

NOTICE DATE: August 5, 2022

NOTICE TYPE: M-A050720-01 Legal

SHORT DESCRIPTION: Resolution of ADR Proceedings between ERCOT and Tenaska Power Services Co. (ADR No. 2021-TPS-05)

INTENDED AUDIENCE: All Market Participants

DAYS AFFECTED: February 18, 2021

LONG DESCRIPTION: Upon ERCOT's determination of the disposition of an Alternative Dispute Resolution (ADR) proceeding, ERCOT Protocol Section 20.9 requires ERCOT to issue a Market Notice providing a description of the relevant facts, a list of the parties involved in the dispute, and ERCOT's disposition of the proceeding and reasoning in support thereof.

Parties: ERCOT and Tenaska Power Services, Co. (TPS).¹

Relevant Facts:

This Market Notice addresses a dispute filed by TPS that seeks reversal of claw-back charges assessed for Responsive Reserve (RRS) responsibilities that TPS had on February 18, 2021. TPS is a Qualified Scheduling Entity (QSE) that represents Resource Entities, including Load Resources. On February 16, 2021, ERCOT determined that issues with TPS's telemetry from Load Resources at a particular site were interfering with the State Estimator's² ability to solve. ERCOT marked the telemetry as Not In Service (NIS) to resolve the State Estimator issue.³ On February 17, 2021, the issues with TPS's telemetry were resolved and it notified ERCOT. However, ERCOT systems did not utilize TPS's telemetry for approximately two hours into February 18 because the telemetry remained marked as NIS. Because TPS's telemetry for certain Load Resources appeared in ERCOT's systems as NIS and did not reflect the RRS responsibilities, ERCOT assessed claw-back charges for RRS.

The table below summarizes relevant actions and communications between ERCOT and TPS for the February 16-19 time-period.

2/16/21 08:49	ERCOT marked TPS's telemetry from the site as NIS in the EMS to resolve the State Estimator issue.
------------------	--

¹ This Market Notice addresses a request for ADR that was filed by TPS on behalf of its sub-QSE (SQ7). For the purposes of this Market Notice, SQ7 is referred to as "TPS."

² State Estimator is defined in ERCOT Protocols, Section 2.1 as "A computational algorithm that uses Real-Time inputs from the network's Supervisory Control and Data Acquisition (SCADA) system that measure the network's electrical parameters, including its topology, voltage, power flows, etc., to estimate electrical parameters (such as line flows and Electrical Bus voltages and Loads) in the ERCOT Transmission Grid. The State Estimator's output is a description of the network and all of the values (topology, voltage, power flow, etc.) to describe each Electrical Bus and line included in the system model."

³ ERCOT marked the telemetry as NIS in the Supervisory Control and Data Acquisition (SCADA) application of the Energy Management System (EMS).

02/16/21 17:00	ERCOT called TPS asking if it was aware of a telemetry outage at the site, since 07:00; TPS reported a network outage in area affecting all resources at the site, but they are working on it.
02/17/21 07:09	TPS reported the telemetry had been re-established.
02/17/21 07:36	ERCOT reported the telemetry at the site still showed as failed; TPS explained that not everything had come back yet but it would confirm and follow up.
02/18/21 00:18	ERCOT reported failed telemetry on Load Resources at the site were reflecting RRS shortage; TPS did not see failed telemetry but would investigate.
02/18/21 00:23	TPS asked if ERCOT saw failed telemetry at any of TPS's other sites; ERCOT reported it only saw failed telemetry at the one site.
02/18/21 00:36	TPS asked how long the telemetry had been stale; ERCOT reported it appeared to go stale on February 16, at 07:00.
02/18/21 00:49	TPS reported that the telemetry was restored on February 17 in the morning and had been functioning properly ever since; TPS requested that ERCOT investigate the issue. ERCOT reported that, due to the telemetry issue, the Load Resources did not appear as deployed, which is why TPS was not receiving XML deployment notifications. TPS reported that the Load Resources were deployed, and it was telemetering RRS obligations for those Load Resources.
02/18/21 01:01	TPS asked if ERCOT saw that TPS was telemetering RRS obligations for Load Resources at the site; ERCOT reported it had not received the telemetry. TPS reported that the Load Resources were currently deployed providing the RRS in accordance with its telemetry; ERCOT acknowledged that there was an issue with the telemetry that was reported to a supervisor. TPS stated that it would continue to investigate the cause of the telemetry issue.
02/18/21 01:05	TPS asked if the Load Resource telemetry reflected the RRS obligations for the Load Resources; ERCOT transferred the call to another employee.
02/18/21 01:07	TPS identified what the Load Resource telemetry should reflect regarding the RRS obligations for each Resource.
02/18/21 04:49	TPS called because it received a message from ERCOT that the telemetry had been overridden to solve a State Estimator issue and wanted to confirm the telemetry ERCOT was receiving matched what TPS was sending. ERCOT confirmed that it was receiving accurate telemetry.

On February 18, TPS had RRS responsibilities of 83 MW for Hour Ending 1:00 and Hour Ending 2:00. However, because TPS's telemetry for the site was marked NIS, ERCOT's systems did not utilize the telemetry. As a result, TPS was charged with failed quantities for those hours and incurred claw-back charges. TPS filed a settlement and billing dispute regarding the claw-back charges, which ERCOT denied. TPS initiated this ADR to challenge the denial of its settlement and billing dispute and claims damages in the total amount of \$1,588,585.00.

ERCOT's Disposition/Reasoning:

ERCOT has determined that the appropriate disposition of this ADR proceeding is to grant TPS's request for relief.

QSEs that represent Resource Entities are required to provide information relating to their Ancillary Service (A/S) responsibilities, including RRS,⁴ in the Real-Time telemetry submitted to ERCOT. For example, a QSE representing Resource Entity that has a Load Resource must provide telemetry for each Load Resource which includes: Load Resource net real power consumption (in MW); Low Power Consumption (LPC); Maximum Power Consumption (MPC); A/S Schedule (in MW) for each quantity of RRS and Non-Spin, which is equal to the A/S Resource Responsibility minus the amount of A/S deployment; A/S Resource Responsibility (in MW) for each quantity RRS and Non-Spin for all Load Resources; and the Resource Status.⁵ QSEs that represent Resource Entities are also required to provide certain telemetry for use by the State Estimator application. The State Estimator utilizes telemetry and a model of the ERCOT System to produce an estimation of the ERCOT System's state.⁶ The telemetry required in connection with the State Estimator includes: the status of breakers and switches; voltages, flows, and Loads on any modeled Transmission Element the Resource Entity owns; and other power operation data.⁷

On February 16, 2021, around 8:49 a.m., ERCOT determined that incorrect telemetry from one of TPS's Load Resource sites was interfering with the State Estimator's ability to solve. In response, ERCOT marked the telemetry as NIS in the EMS, which resolved the State Estimator issue. The ERCOT Nodal Operating Guide includes procedures regarding telemetry issues that affect the State Estimator.⁸ Specifically, Nodal Operating Guide, Section 7.3.4, provides as follows:

7.3.4 Resolving Real-Time Data Issues that affect ERCOT Network Security Analysis

- (1) Real-Time telemetry data issues that affect ERCOT's Network Security Analysis (NSA) are issues that cause invalid State Estimator solutions.
- (2) Manually replaced telemetry data is data entered by a QSE or TO on their systems that is transmitted to ERCOT via ICCP in place of the normal points experiencing an issue.
- (3) ERCOT shall notify the QSE or TO responsible for the telemetry data when a Real-Time telemetry data issue affects ERCOT's NSA. ERCOT shall request each QSE or TO address the Real-Time telemetry data issue with either manually replaced telemetry data if secondary sources are available or correction of the telemetry data issue as soon as practicable. If the QSE or TO cannot address the issue within 10 minutes of notification, the QSE or TO shall coordinate with ERCOT to verbally agree to the best assumed data value(s). The QSE or TO shall use verbally agreed data to manually replace the data point to reflect the best assumed data value(s). The QSE or TO and

⁴ RRS is an Ancillary Service that is intended to resolve frequency decay or deviation, provide back-up regulation, and provide energy or continued Load interruption during an EEA. See ERCOT Protocols § 2.1 (definition of Responsive Reserve Service (RRS)).

⁵ *Id.* at § 6.5.5.2(5)(a)-(m).

⁶ *Id.* at § 3.10.9.2(1). State Estimator results are used in contingency analysis, congestion management, and other network analysis Real-Time sequence functions. *Id.*

⁷ See *id.* at §§ 3.10.7.5.1(1); 3.10.7.5.2(1); and 3.10.7.5.3(1).

⁸ ERCOT Protocols, Section 3.10.7.5.6(1) provides that: "Real-Time data restoration shall comply with Nodal Operating Guide Sections 7.3.3, Data from WAN Participants to ERCOT, and 7.3.4, Resolving Real-Time Data Issues that affect ERCOT Network Security Analysis."

- ERCOT shall review the manually replaced telemetry data; the QSE or TO shall update the manually replaced telemetry data to reflect the best assumed data value(s) until the Real-Time data issue is resolved.
- (4) If the QSE or TO cannot resolve the Real-Time telemetry data issue that is affecting ERCOT's NSA within two Business Days, it shall provide an estimated time of resolution. Each QSE or TO shall notify ERCOT when the Real-Time telemetry data issue that was affecting ERCOT's NSA is resolved.

In this case, the procedures described in Section 7.3.4(3) were applicable. At the outset, it appears that ERCOT did not inform TPS that the telemetry appeared inaccurate and was affecting the State Estimator until around eight hours after ERCOT flagged the telemetry as NIS. Regardless of being in an Energy Emergency Alert (EEA) 3 event, ERCOT should have notified TPS of the telemetry issues sooner. When ERCOT did contact TPS, ERCOT did not request that TPS manually replace the data or correct the telemetry as soon as practicable. Further, because TPS was unable to resolve the telemetry issue within 10 minutes of notification, ERCOT should have coordinated with TPS "to verbally agree to the best assumed data value(s)" and then reviewed the manually replaced telemetry data with TPS. Instead, ERCOT marked the telemetry as NIS and did not inform TPS that ERCOT's systems would no longer receive telemetry from TPS.⁹ ERCOT should have communicated that the telemetry had been flagged when ERCOT called TPS on February 16, to report the telemetry issues, or soon thereafter. TPS made numerous attempts to investigate the telemetry issues and follow up with ERCOT to inquire whether ERCOT was receiving accurate telemetry. If TPS had known that its telemetry was flagged as NIS, it could have inquired whether ERCOT had removed the flag once the telemetry was functioning properly, and it is likely that TPS would not have been charged with failed quantities on its RRS responsibilities. To avoid any reoccurrence of this issue going forward, ERCOT will either update the system to notify personnel when the NIS flag is enabled or modify the ability to activate the NIS feature along with providing additional training to appropriate personnel to review the procedures reflected in Section 7.4.3.

Based on ERCOT's actions, taken as a whole, ERCOT finds that it violated obligations under the ERCOT Nodal Operating Guide, Section 7.3.4(3), and that such actions caused harm to TPS in the form of claw-back charges.¹⁰ As a result, the claim asserted by TPS is granted.

Granting this ADR will affect TPS's A/S imbalance settlement because it will change the A/S responsibility value used in TPS's settlement for the intervals at issue. As a result, the final amount due to TPS from this ADR will include adjustments to account for changes in the A/S imbalance settlement. ERCOT estimates that the net amount due TPS in connection with this ADR will be approximately \$733,335.00. However, the final amount will not be determined until ERCOT performs the resettlement calculations for the market. ERCOT will issue Resettlement Statements

⁹ The fact that ERCOT may flag telemetry as NIS for a period of time would not alone violate the Protocols if necessary to resolve a State Estimator issue. See ERCOT Protocols § 6.5.9.1(2) ("It is anticipated that, with effective and timely communication, the market-based tools available to ERCOT will avert most threats to the reliability of the ERCOT System. However, these Protocols do not preclude ERCOT from taking any action to preserve the integrity of the ERCOT System."). However, in this case, ERCOT did not engage in the overall level of coordination and communication with TPS contemplated by Nodal Operating Guide, Section 7.3.4(3).

¹⁰ ERCOT Protocols Section 20.1(1) provides that the ADR procedure only applies to a "claim by a Market Participant that ERCOT has violated or misinterpreted any law, including any statute, rule, Protocol, Other Binding Document, or Agreement, where such violation or misinterpretation results in actual harm, or could result in imminent harm, to the Market Participant."

for the impacted Operating Day. The issuance date for Resettlement Statements has not been determined, but ERCOT will provide advance notice of the issuance date to Market Participants through a Market Notice.

CONTACT: If you have any questions, please contact your ERCOT Account Manager. You may also call the general ERCOT Client Services phone number at (512) 248-3900 or contact ERCOT Client Services via email at ClientServices@ercot.com.