

Meeting Notes for Project 2007-03 Real-Time Operations SDT

September 30, 2009 | 8:00 a.m. CDT
New Orleans, LA

1. Administrative Items

a. Introductions and Quorum

The Chair called the meeting to order at 0800 CDT on Wednesday, September 30, 2009 at the Entergy offices in New Orleans, LA. Meeting participants were:

Jim Case, Chair	Al DiCaprio	Jason Marshall
Steve Myers	Eugene Blick, FERC Observer	Howard Gugel, NERC staff
Ed Dobrowolski, NERC Coordinator		

b. NERC Antitrust Compliance Guidelines — Ed Dobrowolski

No questions were raised on the NERC Antitrust Compliance Guidelines.

c. Review Meeting Agenda & Objectives — Jim Case

An item was added to the agenda to discuss the handling of the definition of Directive.

The objectives of the meeting were to complete items 2 & 3 while resolving the responses for questions 1, 3, 5, and 6.

2. Review Implementation Plan Mapping

The mapping table in the Implementation Plan was updated as it had not been revised since the first posting. The revised table is shown below.

Existing Requirement	Resolution
TOP-001-1	
R1	<p>Deleted – Deletion of this requirement doesn’t alleviate responsibility for actions as each individual requirement specifies an action and a responsible entity. Needed actions required for reliability of the bulk power system have been more clearly laid out in revised standards. (See FERC Order 693a, paragraph 112.) The requirement is also non-specific, ambiguous, and not performance oriented. If an entity doesn’t perform as specified in an individual requirement, then they are held accountable at that level. All of this makes this requirement redundant. The overall reliability of the bulk power system is not adversely affected by the deletion of this requirement.</p>
R2	<p>Deleted for RC - The RC has the ultimate responsibility for the reliability of the bulk power system and the TOP must respond to RC directives as per proposed IRO-001-2, R2. Replaced for TOP - At the TOP level, this has been replaced by TOP-001-2, R5 through R8. The SDT has moved toward actionable reliability requirements based on avoiding IROLs and the IROL T_v. The SDT recognizes that it is impossible to define every instance of what may constitute an emergency and has decided to move toward a more definitive approach based on IROLs and IROL T_v. This is seen as a more measurable, identifiable quantity as well as having a more solid basis in actual operations. It provides a TOP with greater flexibility in responding to operating conditions while not being overly prescriptive in dictating actions.</p>
R3	<p>Moved for RC - All references to the RC and RC responsibilities have been removed from TOP standards as they are now covered in the revisions being undertaken in Project 2006-06. This requirement is now covered in the proposed IRO-001-2, R2 & R3. Replaced for TOP - TOP-001-2, R1 now covers the BA and GOP responding to TOP directives.</p>
R4	<p>Retained and moved to TOP-001-2, R1.</p>
R5	<p>Retained and moved to TOP-001-2, R2. The intent of the “mitigation” phrasing was replaced by TOP-001-2, R8. (Also, see explanation for R2 above.)</p>
R6	<p>Retained and moved to TOP-001-2, R3 for the TOP. The GOP was removed since they can’t be contacted directly by others and will only respond to such requests if they were in the form of a Directive from its TOP which is covered in TOP-001-2, R1. EOP-001-0, R1 covers the BA so to eliminate a redundancy the BA has been removed from this requirement. In addition, the BA must still respond to any Directive from the TOP as stated in TOP-001-2, R1.</p>
R7	<p>Retained in concept but re-worded as part of TOP-001-2, R4.</p>

	<p>After the fact notifications have been deleted since those actions will be seen through telemetry as cited in the proposed TOP-003-2 and IRO-001-2.</p> <p>The term ‘burden’ was considered by the SDT to be vague, ambiguous, unmeasurable, and undefined and has been replaced by a NERC defined term ‘Adverse Reliability Impact’.</p>
R8	<p>First sentence – Deleted due to: - BAL-001-0.1a states that the BA must balance for real power regardless of system conditions. Therefore, this portion of the requirement is superfluous and can be deleted. The TOP does not balance real power so that part of the sentence can be deleted. VAR-001-1a, R8 covers reactive power requirements and the meaning of balancing reactive power for the TOP. The BA must be told by the TOP to take actions regarding reactive power (see TOP-001-2, R1) and can therefore be deleted from this part of the requirement.</p> <p>Second sentence – Deleted due to: The BA must be told by the TOP to take actions regarding reactive power (see TOP-001-2, R1) and can thus be deleted. TOPs are covered under VAR-001-1a, R1 thus making this part of the requirement redundant.</p> <p>Third sentence – The RC is now covered in IRO-009-1, R1 through R4 and can be deleted here. The TOP and BA are covered in EOP-003-1, R1. Therefore, this is redundant and can be deleted.</p>
TOP-002-2	
R1	<p>First sentence – Deleted for BA, Retained for TOP - The BA is required to always plan to meet and recover from Contingency events as stated in BAL-002-0, R2 and therefore this part of the requirement is redundant and can be deleted. Retained for TOP in TOP-002-3, R1 through R3. This is patterned after the approved IRO-008-1 for the RC.</p> <p>Second sentence – Deleted - The BA is covered in BAL-002-0, R3 and thus is redundant and can be deleted here. The TOP is covered in the proposed TOP-001-2, R8 and is thus also redundant and can be deleted.</p>
R2	Deleted as good utility practice but unmeasurable and not truly Reliability Standard material.
R3	<p>For all but the TSP, TOP-003-2 requires the transfer of any and all data required for real-time operations or assessments regardless of timeframe involved. That makes this requirement redundant and it can be deleted.</p> <p>The TSP is covered in the proposed MOD-028-1, MOD-029-1, or MOD-030-1 and is thus redundant and can be deleted.</p>
R4	<p>Deleted - TOP-003-2 requires the transfer of any and all data required for real-time operations or assessments between and amongst BAs and TOPs regardless of timeframe involved. That makes this requirement redundant and it can be deleted for BAs and TOPs.</p> <p>Data requirements for RCs are covered in IRO-010-1, R3 making this requirement redundant for RCs and it is therefore deleted.</p>

R5	The BA is required to always plan to meet and recover from Contingency events as stated in BAL-002-0, R2 and therefore this part of the requirement is redundant and can be deleted. TOP - replaced by TOP-002-3, R1 through R3.
R6	The BA is required to always plan to meet and recover from Contingency events as stated in BAL-002-0, R2 and therefore this part of the requirement is redundant and can be deleted. TOP - replaced by TOP-002-3, R1 through R3. The SDT does not believe that there is a need for the last part of the sentence 'in accordance with...' with the advent of the ERO and enforceable reliability standards.
R7	The BA is required to always plan to meet and recover from Contingency events as stated in BAL-002-0, R2 and therefore this requirement is redundant and can be deleted. Deliverability is not in the control of the BA; it is a TOP responsibility and is covered in TOP-002-3, R1 and R2.
R8	Deleted - The BA must be told by the TOP to take actions regarding reactive power (see TOP-001-2, R1) and thus this requirement can be deleted. Voltage and reactive are the responsibility of the TOP and are covered under VAR-001-1a, R1. Deliverability is not in the control of the BA; it is a TOP responsibility and is covered in TOP-002-3, R1 and R2.
R9	This is covered in INT-003-2 and is redundant and can be deleted.
R10	BA - deleted as not applicable to BA. TOP - covered in TOP-002-3, R1 (assessment of SOLs) & R2 (avoid IROLs) - the SDT has moved toward an operating philosophy based on avoiding IROLs and acting within the IROL T _v .
R11	Deleted: First sentence - TOP-003-2 requires the transfer of any and all data required for real-time operations or assessments regardless of the timeframe involved. Assessments are covered in TOP-002-3, R1. Second sentence deleted as this is now covered in the proposed IRO-009-1, R5 for IROLs and the SDT has moved toward an operating philosophy based on avoiding IROLs and acting within the IROL T _v . Third sentence - 'update... as necessary' is ambiguous and the SDT believes that TOP-003-2, R1 better covers this for studies and covered in TOP-002-3, R3 for distribution so this is redundant and can be deleted.
R12	Deleted as duplicative of MOD-028-2, MOD-029-2, or MOD-030-2 (proposed).
R13	Deleted as duplicative of MOD-024-1 & MOD-025-1. Passed on to Project 2007-09: Generator Verification.
R14	Deleted - duplicative of TOP-003-2.
R15	Deleted - duplicative of TOP-003-2.

R16	Deleted – duplicative of TOP-003-2.
R17	Deleted - duplicative of IRO-010-1, R3.
R18	Deleted as the SDT feels that this requirement adds no reliability benefit. Entities have existing processes that handle this issue. This is an administrative item as seen in the measure which simply requires a list of line identifiers.
R19	Deleted as unmeasurable. Also, an issue has been entered in the NERC database for the MOD standards requiring that models be verified prior to use when these standards are revised in the future. NERC has stated that they will update the MOD standards when the revised TPL standards are completed.
TOP-003-1	
R1	Deleted as duplicative of TOP-003-2, R1.
R2	BA deleted since BA is only required to respond to Directives regarding voltage. TOP-001-2, R4 covers coordination issues. TOP-003-2, R1 handles data requirements.
R3	Retained as TOP-001-2, R5.
R4	Deleted – covered by TOP-001-2, R4 as the SDT expects the entities to resolve any conflicts based on this requirement. If the conflict can't be resolved, the (proposed) IRO-001-2, R1 gives the RC the authority to resolve the conflict. .
TOP-004-2	
R1	Moved to TOP-001-2, R6 with the note that the SDT has moved toward an operating philosophy based on avoiding IROLs and the IROL T _v .
R2	Moved to TOP-001-2, R6 with the note that the SDT has moved toward an operating philosophy based on avoiding IROLs and the IROL T _v .
R3	Moved to TOP-001-2, R6. This requirement is not limited by single or multiple Contingencies but is based solely on identified IROLs.
R4	Deleted due to the fact that the SDT believes the best way to handle such a situation is to treat it like an IROL or restoration scenario and to take the same type of actions that you would apply for alleviating those situations. Therefore, it is covered under TOP-001-2, R6 and the proposed EOP-006-2. This allows the operator sufficient flexibility within a structured environment to take the necessary actions for the reliability of the bulk power system.
R5	The TOP does not have the right to unilaterally separate – that can only be done through the authorization of the RC, thus the first sentence is a moot point and that portion of the requirement can be deleted. The second sentence has been replaced by TOP-001-2, R6 through R9 with the note that the SDT has moved toward an operating philosophy based on avoiding IROLs and the IROL T _v .
R6	The first sentence was deleted as it is has been superseded by the NERC Reliability Standards taken as a whole.

	<p>For example, the second sentence can be deleted as all of the sub-requirements are covered elsewhere: R6.1 is duplicative of VAR-001-1, R1 for reactive. Real power flows are covered in TOP-001-2, R6. R6.2 is covered in TOP-001-2, R4 R6.3 – moved to TOP-001-2, R4; R6.4 – moved to TOP-001-2, R6 through R9 with the note that the SDT has moved toward an operating philosophy based on avoiding IROLs and the IROL T_v.</p>
TOP-005-2	
R1	Deleted – covered by proposed IRO-010-1, R3.
R2	Confidentiality is not a reliability issue but a market or business issue. Since this is not a reliability issue, it does not belong in the Reliability Standards and can be deleted.
R3	Deleted – covered by TOP-003-2.
R4	Deleted – The only data that a PSE has that a TOP or BA needs is part of eTag and is acquired through that system. This is a NAESB standard and can thus be deleted.
TOP-006-2	
R1	<p>R1 & R1.1 - Deleted – covered as part of the new data specification requirements in TOP-003-2. R1.2 - Deleted – covered by proposed IRO-010-1, R3.</p>
R2	<p>Deleted – covered as part of the new data specification requirements in TOP-003-2 for the TOP & BA. The RC is covered by proposed IRO-010-1, R3.</p>
R3	Deleted – as duplicative of proposed PER-005-1 (training) and TOP-003-2 (data).
R4	Deleted – covered as part of the new data specification requirements in TOP-003-2.
R5	Deleted – covered in certification process for initial core capabilities. Entities will be in violation of other standards if they don't maintain their initial certification. For example, BAL-005 for ACE calculations (BA); TOP-001-2, for TOP avoiding IROLs; IRO-008-1, R2 for real-time assessments every 30 minutes for RCs.
R6	Deleted – covered in certification process for initial core capabilities. Entities will be in violation of other standards if they don't maintain their initial certification. For example, BAL-005 for ACE calculations (BA); TOP-001-2, for TOP avoiding IROLs.
R7	Deleted – covered in certification process for initial core capabilities. Entities will be in violation of other standards if they don't maintain their initial certification. For example, BAL-005 for ACE calculations (BA); EOP-003-1, for TOP avoiding underfrequency; EOP-006-2, R8 for resynchronization for RCs.
TOP-007-0	

R1	Moved to TOP-001-2, R8 with the note that the SDT has moved toward an operating philosophy based on avoiding IROLs and the IROL T _v .
R2	Moved to TOP-001-2, R6 with the note that the SDT has moved toward an operating philosophy based on avoiding IROLs and the IROL T _v .
R3	Deleted - Covered in EOP-003-1, R1.
R4	Deleted as duplicative of IRO-001-1.1, R3.
TOP-008-1	
R1	Deleted – as duplicative of EOP-003-1, R1.
R2	First sentence - Deleted as duplicative of TOP-001-2, R6 with the note that the SDT has moved toward an operating philosophy based on avoiding IROLs and the IROL T _v . Second sentence – deleted as this is now handled by the RC as cited in proposed IRO-009-1, R5.
R3	Delete first sentence – Placing this procedure in a requirement when it is only one of the possible options for alleviating the condition is bad practice and should not be mandated in standards. If the situation involves an IROL it is covered in TOP-001-2, R6 through R9. If it is not an IROL, then the owner still has the right to protect their equipment within the limitations of their contracts and obligation to comply with the Reliability Standards. Delete second sentence as duplicative of TOP-001-2, R4.
R4	Deleted – information is covered as part of the new data specification requirements in TOP-003-2. Analysis tools are covered in the certification process for initial core capabilities. The TOP will be in violation of other standards if they don't maintain their initial certification. For example, they can't develop their limits without maintaining their tools. Assessments are required in TOP-002-3 while real-time analysis is required for IROL mitigation in TOP-001-2 thus covering the operational timeframes. TOP-001-2, R9 covers mitigation of limit violations with the note that the SDT has moved toward an operating philosophy based on avoiding IROLs and the IROL T _v .
PER-001-0	
R1	Deleted - In FERC Order 693a, paragraph 112, the Commission clarifies that a Reliability Coordinator's authority to issue directives arises out of the Commission's approval of Reliability Standards that mandate compliance with such directives. The SDT believes that this same logic applies to TOPs and BAs and that makes this requirement superfluous and thus it can be deleted.

It was noted that the Implementation Plan should be updated with a note stating that this project and the Reliability Coordination Project (2006-06) should probably be filed together due to the linkages between the projects.

AI – Ed will update the Implementation Plan based on the results of this meeting.

FERC staff remains unconvinced that the new approach emphasizing IROLs and the IROL T_v is a suitable replacement for the existing requirements. The SDT will work on a write-up that can be included in the eventual filing document explaining the rationale for such an approach.

AI – SDT members to develop a technical write-up on the rationale for the emphasis on IROLs and IROL T_v instead of SOLs that can be included in the filing for this project.

There was some discussion on TOP-002-2.

The SDT sees the new requirements mandating a day-ahead assessment followed by a plan and distribution of the plan as more stringent than the existing requirements. FERC staff does not agree.

FERC staff is also not in line with the day-ahead timing element of the proposed requirements. They would like to see a ‘reasonable’ timeframe required. They are also looking for retention of the seasonal timeframe in this area.

The existing Requirement R6 contains a reference to regional and sub-regional requirements that the SDT does not feel are needed anymore. FERC staff disagrees.

FERC staff wants to see the existing “R2 - Each Balancing Authority and Transmission Operator shall ensure its operating personnel participate in the system planning and design study processes, so that these studies contain the operating personnel perspective and system operating personnel are aware of the planning purpose” retained. The SDT has proposed deleting this requirement as good utility practice but unmeasurable and not truly Reliability Standard material.

Simply stating that a requirement has been deleted due to the fact that it is covered in certification is not sufficient. Specific examples of other existing requirements that an entity would not be able to meet if they let these certification items lapse should be provided.

3. Review Issues Resolutions

The issues database for this project was reviewed and updated and is shown below.

Standard	Source	Language	Resolution
TOP-001-1	FERC Order 693	1580 - Consider adding other measures and levels of non-compliance.	Measures and VSLs have been assigned to all requirements.
TOP-001-1	FERC Order 693	1585 - Clarify the definition of “emergency” and define the criteria for entering into the various states. Also define the authority for	The RTOSDT feels that the TOP-001 standard should be restricted to Transmission System operations and that

Standard	Source	Language	Resolution
		declaring these states.	definition of operating states more correctly belong in EOP-001 as pointed out in Order 693, paragraph 560. To make certain that the issue is handled there; the RTOSDT has entered an official item in the NERC database of project issues in this regard. This will require the SDT working on revisions to EOP-001 to formally address this concern. EOP-001 is listed in the Reliability Standards Development Plan under Project 2009-03 which has not yet started.
TOP-001-1	FERC Order 693	1588 - Consider Santa Clara's comments to provide that the transmission operator may notify the reliability coordinator or the balancing authority that it is removing facilities from service as part of the standards development process.	This is covered in TOP-001-2, R4.
TOP-001-1	Version 0 Team	What is 'clear decision making authority'?	Requirement using this term was deleted as not needed in a reliability standard. The standards already require the necessary actions.
TOP-001-1	Version 0 Team	Need to define single, central communications point during emergencies	This is an issue for COM standards.
TOP-001-1	Version 0 Team	Some emergencies will require follow up notification as opposed to immediate	Requirements have been re-written to eliminate confusion.
TOP-001-1	Version 0 Team	Define emergency	The RTOSDT feels that the TOP-001 standard should be restricted to Transmission System operations and that definition of operating states more correctly belong in EOP-001 as pointed out in Order 693, paragraph 560. To make certain that the issue is handled there; the RTOSDT has entered an official item in the NERC database of project issues in this regard. This will require the SDT working on revisions to EOP-001 to formally address this concern. EOP-001 is listed in the Reliability Standards Development Plan under Project 2009-03 which has not yet started.
TOP-001-1	Version 0 Team	Need to expand included entities	Applicability has been reviewed by the SDT and changed as required.
TOP-002-2	FERC Order 693	1600 - Address critical energy infrastructure confidentiality as part of the routine standard development process.	Restrictions due to confidentiality have been eliminated by re-writing the data specification requirements in TOP-003-2.
TOP-00-2	FERC Order 693	1601 – Require next day analysis for all IROLs to identify and communicate control actions to system operators	See TOP-002-3, R1, R2, and R3.

Standard	Source	Language	Resolution
TOP-002-2	FERC Order 693	1603 - Requires next-day analysis of minimum voltages at nuclear power plants auxiliary power buses.	Next day analysis is required in TOP-002-3, R1. All data required for assessments is stipulated in TOP-003-2. Coordination of activities is covered in TOP-001-2, R4. If actions are required, they are covered in TOP-001-2, R1. This is also covered in NUC-001-1: R1, R2, R3, and R4. NRC regulations cover the internal actions of a nuclear plant operation.
TOP-002-2	FERC Order 693	1604 - Requires simulation contingencies to match what will actually happen in the field.	The SDT understands 'actually' to mean what was designed. The SDT believes that Contingencies can only be simulated to depict the net effect of actual response to design conditions for all modeling. See TOP-002-3, R1. The SDT does not believe that there is a need for the last part of the sentence 'in accordance with...' with the advent of the ERO and enforceable reliability standards.
TOP-002-1	Fill in the Blank Team	Remove "in accordance with NERC, Regional Reliability Organization, sub-regional, and local reliability requirements" from R6 and "in accordance with filed tariffs and/or regional Total Transfer Capability and Available Transfer Capability calculation processes" from R12 .	R6 has been deleted. For the BA – deleted as not applicable as the BA needs only respond to CPS and DCS. For the TOP - replaced by TOP-002-3, R1. R12 has been deleted as duplicative of MOD-030-2 (not yet approved).
TOP-002-2: R19	NERC Audit Observation Team	How do you address the term - verify "Accurate"	R19 was eliminated as unmeasurable.
TOP-002-2	NERC Standards DT Coordinators	Requirements R2, R5, and R6 (for coordination in real-time) of PRC-001-1 System Protection Coordination are better addressed in the TOP family of standards. Consider putting R5 of PRC-001-1 in TOP-002 R1, R3, R4, or R5 or TOP-003 R1, R3, R4	See TOP-003-1, R1.
TOP-002-1	Version 0 Team	Define N-1	R6 has been deleted. For the BA – deleted as not applicable as the BA needs only respond to CPS and DCS. For the TOP - replaced by TOP-002-3, R1. This term is no longer in use for this standard.
TOP-002-1	Version 0 Team	Define 'without intentional delay'	This term was considered unmeasurable and has been deleted from this standard.
TOP-002-1	Version 0 Team	Reliability should 'trump' confidentiality	The SDT has removed all references to confidentiality by re-writing the data specification requirements.
TOP-002-1	Version 0 Team	Coordination of planning required	The SDT has re-written and tightened up the requirements for distributing data and information.
TOP-002-1	Version 0 Team	Limit of 2 tests per year	This requirement has been deleted by the SDT as verification testing is not needed in

Standard	Source	Language	Resolution
			this standard.
TOP-002-1	VRF Team	R9 – related to INT-003	R9 has been deleted as it is duplicative of INT-003-2
TOP-002-1	VRF Team	R14 & 14.1 – ambiguous	Deleted – duplicative of TOP-003-1.
TOP-002-1	VRF Team	R2 – administrative in nature, not a real requirement	The SDT agreed and deleted this requirement.
TOP-003-0	FERC Order 693	1620 & 1621 - Incorporate an appropriate lead time for planned outages using suggestions from the various commenters.	New data specifications in TOP-003-2 handle this concern. Also, see second posting comments for Q5 where industry responded that such a requirement was not needed and may even be detrimental to reliability.
TOP-003-0	FERC Order 693	1622 - Consider TVA's suggestion for including breaker outages within the meaning of facilities that are subject to advance notice for planned outages.	New data specifications in TOP-003-2 handle this concern.
TOP-003-0	FERC Order 693	1624 - Require any facility, that in the opinion of the reliability coordinator, balancing authority, or transmission operator, will have a direct impact on the reliability of the bulk power system be subject to the requirement R1 for planned outage coordination.	New data specifications in TOP-003-1 handle this concern.
TOP-003-0	NERC Standards DT Coordinators	Requirements R2, R5, and R6 (for coordination in real-time) of PRC-001-1 System Protection Coordination are better addressed in the TOP family of standards. Consider putting R5 of PRC-001-1 in TOP-002 R1, R3, R4, or R5 or TOP-003 R1, R3, R4	See TOP-003-1, R1
TOP-003-0	Version 0 Team	Outage information needed sooner than 1 day prior	New data specifications in TOP-003-1 handle this concern.
TOP-003-0	Version 0 Team	RA can't request outage cancellation	Deleted – now covered in Project 2006-06.
TOP-003-0	Version 0 Team	Submit outage data ASAP but no later than noon day ahead	New data specifications in TOP-003-1 handle this concern.
TOP-003-0	VRF Team	R4 – poorly written	Deleted – now covered in Project 2006-06.
TOP-003-1	FMPA – Frank Gaffney	With respect to requirement R1.2, why is the TOP responsible for providing generator outage information? Isn't that the BA's or GOP's responsibility and isn't this redundant with IRO-010-1?	Requirement deleted as duplicative of TOP-003-2, R1.
TOP-004-1	FERC Order 693	1636 - Modify requirement R4 to state that the system should be restored to respect proven limits as soon as possible taking no more than 30 minutes.	Replaced by TOP-001-2, R6 with the note that the SDT has moved toward an operating philosophy based on avoiding IROLs and the IROL T _v .

Standard	Source	Language	Resolution
TOP-004-1	FERC Order 693	1637 - Reliability coordinators should report any IROL violations to NERC on a monthly basis for one year beginning August 2, 2007.	Not within the scope of the SDT.
TOP-004-1	FERC Order 693	1638 - Defines high risk conditions under which the system must be operated to respect multiple outages in requirement R3.	For common mode failures: In FAC-014, the PC must identify multiple Contingencies for consideration by the RC. In FAC-011, the RC selects which of these Contingencies it will consider for developing SOLs. In FAC-014, the RC then must distribute the list of SOLs derived to the TOP. In TOP-002-3, the TOP must assess the next day operations based on not exceeding its SOLs and then plan accordingly. For non-common mode failures: Emergency and restoration procedures are utilized to recover the system as needed.
TOP-004-1	FERC Order 693	1639 - Consider Santa Clara's comments regarding changes to requirement R2 in the standards development process. (Santa Clara states that Requirement R2 of the Reliability Standard should be revised to include frequency monitoring in addition to the monitoring of voltage, real and reactive power flows.)	This is covered as part of the new data specification requirements in TOP-003-2 for the TOP & BA. The RC is covered by proposed IRO-010-1, R3.
TOP-004-1	FERC Order 693	1641 - NERC should report the results of the survey to the Commission within 18 months of the effective date of this rule.	Not within the scope of the SDT.
TOP-004-1	Fill in the Blank Team	No action required	No action required.
TOP-004-1	Version 0 Team	Operations should conform to planning standards	Operations and planning are different timeframes with different problems and solutions
TOP-004-1	Version 0 Team	Vagueness in application of IROL limits	Requirement moved to TOP-001-2, R5 and clarified.
TOP-004-1	Version 0 Team	Define SOL & IROL	These are defined terms in the NERC Glossary.
TOP-004-1	Version 0 Team	Clarify roles	Applicability has been reviewed and updated as necessary.
TOP-004-1	Version 0 Team	Define (or remove) practical	The term has been removed.
TOP-004-1	Version 0 Team	Specify disconnection as acceptable in R5	The requirement has been deleted. Relationships between the RC and TOP as described in the revised standards cover these actions.
TOP-005-1	FERC Order 693	1648 - Include information about the operational status of special protection systems and power system stabilizers in Attachment 1.	Attachment 1 has been deleted and replaced by the new data specification requirement in TOP-003-2.

Standard	Source	Language	Resolution
TOP-005-1	FERC Order 693	1649 - Delete references to confidentiality agreements but ensure critical energy infrastructure confidentiality is addressed in the standards development process.	New data specifications in TOP-003-2 handle this concern.
TOP-005-1	FERC Order 693	1650 - Consider FirstEnergy's modifications to Attachment 1 and ISO-NE's recommended revision to requirement R4 in the standards development process. ISO-NE recommends that the reference to "purchasing-selling entity" in Requirement R4 should be replaced with "generator owner, transmission owner, and LSE.	Attachment 1 has been deleted and replaced by the new data specification requirement in TOP-003-2. R4 has been superseded by TOP-003-2 which does include the indicated entities.
TOP-005-1	NERC Standards DT Coordinators	Requirements R2, R5, and R6 (for coordination in real-time) of PRC-001-1 System Protection Coordination are better addressed in the TOP family of standards. Consider putting R2 of PRC-001-1 in TOP-005. Note: These requirements are being removed from PRC.	See TOP-003-1, R1
TOP-005-1	Version 0 Team	Need to include GO & LSE	New data specifications in TOP-003-1 handle this concern.
TOP-005-1	Version 0 Team	Data update is too slow	New data specifications in TOP-003-1 handle this concern.
TOP-005-1	Version 0 Team	Generator data should include voltage control & stabilizers	New data specifications in TOP-003-1 handle this concern.
TOP-005-1	Version 0 Team	GO needs to supply data to BA & TO	New data specifications in TOP-003-1 handle this concern
TOP-006-1	FERC Order 693	1660 & 1661 - Add requirement related to the provision of minimum capabilities that are necessary to enable operators to deal with real-time situations and to ensure reliable operation of the bulk power system.	The RTOSDT has passed this on to Project 2009-02 (Real-time Tools) through the submittal of an official comment to the published SAR. Tools and capabilities are a very broad, yet specialized topic that demands industry input of a more focused nature than that included in the scope of the current Project 2007-03 (<u>Real-time Operations</u>). NERC has had a study group working on this issue since the 2003 blackout, and the output of that group led to the creation of the SAR for Project 2009-02 as well as a comprehensive discussion of the subject in a published report. Requirement for phase angle information is covered by TOP-003-1.
TOP-006-1	FERC Order 693	1663 - Clarify the meaning of "appropriate technical information" concerning protective relays.	This term is no longer used. Requirement R3 deleted as duplicative of proposed PER-005-1 (training) and TOP-003-2 (data).
TOP-006-1	FERC Order 693	1664 - Consider APPA's comments	Measures have been assigned to all

Standard	Source	Language	Resolution
		regarding missing measures in the standards development process.	requirements.
TOP-006-1	NERC Standards DT Coordinators	Requirements R2, R5, and R6 (for coordination in real-time) of PRC-001-1 System Protection Coordination are better addressed in the TOP family of standards. Consider putting R6 of PRC-001-1 in TOP-003 R5 or TOP-006. Note: These requirements are being retired in PRC-001-1.	See TOP-003-1, R1
TOP-006-1	Version 0 Team	Need to match roles with FM	Applicability has been reviewed by the SDT and changed as required in accordance with the FM and the Compliance Registry.
TOP-006-1	Version 0 Team	Monitor frequency at multiple points	New data specifications in TOP-003-1 handle this concern.
TOP-006-1	Version 0 Team	Load forecasting data required	New data specifications in TOP-003-1 handle this concern.
TOP-006-1	Version 0 Team	GO needs to provide normal & emergency data	New data specifications in TOP-003-1 handle this concern.
TOP-006-1	VRFs Team	R1, 1.1, 1.2 – ‘available in emergency situation’ may be needed	New data specifications in TOP-003-1 handle this concern.
TOP-006-1	VRFs Team	R3 – define appropriate	This requirement was deleted as duplicative of PRC-001-1, R1.
TOP-006-1	VRFs Team	R4 – What information is required and what is a load pattern?	New data specifications in TOP-003-1 handle this concern.
TOP-006-2	FMPA – Frank Gaffney	With respect to requirements R1 and R1.2, why are BAs responsible for information regarding transmission resources available for use? Isn't that the role of the TOP?	Deleted – covered as part of the new data specification requirements in TOP-003-2.
TOP-006-2	FMPA – Frank Gaffney	With respect to requirement R2, why is the BA responsible for monitoring transmission line status, voltage, load tap changer settings, and reactive power in general? Monitoring and managing reactive resources, voltage and tap settings is clearly made the responsibility of the TOP in VAR-001-1a.	Deleted – SDT agrees.
TOP-006-2	FMPA – Frank Gaffney	With respect to requirement R3 why does the BA need to understand protective relaying? Isn't that the role of the TOP and GOP?	Requirement R3 deleted as duplicative of proposed PER-005-1 (training) and TOP-003-2 (data).
TOP-007-0	FERC Order 693	1673 - Consider the NRC's comments on voltage requirements as part of the standards development process.	Next day analysis is required in TOP-002-3, R1. All data required for assessments is stipulated in TOP-003-2. Coordination of activities is covered in TOP-001-2, R4. If actions are required, they are covered in TOP-001-2, R1. This is also covered in

Standard	Source	Language	Resolution
			NUC-001-1: R1, R2, R3, and R4. NRC regulations cover the internal actions of a nuclear plant operation.
TOP-007-0	Version 0 Team	Need to define evidence of evaluation	This term isn't used in the requirements – no action required.
TOP-007-0	Version 0 Team	Need to tighten the non-compliance terms	Measures and VSL have been assigned to all requirements.
TOP-007-0	Version 0 Team	Not enforceable with current criteria	Not enough information provided to address concern.
TOP-007-0	Version 0 Team	RA should be included	RC is now covered in Project 2006-06.
TOP-007-0	Version 0 Team	More of a compliance issue than a true standard	Not enough information provided to address concern.
TOP-008-1	FERC Order 693	1681 - Consider APPA's comments regarding missing measures in the standards development process.	Measures have been assigned to all requirements.
PER-001-0	Version 0 Team	Data retention should be 1 year	This standard will be retired.

The items shaded in cyan are those that FERC staff are still considering or that they have raised a possible objection to.

4. Definition of Directive

The SDT expressed their displeasure with the proposed resolution of this item. The Chair, on behalf of the members, sent an e-mail to the Standards Committee stating this position and the reasoning for it.

5. Discuss Proposed Responses to Comments

a. Questions 1 – Jason Marshall

Jason led the SDT through the proposed responses to question 1 comments. Due to time constraints, the review was not completed.

b. Questions 2 – Paul Bleuss

Paul was unable to attend the meeting. His responses will be reviewed later.

c. Question 3 – Steve Myers

The SDT completed the review of the question 3 responses.

d. Question 4 – Greg Van Pelt

Greg was unable to attend the meeting. However, the SDT reviewed the comments and provided responses.

e. Question 5 – Team

Due to time constraints, the review of this item was not completed.

f. Questions 6 – Jim Case

The SDT completed the review of the question 6 responses.

6. Revise Standards as Required

Changes to the standards necessitated by comment responses were made as the responses were reviewed.

During the course of the mapping table review, the SDT decided to re-instate a previously deleted requirement. “Each Transmission Operator, Balancing Authority, and Generator Operator shall coordinate planned outages of telemetering and control equipment and associated communication channels between the affected entities.” was re-instated as TOP-001-2, R5.

7. Next Steps — Jim Case

Since not all of the response reviews were completed, a conference call will be set up to finish this work.

It also appears likely that another conference call with FERC staff will be required to complete the review of issues relating to Order 693.

It may be necessary to re-post this project as opposed to going to ballot following the 3rd posting as originally planned.

8. Schedule Next Meetings

A conference call and web ex will be set up for Thursday, October 29, 2009 from 1400 to 1700 EDT to complete the work on comment responses and any other open business. Details will be sent later.

There may be a conference call with FERC staff on Tuesday, November 24, 2009. Eugene will check on the date.

AI – Eugene to check to see if November 24th is a good date for a conference call between the SDT and FERC staff.

9. Review Action Items & Project Schedule — Ed Dobrowolski

The following action items were developed during this meeting:

- Ed will update the Implementation Plan based on the results of this meeting.
- SDT members to develop a technical write-up on the rationale for the emphasis on IROLs and IROL T_v instead of SOLs that can be included in the filing for this project.
- Eugene to check to see if November 24th is a good date for a conference call between the SDT and FERC staff.

10. Adjourn

The RTOSDT members thanked Entergy for their hospitality and the Chair adjourned the meeting at 1200 CDT on Friday, October 2, 2009.