



Introduction

Identifies the real-time data that shall be provided to ERCOT by the Qualified Scheduling Entities (QSEs)

Principle

Operating Period data will be used by ERCOT to monitor the real-time reliability of the ERCOT System, and will be used in network analysis software to predict the short-term reliability of the ERCOT System.

References

Protocol 6.5.1.1 – Requirement for Operating Period Data for System Reliability and Ancillary Service Provision

Operating Guide 3.1.3.1 – Qualified Scheduling Entities Operating Obligations
Operating Guide 8 – Operational Metering and Communication

Description

- (1) A QSE representing a Generation Entity that has Generation Resources connected to a TDSP shall provide the following real-time data to ERCOT for each individual generating unit at a Generation Resource plant location and ERCOT will make the data available to the Generation Resource's host TDSP (at TDSP expense):
 - a) Gross or net real power;
 - b) Gross or net Reactive Power;
 - c) If gross quantities are provided, the plant auxiliary Load data will also be supplied;
 - d) Status of switching devices in the plant switchyard not monitored by the TDSP affecting flows on the ERCOT System;
 - e) Frequency Bias of Portfolio Generation Resources under QSE operation;
 - f) Any data mutually agreed by ERCOT and the QSE to adequately manage system reliability;
 - g) Generator breaker status;
 - h) High Operating Limit; and,
 - i) Low Operating Limit.
- (2) Any QSE providing Responsive Reserve and/or Regulation must provide for communications equipment to receive ERCOT telemetered control deployments of service power.
- (3) Any QSE providing Regulation Service must provide appropriate real-time feedback signals to report the control actions allocated to the QSEs Generation Resources.
- (4) Any QSE that represents a provider of Responsive Reserve, Non-Spinning Reserve, or Replacement Reserve using Load as a Resource shall provide separate telemetry of the real power consumption of each Load providing the above Ancillary Services and the status of the breaker controlling that Load. If Load is used as a Responsive Reserve Resource, the status of the high-set under frequency relay will also be telemetered.

- (5) Any QSE that represents a qualified provider of Balancing Up Load (BUL) need not provide telemetry but rather shall provide an estimate in real-time representing the real power interrupted in response to the deployment of Balancing Up Load.
- (6) Real-time data for reliability purposes must be accurate to within three percent (3%). This telemetry may be provided from relaying accuracy instrumentation transformers.

Applicable to:

Qualified Scheduling Entities with a Resource Portfolio

Measurement

A QSE shall provide all real-time data as described in Protocol 6.5.1.1., in the required format and time intervals detailed in Operating Guide Attachment 8A, Operating Period Data. The assessment and measurement for these criteria may occur at any time, without notification that an assessment is occurring. Additional assessments may be conducted as deemed necessary by ERCOT Compliance or as requested by other ERCOT staff.

Measuring Process

ERCOT Compliance will work jointly with EMMS Production and Operations to perform an initial validation that all real-time data required from each QSE is in the ERCOT EMMS. A complete “snapshot” review will be made at least once per calendar year in subsequent years. Requirements for each QSE are based upon the number and size of units in its portfolio, as well as the ancillary services it provides. After confirming that a QSE has not been granted an exemption or allowance for missing data, Compliance will inform the QSE of the specific missing items and request corrective action along with a schedule.

Further investigations may follow as random checks, when QSE data issues are reported, or when a QSE changes its portfolio or ancillary services qualification. In all cases, findings must be reviewed with assigned EMMS Production staff before contacting QSEs.

Issues with intermittent data quality or inaccuracy will be reported to the QSE and corrective action requested with a mutually agreeable time frame, preferably by EMMS Production staff. These will not be treated as an ERCOT Protocol non-compliance issue unless the QSE fails to take action to determine the cause of the problem in the time agreed, or to remedy the problem once the cause is known within an agreed time frame. In all such cases, EMMS Production staff must be consulted regarding efforts taken to isolate and eliminate the problem, which may originate in ERCOT systems.

QSE site audits may provide supplemental information and confirm mitigation plans, but the primary basis for the compliance assessment is whether ERCOT is receiving data at its facilities.

Exceptions

Units less than 10 MW are exempt from real-time data requirements if not used for paid ancillary services. Certain QSE data items are only necessary when qualified for specific ancillary services. ERCOT Operations needs to be consulted whenever private network issues exist to confirm which data is needed. Generator breaker status may involve more than one breaker. AVR status is not required at this time. Either high or low side voltage may be provided for generators.

Levels of Non-Compliance

Level 1

On a first occurrence of non-compliance, ERCOT Compliance will send a letter to and make telephone contact with the Operational Contact for the QSE that is found to be non-compliant. That QSE will be given ten (10) business days to provide a written statement and/or evidence as to why further disciplinary action should not be taken. Information submitted by the QSE shall document the non-compliance event and the extent the QSE is responsible for the event. To the extent the QSE acknowledges responsibility the QSE shall detail what plan is in place to see that this, or a similar event, does not re-occur. After the above ten (10) business days the non-compliance event will be posted on the ERCOT Compliance Web Site.

Level 2

If a second non-compliance event occurs within six (6) months after corrective actions are completed for the Level 1 Compliance Action, or when adequate corrective actions in response to a Level 1 Compliance Action are not met, then ERCOT Compliance will send a letter to and make telephone contact with the Contact of Record in the Standard Form Agreement of the QSE stating ERCOT's position. A copy of this letter will be sent to the Director of Market Oversight Division (MOD) of the Public Utility Commission of Texas (PUCT). The QSE will be given ten (10) business days to respond with an action plan and a time frame to remedy the non-compliance. After the above ten (10) business days the non-compliance event will be posted on the ERCOT Compliance Web Site.

Level 3

This is applied if a third (or more) non-compliance event occurs within six (6) months after corrective actions are completed for the Level 2 Compliance Action, an issue remains unresolved after a Level 2 Compliance Action, or if an event appears to have extreme reliability consequences as to warrant immediate implementation of a Level 3 Compliance Action. Upon initiation of a Level 3 Compliance Action, a complaint will be filed by ERCOT Compliance with the PUCT. Privileges of the non-compliant QSE to provide ancillary services in the ERCOT system may be revoked. All actions taken by ERCOT in this regard will be posted on the ERCOT Compliance Web Site.

NERC Sanctions and Reporting

This measure is reportable in the NERC Compliance Program under Operating Measure P4T2. Simulated sanctions are reported to non-compliant QSEs – all Levels above are NERC Level 4 violations. Intermittent data problems or accuracy issues are reportable as NERC Level 1 violations, if the QSE fails to follow a mutually agreed action plan to investigate or remedy once cause is determined. NERC requirement for annual self-certification is not necessary provided that ERCOT performs an annual, internal check each year.

Document Revisions

ISSUE/DATE	REASON FOR ISSUE
Rev. 1.0 / 4-01-04	R. Potts