

Transmission Expansion Advisory Committee FirstEnergy Supplemental Projects

JCPL Transmission Zone

Needs

Stakeholders must submit any comments within 10 days of this meeting in order to provide time necessary to consider these comments prior to the next phase of the M-3 process

Need Number: JCPL-2026-001

Process Stage: Need Meeting – 01/06/2026

Project Driver:

Equipment Condition/Performance/Risk

Specific Assumption Reference:

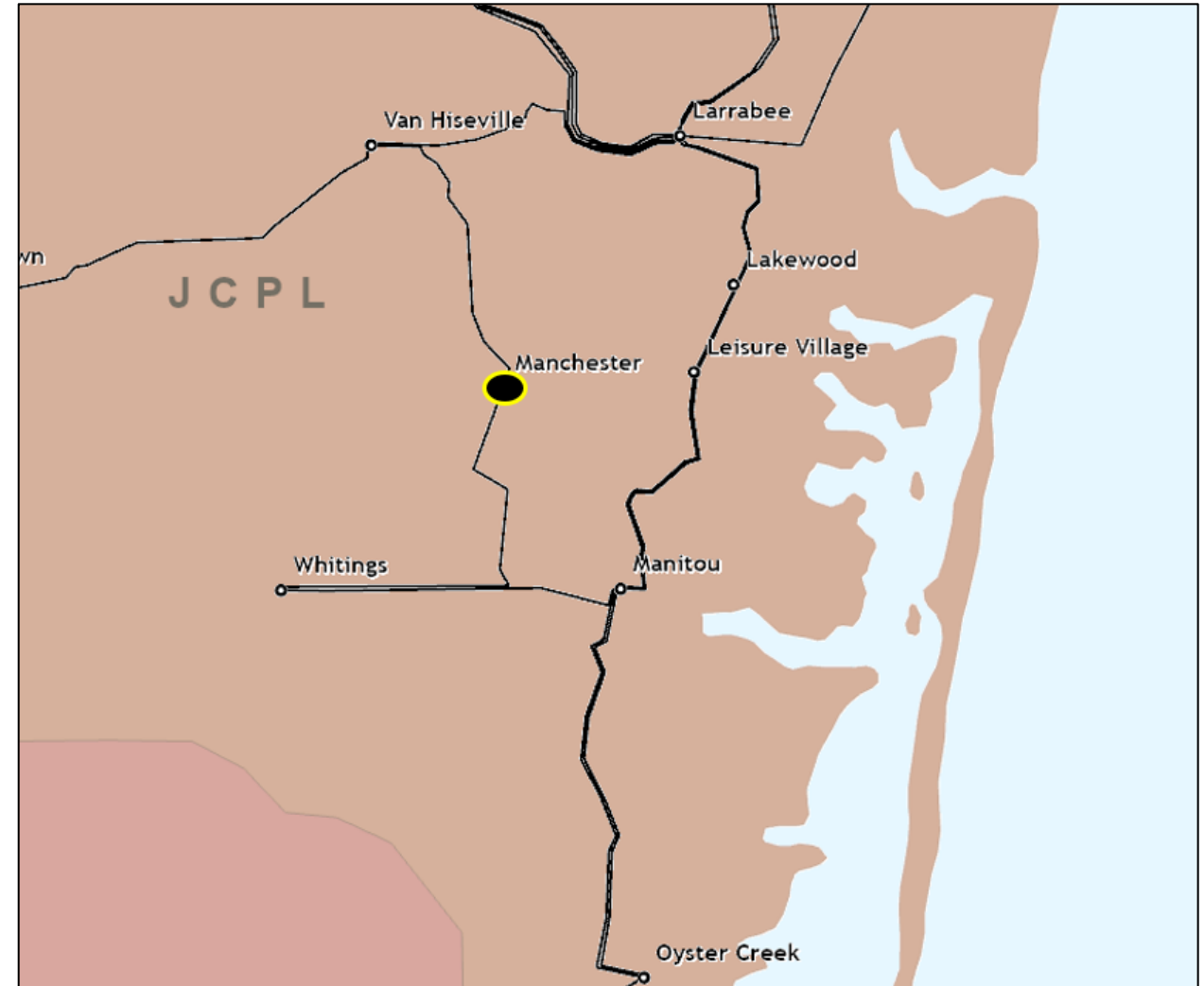
- System Performance Global Factors
 - System reliability/performance
 - Load at risk in planning and operational scenarios
 - Substation/line equipment limits
- Add/Expand Bus Configuration
 - Loss of substation bus adversely impacts transmission system performance
 - Eliminate simultaneous outages to multiple networked elements under N-1 analysis

Problem Statement:

The existing Manchester Substation is tapped off of the Cookstown - Larrabee - Whittings (B1042) 230 kV Line with no line breakers and over 30 miles of line exposure. A fault on a remote end breaker or outage on the Cookstown - Larrabee - Whittings (B1042) 230 kV Line will result in an interruption to the Manchester Substation. Manchester Substation serves 23 MW of load and approximately 7,000 customers.

An additional supplemental project, s3298, is also under development on the Cookstown - Larrabee - Whittings 230 kV B1042 Line to reconfigure the three-terminal line into two separate 230 kV circuits.

- Manchester - Whittings (B1042) 230 kV Line:
 - Existing Transmission Line Ratings: 678 / 813 / 805 / 929 MVA (SN/SE/WN/WE)
 - Existing Conductor Ratings: 709 / 869 / 805 / 1031 MVA (SN/SE/WN/WE)
- Manchester - Van Hiseville Tap (B1042) 230 kV Line:
 - Existing Transmission Line and Conductor Ratings: 709 / 869 / 805 / 1031 MVA (SN/SE/WN/WE)



Appendix

High level M-3 Meeting Schedule

Assumptions	Activity	Timing
	Posting of TO Assumptions Meeting information	20 days before Assumptions Meeting
	Stakeholder comments	10 days after Assumptions Meeting
Needs	Activity	Timing
	TOs and Stakeholders Post Needs Meeting slides	10 days before Needs Meeting
	Stakeholder comments	10 days after Needs Meeting
Solutions	Activity	Timing
	TOs and Stakeholders Post Solutions Meeting slides	10 days before Solutions Meeting
	Stakeholder comments	10 days after Solutions Meeting
Submission of Supplemental Projects & Local Plan	Activity	Timing
	Do No Harm (DNH) analysis for selected solution	Prior to posting selected solution
	Post selected solution(s)	Following completion of DNH analysis
	Stakeholder comments	10 days prior to Local Plan Submission for integration into RTEP
	Local Plan submitted to PJM for integration into RTEP	Following review and consideration of comments received after posting of selected solutions

Revision History

12/22/2025 – V1 – Original version posted to pjm.com