

DOCKETED

Docket Number:	23-IEPR-05
Project Title:	Accelerating Distribution Grid Connection
TN #:	250282
Document Title:	Southern California Edison Company Comments - SCE Comments on CEC Interconnection Workshops
Description:	N/A
Filer:	System
Organization:	Southern California Edison Company
Submitter Role:	Public
Submission Date:	5/23/2023 4:18:11 PM
Docketed Date:	5/23/2023

*Comment Received From: Southern California Edison Company
Submitted On: 5/23/2023
Docket Number: 23-IEPR-05*

SCE Comments on CEC Interconnection Workshops

Additional submitted attachment is included below.

May 23, 2023

California Energy Commission
Docket Office, MS-4
Re: Docket No. 23-IEPR-05
1516 Ninth Street
Sacramento, CA 95814-5512
docket@energy.ca.gov

Re: Southern California Edison Company's Comments on the California Energy Commission's Workshop on Clean Energy Interconnection – Electric Distribution Grid
Docket No. 23-IEPR-05

Dear Commissioners:

On May 9, 2023, the California Energy Commission hosted a workshop aimed at gathering information on processes and timelines for interconnection and energization of clean energy resources to the electric distribution system. Speakers from state agencies, utilities, and developers provided an overview of the current state of interconnection and energization along with initiatives to improve and streamline these processes to advance California's clean energy goals. Southern California Edison (SCE) appreciates the opportunity to submit comments on the Workshop for consideration.

The overarching sentiment of several of the presentations given during the workshop was concern for the delay of timely interconnection of new capacity and generation resources to the grid due to the growing backlog of projects in utilities' interconnection queues, hindering generators and customers' ability to successfully energize clean energy resources. Commissioners from both the California Energy Commission (CEC) and the California Public Utilities Commission (CPUC) offered remarks on the need for better near- and long-term load forecasting and more timely distribution system upgrades to prevent interconnection and energization delays. Developers emphasized the need for greater transparency and communication from utilities during project interconnection along with the use of third parties to assist with project certification to reduce interconnection timeline delays. SCE agrees that greater communication and transparency are needed with customers and stakeholders; however, there are opportunities to address other areas of the interconnection process that present challenges to successful and timely deployment of clean energy resources.

Load Management Cannot Replace the Need to Build Out the Electric System

During the workshop, Commissioners expressed an interest in whether the IOUs were going to leverage load management controls to enable active management of flexible loads (including electric vehicle charging loads) interconnected onto the distribution system in the coming years. As SCE replied during the workshop, SCE's Grid Modernization Plan, included in its recent GRC filing, considers future investments to enhance its capabilities to better integrate and leverage third party load management systems for flexible loads. That said, while

SCE maintains that various forms of load management (or charge management) solutions will be an integral part of the future grid, load management alone is not sufficient to address the exponentially growing grid capacity issues that are projected to occur due to electrification growth. Per the 2022 IEPR forecast for SCE's service territory (e.g., 2022 Local Reliability Planning scenario), SCE is projected to experience an approximated 8% load growth rate for years 2023 to 2028—considered to be the highest it has experienced in over a decade. To keep pace with this demand, larger scale infrastructure upgrades are required systemwide, which require initiating early infrastructure planning activities as well as starting to build infrastructure sooner to ensure the grid is ready. To help support early planning and building of infrastructure, SCE also supports extending the distribution system planning horizon from 5 years to 10 years to better identify upgrades that need to be planned and built within this horizon.

California Needs Improved Processes for Licensing and Permitting and Supply Chain Support for Critical Equipment and Materials

There are many obstacles to the rapid deployment of infrastructure (e.g., utility and customer-owned infrastructure), but one key obstacle at the center of much debate is the permitting, licensing, and approval processes to allow infrastructure siting and construction activities. The permitting, licensing, and approval processes for deployment of utility infrastructure are multi-layered and the exact type and number of permits for a specific project depends on its size, geography, and jurisdiction. Hence, similar work scopes can have different permitting requirements. Support is needed to explore opportunities to streamline and simplify the permitting process to enable infrastructure development at the scale required to keep pace with electrification efforts.

In addition, the energy industry is experiencing supply chain constraints in critical equipment necessary to complete and energize EV Charging Infrastructure sites. In particular, constraints (limited availability) related to utility transformers and other materials have led to significantly increased lead times to obtain them. Regarding our Charge Ready programs, we are experiencing supply chain constraints for switchgear and required accessories where the utilities are responsible for completing the make ready infrastructure on both the utility side and customer side of the meter. These constraints include both 1) difficulty in obtaining this equipment (SCE is currently trying to engage a greater number of suppliers to meet program needs), and 2) extremely long lead times (e.g., 40 weeks or more to obtain equipment that formerly took only 8-12 weeks to obtain). These constraints with material and equipment have put upward pressure on the time it takes to energize a project. SCE is working with multiple suppliers to try to obtain the volume of equipment needed as well as working to better understand current lead times and order equipment earlier in the process. SCE has also experienced situations in which it is ready to energize projects when the customer completes the infrastructure on the customer side of the meter, however the customer isn't ready to be energized because they too are having difficulties obtaining switchgear and other critical equipment to energize EV infrastructure projects. Support with making the supply chain more robust around equipment and materials necessary for EV infrastructure projects will have a positive impact on the timeliness to complete EV Infrastructure projects.

Outsourcing Interconnection Work Carries Security and Safety Risk

During the afternoon workshop panels, it was suggested that the utilities outsource interconnection/energization and system upgrade work to third-party developers with the expectation that they will be able to design and build the necessary electric infrastructure facilities faster than the utilities can. While SCE did not offer a response during the workshop, it should be noted that SCE *does* offer an “*Applicant Design Option for Distribution and/or Service Extension.*” Under this option, the applicant for service (or developer) may elect to design the distribution line or service extension that is to be interconnected with SCE’s electric grid for new load requests. The applicant’s designer and installer must be a qualified designer and installer and the proposed design/build facilities must be in accordance with SCE’s Rules 13, 15, and/or 16. However, this option is restricted to only new interconnection facilities from the applicant’s service point to SCE’s electric grid.

In addition, SCE also offers an “*Applicant Installation Option for Distribution and/or Service Extension.*” For this option applicants are required to use Qualified Electrical Worker contractors licensed in the state of California and construct their project in accordance with SCE specifications, as well as deed the infrastructure to SCE upon completion. The applicant is also responsible for SCE’s inspection costs, and SCE will make the final connection to the existing SCE system. Contractors must be technically competent, have access to equipment, demonstrate financial responsibility, have adequate insurance coverage, and be able to furnish a surety bond for the performance of the contract, among other requirements. This option does **not** allow third party applicant build/installation work on SCE’s existing grid facilities as there are increased public and worker safety concerns with developers performing work on SCE’s existing electric grid, as well as potential service reliability risks should the third-party contractor inadvertently create an outage to customers that are served through SCE’s electric grid.

Although there are concerns about an industry shortage of skilled resources to perform infrastructure design and installation activities, it is important to underscore that SCE holds public and worker safety as non-negotiable when it comes to the engineering, design, construction, operations, and maintenance of SCE’s facilities. Therefore, outsourcing this type of work is not something that can be done without careful consideration of the potential liabilities and consequences associated with this approach. Factors to consider include public safety, third party property damage, non-compliance with permit restrictions, electric service reliability, as well as physical security and cybersecurity. Potential negative consequences can far outweigh impacts associated with delays in service interconnection.

SCE is Actively Implementing Measures to Increase Transparency with Developers

During the afternoon panels, speakers presented a number of potential solutions to address causes and communication of interconnection and energization delay, with one of the primary suggestions being increased communication and transparency between utilities and developers/customers. To this point, SCE has already begun implementing a range of measures to further increase its transparency with developers and builders regarding SCE’s load

May 23, 2023

energization processes. Specifically, SCE's efforts to increase transparency of its processes with developers and builders have been through targeted informational and educational workshop engagement sessions over the last year. The purpose of these workshop engagement sessions is to share SCE's timeline and process for load energization, address questions from developers and builders about the process, and solicit feedback on opportunities for improvement. Some examples of these engagement sessions that occurred over the last year include SCE's regional townhalls and community forums in counties expected to experience high growth as well as SCE's formation of a "New Construction Advisory Panel" forum, which includes various residential and commercial builders.

Furthermore, due to the expected rapid transformation of the transportation sector in California, SCE is regularly engaging charging station developers on an individual basis to gauge their needs and encourage them to notify the utility of their potential needs early in their planning process. Specifically, SCE is asking for longer-term plans, 3-7 years out, regarding where developers are looking to expand, which has provided insights that can be used for grid forecasting purposes. In addition to these individual engagements, SCE is also in the early planning stages of developing a series of transportation electrification fleet operator/charging station developer workshops where the objectives of these workshops are to share SCE's energization process and timelines, share locations where SCE is proposing to proactively upgrade its grid for transportation electrification load, address questions about SCE's energization process and, solicit information about developers' charging station deployment and expansions plans for SCE to consider in its future distribution planning cycles.

Lastly, SCE also provides information on its website about the available capacity it has on its distribution grid (e.g., Integration Capacity Analysis). This information is currently focused on providing capacity information for generation interconnection, which generation developers currently utilize to site generation interconnection projects. In the future, SCE is expanding this information to more appropriately also support load interconnections.

Conclusion

SCE thanks the CEC for consideration of the above comments. Please do not hesitate to contact me at (626) 302-0905 or Dawn.Anaiscourt@sce.com with any questions or comments you may have. I am available to discuss these matters further at your convenience.

Very truly yours,

/s/

Dawn Anaiscourt