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REPLY COMMENTS OF LOCAL GOVERNMENT SUSTAINABLE ENERGY COALITION TO RESPONSES TO AMENDED SCOPING MEMO APPENDIX A

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INTRODUCTION

Pursuant to the August 14, 2023, email, High DER Amended Scoping Memo Appendix A and Due Dates to File Comments (Ruling), and the August 21, 2023 email ruling of Administrative Law Judge Hymes granting the request for an extension of time to file comments, the Local Government Sustainable Energy Coalition (LGSEC) provides these reply comments to the investor-owned utilities' (IOUs) responses to the questions in Appendix A of the Ruling related to overall investment and distribution planning and execution processes.

Local Governments (LGs) – including jurisdictions that are served by a public utility district, energy cooperative, irrigation district or community choice aggregator, as well as those which are not – are increasingly taking on responsibilities that in the past were the near sole province of IOUs. These consist of helping to foster affordable energy bills, in a time of fast-increasing rates and extreme weather conditions, through provision of efficiency and integrated demand side management services, often purveyed by regional energy networks (RENs); reducing or disrupting reliance on IOU distribution services through solar aggregation, microgrids, and storage; fielding and permitting electric vehicle (EV) recharging facilities, including related to largescale facilities that serve as shipping or transportation nodes; and implementing a host of building electrification ordinances and programs. At the same time,

several persistent challenges – including a lack of coordination between distributed energy resources (DER) deployed by LGs and others and the potential need to modify local distribution capacity; outdated or incomplete distribution planning data and documents; and slow or stalled IOU distribution capacity expansion processes – is throttling locally-focused economic growth and retarding progress towards meeting state climate goals in many jurisdictions.

What's more, "knife edge" possibilities linger close by that could rapidly and revolutionarily impact the need for and use of centralized distribution systems. These include mass defection from the grid in response to ever-escalating rates; potential deployment of artificial intelligence to manage non-IOU assets in optimal ways; and the inevitable switching of the state's fleet of diesel backup generators (BUGs) to cleaner fuels, enabling them to be used more dynamically to reduce reliance on of grid power.

Colloquial reports indicate that every municipality and school district in the state is looking to or has added solar and/or storage. For example, Chula Vista has already installed almost 4.5 megawatts (MW) of solar and 180 kilowatts (kw) of battery storage. Likewise, in 2022 there were more than 9,000 BUGs, capable of generating greater than five gigawatts, in the San Francisco Bay Area alone; it is a matter of years, not decades, in which these assets can be decarbonized and deployed more flexibly.[1]

According to Julieta Giraldez, Kevala's Director of Grid Planning, traditional infrastructure "cannot be built fast enough to meet the coming electrification load" by reacting as utilities now do "to customer interconnection requests…"[2]

[1] https://www.potreroview.net/diesel-backup-generator-population-continues-to-grow/

[2] https://www.utilitydive.com/news/rising-electrification-requires-a-dramatic-shift-to-integrated-planning-of/691708/?utm_source=Sailthru&utm_medium=email&utm_campaign=Issue:%202023-09-21%20Utility%20Dive%20Newsletter%20%5Bissue:54732%5D&utm_term=Utility%20Dive

A new energy era is dawning, one that is increasingly dependent on large populations of small- or modest-sized dispersed assets, with necessarily greater resiliency to extreme weather, and less carbon intensity. Yet, neither the California Public Utilities Commission (CPUC) nor the IOUs have shifted their approaches to accommodate this more complex, multi-player, environment.

COMMENTS

LGSEC's insistent message to the CPUC in this (and other) proceedings is that LGs should be treated as equal partners – rather than subservient "customers" – as part of regulatory, ratemaking, and IOU planning and investment activities. To accomplish that outcome, new communication and planning pathways need to be created. Further, to the extent that LG activities reduce pressure to invest in otherwise expensive IOU distribution they should be properly compensated.

In its Response, Pacific Gas and Electric Company (PG&E) describes its "True North Strategy" vision, which includes delivering "affordable energy" and "architecting an electric system that is… locally and system optimized, and able to unleash the full potential of electrification including electric vehicles."[3] LGSEC submits that PG&E is failing to achieve these vision elements, and nothing in its Response suggests a change in trajectory. LGs are generally not consulted by the IOUs on how best to optimize local distribution systems to accommodate DERs or nascent priorities, nor on LG electrification plans, even though the accretion of tens of thousands of local decisions will in great measure create the world in which the utilities need to operate, and which ratepayers will have to fund. While LGs would welcome

[3] RESPONSES TO AMENDED SCOPING MEMO APPENDIX A BY PACIFIC GAS AND ELECTRIC COMPANY (U 39 E), September 13, page 1.

focused, collaborative, distribution planning efforts, these initiatives rarely happen, and when they do are responses to catastrophic utility failures or under the brokered aegis of such state agencies as the California Energy Commission (CEC) or California Independent System Operator (CAISO).

PG&E has the second highest rates in the state, after San Diego Gas and Electric (SDG&E)[4], and fairly brags in its Response that rates will likely go higher,

> Despite spending 15%, 41%, and 72% annually above General Rate Case (GRC) imputed adopted revenue requirements for distribution line capacity (Major Work Category (MWC) 06) and distribution substation capacity (MWC 46) between 2020 and 2022, PG&E's investment planning, distribution planning, and execution has been unable to keep up with rising costs and increased demands for new distribution capacity in recent years. Therefore, additional approved funding for distribution capacity is needed to help alleviate distribution capacity project delays and help put PG&E back on track to serve our customers and build a climate-resilient and dynamic grid.[5]

In the face of rising revenue requirements, the only way rates can decline is with expanding sales. However, in the present period, in which customers have fast-growing, increasingly affordable, options to reduce their use of the grid or defect from it entirely – along with the Catch-22 of expectations of higher rates as a signaling effect for energy users to become self-sufficient, or even avoid electrification – future sales levels and characteristics are far from certain. Peak and energy loads have been flat since 2006. Added distribution capacity has largely been to serve new developments and to replace/upgrade existing customers; it is quite possible the IOUs have and will continue to invest in unneeded distribution.

Likewise, some elements blocking progress would not be remedied by throwing money at them. For example,

> …utilities nationwide have been experiencing supply chain challenges that have made it difficult to procure essential equipment needed to connect new developments to the power grid. Unfortunately, these challenges have not gone away. Currently, the shortage

[4] Source: Meredith Fowlie and Duncan Callaway, July 2023.
[5] PG&E, page 2.

> of HNS three-phase pad mount distribution transformers is particularly acute and may affect your project(s) in the coming months. SDG&E's transformer suppliers have informed us that an increase in demand nationwide has exceeded their current production capabilities, and they are not able to fulfill our orders based on our requested delivery dates.[6]

It is important that non-monetary factors impacting capacity improvement timelines be clearly communicated to LGs and others, and that creative processes to troubleshoot them be engendered. For time critical projects, if lengthy delays are expected for such items as transformers, otherwise uneconomic DER solutions may pass investment hurdle thresholds.

In this respect, although this is not the proceeding in which funding mechanisms will be formally considered, LGSEC opposes the addition of new cost recovery mechanisms, particularly balancing accounts.[7] As indicated in a recent California State Auditor report, existing balancing accounts go unaudited by Cal Advocates, with essentially no regulatory oversight. The CPUC should deny requests for new balancing accounts until the issues identified by the state have been comprehensively addressed.

PG&E states that it,

> does not anticipate any issues specifically with regards to the individual project prioritization process within the Capacity Program to meet the anticipated growth, particularly with PG&E's implementation of its Integrated Grid Planning (IGP) approach, as this will provide a multi-year plan that can adapt to dynamic conditions.[8]

Yet LGs already struggle with chronic challenges associated with securing reliable, actionable distribution capacity infrastructure information from the IOUs, and years-long waits to distribution-connect high-priority projects. For example, in 2022 Southern California Edison's (SCE) entire integration capacity analysis (ICA) map was found to be inaccurate, prompting the CPUC to demand 30-day updates from SCE for the last year. To date, SCE has

[6] From Will Speer and Jennifer Jett, Vice President, Electric Engineering & Construction Vice President, Operations Support, May 24, 2023.
[7] PG&E, Page 3.
[8] PG&E, Pages 16-17.

refreshed 3,869 out of a total of 3,975 ICA active circuits, with 106 circuits still needing to be restored.[9]

The situation is not altogether different for PG&E. LGs are confronted with inaccurate ICA maps, poor or no communication, and multi-year-long delays in increasing the grid capacity of, or interconnection for, high-priority, community-serving DER and EV charging projects. As a result, LGs expend taxpayer dollars and access State and Federal funds to deploy projects to meet State housing, climate, and job growth goals only to find, years into design and development, that they are stymied by inadequate IOU tools and misinformation. It would be as if IOUs, under a CPUC mandate to develop a given infrastructure, planned, designed, and developed projects guided by local energy codes, only to discover after they applied and paid for local building permits that the published codes were years out of date, and they no longer could proceed.

While the system is not exactly broken, it is wobbling under the pressures of the new DER-dominated era and largely one-way communication mode (i.e., IOUs to everyone else). The solution is not to toss more dollars at distribution investment; creating a grid that is too expensive to use would be worse than not expanding the grid at all. Reforms must be made, including establishing a formal process in which there is two-way communication between the IOUs and municipal planners/building/land-use teams.

SDG&E states that it

> … continues to advocate for a more policy-aligned CEC IEPR forecast. The CEC IEPR load forecast has been increasing in recent years, but more work is needed to fully align with state

[9] September 18, 2023 correspondence Via E-Mail to Rachel Peterson, Executive Director California Public Utilities Commission 505 Van Ness Avenue San Francisco, CA 94102 from / Tara Kaushik Managing Director, Regulatory Relations.

policy goals. Increases in the forecast should help support the necessary investments to meet California's objectives. As these needs grow, more funding and investment will be needed.[10]

LGSEC agrees that relevant state agencies, such as the CEC, need to improve energy planning efforts. However, increasing the load forecast is not the most pressing issue. Instead, greater attention needs to be paid to the dispersion of the energy system, and the ongoing consequences to the centralized grid. This should include forecasting future states of extreme DER adoption, along with defection from or reduced grid dependency. Likewise, LG activities needed to be properly considered, including by providing funding to LGs to enable them to effectively undertake their expanding energy roles and improving the integrated resource planning process.

SCE outlines a similar logical distribution expansion/deferral planning process, which is heavily reliant on historical patterns.[11] However, it is generally agreed that the future will be – and state and local governments strongly want it to be – different than the past. The challenging question is: where, when, and in what form will the future emerge, at the distribution circuit level? LGSEC submits that adequately answering this question requires application of new methodologies, including statistical analyses predictive of where DERs and different demand is likely to occur (e.g., BUG populations);[12] incorporation of LG fuel substitution ordinances and expenditures on DERs, electric vehicle recharging facilities, and other related assets; as well as close coordination between IOUs and LGs. These elements no not appear evident in the IOUs'

[10] SAN DIEGO GAS & ELECTRIC COMPANY'S (U 902-E) RESPONSE TO ASSIGNED COMMISSIONER'S AMENDED SCOPING MEMO AND RULING – QUESTIONS FOR SUPPLEMENTAL UTILITY RESPONSE, September 15, 2023. Page 4. LGSEC notes that it was not properly served this document.

[11] Grid Needs Assessment & Distribution Deferral Opportunity Report Southern California Edison's Narrative 2023 August 15, 2023

[12] This approach seems congruent with SCE's customer-level propensity model, but with additional inputs. Attachment 1-27.

planning processes, even as carefully described by SCE, whose analyses ultimately hovers above the LG level.[13] For example, Edison's fuel substitution forecast incorporates,

> 1 FS Programs (FS): Programs that the CPUC works with the IOUs, other program administrators, and vendors to develop programs and measures to transform technology markets within California using ratepayer funds. 2. Title 24 Codes and Standards (T-24): Mandatory California New Construction regulations are designed to reduce wasteful and unnecessary energy consumption in newly constructed and existing buildings.[14,15]

LGSEC acknowledges, as Edison states, that planning is in flux,

> Given that LTPT and other Grid Modernization Engineering and Planning tools are still under development, SCE is in a transitional phase, where profile-based portions of the forecast are developed within SCE's LTPT- Forecasting Tool, which utilizes Statistical Analysis System (SAS) as its software engine, and point-based portions are still developed within SCE's legacy planning tool system.[16]

The need to make changes provides opportunities to address ongoing weaknesses. For example, all the IOUs generally omit consultation with LGs from their planning processes, at least as described in their submission, do not appear to reconcile distribution and system level forecasts, and do not conduct area-specific back-casts.[17] All these items need to be addressed in this proceeding.

Likewise, the service cancellation and reduction data presented by Edison indicates the need for regulatory reform.[18] Under the present approach, the IOUs make what amounts to a (hopefully) sophisticated bet on behalf of ratepayers that additional demand will emerge to pay for investments in additional distribution capacity. In some cases, it is a sure thing – a cement factory soon to open – other times, less so; a planned residential development years in the

[13] SCE does rely on permit data, which it obtains from the Construction Industry Research Board, Attachment 1-27.
[14] Attachment 1-34. Recognition of LG activities may be embedded in other categories, such as "Customer Project Information," but Edison does not make this explicit.
[15] A bonus would be to use this process to develop a thoughtful retreat from the gas system, so as to reduce the costs of stranded assets and random electrification.
[16] Attachment 1-15
[17] For example, SDG&E pages 2 and 3; SCE Attachment 1-12 to 1-15.
[18] Attachment 1-60 to 1-80.

making. Either way, the IOUs' risks are more than hedged by the fact that they receive what amounts to a guaranteed return on investment from ratepayers, who, under present approaches, are the ones fully exposed to the risk that demand will not actually emerge, or not arise at adequate levels to safeguard affordability.

PG&E,

> …observed that local government agencies and environmental resource boards are not currently staffed to process and review permits for the increased amount distribution capacity work. Coupled with non-standardized process or requirements, this has led to further days in the permitting process. Therefore, PG&E will continue to support increased interagency and local government coordination to look at accelerating permitting timelines and streamlining permitting requirements for infrastructure that will enable electrification.[19]

LGSEC agrees that LGs lack the resources to expeditiously foster, manage, track, and permit the growing population of beneficial DERs, not to mention evaluate how these assets might change grid demand. However, it similarly notes that while the IOUs require payment for distribution capacity information which may be out-of-date, LGs do not charge similar fees to access their information. Reform is necessary on both sides, with secure funding available to LGs to expeditiously permit, collect, and share data on energy-related activities, which is necessary for the IOUs to properly plan their systems.

IOUs regularly solicit for DER distribution deferral projects, through the Distribution Investment Deferral Framework (DIDF), partnership pilots and other request-for-offer competitive solicitation process. Over time it seems likely that the private sector will develop a robust and potentially cost-effective capacity to respond to these opportunities. However, participating in them, along with other, processes can be burdensome, and may present as a square hole for LGs' round pegs (e.g., since there are no prior consultations, the two parties'

[19] PG&E, Page 18.

planning processes are never synced, with both potentially pursuing parallel projects which could be mutually beneficial, but instead are like ships passing in the night). More subtly, the organic interplay from bottom-up DER emergence, grid needs, and potential deferral opportunities is not being captured. This element of the distribution planning process needs to be integrated into an overall two-way, synced, IOU-LG relationship.

Developing more standardized processes and data collection requirements is also meritorious, an area in which CEC leadership is needed.

Conclusion

Based on the above discussion LGSEC recommends that the Commission undertake the following actions:

1. Require the IOUs to develop ongoing processes to incorporate LGs' energy-related ordinances, investments, and policies into distribution planning processes.
2. Require IOUs to actively consult with LGs about their planning processes, reconcile distribution and system level forecasts, and conduct area-specific back-casts.
3. Require IOUs to transparently and dynamically inform LGs of barriers to increasing distribution capacity at the circuit level; categorized those that are not resolvable through additional funding (e.g., supply chain blockages), those that could be addressed with more funding, and the associated amount; and those that could be relieved through DER deployment.
4. Require IOUs to refund all application fees and customer-side costs incurred as a result of provision poor quality data or inaccurate communication of wait times.
5. Establish a compulsory third-party mediation process through which LGs and IOUs must respond to electrification-related requests within 90 days or face penalties.

6. Launch a CPUC-sponsored fellowship program to rotate IOU, LG, CPUC, and CEC staff and executives between organizations, as a means to foster greater understanding, dialogue, and connections.
7. Work with the CEC to better incorporate potential price impacts on future electricity demand; finetune forecast methodologies that better capture DER emergence and associated grid consequences, that can be translated to activities at the circuit level; and develop standardized DER data collection and permitting protocols.

Respectfully submitted,

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