

Standard Development Timeline

This section is maintained by the drafting team during the development of the standard and will be removed when the standard becomes effective.

Development Steps Completed

SAR posted for comment February 21, 2014 to March 24, 2014

[First posting May 19, 2014 to July 2, 2014](#)

Proposed Action Plan and Description of Current Draft

This is the ~~first~~[second](#) posting of the revised standard under Project 2014-03 Revisions to the TOP/IRO Reliability Standards. The SDT is working under a deadline for filing the revised standards with FERC of January 15, 2015.

Anticipated Actions	Anticipated Date
Additional ballot	August 2014
Final ballot	October 2014
BOT	November 2014

Version History

Version	Date	Action	Change Tracking
1	April 2014	New standard developed by Project 2014-03	New

Definitions of Terms Used in Standard

This section includes all newly defined or revised terms used in the proposed standard. Terms already defined in the Reliability Standards Glossary of Terms are not repeated here. New or revised definitions listed below become approved when the proposed standard is approved. When the standard becomes effective, these defined terms will be removed from the individual standard and added to the Glossary.

There are no new or revised definitions proposed in this standard revision.

When this standard has received ballot approval, the text boxes will be moved to the Application Guidelines Section of the Standard.

A. Introduction

1. **Title: Outage Coordination**
2. **Number: IRO-017-1**
3. **Purpose:** To ensure that outages are properly coordinated in the Operations Planning time horizon and Near-Term Transmission Planning Horizon.
4. **Applicability:**
 - 4.1. Reliability Coordinator
 - 4.2. Transmission Operator
 - 4.3. Balancing Authority
 - 4.4. Planning Coordinator
 - 4.5. Transmission Planner
5. **Effective Date:**

The standard shall become effective on the first day of the first calendar quarter that is twelve (12) months after the date that the standard is approved by an applicable governmental authority or as otherwise provided for in a jurisdiction where approval by an applicable governmental authority is required for a standard to go into effect. Where approval by an applicable governmental authority is not required, the standard shall become effective on the first day of the first calendar quarter that is twelve (12) months after the date the standard is adopted by the NERC Board of Trustees or as otherwise provided for in that jurisdiction.

6. **Background:**

~~On April 16, 2013, NERC submitted two petitions requesting Commission approval of TOP and IRO standards. One petition addresses three revised TOP Reliability Standards: TOP-001-2 (Transmission Operations), TOP-002-3 (Operations Planning), TOP-003-2 (Operational Reliability Data), and one Protection Systems (PRC) Reliability Standard, PRC-001-2 (System Protection Coordination) to replace the eight currently-effective TOP standards. The second petition addresses four revised IRO Reliability Standards: IRO-001-3 (Responsibilities and Authorities), IRO-002-3 (Analysis Tools), IRO-005-4 (Current Day Operations), and IRO-014-2 (Coordination Among Reliability Coordinators) to replace six currently-effective IRO standards.~~

~~On November 21, 2013, the Commission issued a NOPR proposing to remand these TOP and IRO Standards, stating that NERC “has removed critical reliability aspects that are included in the currently-effective standards without adequately addressing these aspects in the proposed standards.” For example, the Commission cites the fact that~~

~~the proposed TOP Standards do not require Transmission Operators to plan and operate within all System Operating Limits (“SOLs”), which is a requirement in the currently effective standards.~~

~~On December 20, 2013, NERC filed a motion requesting that the Commission defer action on the NOPR until January 31, 2015 to provide NERC and the industry the opportunity to thoroughly examine the technical concerns raised in the NOPR and afford time to review the proposed TOP and IRO Standards through the NERC standards development process to ensure that a technically justified set of solutions is in place for reliability. That motion to defer action was granted on January 14, 2014.~~

~~On February 12, 2014, the Standards Committee appointed a Standard Drafting Team to take on the task of revising the aforementioned standards in response to the NOPR issues and the recommendations made by the Independent Expert Review Panel and the SW Outage Report. See Project 2014-03 project page.~~

B. Requirements and Measures

Rationale: This standard is in response to issues raised in NOPR paragraph 90 and recommendations made by the Independent Expert Review Panel and SW Outage Report on the need for an outage coordination standard. It allows for one cohesive standard to address all outage coordination concerns as opposed to having multiple requirements spread throughout the various standards.

Time Horizon: The official definition of the Operations Planning Time Horizon is: “operating and resource plans from day-ahead up to and including seasonal.” The SDT equates ‘seasonal’ as being up to one year out and that these requirements covers the period from day-ahead to one year out.

- R1.** Each Reliability Coordinator shall develop, implement, and maintain an outage coordination process for generation and Transmission outages within its Reliability Coordinator Area. The outage coordination process shall: [*Violation Risk Factor: ~~Lower~~Medium*] [*Time Horizon: Operations Planning*]
- 1.1.** Identify applicable roles and reporting responsibilities including:
 - 1.1.1.** Development and communication of outage schedules.
 - 1.1.2.** Assignment of coordination responsibilities for outage schedules between Transmission Operator(s) and Balancing Authority(s) ~~prior to submitting to Reliability Coordinators.~~
 - 1.2.** Specify outage submission timing requirements.
 - 1.3.** Define the process to evaluate the impact of Transmission and generator outages within its ~~Reliability Coordinator~~ Wide Area.

- 1.4. Define the process to coordinate the resolution of identified outage conflicts with its Transmission Operators and Balancing Authorities, and other Reliability Coordinators.

Note on part 1.5 — ~~Operations planning horizon is next-day to one year out. This requirement part will allow for Reliability Coordinators to request seasonal planning assessments if so desired. After reviewing industry comments, the SDT does not believe this is needed for seasonal assessments. The Reliability Coordinator can always request seasonal assessments if it believes they are necessary for reliability.~~

- 1.5. ~~Document and maintain the specifications for outage analysis during the operations planning horizon.~~
- M1. Each Reliability Coordinator shall make available its dated, current, in force outage coordination process for generation and Transmission outages within its Reliability Coordinator Area.
- R2. Each Transmission Operator and Balancing Authority shall perform the functions specified in follow its Reliability Coordinator outage coordination process. [*Violation Risk Factor: LowMedium*] [*Time Horizon: Operations Planning*]
- M2. Each Transmission Operator and Balancing Authority shall provide evidence upon request that it performed the functions specified in followed its Reliability Coordinator outage coordination process. Such evidence could include, but is not limited to, web postings with an electronic notice of the posting, dated operator logs, voice recordings, postal receipts showing the recipient, date and contents, or e-mail records.

Rationale for Requirement R3: Planning Assessment is a defined term and a document that Planning Coordinators and Transmission Planners already have to produce for approved TPL-001-4. It is not a compilation of load flow studies but a textual summary of what was found in those studies including rationales and assumptions.

- R3. Each Planning Coordinator and Transmission Planner shall provide its Planning Assessment to impacted Reliability Coordinators. [*Violation Risk Factor: LowMedium*] [*Time Horizon: Operations Planning*]
- M3. Each Planning Coordinator and Transmission Planner shall provide evidence upon request showing that it provided its Planning Assessment to impacted Reliability Coordinators. Such evidence could include, but is not limited to, web postings with an

electronic notice of the posting, dated operator logs, voice recordings, postal receipts showing the recipient, date and contents, or e-mail records.

Rationale for Requirement R4: The SDT has re-written Requirement R4 to show that the process starts with the Planning Assessments created by the Planning Coordinator and Transmission Planner and then those Planning Assessments are reviewed and reconciled as needed with the Reliability Coordinator. This is in response to comments in paragraph 90 of the FERC NOPR about directly involving the Reliability Coordinator in the planning process for periods beyond the present one year outreach. The re-write should not be construed as relieving the Reliability Coordinator of responsibilities in this area but simply as a reflection of how the process actually starts.

In the future, the SDT believes that such coordination should take place in the TPL standards and to support that position, the SDT has created an item in a draft SAR for TPL-001-4 that would revise Requirement R8 to make the Reliability Coordinator an explicit party in the review process described there.

In addition, the SDT will submit a request to the Functional Model Working Team to adjust the roles and responsibilities of the Reliability Coordinator to this new paradigm.

- R4.** Each ~~Reliability Coordinator,~~ Planning Coordinator, and Transmission Planner shall ~~coordinate~~jointly develop solutions with ~~in the~~its ~~respective~~ Reliability Coordinator(s) ~~Area~~ for identified issues or conflicts with planned outages in ~~the~~its Planning Assessment for the Near-Term Transmission Planning Horizon. [*Violation Risk Factor: Medium*] [*Time Horizon: ~~Operations Planning~~ Long-term Planning*]
- M4.** Each ~~Reliability Coordinator,~~ Planning Coordinator, and Transmission Planner shall provide evidence upon request showing that it ~~coordinated~~jointly developed solutions with ~~in the~~its ~~respective~~ Reliability Coordinator(s) ~~Area~~ for identified issues or conflicts with planned outages in ~~the~~its Planning Assessment for the Near-term Transmission Planning Horizon. Such evidence could include, but is not limited to, web postings with an electronic notice of the posting, dated operator logs, voice recordings, postal receipts showing the recipient, date and contents, or e-mail records.

C. Compliance

1. Compliance Monitoring Process

1.1. Compliance Monitoring Process

As defined in the NERC Rules of Procedure, “Compliance Enforcement Authority” (CEA) means NERC or the Regional Entity in their respective roles of monitoring and enforcing compliance with the NERC Reliability Standards.

1.2. Compliance Monitoring and ~~Enforcement~~Assessment Processes

~~Compliance Audit~~

~~Self-Certification~~

~~Spot-Checking~~

~~Compliance Investigation~~

~~Self-Reporting~~

~~Complaint~~

As defined in the NERC Rules of Procedure, “Compliance Monitoring and Assessment Processes” refers to the identification of the processes that will be used to evaluate data or information for the purpose of assessing performance or outcomes with the associated reliability standard.

1.3. Data Retention

The following evidence retention periods identify the period of time an entity is required to retain specific evidence to demonstrate compliance. For instances where the evidence retention period specified below is shorter than the time since the last audit, the Compliance Enforcement Authority may ask an entity to provide other evidence to show that it was compliant for the full time period since the last audit.

Each responsible entity shall keep data or evidence to show compliance as identified below unless directed by its Compliance Enforcement Authority to retain specific evidence for a longer period of time as part of an investigation:

Each Reliability Coordinator shall retain its dated, current, in force, outage coordination process in accordance with Requirement R1 and Measurement M1 as well as any documents in force since the last compliance audit.

Each Transmission Operator and Balancing Authority shall retain evidence for three calendar years that it followed its Reliability Coordinator outage coordination process in accordance with Requirement R2 and Measurement M2.

Each Planning Coordinator and Transmission Planner shall retain evidence for three calendar years that it has its Planning Assessment to impacted Reliability Coordinators in accordance with Requirement R3 and Measurement M3.

Each Reliability Coordinator, Planning Coordinator, and Transmission Planner shall retain evidence for three calendar years that it has coordinated solutions within the Reliability Coordinator Area for identified issues or conflicts with planned outages in the Planning Assessment in accordance with Requirement R4 and Measurement M4.

If a responsible entity is found non-compliant, it shall keep information related to the non-compliance until mitigation is complete and approved or the time period specified above, whichever is longer.

The Compliance Enforcement Authority shall keep the last audit records and all requested and submitted subsequent audit records.

1.4. Additional Compliance Information

None.

Table of Compliance Elements

R #	Time Horizon	VRF	Violation Severity Levels			
			Lower VSL	Moderate VSL	High VSL	Severe VSL
R1	Operations Planning	Low Medium	N/A The Reliability Coordinator did develop, implement, and maintain an outage coordination process for generation and Transmission outages within its Reliability Coordinator Area but it was missing one of the parts specified in Requirement R1 (Parts 1.1 – 1.4).	N/A The Reliability Coordinator did develop, implement, and maintain an outage coordination process for generation and Transmission outages within its Reliability Coordinator Area but it was missing two of the parts specified in Requirement R1 (Parts 1.1 – 1.4).	N/A The Reliability Coordinator did develop, implement, and maintain an outage coordination process for generation and Transmission outages within its Reliability Coordinator Area but it was missing three of the parts specified in Requirement R1 (Parts 1.1 – 1.4).	<u>The Reliability Coordinator did develop, implement, and maintain an outage coordination process for generation and Transmission outages within its Reliability Coordinator Area but it was missing all four of the parts specified in Requirement R1 (Parts 1.1 – 1.4).</u> OR, The Reliability Coordinator did not develop, implement, and maintain an outage coordination process for generation and Transmission outages within its Reliability Coordinator Area.
R2	Operations Planning	Low Medium	N/A	N/A	N/A	The Transmission Operator or Balancing Authority did not <u>perform the functions specified in</u> follow its Reliability Coordinator outage coordination process.
R3	Operations Planning	Low Medium	N/A	N/A	N/A	The Planning Coordinator or Transmission Planner did not provide its

Standard IRO-017-1 — Outage Coordination

R #	Time Horizon	VRF	Violation Severity Levels			
			Lower VSL	Moderate VSL	High VSL	Severe VSL
						Planning Assessment to impacted Reliability Coordinators.
R4	Operations Planning	Low <u>Medium</u>	N/A	N/A	N/A	The Reliability Coordinator , Planning Coordinator, or Transmission Planner did not coordinate <u>jointly develop</u> solutions with in their <u>theirs</u> respective Reliability Coordinator(s) Area for identified issues or conflicts with planned outages in their <u>theirs</u> Planning Assessment <u>for the Near-term Transmission Planning Horizon</u> .

D. Regional Variances

None.

E. Interpretations

None.

F. Associated Documents

Time Horizon: The official definition of the Operations Planning Time Horizon is: “operating and resource plans from day-ahead up to and including seasonal.” The SDT equates ‘seasonal’ as being up to one year out and that these requirements covers the period from day-ahead to one year out.