Designated Entity Design Standards Task Force Update

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PJM Planning Committee
September 15th, 2016
Issue Charge/Problem Statement:

- Develop minimum engineering design standards, which would take into consideration geography, and physical and other local needs (noise level, undergrounding requirements, etc.) of the project. The design standards would apply to projects that are competitively solicited and address the following areas.
  - a. Transmission Lines
  - b. Substations
  - c. System Protection and Control Design and Coordination

http://pjm.com/~/media/committees-groups/task-forces/dedstf/postings/20150818-dedstf-issue-charge.ashx
• Q1 2016 the DEDSTF elected via informal poll to divide into the following three subgroups to focus attention on specific minimum design standards:
  – Transmission Lines
  – Substations
  – System Protection and Control Design and Coordination

• These groups are currently in the process of utilizing existing documentation, M07 and TSS guidelines as a strawman to develop minimum design standards.
Transmission Lines Subgroup Update
Transmission Lines Subgroup

- Initial focus on Overhead lines

- Expected to complete first draft Q1 2017

- Will continue discussions on additional items i.e. underground, HVDC etc.

- Expect additional few months for these topics
Protection and Control Subgroup update
Protection Subgroup update

• General consensus that PJM Manual M7 is a strong starting point
• Additional items, not covered in PJM Manual 7 to be discussed
  • Rack design (terminal block reqs, wire sizing, general rack layout/arrangement
  • Protection design (CT, VT selection, supervisory relays, test switches, etc)
  • Metering requirements
  • SCADA
  • Alarm requirements
  • Commissioning procedures
  • Disturbance Monitoring Equipment (PRC-002, 018??)
  • 69kV solutions
Protection Next steps

- DEDSTF will recommend that majority of topics are already covered in M7
- Develop additional documentation to address things not covered in M7
- Coordination with Relay Subcommittee on several topics
- Expect to deliver draft documentation Q1 2017
PJM DEDSTF Substation Subgroup
Substation Subgroup update

• Engaged support from the TSS committee

• Detailed review of TO Guidelines

• Final document will draw heavily from existing TSS guidelines

• Large amount of guidelines still under review

• Expect to deliver draft around June 2017
Questions

- Please direct all questions to the PJM DEDSTF facilitation team:
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  - Lead SME: Suzanne.Glatz@pjm.com