NERC and Regional Coordination Update

Reliability Standards and Compliance Subcommittee
Preston Walker
October 20, 2017
## NERC Standards Under Development

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<th>Standards</th>
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| TPL-001-5 | **Project 2015-10 Single Points of Failure**<br>TPL-001-5 – Transmission System Planning Performance Requirements  
**Applicability:**<br>PC, TP  
**Purpose:**<br>The revisions address reliability concerns in FERC Order No. 754 and directives in FERC Order No. 786. Revision include the following:<br>• R1 – Updated reference to MOD-032-1  
• R1 – Modified how known outages are selected for study  
• R2 – Modified P1 contingencies simulated (steady state) for known outages.  
• R2 – Added model conditions for analysis of P1 events for known outages.  
• R2 – Added stability analysis requirement for long lead time equipment unavailability.  
• R4 – Added documentation requirement if Cascading observed given 3-phase fault SPF.  
• Table 1 – Added language specifying single point of failures (SPF)  
• Implementation Plan – R1 & R2 36 months; R4 60 months | Comment Ballot | 10/23/2017 |
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<tbody>
<tr>
<td>Draft Reliability Guideline: Gas and Electrical Operational Coordination Considerations</td>
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<td>Comments</td>
<td>11/3/2017</td>
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**Applicability:**
RC, BA, TOP, GO, GOP

**Purpose:**
The goal of the coordination is to ensure that both the gas and electric systems remain secure and reliable during normal, abnormal, and emergency conditions. This guideline attempts to provide a set of principles and strategies that may be adopted should the region in which you operate require close coordination due to increased dependency. This guideline also focuses on the areas of preparation, coordination, communication, and intelligence that may be applied in order to coordinate operations and minimize risk.
### Standards

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<tbody>
<tr>
<td>FAC-010-3</td>
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<td>FAC-011-4</td>
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<td>FAC-014-3</td>
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<td>FAC-015-1</td>
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### Project

**Project 2015-09 Establish and Communicate System Operating Limits**

**Applicability:**
RC, TOP, PC, TP

**Purpose:**

One of the primary objectives of Project 2015-09 is to make revise the FAC Standards to create better alignment with the currently effective TPL, TOP, and IRO Standards and the revised definitions of Operational Planning Analysis (OPA) and Real-time Assessments (RTA). NERC has also proposed a definition for System Voltage Limits.

- FAC-010-3 – SOL Methodology for the Planning Horizon (**Retirement**)
- FAC-011-4 – SOL Methodology for the Operations Horizon
- FAC-014-3 – Establish and Communicate System Operating Limit
- FAC-015-1 – Coordination of Planning Assessments with the RC’s SOL Methodology
- Implementation Plan – Project 2015-09
- Proposed Definition - System Voltage Limit

### Activity

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NERC Standards Subject to Future Enforcement

- **January 1, 2018**
  - PRC-026-1 – Relay Performance During Stable Power Swings (R1)

- **April 1, 2018**
  - IRO-018-1(i) – Reliability Coordinator Real-time Reliability Monitoring and Analysis Capabilities
  - TOP-010-1 – Real-time Reliability Monitoring and Analysis Capabilities

- **July 1, 2018**
  - MOD-026-1 – Verification of Models and Data for Generator Excitation Control System or Plant Volt/VAR Control Functions (R2, R2.1 – R2.1.6)
  - MOD-027-1 – Verification of Models and Data for Turbine/Governor and Load Control or Active Power/Frequency Control Functions (R2, R2.1 – R2.1.5)
  - TOP-001-4 – Transmission Operations
  - TPL-007-1 – Transmission System Planned Performance for Geomagnetic Disturbance Events (R2
NERC Standards Subject to Future Enforcement

- January 1, 2019
  - TPL-007-1 – Transmission System Planned Performance for Geomagnetic Disturbance Events (R5)

- January 1, 2021
  - PRC-026-1 – Relay Performance During Stable Power Swings (R2 - R4)
  - TPL-007-1 – Transmission System Planned Performance for Geomagnetic Disturbance Events (R6)

- January 1, 2022
  - TPL-007-1 – Transmission System Planned Performance for Geomagnetic Disturbance Events (R3, R4, R7)
Questions?

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