on Rehearing August 2018
- PJM Stakeholder Process Concluded January 2019
  - PJM staff declined to implement Stakeholder supermajority for additional transparency
  - LS Power efforts to address Supplemental Projects
  - April 12 Lessons Learned
  - July 12 Lessons Learned
Why We Care: Supplemental Projects in PJM

Data compiled by AMP based on PJM Project Statistics:
Attachment M-3: Requirements vs. Reality
Since M3 Implementation

AEP, FE, Dominion, and Duke lead the way with needs
Total: 495 Needs, 289 Solutions; 32 Finalized
Since M3 Implementation
AEP, FE, and PSEG lead the way on spending

Number of Proposed Solutions Vs. Total Year to Date Cost by TO

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<th>TO</th>
<th>Proposed Solutions</th>
<th>Year to Date Cost</th>
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1. **Review of Supplemental Projects.** As described in sections 1.3(c) and (d) of Schedule 6 of the Operating Agreement, the Subregional RTEP Committees shall be responsible for the review of Supplemental Projects. The Subregional RTEP Committees shall have a meaningful opportunity to participate and provide feedback, including written comments, throughout the transmission planning process for Supplemental Projects. Disputes shall be resolved in accordance with the procedures set forth at Schedule 5 of the Operating Agreement.
The opportunity to participate is being rendered meaningless:

- Certain TOs are not providing information or appropriate granularity
- Some TOs providing conflicting Needs and Drivers
- The volume of Needs + lack of information + lateness of information when provided makes 10 day comment period unrealistic for Stakeholder comments
- Some Needs statements are being modified after the Needs are presented
- Some projects have received regulatory permits prior to the Need being presented
- Concerns about project status not included for projects when solutions are presented

Action Plan?
Attachment M-3, Paragraph 2 Requirement:

**Review of Assumptions and Methodology.** In accordance with sections 1.3(d), 1.5.4(a), and 1.5.6(b) and 1.5.6(c) of Schedule 6 of the Operating Agreement, each Subregional RTEP Committee shall schedule and facilitate a minimum of one Subregional RTEP Committee meeting to review the criteria, assumptions, and models Transmission Owners propose to use to plan and identify Supplemental Projects (Assumptions Meeting). **Each Transmission Owner shall provide the criteria, assumptions, and models to PJM for posting at least 20 days in advance of the Assumptions Meeting** to provide Subregional RTEP Committee Participants sufficient time to review this information.
Most of the TOs are not providing enough information and/or timely information for Stakeholders to replicate their results per Show Cause Order P73 and P77:

- Most Transmission Owners are not providing all of the criteria, assumptions, and models 20 days prior to the assumptions meeting.
  - TO-specific models (not used by PJM) to justify “Needs” or “Solutions” are not accessible on PJM’s website (operational “snapshots”; non-PJM dispatched)
- Many of the assumptions that are provided are overly broad or conservative, ill-defined, and/or include “catch all” statements
- Many of the criteria that are provided include poorly-defined or nonexistent criteria and no criteria thresholds.
Attachment M-3, Paragraph 3 Requirement:

**Review of System Needs.** No fewer than 25 days after the Assumptions Meeting, each Subregional RTEP Committee shall schedule and facilitate a minimum of one Subregional RTEP Committee meeting per planning cycle to review the identified criteria violations and resulting system needs, if any, that may drive the need for a Supplemental Project (Needs Meeting). Each Transmission Owner will review the identified system needs and the drivers of those needs, based on the application of its criteria, assumptions, and models that it uses to plan Supplemental Projects. The Transmission Owners shall share and post their identified criteria violations and drivers no fewer than 10 days in advance of the Needs Meeting. Stakeholders may provide comments on the criteria violations and drivers to the Transmission Owner for consideration prior to, at, or following the Needs Meeting. The Transmission Owner shall review and consider comments that are received within 10 days of the Needs Meeting and may respond or provide feedback as appropriate.
Attachment M-3, Paragraph 3 Reality:

TOs are presenting Needs but most are providing insufficient information for Stakeholders to validate that the identified Needs are justified:

- TO specific models used to identify Needs not available 20 days prior to Assumption Meetings
  - Only models made available are Power Flow models and cannot be used to replicate the process to identify a majority of “Needs”.
  - Power Flow models are not the drivers for the vast majority of these projects
- No ability for stakeholders to understand whether a TO has consistently followed its methodologies
- Most data and information requests are not addressed in timely manner or at all
- TO SMEs not available to respond to questions during the Meetings
- M-3 does not include any specified timeline between when a Need is submitted and a Solution is proposed.

Action Plan?
**Attachment M-3, Paragraph 4 Requirement:**

**Review of Potential Solutions.** No fewer than 25 days after the Needs Meeting, each Subregional RTEP Committee shall schedule and facilitate a minimum of one Subregional RTEP Committee meeting per planning cycle to review potential solutions for the identified criteria violations (Solutions Meeting). The Transmission Owners shall share and post their potential solutions, as well as any alternatives identified by the Transmission Owners or stakeholders, no fewer than 10 days in advance of the Solutions Meeting. Stakeholders may provide comments on the potential solutions to the Transmission Owner for consideration either prior to or following the Solutions Meeting. The Transmission Owner shall review and consider comments that are received within 10 days of the meeting and may respond or provide feedback as appropriate.
Attachment M-3, Paragraph 4 Reality:

The review of potential Solutions is not meaningful:

• Many Solutions address issues or assets not identified in the Needs statements.
• Modeling files for potential solutions not being posted on PJM’s website in a timely manner
• TO SMEs not available to respond to questions

Most TOs and PJM are not providing requested information about the Needs in sufficient time for other stakeholders to be able to propose alternatives.

Action Plan?
Submission of Supplemental Projects. Each Transmission Owner will finalize for submittal to the Transmission Provider Supplemental Projects for inclusion in the Local Plan in accordance with section 1.3 of Schedule 6 of the Operating Agreement and the schedule established by the Transmission Provider. Stakeholders may provide comments on the Supplemental Projects in accordance with section 1.3 of Schedule 6 of the PJM Operating Agreement before the Local Plan is integrated into the Regional Transmission Expansion Plan. Each Transmission Owner shall review and consider comments that are received at least 10 days before the Local Plan is submitted for integration into the Regional Transmission Expansion Plan.
There is insufficient information about when a Solution is integrated into the PJM Local Plan:

- Stakeholders are not notified about the finalization of Solutions and whether the finalized Solution is consistent with previously proposed Solution
- No required validation by PJM ensuring that the Solution does not cause harm to facilities not under PJM control
- PJM does not share the results of PJM’s Do No Harm analysis.

Action Plan?
Attachment M-3, Paragraph 6 Requirement:

**Information Relating to Supplemental Projects.** Information relating to each Transmission Owner’s Supplemental Projects will be provided in accordance with, and subject to the limitations set forth in, section 1.5.4 of Schedule 6 of the Operating Agreement. Local Plan Information will be provided to and posted by the Office of Interconnection as set forth in section 1.5.4(e) of Schedule 6 of the Operating Agreement.
Attachment M-3, Paragraph 6 Reality:

Consistent with the above, most of the TOs are not providing enough information and/or timely information for Stakeholders to replicate their results per Show Cause Order P73 and P77.

Action Plan?
Attachment M-3, Paragraph 7 Requirement:

No Limitation on Additional Meetings and Communications. Nothing in this Attachment M-3 precludes any Transmission Owner from agreeing with stakeholders to additional meetings or other communications regarding Supplemental Projects, in addition to the Subregional RTEP Committee process.
Attachment M-3, Paragraph 7 Reality:

Customers are scheduling periodic additional meetings with some TOs to get detailed information on Assumptions, Needs and Solutions.

Working relatively well but entirely outside of the PJM planning process:

• Not transparent or predictable
• Not consistent with the intent of the Show Cause Order

Action Plan?
**Modifications.** This Attachment M-3 may only be modified under Section 205 of the Federal Power Act if the proposed modification has been authorized by the PJM Transmission Owners Agreement-Administrative Committee in accordance with Section 8.5 of the Consolidated Transmission Owners Agreement.
PJM Load Group Reality:

MODIFICATIONS ARE REQUIRED:

1. The PJM TOs are not in compliance with the letter of Attachment M-3.
2. Real life experience with M-3 implementation has demonstrated that Attachment M-3 alone falls short of Order 890’s principles

Action Plan?