Distribution System Plans

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February 12, 2020

Distribution System Plans: Future Focus Areas

Load Forecasting and Granularity

- Establish Forecasting Methods to Include Distributed Energy Resource (DER) Integration
- Leverage AMI Interval Data to Utilize “Bottom-Up” Approach for Load Forecasting
  - Disaggregate Load from DER
- DER and Load Disaggregation
  - Inverter Based DER – Solar PV, Storage, etc.
  - Non-Inverter Based – Rotating Machines
  - Related Programs – Demand Response
  - Non-Traditional Loads – Vehicle Charging

Distribution System Plans: Future Focus Areas

DER Integration in Scenario Planning

- Integrate a “Light” Season in the Planning Process
- Establish Systemwide Feeder and Substation Transformer Minimum Loading on a Regular Basis
- Determine Substation and Feeder Hosting Capacity
- Integrate Load and Resource Profiles in the Planning Process

Distribution System Plans: Future Focus Areas

System Constraints

- System Constraints Identified in Interconnection Process Need to be Translated to Distribution Planning Process
- DER Forecasting Model
- Time Series-Based Planning
  - Server-Based Application
  - Additional “Computing Power”
- Exploration of Probabilistic Planning
- Tool Integration – Economic Models and Powerflow Modeling
- Single Source For Data

Distribution System Plans: Future Focus Areas

Budgeting for the Future

- Traditional Spend to Enable Load Growth
  - Base Budget
  - Infrastructure Resiliency
  - Strategic
- DER-Ready Equipment is Standard and Applied in Substation Upgrades
- Proactive “DER Ready” System Investments
- DER Inclusion in Options Analysis
- Realization of Additional or Non-Monetized Benefits

Questions