

EXHIBIT D

Violation Severity Level and Violation Risk Factor Guideline Analysis

Texas Reliability Entity, Inc.

**VRF and VSL Justification
Regional Standard BAL-001-TRE-1
Primary Frequency Response in the ERCOT Region**

Table of Compliance Elements

The Table of Compliance Elements is appended to this document.

Time Horizon

The Regional Standard BAL-001-TRE-1 Standard Drafting Team assigned a Time Horizon to each requirement in accordance with the criteria provided by NERC.¹

Violation Risk Factor (VRF)

The Regional Standard BAL-001-TRE-1 Standard Drafting Team (SDT) used the definitions and guidelines for VRFs found in the “Sanction Guidelines of the North American Electric Reliability Corporation”² to determine the VRF for each requirement.

Based upon the applicable definitions and guidelines, the SDT assigned a “Lower” VRF for Requirements R1, R2, R3 because violation of those requirements would not be expected to adversely affect the electrical state or capability of the bulk electric system, or the ability to effectively monitor and control the bulk electric system. These requirements are necessary components of this standard, but they do not impact real-time operations.

The SDT assigned a “Medium” VRF for Requirements R4 through R10 because, if any one of the requirements were violated, that violation could directly affect the electrical state or the capability of the bulk electric system, or the ability to effectively monitor and control the bulk electric system.

The SDT determined that it is unlikely that violation of any of these requirements would directly cause or contribute to bulk electric system instability, separation, or cascading failures, or to place the bulk electric system at an unacceptable risk. Therefore, no “High” VRFs were assigned to requirements in this standard.

¹ <http://www.nerc.com/pa/Stand/Resources/Documents/TimeHorizons.pdf>

² http://www.nerc.com/files/Violation_Risk_Factors.pdf

Violation Severity Level (VSL)

The SDT used the Violation Severity Level Guidelines³ provided by NERC to determine the VSLs for each requirement, as shown in the regional standard and in the attached table. Particular attention was given to the guidelines that FERC indicated it would use for determining whether to approve VSLs.⁴

The SDT determined that requirements R5 and R7 are binary (pass/fail) requirements, and only a Severe VSL is provided for those requirements. The SDT determined that requirements R3 and R4 contain parts that contribute unequally to performance, so VSLs were written that assign an appropriate severity level to each part. The remaining requirements are associated with a wide range of possible non-compliant performance, so VSLs were written to divide the range of performance into several segments, and each segment was assigned to an appropriate violation severity level.

³ <http://www.nerc.com/pa/Stand/Resources/Documents/VSLGuidelines12112012FINAL.pdf>

⁴ <http://www.nerc.com/pa/Stand/Resources/Documents/ViolationSeverityLevels.pdf>

Table of Compliance Elements

R#	Time Horizon	VRF	Lower VSL	Moderate VSL	High VSL	Severe VSL
R1	Operations Assessment	Lower	The BA reported an FME more than 14 days but less than 31 days after identification of the event.	The BA reported an FME more than 30 days but less than 51 days after identification of the event.	The BA reported an FME more than 50 days but less than 71 days after identification of the event.	The BA reported an FME more than 70 days after identification of the event.
R2	Operations Assessment	Lower	The BA submitted a monthly report more than one month but less than 51 days after the end of the reporting month.	The BA submitted a monthly report more than 50 days but less than 71 days after the end of the reporting month.	The BA submitted a monthly report more than 70 days but less than 91 days after the end of the reporting month.	The BA failed to submit a monthly report within 90 days after the end of the reporting month.
R3	Operations Planning	Lower	The BA did not make the calculation and criteria for determination of the IMFR publicly available.	The BA did not make the IMFR publicly available.	The BA did not calculate the IMFR for the following year in December.	The BA did not calculate the IMFR for a calendar year.
R4	Operations Planning	Medium	N/A	N/A	The BA did not make public the six-FME rolling average Interconnection combined Frequency Response by the end of the following month.	The BA did not calculate the six-FME rolling average Interconnection combined Frequency Response for any month in which an FME occurred.
R5	Operations Planning	Medium	N/A	N/A	N/A	The BA did not take action to improve Frequency Response when the Interconnection's rolling-average combined Frequency Response performance was less than the IMFR.

R6	Operations Planning	Medium	Any Governor parameter setting was > 10% and ≤ 20% outside setting range specified in R6.	Any Governor parameter setting was > 20% and ≤ 30% outside setting range specified in R6.	Any Governor parameter setting was > 30% and ≤ 40% outside setting range specified in R6.	Any Governor parameter setting was > 40% outside setting range specified in R6, – OR – an electronic or digital Governor was set to step into the droop curve.
R7	Real-time Operations	Medium	N/A	N/A	N/A	The GO operated with its Governor out of service and did not notify the GOP upon discovery of its Governor out of service.
R8	Real-time Operations	Medium	The GOP notified the BA of a change in Governor status between 31 minutes and one hour after the GOP was notified of the discovery of the change.	The GOP notified the BA of a change in Governor status more than 1 hour but within 4 hours after the GOP was notified of the discovery of the change.	The GOP notified the BA of a change in Governor status more than 4 hours but within 24 hours after the GOP was notified of the discovery of the change.	The GOP failed to notify the BA of a change in Governor status within 24 hours after the GOP was notified of the discovery of the change.
R9	Operations Assessment	Medium	A GO's rolling average initial Primary Frequency Response performance per R9 was < 0.75 and ≥ 0.65.	A GO's rolling average initial Primary Frequency Response performance per R9 was < 0.65 and ≥ 0.55.	A GO's rolling average initial Primary Frequency Response performance per R9 was < 0.55 and ≥ 0.45.	A GO's rolling average initial Primary Frequency Response performance per R9 was < 0.45.
R10	Operations Assessment	Medium	A GO's rolling average sustained Primary Frequency Response performance per R10 was < 0.75 and ≥ 0.65.	A GO's rolling average sustained Primary Frequency Response performance per R10 was < 0.65 and ≥ 0.55.	A GO's rolling average sustained Primary Frequency Response performance per R10 was < 0.55 and ≥ 0.45.	A GO's rolling average sustained Primary Frequency Response performance per R10 was < 0.45.