

### **Filing Receipt**

Filed Date - 2025-09-30 11:09:48 AM

Control Number - 58481

Item Number - 4

#### **PUC PROJECT NO. 58481**

RULEMAKING TO IMPLEMENT \$ PUBLIC UTILITY COMMISSION LARGE LOAD INTERCONNECTION \$ STANDARDS UNDER PURA §37.0561 \$ OF TEXAS

# SCHAPER ENERGY CONSULTING LLC RESPONSE TO STAFF'S QUESTIONS ON PROJECT NO. 58481; RULEMAKING TO IMPLEMENT LARGE LOAD INTERCONNECTION STANDARDS UNDER PURA §37.0561

#### I. INTRODUCTION

Schaper Energy Consulting LLC ("Respondent") represents large-load customers in ERCOT, advising them on all aspects of interconnection and utility coordination as well as energy procurement. In this role, the Respondent prepares interconnection requests and supporting load documentation, engages directly with utilities, and guides clients through ERCOT's planning and study processes, from feasibility through the execution of interconnection agreements and energization. Respondent's clients collectively account for more than nine gigawatts (GW) of large-load interconnection projects in ERCOT, providing Respondent with a uniquely informed vantage point into the interconnection process, the challenges market participants encounter, and potential mechanisms for resolution.

Respondent submits the following comments in response to Commission Staff's memorandum dated September 12, 2025, requesting input on the implementation of *PURA* §37.0561. These comments address Staff's Questions 1-7 in order and include a standalone Executive Summary as the final page.

#### II. DEFINED TERMS

For this response, "Utility" refers to Transmission Service Providers ("TSPs"), Municipally Owned Utilities ("MOUs"), and Electric Cooperatives ("ECs") that administer large load interconnections

and interface with the Interconnecting Large Load Entity ("ILLE"). Capitalized *Planning Guide* terms (e.g., Large Load Interconnection Study ("LLIS"), Load Commissioning Plan ("LCP"), Independent System Operator ("ISO"), etc.) are used as defined in the ERCOT *Planning Guide*.

#### III. BACKGROUND ON CURRENT PROCESS

A key challenge in the large load interconnection process is the advancement of projects lacking readiness demonstrations. Because the current framework does not require uniform financial or technical commitments, speculative projects move forward alongside well-capitalized ones. This reflects incentives the Commission can realign, not structural issues within Utilities or the Independent System Operator.

Currently, LLIS fees are not uniformly collected at submission, technical demonstrations vary across TSPs, and Interim Security is not required before ERCOT review. As a result, resources are consumed by projects that fail to reach capitalization, delaying those with demonstrated viability. Uniform financial and technical commitments would prevent speculative projects from diverting resources, better supporting *PURA* §37.0561(b)'s goals of economic development and minimizing stranded costs.

TSP incentives also play a role. Their function is to plan and build transmission facilities, recovering costs through the rate base. They are not designed to screen speculative projects, nor should they be. This highlights the importance of establishing readiness standards at key milestones before projects reach ERCOT.

Proposals such as regional cluster studies and expanded customer operational requirements aim to address the "many large loads" issue but do so indirectly. Establishing uniform financial and technical commitments at defined milestones would more directly address the problem, ensuring that ERCOT and TSP resources are reserved for projects with real capitalization prospects.

The most effective path to reliability and economic development under *PURA* §37.0561 is to require consistent readiness demonstrations throughout the process. Aligning incentives through LLIS

fees, uniform entry standards, and Interim Security postings will help ensure resources are focused on credible projects, while reducing the need for downstream corrective measures. We request that the Commission evaluate the following responses in this context.

#### IV. RESPONSE TO COMMISSION STAFF OUESTIONS

#### Response to Question 1, Study Fee (PURA §37.0561(f))

1. PURA §37.0561(f) requires the commission to establish standards for interconnecting a large load customer that includes a flat study fee of at least \$100,000. Should the study fee be set at an amount that is greater than \$100,000?

We recommend that the Commission establish a flat Utility study fee per Point of Interconnection ("POI") that is not less than \$150,000 and not more than \$300,000. We recommend allowing Utilities to escalate the fee annually based on CPI, subject to Commission oversight. This fee should be documented in a standardized Discretionary Services Agreement ("DSA") that aligns the engineering scope with all required LLIS elements and schedules under *Planning Guide* §§9.2–9.4. Such a construct satisfies the statutory floor, preserves a flat 'per request' framework, and matches funding to the scope of initial transmission screening and related engineering studies.

In our experience, the proposed statutory minimum of \$100,000 is insufficient to fund the full LLIS suite through completion of the facilities study stage. The costs of steady-state, short-circuit, and dynamic stability studies regularly exceed this amount. As a result, \$100,000 does not realistically cover the required work, often necessitating supplemental study compensation, contrary to the intent of *PURA* \$37.0561(f).

We believe ERCOT's LLIS Application Fee, as outlined in *Planning Guide* §9.2.2(3), should be recognized as separate and not offset against the Study Fee proposed herein.

#### Response to Question 2, Site Control (*PURA* §37.0561(g))

2. PURA §37.0561(g) requires that a large load customer demonstrate site control for the proposed load location through an ownership interest, lease, or another legal interest acceptable to the commission. What other legal interest should the commission accept?

We recommend that the Commission accept as sufficient site control: (a) fee simple ownership; (b) executed lease; (c) exclusive option to purchase or lease supported by consideration; or (d) executed purchase-and-sale or lease agreement, held by the ILLE or a controlled affiliate.

We propose that ILLEs must maintain site control, notify the Utility and ERCOT of any substantive changes, and cure any lapse within 30 days; otherwise, they should face withdrawal. This approach is consistent with *PURA* §37.0561(g) and harmonizes with LLIS initiation and scoping under *Planning Guide* §9.2.2. It also mirrors the established site control methods for generation interconnections in *Planning Guide* §5.3.2.1, promoting uniformity, clarity, and consistency across ERCOT's interconnection framework.

#### Response to Question 3, Financial Commitment (PURA §37.0561(h))

PURA §37.0561(h) requires the commission to establish standards that include uniform financial
commitment requirements for the development of transmission infrastructure needed to serve a
large load customer.

It is our interpretation that *PURA* §37.0561(h) provides the Commission flexibility to accept one or more of the four forms of uniform financial commitment: (1) security on a \$/MW basis, (2) contribution in aid of construction (CIAC), (3) security provided under an advance procurement agreement for significant equipment or services, or (4) other forms acceptable to the Commission.

Form of Commitment. We recommend that the Commission adopt uniform security requirements that establish both the acceptable amounts and the timing necessary for a large load request to remain valid ("Interim Security"). Of the four statutory options, we recommend that ILLEs be able to satisfy the uniform financial commitment using any one out of the three following methods: (1) security posted on a \$/MW basis, (2) CIAC above a uniform aggregate minimum, or (3) security under an advance procurement agreement for significant equipment or services above a uniform aggregate minimum.

Acceptable Forms of Security. We recommend that the Commission provide for the following acceptable forms of security, which should include cash escrowed with the Utility, irrevocable letters of credit, surety bonds, parental guarantees, or any other form satisfactory to the Utility.

#### Response to Question 3(a), Security on a \$/MW Basis (PURA §37.0561(h)(1))

For security provided on a dollar per megawatt basis, what dollar amount per megawatt should the commission set?

One option available to the ILLE should be to satisfy the Interim Security requirement through a per-MW security posting. We recommend that the Commission adopt a uniform interim security requirement of \$3,000 per megawatt of requested capacity.

In our experience, this amount is sufficient to secure long-lead utility equipment and reserve manufacturing slots corresponding to the implied project size. Timely procurement at this stage helps avoid delays while maintaining the flexibility to repurpose equipment if needed. A uniform requirement ensures consistency across projects and demonstrates a meaningful financial commitment to the Utility by ILLE early in the interconnection process.

#### Response to Question 3(b), Contribution in Aid of Construction (PURA §37.0561(h)(2))

For contribution in aid of construction, what amount should a large load customer be required to pay?

As an alternative uniform financial commitment, the ILLE should be permitted to fund a CIAC payment to satisfy the Interim Security requirement. We recommend that the Commission recognize CIAC as a valid form of uniform financial commitment, provided it is set at a uniform minimum of \$1 million in aggregate. While CIAC is most often assessed at the binding Interconnection Agreement stage after facilities studies are complete, and therefore may not always serve as a practical interim requirement, the non-refundable nature of CIAC provides reliable and auditable evidence of ILLE commitment.

#### Response to Question 3(c), Significant Equipment or Services (PURA §37.0561(h)(3))

For security provided under an agreement that requires a large load customer to pay for significant equipment or services in advance of signing an agreement to establish electric service, how should the commission define significant?

Alternatively, the ILLE should be permitted to provide direct funding or security for "Significant Equipment or Services" to satisfy the Interim Security requirement. We recommend defining "Significant" by a fixed, auditable dollar threshold of \$3 million in aggregate security, demonstrated through executed interim Utility agreements or verified purchase orders for long-lead equipment or services. This creates a consistent measure of financial readiness, ensuring uniform application across projects in alignment with *PURA* §37.0561(h)(3).

## Response to Question 3(d), Other Forms of Uniform Financial Commitment (PURA §37.0561(h)(4)).

What other form of financial commitment not set forth in PURA §37.0561 should the commission accept?

We respectfully recommend that the Commission accept any of the three forms of uniform financial commitment described in our responses to Questions 3(a) through 3(c) as sufficient for the ILLE to satisfy the Interim Security requirement, with final obligations tied to execution of the IA. We further recommend that no additional form of financial commitment be required if one of these three methods is

provided. At the same time, should Staff determine that the ILLE ought to have a broader range of options to satisfy this requirement, we would be supportive, provided that such alternatives preserve both the overall magnitude and the proposed timeline and milestone structure of the uniform financial commitment for Interim Security, as outlined in our responses herein.

We recommend that the Commission tie financial demonstrations to three clear milestones in the large load interconnection process. The Forms of Uniform Financial Commitment described in *PURA* §37.0561(h), and further detailed in Responses to Questions 3(a) through 3(c), are sufficient to demonstrate financial readiness and should apply specifically at the "Interim Security" stage, as outlined below.

- Study Fees. Under PURA §37.0561(f), we recommend that this fee be due at the time of the large load interconnection request, as documented in a DSA.
- 2. Interim Security. We recommend that the Interim Security provided for under PURA \$37.0561(h) be required before ERCOT reviews the LLIS, with three uniform options available to the ILLE: (i) a per-megawatt security posting of \$3,000/MW, (ii) a CIAC payment of at least \$1 million in aggregate, or (iii) a "significant" security commitment of \$3 million in aggregate supported by executed interim agreements or verified purchase orders for equipment and services.
- 3. Full and final CIAC and Security Obligations. Tied to the facilities identified in the LLIS and assessed within a fixed timeframe of the execution of a binding, non-terminable Interconnection Agreement, superseding Interim Security, consistent with *Planning Guide* §§9.5 and 9.6.

This sequencing balances early queue discipline with fairness, ensuring that Utility and ERCOT technical resources are preserved for projects with real financial commitments, while matching ILLE's financial responsibility with the definition of required facilities.

#### Response to Question 4

4. PURA §37.0561(i) requires security to be refunded, in whole or in part, under certain circumstances

#### Response to Question 4(a), Duration of Operations for Refund Eligibility (PURA §37.0561(i)(1))

For how long should a large load customer be required to sustain operations to be eligible for a refund of the security that the large load customer paid?

We recommend that any security posted by the ILLE should become refundable, after application to any outstanding amounts, once the ILLE is energized and sustains operations for one (1) year from the Commercial Operations Date.

#### Response to Question 4(b), Refunds Upon Withdrawal (PURA §37.0561(i)(2))

If a large load customer withdraws its request for all or a portion of the requested capacity, what restrictions should apply to the refunded security?

If an ILLE withdraws or reduces capacity, refund the posted security pro rata to the remaining or re-sized request, net of documented, unrecoverable Utility costs incurred in reliance on the request (e.g., studies, committed procurement). Itemize any deductions to maintain transparency under the refund standard in *PURA* §37.0561(i)(2).

#### Response to Question 4(c), Refunds if Capacity Is Reallocated (PURA §37.0561(i)(3))

If capacity subject to a financial commitment will be reallocated to one or more other customers, what restrictions should apply to the refunded security?

If capacity is reallocated, refund the ILLE's security pro rata to the reallocated amount, net of documented, unrecoverable Utility costs, with a transparent itemization. This implements *PURA* §37.0561(i)(3) while protecting both ratepayers and the ILLE.

#### Response to Question 5, Uniform Reallocation Requirements (PURA §37.0561(j))

5. PURA §37.0561(j) requires the commission to establish uniform requirements for determining when capacity that is subject to an outstanding financial commitment may be reallocated. What requirements should the commission establish to uniformly determine when capacity that is subject to an outstanding financial commitment may be reallocated?

We recommend that the Commission adopt a two-tier trigger harmonized with *Planning Guide* §9.4(6). The initial 180-day period should begin upon ERCOT's formal communication to the ILLE that all planning studies have received conditional approval. If the requirements of *Planning Guide* §9.5 are not met within these 180 days, the project would be subject to cancellation under *Planning Guide* §9.4(9), unless

- 1. The Utility has submitted a timely status update together with a documented extension request, or
- 2. The ILLE has not yet been presented with a binding Interconnection Agreement (IA).

In the latter case, the 180 days should automatically be extended, with the clock restarting 180 days after the Utility provides the ILLE with an IA.

As a final safeguard, we recommend establishing a uniform 360-day outside date, measured from the date of ERCOT's communication of LLIS completion. Regardless of extensions or delays in the Utility's delivery of an IA, any project not reaching an executed IA within this 360-day window would have its reserved capacity made eligible for reallocation, unless the Commission determines that Utility-caused delays justify tolling this outside date. This approach preserves the existing 180-day management tool while adding an explicit backstop to prevent indefinite queue squatting.

Response to Question 6, ERCOT Access to Utility-Collected Data (PURA §37.0561(k))

6. PURA §37.0561(k) requires the commission to establish a procedure that allows ERCOT to access information collected by an interconnecting electric utility or municipally owned utility to ensure compliance with the standards for transmission planning analysis. What procedure should the commission establish?

We recommend that the Commission expand this proposed procedure into a framework that promotes multi-directional transparency, thereby strengthening the process for large load interconnection. Specifically, we recommend the Commission adopt a standardized, secure data-access procedure that (1) requires direct Utility-to-ERCOT submissions of LLIS elements and interconnection data in a uniform format; (2) implements segmented portals with a CEII-protected ERCOT/Utility workspace and a timely, redacted ILLE-visible workspace; (3) authorizes ERCOT and ILLE to verify security postings, LLIS progress, and milestones in real time; and (4) provides ILLEs a formal opportunity to comment on LLIS accuracy before ERCOT acceptance. All customer-specific or competitively sensitive information would remain confidential and exempt from disclosure under Chapter 552, Government Code, consistent with *PURA* §37.0561(k).

#### Response to Question 7, Additional Considerations

- 7. What additional information should the commission consider in its implementation of PURA §37.0561?
- **ILLE Process Transparency.** We recommend that the Commission support rulemaking to provide ILLEs with consistent visibility into LLIS progress, queue position, redacted LLIS study drafts, and redacted ERCOT comments to Utilities, consistent with but broader than *Planning Guide* §9.4(7).
- **ERCOT LLIS Timelines.** We recommend that the Commission support rulemaking to adopt binding deadlines for LLIS initiation, completion, and ERCOT review, consistent with *Planning Guide*

§9.4, to accelerate project review and address delays that undermine the business development objective of *PURA* §37.0561.

#### V. CLOSING

We appreciate the opportunity to provide input on Project No. 58481, Rulemaking to Implement Large Load Interconnection Standards Under *PURA* §37.0561, and believe our recommendations will help ensure the rule supports business growth while maintaining cost responsibility, transparency, reliability, and adequate financial commitment to prevent stranded infrastructure.

Respectfully submitted,

ander Schip

Schaper Energy Consulting, LLC

3006 Brazos St., Stc. 200 Houston, Texas 77006 andrew@schaperintl.com

By: Andrew Schaper, P.E.

President, Schaper Energy Consulting, LLC

#### **PUC PROJECT NO. 58481**

RULEMAKING TO IMPLEMENT	§ PUBLIC UTILITY COMMISSION
LARGE LOAD INTERCONNECTION STANDARDS UNDER PURA §37,0561	§ OF TEXAS
	<b>§</b>

#### SCHAPER ENERGY CONSULTING LLC COMMENTS EXECUTIVE SUMMARY

Schaper Energy Consulting LLC respectfully summarizes below our responses to the Staff's questions related to Project No. 58481, related to the rulemaking to implement large load interconnection standards under *PURA* §37.0561:

- Study Fee (§37.0561(f)): Set a flat Utility study fee of \$150,000 to \$300,000 per POI, indexed, with unused portions credited to site-specific procurement. Keep separate from ERCOT's LLIS Application Fee.
- Site Control (§37.0561(g)): Accept ownership, executed lease, exclusive option supported by consideration, or executed PSA/lease. Require cure of lapses within 30 days.
- Financial Commitments (§37.0561(h)): Require Interim Security before ERCOT LLIS review, satisfied by one of three uniform options: (i) \$3,000/MW posting, (ii) \$1 million aggregate CIAC, or (iii) \$3 million aggregate commitment for Significant Equipment/Services. Final CIAC/security due at Interconnection Agreement.
- Refunds (§37.0561(i)): Allow refunds after one year of sustained operations or pro rata refunds upon withdrawal or reallocation, net of unrecoverable Utility costs.
- Reallocation (§37.0561(j)): Trigger cancellation if requirements are unmet within 180 days of ERCOT approval, with a 360-day outside deadline for IA execution unless tolled for Utility delays.
- ERCOT Access (§37.0561(k)): Require direct Utility-to-ERCOT data submissions, secure CEII-protected portals, redacted ILLE visibility, and ILLE comment opportunities before ERCOT acceptance.
- Additional Measures: Support rulemaking to (i) provide ILLE visibility into LLIS progress, queue position, redacted drafts, and ERCOT comments; (ii) adopt binding deadlines for LLIS initiation, completion, and ERCOT review.