



Generation Interconnections

This analysis was completed to assess the reliability impact for a new generator interconnecting to the PJM system as a Capacity resource.

Network Impacts - 120 MW Injection

Injection of 120 MW into the Star (Motiva) 138kV substation was evaluated for network impacts. The following impacts were determined:

Normal System

No identified problems.

Multiple Facility Contingency (Tower Line Outages)

No identified problems.

Generator Deliverability

Project #E28 contributes to the overload of the Graysferry - Parrish 230 kV circuit for the outage of the Concord - Lenape 230 kV circuit which includes the loss of the Concord 230/35 kV transformer. This overload was identified for previous projects. Project #E28 contributes approximately 19 MW towards the overload

Short Circuit Analysis

No overdutied circuit breakers were identified

System Reinforcements

The Graysferry - Parrish 230 kV overload can be eliminated by reconductoring the Graysferry - Parrish 230 kV circuit. The cost is estimated at \$ 14.7 million and will be completed within 36 months

