CETL Studies For Market Efficiency Projects

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Load Deliverability Overview

• Examines whether the transmission system can support the delivery of energy from the aggregate of available PJM Capacity Resources into each Locational Deliverability Area (LDA) separately experiencing a capacity deficiency and higher than expected peak load levels
  – 27 LDAs
  – Capacity Emergency Transfer Objective (CETO): required transfer amount to satisfy LDA Loss Of Load Expectation (LOLE) requirements
  – Capacity Emergency Transfer Limit (CETL): actual transfer amount at which some combination of thermal and voltage limits are reached or voltage collapse occurs
  – Want CETL > CETO
Load Deliverability For RPM

- Performed annually on 3 year out summer peak power flow case
- Actual CETL is calculated for all modeled LDAs
- Confirm that CETL > 115% CETO for non-modeled LDAs
- CETL can have more than one simultaneous limit (thermal and voltage)
- CETO & CETLs are a primary component of RPM Planning Parameters and posted on PJM website
Load Deliverability For Market Efficiency Projects

• Use the latest 3 year out summer peak RPM power flow case
  – If system conditions are expected to be significantly different after 3 years, the 5 year out summer peak RTEP case will be examined as well

• Determine which LDAs might be impacted by ME project

• Update RPM power flow case as necessary to include generation and transmission changes that occurred since case was built that might have an impact on selected LDAs
  – New/Withdrawn Interconnection Customers & Deactivations
  – Baseline, Supplemental & Network Upgrades

• Examine LDA CETL with and without ME project and feed incremental CETL into Capacity Benefit calculation