



ProtoGen®

July 24, 2026

Via Electronic Filing

Matthew L. Homsher, Secretary
Pennsylvania Public Utility Commission
Commonwealth Keystone Building, 2nd Floor
400 North Street
Harrisburg, PA 17120

RE: Potential Regulations for Interconnecting Electric Loads, Docket No. L-2025-3059032 — Comments

Dear Secretary Homsher:

Enclosed for filing please find the Comments of ProtoGen, Inc. in response to the Commission's Secretarial Letter of June 22, 2026, seeking comments on potential regulations for the interconnection of electric loads in the above-referenced docket.

Please direct any questions regarding this filing to the undersigned.

Sincerely,

Kevin Wright
President, ProtoGen, Inc.

BEFORE THE PENNSYLVANIA PUBLIC UTILITY COMMISSION

Potential Regulations for :
Interconnecting Electric Loads : Docket No. L-2025-3059032

COMMENTS OF PROTOGEN, INC.

I. INTRODUCTION

On June 22, 2026, the Pennsylvania Public Utility Commission (“Commission”) issued a Secretarial Letter in the above-captioned docket seeking comments from interested parties regarding the possibility of promulgating regulations for the interconnection of electric loads, including large loads. ProtoGen, Inc. (“ProtoGen”), an energy technology company based in Quakertown, Pennsylvania, respectfully submits these comments in response to the questions attached to the Secretarial Letter.

Two themes recur throughout these comments. First, a single size threshold of 20 megawatts should anchor heightened review, refined by load type. Second, a tiered data access model should govern what interconnection information is public, what is available to qualified parties under standard agreements, and what is released only during an active study under critical infrastructure protections.

II. RESPONSES TO THE COMMISSION’S QUESTIONS

Question 1. *What electric load interconnection issues should be addressed via regulation? Please list the specific issues and how a regulation would be beneficial.*

Regulation should address, at a minimum: tiered access to network and grid data, where access expands and protections tighten as data becomes more sensitive; review levels set by load size and use; digital first application and status portals; prescribed timelines paired with accountability; and hosting capacity maps. The central organizing principle should be tiered data access. Public screening data should be openly available, engineering grade data that would identify customers should be available to qualified parties under standard agreements, and the most sensitive protection and fault data should be released only during an active study under critical infrastructure protections.

Question 2. *Should regulations concerning load interconnection be formulated and applicable by customer class, interconnection voltage or tariff rate?*

Regulation should differentiate by load size and load type rather than by customer class or tariff rate alone. Interconnection size can have a disproportionate impact on grid reliability and power quality, and different load types present different risk profiles. Critical infrastructure and data centers are more attractive to adversaries and warrant additional reliability and protection requirements. Size and use, not rate class, should drive the level of scrutiny.

Question 3. *Should load interconnection requests have different review levels based on load size, similar to generation interconnection review levels? If yes, please provide the load size range for each level of review and the rationale for these levels.*

Yes. Two triggers should set the review level. The first is size: loads above 20 megawatts should receive heightened review, a threshold that aligns with the federal threshold for small generating facility interconnection. Sudden loss of a large load can have a similar negative impact as sudden loss of generation. The second trigger is use case: data centers and other critical infrastructure require higher reliability and protection regardless of where they fall within the size bands.

Question 4. *If there is generation collocated with the load, should there be an expedited process for the generation to be interconnected at the same time the load is interconnected?*

A separate expedited track is not necessary. Collocated generation and load affect the same system and should be evaluated together as a single controllable system at the point of interconnection. The load should, however, be permitted to operate without a grid connection on a temporary and limited basis while interconnection facilities are being built out, provided the islanded configuration meets the IEEE 1547-2018 intentional islanding standard and remains entirely behind the point of interconnection. This allows a project to proceed without waiting on upgrades it does not yet require.

Question 5. *Some electric distribution companies (EDCs) provide online portals for the interconnection of distributed energy resources. Should the same be provided for load-interconnecting applicants to submit all applications and supporting documents? Please list the benefits or drawbacks.*

Yes, and digital submission should be the default. Every aspect of modern construction design, development, and implementation is digital. Requiring paper submissions imposes an unnecessary burden and slows review. The portal should accept all applications and supporting documents and should deliver data in standardized, machine readable formats rather than scans or screenshots.

Question 6. *What are some methods that may be used to discourage applicants from submitting duplicative projects with different EDCs?*

The most effective lever is pre-application data transparency. When applicants can see feeder and substation level characteristics before filing, they self screen and file fewer speculative or duplicative projects. As a direct deterrent, ProtoGen recommends an attestation requirement at the time of filing, backed by penalty charges that escalate for repeat offenders.

Question 7. *In order to establish a position in the EDC's queue, would requiring a load interconnection applicant to pay a fee, based on the level of review, be effective in minimizing duplicative projects with different EDCs?*

A fee tied to the level of review can be effective, and it is particularly valuable during the current data center driven demand surge. The need for such a fee diminishes if that demand subsides, so the fee should be structured as a tool that scales with conditions rather than as a permanent barrier to entry. See Question 10 for the recommended fee structure.

Question 8. *Should projects be able to move ahead of other projects in the queue based on completion of certain milestones? If so, please offer the criteria and conditions that should be considered and any that should not be a determining factor.*

Yes. Project readiness should affect queue position for load and generation projects of any size, advancing projects that are genuinely ready to proceed. Two conditions should govern any such advancement: full transparency of the advancing project's details and beneficiaries, and explicit consideration of the administrative burden the capability places on the utility.

Question 9. *What if any protocols should be in place for circumstances where an applicant can jump ahead in the queue?*

Transparency is the governing protocol. A project that seeks to move ahead of others must accept that more project specific detail will be shared with affected parties who may have an interest in, or objection to, the advancement. The trade for priority is disclosure.

Question 10. *For the load interconnection applications, should the EDCs charge an application fee? If yes: should a fee be required for load sizes above a certain minimum threshold and should such a fee increase based on the size of load?*

Yes. ProtoGen recommends an application fee for loads above 20 megawatts, increasing with the size of the load.

(a) *If so, what should that threshold be?*

The threshold should be 20 megawatts, with the fee scaling upward above that level, consistent with Question 3.

(b) *What payment methods should EDCs accept?*

EDCs should accept standard electronic payment methods such as wire transfer, Visa, and Mastercard, and ProtoGen recommends accepting regulated USD stablecoins as enabled by the GENIUS Act.

(c) *Should EDCs allow for electronic payments without administration fees?*

Electronic payment should be allowed without a separate administration fee where the submitter bears the processing cost, or where the settlement cost is negligible, as with low fee rails such as regulated USD stablecoins.

(d) *Should an EDC's costs for processing load interconnection requests be aligned with the cost structure for load interconnection application fees?*

EDC processing costs should align with the fee structure. Fees must not be arbitrary, but they may be set high where they reflect the likely interconnection cost caused by a planning project. Such a fee should be credited to the project if it proceeds and forfeited if it is cancelled, which ties the fee to cost causation and discourages speculative filings. A cost based deposit, with refund of any unused portion within a fixed period such as 20 business days, is a workable model.

(e) Should there be more oversight of load interconnection application fees to avoid any potential arbitrary fees?

Yes. There should be oversight to ensure fees remain cost based and reviewable rather than arbitrary. This could include annual reporting or other common means of oversight.

Question 11. Once a load interconnection request is submitted, what information should the EDC provide to the applicant, and by what means and frequency? Examples may include queue position, status of load study, anticipated timeline for completion, etc.

All interconnection information, including application progress, queue position, study status, and anticipated timeline, should be available to the applicant through a self service portal that updates automatically. Requiring applicants to make one off requests for staff to answer wastes resources on both sides. The process should remove manual staff involvement wherever possible.

Question 12. Should there be prescribed timelines and timeframes for completing the various steps in the load interconnection application review process?

Timelines should be prescribed, but they accomplish little without consequences for missing them. Introducing penalties also introduces disputes over whether a given miss was excusable, which the Commission will need to administer. ProtoGen therefore recommends pairing penalties for missed timelines with rewards for meeting them, so the incentive structure is balanced rather than purely punitive.

(a) Please provide a list of steps in the process and a reasonable time to complete each step, including various studies that may be required as part of the review process.

For study steps, ProtoGen recommends a 45 day system impact study and a 45 day facilities study, each with a 10 day grace period to account for surges in application submissions.

(b) What is a reasonable timeframe to complete a load interconnection application review?

The overall review, from a complete application through study completion and tender of an interconnection agreement, should be bounded with a defined outer limit of approximately 180 calendar days. This bound is consistent with the study steps recommended in part (a), with FERC's suggestion in its pending large load interconnection proceeding (Docket No. RM26-4) that grid operators complete large load studies within 60 to 90 days, and with the 150 calendar day cluster study deadline FERC adopted for generator interconnection in Order No. 2023. Construction of interconnection upgrades is a separate, project specific phase that follows the review; it should carry its own milestone schedule in the interconnection agreement rather than being counted against the application review timeline.

(c) What timeline should exist for EDCs to complete the review of collocated load and generation requests, if any?

Collocated load and generation should follow the same timeline as the unified system, because they are studied together. See Questions 4 and 13.

(d) If an EDC exceeds its expected review timeline, what actions should the EDC be required to take?

If an EDC exceeds its timeline, ProtoGen recommends that it refund study costs and fund a third party study up to its own study cost if the applicant elects to switch, with construction cost discounts that

escalate, for example at 5 percent every 30 days. This should be paired with a reward for on time or early completion.

Question 13. *Should there be separate queues for both generation and load interconnection requests? Why or why not?*

No. Generation and load affect the same distribution system and should share a queue. The factor that should drive differentiated handling is size and type, as described in Questions 2 and 3, not whether the request is for load or for generation.

Question 14. *How should the Commission address situations where there are exigent circumstances delaying a project's review or approval to interconnect from proceeding? Examples of these circumstances may include unexpected developments, need for additional studies, changing guidelines, etc.*

Circumstances change, but the bar for excusing a delay must be high, or the categories must be clearly defined and limited. Legitimate examples include a grid emergency or a large scale disaster response. If a particular category of delay recurs, that signals a systemic problem that should be fixed at the system level rather than excused case by case.

Question 15. *Should EDCs be required to provide hosting capacity maps?*

Yes. Interconnection begins with publicly available data, and maps should do everything possible to enable the process rather than forcing applicants to guess and check, as the current process does. Hosting capacity maps should be tied to the tiered access model described in Question 1. We ask that staff recognize that there is a tremendous amount of system data already in the public domain and that it is increasing with AI. For reference: <https://opengridworks.com/power-plants>.

(a) *If yes, what are the benefits, if any, of requiring EDCs to develop hosting capacity maps containing EDC feeder data and locations for substations, distribution transformers, line voltage, and related distribution assets?*

It will save time and money, reduce disputes for all parties, and increase the quality of all application types. We also believe this will reduce the overall number of applications, since guess and check approaches will not be needed.

(b) *What are the concerns regarding this requirement, if any?*

The principal concern is that granular data can re-identify and geolocate sensitive loads. This should be addressed with controls rather than refusal. The public tier should carry feeder level aggregates only, with no customer identifiable information, while granular hourly load and protection data sits in higher tiers under standard agreements. A load shape re-identification screen and the California 15/15 suppression rule protect critical end users such as hospitals, water treatment plants, and data centers. No federal authority, including CEII, PCII, or NERC CIP-014, prohibits controlled disclosure of distribution data; these are protection regimes rather than non-disclosure bars, and CIP-014 reaches only high voltage transmission.

(c) What aspects should be considered for these hosting capacity maps? Examples may include the frequency of updates, transparency, filtering and toggling mechanisms, size and number of applications for a certain location, identified system constraints, complaint process, etc.

Maps should provide data sufficient to allow third parties to generally determine whether an application is reasonably likely to advance without significant cost or delay due to preexisting system constraints or queue position. Key design aspects include tiered access; at least quarterly refresh with an “as of” date; filtering and toggling by substation, feeder, size, status, minimum load, transformer size, and system readiness; machine readable exports; clearly identified system constraints; and a portal based complaint process.

Question 16. Should EDCs be required to publish a public list of projects in an EDC’s load interconnection queue?

Yes, with tiered disclosure on the same model as Questions 1 and 15. A public list proves the queue is real and fairly ordered without handing an adversary a targeting map, provided granular detail sits behind the gated tier. This will also contribute to the transparency requirements needed for queue projects that advance in position based on readiness.

(a) What are the benefits, if any, of requiring EDCs to post on its website a list of projects in its load interconnection queue that includes the project’s queue position, nameplate capacity, and circuit identifier in a manner that protects the identity of the project owner and the location of the project?

Publishing queue position, nameplate capacity, and circuit identifier lets developers see where capacity is saturated, which reduces duplicative filings as discussed in Questions 6 and 7. A visible ordering also deters favoritism and validates that any milestone based advancement under Questions 8 and 9 was legitimate.

(b) What are the concerns regarding this requirement, if any?

Combining nameplate capacity with a circuit identifier can re-identify and geolocate a single large load even when the owner name is withheld, which recreates the adversary targeting risk raised in Questions 2 and 3 and exposes competitively sensitive siting. Anonymized data is not truly anonymous when a circuit carries only one obvious large project. However, we note that there are several alternative sources and means of collecting this data and making connections. Limiting stakeholder access through the utility system is largely hurting progress and costing money.

(c) What aspects should be considered for these public lists of projects? Examples may include timing for updates, transparency, filtering and toggling mechanisms, complaint process, etc.

Key design aspects include tiered access, with aggregated data public and granular detail gated; a small number suppression threshold that generalizes the circuit identifier when a circuit carries few projects; a coarser geographic disclosure for critical infrastructure loads; automated and frequent portal updates; filtering by circuit, size, and status; and a portal based complaint process.