Subregional RTEP Committee – Mid-Atlantic FirstEnergy (Met-Ed) Supplemental Projects

July 21, 2022

Solutions

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

Met-Ed Transmission Zone M-3 Process



Need Number: ME-2022-002

Process Stage: Solution Meeting 7/21/2022

Previously Presented: Need Meeting 04/19/2022

Project Driver:

Customer Service

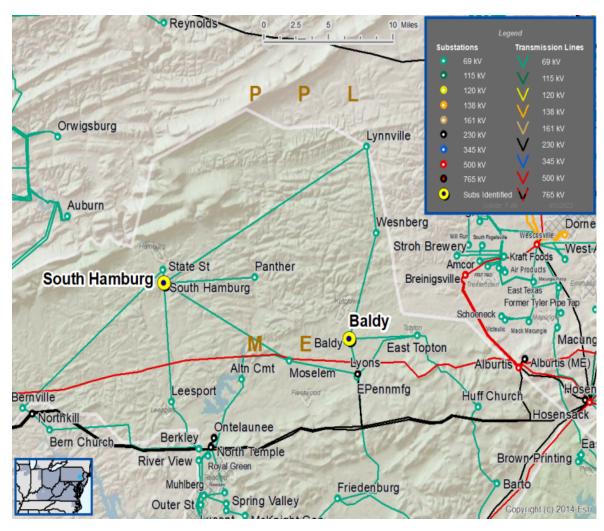
Specific Assumption Reference:

Customer request will be evaluated per FirstEnergy's "Requirements for Transmission Connected Facilities" document and "Transmission Planning Criteria" document.

Problem Statement:

New Customer Connection – A customer requested 69 kV service; anticipated load is 13 MVA; location is near the Baldy – South Hamburg 69kV line.

Requested in-service date is 8/30/2023





Met-Ed Transmission Zone M-3 Process New Customer Substation

Need Number: ME-2022-002

Process Stage: Solution Meeting 7/21/2022

Proposed Solution:

Tap the Baldy – Weisenberg 69 kV line

Install 69 kV switches

Construct ~1 span of 69 kV to customer substation

Alternatives Considered:

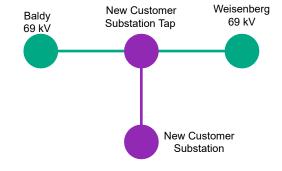
None

Estimated Project Cost: \$0.8M

Projected In-Service: 8/30/2023

Project Status: Conceptual

Model: 2022 RTEP model for 2026 Summer (50/50)



Legend	
500 kV	
345 kV	
230 kV	
138 kV	
115 kV	
69 kV	
46 kV	
34.5 kV	
23 kV	
New	

Met-Ed Transmission Zone M-3 Process



Need Number: ME-2019-031

Process State: Solutions Meeting 7/21/2022

Previously Presented:

Needs Meeting 5/31/2019

Supplemental Project Driver:

Operational Flexibility and Efficiency

Specific Assumption References:

System Performance Projects

Load at risk in planning and operational scenarios

Add/Expand Bus Configuration

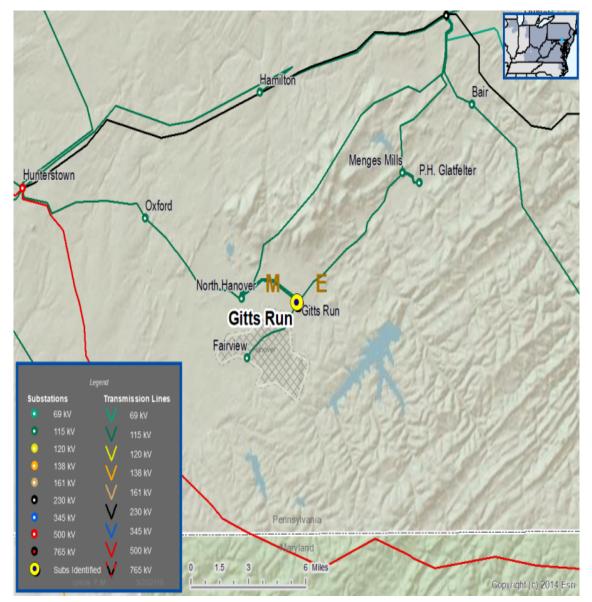
- Reduce the amount of exposed potential local load loss during contingency conditions
- Eliminate simultaneous outages to multiple networked elements

Problem Statement:

The loss of Gitts Run substation results in loss of approximately 40 MW of load and approximately 2900 customers.

Substation consists of:

- Four 115 kV transmission lines
- Two distribution transformers connected to transmission with switches
- One normally open bus tie switch





Met-Ed Transmission Zone M-3 Process Gitts Run 115 kV Substation

Need Number: ME-2019-031

Process State: Solutions Meeting 7/21/2022

Proposed Solution:

Gitts Run 115 kV Substation

Construct six breaker ring bus

North Hanover 115 kV Substation

Remove line trap

Transmission Line Rating:

• Gitts Run – North Hanover 115 kV 996 Line

Before Proposed Solution: 221/263 MVA (SN/SE)

After Proposed Solution: 221/263 MVA (SN/SE)

Gitts Run – North Hanover 115 kV 995 Line

Before Proposed Solution: 221/262 MVA (SN/SE)

After Proposed Solution: 221/263 MVA (SN/SE)

Gitts Run – PH Glatfelter 115 kV Line

Before Proposed Solution: 221/262 MVA (SN/SE)

After Proposed Solution: 221/262 MVA (SN/SE)

Gitts Run – Fairview 115 kV Line

Before Proposed Solution: 232/282 MVA (SN/SE)

After Proposed Solution: 232/282 MVA (SN/SE)

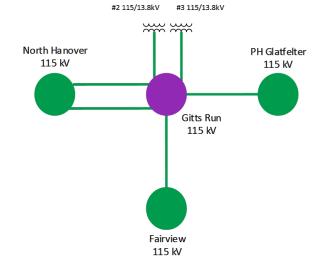
Alternatives Considered:

Maintain existing condition

Estimated Project Cost: \$14.4 M Projected In-Service: 12/22/2023

Project Status: Conceptual

Model: 2021 RTEP For 2026 50/50



Legend		
500 kV		
345 kV		
230 kV		
138 kV		
115 kV		
69 kV		
46 kV		
34.5 kV		
23 kV		
New		

Questions?



Appendix

High level M-3 Meeting Schedule

Assumptions		Timing
	Posting of TO Assumptions Meeting information	20 days before Assumptions Meeting
	Stakeholder comments	10 days after Assumptions Meeting
		T: :
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	Activity	Timing
Supplemental	Do No Harm (DNH) analysis for selected solution	Prior to posting selected solution
Projects & Local	Post selected solution(s)	Following completion of DNH analysis
Plan	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

7/11/2022 – V1 – Original version posted to pjm.com