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| NPRR Number | [1295](https://www.ercot.com/mktrules/issues/NPRR1295) | NPRR Title | GTC Exit Solutions |
| Date Posted | August 19, 2025 |
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| Requested Resolution  | Normal |
| Nodal Protocol Sections Requiring Revision  | 3.11.2, Planning Criteria |
| Related Documents Requiring Revision/Related Revision Requests | Planning Guide Revision Request (PGRR) 130, Related to NPRR1295, GTC Exit Solutions |
| Revision Description | This Nodal Protocol Revision Request (NPRR) establishes new planning criteria to address the process for improving Generic Transmission Limits (GTLs) or resolving Generic Transmission Constraints (GTCs) when evaluating GTC exit solutions.  |
| Reason for Revision |  [Strategic Plan](https://www.ercot.com/files/docs/2023/08/25/ERCOT-Strategic-Plan-2024-2028.pdf) Objective 1 – Be an industry leader for grid reliability and resilience [Strategic Plan](https://www.ercot.com/files/docs/2023/08/25/ERCOT-Strategic-Plan-2024-2028.pdf) Objective 2 - Enhance the ERCOT region’s economic competitiveness with respect to trends in wholesale power rates and retail electricity prices to consumers [Strategic Plan](https://www.ercot.com/files/docs/2023/08/25/ERCOT-Strategic-Plan-2024-2028.pdf) Objective 3 - Advance ERCOT, Inc. as an independent leading industry expert and an employer of choice by fostering innovation, investing in our people, and emphasizing the importance of our mission General system and/or process improvement(s) Regulatory requirements ERCOT Board/PUCT Directive*(please select ONLY ONE – if more than one apply, please select the ONE that is most relevant)* |
| Justification of Reason for Revision and Market Impacts | This NPRR is intended to address concerns about the proliferation of GTCs across ERCOT and proposes specific improvements to the ERCOT transmission planning process designed to improve GTLs or resolve GTCs when plausible. The growing number and magnitude of GTCs that have been deemed Interconnection Reliability Operating Limits (IROLs) across the system are indicative of the increasing level of risk of widespread regional stability concerns. The proposed improvements to the transmission planning process will allow economic generation to serve demand efficiently while maintaining and improving system reliability. Multiple stakeholder groups are impacted by GTC implementation: 1. Existing generation experiences unforeseeable congestion cost and curtailment penalizing them;
2. Generation developers receive information about areas with stability concerns in an untimely fashion when commissioning is eminent, or immediately after an asset has been put into operation;
3. Load Serving Entities (LSEs) and Customers experience higher cost and risk of undeliverable energy from generators under contract to serve their demand.

This NPRR introduces the following concepts into Section 3.11.2:* 1. Improve transparency in project analyses by communicating observed expected impacts to GTCs;
	2. Recognize the incremental value to the system in eliminating a GTC. Note, the numbers are placeholders and Joint Sponsors anticipate discussion and input from stakeholders and staff to refine the values for how many GTCs become operationally problematic and the average incremental value of eliminating one GTC when beyond that number;
	3. Explicitly allow for sponsorship from stakeholders to reduce the realized cost of upgrades. While this is currently understood to be allowed, it is not explicitly stated; and
	4. Allow ERCOT Staff to develop a study methodology to estimate the incremental value of the benefit to serving system load by releasing generation trapped behind GTCs.
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| **Market Rules Notes** |

Please note that the following NPRR(s) also propose revisions to Section 3.11.2:

* NPRR1070, Planning Criteria for GTC Exit Solutions
* NPRR1286, Establish Multi-Value Criteria for Resiliency-Related Transmission Project Evaluation

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| Proposed Protocol Language Revision |

***3.11.2 Planning Criteria***

(1) ERCOT and Transmission Service Providers (TSPs) shall evaluate the need for transmission system improvements and shall evaluate the relative value of alternative improvements based on established technical and economic criteria.

(2) The technical reliability criteria are established by the Planning Guide, Operating Guides, and the North American Electric Reliability Corporation (NERC) Reliability Standards. ERCOT and TSPs shall strongly endeavor to meet these criteria, identify current and future violations thereof and initiate solutions necessary to ensure continual compliance.

(3) ERCOT shall attempt to meet these reliability criteria as economically as possible and shall actively study the need for economic projects to meet this goal.

(4) For economic projects, the net economic benefit of a proposed project, or set of projects, will be assessed over the project’s life based on the net benefit that is reasonably expected to accrue from the project as demonstrated through the production cost savings test or the congestion cost savings test. The current set of financial assumptions upon which the revenue requirement calculations for these tests are based will be reviewed annually, updated as necessary by ERCOT, and posted on the ERCOT website. The expected economic benefits are based on chronological simulations of the security-constrained unit commitment and economic dispatch of the generators connected to the ERCOT Transmission Grid to serve the expected ERCOT System Load over the planning horizon, comparing simulations with and without the project. These market simulations are intended to provide a reasonable representation of how the ERCOT System is expected to be operated over the simulated time period. From a practical standpoint, it is not feasible to perform these simulations for the entire 30 to 40 year expected life of the project. Therefore, the economic benefits are projected over the period for which simulations are feasible, which is the planning horizon established in Planning Guide Section 3.1.1.2, Regional Transmission Plan, and a qualitative assessment is made of whether the factors driving the economic benefits due to the project can reasonably be expected to continue.

(5) To determine the economic benefits of a proposed project under the production cost savings test, the revenue requirement of the capital cost of the project is compared to the expected savings in system production costs resulting from the project over the expected life of the project. Outputs from the market simulations described in paragraph (4) above will be used to provide an estimate of the expected reduction in total system-wide production cost due to the project. Other adequately quantifiable and ongoing direct and indirect costs and benefits to the transmission system attributable to the project may be considered as appropriate. If the levelized ERCOT-wide annual production cost savings equals or exceeds the first-year annual revenue requirement of the transmission project, the project will be deemed to demonstrate sufficient economic benefit and will be recommended. ERCOT will publish requested non-confidential modeling inputs, assumptions, and outputs utilized in the production cost savings test if that information can be feasibly provided.

(6) To determine the economic benefits of a proposed project under the congestion cost savings test, the revenue requirement of the capital cost of the project is compared to the expected system-wide consumer energy cost reduction resulting from the project over the expected life of the project. Outputs from the market simulations described in paragraph (4) above will be used to provide an estimate of the expected reduction in total system-wide consumer energy cost due to the project. In the market simulations, system-wide consumer energy cost will be calculated using hourly load in MWh multiplied by hourly load nodal energy prices in $/MWh. Other adequately quantifiable and ongoing direct and indirect costs and benefits to the transmission system attributable to the project may be considered as appropriate. If the levelized system-wide consumer energy cost reduction equals or exceeds the average of the first three years’ annual revenue requirement for the project, the project will be deemed to demonstrate sufficient economic benefit and will be recommended. ERCOT will publish requested non-confidential modeling inputs, assumptions, and outputs utilized in the congestion cost savings test if that information can be feasibly provided.

(7) In order to improve system stability and resiliency by resolving identified Generic Transmission Constraints (GTCs) and/or improving Generic Transmission Limits (GTLs) ERCOT will:

(a) Show for all transmission project evaluations whether the project provides exit solutions for resolving nearby GTCs or increases any GTLs;

(b) Endorse any GTC solution option that is within $20 million of meeting the cost-to-benefit criteria when there are more than five GTCs, in order to reflect the intangible resiliency value of reducing the number of GTCs impacting system operations; and

(c) Allow individual stakeholder(s) to pay for the difference above the threshold in paragraph (7)(b) above. ERCOT will endorse that option when stakeholder(s) demonstrate commitment to pay the additional cost according to guidelines established in Planning Guide Section 3.1.3.3, Generic Transmission Constraint (GTC) Exit Solutions.

(8) When evaluating the economic benefits of GTC exit solutions or projects that improve GTLs, in addition to the savings described in paragraphs (5) and (6) above, the impact of GTCs on generation available to serve system load during Emergency Conditions may be evaluated. Any information available from generation adequacy studies or resiliency studies that consider a range of system conditions may be used to estimate the value of improved deliverability of generation due to relieving GTCs.